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FINAL REMEDIAL INVESTIGATION AND FEASIBILITY STUDY ADDENDUM REPORT FOR SITE 21 ST JULIENS CREEK ANNEX CHESAPEAKE VA

10/01/2010

CH2M HILL

Final

Remedial Investigation and Feasibility Study Addendum Report for Site 21

St. Juliens Creek Annex
Chesapeake, Virginia

Naval Facilities Engineering Command
NAVFAC MID-ATLANTIC

Prepared for

Department of the Navy

Naval Facilities Engineering Command
Mid-Atlantic

Contract No. N62470-02-D-3052
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October 2010

Prepared by

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Virginia Beach, Virginia

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Acronyms and Abbreviations

µg/L	micrograms per liter
µg/m^3	micrograms per cubic meter
AF	attenuation factor
bgs	below ground surface
CERCLA	Comprehensive Environmental Response, Compensation, and Liability Act of 1980
CLEAN	Comprehensive Long-term Environmental Action—Navy
COI	constituent of interest
CSM	conceptual site model
CTE	central tendency exposure
CVOC	chlorinated volatile organic compound
DCA	dichloroethane
DCE	dichloroethene
ELCR	excess lifetime cancer risk
Freon 12	dichlorodifluoromethane
FS	Feasibility Study
HHRA	Human Health Risk Assessment
HQ	hazard quotient
HVAC	heating, ventilation, and air conditioning
IR	Installation Restoration
L	liter
LUC	land use control
MCL	maximum contaminant level
mL/min	milliliters per minute
Navy	Department of the Navy
NFA	no further action
PAL	project action limit
QC	quality control
RI	Remedial Investigation
RME	reasonable maximum exposure
RSL	Regional Screening Level
SJCA	St. Juliens Creek Annex
TCE	trichloroethene

UFP-SAP	Uniform Federal Policy Sampling and Analysis Plan
USEPA	United States Environmental Protection Agency
UST	underground storage tank
VC	vinyl chloride
VOC	volatile organic compound

SECTION 1

Introduction

This Remedial Investigation (RI) and Feasibility Study (FS) Addendum presents the field activities, analytical results, and data evaluation of the phased vapor intrusion evaluation that was conducted at Environmental Restoration Program Site 21—Industrial Area, at St. Juliens Creek Annex (SJCA), Chesapeake, Virginia, and incorporates the vapor intrusion pathway into the FS evaluation. The investigation was performed in compliance with the Uniform Federal Policy Sampling and Analysis Plan (UFP-SAP) (CH2M HILL, 2009a) and in response to the recommendations put forth in the RI report (CH2M HILL, 2008). The vapor intrusion investigation was conducted for the Department of the Navy (Navy), Naval Facilities Engineering Command Mid-Atlantic, under the Comprehensive Long-term Environmental Action—Navy (CLEAN), Contract N62470-05-D-3052, Contract Task Order 0057, in accordance with the Comprehensive Environmental Response, Compensation, and Liability Act of 1980 (CERCLA), as amended by the Superfund Amendments and Reauthorization Act of 1986, and, to the extent practicable, the National Oil and Hazardous Substances Contingency Plan.

The overall objective of this vapor intrusion investigation was to evaluate the potential for the migration of the chlorinated volatile organic compounds (CVOCs) from groundwater to indoor air in overlying occupied buildings and to assess current and future potential risk to building occupants from potential vapor intrusion as recommended in the RI report (CH2M HILL, 2008). This objective was accomplished by the following actions:

- Conducting building surveys at the buildings identified in the RI to gather building characteristic information that is pertinent to potential vapor intrusion pathways.
- Collecting samples at the identified occupied buildings which overlie the shallow groundwater CVOC plume.

This vapor intrusion evaluation was conducted in accordance with the *DoD Vapor Intrusion Handbook* (DoD, 2009), *OSWER Draft Guidance for Evaluating the Vapor Intrusion to Indoor Air Pathway from Groundwater and Soils* (USEPA, 2002), and *Vapor Intrusion Pathway: A Practical Guideline* (ITRC, 2007). The Commonwealth of Virginia does not currently have vapor intrusion guidance.

SECTION 2

Site Background and Characterization

2.1 Facility Description and Background

The SJCA facility is approximately 490 acres and is situated at the confluence of St. Juliens Creek and the Southern Branch of the Elizabeth River in the City of Chesapeake, southeastern Virginia (**Figure 2-1**). Most surrounding areas are developed and include residences, schools, recreational areas, and shipping facilities for several large industries.

SJCA began operations as a naval ammunition facility in 1849. The annex was one of the largest ammunition depots in the United States involving wartime transfer of ammunitions to various other naval facilities. After ordnance operations ceased at SJCA in 1977, decontamination was performed in, around, and under ordnance-handling facilities by flushing the areas with chemical solutions and water. The SJCA facility has also provided non-ordnance services including degreasing; boiler plant, wash rack, fire-fighter training, and potable water and salt water fire-protection systems operations; paint, machine, vehicle and locomotive maintenance, pest control, battery, print, and electrical shop operations; fire-fighter training ; and storage of oil and chemicals.

Activity at SJCA has decreased in recent years and many of the aging structures are being demolished. The current primary mission of SJCA is to provide a radar-testing range and various administrative and warehousing facilities for nearby Norfolk Naval Shipyard and other local naval activities. SJCA also provides administrative offices, light industrial shops, and storage facilities for several tenant commands; including Defense Reutilization and Marketing Office storage; Space and Naval Warfare Systems Command; Fleet and Industrial Supply Center, Norfolk Integrated Logistics Support (FISC Norfolk ILS) (former Mid-Atlantic Regional Maintenance Center); and a cryogenics school.

2.2 Site 21 Description and Background

Site 21 is located in a former industrial area in the south-central portion of SJCA (**Figure 2-2**)**.** The site vicinity, including the boundary, existing and demolished buildings, and other site features, are shown on **Figure 2-3**. Although the site was initially identified as Building 187 the Site 21 boundary has been expanded, based on investigation data, to encompass the shallow groundwater CVOC plume that underlies a number of nearby industrial buildings.

Buildings at Site 21 were historically used as machine, vehicle, and locomotive maintenance shops; electrical shops; and munitions loading facilities. Outdoor areas were used for equipment and chemical storage. Several of these buildings and/or their surrounding areas were designated as former Installation Restoration (IR) sites (Sites 9, 10, 11, 12, 13, 14, 18, and Area of Concern E). Additionally, a fuel service station was previously located just south of Building 187. Two abandoned underground storage tanks (USTs) at the former service station had a history of leakage. Following removal of the USTs and remediation of

the associated groundwater, the UST site was closed under the state UST program (CH2M HILL, 2008).

The existing buildings and the Site 21 area are currently used for storage and maintenance activities. Building 1556 was constructed in 1992 and is currently used as the warehouse for FISC Norfolk ILS. Many of the older buildings at the site have been demolished. A storm sewer system runs through the site and drains to a downstream inlet (IR Site 2) to St. Juliens Creek (**Figure 2-3**).

2.3 Site 21 Characterization

Site 21 is currently being investigated under the CERCLA process. Several investigations have been conducted at Site 21 and at Sites 9, 10, 11, and 18, which are now included within the expanded Site 21 boundary. Most recently, the RI was conducted in several phases between March 2005 and February 2007 at Site 21. The information that is pertinent to the vapor intrusion pathway, including site geology and hydrogeology, nature and extent of contamination, and human health risk estimates, is presented below and has been summarized from the RI report (CH2M HILL, 2008).

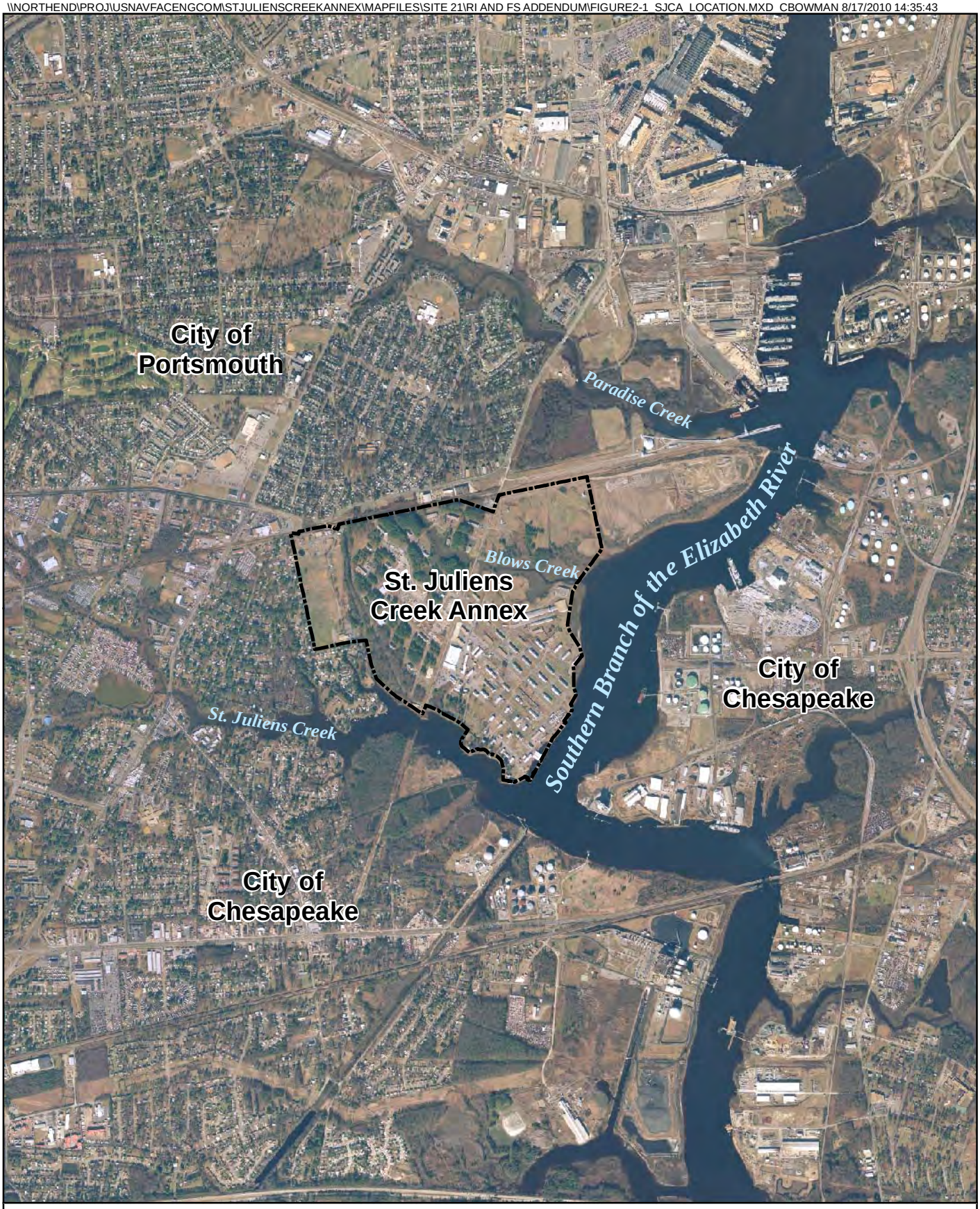
2.3.1 Site Geology and Hydrogeology

The subsurface geology at Site 21 consists of the fine to coarse silty and clayey sands of the Columbia aquifer underlain by the high plasticity clay of the Yorktown confining unit. The Columbia aquifer extends to a depth of between 13.5 to 20 feet below ground surface (bgs). The Yorktown confining unit is 17 feet thick at the location of a deep groundwater monitoring well installed within Site 21 based on observations during its installation. At Site 2, just south of Site 21, the thickness of the Yorktown confining unit ranges from 23 to 38 feet thick. The confining unit lies above the fine to coarse shelly sands of the Yorktown aquifer.

Based on groundwater elevations collected in February 2007, shallow groundwater is generally encountered from 2 to 7 feet bgs and flows southwest in the eastern portions of the site and southeast in the western portions of the site toward the storm sewer system east of Building 1556 (**Figure 2-4**). It is not clear whether leaks in the storm sewer line or the increased permeability of the gravel around the line cause this preferential flow pathway. The storm sewer system eventually outlets in a downstream inlet (IR Site 2) to St. Juliens Creek. The horizontal hydraulic gradient in the shallow Columbia aquifer is between 0.004 and 0.01 feet per foot. The groundwater flow velocity in the shallow Columbia aquifer is approximately 0.196 feet per day (72 feet per year) assuming typical conditions; however, since flow at Site 21 is heavily influenced by the position of the storm sewer system, it is likely that the actual velocity is higher than calculated.

2.3.2 Nature and Extent of Contamination

Thirty-one volatile organic compounds (VOCs) were detected above the reporting limits in the shallow groundwater during the RI. Six VOCs (benzene, 1,2-dibromo-3-chloropropane, 1,1-dichloroethene [1,1-DCE], trichloroethene [TCE], cis-1,2-DCE, and vinyl chloride [VC]) were detected at concentrations above their respective maximum contaminant level (MCL).



Legend

St. Juliens Creek Annex

N
W E
S

0 1,250 2,500
Feet

Figure 2-1
Location of St. Juliens Creek Annex
Remedial Investigation and Feasibility Study
Addendum Report for Site 21
St. Juliens Creek Annex
Chesapeake, Virginia

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Legend

St. Juliens Creek Annex

Site 21 Boundary

N
W E
S

0 450 900
Feet

Figure 2-2
Site 21 Location Map
Remedial Investigation and Feasibility Study
Addendum Report for Site 21
St. Juliens Creek Annex
Chesapeake, Virginia

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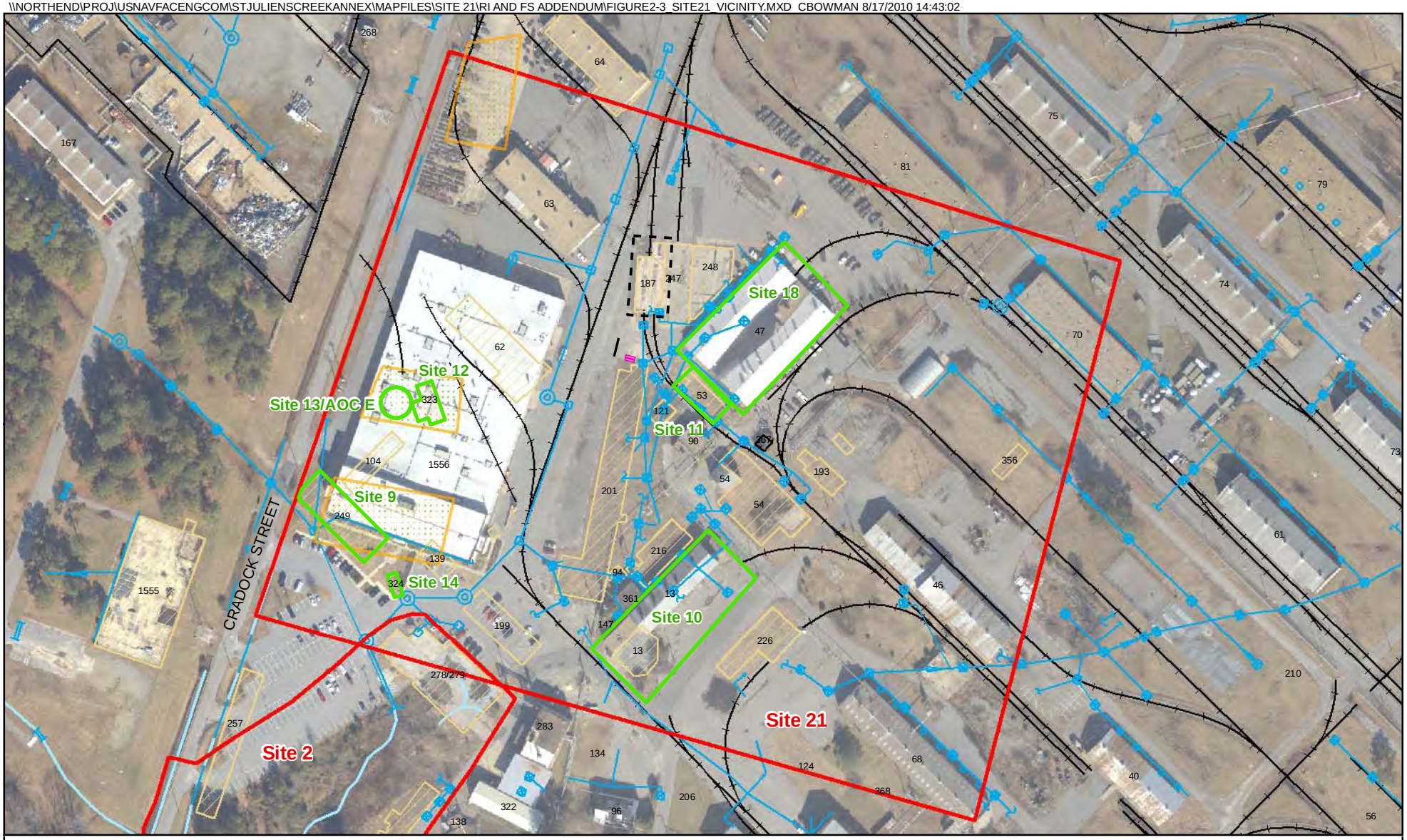
\\NORTHEND\PROJ\USNAVFACENGCOM\STJULIENSCREEKANNEX\MAPFILES\SITE 21\RI AND FS ADDENDUM\FIGURE2-3_SITE21_VICINITY.MXD CBOWMAN 8/17/2010 14:43:02



Legend

- Site Boundaries
- No Further Action IR Sites
- Demolished Buildings
- Original Site 21 Boundary
- Approx. Areas of TPH Contaminated Soil Removal (1993)
- Approx. Locations of Former USTs
- Former Service Station
- Former Railroad Tracks
- Storm Sewer System

N
W E
S

0 100 200
Feet

Figure 2-3
Site 21 Vicinity
Remedial Investigation and Feasibility Study
Addendum Report for Site 21
St. Juliens Creek Annex
Chesapeake, Virginia

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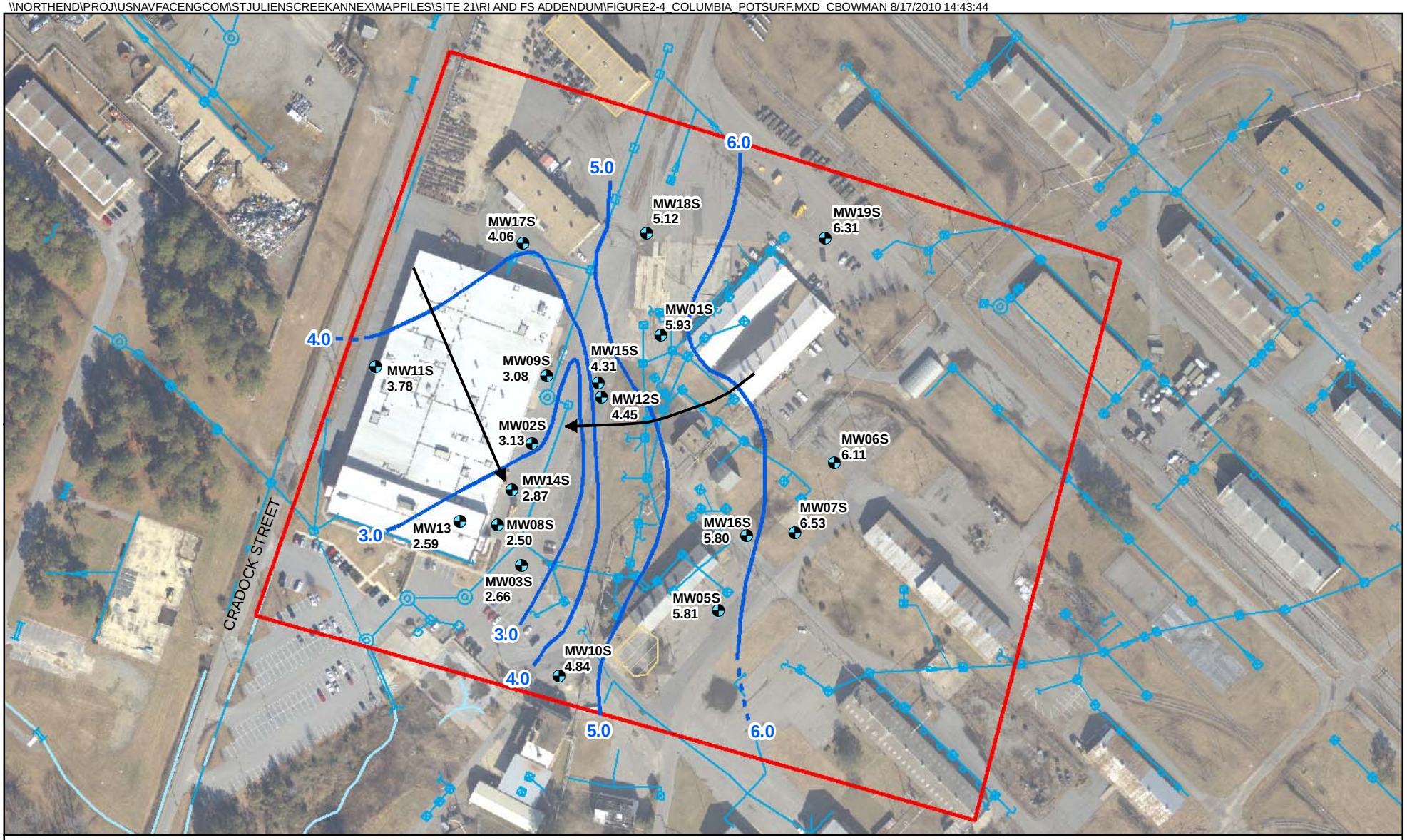
\\NORTHEND\PROJ\USNAVFACENGCOM\STJULIENSCREEKANNEX\MAPFILES\SITE 21\RI AND FS ADDENDUM\FIGURE2-4_COLUMBIA_POTSURF.MXD CBOWMAN 8/17/2010 14:43:44



Legend

- Site 21 Boundary
- Shallow Monitoring Well Location
- Estimated Groundwater Flow Direction
- Demolished Buildings
- Storm Sewer System
- Groundwater Surface Elevation Contours
- 3.28 Groundwater Elevation (feet above mean sea level)

N
W E
S

0 100 200
Feet

Figure 2-4
Columbia Aquifer Groundwater Surface Elevations
Remedial Investigation and Feasibility Study
Addendum Report for Site 21
St. Juliens Creek Annex
Chesapeake, Virginia

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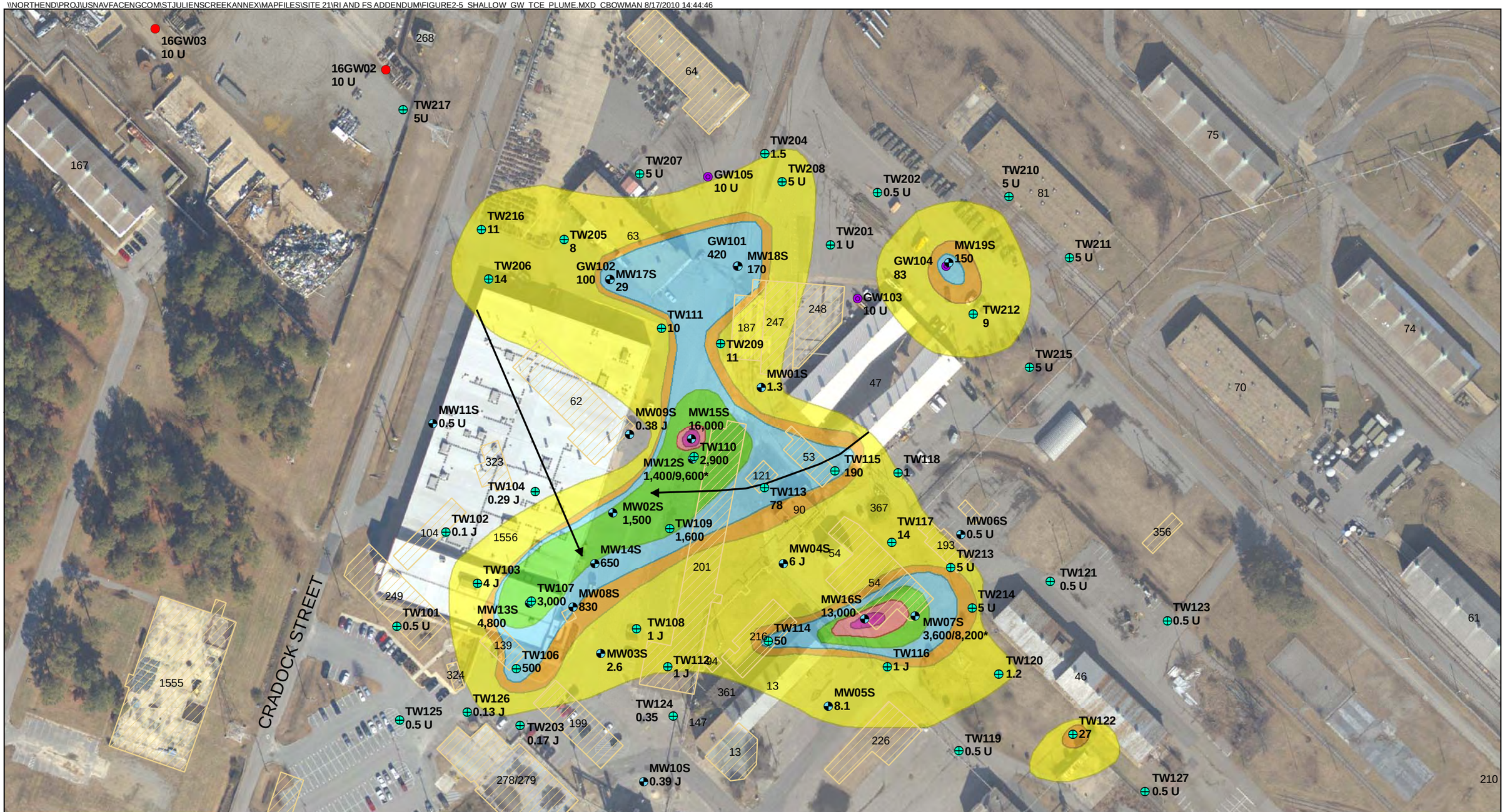
\\NORTHEND\PROJ\USNAVFACENGCOM\STJULIENSCREEKANNEX\MAPFILES\SITE 21\RI AND FS ADDENDUM\FIGURE2-5_SHALLOW_GW_TCE_PLUME.MXD CBOWMAN 8/17/2010 14:44:46



Legend

- Shallow Monitoring Well Location
- Temporary Monitoring Well Location
- Grab Groundwater Sample Location
- RRR Groundwater Sample Location
- Demolished Buildings
- Estimated Groundwater Flow Direction
- TCE Concentration 1 - 25 µg/L
- TCE Concentration 26 - 49 µg/L
- TCE Concentration 50 - 999 µg/L
- TCE Concentration 1,000 - 4,999 µg/L
- TCE Concentration 5,000 - 9,999 µg/L
- TCE Concentration >= 10,000 µg/L

TCE concentrations in µg/L
J - Analyte detected, result is estimated
U - No Detect
Concentrations shown are the most recent results, with the exception of MW09S, at which a previous result was used because the most recent detection limit was above the MCL.
* Concentrations from depth specific DPT GW sample collected at the bottom of the aquifer; not used to delineate the plume

N
W E
S

0 120 240
Feet

Figure 2-5
Shallow Groundwater TCE Plume
Results from Site 21 Remedial Investigation Report
Remedial Investigation and Feasibility Study
Addendum Report for Site 21
St. Juliens Creek Annex
Chesapeake, Virginia

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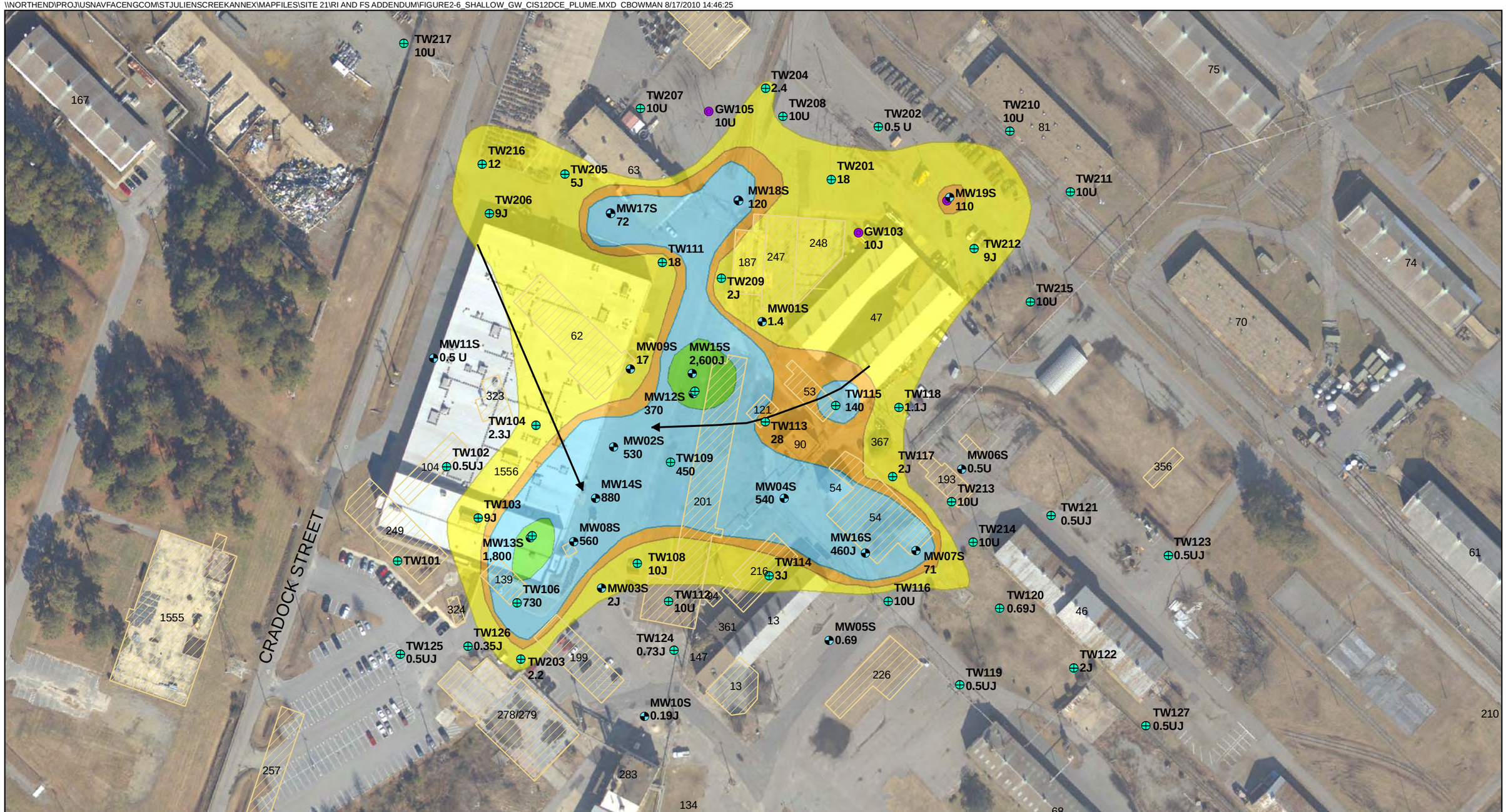

Legend

- Shallow Monitoring Well Location
- Temporary Monitoring Well Location
- Grab Groundwater Sample Location
- Demolished Building
- Estimated Groundwater Flow Direction
- cis-1,2-DCE Concentration 1 - 25 µg/L
- cis-1,2-DCE Concentration 26-49 µg/L
- cis-1,2-DCE Concentration 50-999 µg/L
- cis-1,2-DCE Concentration >=1,000 µg/L

All results are reported in µg/L.
J - Reported value is estimated
U - no detect
DCE - dichloroethene
Concentrations shown are the most recent results.

N
W E
S

0 120 240
Feet

Figure 2-6
Shallow Groundwater cis-1,2-DCE Plume
Results from Site 21 Remedial Investigation Report
Remedial Investigation and Feasibility Study
Addendum Report for Site 21
St. Juliens Creek Annex
Chesapeake, Virginia

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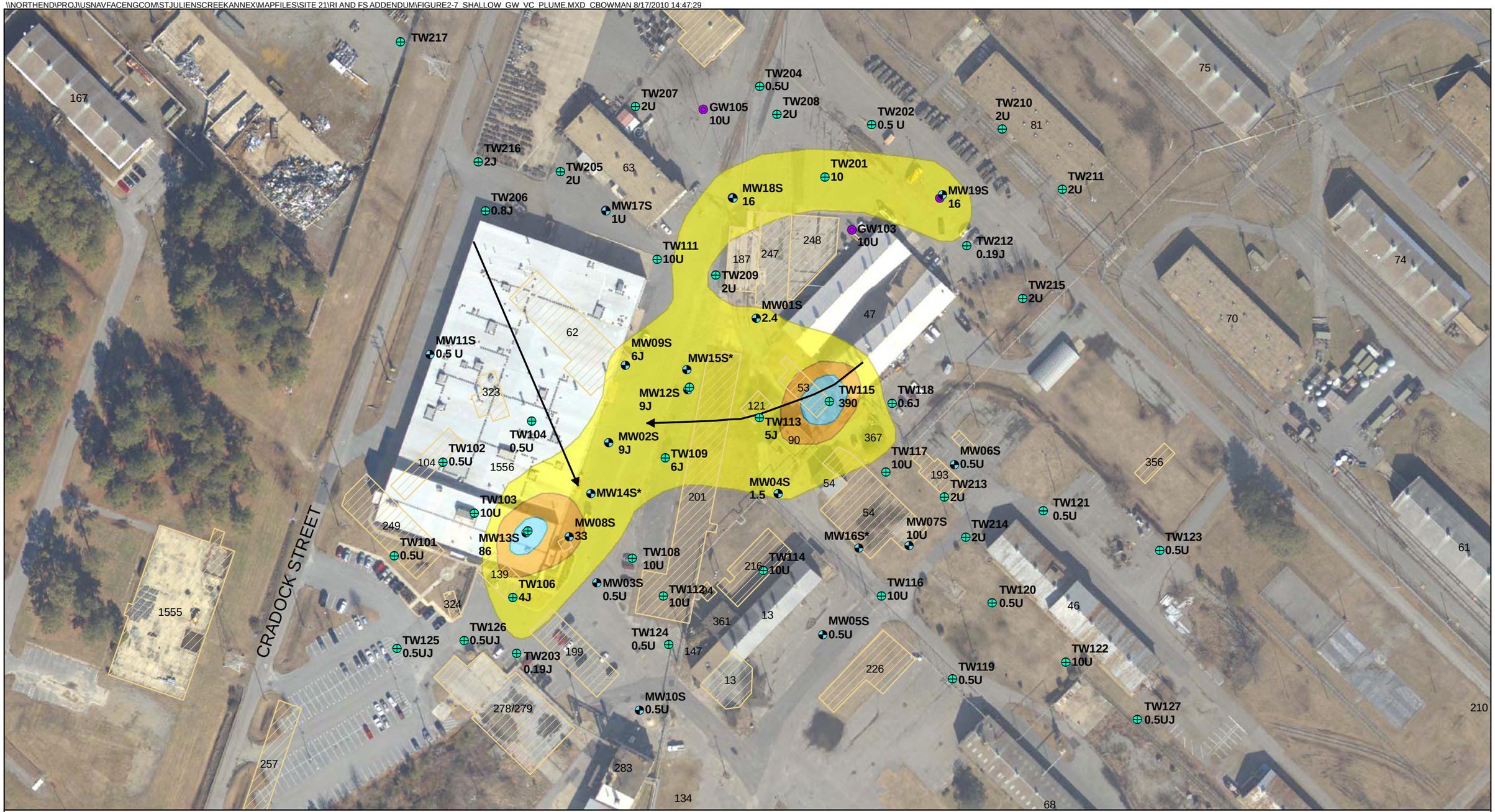
\\NORTHEND\PROJ\USNAVFACENGCOM\STJULIENSCREEKANNEX\MAPFILES\SITE 21\RI AND FS ADDENDUM\FIGURE2-7_SHALLOW_GW_VC_PLUME.MXD CBOWMAN 8/17/2010 14:47:29



Legend

- Shallow Monitoring Well Location
- Temporary Monitoring Well Location
- Grab Groundwater Sample Location
- Demolished Building
- Estimated Groundwater Flow Direction
- VC Concentration 1-25 µg/L
- VC Concentration 26-49 µg/L
- VC Concentration >= 50 µg/L

All results are reported in µg/L.
J - Reported value is estimated
U - No detect
VC - vinyl chloride
Concentrations shown are the most recent results, with the exception of MW04S, at which a previous result was used because the most recent detection limit was above the MCL.
*Results not used to delineate plume due to elevated detection limits from sample dilutions

N
W E
S

0 120 240
Feet

Figure 2-7
Shallow Groundwater VC Plume
Results from Site 21 Remedial Investigation Report
Remedial Investigation and Feasibility Study
Addendum Report for Site 21
St. Juliens Creek Annex
Chesapeake, Virginia

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SECTION 3

Field Investigation Activities

In accordance with the UFP-SAP (CH2M HILL, 2009a), the vapor intrusion investigation at Site 21 was planned for the occupied site buildings (47, 54, and 1556). Unoccupied buildings (Buildings 13, 46, 63, and 90) were not investigated; land use controls (LUCs) prohibiting change from their current use will be implemented to ensure that they remain unoccupied. Building 54 was occupied at the time of investigation planning and was intended for inclusion in the evaluation; however, the building was unoccupied at the time of the investigation and therefore removed from the investigation. Building 54 will be placed under a LUC prohibiting a change in use, and will be investigated if a change in its use is proposed.

The constituents of interest (COIs) for the Site 21 vapor intrusion investigation comprise those identified during the RI report HHRA as having the potential to pose indoor air risks as described in **Section 2.3.3** (TCE, VC, and Freon 12) and the potential break down products of TCE (1,1-DCE, 1,2-dichloroethane [1,2-DCA], trans-1,2-DCE, and cis-1,2-DCE) (CH2M HILL, 2008). Although potential risks were identified from exposure to benzene, the RI report concluded that the isolated benzene detection was related to the former UST and is not site-related or treated under CERCLA based on the petroleum exclusion; therefore, benzene was not carried through for further investigation.

As detailed on **Figure 3-1**, a phased approach was utilized for the vapor intrusion investigation at Site 21. The first phase of investigation consisted of the collection of subsurface data (subslab vapor or groundwater). The second phase of investigation, dependent on the results of the first phase, consisted of collection of the same data as in the first round to reflect temporal variation and the collection of additional data (e.g., indoor and outdoor air) to further assess the nature and extent of the contamination. Groundwater sampling was included in the decision tree as a contingency measure in the case that the water table was too shallow and subslab vapor samples could not be collected in either Building 1556 or 47. Groundwater level measurement collection was planned in order to confirm that the groundwater table was not in contact with the bottom of the building foundations, which would prevent subslab vapor sampling; however, due to a field oversight this was not performed during Phase I. The water table was below the building foundations because groundwater was not encountered during subslab vapor probe installation and samples were collected in Buildings 1556 and 47.

Because subslab vapor concentrations exceeded the residential and industrial subslab vapor project action limits (PALs) in the first phase of investigation (details in the following sections), a second phase of sampling was conducted to collect additional data. During Phase II subslab vapor, indoor air and ambient (outdoor) air samples were collected. A check of the groundwater elevation was performed prior to subslab vapor sampling in Phase II.

3.1 Phase I Field Event—August 2009

3.1.1 Building Surveys

Building surveys were completed approximately one week prior to Phase I sampling activities. Building characteristics and conditions pertinent to vapor intrusion were

documented. Such items included building use and occupancy, building dimensions, floor/foundation type and condition, typical operation of the heating, ventilation, and air conditioning (HVAC) system, and the presence of preferential pathways or chemicals. Completed building survey forms are presented in **Attachment A**.

As a result of the surveys, the building occupants were provided with a list of instructions regarding activities to be avoided and building preparation measures to be conducted one week prior to and during sample collection. Sample locations were selected during the building surveys based primarily on consideration of preferential vapor intrusion pathways and the frequency and duration of occupancy (**Section 3.1.3**). The information provided in the building survey forms was gathered during initial visits to the building and in some instances, was based only on rough estimates (e.g., dimensions were estimated, not measured). More complete and accurate information was gathered by the sampling team during other trips to the buildings during the Phase I or II sampling events. Building information was also obtained from building photographs. Representative photographs are presented in **Attachment B**.

3.1.2 Site Preparation

A utility clearance was performed at each of the eight proposed subslab vapor sample locations and at two proposed pressure monitoring locations in Buildings 1556 and 47 by Accumark of Ashland, Virginia. Ground-penetrating radar was employed to identify, mark, and differentiate between any underground utilities, conduit, rebar, post-tension cables, wire mesh, and other non-conductive targets within 2 by 2 feet around and 2 feet below the proposed subslab vapor probe drill points in the concrete slab. The utility clearance activities were overseen by a member of the field team.

3.1.3 Subslab Vapor Sampling

Subslab vapor sampling was planned for 5 locations in Building 1556 and two locations in Building 47. In general the subslab vapor sampling locations were selected to be biased towards the highest CVOC groundwater plume concentrations and any potential preferential pathways identified during the building survey, while staying at least 10 feet from any exterior walls.

There were some minor variations from the UFP-SAP (CH2M HILL, 2009a):

- Samples were not collected from temporary sampling probes; instead permanent sampling probes were installed because more than one round of subslab vapor sampling was planned to complete the vapor intrusion evaluation.
- The subslab vapor sample proposed in the UFP-SAP to be collected within the break room in Building 1556 was not collected. The sample location was selected based on suspected high frequency of access in that area of the building. However, the building survey indicated that the break room was not used as frequently as suspected and that the break room is located outside of the footprint of the known groundwater CVOC plume based on the RI delineation. Therefore, a different location was selected with concurrence of the Partnering Team in order to collect data in an area of the building more frequently accessed and located within the shallow groundwater CVOC footprint.

- Three subslab vapor samples were collected from Building 47 instead of the two planned in the UFP-SAP. Two sample locations were selected in areas of the building with the highest frequency of access (the break room and northern warehouse area). However, those locations did not appear to be within the footprint of the known shallow groundwater CVOC plume based on the RI delineation. Therefore, a third location was added with concurrence of the Partnering Team in order to assess conditions in the southern portion of the building closest to the known shallow groundwater CVOC plume boundary.

Subslab vapor probes were installed at five locations in Building 1556 and three locations in Building 47. The rationale for sampling location selection is provided in **Table 3-1**. One pressure monitoring probe was also installed in each building. The pressure monitoring probes were placed in central areas of the building; the probe location in Building 1556 was biased slightly southeast where the majority of the subslab vapor probes were located. The probe locations are shown on **Figure 3-2**.

Subslab vapor probes consisted of stainless steel Swagelok® gas tight fittings (a length of one-quarter-inch stainless steel tubing [not to extend below the slab], a probe union, a sampling union, and a probe cap). The probes were installed by drilling through the building foundation with a rotary hammer drill and securing the probe in place by emplacing Portland cement into the hole so that the probe was flush with the foundation. The cement was allowed to dry for 24 hours (**Attachment B—Photograph 1**). The end of the probes were within 2 inches of the bottom of the foundation. The Phase I subslab vapor probe installation information is provided in **Table 3-2**.

A helium leak check was performed before sample collection or pressure monitoring to ensure each probe was installed correctly (**Attachment B—Photograph 2**). Each probe was purged with a sampling manifold (consisting of stainless steel Swagelok® gas tight valves and fittings and Teflon tubing) and an air pump. Two liters (L) of subslab vapor were purged at 200 milliliters per minute (mL/min) into a Tedlar bag. The probes were equipped with a flow diverter valve to prohibit air from escaping the subsurface overnight. Subslab vapor samples were collected in 6-L SUMMA canisters equipped with flow controllers (**Attachment B—Photograph 3**). The flow controllers regulated the sample collection rate to 4.16 mL/min, which resulted in an approximate sample collection period of 24 hours. The SUMMA canisters were filled until the pressure gauge read between -2 and -10 inches of mercury (Hg), with the exception of the duplicate sample collected at SJS21-SV02 during Phase I. The collection of one duplicate subslab vapor sample was required for laboratory quality control (QC); however, an insufficient number of flow controllers were shipped with the SUMMA canisters to allow for the duplicate sample collection at a flow rate of 4.16 L per minute. One flow controller was utilized to collect two 6-L SUMMA canisters; therefore, the air flow was divided in half (**Attachment B—Photograph 4**). The final pressure on the two 6-L SUMMA canisters submitted to the lab was -19 inches Hg. The subslab vapor sampling field data sheets, which include the gas meter readings, for each building are provided in **Attachment C**. QC samples were collected in accordance with Worksheet #12-2 of the UFP-SAP (CH2M HILL, 2009a) (one duplicate subslab vapor sample was collected). The Phase I subslab vapor probe sampling information is provided in **Table 3-3**.

The subslab vapor samples were shipped under standard chain-of-custody procedures to Test America for VOC analysis by Method TO-15. The chain-of-custody forms are provided

in **Attachment D**. The subslab vapor samples were analyzed for a shortened list of CVOCs in accordance with the UFP-SAP (CH2M HILL, 2009a).

3.1.4 Pressure Differential Monitoring

Pressure differential monitoring was conducted in Buildings 1556 and 47. One pressure differential measurement was planned in each building up 7 days prior to subslab vapor sampling; however, the approach was modified to reflect more current technology practices at the time of the investigation to collect continuous pressure differential measurements over a period of one week. The modification from the UFP-SAP (CH2M HILL, 2009a) was approved by the SJCA Partnering Team during the August 2009 partnering meeting. Pressure differential monitoring began before (19 hours prior at Building 1556 and 5 hours prior at Building 47) the subslab vapor sample collection. The pressure differential monitoring was performed using an Omniguard 4 Differential Pressure Recorder. One dedicated pressure monitoring probe was installed in each building (Building 1556 and 47) at a location near the center of the building (See **Section 3.1.3** for installation procedures) (**Attachment B—Photograph 5**). An Omniguard 4 was connected to each of the pressure monitoring probes and left for approximately 7 days to record differential pressure readings every 15 minutes. A Barologger barometric pressure datalogger was also set up near each of the two buildings' pressure monitoring probes to record barometric pressure of the indoor environment once every 15 minutes.

3.2 Phase II Field Event—October 2009

3.2.1 Building Surveys

Building surveys were performed as described in **Section 3.1.1** to gather additional information and update the existing building survey.

3.2.2 Groundwater Level Measurements

Groundwater level measurements were collected from the site monitoring wells to confirm that the groundwater table was not in contact with the bottom of the building foundations, therefore preventing subslab vapor sampling. The groundwater levels are provided in **Table 3-4**.

3.2.3 Site Preparation

Accumark performed a utility clearance as described in **Section 3.1.2** for the re-installation of subslab vapor probe SJS21-SV03.

3.2.4 Subslab Vapor Sampling

The probe for location SV03 was damaged following sample collection during Phase I and therefore abandoned. As a result a replacement probe was installed following the method described in **Section 3.1.3**. The Phase II subslab vapor probe installation information is provided in **Table 3-5**.

Subslab vapor samples were collected from the existing subslab vapor probes in Buildings 1556 and 47 as described in **Section 3.1.3**. The Phase II subslab vapor probe sampling information is provided in **Table 3-6**.

3.2.5 Indoor Air Sampling

Indoor air sampling was planned for 5 locations in Building 1556 and 2 locations in Building 47; however, one additional indoor air sample was collected in Building 1556 and one in Building 47. The additional indoor air sample collected in Building 1556 was collected without a co-located subslab vapor sample. This sample was located near a potential preferential pathway: the metal grated catwalk approximately 2 feet wide and 10 feet long in the southwestern portion of the warehouse (**Attachment B—Photograph 6**). The additional indoor air sample collected in Building 47 was collected because of the subslab vapor sample that was added during Phase I and the recommendation of the Partnering Team to co-locate indoor air samples near the subslab vapor probes. The sample location rationale is provided in **Table 3-1**. The indoor air sample locations are shown on **Figure 3-2**.

The indoor air sample canisters were placed generally within 5 feet of the co-located subslab vapor probe (**Attachment B—Photograph 7**) and located 2 to 5 feet above the ground surface to capture the breathing zone. Indoor air samples were collected over an approximately 24-hour period in 6-L SUMMA canisters equipped with flow controllers. The SUMMA canisters were placed at the sampling location, turned on and left undisturbed for 24 hours. The SUMMA canisters were checked after 20 hours to ensure that the canister pressure did not reach zero. The indoor air field data sheets for each building are provided in **Attachment C**. QC samples were collected in accordance with Worksheet #12-2 of the UFP-SAP (CH2M HILL, 2009a) (one duplicate indoor air sample was collected). The Phase II indoor air sampling information is provided in **Table 3-7**.

The indoor air samples were shipped under standard chain-of-custody procedures to Test America for VOC analysis by Method TO-15. The chain-of-custody forms are provided in **Attachment D**. The indoor air samples were analyzed for the list of CVOCs identified in the UFP-SAP (CH2M HILL, 2009a).

3.2.6 Ambient Air Sampling

Ambient air samples were collected in conjunction with indoor air samples during Phase II. A total of three ambient air samples were collected; one near the air intakes on the east side of Building 1556, one near the exterior vent on the south side of Building 47 (**Attachment B—Photograph 8**), and one upwind of the site approximately 50 feet north of Building 47. The sample location rationale is provided in **Table 3-1**. The ambient air sample locations are shown on **Figure 3-2**. The ambient air samples were placed in secure locations and fastened to a fence or other structure with a chain and padlock. Ambient air samples were collected over an approximately 24-hour period in 6-L SUMMA canisters equipped with flow controllers. The SUMMA canisters were checked after 20 hours to ensure that the canister pressure did not read zero. The ambient air field data sheets are provided in **Attachment C**. QC samples were collected in accordance with Worksheet #12-2 of the UFP-SAP (CH2M HILL, 2009a) (one duplicate ambient air sample was collected). The Phase II ambient air sampling information is provided in **Table 3-7**.

The ambient air samples were shipped under standard chain-of-custody procedures to Test America for VOC analysis by Method TO-15. The chain-of-custody forms are provided in **Attachment D**. The ambient air samples were analyzed for a shortened list of CVOCs in accordance with the UFP-SAP (CH2M HILL, 2009a).

3.2.7 Pressure Differential Monitoring

Pressure differential monitoring was performed at Buildings 1556 and 47 before (20 hours prior at Building 1556 and 25 hours prior at Building 47), during, and after the subslab vapor sampling for a total of approximately 7 days as described in Section 3.1.4.

3.2.8 Weather Data Collection

Site-specific weather data was collected from one location (**Attachment B—Photograph 9**) before (2 hours prior), during, and after the subslab vapor sampling for a total of approximately 7 days. Collection of weather data was not included in the UFP-SAP (CH2M HILL, 2009a); however, it was added to reflect more current technology practices at the time of the investigation to support the multiple lines of evidence evaluation, if needed. The modification from the UFP-SAP was approved by the SJCA Partnering Team during the August 2009 partnering meeting. The weather data was collected using a Davis Vantage Pro Weather Station. The Davis Vantage Pro Weather Station recorded wind speed and direction, barometric pressure, temperature, humidity, and rainfall once every 15 minutes.

TABLE 3-1
Sample Location Rationale
Remedial Investigation and Feasibility Study Addendum Report for Site 21
St. Juliens Creek Annex
Chesapeake, Virginia

Subslab Vapor Samples

Building Number	Subslab Vapor Sample Location	Subslab Vapor Sample Location Rationale
1556	SJS21-PM1556	Near center of the building, but biased towards the majority of the soil vapor probes
	SJS21-SV01	Within a small office used daily, within the CVOC groundwater plume area
	SJS21-SV02	Within a small office used daily, the same office as MW13S is located, and within an area of the high concentration portion of the CVOC groundwater plume
	SJS21-SV03	Within a small office used daily, within the CVOC groundwater plume area
	SJS21-SV04	Within an open portion of the warehouse, just outside of the CVOC groundwater plume area
	SJS21-SV05	Within an open portion of the warehouse, within the CVOC groundwater plume area
47	SJS21-PM47	Near center of the building
	SJS21-SV06	Within the northern open portion of the building, as close to the northern portion of the CVOC groundwater plume as possible due to building conditions
	SJS21-SV07	Within the break room used daily
	SJS21-SV08	Within the southern portion of the building to address the CVOC groundwater plume underneath the building in that area

Indoor Air Samples

Building Number	Indoor Air Sample Location	Indoor Air Sample Location Rationale
1556	SJS21-IA01	Co-located with SJS21-SV01
	SJS21-IA02	Co-located with SJS21-SV02
	SJS21-IA03	Co-located with SJS21-SV03
	SJS21-IA04	Co-located with SJS21-SV04
	SJS21-IA05	Co-located with SJS21-SV05
	SJS21-IA09	Near a potential preferential pathway; the metal grated catwalk approximately 2 feet wide and 10 feet long in the southwestern portion of the warehouse
47	SJS21-IA06	Co-located with SJS21-SV06 and near the separation in the slab between the front and back of the warehouse space
	SJS21-IA07	Co-located with SJS21-SV07
	SJS21-IA08	Co-located with SJS21-SV08

Ambient Air Samples

Building Number	Ambient Air Sample Location	Ambient Air Sample Location Rationale
1556	SJS21-AA01	Near the air intakes on the east side of the building
47	SJS21-AA02	Near the exterior vent on the south side of the building
Upwind	SJS21-AA03	Upwind based on prevailing wind direction at time of investigation (NE)

TABLE 3-2
Phase I Subslab Vapor Probe Installation Information
Remedial Investigation and Feasibility Study Addendum Report for Site 21
St. Juliens Creek Annex
Chesapeake, Virginia

Building Number	Sample Location	Slab Depth (inches)	Probe Depth (inches)	Installation Date	Installation Time
1556	SJS21-PM1556	12	12	8/18/2009	10:17
	SJS21-SV01	12	12	8/17/2009	17:00
	SJS21-SV02	12	12	8/18/2009	9:05
	SJS21-SV03	12	12	8/18/2009	9:40
	SJS21-SV04	12	12	8/18/2009	11:20
	SJS21-SV05	12	12	8/18/2009	10:45
47	SJS21-PM47	10	11	8/18/2009	13:03
	SJS21-SV06	12	12	8/18/2009	12:35
	SJS21-SV07	10	11	8/18/2009	13:30
	SJS21-SV08	12	10	8/18/2009	13:50

TABLE 3-3
Phase I Subslab Vapor Probe Sampling Information
Remedial Investigation and Feasibility Study Addendum Report for Site 21
St. Juliens Creek Annex
Chesapeake, Virginia

Building Number	Sample Location	Sample ID	Leak Check (ppm He)	Total VOCs (ppm)	Canister ID	Flow Controller ID	Sample Start Date	Sample Start Time	Initial Canister Pressure (" Hg)	Sample End Date	Sample End Time	Final Canister Pressure (" Hg)
1556	SJS21-PM1556	SJS21-PM1556	0	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
	SJS21-SV01	SJS21-SV01-09C	0	3.8	66651	K270	8/20/2009	11:30	-30	8/21/2009	8:13	-1
	SJS21-SV02	SJS21-SV02-09C	0	4.3	6593	K452	8/20/2009	14:45	-30	8/21/2009	15:50	-19
		SJS21-SV02-09CP	0	4.3	93298	K452	8/20/2009	14:45	-32	8/21/2009	15:50	-19
	SJS21-SV03	SJS21-SV03-09C	150	4.3	93097	K257	8/20/2009	13:12	-30	8/21/2009	9:25	-10
	SJS21-SV04	SJS21-SV04-09C	50	6.1	11339	K224	8/20/2009	12:15	-32	8/21/2009	7:42	-2
	SJS21-SV05	SJS21-SV05-09C	0	4.7	6641	K249	8/20/2009	12:35	-30	8/21/2009	9:13	-10
47	SJS21-PM47	SJS21-PM47	1900	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
	SJS21-SV06	SJS21-SV06-09C	50	10.3	6582	K292	8/20/2009	15:20	-34	8/21/2009	11:40	-9.5
	SJS21-SV07	SJS21-SV07-09C	575	5.8	7508	K322	8/20/2009	16:00	-29.5	8/21/2009	11:34	-10
	SJS21-SV08	SJS21-SV08-09C	0	6.8	1326N	K100	8/20/2009	15:40	-30	8/21/2009	11:55	-10

Notes:
One duplicate subslab soil vapor sample was collected at sample location SJS21-SV02

TABLE 3-4
Phase II Groundwater Elevations
Remedial Investigation and Feasibility Study Addendum Report for Site 21
St. Juliens Creek Annex
Chesapeake, Virginia

Well ID	Depth to Water (ft. below top of casing)
MW01S	3.35
MW02S	5.42
MW03S	4.84
MW04S	1.96
MW05S	2.38
MW06S	2.05
MW07S	Unable to open
MW08S	6.01
MW09S	5.71
MW10S	3.89
MW12S	4.25
MW13S	6.8
MW14S	5.45
MW15S	4.36
MW16S	2.13
MW17S	4.52
MW18S	3.8
MW19S	1.75

TABLE 3-5
Phase II Subslab Vapor Probe Installation Information
Remedial Investigation and Feasibility Study Addendum Report for Site 21
St. Juliens Creek Annex
Chesapeake, Virginia

Building Number	Sample Location	Slab Depth (inches)	Probe Depth (inches)	Installation Date	Installation Time
1556	SJS21-SV03	14	12	10/22/2009	12:00

TABLE 3-6
Phase II Subslab Vapor Probe Sampling Information
Remedial Investigation and Feasibility Study Addendum Report for Site 21
St. Juliens Creek Annex
Chesapeake, Virginia

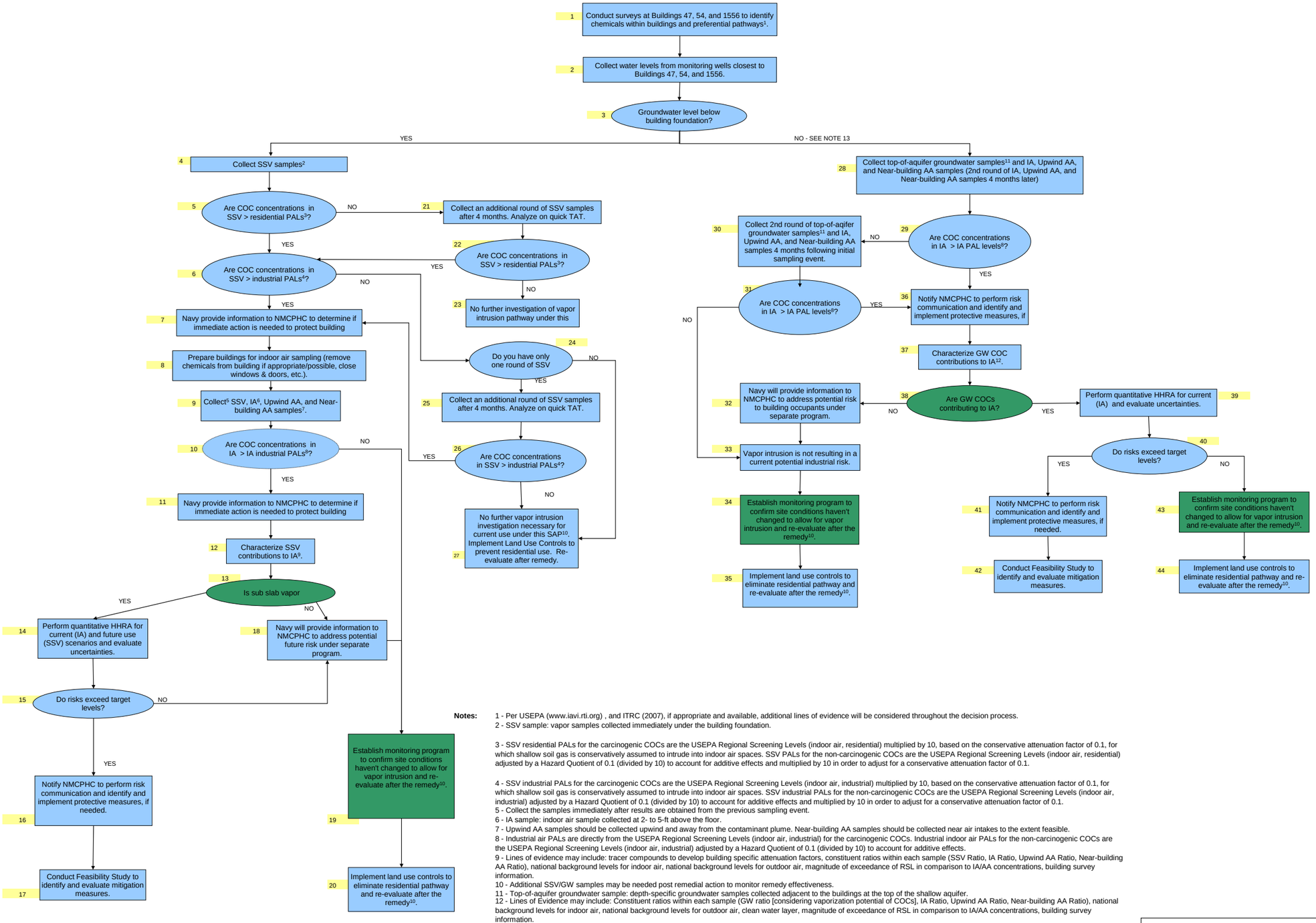
Building Number	Sample Location	Sample ID	Leak Check (ppm He)	Total VOCs (ppm)	Canister ID	Flow Controller ID	Sample Start Date	Sample Start Time	Initial Canister Pressure (" Hg)	Sample End Date	Sample End Time	Final Canister Pressure (" Hg)
1556	SJS21-PM1556	SJS21-PM1556	0	2.0	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
	SJS21-SV01	SJS21-SV01-09D	0	2.0	1399	K321	10/24/2009	12:32	-32	10/25/2009	9:50	-8.5
	SJS21-SV02	SJS21-SV02-09D	0	3	6641	K308	10/24/2009	12:50	-29	10/25/2009	6:41	-6.5
		SJS21-SV02-09DP	N/A	N/A	6602	K344	10/24/2009	12:50	-30	10/25/2009	10:03	-10
	SJS21-SV03	SJS21-SV03-09D	0	2.4	1324	K261	10/24/2009	13:08	-32	10/25/2009	10:13	-9.5
	SJS21-SV04	SJS21-SV04-09D	0	0.5	35288N	K213	10/24/2009	13:25	-32	10/25/2009	10:30	-10
	SJS21-PM47	SJS21-PM47	0	3.7	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
47	SJS21-SV05	SJS21-SV05-09D	0	9.2	6593	K231	10/24/2009	13:15	-30	10/25/2009	6:45	0
	SJS21-SV06	SJS21-SV06-09D	0	5.0	1319N	K303	10/24/2009	14:27	-28	10/25/2009	11:05	-9
	SJS21-SV07	SJS21-SV07-09D	0	2.6	04733	K214	10/24/2009	14:37	-29.5	10/25/2009	10:59	-7.5
	SJS21-SV08	SJS21-SV08-09D	75	6.6	6604	K466	10/24/2009	14:36	-29	10/25/2009	10:51	-10

Notes:
One duplicate subslab soil vapor sample was collected at sample location SJS21-SV02

TABLE 3-7
Phase II Indoor and Ambient Air Sampling Information
Remedial Investigation and Feasibility Study Addendum Report for Site 21
St. Juliens Creek Annex
Chesapeake, Virginia

Building Number	Sample Location	Sample ID	Canister ID	Flow Controller ID	Sample Start Date	Sample Start Time	Initial Canister Pressure (" Hg)	Sample End Date	Sample End Time	Final Canister Pressure (" Hg)
1556	SJS21-IA01	SJS21-IA01-09D	1328	K130	10/24/2009	12:39	-30	10/25/2009	9:50	-9.5
	SJS21-IA02	SJS21-IA02-09D	11339	K441	10/24/2009	12:56	-30	10/25/2009	10:00	-10
		SJS21-IA02-09DP	93187	K390	10/24/2009	12:56	-30	10/25/2009	10:00	-10
	SJS21-IA03	SJS21-IA03-09D	93279	K398	10/24/2009	13:06	-30	10/25/2009	10:13	-9.5
	SJS21-IA04	SJS21-IA04-09D	7508	K445	10/24/2009	13:23	-32	10/25/2009	6:46	-9
	SJS21-IA05	SJS21-IA05-09D	1122	K432	10/24/2009	13:14	-32	10/25/2009	10:35	-10
	SJS21-IA09	SJS21-IA09-09D	6519	K318	10/24/2009	13:00	-29.5	10/25/2009	10:09	-9
	SJS21-OA01	SJS21-OA01-09D	6348	K460	10/24/2009	15:17	-28.5	10/25/2009	12:55	-11.5
47	SJS21-IA06	SJS21-IA06-09D	S1495	K143	10/24/2009	14:30	-32	10/25/2009	11:20	-10
	SJS21-IA07	SJS21-IA07-09D	1138	K405	10/24/2009	14:40	-30	10/25/2009	7:34	-9
	SJS21-IA08	SJS21-IA08-09D	93001	K122	10/24/2009	14:33	-28	10/25/2009	10:57	-9.5
	SJS21-OA02	SJS21-OA02-09D	93289	K236	10/24/2009	15:06	-30	10/25/2009	12:22	-10
		SJS21-OA02-09DP	93121	K391	10/24/2009	15:06	-27	10/25/2009	10:50	-9
Upwind	SJS21-OA03	SJS21-OA03-09D	1350	K392	10/24/2009	15:10	-29.5	10/25/2009	11:31	-10

Notes:
One duplicate indoor air sample was collected at sample location SJS21-IA02
One duplicate ambient air sample was collected at sample location SJS21-OA02



Notes:

1 - Per USEPA (www.iavi.rti.org) , and ITRC (2007), if appropriate and available, additional lines of evidence will be considered throughout the decision process.
2 - SSV sample: vapor samples collected immediately under the building foundation.

3 - SSV residential PALs for the carcinogenic COCs are the USEPA Regional Screening Levels (indoor air, residential) multiplied by 10, based on the conservative attenuation factor of 0.1, for which shallow soil gas is conservatively assumed to intrude into indoor air spaces. SSV PALs for the non-carcinogenic COCs are the USEPA Regional Screening Levels (indoor air, residential) adjusted by a Hazard Quotient of 0.1 (divided by 10) to account for additive effects and multiplied by 10 in order to adjust for a conservative attenuation factor of 0.1.

4 - SSV industrial PALs for the carcinogenic COCs are the USEPA Regional Screening Levels (indoor air, industrial) multiplied by 10, based on the conservative attenuation factor of 0.1, for which shallow soil gas is conservatively assumed to intrude into indoor air spaces. SSV industrial PALs for the non-carcinogenic COCs are the USEPA Regional Screening Levels (indoor air, industrial) adjusted by a Hazard Quotient of 0.1 (divided by 10) to account for additive effects and multiplied by 10 in order to adjust for a conservative attenuation factor of 0.1.
5 - Collect the samples immediately after results are obtained from the previous sampling event.
6 - IA sample: indoor air sample collected at 2- to 5-ft above the floor.
7 - Upwind AA samples should be collected upwind and away from the contaminant plume. Near-building AA samples should be collected near air intakes to the extent feasible.
8 - Industrial air PALs are directly from the USEPA Regional Screening Levels (indoor air, industrial) for the carcinogenic COCs. Industrial indoor air PALs for the non-carcinogenic COCs are the USEPA Regional Screening Levels (indoor air, industrial) adjusted by a Hazard Quotient of 0.1 (divided by 10) to account for additive effects.
9 - Lines of evidence may include: tracer compounds to develop building specific attenuation factors, constituent ratios within each sample (SSV Ratio, IA Ratio, Upwind AA Ratio, Near-building AA Ratio), national background levels for indoor air, national background levels for outdoor air, magnitude of exceedance of RSL in comparison to IA/AA concentrations, building survey information.
10 - Additional SSV/GW samples may be needed post remedial action to monitor remedy effectiveness.
11 - Top-of-aquifer groundwater sample: depth-specific groundwater samples collected adjacent to the buildings at the top of the shallow aquifer.
12 - Lines of Evidence may include: Constituent ratios within each sample (GW ratio [considering vaporization potential of COCs], IA Ratio, Upwind AA Ratio, Near-building AA Ratio), national background levels for indoor air, national background levels for outdoor air, clean water layer, magnitude of exceedance of RSL in comparison to IA/AA concentrations, building survey information.
13 - If the groundwater table is not below the building foundation during the initial mobilization, repeat Box 3 after a 2-week wait. If the answer is still "No" on the second attempt, proceed to Box 28.

ACTION | GENERAL QUESTION | TEAM QUESTION/ INPUT POINT

Acronyms:

AA - ambient air
CERCLA - Comprehensive Response, Compensation, and Liability Act
COC - chemical of concern
HHRA - Human Health Risk Assessment
IA - indoor air
NMCPHC - Navy and Marine Corps Public Health Center
PAL - Project Action Limit
SAP - Sampling and Analysis Plan
SSV - sub slab vapor
TAT - turn-around-time

Figure 3-1
Site-Specific Decision Tree
RI and FS Addendum Report for Site 21
Chesapeake, Virginia
St. Juliens Creek Annex

\\NORTHEND\PROJ\USNAVFACENGCOM\STJULIENSCREEKANNEX\MAPFILES\SITE 21\RI AND FS ADDENDUM\FIGURE3-2_VI_SAMPLES.MXD CBOWMAN 8/17/2010 14:48:48

Legend

- Subslab Vapor Locations
- Pressure Monitoring Locations
- Ambient Air Location
- Indoor Air Location

N
W E
S

0 80 160
Feet

Figure 3-2
Site 21 Vapor Intrusion Sample Locations
Remedial Investigation and Feasibility Study
Addendum Report for Site 21
St. Juliens Creek Annex
Chesapeake, Virginia

CH2MHILL

SECTION 4

Data Evaluation

The subslab vapor, indoor air, and ambient air data collected during the Phase I and II sampling events were validated by an independent third-party validator. The subslab vapor and indoor air data were then compared to the PALs to evaluate the potential for vapor intrusion impacts. The ambient air data was used to evaluate the potential influence of ambient air on indoor air CVOC concentrations. The pressure differential data was used to evaluate the potential for vapor flow into the buildings. The weather data was used to support the selection of the upwind ambient air sample location.

4.1 Project Action Limits

The purpose of this section is to summarize the PALs used to evaluate the Phase I and Phase II data. As presented in the UFP-SAP (CH2M HILL, 2009a), the PALs are risk-based subslab vapor or indoor air screening levels based on the USEPA (2009) Regional Screening Levels (RSLs). The RSLs (USEPA, 2009) were derived using a 10^{-6} target excess lifetime cancer risk (ELCR) level and target non-cancer hazard quotient (HQ) of one.

Industrial subslab soil vapor and indoor air PALs were used to evaluate the current and/or future industrial scenario at Buildings 1556 and 47. This is appropriate because these buildings are currently used as office, work shop, and storage space. Residential subslab vapor PALs were used to evaluate the future hypothetical residential use scenario.

The samples collected during Phase I and II were analyzed for the Site 21 vapor intrusion investigation COIs identified in the UFP-SAP (CH2M HILL, 2009a): 1,2-DCE, cis-1,2-DCE, trans-1,2-DCE, 1,2-DCA, Freon 12, TCE, and VC.

Although 1,2-DCA and VC have non-cancer-based RSLs for industrial air in addition to the cancer-based RSLs, the non-cancer-based RSLs are greater than the cancer-based screening levels; 11,000 micrograms per cubic meter ($\mu g/m^3$) compared to 0.47 $\mu g/m^3$ for 1,2-DCA and 440 $\mu g/m^3$ compared to 2.8 for VC. Therefore, the cancer-based air RSLs were used to develop PALs for this evaluation.

Air RSLs do not exist for cis-1,2-DCE; therefore, detections of cis-1,2-DCE were evaluated qualitatively in the uncertainty evaluation.

4.1.1 Indoor Air Project Action Limits

The indoor air PALs were established based on the RSLs for industrial air. The industrial indoor air PALs for the carcinogenic COIs (TCE, VC, and 1,2-DCA) are the industrial air RSL values. The industrial indoor air PALs for the non-carcinogenic COIs (trans-1,2-DCE; 1,1-DCE; and Freon-12) are the industrial air RSLs adjusted to a HQ of 0.1 (divided by 10) to account for potential cumulative effects. The indoor air PALs are provided in **Table 4-1**.

4.1.2 Subslab Vapor Project Action Limits

The subslab vapor PALs were calculated by applying USEPA's default subslab vapor-to-indoor air attenuation factor (AF) of 0.1 to the industrial and residential air RSLs (USEPA, 2002). Shallow soil vapor (e.g., subslab vapor and exterior soil vapor measured at 5 feet or less from the base of the foundation) is conservatively assumed to intrude into indoor spaces with an AF of 0.1 (USEPA, 2002). The industrial and residential subslab vapor PALs for the non-carcinogenic COIs were adjusted to a HQ of 0.1 (divided by 10) to account for additive effects. The subslab vapor PALs are provided in **Table 4-1**.

4.2 Phase I Data Comparison to Project Action Limits

The subslab vapor analytical data from the samples collected during Phase I were compared to the industrial subslab vapor PALs to evaluate the current and future industrial scenario and compared to the residential subslab vapor PALs to evaluate a future residential scenario (**Table 4-2**).

TCE concentrations at four locations (SJS21-SV02, SJS21-SV06, SJS21-SV07 and SJS21-SV08), ranging from 140 to 1,400 µg/m^3, exceeded the industrial PAL (61 µg/m^3) (**Figure 4-1**). The TCE concentration detected at SJS21-SV03 (45 µg/m^3) exceeded the residential subslab vapor PAL (12 µg/m^3) but was less than the industrial PAL. There were no exceedances of subslab vapor PALs for the other COIs in any of the subslab vapor samples.

4.3 Phase II Data Comparison to Project Action Limits

4.3.1 Subslab Vapor Data

The subslab vapor analytical data were compared to the industrial subslab vapor PALs to evaluate the current and future industrial scenario and compared to the residential subslab vapor PALs to evaluate a future residential scenario (**Table 4-2**).

TCE concentrations at five locations (SJS21-SV02, SJS21-SV03, SJS21-SV06, SJS21-SV07 and SJS21-SV08), ranging from 72 to 1,400 µg/m^3, exceeded the industrial PAL (61 µg/m^3) (**Figure 4-1**). The TCE concentration detected at SJS21-SV01 (18 µg/m^3) exceeded the residential subslab vapor PAL (12 µg/m^3) but was less than the industrial subslab vapor PAL. There were no exceedances of subslab vapor PALs for the other COIs in any of the subslab vapor samples.

4.3.2 Indoor Air Data

The indoor air analytical data were compared to the industrial air PALs to evaluate the current industrial scenario (**Table 4-3**). With the exception of Freon-12 and TCE, COIs were not detected in the indoor air samples (**Figure 4-1**). The concentrations of Freon-12 and TCE did not exceed their industrial air PALs.

4.4 Ambient Air Data

Ambient air samples were collected during Phase II for comparison with indoor air concentrations to evaluate the potential influence of outside air on indoor air quality. The results of the ambient air samples are provided in **Table 4-4**.

Freon-12 was detected in all three of the ambient air samples, ranging in concentration from 2.9 µg/m^3 to 3 µg/m^3 (**Figure 4-1**). The concentrations of Freon-12 in ambient air were similar to those detected in indoor air (2.4 µg/m^3 to 3.2 µg/m^3), indicating the detections of Freon-12 in the indoor air samples are likely due to outdoor air intrusion.

TCE was detected in one of the three ambient air samples, SJS21-AA03, at a concentration of 0.53 µg/m^3. TCE concentrations in indoor air ranged from non-detect to 1 µg/m^3. Therefore, the contribution of outdoor air TCE concentrations to indoor air TCE concentrations is uncertain.

4.5 Quality Assurance/Quality Control

The project team performed field and reporting tasks in accordance with all CH2M HILL Standard Operating Procedures and Data Quality Objectives presented in the UFP-SAP (CH2M HILL, 2009a). The investigation was conducted in accordance with the schedule presented in the UFP-SAP. There were some minor deviations in regards to sample collection as listed in Sections 3.1.1 and 3.2.1. No corrective actions were required during this investigation. Details of the data quality evaluation are presented in **Attachment E**. The full data validation report from the third-party validator is presented in **Attachment F**.

All data collected in support of the Phase I and Phase II sampling events was found to be of exceptional quality. No data was rejected because of quality assurance/QC deficiencies and all data was deemed available for use by the project team.

4.6 Pressure Differential Monitoring Data

The pressure differences between the indoors and the subsurface can cause advective transport of subslab vapor into a building (ITRC, 2007). Vapor flows from the subsurface into a building under "negative" indoor to subslab pressure conditions, and air flows from the building into the subsurface under "positive" indoor to subslab pressure conditions. Fluctuations in pressure differences can correlate with fluctuations in barometric pressure; this can result in a building being negatively pressurized for portions of the day and positively pressurized for others.

The pressure differential monitoring at Building 1556 from both Phases I and II indicated that the building's pressure is neutral to positively-pressurized (highly variable pressure measurements typically greater than zero) based on an average of the max and min pressure difference (**Attachment G**). Although the building is neutral to positively-pressurized for the majority of the time, there are times when the building is negatively-pressurized; therefore, there is a potential, intermittent driver for the vapor intrusion pathway at Building 1556.

The pressure differential monitoring at Building 47 from Phase I indicated that the building is neutral to positively-pressurized. However, the pressure monitoring that was performed during Phase II indicated that the building is neutral to negatively-pressurized. During both events, the averaged pressure differences showed highly variable readings which could be the result of barometric pressure changes, HVAC system operation, or opening of doors. Therefore, because the building is positively pressurized at times and negatively

pressurized at others, there is a potential, intermittent driver for the vapor intrusion pathway at Building 47.

4.7 Weather Data

Weather data collected during Phase II of the investigation is compiled in **Attachment H**. Because a detailed "multiple lines of evidence" evaluation was not necessary for this investigation, this data is not evaluated within this report.

4.8 Uncertainty Evaluation

The following sections discuss some of the uncertainties associated with evaluating the vapor intrusion pathway.

4.8.1 Sample Quantitation Limits

Prior to sample analysis by TO-15, the pressure of the SUMMA canisters is measured. If the pressure is lower than the ideal working range (approximately -10 to -20 inches of mercury), the laboratory pressurizes the canister, thereby diluting the sample. The laboratory uses the initial and final canister pressures to calculate the dilution factor. This dilution raises the quantitation limits for all constituents.

Upon analysis, if one or more constituents are found over the analytical instrument's calibration curve, a dilution is performed to bring them within the acceptable range. The samples are then analyzed at the appropriate dilutions; however, secondary dilutions are sometimes necessary. Dilutions may be required based on the presence of either target or non-target constituents. Dilutions raise the quantitation limits for all constituents, including those which are reported as non-detect.

Although 1,2-DCA and VC were not detected in subslab vapor, their quantitation limits at some locations during Phase I (both at SJS21-SV02 and SJS21-SV06) and Phase II (both at SJS21-SV06 and 1,2-DCA at SJS21-SV08) sampling were slightly above the 1,2-DCA industrial subslab vapor and/or residential subslab vapor PALs (4.7 $\mu g/m^3$ and 0.94 $\mu g/m^3$) and the VC residential subslab vapor PAL (1.6 $\mu g/m^3$) which indicate uncertainty. TCE exceeded the industrial and residential PALs at each of those sample locations, which resulted in proceeding with the investigation based on the TCE exceedances. 1,2-DCA and VC were not detected in indoor air samples, all of which had quantitation limits less than their indoor air PALs. Therefore, it is unlikely that this uncertainty impacted the outcome of the investigation.

4.8.2 Duplicate Samples

Duplicate subslab vapor samples were collected at SJS21-SV02 during both Phase I and Phase II. One duplicate indoor air sample was collected at SJS21-IA02 and one duplicate ambient air sample was collected at SJS21-AA02. The maximum concentrations from the parent and field duplicate sample results were utilized for the purposes of this evaluation.

Similar results were reported for both the parent and duplicate samples with the exception of the results for TCE. TCE was detected in the duplicate sample collected at SJS21-SV02 during Phase II at a concentration of 1,400 $\mu g/m^3$ while the parent sample concentration was reported at 820 $\mu g/m^3$. These results were used to calculate a relative percent difference

(RPD) for TCE. The RPD was 52 percent, which is above the limit of 35 percent that was specified in the UFP-SAP (CH2M HILL, 2009a). These results were J-qualified as estimated by the third-party data validator. J-qualified results are usable as qualified. See the Data Quality Evaluation in **Attachment E** for further discussion of data usability.

4.8.3 Constituents without PALs

One constituent, cis-1,2-DCE, does not have PALs because a RSL (USEPA, 2009) does not exist for this constituent. Cis-1,2-DCE was detected at six of the eight subslab vapor sample locations; three of the five in Building 1556 and all three in Building 47. The detected concentrations of cis-1,2-DCE in subslab vapor ranged from 2 to 36 $\mu g/m^3$ in Building 1556 and from 17 to 95 $\mu g/m^3$ in Building 47. Cis-1,2-DCE was detected in one indoor air sample, SJS21-IA07 in Building 47. Cis-1,2-DCE would have to be either significantly more toxic or have a higher concentration than other VOCs in order for the detected concentrations of cis-1,2-DCE to be a risk driver for this vapor intrusion investigation. The toxicity of cis-1,2-DCE from the inhalation pathway is unknown, which is why cis-1,2-DCE does not have a RSL (USEPA, 2009). Higher concentrations of TCE were detected in each of the subslab vapor samples where cis-1,2-DCE was detected and a similar concentration of TCE was detected in the one indoor air sample where cis-1,2-DCE was detected. Therefore, although no PAL is available for cis-1,2-DCE, the detected concentrations of cis-1,2-DCE are unlikely to affect the conclusions of the vapor intrusion evaluation.

4.8.4 Empirical Attenuation Factors

Empirical subslab vapor-to-indoor air AFs were calculated for Buildings 1556 and 47 using the October 2009 analytical data. As discussed in *USEPA's Vapor Intrusion Database: Preliminary Evaluation of Attenuation Factors* (USEPA, 2008), AFs can be biased high by up to orders of magnitude if AFs are calculated without considering the subslab source strength. Empirical AFs for locations where the constituents had relatively high subslab vapor concentrations (e.g., greater than 100 times the minimum subslab reporting limits, based on professional judgment considering review of empirical subslab-to-indoor air AFs at other sites) were considered most representative of site conditions in this evaluation. In addition and per the vapor intrusion database technical support document (USEPA, 2008), empirical AFs were not calculated for VOCs that were not detected in the subslab vapor samples. It is assumed those chemical are either absent in the subsurface or present below levels of concern; however, those same chemicals can be present in the indoor air due to background sources, which would result in AFs that are biased artificially high. The empirical AFs that were calculated from the data are shown in **Table 4-5.** The empirical AFs for Building 1556 ranged from 0.0003 to 0.03. However, because the subslab vapor concentrations at SJS21-SV01 and SJS21-SV03 were relatively low, the empirical AF for SJS21-SV02 (0.0003) is considered to be most representative of actual site conditions. The empirical AFs for Building 47 ranged from 0.001 to 0.008. However, even these AFs may be biased artificially high because TCE was detected in one of the three ambient air samples at 0.53 $\mu g/m^3$; it is possible that a portion of the TCE detected in the indoor air samples is due to ambient air not vapor intrusion. Regardless of this, the empirical AF at Building 1556 is no greater than 0.03 and the empirical AF at Building 47 is no greater than 0.001. Therefore, the default generic AF of 0.1 was a minimum of one to two orders of magnitude more conservative than actual conditions.

4.8.5 Spatial Variability

Spatial variability in soil vapor is most commonly due to spatial variability in the vapor source. However, uneven bedding material, preferential pathways, and vadose zone sources may also cause spatial variability in subslab vapor. Spatial variability was observed in soil vapor at both buildings. TCE concentrations in October 2009 ranged from non-detect (reporting limit of 1.1 µg/m^3) to 1,400 µg/m^3 at Building 1556 and from 100 µg/m^3 to 1,300 µg/m^3 at Building 47. At both Buildings 1556 and 47, the spatial variability of TCE in soil vapor corresponds to the spatial variability of TCE in groundwater (**Figure 4-2**). However, even with the significant (greater than one order of magnitude) spatial variability in soil vapor observed at both buildings, the conclusions of this investigation would not change because they were based on the worst case concentrations.

4.8.6 Temporal Variability

Temporal variability in soil vapor may be caused by changes in weather conditions (short-term), seasons (long-term), and activities in the overlying buildings (ITRC, 2007). Eight subslab vapor samples were collected within Site 21 buildings during the summer season (August 2009) and again in the fall season (October 2009). There was less than one order of magnitude difference between the sample results in most of the subslab vapor samples between the two events; therefore it is unlikely that temporal variability could affect the conclusions of this investigation.

Temporal variability in indoor air could not be evaluated because there was only one round of indoor air sampling. However, temporal variability is expected to be greater in subslab vapor than indoor air (Folkes et al., 2009), and because significant temporal variability was not observed in subslab soil vapor, it is unlikely that significant temporal variability would occur in indoor air.

TABLE 4-1
Project Action Limits
Remedial Investigation and Feasibility Study Addendum Report for Site 21
St. Juliens Creek Annex
Chesapeake, Virginia

Constituent	Industrial Indoor Air PAL ($\mu g/m^3$)	Industrial Subslab Vapor PAL ($\mu g/m^3$)	Residential Subslab Vapor PAL ($\mu g/m^3$)
1,1-Dichloroethene (1,1-DCE)	88	880	210
1,2-Dichloroethane (1,2-DCA)	0.47	4.7	0.94
cis-1,2-Dichloroethene (cis-1,2-DCE)	NA	NA	NA
Dichlorodifluoromethane (Freon-12)	88	880	210
trans-1,2-Dichloroethene (trans-1,2-DCE)	26	260	63
Trichloroethene (TCE)	6.1	61	12
Vinyl Chloride	2.8	28	1.6

TABLE 4-2
Phase I and Phase II Subslab Vapor Results
Remedial Investigation and Feasibility Study Addendum Report for Site 21
St. Juliens Creek Annex
Chesapeake, Virginia

Station ID	**Residential Subslab Vapor PAL (µg/m^3)**	**Industrial Subslab Vapor PAL (µg/m^3)**	SJS21-SV01		SJS21-SV02					SJS21-SV03		SJS21-SV04		SJS21-SV05	
Sample ID			SJS21-SV01-09C	SJS21-SV01-09D	SJS21-SV02-09C	SJS21-SV02P-09C	SJS21-SV02-09D		SJS21-SV02P-09D	SJS21-SV03-09C	SJS21-SV03-09D	SJS21-SV04-09C	SJS21-SV04-09D	SJS21-SV05-09C	SJS21-SV05-09D
Sample Date			08/21/09	10/25/09	08/21/09	08/21/09	10/25/09		10/25/09	08/21/09	10/25/09	08/21/09	10/25/09	08/21/09	10/25/09
Chemical Name															
Volatile Organic Compounds (ug/m3)															
1,1-Dichloroethene	210	880	0.79 U	0.79 U	4.7 U	5.2 U	0.79	U	0.79 U	0.79 U	0.79 U	0.79 U	0.79 U	0.79 U	0.79 U
1,2-Dichloroethane	0.94	4.7	0.81 U	0.81 U	4.8 U	5.3 U	0.81	U	0.81 U	0.81 U	0.81 U	0.81 U	0.81 U	0.81 U	0.81 U
cis-1,2-Dichloroethene	NA	--	0.79 U	0.79 U	30	35	31		36	0.79 U	2	7.7	3.4	0.79 U	0.79 U
Dichlorodifluoromethane (Freon-12)	210	880	1.5	0.99 U	5.8 U	6.5 U	0.99	U	0.99 U	0.99 U	1.1	1.8	0.99 U	1.3	1.5
trans-1,2-Dichloroethene	63	260	0.2 U	0.79 U	9.1	10	7.2		8.3	0.98	1.6	3.1	2.4	0.79 U	0.79 U
Trichloroethene	12	61	0.58	**18**	**890**	**1,200**	**820**	**J**	**1,400 J**	**45**	**72**	11	9.7	4.5	1.1 U
Vinyl chloride	1.6	28	0.2 U	0.51 U	3 U	3.3 U	0.51	U	0.51 U	0.51 U	0.51 U	0.51 U	0.51 U	0.51 U	0.51 U

Notes:

Bold indicates exceedance of Residential PAL

Shading indicates exceedance of Industrial PAL

NA - Not analyzed

U - The material was analyzed for, but not detected

µg/m3 - microgram/cubic meter

TABLE 4-2
Phase I and Phase II Subslab Vapor Results
Remedial Investigation and Feasibility Study Addendum Report for Site 21
St. Juliens Creek Annex
Chesapeake, Virginia

Station ID	**Residential Subslab Vapor PAL (µg/m^3)**	**Industrial Subslab Vapor PAL (µg/m^3)**	SJS21-SV06		SJS21-SV07		SJS21-SV08	
Sample ID			SJS21-SV06-09C	SJS21-SV06-09D	SJS21-SV07-09C	SJS21-SV07-09D	SJS21-SV08-09C	SJS21-SV08-09D
Sample Date			08/21/09	10/25/09	08/21/09	10/25/09	08/21/09	40111
Chemical Name								
Volatile Organic Compounds (ug/m3)								
1,1-Dichloroethene	210	880	7.9 U	11 U	0.79 U	0.79 U	0.79 U	1.6 U
1,2-Dichloroethane	0.94	4.7	8.1 U	12 U	0.81 U	0.81 U	0.81 U	1.6 U
cis-1,2-Dichloroethene	NA	--	95	76	23	17	57	43
Dichlorodifluoromethane (Freon-12)	210	880	9.9 U	14 U	2.1	2.6	1.9	2.9
trans-1,2-Dichloroethene	63	260	7.9 U	11 U	1.2	0.78	0.79 U	1.6 U
Trichloroethene	12	61	**1400**	**1300**	**140**	**100**	**270**	**380**
Vinyl chloride	1.6	28	5.1 U	7.3 U	0.51 U	0.51 U	0.51 U	1 U

Notes:

Bold indicates exceedance of Residential PAL
Shading indicates exceedance of Industrial PAL
NA - Not analyzed
U - The material was analyzed for, but not detected
µg/m3 - microgram/cubic meter

TABLE 4-3
Phase II Indoor Air Results
Remedial Investigation and Feasibility Study Addendum Report for Site 21
St. Juliens Creek Annex
Chesapeake, Virginia

Station ID	**Industrial Air PAL (µg/m3)**	SJS21-IA01	SJS21-IA02		SJS21-IA03	SJS21-IA04	SJS21-IA05	SJS21-IA06	SJS21-IA07	SJS21-IA08	SJS21-IA09
Sample ID		SJS21-IA01-09D	SJS21-IA02-09D	SJS21-IA02P-09D	SJS21-IA03-09D	SJS21-IA04-09D	SJS21-IA05-09D	SJS21-IA06-09D	SJS21-IA07-09D	SJS21-IA08-09D	SJS21-IA09-09D
Sample Date		10/25/09	10/25/09	10/25/09	10/25/09	10/25/09	10/25/09	10/25/09	10/25/09	10/25/09	10/25/09
Chemical Name											
Volatile Organic Compounds (ug/m3)											
1,1-Dichloroethene	88	0.32 U	0.32 U	0.32 U	0.32 U	0.32 U	0.32 U	0.32 U	0.32 U	0.32 U	0.32 U
1,2-Dichloroethane	0.47	0.32 U	0.32 U	0.32 U	0.32 U	0.32 U	0.32 U	0.32 U	0.32 U	0.32 U	0.32 U
cis-1,2-Dichloroethene	--	0.32 U	0.32 U	0.32 U	0.32 U	0.32 U	0.32 U	0.32 U	0.76	0.32 U	0.32 U
Dichlorodifluoromethane (Freon-12)	88	2.7	2.5	2.5	2.5	2.4	2.7	2.5	2.5	2.5	3.2
trans-1,2-Dichloroethene	26	0.32 U	0.32 U	0.32 U	0.32 U	0.32 U	0.32 U	0.32 U	0.32 U	0.32 U	0.32 U
Trichloroethene	6.1	0.49	0.43	0.5	0.21 U	0.21 U	0.21 U	1	0.75	0.61	0.21 U
Vinyl chloride	2.8	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U

Notes:

Shading indicates exceedance of Industrial Air PAL

U - The material was analyzed for, but not detected

µg/m3 - microgram/cubic meter

TABLE 4-4
Phase II Ambient Air Results
Remedial Investigation and Feasibility Study Addendum Report for Site 21
St. Juliens Creek Annex
Chesapeake, Virginia

Station ID	SJS21-AA01	SJS21-AA02		SJS21-AA03
Sample ID	SJS21-AA01-09D	SJS21-AA02-09D	SJS21-AA02P-09D	SJS21-AA03-09D
Sample Date	10/25/09	10/25/09	10/25/09	10/25/09
Chemical Name				
Volatile Organic Compounds (ug/m3)				
1,1-Dichloroethene	0.32 U	0.32 U	0.32 U	0.32 U
1,2-Dichloroethane	0.32 U	0.32 U	0.32 U	0.32 U
cis-1,2-Dichloroethene	0.32 U	0.32 U	0.32 U	0.32 U
Dichlorodifluoromethane (Freon-12)	3	3	2.9	2.9
trans-1,2-Dichloroethene	0.32 U	0.32 U	0.32 U	0.32 U
Trichloroethene	0.21 U	0.21 U	0.21 U	0.53
Vinyl chloride	0.2 U	0.2 U	0.2 U	0.2 U

Notes:
U - The material was analyzed for, but not detected
µg/m3 - microgram/cubic meter

TABLE 4-5
Subslab Vapor to Indoor Air Empirical Attenuation Factors
Remedial Investigation and Feasibility Study Addendum Report for Site 21
St. Juliens Creek Annex
Chesapeake, Virginia

Building Number	Subslab Vapor Probe	TCE Concentrations		Attenuation Factor
		Indoor Air ($\mu g/m^3$)	Subslab Vapor ($\mu g/m^3$)	
1556	SJS21-SV01	0.49	18	0.03*
	SJS21-SV02	0.43	1400	0.0003
	SJS21-SV03	0.5	72	0.007*
	SJS21-SV04	ND	9.7	N/A
	SJS21-SV05	ND	ND	N/A
47	SJS21-SV06	1	1300	0.001
	SJS21-SV07	0.75	100	0.008
	SJS21-SV08	0.61	380	0.002

ND - Non-detect

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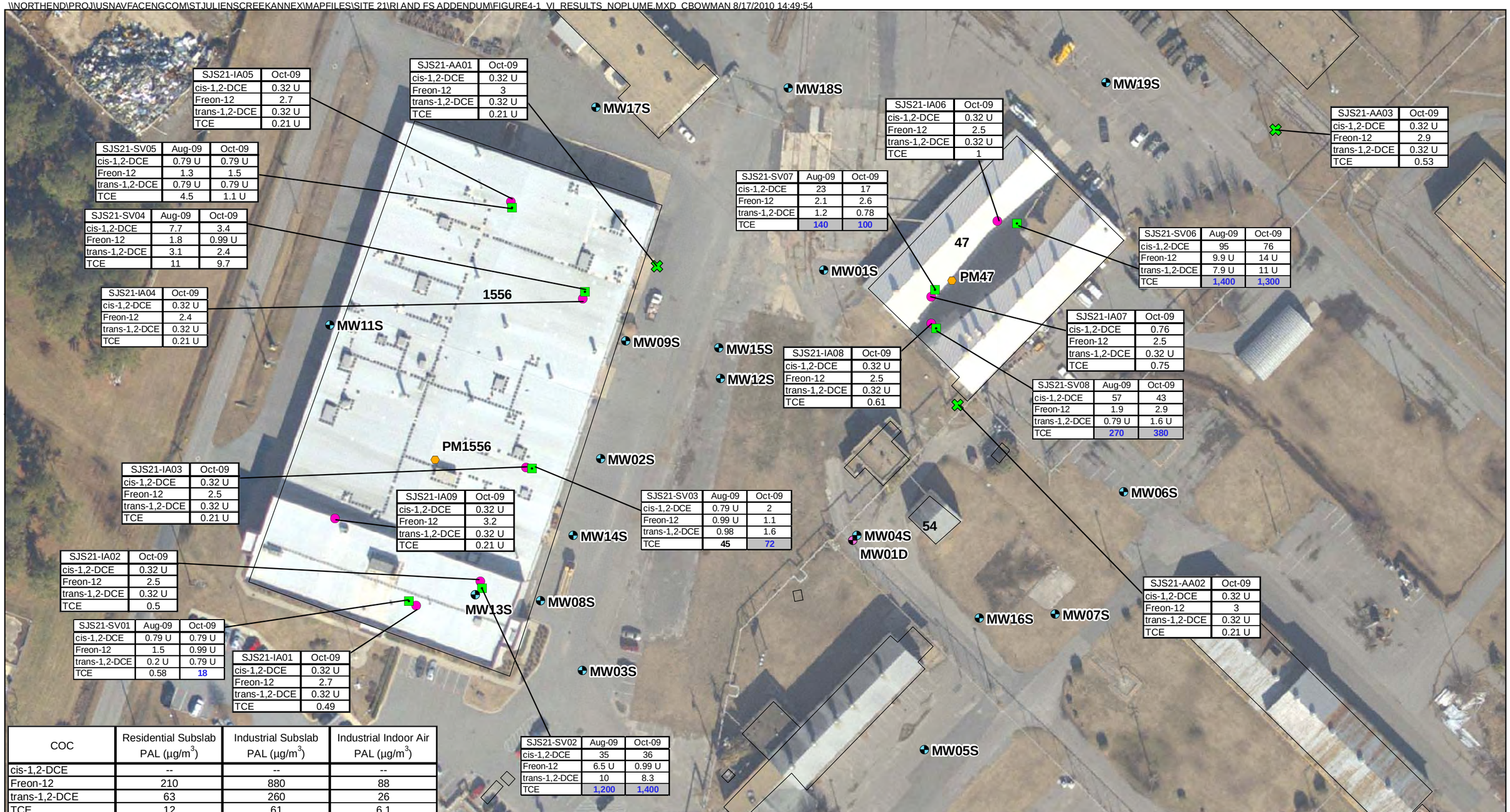

SJS21-IA05	Oct-09
cis-1,2-DCE	0.32 U
Freon-12	2.7
trans-1,2-DCE	0.32 U
TCE	0.21 U

SJS21-AA01	Oct-09
cis-1,2-DCE	0.32 U
Freon-12	3
trans-1,2-DCE	0.32 U
TCE	0.21 U

SJS21-IA06	Oct-09
cis-1,2-DCE	0.32 U
Freon-12	2.5
trans-1,2-DCE	0.32 U
TCE	1

SJS21-AA03	Oct-09
cis-1,2-DCE	0.32 U
Freon-12	2.9
trans-1,2-DCE	0.32 U
TCE	0.53

SJS21-SV05	Aug-09	Oct-09
cis-1,2-DCE	0.79 U	0.79 U
Freon-12	1.3	1.5
trans-1,2-DCE	0.79 U	0.79 U
TCE	4.5	1.1 U

SJS21-SV07	Aug-09	Oct-09
cis-1,2-DCE	23	17
Freon-12	2.1	2.6
trans-1,2-DCE	1.2	0.78
TCE	**140**	**100**

SJS21-SV06	Aug-09	Oct-09
cis-1,2-DCE	95	76
Freon-12	9.9 U	14 U
trans-1,2-DCE	7.9 U	11 U
TCE	**1,400**	**1,300**

SJS21-SV04	Aug-09	Oct-09
cis-1,2-DCE	7.7	3.4
Freon-12	1.8	0.99 U
trans-1,2-DCE	3.1	2.4
TCE	11	9.7

SJS21-IA04	Oct-09
cis-1,2-DCE	0.32 U
Freon-12	2.4
trans-1,2-DCE	0.32 U
TCE	0.21 U

SJS21-IA07	Oct-09
cis-1,2-DCE	0.76
Freon-12	2.5
trans-1,2-DCE	0.32 U
TCE	0.75

SJS21-IA08	Oct-09
cis-1,2-DCE	0.32 U
Freon-12	2.5
trans-1,2-DCE	0.32 U
TCE	0.61

SJS21-SV08	Aug-09	Oct-09
cis-1,2-DCE	57	43
Freon-12	1.9	2.9
trans-1,2-DCE	0.79 U	1.6 U
TCE	**270**	**380**

SJS21-IA03	Oct-09
cis-1,2-DCE	0.32 U
Freon-12	2.5
trans-1,2-DCE	0.32 U
TCE	0.21 U

SJS21-IA09	Oct-09
cis-1,2-DCE	0.32 U
Freon-12	3.2
trans-1,2-DCE	0.32 U
TCE	0.21 U

SJS21-SV03	Aug-09	Oct-09
cis-1,2-DCE	0.79 U	2
Freon-12	0.99 U	1.1
trans-1,2-DCE	0.98	1.6
TCE	**45**	**72**

SJS21-IA02	Oct-09
cis-1,2-DCE	0.32 U
Freon-12	2.5
trans-1,2-DCE	0.32 U
TCE	0.5

SJS21-AA02	Oct-09
cis-1,2-DCE	0.32 U
Freon-12	3
trans-1,2-DCE	0.32 U
TCE	0.21 U

SJS21-SV01	Aug-09	Oct-09
cis-1,2-DCE	0.79 U	0.79 U
Freon-12	1.5	0.99 U
trans-1,2-DCE	0.2 U	0.79 U
TCE	0.58	**18**

SJS21-IA01	Oct-09
cis-1,2-DCE	0.32 U
Freon-12	2.7
trans-1,2-DCE	0.32 U
TCE	0.49

SJS21-SV02	Aug-09	Oct-09
cis-1,2-DCE	35	36
Freon-12	6.5 U	0.99 U
trans-1,2-DCE	10	8.3
TCE	**1,200**	**1,400**

COC	Residential Subslab PAL (µg/m^3)	Industrial Subslab PAL (µg/m^3)	Industrial Indoor Air PAL (µg/m^3)
cis-1,2-DCE	--	--	--
Freon-12	210	880	88
trans-1,2-DCE	63	260	26
TCE	12	61	6.1

Legend

- Subslab Vapor Location
- Pressure Monitoring Location
- Shallow Monitoring Well
- Deep Monitoring Well
- Ambient Air Location
- Indoor Air Location

Blue values represent Residential PAL exceedances

Shaded values represent Industrial PAL exceedances

Results are shown in µg/m^3

U - non-detect

Note: Prevalent wind direction during October 2009 sampling was from the northeast to the southwest

N
W E
S

0 80 160
Feet

Figure 4-1
Site 21 Vapor Intrusion Evaluation Results
Remedial Investigation and Feasibility Study
Addendum Report for Site 21
St. Juliens Creek Annex
Chesapeake, Virginia

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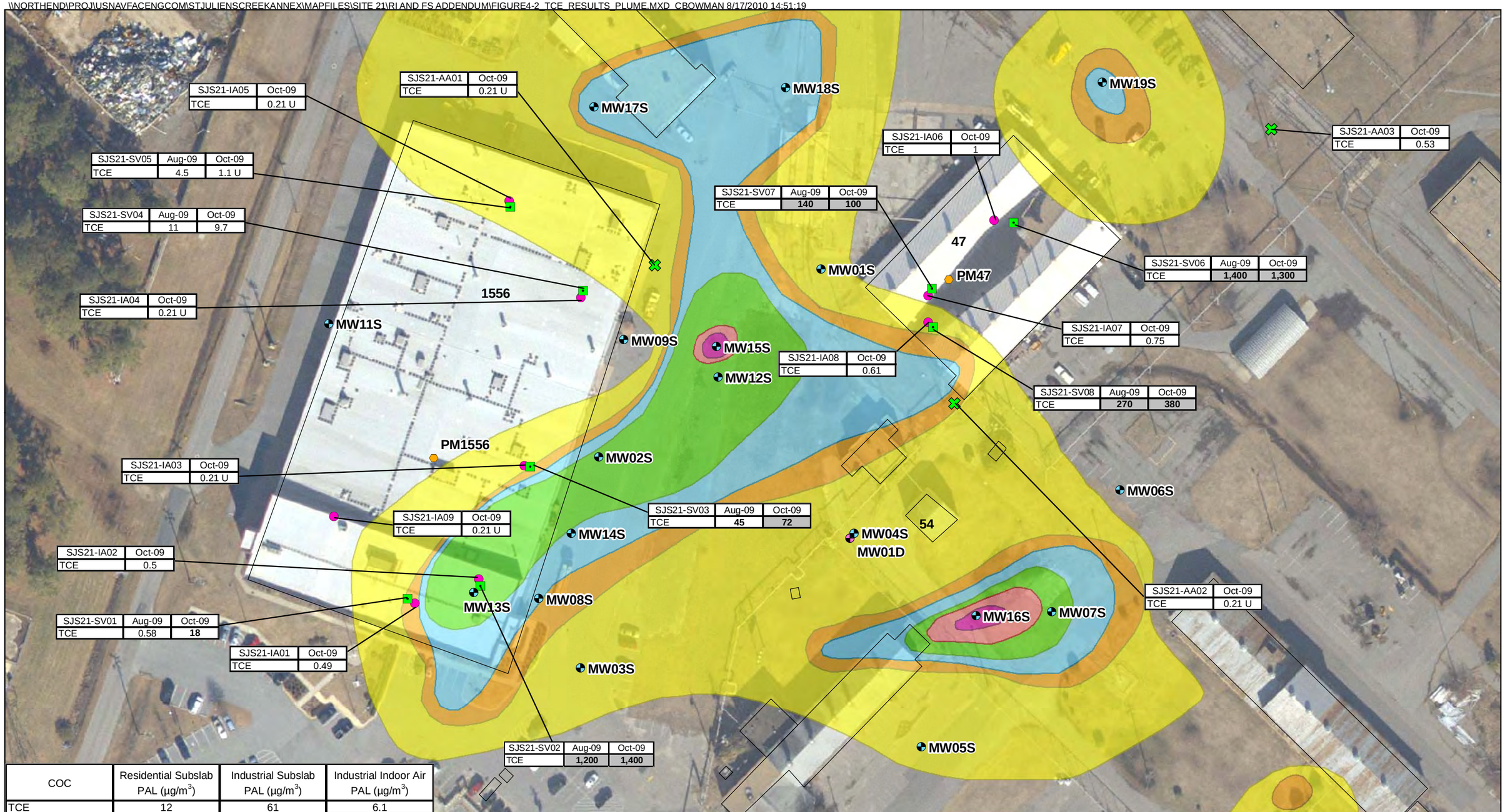
\\NORTHEND\PROJ\USNAVFACENGCOM\STJULIENSCREEKANNEX\MAPFILES\SITE 21\RI AND FS ADDENDUM\FIGURE4-2_TCE_RESULTS_PLUME.MXD CBOWMAN 8/17/2010 14:51:19



COC	Residential Subslab PAL (µg/m^3)	Industrial Subslab PAL (µg/m^3)	Industrial Indoor Air PAL (µg/m^3)
TCE	12	61	6.1

Legend

- TCE Concentration 1 - 25
- TCE Concentration 26 - 49
- TCE Concentration 50 - 999
- TCE Concentration 1,000 - 4,999
- TCE Concentration 5,000 - 9,999
- TCE Concentration >= 10,000
- Subslab Vapor Location
- Pressure Monitoring Location
- Shallow Monitoring Well
- Deep Monitoring Well
- Ambient Air Location
- Indoor Air Location

Bold values represent Residential PAL exceedances

Shaded values represent Industrial PAL exceedances

Results are shown in µg/m^3

U - non-detect

Note: Prevalent wind direction during October 2009 sampling was from the northeast to the southwest

N W E S

0 80 160 Feet

Figure 4-2
Site 21 Vapor Intrusion Evaluation TCE Results
Remedial Investigation and Feasibility Study
Addendum Report for Site 21
St. Juliens Creek Annex
Chesapeake, Virginia

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SECTION 5

Human Health Risk Assessment

This section presents an update to the vapor intrusion evaluation included in the RI report HHRA (CH2M HILL, 2008). The 2008 HHRA indicated that the potential existed for unacceptable risks to workers in current on-site buildings and to residential receptors in hypothetical future residential housing based on a conservative vapor intrusion evaluation performed using shallow groundwater data to model anticipated VOC concentrations in indoor air of site buildings. Based on the conservative vapor intrusion evaluation, the RI report recommended further evaluation of the vapor intrusion pathway for the site. Therefore, this update evaluates the potential human health risks associated with the vapor intrusion pathway using concentrations of COIs in indoor air and subslab vapor samples that were collected in August and October 2009.

Potential current receptors were identified as occupants (i.e., industrial workers) of Building 1556 and Building 47. Potential future receptors were identified as industrial workers in Buildings 1556 and 47, industrial workers in future hypothetical industrial buildings, and hypothetical residents in future hypothetical residential structures.

5.1 Methodology

The HHRA evaluation consists of a risk-based screening (comparison of subslab vapor data to risk-based criteria [i.e., PALs]) and a risk ratio evaluation. For the evaluation of current industrial exposures, indoor air results were compared to industrial air PALs. For the evaluation of future industrial workers and hypothetical residential exposures, subslab vapor results were compared to industrial and residential subslab vapor PALs, respectively. If the detected concentrations in subslab vapor or indoor air exceeded the screening value, a corresponding risk level was calculated using the following equation:

$$\text{corresponding risk level} = \frac{\text{concentration} \times \text{acceptable risk level}}{\text{PAL}}$$

In the equation, the concentration is represnted by the minimum or maximum detected concentration (to calculate the potential range of the corresponding risk level). For the evaluation of industrial worker risks, the PAL is the industrial subslab vapor PAL. For the evaluation of hypothetical residential risks, the residential subslab PAL is used. The acceptable risk level in the equation is 10^{-6}. For carcinogenic constituents, the USEPA (1991) acceptable ELCR range is 10^{-6} to 10^{-4}. ELCR estimates above this range (i.e., greater than 10^{-4}) generally require further action (e.g., remediation, mitigation). ELCRs within the acceptable range may require further action (e.g., further evaluation, additional investigation) based on site conditions. For non-carcinogenic compounds, non-cancer HQs of 1.0 or less were considered acceptable (i.e., no adverse health effects). Concentrations above the USEPA (1991) non-cancer target HQ of 1.0 may require further action. The corresponding risk level calculated using the equation above was compared to the ELCR acceptable range or non-cancer target HQ.

5.2 Current Risk

A comparison of the subslab vapor data and indoor air data to the appropriate risk-based screening levels (i.e., PAL) are provided in **Tables 4-2** and **4-3**. As seen in **Table 4-2**, the concentration of TCE in subslab vapor exceeded the industrial subslab vapor PAL (61 µg/m^3) at two locations in Building 1556 and three locations in Building 47. No other constituents exceeded the industrial subslab vapor PALs. As seen in **Table 4-3**, no detected constituents exceeded the industrial air PALs. Therefore, although TCE concentrations in the subslab vapor samples exceeded industrial subslab vapor PAL, the fact that TCE concentrations in indoor air did not exceed the industrial air PAL indicate that TCE does not present a current unacceptable vapor intrusion risk.

5.3 Future Risk

If the future condition of the slabs for Building 1556 or 47 changes or new structures are constructed at the site, the attenuation rate for contaminants in the subslab into indoor air may change, and COI concentrations in subslab vapor may present a future vapor intrusion risk. Therefore, because TCE concentrations in subslab vapor exceeded the industrial subslab vapor PAL at some sample locations, risk ratios were calculated for two future industrial worker scenarios and a future hypothetical residential scenario. Risk ratios were not calculated for the other COIs because their concentrations in subslab vapor did not exceed the industrial or residential subslab vapor PALs.

5.3.1 Industrial Worker—Current Buildings

For the future industrial workers scenario for the current buildings, risk ratios were calculated separately for Building 1556 and Building 47. Potential future risks for TCE at Building 1556 range from 2×10^{-7} to 2×10^{-5} (**Table 5-1**). Potential future risks for TCE at Building 47 range from 2×10^{-6} to 2×10^{-5} (**Table 5-2**). The detections of TCE were below or within the acceptable ELCR range of 10^{-6} to 10^{-4} for the future industrial worker scenario. The risk ratio evaluation demonstrates that there are no unacceptable risks to future industrial workers at either Buildings 1556 and 47.

5.3.2 Industrial Worker—Future Hypothetical Buildings

For the future industrial workers scenario for a future hypothetical building, risk ratios were calculated using the minimum and maximum concentrations detected site-wide. The potential future risks for TCE at a hypothetical future industrial building range from 2×10^{-7} to 2×10^{-5} (**Table 5-3**). The detections of TCE were below or within the acceptable ELCR range of 10^{-6} to 10^{-4} for the future industrial worker scenario at a hypothetical future industrial building. The risk ratio evaluation demonstrates that there are no unacceptable risks to future industrial workers in future hypothetical industrial buildings at the site.

5.3.3 Resident—Future Hypothetical Residential Structure

For the future residential scenario, it was assumed that a residential structure(s) could be constructed at the site. Concentrations of TCE in subslab vapor exceeded the residential subslab vapor PAL (12 µg/m^3) at three locations in Building 1556 and three locations in Building 47. Using the minimum and maximum concentrations detected site-wide, risks for TCE at the site range from 8×10^{-7} to 1×10^{-4} (**Table 5-4**). The risk ratio based on the

maximum detected subslab vapor result is equal to the upper end of the acceptable ELCR range (i.e., 10^{-4}). The remaining detections of TCE are below or within the acceptable ELCR range of 10^{-6} to 10^{-4} for the future residential scenario. Because the risk ratio for the hypothetical resident is equal to the upper end of the acceptable ELCR range (i.e., 10^{-4}), there is the potential for unacceptable risks to future residential receptors if future residential structures are constructed at the site.

5.4 HHRA Uncertainties

Uncertainties associated with the risk evaluation include conservative PAL values, the assumption that subslab vapor concentrations will remain constant over time, and the assumption that the data collected are representative of site-wide conditions.

As discussed previously, the subslab vapor PALs were calculated by applying USEPA's default subslab vapor-to-indoor air AF of 0.1. As discussed in Section 4.5.4, site-specific AFs were calculated for Buildings 1556 and 47. The empirical AF at Building 1556 is no greater than 0.03, but more likely closer to 0.0003, and the empirical AF at Building 47 is no greater than 0.001. Therefore, the default generic AF of 0.1 was a minimum of one to two orders of magnitude more conservative than actual conditions. This indicates that the risk ratios calculated above may be overestimated by a minimum of one to two orders of magnitude.

For this evaluation, it was assumed future subslab soil vapor concentrations were equivalent to current concentrations. This may result in a short-term underestimation or long-term overestimation of risks. As selected in an Interim Record of Decision, an interim remedial action for shallow groundwater is currently being planned to reduce the concentrations of CVOCs in shallow groundwater (NAVFAC, 2009). During the interim remedial action, the concentrations of TCE daughter products (cis-1,2-DCE and VC) may temporarily increase resulting in a potential underestimation of short-term risks during the interim remedial action. Ultimately, the concentrations of all of the CVOCs will decrease after the interim remedial action, resulting in a potential overestimation of long-term risks.

The data used in this evaluation was collected within the footprint of two site buildings. The assumption that these data points represent site-wide conditions may result in an underestimation or overestimation of site risks.

5.5 HHRA Summary

The risk evaluation demonstrates that there are currently no unacceptable risks to industrial workers at either Buildings 47 or 1556. With the uncertainties noted, there are also no unacceptable risks to future industrial workers in future hypothetical industrial buildings at the site. There is the potential for unacceptable risks to future residential receptors if future residential structures are constructed at the site. Based on the uncertainties associated with the future industrial hypothetical building scenario and potential risk associated with the residential scenario, LUCs should be implemented to prevent construction of additional structures at the site without further evaluation.

TABLE 5-1
Risk Ratio - Subslab Soil Vapor at Building 1556 - Future Industrial Worker
Remedial Investigation and Feasibility Study Addendum Report for Site 21
St. Juliens Creek Annex
Chesapeake, Virginia

Analyte	Detection Frequency	Detected Concentration (Qualifier)	Sample Location of Detected Concentration	Industrial Subslab Vapor PAL (µg/m^3)	Acceptable Risk Level	Corresponding Hazard Index[a]	Corresponding Cancer Risk[b]	Target Organ
Minimum Detected Concentration (µg/m^3)								
Trichloroethene	4 / 5	9.7E+00	SJS21-SV04	6.1E+01	1.E-06	NA	2E-07	NA
Maximum Detected Concentration (µg/m^3)								
Trichloroethene	4 / 5	1.4E+03	SJS21-SV02	6.1E+01	1.E-06	NA	2E-05	NA

Notes:
[a] Corresponding Hazard Index equals maximum detected concentration divided by the PAL divided by the acceptable risk level.
[b] Corresponding Cancer Risk equals maximum detected concentration divided by the PAL divided by the acceptable risk level.
HI = Hazard Index
µg/m^3 = micrograms per cubic meter
NA = Not available/not applicable.

TABLE 5-2
Risk Ratio - Subslab Soil Vapor at Building 47 - Future Industrial Worker
Remedial Investigation and Feasibility Study Addendum Report for Site 21
St.Juliens Creek Annex
Chesapeake, Virginia

Analyte	Detection Frequency	Detected Concentration (Qualifier)	Sample Location of Detected Concentration	Industrial Subslab Vapor PAL (µg/m^3)	Acceptable Risk Level	Corresponding Hazard Index[a]	Corresponding Cancer Risk[b]	Target Organ
Minimum Detected Concentration (µg/m^3)								
Trichloroethene	3 / 3	1.0E+02	SJS21-SV07	6.1E+01	1.E-06	NA	2E-06	NA
Maximum Detected Concentration (µg/m^3)								
Trichloroethene	3 / 3	1.3E+03	SJS21-SV06	6.1E+01	1.E-06	NA	2E-05	NA

Notes:

[a] Corresponding Hazard Index equals maximum detected concentration divided by the PAL divided by the acceptable risk level.

[b] Corresponding Cancer Risk equals maximum detected concentration divided by the PAL divided by the acceptable risk level.

HI = Hazard Index

µg/m^3 = micrograms per cubic meter

NA = Not available/not applicable.

TABLE 5-3
Risk Ratio - Subslab Soil Vapor for Site 21 - Future Industrial Worker[1]
Remedial Investigation and Feasibility Study Addendum Report for Site 21
St. Juliens Creek Annex
Chesapeake, Virginia

Analyte	Detection Frequency	Detected Concentration (Qualifier)	Sample Location of Detected Concentration	Industrial Subslab Vapor PAL (µg/m^3)	Acceptable Risk Level	Corresponding Hazard Index[a]	Corresponding Cancer Risk[b]	Target Organ
Minimum Detected Concentration (µg/m^3)								
Trichloroethene	7 / 8	9.7E+00	SJS21-SV04	6.1E+01	1.E-06	NA	2E-07	NA
Maximum Detected Concentration (µg/m^3)								
Trichloroethene	7 / 8	1.4E+03	SJS21-SV02	6.1E+01	1.E-06	NA	2E-05	NA

Notes:

[1] Scenario assumes an industrial building is constructed at the site in the future. Therefore, data set consists of subslab data collected at both Building 1556 and 47.

[a] Corresponding Hazard Index equals maximum detected concentration divided by the PAL divided by the acceptable risk level.

[b] Corresponding Cancer Risk equals maximum detected concentration divided by the PAL divided by the acceptable risk level.

HI = Hazard Index

µg/m^3 = micrograms per cubic meter

NA = Not available/not applicable.

TABLE 5-4
Risk Ratio - Subslab Soil Vapor for Site 21 - Future Resident[1]
Remedial Investigation and Feasibility Study Addendum Report for Site 21
St. Juliens Creek Annex
Chesapeake, Virginia

Analyte	Detection Frequency	Detected Concentration (Qualifier)	Sample Location of Detected Concentration	Residential Subslab Vapor PAL (µg/m^3)	Acceptable Risk Level	Corresponding Hazard Index[a]	Corresponding Cancer Risk[b]	Target Organ
Minimum Detected Concentration (µg/m^3)								
Trichloroethene	7 / 8	9.7E+00	SJS21-SV04	1.2E+01	1.E-06	NA	8E-07	NA
Maximum Detected Concentration (µg/m^3)								
Trichloroethene	7 / 8	1.4E+03	SJS21-SV02	1.2E+01	1.E-06	NA	1E-04	NA

Notes:

[1] Scenario assumes a residential building is constructed at the site in the future. Therefore, data set consists of subslab data collected at both Building 1556 and 47.

[a] Corresponding Hazard Index equals maximum detected concentration divided by the PAL divided by the acceptable risk level.

[b] Corresponding Cancer Risk equals maximum detected concentration divided by the PAL divided by the acceptable risk level.

HI = Hazard Index

µg/m^3 = micrograms per cubic meter

NA = Not available/not applicable.

SECTION 6

Conceptual Site Model

6.1 Building 1556 Conceptual Site Model Update

Building 1556 is the FISC Norfolk ILS, where approximately 50 employees work 8 hours per day, five days per week. A 3-D conceptual site model (CSM) of Building 1556 is provided as **Figure 6-1**.The majority of the building is one-story, though a second story is present at the southern end of the building. It is constructed of commercial fiberglass and corrugated metal walls and a corrugated metal roof. The building is approximately 245 feet wide, 410 feet long, and 50 feet tall. The building is constructed on a 10-inch thick concrete slab on-grade foundation. According to Bill Landon of NAVFAC Mid-Atlantic, construction of similar facilities typically includes 6 to 12 inches of gravel overlain by a vapor barrier such as 50-mil polyethylene sheeting and/or a sheet of polyvinyl chloride (Landon, 2010). NAVFAC drawings for Building 1556 indicate 4 inches minimum porous fill and vapor barrier (Whitman, Requardt, and Associates, 1992; NAVFAC drawing no. 4224388). The slab is mostly in good condition, but cracks and damage were observed in some locations. Multiple expansion joints are present in the larger warehouse portion of the building. There are several additional preferential pathways (drains, conduits, etc.) in the building slab. An elevator, including a subslab pit and shaft, connecting the first and second stories is located on the south end of the building. However, it is not believed to present a significant preferential pathway for vapor intrusion because a NAVFAC drawing (Whitman, Requardt, and Associates, 1992; NAVFAC drawing no. 4224374) indicates that a waterproof layer is present on all sides of the pit, COC concentrations are low in the area, and, according to Bill Landon (2010), based on a discussion with the Building 1556 elevator inspector, groundwater has not been observed in the pit during any of the regularly conducted elevator inspections. There is one large bay door on the north end of the building and three large bay doors on the east side of the building. All or some of these bay doors remain open during working hours to allow propane- and electric-powered forklifts access. Roof-top air handling units provide ventilation for the building.

The northern and southeastern portions of Building 1556 overlay the shallow groundwater CVOC plume. TCE concentrations in groundwater are estimated to be between 1 and 25 µg/L under the northern portion of the building, and between 1 and 4,999 µg/L under the southeastern portion of the building (**Figure 4-2**). The highest concentrations of TCE in shallow groundwater within 100 feet of Building 1556 occur at SJS21-MW15S (16,000 µg/L) approximately 100 feet to the east and at SJS21-MW13S (4,800 µg/L) in the southeast corner of the building footprint. CVOCs were detected in subslab vapor samples, suggesting that the CVOCs in shallow groundwater are likely the source of the contamination in the soil vapor. TCE is the only COI detected in the subslab vapor at concentrations that exceeds the industrial subslab vapor PALs. These exceedances are located in the southeastern portion of the building where TCE groundwater concentrations are highest (**Figure 4-2**); therefore, the TCE subslab vapor concentrations at Building 1556 appear to correlate with the shallow groundwater CVOC plume concentrations. COIs were not detected in indoor air at

concentrations that exceed the industrial indoor air PALs. Therefore, vapor intrusion is not currently causing an unacceptable risk to building occupants.

6.2 Building 47 Conceptual Site Model Update

Building 47 is primarily used for storage and some mechanical work. Approximately 20 employees access the building and work 1 to 2 hours per day inside. A 3-D CSM of Building 47 is provided as **Figure 6-2**. Building 47 is a single-story building constructed of corrugated steel exterior walls over wood. The interior consists mainly of open bay storage with several interior offices constructed of drywall. The roof has several leaks and two non-functioning fans positioned over the central portion of the building. The building is approximately 125 feet wide, 180 feet long, and 30 feet tall. The building is constructed on an approximately 10-inch thick concrete slab on-grade foundation. The slab is mostly in good condition but cracks and damage were observed in some locations. Multiple expansion joints are present, mostly in good condition. The building contains 1 large bay door on the north side, 2 large bay doors on the east side, and 1 bay door on the west side of the building. All or some of these bay doors remain open during working hours. There is no functioning central air handling system in the building.

The northern and southern portions of Building 47 are estimated to be within the footprint of the shallow groundwater CVOC plume. TCE concentrations in groundwater are estimated to be between 1 and 25 µg/L under the northern portion of the building, and between 1 and 999 µg/L under the southeastern portion of the building (**Figure 4-2**). The highest concentration of TCE in shallow groundwater within 100 ft of Building 47 occurs at SJS21-MW19S (150 µg/L) approximately 90 feet to the north. CVOCs were detected in subslab vapor samples, suggesting that the CVOCs in shallow groundwater are likely the source of the contamination in the soil vapor. TCE is the only COI detected in the subslab vapor at concentrations that exceeded the industrial subslab vapor PALs (**Figure 4-2**). The TCE subslab vapor concentrations at Building 47 appear to generally correlate with the shallow groundwater CVOC plume concentrations in the southwest portion of the building. However, the highest TCE subslab vapor concentration at Building 47 was detected in the northcentral portion of the building where the TCE plume is not believed to be present. This may be a result of horizontal migration from north of the building, where the presence of an asphalt parking lot may trap the vapors in the subsurface. COIs were not detected in indoor air at concentrations that exceed the industrial indoor air PALs. Therefore, vapor intrusion is not currently causing an unacceptable risk to building occupants.

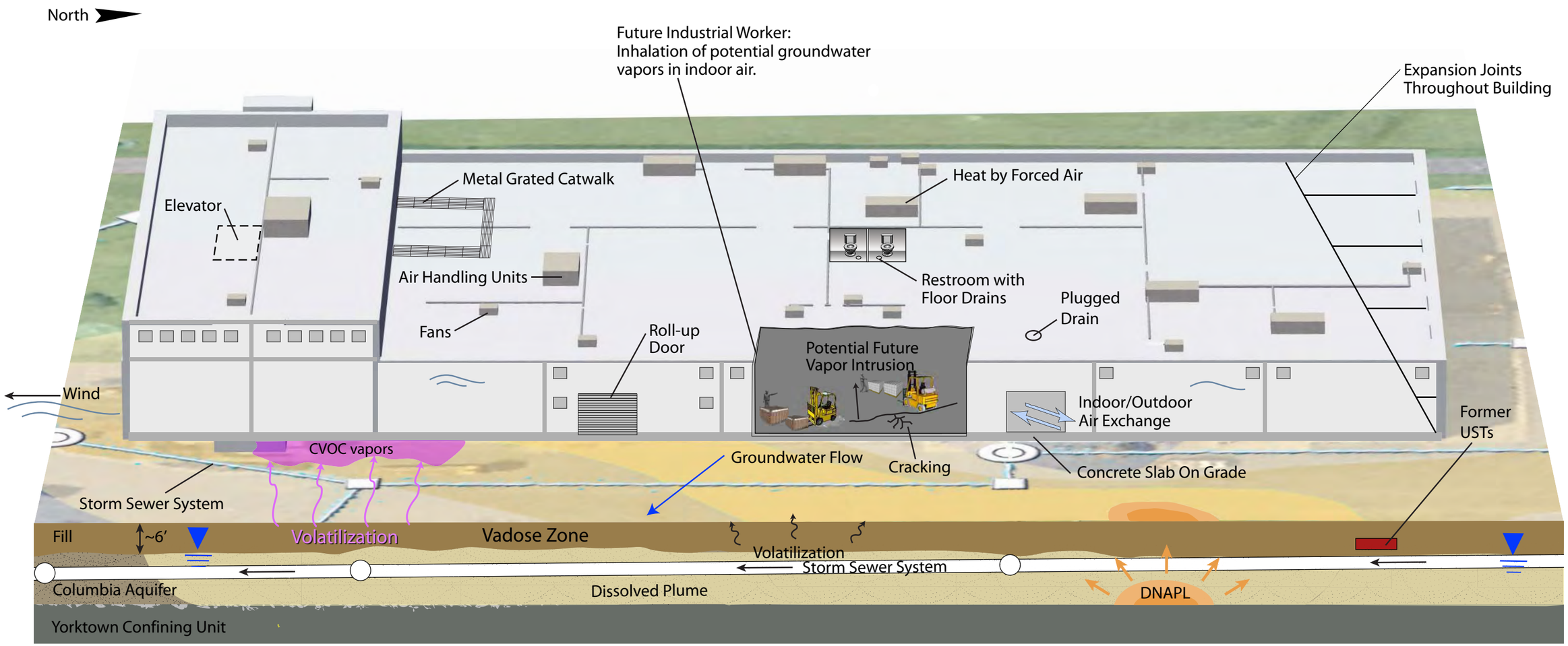

FIGURE 6-1
Building 1556 Vapor Intrusion Conceptual Site Model
Site 21 RI and FS Addendum Report
St. Juliens Creek Annex
Chesapeake, Virginia

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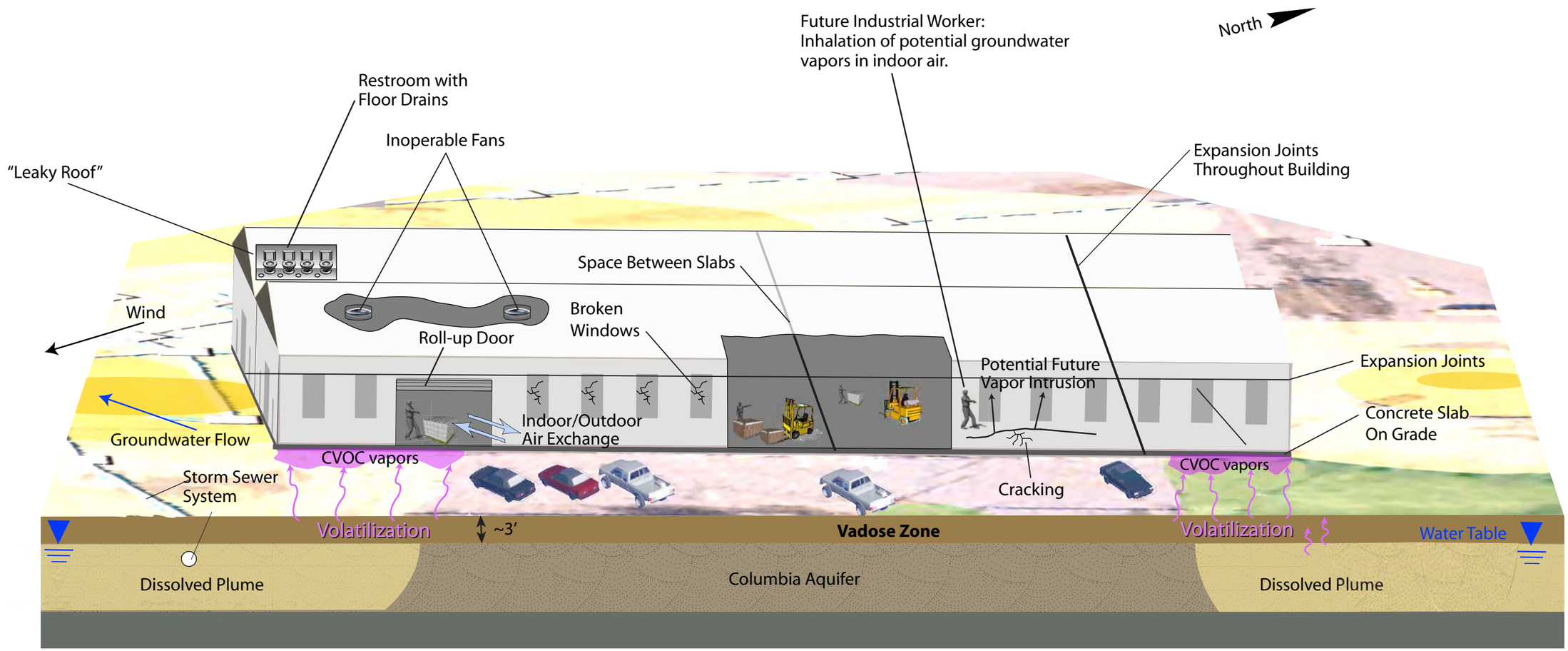

FIGURE 6-2
Building 47 Vapor Intrusion Conceptual Site Model
Site 21 RI and FS Addendum Report
St. Juliens Creek Annex
Chesapeake, Virginia

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SECTION 7

Feasibility Study Addendum

The FS was prepared in 2009 to develop remedial action objectives to protect human health and the environment and identifies applicable or relevant and appropriate requirements and to-be-considered criteria (CH2M HILL, 2009b). Previous investigations had identified potential human health risks associated with CVOCs in shallow groundwater (Columbia aquifer) at Site 21 from potable use. The HHRA had also evaluated the potential human health risks associated with current and future hypothetical industrial workers for inhalation of indoor air; however, additional investigation was being planned to further assess this exposure pathway due to the uncertainties at the time of the FS report. The FS report therefore indicated that if potential risk is identified as a result of the additional vapor intrusion investigation currently being planned, the risk will be addressed separately. Because no unacceptable risks were identified from the current and future vapor intrusion pathways (**Section 5.5**), an FS for that pathway is not required. The remedial alternatives developed and evaluated within the FS report address all site risks, and the results of this investigation do not impact the alternative development or evaluation.

SECTION 8

Conclusions and Recommendations

8.1 Conclusions

With the exception of TCE, COIs were not detected in exceedance of PALs in samples collected during Phase I or Phase II of the vapor intrusion investigation. During Phase I of the investigation, during which only subslab vapor samples were collected, TCE was detected in subslab vapor at concentrations exceeding the residential PAL at five of eight sample locations and at concentrations exceeding the industrial PAL at four of eight sample locations. As a result, the Phase II investigation was conducted and consisted of the collection of concurrent subslab vapor, indoor air, and ambient air samples. The Phase II subslab vapor sample results were consistent with the Phase I results, with TCE concentrations in subslab vapor exceeding the residential PAL at six of eight sample locations and the industrial PAL at five of eight sample locations. TCE concentrations in indoor air did not exceed the industrial PAL at any of the indoor air sample locations, indicating that significant vapor intrusion is not occurring.

The risk evaluation conducted in this RI and FS addendum demonstrates that the risks to industrial indoor workers at both Buildings 47 and 1556 were within the acceptable ECLR range of 10^{-6} to 10^{-4}. With the uncertainties noted, risks to future industrial workers in Buildings 47 or 1556 or in future hypothetical industrial buildings at the site are also within the acceptable ECLR range of 10^{-6} to 10^{-4}. There is the potential for risks to exceed target levels for future residential receptors if future residential structures are constructed at the site.

The remedial alternative development and evaluation conducted within the FS are not impacted by the results of this investigation.

8.2 Recommendations

No further investigation or mitigation is recommended for Buildings 1556 or 47 because risks to current or future industrial workers are within the acceptable ECLR range of 10^{-6} to 10^{-4} at both buildings. Because there is a potential for concentrations of COIs to increase during implementation of the interim remedial action to address unacceptable risks associated with future potable use of shallow groundwater, additional vapor intrusion monitoring is warranted throughout the upcoming interim remedial action. A vapor intrusion monitoring plan should be developed by the SJCA Partnering Team and consist of a decision flow chart to outline the conditions that would warrant monitoring. If monitoring is warranted, the program could include monitoring of the integrity of the building foundations, evaluation of shallow groundwater data collected during the interim remedial action to identify increases in TCE daughter products, and additional subslab vapor or indoor air sampling, if determined to be appropriate. LUCs to maintain the current industrial building use and prevent activities that would compromise the integrity of the building foundations during implementation of the interim remedial action should be incorporated into the LUC RD for shallow groundwater. Because the future risk calculated based on current site concentrations is within

the acceptable ECLR range of 10^{-6} to 10^{-4} and the interim remedial action will reduce the concentrations of contaminants of concern in shallow groundwater to MCLs (selected cleanup levels), the monitoring plan (if implemented), and LUCs should be discontinued once the interim remedial action for groundwater is completed.

No further action (NFA) for the vapor intrusion pathway is recommended for future industrial workers in future hypothetical industrial buildings following completion of the interim remedial action. Although the HHRA did not identify any risks outside of the acceptable ECLR range of 10^{-6} to 10^{-4} for industrial workers in future hypothetical industrial buildings, there is uncertainty with the spatial coverage of the data on which the conclusion was based that may have resulted in an underestimation of risk (**Section 5.4**). Therefore, LUCs to control a change in land use during implementation of the interim remedial action to address unacceptable risks associated with future potable use of shallow groundwater should be incorporated into the LUC RD for shallow groundwater. If a change in land use is proposed during the implementation of the interim remedial action, further evaluation of the vapor intrusion pathway should be conducted and/or mitigation measures should be implemented. The LUCs should be discontinued once the interim remedial action for groundwater achieves the cleanup levels. Because the future risk calculated based on current site concentrations is within the acceptable ECLR range of 10^{-6} to 10^{-4} and the interim remedial action will reduce the concentrations of contaminants of concern in shallow groundwater to maximum contaminant levels (selected cleanup levels), the future risk is projected to be below the target level as well.

NFA for the vapor intrusion pathway is recommended for future hypothetical residents following completion of the interim remedial action. The risk ratio for the hypothetical resident is equal to the upper end of the acceptable ELCR range (i.e., 10^{-4}). However, the risk calculation was based on the current COI concentrations and a conservative attenuation factor of 0.1. The interim remedial action cleanup levels for shallow groundwater have been set as maximum contaminant levels for the contaminants of concern. Based on USEPA's (2008) vapor intrusion database, indoor air concentrations posing potential risk are not generally present when groundwater concentrations are below MCLs. This expectation is consistent with the current risk calculation, where COI concentrations much greater than MCLs in groundwater resulted in negligible risk. Therefore, LUCs to prevent residential development of the site are recommended during implementation of the interim remedial action and should be incorporated into the LUC RD for shallow groundwater. If a change in land use is proposed during implementation of the interim remedial action, further vapor intrusion evaluation and/or implementation of mitigation measures should be implemented. Once the shallow groundwater cleanup levels are achieved by the interim remedial action, the LUCs should be discontinued.

SECTION 9

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Attachment A
Building Surveys

Preliminary Building Survey for Vapor Intrusion Investigation

CH2MHILL

Date: 8/7/2009

Preparer: Angela Petree and Adrienne Jones

Facility: SJCA Site 21

Address:

Contact Person: Charles Gonzalez

Phone Number: 757.802.2539 (cell) 757.396.0131 ext 215 (office)

e-mail address: charles.f.gonzalez@navy.mil

Building Description

Building or Room Identifier: 1556

Primary Activity within Building (select one):

- [ ] Manufacturing
- [x] Storage
- [x] Other (second floor primarily office space)
- [ ] Chemical processing
- [ ] Chemical Storage
- [ ] Administrative
- [ ] Instrumentation/Control

Notes: No haz storage inside building. Mostly used for spare part storage on 1st floor

Approximate floor space 2.5 acres

Number of floors 2

Multi-room building [x] or Single room [ ]

Ceiling height

Aboveground Construction

- [ ] Wood
- [ ] Concrete
- [ ] Brick
- [ ] Cinderblock
- [x] Other corrugated metal/drywall/concrete blocks

Floor plan attached? [ ] Yes [x] No

Notes: Do not have at this time. Gave contact information to POC to email building specifications 8/7/09.

Evaluation of Potential Conduits from Soil

Floor/foundation description (check all that apply)

- [ ] Wood
- [x] Concrete
- [ ] Elevated above grade? no
- [ ] Below grade? unknown
- [ ] Other _____

Expansion joints present (if concrete floor)?	[x] Yes	[ ] No	[ ] N/A
Are expansion joints sealed?	[x] Yes	[ ] No	[ ] N/A
Are sumps or floor drains present?	[ ] Yes	[ ] No	[ ] N/A in bathrooms & 2 areas
Are basements or subsurface vaults present?	[ ] Yes	[ ] No	[ ] N/A
Are there subsurface drainage problems?	[ ] Yes	[ ] No	[ ] N/A

Notes: 2 sumps found: #(1) in southeastern portion of R-4 → storage located on top of grates in 1 area
(#2) found in North eastern storage room in floor; drain ran from south → north of room into 3'x3'x3' wetwell. Approximately 1' of water standing in wet well

Evaluation of Potential Pathways/Driving Forces

Are there locations with elevated positive or negative pressure (look for doors not opening/closing properly, perceptible airflow, audible fan noise)

During inspection - warehouse had multiple garage doors open to allow air flow throughout bldg. Individual offices did not seem to have (+ or −) pressures

Is there one air conditioning zone or multiple zones (if in a multi-room building)?

- [ ] Single zone
- [x] Multi-zone
- [ ] Other each office had its own unit (or 2) second floor on 3 central units

(building management may know; another tip-off is the presence of multiple thermostats = multiple zones)

Sources of outdoor air

- [ ] Mechanical (air handling unit) → central on second floor
- [x] Doors
- [x] Windows

window units / portable units for small offices throughout sections in warehouse

Are windows/doors left open routinely? [X] Yes [ ] No

Notes: Typically open during every season except fall
→ individual offices installed recently

Evaluation of Potential Existing Chemical Sources Indoors

List principal solvent or VOC-containing products used (obtain MSDSs if available)

Typical cleaning products
Lysol
Raid

Are any of the target analytes used in this building/room?

[X] Yes [ ] No

only cleaning supplies

Are pesticides used indoors for pest control? [X] Yes [ ] No

Names of pesticide products used? → POC unsure - used to treat cockroach problem; contact Mark Robbins for schedule/type

Has there been a pesticide application within the past 6 months? [ ] Yes [ ] No unsure

Is smoking permitted in the building? [ ] Yes [X] No several smoking areas just outside of building

Description of Vapor Mitigation Systems

Has a radon or vapor mitigation system been installed in this building/room? [ ] Yes [X] No

Date of installation?

Type of system?
[ ] Passive venting
[ ] Active subslab depressurization
[ ] Crack/crevice sealing
[ ] Dilution ventilation control
[ ] N/A

Notes:

Additional Notes

On second Floor: New office equipment is located on this floor as well as Mr. Wiesel's office, who may wear/bring dry cleaned clothes into the facility.

- Central AC unit for 2nd floor ~~serves~~ cuts on at 5AM and turned off at 4PM - is not cut on over the weekend
- No new carpet/painting in building
- Routine cleaning supplies kept in closet beside elevator and restrooms
- Small room off of room 210 contains office supplies including printer cartridges

On First Floor: Building survey focused on areas which were above the plume

- Routine pest control but POC did not know schedule - contact Mark Robbins

→ cg mock up room: Large vent hole in upper wall (looks like old vent shaft was removed), Hairline cracks throughout subslab, room used for general storage of spare parts

→ Room 124 → Donnie Simpson & Mike Barrett reside here. Secondary containment area in right back corner; no stains present; contains shelving units

- Small office inside; portable AC unit at entrance and broken window unit (~10'x12'x8')

→ Box of used print cartridges by entrance to room 118 (from warehouse)

Additional Notes

→ Women's restroom - Tile floor; 5 showers w/ drains, 1 drain in toilet area; large industrial fan used to circulate air (very hot in this area)

→ Warehouse Area - 2 small offices (2 AC units in eastern office, turned off during night/weekend); 40 hr work week) in western office (contains MW) - 1 AC unit; 40 hr work week

→ R4 - Hairline cracks throughout floor; unknown manhole in floor; area stores spare parts, electric golf cart/forklift; area has sealed expansion joints. Ceiling ~25' high.

→ Area west of R4 area - Ceiling ~25' high. Drains in floor around raised slab area w/ opening covered by wood.

→ Workout room - rubber floor mats, exercise equipment, used during work week, ceiling ~12' high

→ R1 area - 1 propane forklift, "smoking" gazebo located to right of large garage door, no known floor drains but POC indicated to roof leaks. Small office in northeast corner (1 small window AC unit) small cracks in subslab, 1 can of RAID in office

→ Double decker office - 1 AC unit (window) ~ 15'x8'x9' small cracks in subslab

→ general warehouse area - Crate storage from ships in port, spare parts. A large crack is present on northern side of bldg. Unknown utility runs N to S in center of bldg.

NE storage room - 1' long sump located in slab. The drain to the sump is ~ 3' deep w ~ 1' standing water. Very limited access (DOC has never been in it).

Preliminary Building Survey for Vapor Intrusion Investigation

Date: 8/7/2009

Preparer: Adrienne Jones/VBO & Angela Petree/VBO

Facility: ST. JULIENS CREEK ANNEX

Address: SITE 21

CH2MHILL

Contact Person: Jimmy Twine

Phone Number: 757.836.4096

e-mail address:

Building Description

Building or Room Identifier: 47

Primary Activity within Building (select one):

- [ ] Manufacturing
- [ ] Storage
- [ ] Other
- [ ] Chemical processing
- [ ] Chemical Storage
- [ ] Administrative
- [ ] Instrumentation/Control

Notes: ~9 employees daily (or 4-5 days/week) for 2 hours per day

Approximate floor space: see field notes

Number of floors: 1

Multi-room building [X] or Single room [ ] office space built inside of building

Ceiling height:

Aboveground Construction
- [X] Wood
- [ ] Concrete
- [ ] Brick
- [ ] Cinderblock
- [ ] Other

Floor plan attached? [ ] Yes [X] No

Notes:

Evaluation of Potential Conduits from Soil

Floor/foundation description (check all that apply)

- [ ] Wood
- [x] Concrete
- [x] Elevated above grade? SLIGHTLY
- [ ] Below grade?
- [ ] Other _____

Expansion joints present (if concrete floor)?	[x] Yes	[ ] No	[ ] N/A
Are expansion joints sealed?	[ ] Yes	[x] No	[ ] N/A
Are sumps or floor drains present?	[x] Yes	[ ] No	[ ] N/A IN BATHROOMS
Are basements or subsurface vaults present?	[ ] Yes	[x] No	[ ] N/A
Are there subsurface drainage problems?	[ ] Yes	[x] No	[ ] N/A

Notes: Floor severly warped in mens restroom

Evaluation of Potential Pathways/Driving Forces

Are there locations with elevated positive or negative pressure (look for doors not opening/closing properly, perceptible airflow, audible fan noise)

No evidence present. Building has extremely leaky roof, windows in bad shape, building has holes in walls

Is there one air conditioning zone or multiple zones (if in a multi-room building)?

- [ ] Single zone
- [x] Multi-zone
- [ ] Other _____

4 window units for offices

(building management may know; another tip-off is the presence of multiple thermostats = multiple zones)

Sources of outdoor air

- [x] Mechanical (air handling unit) heat
- [x] Doors garage doors
- [x] Windows

Are windows/doors left open routinely? ☐ Yes ☐ No Seasonly

Notes: garage doors open in summer / closed during winter

Evaluation of Potential Existing Chemical Sources Indoors

List principal solvent or VOC-containing products used (obtain MSDSs if available)

paints, solvents, gasoline } storage only, mainly in chemical lockers

antifreeze & oil drums

propane tanks

Are any of the target analytes used in this building/room?

☐ Yes ☐ No

Are pesticides used indoors for pest control? ☐ Yes ☒ No None known

Names of pesticide products used?

Has there been a pesticide application within the past 6 months? ☐ Yes ☒ No

Is smoking permitted in the building? ☐ Yes ☒ No smoking gazebo located just outside building

Description of Vapor Mitigation Systems

Has a radon or vapor mitigation system been installed in this building/room? ☐ Yes ☒ No

Date of installation?

Type of system?

☐ Passive venting ☐ Active subslab depressurization

☐ Crack/crevice sealing ☐ Dilution ventilation control

☐ N/A

Notes:

Additional Notes

Building 47 is in bad shape; broken windows, holes in walls, leaky roof locations throughout building. The leaking roof rainwater pools in low lying areas in building which may interfere with SSV sampling.

Northern portion of building: used as storage area for misc. items (3 trucks, 2 generators, 2 lite plants, ditchwitch, forklifts, spare lighting fixtures, fuses (varied), cable spools). A caged gas cylinder location is up against wall - contains propane and tetrafluorocarbon. A small used oil storage area is located in North ~~western~~ east corner of building (contains 2 drums). 6 flame lockers located along walls containing oil, antifreeze, solvents, fire extinguishers, and alcohols.

Middle of building: 2 offices on west side of building; POC indicated the office is occupied about 1 hr per business day. The slab is ~ 6 inches less thick in this area (step down into office). Window unit present. Back office is used for storage of general tools (hammers, screwdrivers, etc) and supplies (screws, nails, etc). Outside of offices along middle of building, a separation of the subslab is present (~ 4" gap) where the ground surface is exposed.

Additional Notes

Additionally, an electric box was installed on the ground surface (slab cut out where box is located). Multiple pipes penetrate slab throughout. 1 Flame locker present containing spray paints/enamels. A break room was constructed in the center of the building

Recycle area in back portion of building for metal, print cartridges and used as storage area for more fuses

Preliminary Building Survey for Vapor Intrusion Investigation

CH2MHILL

Date: 10/17/09

Preparer: Angela Petree & Patrick Murphy

Facility: SJCA

Address:

Contact Person: Jimmy Twine

Phone Number:

e-mail address:

Building Description

Building or Room Identifier: 47

Primary Activity within Building (select one):

- [ ] Manufacturing
- [X] Storage
- [ ] Other
- [ ] Chemical processing
- [ ] Chemical Storage
- [ ] Administrative
- [ ] Instrumentation/Control

Notes: See Phase 1

Approximate floor space: See Field notes

Number of floors: 1

Multi-room building [X] or Single room [ ]

Ceiling height:

Aboveground Construction
- [ ] Wood
- [ ] Concrete
- [ ] Brick
- [ ] Cinderblock
- [ ] Other

Floor plan attached? [ ] Yes [ ] No

Notes: See phase 1

Evaluation of Potential Conduits from Soil

Floor/foundation description (check all that apply)

- [ ] Wood
- [x] Concrete
- [ ] Elevated above grade?
- [ ] Below grade?
- [ ] Other _____

Expansion joints present (if concrete floor)?	[x] Yes	[ ] No	[ ] N/A
Are expansion joints sealed?	[ ] Yes	[x] No	[ ] N/A
Are sumps or floor drains present?	[x] Yes	[ ] No	[ ] N/A
Are basements or subsurface vaults present?	[ ] Yes	[x] No	[ ] N/A
Are there subsurface drainage problems?	[ ] Yes	[ ] No	[ ] N/A none known

Notes: _____

Evaluation of Potential Pathways/Driving Forces

Are there locations with elevated positive or negative pressure (look for doors not opening/closing properly, perceptible airflow, audible fan noise)

See Building Survey conducted in 2007 and Phase I notes

Is there one air conditioning zone or multiple zones (if in a multi-room building)?

- [ ] Single zone
- [x] Multi-zone
- [ ] Other _____

(building management may know; another tip-off is the presence of multiple thermostats = multiple zones)

Sources of outdoor air

- [x] Mechanical (air handling unit)
- [x] Doors
- [x] Windows

Are windows/doors left open routinely? [X] Yes [ ] No

Notes: seasonal

Evaluation of Potential Existing Chemical Sources Indoors

List principal solvent or VOC-containing products used (obtain MSDSs if available)

yes - see phase 1

Are any of the target analytes used in this building/room?

[ ] Yes [ ] No None known

Are pesticides used indoors for pest control? [ ] Yes [X] No

Names of pesticide products used?

Has there been a pesticide application within the past 6 months? [ ] Yes [X] No

Is smoking permitted in the building? [ ] Yes [X] No

Description of Vapor Mitigation Systems

Has a radon or vapor mitigation system been installed in this building/room? [ ] Yes [X] No

Date of installation?

Type of system?

- [ ] Passive venting
- [ ] Active subslab depressurization
- [ ] Crack/crevice sealing
- [ ] Dilution ventilation control
- [ ] N/A

Notes:

Additional Notes

CONDITIONS/STORAGE TO WHAT OBSERVED DURING PHASE I. THE FOLLOWING OBSERVATIONS MADE

1. OIL DRUM AREA REMOVED
2. GAS CYLINDER STORAGE AREA CONTAINS
   - PROPANE
   - NITROGEN
   - SULFUR HEXAFLUORIDE
3. LARGE FUSES STORED ON SHELVING UNITS
4. 3 TRANSFORMERS STORED IN NE CORNER OF BLDG
5. 1 SMALL BARREL OF DETERGENT ("SPRAY 9")
6. AREA WEST OF BREAK ROOM CONTAINS SHELVING UNITS OF SPRAY PAINT. THIS FENCED AREA ALSO CONTAINS 2 GENERATORS & AIR COMPRESSOR
7. SE PORTION OF BUILDING "RECYCLE AREA"
   - DRUMS OF USED BATTERIES/LEAD BULLETS
   - SPENT FUSES / LIQUID CONTAINING TRANSFORMERS
8. JIMMY'S OFFICE CONTAINS SINGLE CANS OF CLEANERS/DEGREASERS
   - RUST OLEUM
   - EXTRA MUSCLE
   - PENETRATING GEL LUB W/ TEFLON
   - PROTECTIVE CLEANER & COATING
   - ORANGE JELLIED DEGREASER

Additional Notes

Preliminary Building Survey for Vapor Intrusion Investigation

Date: 10/13/09

Preparer: A Petree

Facility: SJCA Site 21 Building 1556

Address: SJCA

CH2MHILL

Contact Person: Charles Gonzales

Phone Number:

e-mail address:

Building Description

Building or Room Identifier: Large warehouse (1556)

Primary Activity within Building (select one):

- [ ] Manufacturing
- [x] Storage
- [ ] Other
- [ ] Chemical processing
- [ ] Chemical Storage
- [x] Administrative
- [ ] Instrumentation/Control

Notes: used for general electronic storage; when ships come to port ship is stripped and items stored here → electronic maintenance/refurbishing

Approximate floor space ~2 to 2.5 acres

Number of floors 2 (south ~~of~~ part building)

Multi-room building [x] or Single room [ ]

Ceiling height in 2 story area (south portion) ~25' remaining areas ~~32'~~ 40'

Aboveground Construction

- [ ] Wood
- [ ] Concrete
- [ ] Brick
- [x] Cinderblock
- [ ] Other

Floor plan attached? [ ] Yes [x] No

Notes: attempting to get fire route map

Evaluation of Potential Conduits from Soil

Floor/foundation description (check all that apply)

- [ ] Wood
- [x] Concrete
- [x] Elevated above grade?
- [ ] Below grade?
- [ ] Other _____

Expansion joints present (if concrete floor)?	[x] Yes	[ ] No	[ ] N/A
Are expansion joints sealed?	[x] Yes	[ ] No	[ ] N/A
Are sumps or floor drains present?	[x] Yes	[ ] No	[ ] N/A
Are basements or subsurface vaults present?	[ ] Yes	[x] No	[ ] N/A
Are there subsurface drainage problems?	[ ] Yes	[x] No	[ ] N/A

Notes: There are grates

Evaluation of Potential Pathways/Driving Forces

Are there locations with elevated positive or negative pressure (look for doors not opening/closing properly, perceptible airflow, audible fan noise)

see pressure monitoring data

Is there one air conditioning zone or multiple zones (if in a multi-room building)?

- [ ] Single zone
- [x] Multi-zone
- [ ] Other _____

(building management may know; another tip-off is the presence of multiple thermostats = multiple zones)

Sources of outdoor air 2ND FLOOR & LOBBY CONTROLLED BY central air AC

- [ ] Mechanical (air handling unit)
- [ ] Doors
- [ ] Windows

Are windows/doors left open routinely? [X] Yes [ ] No

Notes: & large Bay Doors

Evaluation of Potential Existing Chemical Sources Indoors

List principal solvent or VOC-containing products used (obtain MSDSs if available)

Are any of the target analytes used in this building/room?

[ ] Yes [X] No

Are pesticides used indoors for pest control? [X] Yes [ ] No

Names of pesticide products used? Terminex

Has there been a pesticide application within the past 6 months? [ ] Yes [X] No

Is smoking permitted in the building? [ ] Yes [X] No located

Description of Vapor Mitigation Systems

Has a radon or vapor mitigation system been installed in this building/room? [ ] Yes [X] No

Date of installation?

Type of system?

[ ] Passive venting
[ ] Active subslab depressurization
[ ] Crack/crevice sealing
[ ] Dilution ventilation control
[ ] N/A

Notes:

Additional Notes

Ceiling height ~7' high
2 large printers for computers in small office

(1) Room w/ SV01, general purpose Lysol cleaner present (1 small bottle)

(2) Cranes in room (2,000 LB) - not in use currently - in vicinity of crane, secondary containment (10'x10' area) portable air conditioner and vent fan circulates. Misc. storage of computer parts on shelving units. Broken AC unit hooked up to office

*gold screw comes out of SV01 - office occupant had screw and it was screwed back in

(2) Lobby area - used print cartridge collection area
New office created across from women's restroom, door is mildew/stagnant air (really bad). "window AC unit" hooked up to office.

(3) Southern warehouse area near SV02. ~~##~~ One diesel powered forklift outside of office. Shelving units of misc. parts surrounding us. Office w/ SV02 & MW → 1 large bottle of hand sanitizer. Somewhat larger cracks in slab. 1 label printer located in room. Hazmat storage in corner of office (sealed bags of used parts i.e. used gasket). One small tape gun machine. 1 window AC unit (no on at this time)

(4) Office surrounding SV03 - ~~##~~ general purpose cleaners (3 bottles) 1 small window AC unit ~~in~~ 2 windows in office. One printer & 2 extra ink cartridges in corner of office. Propane fork lift stored outside office

*used print cartridges placed throughout building

(5) SV05 (under staircase) - located near large bay door). Wrapped boxes on crates located next to location. 2 trash cans. Boxes storing sealed metal parts on shelving units near location

(6) SV04 - 1 large floor cleaning machine, 2 golf carts (electric) charging near location, 2 propane fork lifts. Extensive ~~circular~~ venting system (see photos). 50' roller conveyer belt near location. Sealed boxes for part storage

Additional Notes

grate area → old sump location w/ sump (and waste pipe to ~~clean~~ pump out & clean water pipe inlet (abandoned) printer | cartridge storage in fenced "restricted area" next to grates. Diesel odor (and stains on floor). large crane in middle of grates. metal drawer storage units on crates located over wooden covered "sump" area

see ~~s~~ previous sketch

Date: _____
Preparer: _____

Facility: _____
Description (floor): _____

CH2MHILL

Floor Plan Information

Preliminary Building Survey for Vapor Intrusion Investigation

CH2MHILL

Date: 10/13/09

Preparer: P. Murphy

Facility: BLDG 1156

Address: SJCA BLDG 1156

Contact Person: Gonzalez

Phone Number:

e-mail address:

Building Description

Building or Room Identifier: Warehouse (1556)

Primary Activity within Building (select one):

- [ ] Manufacturing
- [x] Storage
- [ ] Other
- [ ] Chemical processing
- [ ] Chemical Storage
- [x] Administrative
- [ ] Instrumentation/Control

Notes: Storage for electronic components from in-port ships. General Storage for maintenance of Ships in-port

Approximate floor space: 2.5 acres

Number of floors: 2 floors for part of the building

Multi-room building [x] or Single room [ ]

Ceiling height: ~25ft when 2nd floor present, ~14' in other area

Aboveground Construction

- [ ] Wood
- [x] Concrete
- [ ] Brick
- [x] Cinderblock
- [x] Other: Metal

Floor plan attached? [ ] Yes [x] No

Notes:

Evaluation of Potential Conduits from Soil

Floor/foundation description (check all that apply)

- [ ] Wood
- [x] Concrete
- [x] Elevated above grade?
- [ ] Below grade?
- [ ] Other _____

Expansion joints present (if concrete floor)?	[x] Yes	[ ] No	[ ] N/A
Are expansion joints sealed?	[x] Yes	[ ] No	[ ] N/A
Are sumps or floor drains present?	[x] Yes	[ ] No	[ ] N/A
Are basements or subsurface vaults present?	[ ] Yes	[x] No	[ ] N/A
Are there subsurface drainage problems?	[ ] Yes	[x] No	[ ] N/A

Notes: _____

Evaluation of Potential Pathways/Driving Forces

Are there locations with elevated positive or negative pressure (look for doors not opening/closing properly, perceptible airflow, audible fan noise)

Is there one air conditioning zone or multiple zones (if in a multi-room building)?

- [ ] Single zone
- [ ] Multi-zone
- [ ] Other _____

(building management may know; another tip-off is the presence of multiple thermostats = multiple zones)

Sources of outdoor air

- [ ] Mechanical (air handling unit)
- [ ] Doors
- [ ] Windows

Are windows/doors left open routinely? ☐ Yes ☐ No

Notes: _____

Evaluation of Potential Existing Chemical Sources Indoors

List principal solvent or VOC-containing products used (obtain MSDSs if available)

_____ _____
_____ _____
_____ _____

Are any of the target analytes used in this building/room?

☐ Yes ☐ No

_____ _____
_____ _____

Are pesticides used indoors for pest control? ☐ Yes ☐ No

Names of pesticide products used? _____
_____

Has there been a pesticide application within the past 6 months? ☐ Yes ☐ No

Is smoking permitted in the building? ☐ Yes ☐ No

Description of Vapor Mitigation Systems

Has a radon or vapor mitigation system been installed in this building/room? ☐ Yes ☐ No

Date of installation? _____

Type of system?
☐ Passive venting ☐ Active subslab depressurization
☐ Crack/crevice sealing ☐ Dilution ventilation control
☐ N/A

Notes: _____

Additional Notes

- Room w/ SV01: Room contains misc. storage cabinets for nuts/bolts. Room also contains 2 cranes (2000lbs). 1 industrial fan (~ 24 in dia.) blowing along w/ portable AC unit. One portable fan (~ 16 in dia), one bottle of Lysol All purpose cleaner (1/4 full), secondary containment ~ 10' x 10' x 6", broken A/C unit in office,
- In warehouse area, ~ 12' x 15' x 7' office w/ A/C unit attached. Office contains mildew odor. Basic office w/ computer, and storage boxes
- Room SV02: ~ 20' x 20' x 7', office w/ 4 computers, storage boxes, refrigerator, A/C unit, water cooler, floor contains minor cracks and a monitoring well, room contains 2 doors, box w/ HAZMAT label (written in black sharpie) contains sealed boxes and bags w/ unknown material: informed that HAZMAT material is not stored in this room,
- Room SV03, 15' x 10' x 7', office w/ 1 computer, 1 printer, 1 door, 1 window (3' x 2'), 1 A/C unit, room contains printer cartridges, floor contains minor cracking, A 2nd window (1.5' x 1.5'), storage boxes for tools,
- In Warehouse, Propane Tank attached to back of forklift.
- SV05 (in warehouse) recycle units stored adjacent, multiple storage boxes, ceiling is ~ 40', bay door (open) located ~ 50' away, floor in good condition w/ seal over crack in good condition,
- SV04: in warehouse, multiple boxes (storage), bay door (open) adjacent to SV04, ~ 100' conveyor belt located behind SV04, various cleaning supplies (409, Windex), forklift w/ propane tank, ceiling ~ 40', floor in good condition, boxes w/ Non-Flammable gas (gas unknown),

Additional Notes

Grate Area. Ceiling is ~25' and then rises to ~40', grates ~2' in width in box pattern, Storage area for multiple boxes and tools, floor cracking around grate, fenced in restricted area contains computers and printers.

Attachment B
Photograph Log

Photo 1: Building 1556_Phase I_SJS21-SV01 stainless steel probe installed with probe screw in place	Filename:Photo01.jpg

Photo 2: Building 1556_Phase I_Helium leak check at SJS21-SV05	Filename: Photo02.jpg

Photo 3: Building 1556_Phase I_6L SUMMA canister set up at SJS21-SV01	Filename:Photo03.jpg

Photo 4: Building 1556_Phase I_Duplicate sample collection at SJS21-SV02	Filename:Photo04.jpg

Photo 5: Building 47_Phase I_Pressure differential monitoring at SJS21-PM47	Filename:Photo05.jpg

Photo 6: Building 1556_Phase II_6L SUMMA canister collecting indoor air sample near floor grates over drainage trench at SJS21-IA09	Filename:Photo06.jpg

Photo 7: Building 1556_Phase II_SJS21-IA03 and SJS21-SV03 sample collection	Filename:Photo07.jpg

Photo 8: Building 47_Phase II_SJS21-OA02 Outdoor air sample collection approximately 10 feet from Building 47 air intake on north side of building	Filename:Photo08.jpg

Photo 9: Weather station collecting data north of Building 47 (updwind)	Filename:Photo09.jpg

Attachment C
Field Data Sheets

CH2MHILL

Indoor Vapor Intrusion Assessment
Sub-slab Vapor Field Sampling Log - Summa Canister Method

Project Info

Project Name: SJCA Site 21 VI Evaluation **Project #:** 314808
By: K Stokes A Petree **Date:** 8/17/09

Structure

Identification: SJCA Building 1556
Address:
Slab Information:
- [x] Concrete slab on grade (directly on top of soil)
- [ ] Other (describe)
- [ ] Concrete slab on gravel underlayment

Condition of slab: Good, hairline cracks throughout
Type of Sub Slab Soil:
Is water present in the soil: No

Sub-slab Probe Installation, Leak Checking, Probe Purging, & Sampling Log

	Sample location (show in diagram)	1	2	3	4
	Sample Identification (field ID)	SJS21-SV01	SJS21-SV02	SJS21-SV03	SJS21-~~SV04~~ PM1556
Probe Installation	Depth of slab (inches)	12"	12"	12"	12"
	Depth of hole drilled (inches below slab surface)	14"	13.7"	12.05"	15"
	Depth of installed probe (inches below slab surface)	12"	12"	12"	12"
Manifold Leak check	Leak check (sampling manifold) - Pass/No Pass	Pass	Pass	Pass	Pass
Probe Purge	Purge rate, cc/min.	200 mL/min	200 mL/min	200 mL/min	Not Sampling
	Purge Start (time of day)	11:20	1427	13:00	
	Purge vacuum, " Hg	0	0	0	
	Purge completed (time of day)	11:25	1425	13:05	
Helium Leak Check (optional)	Leak check (Helium) - ppm	0 ppm	0 ppm	150 ppm	0 ppm
Field Analysis (optional)	Gem 2000 (O2 / CO2 / CH4) - %	N/A	N/A	N/A	
	PID - ppmv	3.8 ppm	4.3 ppm	4.3 ppm	
Canister Sampling	Canister & flow controller ID (if used)	6593 / K270	~~93097 / K257~~ #1 / K452	93097 / K257	
	Initial Canister Pressure (" Hg)	-30	#1 -30 / #2 -32	-30	
	Sampling rate, cc/min	4.17 mL/min	4.17 mL/min	4.17 mL/min	
	Sampling period started (time of day)	1130 AM 8/20	1445 8/20	1312 PM 8/20	
	Sampling vacuum, " Hg	-0-	-0-	-0-	
	Sampling period ended (time of day)	0813	1550	0925 8/21	
	Final Canister Pressure (" Hg)	-1	-19	-10	

Observations and Comments: #1 → 6593 (parent sample
#2 → 93298 (DUPLICATE sample)
regulator = K452

Solinst Barologger
Gold # 0011027695
Omniguard #4
R8034

CH2MHILL

Indoor Vapor Intrusion Assessment
Sub-slab Vapor Field Sampling Log - Summa Canister Method

Project Info

Project Name: SJCA Site 21 VI Investigation **Project # :** 314808

By: K STOKES/DFW APetree/VBO A JONES/VBO **Date:** 8/18/09

Structure

Identification: SJCA Building 1556

Address:

Slab Information:

- ☐ Concrete slab on grade (directly on top of soil)
- ☐ Other (describe)
- ☐ Concrete slab on gravel underlayment

Condition of slab: good, hairline crack throughout

Type of Sub Slab Soil:

Is water present in the soil:

Sub-slab Probe Installation, Leak Checking, Probe Purging, & Sampling Log

	Sample location (show in diagram)	1	2	3	4
	Sample Identification (field ID)	SJS21-SV04	SJS21-SV05		
Probe Installation	Depth of slab (inches)	12"	12"		
	Depth of hole drilled (inches below slab surface)	1'3"	1'4"		
	Depth of installed probe (inches below slab surface)	12"	12"		
Manifold Leak check	Leak check (sampling manifold) - Pass/No Pass	pass	pass		
Probe Purge	Purge rate, cc/min.	200 mL/min	200 mL/min		
	Purge Start (time of day)	11:55	12:30		
	Purge vacuum, " Hg	0	0		
	Purge completed (time of day)	12:00	12:35		
Helium Leak Check (optional)	Leak check (Helium) - %	50 ppm	0 ppm		
Field Analysis (optional)	Gem 2000 (O2 / CO2 / CH4) - %	n/a	n/a		
	PID - ppmv	6.1 ppm	4.7 ppm		
Canister Sampling	Canister & flow controller ID (if used)	11339/K224	6641/K249		
	Initial Canister Pressure (" Hg)	-32	-30		
	Sampling rate, cc/min	4.17 mL/min	4.17 mL/min		
	Sampling period started (time of day)	1215 8/20	1235 8/20		
	Sampling vacuum, " Hg	-0-	-0-		
	Sampling period ended (time of day)	7:42	09:13 8/21		
	Final Canister Pressure (" Hg)	-2	-10		

Observations and Comments:

CH2MHILL

Indoor Vapor Intrusion Assessment
Sub-slab Vapor Field Sampling Log - Summa Canister Method

Project Info

Project Name: ~~SJS21~~ - SJCA SITE 21 VI INVESTIGATION **Project #:** 314808

By: Angela Petree/VBO, Adrienne Jones/VBO, KMSTOKES/DFW **Date:** 8/18/09

Structure

Identification: SJCA SITE 21 BUILDING 47

Address:

Slab Information:

- [x] Concrete slab on grade (directly on top of soil)
- [ ] Other (describe) Very old (1916)
- [ ] Concrete slab on gravel underlayment

Condition of slab

Type of Sub Slab Soil

Is water present in the soil

Sub-slab Probe Installation, Leak Checking, Probe Purging, & Sampling Log

	Sample location (show in diagram)	1	2	3	4
	Sample Identification (field ID)	SJS21-006	SJS21-BM47	SJS21-007	SJS21-008
Probe Installation	Depth of slab (inches)	12"	10"	10"	12"
	Depth of hole drilled (inches below slab surface)	1"	5" (void space)	4" (void space)	3" (void space)
	Depth of installed probe (inches below slab surface)	12"	11"	11"	10"
Manifold Leak check	Leak check (sampling manifold) - Pass/No Pass	50 ppm (PASS)	1900 ppm (PASS)	575 ppm (PASS)	0 ppm (PASS)
Probe Purge	Purge rate, cc/min.	200 mL/min	Not sampling	~200 mL/min	~150 mL/min
	Purge Start (time of day)	1508		1549	1530
	Purge vacuum, " Hg	0		0	0
	Purge completed (time of day)	1513		1551	1538
Helium Leak Check (optional)	Leak check (Helium) - %	50 ppm	1900 ppm	575 ppm	0 ppm
Field Analysis (optional)	Gem 2000 (O2 / CO2 / CH4) - %	N/A		N/A	N/A
	PID - ppmv	10.3 ppm		5.8 ppm	6.8 ppm
Canister Sampling	Canister & flow controller ID (if used)	6582/K292		T508/K322	~~-30 mm~~ 1326N/K100
	Initial Canister Pressure (" Hg)	-34 mm		-29.5 mm	-30 mm
	Sampling rate, cc/min	4.17 mL/min		4.17 mL/min	4.17 mL/min
	Sampling period started (time of day)	1520/8/20/09		1600/8/20/09	1540/8/20/09
	Sampling vacuum, " Hg	-0-		-0-	-0-
	Sampling period ended (time of day)	1140 8/21		1134 8/21	1155 8/21
	Final Canister Pressure (" Hg)	-9.5		-10	-10

Observations and Comments:

Solinst Barologger
Gold # 0011097644
Omniguard 4
#RB033

CH2MHILL

Indoor Vapor Intrusion Assessment
Sub-slab Vapor Field Sampling Log - Summa Canister Method

Project Info

Project Name: SJCA Site 21 Phase II Project # : 314808

By: K Stokes A Petree Date: 10/23/09

Structure

Identification: SJS21-SV06-09D

Address: Bldg. 47

Slab Information:

- [x] Concrete slab on grade (directly on top of soil)
- [ ] Other (describe)
- [ ] Concrete slab on gravel underlayment

Condition of slab: old, cracks, exposed expansion joints

Type of Sub Slab Soil:

Is water present in the soil:

Sub-slab Probe Installation, Leak Checking, Probe Purging, & Sampling Log

	Sample location (show in diagram)	1	2	3	4
	Sample Identification (field ID)	SJS21-SV06	SJS21-SV07	SJS21-PM47	SJS21-SV08
Probe Installation	Depth of slab (inches)	N/A	N/A	N/A	N/A
	Depth of hole drilled (inches below slab surface)	↓	↓	↓	↓
	Depth of installed probe (inches below slab surface)	↓	↓	↓	↓
Manifold Leak check	Leak check (sampling manifold) - Pass/No Pass	Pass	Pass	PASS	PASS
Probe Purge	Purge rate, cc/min.	200 mL/min	200 mL/min	200 mL/min	200 mL/min
	Purge Start (time of day)	955	1110	1132	1258
	Purge vacuum, " Hg	0"	0"	0"	0"
	Purge completed (time of day)	1000	1115	1137	1203
Helium Leak Check (optional)	Leak check (Helium) - %	* > 5% (FAIL)	0 ppm	0 ppm	75 ppm
Field Analysis (optional)	Gem 2000 (O2 / CO2 / CH4) - %	N/A	N/A	N/A	N/A
	PID - ppmv	5.0	2.6	3.7	6.6
Canister Sampling	Canister & flow controller ID (if used)	1319N/K303	04733/K214	N/A	6604/K466
	Initial Canister Pressure (" Hg)	-28	-29.5	↓	-29
	Sampling rate, cc/min	4.16 mL/min	4.16 mL/min	↓	4.16 mL/min
	Sampling period started (time of day)	1427	1437	↓	1436
	Sampling vacuum, " Hg	—	—	↓	—
	Sampling period ended (time of day)	1105	1059	↓	1051
	Final Canister Pressure (" Hg)	-9	-7.5	↓	-10

Observations and Comments: * Added modeling clay to base of sampling union on 10/24/09 - re-performed helium leak check. Helium = 0 ppmv.

CH2MHILL

Indoor Vapor Intrusion Assessment
Sub-slab Vapor Field Sampling Log - Summa Canister Method

Project Info

Project Name: SJSA Site 21 Project # : 314808

By: K Stokes A Petree Date: 10/23/09

Structure

Identification: Bldg 1556

Address:

Slab Information:

- [x] Concrete slab on grade (directly on top of soil)
- [ ] Other (describe)
- [ ] Concrete slab on gravel underlayment

Condition of slab

Type of Sub Slab Soil

Is water present in the soil

Sub-slab Probe Installation, Leak Checking, Probe Purging, & Sampling Log

	Sample location (show in diagram)	1	2	3	4
	Sample Identification (field ID)	SJS21-SV05	SJS21-PM1556	SJS21-SV02-09DP	
Probe Installation	Depth of slab (inches)	N/A	N/A	N/A	
	Depth of hole drilled (inches below slab surface)	↓	↓	↓	
	Depth of installed probe (inches below slab surface)	↓	↓	↓	
Manifold Leak check	Leak check (sampling manifold) - Pass/No Pass	PASS	PASS	N/A	
Probe Purge	Purge rate, cc/min.	200 mL/min	200 mL/min	↓	
	Purge Start (time of day)	1517	1536	↓	
	Purge vacuum, " Hg	0"	0"	↓	
	Purge completed (time of day)	1522	1541	↓	
Helium Leak Check (optional)	Leak check (Helium) - %	0 ppm	0 ppm	↓	
Field Analysis (optional)	Gem 2000 (O2 / CO2 / CH4) - %	N/A	N/A	↓	
	PID - ppmv	9.2	2.0	↓	
Canister Sampling	Canister & flow controller ID (if used)	6593/K231	N/A	6602/K344	
	Initial Canister Pressure (" Hg)	-30	↓	-30	
	Sampling rate, cc/min	4.16 mL/min	↓	4.16 mL/min	
	Sampling period started (time of day)	1315	↓	1250	
	Sampling vacuum, " Hg	—	↓	—	
	Sampling period ended (time of day)	0645	↓	1003	
	Final Canister Pressure (" Hg)	Ø	↓	-10	

Observations and Comments:

CH2MHILL

Indoor Vapor Intrusion Assessment
Sub-slab Vapor Field Sampling Log - Summa Canister Method

Project Info

Project Name: SJCA Site 21 Phase II Project # : 314808

By: K Stokes A Petree Date: 10/23/09

Structure

Identification: Bldg 1556

Address:

Slab Information:

- [x] Concrete slab on grade (directly on top of soil)
- [ ] Other (describe)
- [ ] Concrete slab on gravel underlayment

Condition of slab

Type of Sub Slab Soil

Is water present in the soil

Sub-slab Probe Installation, Leak Checking, Probe Purging, & Sampling Log

		1	2	3	4
	Sample location (show in diagram)				
	Sample Identification (field ID)	SJS21-SV01	SJS21-SV02	SJS21-SV03	SJS21-SV04
Probe Installation	Depth of slab (inches)	N/A	N/A	12"	N/A
	Depth of hole drilled (inches below slab surface)	↓	↓	14"	↓
	Depth of installed probe (inches below slab surface)	↓	↓	12"	↓
Manifold Leak check	Leak check (sampling manifold) - Pass/No Pass	PASS	PASS	PASS	PASS
Probe Purge	Purge rate, cc/min.	200 mL/min	200 mL/min	200 mL/min	200 mL/min
	Purge Start (time of day)	1345	1404	1438	1500
	Purge vacuum, " Hg	0"	0"	0"	0"
	Purge completed (time of day)	1350	1409	1443	1505
Helium Leak Check (optional)	Leak check (Helium) - %	0 ppm	0 ppm	0 ppm	0 ppm
Field Analysis (optional)	Gem 2000 (O2 / CO2 / CH4) - %	N/A	N/A	N/A	N/A
	PID - ppmv	2.0	3 ppm	2.4 ppm	0.5 ppm
Canister Sampling	Canister & flow controller ID (if used)	1399/K321	6641/K308	1324/K261	~~6593/K231~~ 35288N K213
	Initial Canister Pressure (" Hg)	-32	-29	-32	-32
	Sampling rate, cc/min	4.16 mL/min	4.16 mL/min	4.16 mL/min	4.16 mL/min
	Sampling period started (time of day)	1232	1250	1308	~~1315~~ 1325
	Sampling vacuum, " Hg	—	—	—	—
	Sampling period ended (time of day)	950	0641	1013	1030
	Final Canister Pressure (" Hg)	-8.5	-6.5	-9.5	-10

Observations and Comments:

CH2M HILL *Applied Sciences Laboratory*

Sheet 1 of __

Ambient Air, Outdoor Air & Crawl Space Air Sampling Log (Summa Canister)

Project Information

314808.F1.FK

Project Name: ~~Columbus AFB SS 28 IAE~~ SJCA

Project # : ~~361283.A1.07~~

By: K Stokes/DFW & ~~D. Patterson/MGM~~ Angie Petree/VBO

Date: 10/24/09

Sampling Data Log

Sample Location	Field ID	Canister ID	Flow Controller ID	Initial Canister Pressure ("Hg)	Initial Flow Controller Rate (ml/min)	Start Date & Time	End Data & Time	Final Pressure ("Hg)	Final Flow Controller Rate (ml/min)
SJS21-IA08	SJSC21-IA08-09D	93001	K122	-28	4.16	10/24/09 1433	10/25/09 1057	-9.5	N/A
SJS21-IA07	SJS21-IA07-09D	1138	K405	-30	↓	10/24/09 1440	10/25/09 0734	-9	↓
SJS21-OA01	SJS21-OA01-09D	6348	K460	-28.5	↓	10/24/09 1517	10/25/09 1255	-11.5	↓
SJS21-OA02	SJS21-OA02-09D	93289	K236	-30	↓	10/24/09 1506	10/25/09 1222	-10	↓
SJS21-OA02	SJS21-OA02-09DP	93121	K391	-27	↓	10/24/09 1506	10/25/09 1050	-9	↓
SJS21-OA03	SJS21-OA03-09D	1350	K392	-29.5	↓	10/24/09 1510	10/25/09 1131	-10	↓

Sample Location Diagram

N

Note:

Draw in outline the structure's foundation and interior walls, identify rooms, and note other defining features. Show location of canister relative to physical objects, etc.

Other Observations and Comments (note any unique circumstances):

CH2M HILL *Applied Sciences Laboratory*

Ambient Air, Outdoor Air & Crawl Space Air Sampling Log (Summa Canister)

Project Information

Project Name: SJCA Site 21 Project #: 314808

By: K Stokes & A Petree Date: 10/23/09

Sampling Data Log

Sample Location	Field ID	Canister ID	Flow Controller ID	Initial Canister Pressure ("Hg)	Initial Flow Controller Rate (ml/min)	Start Date & Time	End Data & Time	Final Pressure ("Hg)	Final Flow Controller Rate (ml/min)
SJS21-IA01	SJS21-IA01-09D	1328 ~~6666~~	K130	-30	-9.5	10/24/09 1239	10/25/09 0950		
SJS21-IA02	-IA02-09D	11339	K441	-30	-10	10/24/09 1256	10/25/09 1000		
SJS21-IA02	-IA02-09DD	93187	K390	-30	-10	10/24/09 1256	10/25/09 1000		
SJS21-IA09	SJS21-IA09-09D	6519	K318	-29.5	-9	10/24/09 1300	10/25/09 1009		
SJS21-IA03	SJS21-IA03-09D	93279	K398	-30	-9.5	10/24/09 1306	10/25/09 1013		
SJS21-IA05	SJS21-IA05-09D	1122	K432	-32	-10	10/24/09 1314	10/25/09 1035		
SJS21-IA04	SJS21-IA04-09D	7508	K445	-32	-9	10/24/09 1323	10/25/09 0646		
SJS21-IA06	SJS21-IA06-09D	S1495	K143	-32	-10	10/24/09 1430	10/25/09 1120		

Sample Location Diagram

N

Note:
Draw in outline the structure's foundation and interior walls, identify rooms, and note other defining features. Show location of canister relative to physical objects, etc.

Other Observations and Comments (note any unique circumstances):

Attachment D
Chain-of-Custody Forms

CTO-054

TAL Knoxville
5815 Middlebrook Pike
Knoxville, TN 37921
phone 865-291-3000 fax 865-584-4315

Canister Samples Chain of Custody Record

TestAmerica assumes no liability with respect to the collection and shipment of these samples.

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Client Contact Information
Company: CH2M HILL
Address: 5700 Cleveland St. Suite 101
City/State/Zip: Virginia Beach, VA
Phone: 757 - 671 - 8311
FAX: 757 - 497 - 6885
Project Name: SJCA Site 21
Site/location: Site 21
PO # 314808.5A.5M

Project Manager: Janna Staszak
Phone: 757 - 671 - 6256
Site Contact:
TAL Contact: Terry Wasmund

Analysis Turnaround Time
Standard (Specify) As per SOW
Rush (Specify)

Sampled By: Angela Petree

1 of 2 COCs

Sample Identification	Sample Date(s)	Time Start	Time Stop	Canister Vacuum in Field, "Hg (Start)	Canister Vacuum in Field, 'Hg (Stop)	Flow Controller ID	Canister ID	TO-15	TO-14A	EPA 3C	EPA 25C	ASTM D-1946	Other (Please specify in notes section)	Sample Type	Indoor Air	Ambient Air	Soil Gas (Subslab)	Landfill Gas	Other (Please specify in notes section)
SJS21-SV01-09C	8/20/09-8/21/09	1130	0813	-30	-1	K270	66651	X									X		
SJS21-SV02-09C	"	1445	1550	-30	-19	K452	6593	X									X		
SJS21-SV02-09CP	"	1445	1550	-32	-19	K452	93298	X									X		
SJS21-SV03-09C	"	1312	0925	-30	-10	K257	93097	X									X		
SJS21-SV04-09C	"	1215	0742	-32	-2	K224	11339	X									X		
SJS21-SV05-09C	"	1235	0913	-30	-10	K249	6642	X									X		

Sampled by: Angela Petree
Kimberly Stokes
Adrienne Jones

Temperature (Fahrenheit)	Interior	Ambient
Start	100 °F	94 °F
Stop	100 °F	90 °F

Pressure (inches of Hg)	Interior	Ambient
Start	29.95"	29.95"
Stop	29.95"	29.95"

Special Instructions/QC Requirements & Comments:

Canisters Shipped by:	Date/Time: 8/21/09 1700	Canisters Received by:
Samples Relinquished by:	Date/Time: 8/21/09 1700	Received by:
Relinquished by:	Date/Time:	Received by:

CTO-057

TAL Knoxville
5815 Middlebrook Pike
Knoxville, TN 37921
phone 865-291-3000 fax 865-584-4315

Canister Samples Chain of Custody Record

TestAmerica assumes no liability with respect to the collection and shipment of these samples.

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Client Contact Information
Company: CH2M HILL
Address: 5700 Cleveland St. Suite 101
City/State/Zip: Virginia Beach, VA
Phone: 757-671-8311
FAX: 757-497-6885
Project Name: SJCA Site 21
Site/location: Site 21
PO# 314808.SA.SM

Project Manager: Janna Staszak
Phone: 757-671-6256
Site Contact:
TAL Contact: Terry Wasmund

Sampled By: Angela Petree

2 of 2 COCs

Analysis Turnaround Time
Standard (Specify) As per SOW
Rush (Specify)

Sample Identification	Sample Date(s)	Time Start	Time Stop	Canister Vacuum in Field, "Hg (Start)	Canister Vacuum in Field, "Hg (Stop)	Flow Controller ID	Canister ID	TO-15	TO-14A	EPA 3C	EPA 25C	ASTM D-1946	Other (Please specify in notes section)	Sample Type	Indoor Air	Ambient Air	Soil Gas (Subslab)	Landfill Gas	Other (Please specify in notes section)
SJS21-SV06	8/20/09-8/21/09	1520	1140	-34	-9.5	K292	6587	X									X		
SJS21-SV07	"	1600	1134	-29.5	-10	K322	7508	X									X		
SJS21-SV08	"	1540	1155	-34	-10	K100	1326N	X									X		

Sampled by :
Angela Petree
Kimberly Stokes
Adrienne Jones

Temperature (Fahrenheit)	Interior	Ambient
Start	100 °F	94 °F
Stop	100 °F	90 °F

Pressure (inches of Hg)	Interior	Ambient
Start	29.95"	29.95"
Stop	29.95"	29.95"

Special Instructions/QC Requirements & Comments:
Canisters # 1334N - empty - not used
Flow Controller # K364 - bad regulator

Canisters Shipped by:	Date/Time: 8/21/09 1700	Canisters Received by:
Samples Relinquished by:	Date/Time: 8/21/09 1700	Received by:
Relinquished by:	Date/Time:	Received by:

CTO - 57

TAL Knoxville
5815 Middlebrook Pike
Knoxville, TN 37921
phone 865-291-3000 fax 865-584-4315

Canister Samples Chain of Custody Record

TestAmerica assumes no liability with respect to the collection and shipment of these samples.

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Client Contact Information
Company: CH2M HILL
Address: 5700 Cleveland St. Suite 101
City/State/Zip Virginia Beach VA
Phone: 757-671-6252
FAX:
Project Name: NAVFAC Site 21
Site/location: SJCA
PO # PN: 314808.FI.FK

Project Manager: Janna Staszak
Phone: 757-671-6256
Site Contact: Walt Bell
TAL Contact: Terry Wasmund

Sampled By: K Stokes / A Petree

1 of 4 COCs

Analysis Turnaround Time
Standard (Specify) 28 days
Rush (Specify)

Sample Identification	Sample Date(s)	Time Start	Time Stop	Canister Vacuum in Field, "Hg (Start)	Canister Vacuum in Field, "Hg (Stop)	Flow Controller ID	Canister ID	TO-15	TO-14A	EPA 3C	EPA 25C	ASTM D-1946	Other (Please specify in notes section)	Sample Type	Indoor Air	Ambient Air	Soil Gas (subslab)	Landfill Gas	Other (Please specify in notes section)
SJS21-SV01-09D	10/24-10/25/09	1232	950	-32	-8.5	K321	1399	X									X		
SJS21-IA01-09D	↓	1239	950	-30	-9.5	K130	1328	X							X				
SJS21-SV02-09D	↓	1250	641	-29	-6.5	K308	6641	X									X		
SJS21-SV02-09DP	↓	1250	1003	-30	-10	K344	6602	X									X		
SJS21-IA02-09D	↓	1256	1000	-30	-10	K441	11339	X							X				
SJS21-IA02-09DP	↓	1256	1000	-30	-10	K390	93187	X							X				

Sampled by :
Kim Stokes / DFW
Angie Petree / VBO

Temperature (Fahrenheit)

	Interior	Ambient
Start	76 °F	74 °F
Stop	76 °F	65 °F

Pressure (inches of Hg)

	Interior	Ambient
Start	n/a	29.74"
Stop	n/a	

Special Instructions/QC Requirements & Comments:

Canisters Shipped by: [signature]	Date/Time: 10/25/09	Canisters Received by:
Samples Relinquished by: [signature]	Date/Time: 10/25/09	Received by:
Relinquished by:	Date/Time:	Received by:

CTO-57

TAL Knoxville
5815 Middlebrook Pike
Knoxville, TN 37921
phone 865-291-3000 fax 865-584-4315

Canister Samples Chain of Custody Record

TestAmerica assumes no liability with respect to the collection and shipment of these samples.

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Client Contact Information
Company: CH2M HILL
Address: 5700 Cleveland St Suite101
City/State/Zip Virginia Beach, VA 23462
Phone: 757-671-6252
FAX:
Project Name: NAVFAC SJCA Site 21
Site/location: SJCA Site 21
PO # PN: 314808.FI.FK

Project Manager: Janna Staszak
Phone: 757-671-6256
Site Contact: WALT BELL
TAL Contact: Terry Wasmund

Analysis Turnaround Time
Standard (Specify) 28 days
Rush (Specify)

Sampled By: K Stokes / A Petree

2 of 4 COCs

Sample Identification	Sample Date(s)	Time Start	Time Stop	Canister Vacuum in Field, "Hg (Start)	Canister Vacuum in Field, 'Hg (Stop)	Flow Controller ID	Canister ID	TO-15	TO-14A	EPA 3C	EPA 25C	ASTM D-1946	Other (Please specify in notes section)	Sample Type	Indoor Air	Ambient Air	Soil Gas (Subslab)	Landfill Gas	Other (Please specify in notes section)
SJS21-SV03-09D	10/24-10/25/09	1308	1013	-32	-9.5	K261	1324	X									X		
SJS21-IA03-09D	↓	1306	1013	-30	-9.5	K398	93279	X							X				
SJS21-SV04-09D		1325	1030	-32	-10	K213	35288N	X									X		
SJS21-IA04-09D		1323	0646	-32	-9	K445	7508	X							X				
SJS21-SV05-09D		1315	0645	-30	Ø	K231	6593	X									X		
SJS21-IA05-09D	↓	1314	1035	-32	-10	K432	1122	X							X				

Sampled by :
Kim Stokes / DFW
Angie Petree / VBO

Temperature (Fahrenheit)

	Interior	Ambient
Start	76 °F	74 °F
Stop	76 °F	65 °F

Pressure (inches of Hg)

	Interior	Ambient
Start	n/a	29.74"
Stop	n/a	

Special Instructions/QC Requirements & Comments:

Canisters Shipped by: Kimberly R Stokes	Date/Time: 10/25/09	Canisters Received by:
Samples Relinquished by: Kimberly R Stokes	Date/Time: 10/25/09	Received by:
Relinquished by:	Date/Time:	Received by:

CTO-57

TAL Knoxville
5815 Middlebrook Pike
Knoxville, TN 37921
phone 865-291-3000 fax 865-584-4315

Canister Samples Chain of Custody Record

TestAmerica assumes no liability with respect to the collection and shipment of these samples.

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Client Contact Information
Company: CH2m HILL
Address: 5700 Cleveland St. Suite 101
City/State/Zip Virginia Beach, VA 23462
Phone: 757-671-6252
FAX:
Project Name: NAVFAC SJCA Site 21
Site/location: Site 21
PO # PN: 314808.FI.FK

Project Manager: Janna Staszak
Phone: 757-671-6256
Site Contact: Walt Bell
TAL Contact: Terry Wasmund

Analysis Turnaround Time
Standard (Specify) 28 days
Rush (Specify)

Sampled By: K Stokes / A Petree

3 of 4 COCs

Sample Identification	Sample Date(s)	Time Start	Time Stop	Canister Vacuum in Field, "Hg (Start)	Canister Vacuum in Field, "Hg (Stop)	Flow Controller ID	Canister ID	TO-15	TO-14A	EPA 3C	EPA 25C	ASTM D-1946	Other (Please specify in notes section)	Sample Type	Indoor Air	Ambient Air	Soil Gas (subslab)	Landfill Gas	Other (Please specify in notes section)
SJS21-SV06-09D	10/24-10/25/09	1427	1105	-28	-9	K303	1319N	X									X		
SJS21-IA06-09D	↓	1430	1120	-32	-10	K143	51495	X							X				
SJS21-SV07-09D	↓	1437	1059	-29.5	-9.5	K214	04733	X									X		
SJS21-IA07-09D	↓	1440	734	-30	-9	K405	1138	X							X				
SJS21-SV08-09D	↓	1436	1051	-29	-10	K466	6604	X									X		
SJS21-IA08-09D	↓	1433	1057	-28	-9.5	K122	93001	X							X				

Sampled by :
Kim Stokes / DFW
Angie Petree / VBO

Temperature (Fahrenheit)	Interior	Ambient
Start	76 °F	74 °F
Stop	76 °F	65 °F

Pressure (inches of Hg)	Interior	Ambient
Start	n/a	29.74"
Stop	n/a	

Special Instructions/QC Requirements & Comments:

Canisters Shipped by: Kimberly Stokes	Date/Time: 10/25/09	Canisters Received by:
Samples Relinquished by: Kimberly Stokes	Date/Time: 10/25/09	Received by:
Relinquished by:	Date/Time:	Received by:

CTO-57

TAL Knoxville
5815 Middlebrook Pike
Knoxville, TN 37921
phone 865-291-3000 fax 865-584-4315

Canister Samples Chain of Custody Record

TestAmerica assumes no liability with respect to the collection and shipment of these samples.

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

Client Contact Information
Company: CH2M HILL
Address: 5700 Cleveland St Suite 101
City/State/Zip: VA Beach, VA 23462
Phone: 757-671-6252
FAX:
Project Name: NAVFAC SJCA Site 21
Site/location: SJCA
PO # PN: 314808.FI.FK

Project Manager: Janna Staszak
Phone: 757-671-6256
Site Contact: Walt Bell
TAL Contact: Terry Wasmund

Analysis Turnaround Time
Standard (Specify) 28 days
Rush (Specify)

Sampled By: K Stokes / A Petree

4 of 4 COCs

Sample Identification	Sample Date(s)	Time Start	Time Stop	Canister Vacuum in Field, "Hg (Start)	Canister Vacuum in Field, "Hg (Stop)	Flow Controller ID	Canister ID	TO-15	TO-14A	EPA 3C	EPA 25C	ASTM D-1946	Other (Please specify in notes section)	Sample Type	Indoor Air	Ambient Air	Soil Gas	Landfill Gas	Other (Please specify in notes section)
SJS21-IA09-09D	10/24-	1300	1009	-29.5	-9	K318	6519	X							X				
SJS21-OA01-09D	10/25/09	1517	1255	-28.5	-11.5	K460	6348	X								X			
SJS21-OA02-09D	↓	1506	1222	-30	-10	K236	93289	X								X			
SJS21-OA02-09DP	↓	1506	1050	-27	-9	K391	93121	X								X			
SJS21-OA03-09D	↓	1510	1131	-29.5	-10	K392	1350	X								X			
UNUSED	—	—	—	-24.5	—	K222	6666	—	—	—	—	—	—	—	—	—	—	—	—

Sampled by :
Kim Stokes / DFW
Angie Petree / VBO

Temperature (Fahrenheit)	Interior	Ambient
Start	76 °F	74 °F
Stop	76 °F	65 °F

Pressure (inches of Hg)	Interior	Ambient
Start	n/a	29.74"
Stop	n/a	29.91

Special Instructions/QC Requirements & Comments:
Did not use Canister IDs (6666, 04190, 6365, 6647, 04307)
Did not use Flow Controller IDs (K222, K300, K314, K175, K352)

Canisters Shipped by: Kimberly Stokes	Date/Time: 10/25/09	Canisters Received by:
Samples Relinquished by: Kimberly Stokes	Date/Time: 10/25/09	Received by:
Relinquished by:	Date/Time:	Received by:

Attachment E
Data Quality Evaluation

Data Quality Evaluation

1 Data Quality Assessment

This data quality evaluation assesses the effect of the overall analytical process on the "availability" of the analytical data. "Availability" in this context refers to whether results can be used by the project team based on their analytical soundness. If a result is analytically sound, it is available for use by the project team.

The three major categories of data evaluation are laboratory performance, field collection performance (i.e. field duplicates), and matrix interferences. Evaluation of laboratory performance is a check for the laboratory's compliance with the method requirements. Additionally, an independent, third-party validator conducted a review of the laboratory data to assess whether the analytical methods were within required control limits at the time of analysis. Evaluation of potential matrix interferences involved the review of several areas of results, including surrogate spike recoveries and duplicate sample results. Evaluation of field collection performance, such as field duplicates, involves the review of field quality control (QC) and the determination of their effect on the sample results. Field blanks, equipment blanks, or trip blanks were not necessary for this project according to the Site 21 Vapor Intrusion Investigation UFP-SAP (CH2M HILL, 2009).

The data evaluation and validation is a multitiered approach. The process begins with an internal laboratory review, continues with an independent review by a third-party validator, and ends with an overall review by the Navy contractor project chemistry team. While only the data validator is allowed to apply qualifiers to the data, the process provides a medium for essential communication between the laboratory, validator, and project team, and allows for data quality to be thoroughly evaluated.

1.1 Laboratory Internal Quality Control Review

Prior to releasing the analytical data, the laboratory reviewed both the sample and QC data to verify sample identity, instrument calibration, quantitation limits, dilution factors, numerical computations, accuracy of transcriptions, and chemical interpretations. The laboratory referred to its in-house standard operating procedures (SOPs) and the limits agreed to in the UFP-SAP in order to define a laboratory QC exceedance. The SOPs were based on Department of Defense requirements, the requested analytical method, and accumulated laboratory experience. If a laboratory QC exceedance occurred, the situation was reviewed by the appropriate personnel to determine whether it was acceptable or it required further action by the laboratory.

In addition, the QC data were tabulated and the results reviewed to determine whether they were within the contract-required limits for accuracy and precision. There were no nonconforming data associated with this data package. Had there been any, nonconforming data would have been discussed in the data package cover letter and case narrative.

1.2 Data Validation

An independent data validator reviewed all data packages using the validation criteria outlined in the UFP-SAP. Analytical methods and laboratory SOPs presented in the sampling and analysis plan (SAP) were used to evaluate compliance against quality assurance (QA)/QC criteria. If adherence to QA/QC criteria yielded deficiencies, data was considered for qualification. The data qualifiers were those presented in "Region III Modifications to National Functional Guidelines for Organic Data Review" (October 1994). These guidelines were not used for data validation; however, the specific qualifiers listed therein may have been applied to data should nonconformances against the QA/QC criteria, as presented in the SAP, be identified.

The data validation process was specifically focused on the effects of the laboratory's performance and sample matrix on the analytical results. Areas of review consisted of holding time compliance, surrogate recovery accuracy, method blank contamination, initial and continuing calibration accuracy and precision, laboratory control sample accuracy, internal standard response and retention time accuracy, instrument tune criteria accuracy, and duplicate sample precision (laboratory and field duplicates). Additionally, the analytical spectrum and raw data output were reviewed and 10 percent of the laboratory results were recalculated from the raw data to verify final laboratory identification and quantitation.

When multiple analyses were performed, the analytical run with the lowest quantitation limits was selected by the validator if the QC criteria were met for that analysis. If a sample was analyzed more than once as a result of concentrations exceeding the calibration range, the data validator selected results from the appropriate dilution. The data validator examined each data point and determined any effects that QC exceedances may have had.

1.3 Primary Data Validation Qualifiers

The following data validation qualifiers were applied to one or more analytical results:

- **U**—not detected. Sample was analyzed for this parameter, but it was not detected at greater than the reported quantitation limit.
- **J**—concentration estimated. The parameter was positively identified and the associated numerical value is the approximate concentration of the parameter in the sample.
- **[No qualifier present]**—detected. Qualification was not warranted.

1.4 Data Validation Qualification Codes

Data validation qualification codes are used to supplement the primary DV qualifiers; they give a more detailed reason for the qualification of a particular result. The following data validation qualification codes were applied to one or more analytical results resulting in the following combinations:

DV Qualifier	DV Qualification Code	Data Point Count	Percent	Available as Reported	Available as Qualified	Explanation
U	CLEAR	153	68.3	X	—	Constituent was analyzed for but not detected. Further qualification was not necessary (no QA/QC exceedances). The result is usable as a nondetect at the reported quantitation limit.
J	FD	2	0.9	—	X	Constituent was analyzed for and detected. The result was J-qualified as "estimated" due to poor field duplicate reproducibility (as defined by the UFP-SAP; > 35% relative percent difference). The result is usable as detected. Thus, there is no impact on the availability of data for use by the project team.
CLEAR	CLEAR	69	30.8	X	—	Constituent was analyzed for and detected. Further qualification was not necessary (no QA/QC exceedances). The result is usable as detected at the concentration reported.
	Total:	224	100.0	100.0		

2 Data Quality Evaluation

The purpose of this data quality evaluation is to summarize the findings of the data validation and any effects on the availability of the data for the both phases of the vapor intrusion investigation at Site 21 as well as to provide an assessment of data usability. All samples were analyzed by EPA method TO-15. The data packages were reviewed by an independent data validator using the analytical method and USEPA Region III Modifications to the National Functional Guidelines.

The laboratory utilized qualifiers to represent “nondetect” and “detected.” The data validator utilized U-qualifiers to represent “nondetect.” U-qualified results are available for use as qualified. Detected results are represented by “clear” in the tables below.

The J-qualification of results has no adverse effect on the availability of that result to the project team for making decisions. J-qualified results are available, at the reported concentration, for use as detects as long as they are considered “estimated” by the project team. Human health risk assessment guidance suggests that these qualifiers “indicate uncertainty in the reported concentration of the chemical, but not in its assigned identity. Therefore, these data can be used just as positive data with no qualifiers or codes.” In

addition, one should use "J-qualified concentrations the same way as positive data that do not have this qualifier."[1]

There were no additional qualifications applied by the validator for this data.

2.1 Phase 1 Sampling

This evaluation assesses the analytical results of the samples collected on August 21, 2009.

2.1.1 Subslab Vapor Data

Sixty-three distinct data points were generated. There were no rejected results. The volatile organic compounds (VOCs) data set is 100 percent complete (all results are available for use). The validation process resulted in the following qualifiers for results in the volatiles fraction:

DV Qualifier	DV Qualification Code	Data Point Count	Percent
CLEAR	CLEAR	25	39.7
U	CLEAR	38	60.3
		63	100.0

2.2 Phase 2 Sampling

This evaluation assesses the analytical results of the samples collected on October 25, 2009.

2.2.1 Subslab Vapor Data

Sixty-three distinct data points were generated. A total of two results were J-qualified as "estimated" because the relative percent difference between the parent sample and field duplicate was greater than the control limit of 35 percent, which was defined in the UFP-SAP. The J-qualification of detects does not affect the availability of results because they are available for use as detects at the reported concentration. There were no rejected results. The VOCs data set is 100 percent complete (all results are available for use). The validation process resulted in the following qualifiers for results in the VOCs fraction:

DV Qualifier	DV Qualification Code	Data Point Count	Percent
CLEAR	CLEAR	24	38.1
J	FD	2	3.2
U	CLEAR	37	58.7
		63	100.0

[1] "Risk Assessment Guidance for Superfund: Volume I— Human Health Evaluation Manual." (Part A) *EPA/540/1-89/002*. Office of Emergency and Remedial Response, U.S. Environmental Protection Agency, Washington, D.C. 1989.

2.2.2 Indoor Air Data

Seventy distinct data points were generated. There were no rejected results. The VOCs data set is 100 percent complete (all results are available for use). The validation process resulted in the following qualifiers for results in the volatiles fraction:

DV Qualifier	DV Qualification Code	Data Point Count	Percent
CLEAR	CLEAR	17	24.3
U	CLEAR	53	75.7
		70	100.0

2.2.3 Outdoor Air Data

Twenty-eight distinct data points were generated. There were no rejected results. The VOCs data set is 100 percent complete (all results are available for use). The validation process resulted in the following qualifiers for results in the volatiles fraction:

DV Qualifier	DV Qualification Code	Data Point Count	Percent
CLEAR	CLEAR	5	17.9
U	CLEAR	23	82.1
		28	100.0

3 Overall Assessment

All data collected during Phase 1 and Phase 2 of the Site 21 vapor intrusion investigation are found to be of exceptional quality. No data was rejected due to QA/QC deficiencies and 100 percent of the data is available for use by the project team.

Attachment F
Data Validation Summary Report

ENVIRONMENTAL
Data Services, Inc.

VOLATILE ORGANIC COMPOUNDS
USEPA Region III - Level IV Review

Site: St. Julien's Creek Annex, Site 21, CTO-057 SDG #: H9H290101

Client: CH2M HILL, Inc., Virginia Beach, Virginia Date: October 15, 2009

Laboratory: Test America Laboratories, Knoxville, Tennessee Reviewer: Nancy Weaver

EDS ID	Client Sample ID	Laboratory Sample ID	Matrix
1	SJS21-SV01-09C	H9H290101-001	Air
2	SJS21-SV02-09C	H9H290101-002	Air
3	SJS21-SV02P-09C	H9H290101-003	Air
4	SJS21-SV03-09C	H9H290101-004	Air
5	SJS21-SV04-09C	H9H290101-005	Air
6	SJS21-SV05-09C	H9H290101-006	Air
7	SJS21-SV06-09C	H9H290101-007	Air
8	SJS21-SV07-09C	H9H290101-008	Air
9	SJS21-SV07-09C	H9H290101-009	Air

The USEPA "Region III Modifications to the National Functional Guidelines for Organic Data Review", September 1994, was used in evaluating the data in this summary report.

Holding Times - All samples were analyzed within 30 days for air samples.

GC/MS Tuning - All of the BFB tunes in the initial and continuing calibrations met the percent relative abundance criteria.

Initial Calibration - The initial calibrations exhibited acceptable %RSD and mean RRF values.

Continuing Calibration - The continuing calibrations exhibited acceptable %D and RRF values.

MS/MSD - A MS/MSD sample was not analyzed.

Laboratory Control Sample - The LCS samples exhibited acceptable %R values.

1156 Jamestown Road, Suite A • Williamsburg, Virginia 23185 • Telephone: 757-564-0090 • Fax: 757-564-0086 • www.env-data.com

Internal Standard (IS) Area Performance - All internal standards met response and retention time (RT) criteria.

Method Blank - The method blanks were free of contamination.

Field, Equipment Blank - Field QC samples were not included in this data package.

Field Duplicates - Field duplicate results are summarized below.

Compound	SJS21-SV02-09C ppb (v/v)	SJS21-SV02P-09C ppb (v/v)	RPD	Qualifier
Trichloroethene	170	220	26%	None
cis-1,2-Dichloroethene	7.6	8.8	15%	None
trans-1,2-Dichloroethene	2.3	2.5	8%	None

Compound Quantitation - All criteria were met.

CH2M Hill Inc

Client Sample ID: SJS21-SV01-09C

GC/MS Volatiles

Lot-Sample #	H9H290101 - 001	**Work Order #**	LJ16T1AA	**Matrix.....:**	AIR

Date Sampled...:	08/21/2009	**Date Received..:**	08/28/2009
Prep Date.....:	08/31/2009	**Analysis Date...**	08/31/2009
Prep Batch #.....:	9244068		
Dilution Factor.:	1	**Method.....:**	TO-15

PARAMETER	RESULTS (ppb(v/v))	REPORTING LIMIT (ppb(v/v))	RESULTS (ug/m3)	REPORTING LIMIT (ug/m3)
Trichloroethene	**0.58**	**0.20**	**3.1**	**1.1**
Vinyl chloride	ND	0.20	ND	0.51
Dichlorodifluoromethane	**0.31**	**0.20**	**1.5**	**0.99**
1,2-Dichloroethane	ND	0.20	ND	0.81
1,1-Dichloroethene	ND	0.20	ND	0.79
cis-1,2-Dichloroethene	ND	0.20	ND	0.79
trans-1,2-Dichloroethene	ND	0.20	ND	0.79

SURROGATE	PERCENT RECOVERY	LABORATORY CONTROL LIMITS (%)
4-Bromofluorobenzene	94	60 - 140

The 'Result' in ug/m3 is calculated using the following equation: Amount Found(before rounding)*(Molecular Weight/24.45)

The 'Reporting Limit' in ug/m3 is calculated using the following equation: (Reporting Limit(before rounding) * Dilution Factor) * (Molecular Weight/24.45)

lw
10/15/09

CH2M Hill Inc

Client Sample ID: SJS21-SV02-09C

GC/MS Volatiles

Lot-Sample # H9H290101 - 002 **Work Order #** LJ16V1AA **Matrix.....:** AIR

Date Sampled...: 08/21/2009 **Date Received..:** 08/28/2009
Prep Date.....: 08/31/2009 **Analysis Date...** 09/01/2009
Prep Batch #.....: 9244068
Dilution Factor.: 5.9 **Method.....:** TO-15

PARAMETER	RESULTS (ppb(v/v))	REPORTING LIMIT (ppb(v/v))	RESULTS (ug/m3)	REPORTING LIMIT (ug/m3)
Trichloroethene	**170**	**1.2**	**890**	**6.3**
Vinyl chloride	ND	1.2	ND	3.0
Dichlorodifluoromethane	ND	1.2	ND	5.8
1,2-Dichloroethane	ND	1.2	ND	4.8
1,1-Dichloroethene	ND	1.2	ND	4.7
cis-1,2-Dichloroethene	**7.6**	**1.2**	**30**	**4.7**
trans-1,2-Dichloroethene	**2.3**	**1.2**	**9.1**	**4.7**

SURROGATE	PERCENT RECOVERY	LABORATORY CONTROL LIMITS (%)
4-Bromofluorobenzene	88	60 - 140

The 'Result' in ug/m3 is calculated using the following equation: Amount Found(before rounding)*(Molecular Weight/24.45)

The 'Reporting Limit' in ug/m3 is calculated using the following equation: (Reporting Limit(before rounding) * Dilution Factor) * (Molecular Weight/24.45)

MW
10/15/09

CH2M Hill Inc

Client Sample ID: SJS21-SV02P-09C

GC/MS Volatiles

Lot-Sample #	H9H290101 - 003	Work Order #	LJ16W1AA	Matrix.....:	AIR

Date Sampled...:	08/21/2009	Date Received..:	08/28/2009
Prep Date.....:	08/31/2009	Analysis Date...	09/01/2009
Prep Batch #.....:	9244068		
Dilution Factor.:	6.54	Method.....:	TO-15

PARAMETER	RESULTS (ppb(v/v))	REPORTING LIMIT (ppb(v/v))	RESULTS (ug/m3)	REPORTING LIMIT (ug/m3)
Trichloroethene	**220**	**1.3**	**1200**	**7.0**
Vinyl chloride	ND	1.3	ND	3.3
Dichlorodifluoromethane	ND	1.3	ND	6.5
1,2-Dichloroethane	ND	1.3	ND	5.3
1,1-Dichloroethene	ND	1.3	ND	5.2
cis-1,2-Dichloroethene	**8.8**	**1.3**	**35**	**5.2**
trans-1,2-Dichloroethene	**2.5**	**1.3**	**10**	**5.2**

SURROGATE	PERCENT RECOVERY	LABORATORY CONTROL LIMITS (%)
4-Bromofluorobenzene	91	60 - 140

The 'Result' in ug/m3 is calculated using the following equation: Amount Found(before rounding)*(Molecular Weight/24.45)

The 'Reporting Limit' in ug/m3 is calculated using the following equation: (Reporting Limit(before rounding) * Dilution Factor) * (Molecular Weight/24.45)

MW
10/15/09

CH2M Hill Inc

Client Sample ID: SJS21-SV03-09C

GC/MS Volatiles

Lot-Sample #	H9H290101 - 004	**Work Order #**	LJ16X1AA	**Matrix.....:**	AIR

Date Sampled...:	08/21/2009	**Date Received..:**	08/28/2009
Prep Date.....:	09/02/2009	**Analysis Date...**	09/02/2009
Prep Batch #.....:	9246165		
Dilution Factor.:	1	**Method.....:**	TO-15

PARAMETER	RESULTS (ppb(v/v))	REPORTING LIMIT (ppb(v/v))	RESULTS (ug/m3)	REPORTING LIMIT (ug/m3)
Trichloroethene	**8.4**	**0.20**	**45**	**1.1**
Vinyl chloride	ND	0.20	ND	0.51
Dichlorodifluoromethane	ND	0.20	ND	0.99
1,2-Dichloroethane	ND	0.20	ND	0.81
1,1-Dichloroethene	ND	0.20	ND	0.79
cis-1,2-Dichloroethene	ND	0.20	ND	0.79
trans-1,2-Dichloroethene	0.25	0.20	0.98	0.79

SURROGATE	PERCENT RECOVERY	LABORATORY CONTROL LIMITS (%)
4-Bromofluorobenzene	96	60 - 140

The 'Result' in ug/m3 is calculated using the following equation: Amount Found(before rounding)*(Molecular Weight/24.45)

The 'Reporting Limit' in ug/m3 is calculated using the following equation: (Reporting Limit(before rounding) * Dilution Factor) * (Molecular Weight/24.45)

MW
10/15/09

CH2M Hill Inc

Client Sample ID: SJS21-SV04-09C

GC/MS Volatiles

Lot-Sample #	H9H290101 - 005	**Work Order #**	LJ1601AA	**Matrix.....:**	AIR

Date Sampled...:	08/21/2009	**Date Received..:**	08/28/2009
Prep Date.....:	08/31/2009	**Analysis Date...**	08/31/2009
Prep Batch #.....:	9244068		
Dilution Factor.:	1	**Method.....:**	TO-15

PARAMETER	RESULTS (ppb(v/v))	REPORTING LIMIT (ppb(v/v))	RESULTS (ug/m3)	REPORTING LIMIT (ug/m3)
Trichloroethene	**2.0**	**0.20**	**11**	**1.1**
Vinyl chloride	ND	0.20	ND	0.51
Dichlorodifluoromethane	**0.37**	**0.20**	**1.8**	**0.99**
1,2-Dichloroethane	ND	0.20	ND	0.81
1,1-Dichloroethene	ND	0.20	ND	0.79
cis-1,2-Dichloroethene	**1.9**	**0.20**	**7.7**	**0.79**
trans-1,2-Dichloroethene	**0.78**	**0.20**	**3.1**	**0.79**

SURROGATE	PERCENT RECOVERY	LABORATORY CONTROL LIMITS (%)
4-Bromofluorobenzene	99	60 - 140

The 'Result' in ug/m3 is calculated using the following equation: Amount Found(before rounding)*(Molecular Weight/24.45)

The 'Reporting Limit' in ug/m3 is calculated using the following equation: (Reporting Limit(before rounding) * Dilution Factor) * (Molecular Weight/24.45)

MW 10/15/09

CH2M Hill Inc

Client Sample ID: SJS21-SV05-09C

GC/MS Volatiles

Lot-Sample #	H9H290101 - 006	Work Order #	LJ1611AA	Matrix.....:	AIR

Date Sampled...:	08/21/2009	Date Received..:	08/28/2009
Prep Date.....:	08/31/2009	Analysis Date...	08/31/2009
Prep Batch #.....:	9244068		
Dilution Factor.:	1	Method.....:	TO-15

PARAMETER	RESULTS (ppb(v/v))	REPORTING LIMIT (ppb(v/v))	RESULTS (ug/m3)	REPORTING LIMIT (ug/m3)
Trichloroethene	**0.83**	**0.20**	**4.5**	**1.1**
Vinyl chloride	ND	0.20	ND	0.51
Dichlorodifluoromethane	**0.27**	**0.20**	**1.3**	**0.99**
1,2-Dichloroethane	ND	0.20	ND	0.81
1,1-Dichloroethene	ND	0.20	ND	0.79
cis-1,2-Dichloroethene	ND	0.20	ND	0.79
trans-1,2-Dichloroethene	ND	0.20	ND	0.79

SURROGATE	PERCENT RECOVERY	LABORATORY CONTROL LIMITS (%)
4-Bromofluorobenzene	97	60 - 140

The 'Result' in ug/m3 is calculated using the following equation: Amount Found(before rounding)*(Molecular Weight/24.45)

The 'Reporting Limit' in ug/m3 is calculated using the following equation: (Reporting Limit(before rounding) * Dilution Factor) * (Molecular Weight/24.45)

MW 10/15/09

CH2M Hill Inc

Client Sample ID: SJS21-SV06-09C

GC/MS Volatiles

Lot-Sample #	H9H290101 - 007	**Work Order #**	LJ1621AA	**Matrix.....:**	AIR

Date Sampled...:	08/21/2009	**Date Received..:**	08/28/2009
Prep Date.....:	08/31/2009	**Analysis Date...**	08/31/2009
Prep Batch #.....:	9244068		
Dilution Factor.:	10	**Method.....:**	TO-15

PARAMETER	RESULTS (ppb(v/v))	REPORTING LIMIT (ppb(v/v))	RESULTS (ug/m3)	REPORTING LIMIT (ug/m3)
Trichloroethene	**270**	**2.0**	**1400**	**11**
Vinyl chloride	ND	2.0	ND	5.1
Dichlorodifluoromethane	ND	2.0	ND	9.9
1,2-Dichloroethane	ND	2.0	ND	8.1
1,1-Dichloroethene	ND	2.0	ND	7.9
cis-1,2-Dichloroethene	**24**	**2.0**	**95**	**7.9**
trans-1,2-Dichloroethene	ND	2.0	ND	7.9

SURROGATE	PERCENT RECOVERY	LABORATORY CONTROL LIMITS (%)
4-Bromofluorobenzene	106	60 - 140

The 'Result' in ug/m3 is calculated using the following equation: Amount Found(before rounding)*(Molecular Weight/24.45)

The 'Reporting Limit' in ug/m3 is calculated using the following equation: (Reporting Limit(before rounding) * Dilution Factor) * (Molecular Weight/24.45)

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CH2M Hill Inc

Client Sample ID: SJS21-SV07-09C

GC/MS Volatiles

Lot-Sample #	H9H290101 - 008	Work Order #	LJ1631AA	Matrix.....:	AIR

Date Sampled...:	08/21/2009	Date Received..:	08/28/2009
Prep Date.....:	08/31/2009	Analysis Date...	09/01/2009
Prep Batch #.....:	9244068		
Dilution Factor.:	1	Method.....:	TO-15

PARAMETER	RESULTS (ppb(v/v))	REPORTING LIMIT (ppb(v/v))	RESULTS (ug/m3)	REPORTING LIMIT (ug/m3)
Trichloroethene	**27**	**0.20**	**140**	**1.1**
Vinyl chloride	ND	0.20	ND	0.51
Dichlorodifluoromethane	**0.42**	**0.20**	**2.1**	**0.99**
1,2-Dichloroethane	ND	0.20	ND	0.81
1,1-Dichloroethene	ND	0.20	ND	0.79
cis-1,2-Dichloroethene	**5.8**	**0.20**	**23**	**0.79**
trans-1,2-Dichloroethene	**0.30**	**0.20**	**1.2**	**0.79**

SURROGATE	PERCENT RECOVERY	LABORATORY CONTROL LIMITS (%)
4-Bromofluorobenzene	95	60 - 140

The 'Result' in ug/m3 is calculated using the following equation: Amount Found(before rounding)*(Molecular Weight/24.45)

The 'Reporting Limit' in ug/m3 is calculated using the following equation: (Reporting Limit(before rounding) * Dilution Factor) * (Molecular Weight/24.45)

lw 10/15/09

CH2M Hill Inc

Client Sample ID: SJS21-SV08-09C

GC/MS Volatiles

Lot-Sample #	H9H290101 - 009	**Work Order #**	LJ1641AA	**Matrix.....:**	AIR

Date Sampled...:	08/21/2009	**Date Received..:**	08/28/2009
Prep Date.....:	08/31/2009	**Analysis Date...**	09/01/2009
Prep Batch #.....:	9244068		
Dilution Factor.:	1	**Method.....:**	TO-15

PARAMETER	RESULTS (ppb(v/v))	REPORTING LIMIT (ppb(v/v))	RESULTS (ug/m3)	REPORTING LIMIT (ug/m3)
Trichloroethene	**50**	**0.20**	**270**	**1.1**
Vinyl chloride	ND	0.20	ND	0.51
Dichlorodifluoromethane	**0.39**	**0.20**	**1.9**	**0.99**
1,2-Dichloroethane	ND	0.20	ND	0.81
1,1-Dichloroethene	ND	0.20	ND	0.79
cis-1,2-Dichloroethene	**14**	**0.20**	**57**	**0.79**
trans-1,2-Dichloroethene	ND	0.20	ND	0.79

SURROGATE	PERCENT RECOVERY	LABORATORY CONTROL LIMITS (%)
4-Bromofluorobenzene	93	60 - 140

The 'Result' in ug/m3 is calculated using the following equation: Amount Found(before rounding)*(Molecular Weight/24.45)

The 'Reporting Limit' in ug/m3 is calculated using the following equation: (Reporting Limit(before rounding) * Dilution Factor) * (Molecular Weight/24.45)

MW
10/15/09

ENVIRONMENTAL
Data Services, Inc.

VOLATILE ORGANIC COMPOUNDS
USEPA Region III - Level IV Review

Site: St. Julien's Creek Annex, Site 21, CTO-057 SDG #: H9J280205

Client: CH2M HILL, Inc., Virginia Beach, Virginia Date: January 18, 2010

Laboratory: Test America Laboratories, Knoxville, Tennessee Reviewer: Nancy Weaver

EDS ID	Client Sample ID	Laboratory Sample ID	Matrix
1	SJS21-SV01-09D	H9J280205-001	Air
2	SJS21-IA01-09D	H9J280205-002	Air
3	SJS21-SV02-09D	H9J280205-003	Air
3DL	SJS21-SV02-09DDL	H9J280205-003DL	Air
4	SJS21-SV02P-09D	H9J280205-004	Air
4DL	SJS21-SV02P-09DDL	H9J280205-004DL	Air
5	SJS21-IA02-09D	H9J280205-005	Air
6	SJS21-IA02P-09D	H9J280205-006	Air
7	SJS21-SV03-09D	H9J280205-007	Air
8	SJS21-IA03-09D	H9J280205-008	Air
9	SJS21-SV04-09D	H9J280205-009	Air
10	SJS21-IA04-09D	H9J280205-010	Air
11	SJS21-SV05-09D	H9J280205-011	Air
12	SJS21-IA05-09D	H9J280205-012	Air
13	SJS21-SV06-09D	H9J280205-013	Air
14	SJS21-IA06-09D	H9J280205-014	Air
15	SJS21-SV07-09D	H9J280205-015	Air
16	SJS21-IA07-09D	H9J280205-016	Air
17	SJS21-SV08-09D	H9J280205-017	Air
18	SJS21-IA08-09D	H9J280205-018	Air
19	SJS21-IA09-09D	H9J280205-019	Air
20	SJS21-AA01-09D	H9J280205-020	Air
21	SJS21-AA02-09D	H9J280205-021	Air
22	SJS21-AA02P-09D	H9J280205-022	Air
23	SJS21-AA03-09D	H9J280205-023	Air

The USEPA "Region III Modifications to the National Functional Guidelines for Organic Data Review", September 1994, was used in evaluating the data in this summary report.

Holding Times - All samples were analyzed within 30 days for air samples.

GC/MS Tuning - All of the BFB tunes in the initial and continuing calibrations met the percent relative abundance criteria.

Initial Calibration - The initial calibrations exhibited acceptable %RSD and mean RRF values.

Continuing Calibration - The continuing calibrations exhibited acceptable %D and RRF values.

MS/MSD - A MS/MSD sample was not analyzed.

Laboratory Control Sample - The LCS samples exhibited acceptable %R values.

Internal Standard (IS) Area Performance - All internal standards met response and retention time (RT) criteria.

Method Blank - The method blanks were free of contamination.

Field, Equipment Blank - Field QC samples were not included in this data package.

Field Duplicates - Field duplicate results are summarized below.

Compound	SJS21-SV02-09D ug/m^3	SJS21-SV02P-09D ug/m^3	RPD	Qualifier
Trichloroethene	820	1400	52%	None
cis-1,2-Dichloroethene	31	36	15%	None
trans-1,2-Dichloroethene	7.2	8.3	14%	None

Compound	SJS21-IA02-09D ug/m^3	SJS21-IA02P-09D ug/m^3	RPD	Qualifier
Trichloroethene	0.43	0.50	15%	None
Dichlorodifluoromethane	2.5	2.5	0%	None

Compound	SJS21-AA02-09D ug/m^3	SJS21-AA02P-09D ug/m^3	RPD	Qualifier
Dichlorodifluoromethane	3.0	2.9	3%	None

Compound Quantitation - EDS sample ID#s 3 and 4 exhibited high concentrations of trichloroethene over the instrument calibration range and were flagged (E) by the laboratory. The samples were diluted and reanalyzed and the dilution results for TCE should be used for reporting purposes.

CH2M Hill Inc

Client Sample ID: SJS21-SV01-09D

GC/MS Volatiles

Lot-Sample #	H9J280205 - 001	**Work Order #**	LNENW1AA	**Matrix.....:**	AIR

Date Sampled...:	10/25/2009	**Date Received..:**	10/28/2009
Prep Date.....:	10/30/2009	**Analysis Date...**	10/30/2009
Prep Batch #.....:	9306129		
Dilution Factor.:	1	**Method.....:**	TO-15

PARAMETER	RESULTS (ppb(v/v))	REPORTING LIMIT (ppb(v/v))	RESULTS (ug/m3)	REPORTING LIMIT (ug/m3)
Trichloroethene	**3.4**	**0.20**	**18**	**1.1**
Vinyl chloride	ND	0.20	ND	0.51
Dichlorodifluoromethane	ND	0.20	ND	0.99
1,2-Dichloroethane	ND	0.20	ND	0.81
1,1-Dichloroethene	ND	0.20	ND	0.79
cis-1,2-Dichloroethene	ND	0.20	ND	0.79
trans-1,2-Dichloroethene	ND	0.20	ND	0.79

SURROGATE	PERCENT RECOVERY	LABORATORY CONTROL LIMITS (%)
4-Bromofluorobenzene	102	60 - 140

The 'Result' in ug/m3 is calculated using the following equation: Amount Found(before rounding)*(Molecular Weight/24.45)

The 'Reporting Limit' in ug/m3 is calculated using the following equation: (Reporting Limit(before rounding) * Dilution Factor) * (Molecular Weight/24.45)

MW
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2

CH2M Hill Inc

Client Sample ID: SJS21-IA01-09D

GC/MS Volatiles

Lot-Sample #	H9J280205 - 002	**Work Order #**	LNEN11AA	**Matrix.....:**	AIR

Date Sampled...:	10/25/2009	**Date Received..:**	10/28/2009
Prep Date.....:	10/30/2009	**Analysis Date...**	10/30/2009
Prep Batch #.....:	9306133		
Dilution Factor.:	1	**Method.....:**	TO-15

PARAMETER	RESULTS (ppb(v/v))	REPORTING LIMIT (ppb(v/v))	RESULTS (ug/m3)	REPORTING LIMIT (ug/m3)
Trichloroethene	**0.092**	**0.040**	**0.49**	**0.21**
Vinyl chloride	ND	0.080	ND	0.20
Dichlorodifluoromethane	**0.55**	**0.080**	**2.7**	**0.40**
1,2-Dichloroethane	ND	0.080	ND	0.32
1,1-Dichloroethene	ND	0.080	ND	0.32
cis-1,2-Dichloroethene	ND	0.080	ND	0.32
trans-1,2-Dichloroethene	ND	0.080	ND	0.32

SURROGATE	PERCENT RECOVERY	LABORATORY CONTROL LIMITS (%)
4-Bromofluorobenzene	101	60 - 140

The 'Result' in ug/m3 is calculated using the following equation: Amount Found(before rounding)*(Molecular Weight/24.45)

The 'Reporting Limit' in ug/m3 is calculated using the following equation: (Reporting Limit(before rounding) * Dilution Factor) * (Molecular Weight/24.45)

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3

CH2M Hill Inc

Client Sample ID: SJS21-SV02-09D

GC/MS Volatiles

Lot-Sample #	H9J280205 - 003	**Work Order #**	LNEN51AA	**Matrix.....:**	AIR

Date Sampled...:	10/25/2009	**Date Received..:**	10/28/2009
Prep Date.....:	10/30/2009	**Analysis Date...**	10/30/2009
Prep Batch #.....:	9306129		
Dilution Factor.:	1	**Method.....:**	TO-15

PARAMETER	RESULTS (ppb(v/v))	REPORTING LIMIT (ppb(v/v))	RESULTS (ug/m3)	REPORTING LIMIT (ug/m3)
Trichloroethene	150 ~~110~~	0.80 ~~0.20~~	820 ~~610~~	~~E~~ 4.3 ~~1.1~~
Vinyl chloride	ND	0.20	ND	0.51
Dichlorodifluoromethane	ND	0.20	ND	0.99
1,2-Dichloroethane	ND	0.20	ND	0.81
1,1-Dichloroethene	ND	0.20	ND	0.79
cis-1,2-Dichloroethene	**7.9**	**0.20**	**31**	**0.79**
trans-1,2-Dichloroethene	**1.8**	**0.20**	**7.2**	**0.79**

SURROGATE	PERCENT RECOVERY	LABORATORY CONTROL LIMITS (%)
4-Bromofluorobenzene	102	60 - 140

Qualifiers

E	Estimated result. Result concentration exceeds the calibration range.

The 'Result' in ug/m3 is calculated using the following equation: Amount Found(before rounding)*(Molecular Weight/24.45)

The 'Reporting Limit' in ug/m3 is calculated using the following equation: (Reporting Limit(before rounding) * Dilution Factor) * (Molecular Weight/24.45)

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3DL

CH2M Hill Inc

Client Sample ID: SJS21-SV02-09D

GC/MS Volatiles

Lot-Sample #	H9J280205 - 003	**Work Order #**	LNEN52AA	**Matrix.....:**	AIR
Date Sampled...:	10/25/2009	**Date Received..:**	10/28/2009		
Prep Date.....:	10/30/2009	**Analysis Date...**	10/30/2009		
Prep Batch #.....:	9306138				
Dilution Factor.:	4	**Method.....:**	TO-15		

Use original results

PARAMETER	RESULTS (ppb(v/v))	REPORTING LIMIT (ppb(v/v))	RESULTS (ug/m3)		REPORTING LIMIT (ug/m3)
Trichloroethene	150	0.80	820	~~D~~	4.3

SURROGATE	PERCENT RECOVERY	LABORATORY CONTROL LIMITS (%)
4-Bromofluorobenzene	104	60 - 140

exclude

Qualifiers

D Result was obtained from the analysis of a dilution.

The 'Result' in ug/m3 is calculated using the following equation: Amount Found(before rounding)*(Molecular Weight/24.45)

The 'Reporting Limit' in ug/m3 is calculated using the following equation: (Reporting Limit(before rounding) * Dilution Factor) * (Molecular Weight/24.45)

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4

CH2M Hill Inc

Client Sample ID: SJS21-SV02P-09D

GC/MS Volatiles

Lot-Sample # H9J280205 - 004 **Work Order #** LNEN81AA **Matrix.....:** AIR

Date Sampled...: 10/25/2009 **Date Received..:** 10/28/2009
Prep Date.....: 10/30/2009 **Analysis Date...** 10/30/2009
Prep Batch #.....: 9306129
Dilution Factor.: 1 **Method.....:** TO-15

PARAMETER	RESULTS (ppb(v/v))	REPORTING LIMIT (ppb(v/v))	RESULTS (ug/m3)	REPORTING LIMIT (ug/m3)
Trichloroethene	260 ~~110~~	1.1 ~~0.20~~	1400 ~~610~~ ~~E~~	6.1 ~~1.1~~
Vinyl chloride	ND	0.20	ND	0.51
Dichlorodifluoromethane	ND	0.20	ND	0.99
1,2-Dichloroethane	ND	0.20	ND	0.81
1,1-Dichloroethene	ND	0.20	ND	0.79
cis-1,2-Dichloroethene	**9.2**	**0.20**	**36**	**0.79**
trans-1,2-Dichloroethene	**2.1**	**0.20**	**8.3**	**0.79**

SURROGATE	PERCENT RECOVERY	LABORATORY CONTROL LIMITS (%)
4-Bromofluorobenzene	101	60 - 140

Qualifiers

E Estimated result. Result concentration exceeds the calibration range.

The 'Result' in ug/m3 is calculated using the following equation: Amount Found(before rounding)*(Molecular Weight/24.45)

The 'Reporting Limit' in ug/m3 is calculated using the following equation: (Reporting Limit(before rounding) * Dilution Factor) * (Molecular Weight/24.45)

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4DL

CH2M Hill Inc

Client Sample ID: SJS21-SV02P-09D

GC/MS Volatiles

Lot-Sample #	H9J280205 - 004	**Work Order #**	LNEN82AA	**Matrix.....:**	AIR
Date Sampled...:	10/25/2009	**Date Received..:**	10/28/2009		
Prep Date.....:	11/02/2009	**Analysis Date...**	11/02/2009		
Prep Batch #.....:	9307136				
Dilution Factor.:	5.68	**Method.....:**	TO-15		

Use original results

PARAMETER	RESULTS (ppb(v/v))	REPORTING LIMIT (ppb(v/v))	RESULTS (ug/m3)		REPORTING LIMIT (ug/m3)
Trichloroethene	260	1.1	1400	D	6.1

SURROGATE	PERCENT RECOVERY	LABORATORY CONTROL LIMITS (%)
4-Bromofluorobenzene	104	60 - 140

exclude

Qualifiers

D Result was obtained from the analysis of a dilution.

The 'Result' in ug/m3 is calculated using the following equation: Amount Found(before rounding)*(Molecular Weight/24.45)

The 'Reporting Limit' in ug/m3 is calculated using the following equation: (Reporting Limit(before rounding) * Dilution Factor) * (Molecular Weight/24.45)

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CH2M Hill Inc

Client Sample ID: SJS21-IA02-09D

GC/MS Volatiles

Lot-Sample #	H9J280205 - 005	**Work Order #**	LNEPA1AA	**Matrix.....:**	AIR

Date Sampled...:	10/25/2009	**Date Received..:**	10/28/2009
Prep Date.....:	10/30/2009	**Analysis Date...**	10/30/2009
Prep Batch #.....:	9306133		
Dilution Factor.:	1	**Method.....:**	TO-15

PARAMETER	RESULTS (ppb(v/v))	REPORTING LIMIT (ppb(v/v))	RESULTS (ug/m3)	REPORTING LIMIT (ug/m3)
Trichloroethene	**0.079**	**0.040**	**0.43**	**0.21**
Vinyl chloride	ND	0.080	ND	0.20
Dichlorodifluoromethane	**0.50**	**0.080**	**2.5**	**0.40**
1,2-Dichloroethane	ND	0.080	ND	0.32
1,1-Dichloroethene	ND	0.080	ND	0.32
cis-1,2-Dichloroethene	ND	0.080	ND	0.32
trans-1,2-Dichloroethene	ND	0.080	ND	0.32

SURROGATE	PERCENT RECOVERY	LABORATORY CONTROL LIMITS (%)
4-Bromofluorobenzene	101	60 - 140

The 'Result' in ug/m3 is calculated using the following equation: Amount Found(before rounding)*(Molecular Weight/24.45)

The 'Reporting Limit' in ug/m3 is calculated using the following equation: (Reporting Limit(before rounding) * Dilution Factor) * (Molecular Weight/24.45)

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6

1:

CH2M Hill Inc

Client Sample ID: SAS21-IA02P-09D

GC/MS Volatiles

Lot-Sample # H9J280205 - 006 **Work Order #** LNEPE1AA **Matrix.....:** AIR

Date Sampled...: 10/25/2009 **Date Received..:** 10/28/2009
Prep Date.....: 10/30/2009 **Analysis Date...** 10/30/2009
Prep Batch #.....: 9306133
Dilution Factor.: 1 **Method.....:** TO-15

PARAMETER	RESULTS (ppb(v/v))	REPORTING LIMIT (ppb(v/v))	RESULTS (ug/m3)	REPORTING LIMIT (ug/m3)
Trichloroethene	**0.093**	**0.040**	**0.50**	**0.21**
Vinyl chloride	ND	0.080	ND	0.20
Dichlorodifluoromethane	**0.50**	**0.080**	**2.5**	**0.40**
1,2-Dichloroethane	ND	0.080	ND	0.32
1,1-Dichloroethene	ND	0.080	ND	0.32
cis-1,2-Dichloroethene	ND	0.080	ND	0.32
trans-1,2-Dichloroethene	ND	0.080	ND	0.32

SURROGATE	PERCENT RECOVERY	LABORATORY CONTROL LIMITS (%)
4-Bromofluorobenzene	98	60 - 140

The 'Result' in ug/m3 is calculated using the following equation: Amount Found(before rounding)*(Molecular Weight/24.45)

The 'Reporting Limit' in ug/m3 is calculated using the following equation: (Reporting Limit(before rounding) * Dilution Factor) * (Molecular Weight/24.45)

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CH2M Hill Inc

Client Sample ID: SJS21-SV03-09D

GC/MS Volatiles

Lot-Sample #	H9J280205 - 007	**Work Order #**	LNEPL1AA	**Matrix.....:**	AIR

Date Sampled...:	10/25/2009	**Date Received..:**	10/28/2009
Prep Date.....:	10/30/2009	**Analysis Date...**	10/30/2009
Prep Batch #.....:	9306129		
Dilution Factor.:	1	**Method.....:**	TO-15

PARAMETER	RESULTS (ppb(v/v))	REPORTING LIMIT (ppb(v/v))	RESULTS (ug/m3)	REPORTING LIMIT (ug/m3)
Trichloroethene	**13**	**0.20**	**72**	**1.1**
Vinyl chloride	ND	0.20	ND	0.51
Dichlorodifluoromethane	**0.22**	**0.20**	**1.1**	**0.99**
1,2-Dichloroethane	ND	0.20	ND	0.81
1,1-Dichloroethene	ND	0.20	ND	0.79
cis-1,2-Dichloroethene	**0.50**	**0.20**	**2.0**	**0.79**
trans-1,2-Dichloroethene	**0.40**	**0.20**	**1.6**	**0.79**

SURROGATE	PERCENT RECOVERY	LABORATORY CONTROL LIMITS (%)
4-Bromofluorobenzene	104	60 - 140

The 'Result' in ug/m3 is calculated using the following equation: Amount Found(before rounding)*(Molecular Weight/24.45)

The 'Reporting Limit' in ug/m3 is calculated using the following equation: (Reporting Limit(before rounding) * Dilution Factor) * (Molecular Weight/24.45)

NW
1/18/10

CH2M Hill Inc

Client Sample ID: SJS21-IA03-09D

GC/MS Volatiles

Lot-Sample # H9J280205 - 008 **Work Order #** LNEPT1AA **Matrix.....:** AIR

Date Sampled...: 10/25/2009 **Date Received..:** 10/28/2009
Prep Date.....: 10/30/2009 **Analysis Date...** 10/30/2009
Prep Batch #.....: 9306133
Dilution Factor.: 1 **Method.....:** TO-15

PARAMETER	RESULTS (ppb(v/v))	REPORTING LIMIT (ppb(v/v))	RESULTS (ug/m3)	REPORTING LIMIT (ug/m3)
Trichloroethene	ND	0.040	ND	0.21
Vinyl chloride	ND	0.080	ND	0.20
Dichlorodifluoromethane	**0.51**	**0.080**	**2.5**	**0.40**
1,2-Dichloroethane	ND	0.080	ND	0.32
1,1-Dichloroethene	ND	0.080	ND	0.32
cis-1,2-Dichloroethene	ND	0.080	ND	0.32
trans-1,2-Dichloroethene	ND	0.080	ND	0.32

SURROGATE	PERCENT RECOVERY	LABORATORY CONTROL LIMITS (%)
4-Bromofluorobenzene	101	60 - 140

The 'Result' in ug/m3 is calculated using the following equation: Amount Found(before rounding)*(Molecular Weight/24.45)

The 'Reporting Limit' in ug/m3 is calculated using the following equation: (Reporting Limit(before rounding) * Dilution Factor) * (Molecular Weight/24.45)

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CH2M Hill Inc

Client Sample ID: SJS21-SV04-09D

GC/MS Volatiles

Lot-Sample # H9J280205 - 009 **Work Order #** LNEP11AA **Matrix.....:** AIR

Date Sampled...: 10/25/2009 **Date Received..:** 10/28/2009
Prep Date.....: 10/30/2009 **Analysis Date...** 10/30/2009
Prep Batch #.....: 9306129
Dilution Factor.: 1 **Method.....:** TO-15

PARAMETER	RESULTS (ppb(v/v))	REPORTING LIMIT (ppb(v/v))	RESULTS (ug/m3)	REPORTING LIMIT (ug/m3)
Trichloroethene	**1.8**	**0.20**	**9.7**	**1.1**
Vinyl chloride	ND	0.20	ND	0.51
Dichlorodifluoromethane	ND	0.20	ND	0.99
1,2-Dichloroethane	ND	0.20	ND	0.81
1,1-Dichloroethene	ND	0.20	ND	0.79
cis-1,2-Dichloroethene	**0.86**	**0.20**	**3.4**	**0.79**
trans-1,2-Dichloroethene	**0.62**	**0.20**	**2.4**	**0.79**

SURROGATE	PERCENT RECOVERY	LABORATORY CONTROL LIMITS (%)
4-Bromofluorobenzene	102	60 - 140

The 'Result' in ug/m3 is calculated using the following equation: Amount Found(before rounding)*(Molecular Weight/24.45)

The 'Reporting Limit' in ug/m3 is calculated using the following equation: (Reporting Limit(before rounding) * Dilution Factor) * (Molecular Weight/24.45)

NW
1/18/10

CH2M Hill Inc

Client Sample ID: SJS21-IA04-09D

GC/MS Volatiles

Lot-Sample # H9J280205 - 010 **Work Order #** LNEP31AA **Matrix.....:** AIR

Date Sampled...: 10/25/2009 **Date Received..:** 10/28/2009
Prep Date.....: 10/30/2009 **Analysis Date...** 10/30/2009
Prep Batch #.....: 9306133
Dilution Factor.: 1 **Method.....:** TO-15

PARAMETER	RESULTS (ppb(v/v))	REPORTING LIMIT (ppb(v/v))	RESULTS (ug/m3)	REPORTING LIMIT (ug/m3)
Trichloroethene	ND	0.040	ND	0.21
Vinyl chloride	ND	0.080	ND	0.20
Dichlorodifluoromethane	**0.49**	**0.080**	**2.4**	**0.40**
1,2-Dichloroethane	ND	0.080	ND	0.32
1,1-Dichloroethene	ND	0.080	ND	0.32
cis-1,2-Dichloroethene	ND	0.080	ND	0.32
trans-1,2-Dichloroethene	ND	0.080	ND	0.32

SURROGATE	PERCENT RECOVERY	LABORATORY CONTROL LIMITS (%)
4-Bromofluorobenzene	101	60 - 140

The 'Result' in ug/m3 is calculated using the following equation: Amount Found(before rounding)*(Molecular Weight/24.45)

The 'Reporting Limit' in ug/m3 is calculated using the following equation: (Reporting Limit(before rounding) * Dilution Factor) * (Molecular Weight/24.45)

NW
1/18/10

CH2M Hill Inc

Client Sample ID: SJS21-SV05-09D

GC/MS Volatiles

Lot-Sample # H9J280205 - 011 **Work Order #** LNEP61AA **Matrix.....:** AIR

Date Sampled...: 10/25/2009 **Date Received..:** 10/28/2009
Prep Date.....: 10/30/2009 **Analysis Date...** 10/30/2009
Prep Batch #.....: 9306129
Dilution Factor.: 1 **Method.....:** TO-15

PARAMETER	RESULTS (ppb(v/v))	REPORTING LIMIT (ppb(v/v))	RESULTS (ug/m3)	REPORTING LIMIT (ug/m3)
Trichloroethene	ND	0.20	ND	1.1
Vinyl chloride	ND	0.20	ND	0.51
Dichlorodifluoromethane	**0.30**	**0.20**	**1.5**	**0.99**
1,2-Dichloroethane	ND	0.20	ND	0.81
1,1-Dichloroethene	ND	0.20	ND	0.79
cis-1,2-Dichloroethene	ND	0.20	ND	0.79
trans-1,2-Dichloroethene	ND	0.20	ND	0.79

SURROGATE	PERCENT RECOVERY	LABORATORY CONTROL LIMITS (%)
4-Bromofluorobenzene	103	60 - 140

The 'Result' in ug/m3 is calculated using the following equation: Amount Found(before rounding)*(Molecular Weight/24.45)

The 'Reporting Limit' in ug/m3 is calculated using the following equation: (Reporting Limit(before rounding) * Dilution Factor) * (Molecular Weight/24.45)

MJ
11/18/10

CH2M Hill Inc

Client Sample ID: SJS21-IA05-09D

GC/MS Volatiles

Lot-Sample # H9J280205 - 012 **Work Order #** LNEP81AA **Matrix.....:** AIR

Date Sampled...: 10/25/2009 **Date Received..:** 10/28/2009
Prep Date.....: 10/30/2009 **Analysis Date...** 10/30/2009
Prep Batch #.....: 9306133
Dilution Factor.: 1 **Method.....:** TO-15

PARAMETER	RESULTS (ppb(v/v))	REPORTING LIMIT (ppb(v/v))	RESULTS (ug/m3)	REPORTING LIMIT (ug/m3)
Trichloroethene	ND	0.040	ND	0.21
Vinyl chloride	ND	0.080	ND	0.20
Dichlorodifluoromethane	**0.56**	**0.080**	**2.7**	**0.40**
1,2-Dichloroethane	ND	0.080	ND	0.32
1,1-Dichloroethene	ND	0.080	ND	0.32
cis-1,2-Dichloroethene	ND	0.080	ND	0.32
trans-1,2-Dichloroethene	ND	0.080	ND	0.32

SURROGATE	PERCENT RECOVERY	LABORATORY CONTROL LIMITS (%)
4-Bromofluorobenzene	98	60 - 140

The 'Result' in ug/m3 is calculated using the following equation: Amount Found(before rounding)*(Molecular Weight/24.45)

The 'Reporting Limit' in ug/m3 is calculated using the following equation: (Reporting Limit(before rounding) * Dilution Factor) * (Molecular Weight/24.45)

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lw
1/13/10

CH2M Hill Inc

Client Sample ID: SJS21-SV06-09D

GC/MS Volatiles

Lot-Sample #	H9J280205 - 013	**Work Order #**	LNEQN1AA	**Matrix.....:**	AIR

Date Sampled...:	10/25/2009	**Date Received..:**	10/28/2009
Prep Date.....:	10/30/2009	**Analysis Date...**	10/31/2009
Prep Batch #.....:	9306129		
Dilution Factor.:	14.3	**Method.....:**	TO-15

PARAMETER	RESULTS (ppb(v/v))	REPORTING LIMIT (ppb(v/v))	RESULTS (ug/m3)	REPORTING LIMIT (ug/m3)
Trichloroethene	**250**	**2.9**	**1300**	**15**
Vinyl chloride	ND	2.9	ND	7.3
Dichlorodifluoromethane	ND	2.9	ND	14
1,2-Dichloroethane	ND	2.9	ND	12
1,1-Dichloroethene	ND	2.9	ND	11
cis-1,2-Dichloroethene	**19**	**2.9**	**76**	**11**
trans-1,2-Dichloroethene	ND	2.9	ND	11

SURROGATE	PERCENT RECOVERY	LABORATORY CONTROL LIMITS (%)
4-Bromofluorobenzene	101	60 - 140

The 'Result' in ug/m3 is calculated using the following equation: Amount Found(before rounding)*(Molecular Weight/24.45)

The 'Reporting Limit' in ug/m3 is calculated using the following equation: (Reporting Limit(before rounding) * Dilution Factor) * (Molecular Weight/24.45)

LW
11/18/10

CH2M Hill Inc

Client Sample ID: SJS21-IA06-09D

GC/MS Volatiles

Lot-Sample #	H9J280205 - 014	**Work Order #**	LNEQQ1AA	**Matrix.....:**	AIR

Date Sampled...:	10/25/2009	**Date Received..:**	10/28/2009
Prep Date.....:	10/30/2009	**Analysis Date...**	10/31/2009
Prep Batch #.....:	9306133		
Dilution Factor.:	1	**Method.....:**	TO-15

PARAMETER	RESULTS (ppb(v/v))	REPORTING LIMIT (ppb(v/v))	RESULTS (ug/m3)	REPORTING LIMIT (ug/m3)
Trichloroethene	**0.19**	**0.040**	**1.0**	**0.21**
Vinyl chloride	ND	0.080	ND	0.20
Dichlorodifluoromethane	**0.51**	**0.080**	**2.5**	**0.40**
1,2-Dichloroethane	ND	0.080	ND	0.32
1,1-Dichloroethene	ND	0.080	ND	0.32
cis-1,2-Dichloroethene	ND	0.080	ND	0.32
trans-1,2-Dichloroethene	ND	0.080	ND	0.32

SURROGATE	PERCENT RECOVERY	LABORATORY CONTROL LIMITS (%)
4-Bromofluorobenzene	97	60 - 140

The 'Result' in ug/m3 is calculated using the following equation: Amount Found(before rounding)*(Molecular Weight/24.45)

The 'Reporting Limit' in ug/m3 is calculated using the following equation: (Reporting Limit(before rounding) * Dilution Factor) * (Molecular Weight/24.45)

1/18/10

CH2M Hill Inc

Client Sample ID: SJS21-SV07-09D

GC/MS Volatiles

Lot-Sample # H9J280205 - 015 **Work Order #** LNEQV1AA **Matrix.....:** AIR

Date Sampled...: 10/25/2009 **Date Received..:** 10/28/2009
Prep Date.....: 10/30/2009 **Analysis Date...** 10/31/2009
Prep Batch #.....: 9306129
Dilution Factor.: 1 **Method.....:** TO-15

PARAMETER	RESULTS (ppb(v/v))	REPORTING LIMIT (ppb(v/v))	RESULTS (ug/m3)	REPORTING LIMIT (ug/m3)
Trichloroethene	**19**	**0.20**	**100**	**1.1**
Vinyl chloride	ND	0.20	ND	0.51
Dichlorodifluoromethane	**0.53**	**0.20**	**2.6**	**0.99**
1,2-Dichloroethane	ND	0.20	ND	0.81
1,1-Dichloroethene	ND	0.20	ND	0.79
cis-1,2-Dichloroethene	**4.3**	**0.20**	**17**	**0.79**
trans-1,2-Dichloroethene	**0.20**	**0.20**	**0.78**	**0.79**

SURROGATE	PERCENT RECOVERY	LABORATORY CONTROL LIMITS (%)
4-Bromofluorobenzene	103	60 - 140

The 'Result' in ug/m3 is calculated using the following equation: Amount Found(before rounding)*(Molecular Weight/24.45)

The 'Reporting Limit' in ug/m3 is calculated using the following equation: (Reporting Limit(before rounding) * Dilution Factor) * (Molecular Weight/24.45)

lw
11/13/10

CH2M Hill Inc

Client Sample ID: SJS21-IA07-09D

GC/MS Volatiles

Lot-Sample #	H9J280205 - 016	**Work Order #**	LNEQW1AA	**Matrix.....:**	AIR

Date Sampled...:	10/25/2009	**Date Received..:**	10/28/2009
Prep Date.....:	10/30/2009	**Analysis Date...**	10/31/2009
Prep Batch #.....:	9306133		
Dilution Factor.:	1	**Method.....:**	TO-15

PARAMETER	RESULTS (ppb(v/v))	REPORTING LIMIT (ppb(v/v))	RESULTS (ug/m3)	REPORTING LIMIT (ug/m3)
Trichloroethene	**0.14**	**0.040**	**0.75**	**0.21**
Vinyl chloride	ND	0.080	ND	0.20
Dichlorodifluoromethane	**0.50**	**0.080**	**2.5**	**0.40**
1,2-Dichloroethane	ND	0.080	ND	0.32
1,1-Dichloroethene	ND	0.080	ND	0.32
cis-1,2-Dichloroethene	**0.19**	**0.080**	**0.76**	**0.32**
trans-1,2-Dichloroethene	ND	0.080	ND	0.32

SURROGATE	PERCENT RECOVERY	LABORATORY CONTROL LIMITS (%)
4-Bromofluorobenzene	100	60 - 140

The 'Result' in ug/m3 is calculated using the following equation: Amount Found(before rounding)*(Molecular Weight/24.45)

The 'Reporting Limit' in ug/m3 is calculated using the following equation: (Reporting Limit(before rounding) * Dilution Factor) * (Molecular Weight/24.45)

UW
1/18/10

CH2M Hill Inc

Client Sample ID: SJS21-SV08-09D

GC/MS Volatiles

Lot-Sample #	H9J280205 - 017	**Work Order #**	LNEQ11AA	**Matrix.....:**	AIR

Date Sampled...:	10/25/2009	**Date Received..:**	10/28/2009
Prep Date.....:	10/30/2009	**Analysis Date...**	10/31/2009
Prep Batch #.....:	9306129		
Dilution Factor.:	2.03	**Method.....:**	TO-15

PARAMETER	RESULTS (ppb(v/v))	REPORTING LIMIT (ppb(v/v))	RESULTS (ug/m3)	REPORTING LIMIT (ug/m3)
Trichloroethene	**71**	**0.41**	**380**	**2.2**
Vinyl chloride	ND	0.41	ND	1.0
Dichlorodifluoromethane	**0.58**	**0.41**	**2.9**	**2.0**
1,2-Dichloroethane	ND	0.41	ND	1.6
1,1-Dichloroethene	ND	0.41	ND	1.6
cis-1,2-Dichloroethene	**11**	**0.41**	**43**	**1.6**
trans-1,2-Dichloroethene	ND	0.41	ND	1.6

SURROGATE	PERCENT RECOVERY	LABORATORY CONTROL LIMITS (%)
4-Bromofluorobenzene	103	60 - 140

The 'Result' in ug/m3 is calculated using the following equation: Amount Found(before rounding)*(Molecular Weight/24.45)

The 'Reporting Limit' in ug/m3 is calculated using the following equation: (Reporting Limit(before rounding) * Dilution Factor) * (Molecular Weight/24.45)

NW
11/18/10

CH2M Hill Inc

Client Sample ID: SJS21-IA08-09D

GC/MS Volatiles

Lot-Sample # H9J280205 - 018 **Work Order #** LNEQ31AA **Matrix.....:** AIR

Date Sampled...: 10/25/2009 **Date Received..:** 10/28/2009
Prep Date.....: 10/30/2009 **Analysis Date...** 10/31/2009
Prep Batch #.....: 9306133
Dilution Factor.: 1 **Method.....:** TO-15

PARAMETER	RESULTS (ppb(v/v))	REPORTING LIMIT (ppb(v/v))	RESULTS (ug/m3)	REPORTING LIMIT (ug/m3)
Trichloroethene	**0.11**	**0.040**	**0.61**	**0.21**
Vinyl chloride	ND	0.080	ND	0.20
Dichlorodifluoromethane	**0.51**	**0.080**	**2.5**	**0.40**
1,2-Dichloroethane	ND	0.080	ND	0.32
1,1-Dichloroethene	ND	0.080	ND	0.32
cis-1,2-Dichloroethene	ND	0.080	ND	0.32
trans-1,2-Dichloroethene	ND	0.080	ND	0.32

SURROGATE	PERCENT RECOVERY	LABORATORY CONTROL LIMITS (%)
4-Bromofluorobenzene	101	60 - 140

The 'Result' in ug/m3 is calculated using the following equation: Amount Found(before rounding)*(Molecular Weight/24.45)

The 'Reporting Limit' in ug/m3 is calculated using the following equation: (Reporting Limit(before rounding) * Dilution Factor) * (Molecular Weight/24.45)

MW
11/8/10

CH2M Hill Inc

Client Sample ID: SJS21-IA09-09D

GC/MS Volatiles

Lot-Sample # H9J280205 - 019 **Work Order #** LNEQ51AA **Matrix.....:** AIR

Date Sampled...: 10/25/2009 **Date Received..:** 10/28/2009
Prep Date.....: 10/30/2009 **Analysis Date...** 10/31/2009
Prep Batch #.....: 9306136
Dilution Factor.: 1 **Method.....:** TO-15

PARAMETER	RESULTS (ppb(v/v))	REPORTING LIMIT (ppb(v/v))	RESULTS (ug/m3)	REPORTING LIMIT (ug/m3)
Trichloroethene	ND	0.040	ND	0.21
Vinyl chloride	ND	0.080	ND	0.20
Dichlorodifluoromethane	**0.64**	**0.080**	**3.2**	**0.40**
1,2-Dichloroethane	ND	0.080	ND	0.32
1,1-Dichloroethene	ND	0.080	ND	0.32
cis-1,2-Dichloroethene	ND	0.080	ND	0.32
trans-1,2-Dichloroethene	ND	0.080	ND	0.32

SURROGATE	PERCENT RECOVERY	LABORATORY CONTROL LIMITS (%)
4-Bromofluorobenzene	106	60 - 140

The 'Result' in ug/m3 is calculated using the following equation: Amount Found(before rounding)*(Molecular Weight/24.45)

The 'Reporting Limit' in ug/m3 is calculated using the following equation: (Reporting Limit(before rounding) * Dilution Factor) * (Molecular Weight/24.45)

UW
1/18/10

CH2M Hill Inc

Client Sample ID: SJS21-AA01-09D

GC/MS Volatiles

Lot-Sample #	H9J280205 - 020	**Work Order #**	LNEQ71AA	**Matrix.....:**	AIR

Date Sampled...:	10/25/2009	**Date Received..:**	10/28/2009
Prep Date.....:	10/30/2009	**Analysis Date...**	10/31/2009
Prep Batch #.....:	9306136		
Dilution Factor.:	1	**Method.....:**	TO-15

PARAMETER	RESULTS (ppb(v/v))	REPORTING LIMIT (ppb(v/v))	RESULTS (ug/m3)	REPORTING LIMIT (ug/m3)
Trichloroethene	ND	0.040	ND	0.21
Vinyl chloride	ND	0.080	ND	0.20
Dichlorodifluoromethane	**0.61**	**0.080**	**3.0**	**0.40**
1,2-Dichloroethane	ND	0.080	ND	0.32
1,1-Dichloroethene	ND	0.080	ND	0.32
cis-1,2-Dichloroethene	ND	0.080	ND	0.32
trans-1,2-Dichloroethene	ND	0.080	ND	0.32

SURROGATE	PERCENT RECOVERY	LABORATORY CONTROL LIMITS (%)
4-Bromofluorobenzene	106	60 - 140

The 'Result' in ug/m3 is calculated using the following equation: Amount Found(before rounding)*(Molecular Weight/24.45)

The 'Reporting Limit' in ug/m3 is calculated using the following equation: (Reporting Limit(before rounding) * Dilution Factor) * (Molecular Weight/24.45)

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MW
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CH2M Hill Inc

Client Sample ID: SJS21-AA02-09D

GC/MS Volatiles

Lot-Sample # H9J280205 - 021 **Work Order #** LNERA1AA **Matrix.....:** AIR

Date Sampled...: 10/25/2009 **Date Received..:** 10/28/2009
Prep Date.....: 11/02/2009 **Analysis Date...** 11/02/2009
Prep Batch #.....: 9307145
Dilution Factor.: 1 **Method.....:** TO-15

PARAMETER	RESULTS (ppb(v/v))	REPORTING LIMIT (ppb(v/v))	RESULTS (ug/m3)	REPORTING LIMIT (ug/m3)
Trichloroethene	ND	0.040	ND	0.21
Vinyl chloride	ND	0.080	ND	0.20
Dichlorodifluoromethane	**0.60**	**0.080**	**3.0**	**0.40**
1,2-Dichloroethane	ND	0.080	ND	0.32
1,1-Dichloroethene	ND	0.080	ND	0.32
cis-1,2-Dichloroethene	ND	0.080	ND	0.32
trans-1,2-Dichloroethene	ND	0.080	ND	0.32

SURROGATE	PERCENT RECOVERY	LABORATORY CONTROL LIMITS (%)
4-Bromofluorobenzene	105	60 - 140

The 'Result' in ug/m3 is calculated using the following equation: Amount Found(before rounding)*(Molecular Weight/24.45)

The 'Reporting Limit' in ug/m3 is calculated using the following equation: (Reporting Limit(before rounding) * Dilution Factor) * (Molecular Weight/24.45)

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lw
11/8/10

CH2M Hill Inc

Client Sample ID: SJS21-AA02P-09D

GC/MS Volatiles

Lot-Sample # H9J280205 - 022 **Work Order #** LNERD1AA **Matrix.....:** AIR

Date Sampled...: 10/25/2009 **Date Received..:** 10/28/2009
Prep Date.....: 11/02/2009 **Analysis Date...** 11/02/2009
Prep Batch #.....: 9307145
Dilution Factor.: 1 **Method.....:** TO-15

PARAMETER	RESULTS (ppb(v/v))	REPORTING LIMIT (ppb(v/v))	RESULTS (ug/m3)	REPORTING LIMIT (ug/m3)
Trichloroethene	ND	0.040	ND	0.21
Vinyl chloride	ND	0.080	ND	0.20
Dichlorodifluoromethane	**0.59**	**0.080**	**2.9**	**0.40**
1,2-Dichloroethane	ND	0.080	ND	0.32
1,1-Dichloroethene	ND	0.080	ND	0.32
cis-1,2-Dichloroethene	ND	0.080	ND	0.32
trans-1,2-Dichloroethene	ND	0.080	ND	0.32

SURROGATE	PERCENT RECOVERY	LABORATORY CONTROL LIMITS (%)
4-Bromofluorobenzene	105	60 - 140

The 'Result' in ug/m3 is calculated using the following equation: Amount Found(before rounding)*(Molecular Weight/24.45)

The 'Reporting Limit' in ug/m3 is calculated using the following equation: (Reporting Limit(before rounding) * Dilution Factor) * (Molecular Weight/24.45)

LW
11/18/10

CH2M Hill Inc

Client Sample ID: SJS21-AA03-09D

GC/MS Volatiles

Lot-Sample # H9J280205 - 023 **Work Order #** LNERF1AA **Matrix.....:** AIR

Date Sampled...: 10/25/2009 **Date Received..:** 10/28/2009
Prep Date.....: 10/30/2009 **Analysis Date...** 10/31/2009
Prep Batch #.....: 9306136
Dilution Factor.: 1 **Method.....:** TO-15

PARAMETER	RESULTS (ppb(v/v))	REPORTING LIMIT (ppb(v/v))	RESULTS (ug/m3)	REPORTING LIMIT (ug/m3)
Trichloroethene	**0.098**	**0.040**	**0.53**	**0.21**
Vinyl chloride	ND	0.080	ND	0.20
Dichlorodifluoromethane	**0.60**	**0.080**	**2.9**	**0.40**
1,2-Dichloroethane	ND	0.080	ND	0.32
1,1-Dichloroethene	ND	0.080	ND	0.32
cis-1,2-Dichloroethene	ND	0.080	ND	0.32
trans-1,2-Dichloroethene	ND	0.080	ND	0.32

SURROGATE	PERCENT RECOVERY	LABORATORY CONTROL LIMITS (%)
4-Bromofluorobenzene	104	60 - 140

The 'Result' in ug/m3 is calculated using the following equation: Amount Found(before rounding)*(Molecular Weight/24.45)

The 'Reporting Limit' in ug/m3 is calculated using the following equation: (Reporting Limit(before rounding) * Dilution Factor) * (Molecular Weight/24.45)

NW
1/18/10

Attachment G
Pressure-Monitoring Report

Pressure Differential Monitoring Results

Differential pressure data were collected during Phase I and Phase II to provide an additional line of evidence, if necessary, for determining the potential for vapor intrusion at the investigated buildings. A digital micromanometer (Omniguard 4) was attached to a subslab soil vapor probe in each of the two investigated buildings. **Table G-1** and **Table G-2** present a summary of the results from the Phase I pressure differential monitoring that took place at Buildings 1556 and 47, respectively. **Figure G-1** and **Figure G-2** present the pressure differential graphed over time for each of these buildings. **Table G-3** and **Table G-4** present a summary of the results from the Phase II pressure differential monitoring that took place at Buildings 1556 and 47, respectively. **Figure G-3** and **Figure G-4** present the pressure differential graphed over time for each of these buildings. The longer-term average value can be used to determine if, overall, a building is positively pressurized (hence vapor resistant) or negatively pressurized (hence prone to vapor intrusion). There are no regulatory screening levels for interpreting differential pressure measurements. However, long-term average pressure differences between the indoors and the subslab can be interpreted using USEPA guidance for radon mitigation (USEPA, 1993). **Table G-5** provides an interpretation matrix for differential pressure results based on USEPA's 1993 radon reduction techniques technical guidance (USEPA, 1993). For example, subslab depressurization systems for radon mitigation are designed to achieve a 6- to 9-Pa pressure difference between the subsurface and indoors. This represents the pressure difference needed to prevent soil vapor intrusion into a structure where indoor pressures are governed by heating and the operation of appliances or fans.

Building 1556

Phase I

The average indoor-to-subslab differential pressure in Building 1556 during the Phase I test ranged from a minimum of -0.50 Pa to a maximum of 0.75 Pa. The average maximum and minimum differential pressure measurements over the entire monitoring period (August 19, 2009 through August 27, 2009) and during working and night-time hours are shown in **Table G-1**. **Figure G-1** shows the relationship between the differential pressure data at minimum and maximum data points over time for each of the 9 days of testing.

Building 1556 shows a pressure range of +2 Pa to -1 Pa from 16:06 on 8/19 to 10:22 on 8/22. At this time, the power to the unit was interrupted from 10:37 to 14:52 on 8/22. When the power returned, the unit measured the pressure difference ranging from a max of 0 Pa to a minimum of -59 Pa (shown by the point off the graph) which then returned to a minimum of 0 Pa for the remainder of the test. These readings may have been an error after the power reset. Generally, the building's pressure can be interpreted as neutral to positively pressurized (highly variable pressure measurements typically greater than zero) based on an average of the max and min pressure difference. As a result, there is a potential, intermittent driver for the vapor intrusion pathway. There is some uncertainty involved in

averaging these readings since they cannot be correlated to a time stamp, therefore this is a general interpretation.

The plot of pressure differences was overlain on barometric pressure measurements as shown in **Figure G-1**, to observe the effects of atmospheric conditions on potential vapor intrusion pathways.

Building 1556 shows a parallel trend in pressure difference between the subslab and indoor environment and the barometric pressure of the indoor environment. The barometric pressure trend line before the power outage matches up with the trend line of the pressure difference before the power outage. The fact that the pressure difference trend line is flat while the barometric pressure trend line fluctuates after the power outage gives weight to the fact that the pressure differential recorder's operations were affected by the power outage. The barometric pressure trend line in relation to the pressure difference trend line shows the influence that barometric pressure has on the subslab environment. If the trend was not parallel, this could indicate that other parameters are influencing the subslab environment, i.e. wind, HVAC. This interpretation should be considered in general terms since there is some uncertainty involved in the data and a large data gap present for more than half of the test's duration.

Weather data was not collected during Phase I using a weather station. However, weather information (e.g., temperature, barometric pressure, etc.) for the Norfolk Naval Shipyard area was obtained for the sample collection period at the weather underground website (www.weatherunderground.com). The temperature ranged from 69.7° to 95.2°F, the barometric pressure ranged from 29.71 to 30.16 inches of mercury, the wind speed ranged from 0 to 12 mph with gusts up to 17 mph, and less than 1 inch of precipitation was recorded during this period.

Phase II

The average indoor-to-subslab differential pressure in Building 1556 during the Phase II test ranged from a minimum of -0.50 Pa to a maximum of 1.0 Pa. The average maximum and minimum differential pressure measurements over the entire monitoring period (October 23, 2009 through October 30, 2009) and during working and night-time hours are shown in **Table G-3**. **Figure G-3** shows the relationship between the differential pressure data at minimum and maximum data points over time for each of the 8 days of testing.

Generally, the building's pressure can be interpreted as neutral to positively pressurized (highly variable pressure measurements typically greater than zero) based on an average of the max and min pressure difference. As a result, there is a potential, intermittent driver for the vapor intrusion pathway. There is some uncertainty involved in averaging these readings since they cannot be correlated to a time stamp, therefore this is a general interpretation.

The plot of pressure differences was overlain on barometric pressure measurements as shown in **Figure G-3**, to observe the effects of atmospheric conditions on potential vapor intrusion pathways.

Building 1556 shows a parallel trend in pressure difference between the subslab and indoor environment and the barometric pressure of the indoor environment. The barometric

pressure trend line matches up with the trend line of the pressure difference along the duration of the monitoring. The barometric pressure trend line in relation to the pressure difference trend line shows the influence that barometric pressure has on the subslab environment. If the trend was not parallel, this could indicate that other parameters are influencing the subslab environment, i.e. wind, HVAC.

Weather data was also collected during the monitoring of subslab pressure differences to observe the exterior barometric pressure, temperature, wind, and various other parameters. The results of the weather station monitoring are presented in **Attachment H**. The temperature ranged from 71° to 84°F, the barometric pressure ranged from 29.75 to 29.82 inches of mercury, wind speed was recorded from 0 to 7 mph, and there was no precipitation recorded during this period.

Building 47

Phase I

The average indoor-to-subslab differential pressure in Building 47 during the Phase I test ranged from a minimum of -2.0 Pa to a maximum of 4.3 Pa. The average maximum and minimum differential pressure measurements over the entire monitoring period (August 20, 2009 through August 27, 2009) and during working and night-time hours are shown in **Table G-2**. **Figure G-2** shows the relationship between the differential pressure data at minimum and maximum data points over time for each of the 8 days of testing.

Building 47 shows pressure range of +3 Pa to -4.5 Pa from 10:08 on 8/20 to 10:23 on 8/22. At this time, the power to the unit was interrupted from 10:38 on 8/22 to 13:08 on 8/24. The power in Building 47 was interrupted inexplicably longer than the power in Building 1556. When the power returned, the unit measured the pressure difference ranging from a max of +7.5 Pa to a minimum of -5 Pa. Generally, the building's pressure can be interpreted as neutral to positively pressurized (highly variable pressure measurements typically greater than zero) based on an average of the max and min pressure difference. However, the building is occasionally negatively-pressurized, indicating there is a potential, intermittent driver for the vapor intrusion pathway. There is some uncertainty involved in averaging these readings since they cannot be correlated to a time stamp, therefore this is a general interpretation.

The plot of pressure differences was overlain on barometric pressure measurements as shown in **Figure G-2**, to observe the effects of atmospheric conditions on potential vapor intrusion pathways.

Building 47 shows a relatively flat trend line of the barometric pressure in Building 47. The barometric pressure trend line generally matches up with the trend line of the pressure difference over the duration of the test. This indicated the influence that barometric pressure displays over the subslab environment. However, the averaged pressure differences shows highly variable readings which could indicate an influence from the wind's (stack effect) speed over the building's numerous infiltrations. This interpretation should be considered in general terms since there is some uncertainty involved in the data.

Weather data was not collected during Phase I using a weather station. However, weather information (e.g., temperature, barometric pressure, etc.) for the Norfolk Naval Shipyard

area was obtained for the sample collection period at the weather underground website (www.weatherunderground.com). The temperature ranged from 69.7° to 95.2°F, the barometric pressure ranged from 29.71 to 30.16 inches of mercury, the wind speed ranged from 0 to 12 mph with gusts up to 17 mph, and less than 1 inch of precipitation was recorded during this period.

Phase II

The average indoor-to-subslab differential pressure in Building 47 during the Phase II test ranged from a minimum of -4.5 Pa to a maximum of 4.3 Pa. The average maximum and minimum differential pressure measurements over the entire monitoring period (October 23, 2009 through October 30, 2009) and during working and night-time hours are shown in **Table G-4**. **Figure G-4** shows the relationship between the differential pressure data at minimum and maximum data points over time for each of the 8 days of testing.

Generally, the building's pressure can be interpreted as neutral to negatively pressurized (highly variable pressure measurements typically less than 5 Pa) based on an average of the max and min pressure difference. As a result, there is a potential, intermittent driver for the vapor intrusion pathway. There is some uncertainty involved in averaging these readings since they cannot be correlated to a time stamp, therefore this is a general interpretation.

The plot of pressure differences were overlain on barometric pressure measurements as shown in **Figure G-4**, to observe the effects of atmospheric conditions on potential vapor intrusion pathways.

Building 47 shows a relatively flat trend line of the barometric pressure in Building 47. The barometric pressure trend line generally matches up with the trend line of the pressure difference over the duration of the test. This indicated the influence that barometric pressure displays over the subslab environment. However, the averaged pressure differences shows highly variable readings which could indicate an influence from the wind's (stack effect) speed over the building's numerous infiltrations. This interpretation should be considered in general terms since there is some uncertainty involved in the data.

Weather data was also collected during the monitoring of subslab pressure differences to observe the exterior barometric pressure, temperature, wind, and various other parameters. The results of the weather station monitoring are presented in **Attachment H** to the RI and FS Addendum. The temperature ranged from 71° to 84°F, the barometric pressure ranged from 29.75 to 29.82 inches of mercury, wind speed was recorded from 0 to 7 mph, and there was no precipitation recorded during this period.

Table G-1

Phase I Pressure Difference Measurements [a]

St. Julien's Creek Annex Building 1556

Averages over all measurements: [b]		
Maximum Differential Pressure:	0.16	Pa
Minimum Differential Pressure:	-0.12	Pa

Averages during Work Hours and Night Time: [c]

		Work Hours, Daily 10-hour Average Pressure Difference (7 am to 5 pm)		**Night Time, Daily 14-hour Average Pressure Difference (5 pm to 7 am)**	
Date	**Time**	**max (Pa)**	**min (Pa)**	**max (Pa)**	**min (Pa)**
8/19/2009	average	1.00	-0.17	0.41	-0.01
8/20/2009	average	0.46	-0.29	0.46	-0.01
8/21/2009	average	0.44	-0.30	0.39	-0.04
8/22/2009	average	0.11	-2.57	0.00	0.00
8/23/2009	average	0.00	0.00	0.00	0.00
8/24/2009	average	0.00	0.00	0.00	0.00
8/25/2009	average	0.00	0.00	0.00	0.00
8/26/2009	average	0.00	0.00	0.00	0.00
8/27/2009	average	0.00	0.00	N/A	N/A
	Median:	0.00	0.00	0.00	0.00

Date	**Time**	**Date + Time**	**Maximum Differential Pressure[d] [Pa]**	**Minimum Differential Pressure[d] [Pa]**	**Average Pressure [Pa]**	**Date**	**Time**	**Date + Time**	**Indoor Barometric Pressure (in)** [e]	**Temperature (°C)**	**Temperature (°F)**	**Notes**
8/19/2009	16:06	8/19/2009 16:06	2	-0.5	0.75	8/19/2009	16:58	8/19/09 16:58	33.73	31.76	89.17	
8/19/2009	16:47	8/19/2009 16:47	0.5	0	0.25	8/19/2009	17:13	8/19/09 17:13	33.77	31.96	89.52	
8/19/2009	16:52	8/19/2009 16:52	0.5	0	0.25	8/19/2009	17:28	8/19/09 17:28	33.76	32.04	89.67	
8/19/2009	17:07	8/19/2009 17:07	0.5	0	0.25	8/19/2009	17:43	8/19/09 17:43	33.76	32.07	89.73	
8/19/2009	17:22	8/19/2009 17:22	0.5	0	0.25	8/19/2009	17:58	8/19/09 17:58	33.75	32.09	89.76	
8/19/2009	17:37	8/19/2009 17:37	0.5	0	0.25	8/19/2009	18:13	8/19/09 18:13	33.70	32.09	89.76	
8/19/2009	17:52	8/19/2009 17:52	0.5	0	0.25	8/19/2009	18:28	8/19/09 18:28	33.63	32.09	89.77	
8/19/2009	18:07	8/19/2009 18:07	0.5	0	0.25	8/19/2009	18:43	8/19/09 18:43	33.65	32.11	89.79	
8/19/2009	18:22	8/19/2009 18:22	0.5	0	0.25	8/19/2009	18:58	8/19/09 18:58	33.81	32.12	89.81	
8/19/2009	18:37	8/19/2009 18:37	0.5	0	0.25	8/19/2009	19:13	8/19/09 19:13	33.87	32.12	89.82	
8/19/2009	18:52	8/19/2009 18:52	0.5	0	0.25	8/19/2009	19:28	8/19/09 19:28	33.82	32.14	89.86	
8/19/2009	19:07	8/19/2009 19:07	0.5	0	0.25	8/19/2009	19:43	8/19/09 19:43	33.80	32.14	89.84	
8/19/2009	19:22	8/19/2009 19:22	0.5	0	0.25	8/19/2009	19:58	8/19/09 19:58	33.77	32.13	89.83	
8/19/2009	19:37	8/19/2009 19:37	0.5	0	0.25	8/19/2009	20:13	8/19/09 20:13	33.85	32.13	89.84	
8/19/2009	19:52	8/19/2009 19:52	0.5	0	0.25	8/19/2009	20:28	8/19/09 20:28	33.77	32.12	89.81	
8/19/2009	20:07	8/19/2009 20:07	0.5	0	0.25	8/19/2009	20:43	8/19/09 20:43	33.83	32.13	89.83	
8/19/2009	20:22	8/19/2009 20:22	0.5	0	0.25	8/19/2009	20:58	8/19/09 20:58	33.99	32.11	89.81	
8/19/2009	20:37	8/19/2009 20:37	0.5	0	0.25	8/19/2009	21:13	8/19/09 21:13	34.08	32.11	89.79	
8/19/2009	20:52	8/19/2009 20:52	0.5	0	0.25	8/19/2009	21:28	8/19/09 21:28	34.11	32.10	89.77	
8/19/2009	21:07	8/19/2009 21:07	0.5	0	0.25	8/19/2009	21:43	8/19/09 21:43	34.28	32.09	89.76	
8/19/2009	21:22	8/19/2009 21:22	0.5	0	0.25	8/19/2009	21:58	8/19/09 21:58	34.37	32.08	89.74	
8/19/2009	21:37	8/19/2009 21:37	0.5	0	0.25	8/19/2009	22:13	8/19/09 22:13	34.35	32.07	89.72	
8/19/2009	21:52	8/19/2009 21:52	0.5	0	0.25	8/19/2009	22:28	8/19/09 22:28	34.27	32.04	89.66	
8/19/2009	22:07	8/19/2009 22:07	0.5	0	0.25	8/19/2009	22:43	8/19/09 22:43	34.17	32.02	89.64	
8/19/2009	22:22	8/19/2009 22:22	0.5	0	0.25	8/19/2009	22:58	8/19/09 22:58	34.18	32.01	89.61	
8/19/2009	22:37	8/19/2009 22:37	0.5	0	0.25	8/19/2009	23:13	8/19/09 23:13	34.38	32.00	89.60	
8/19/2009	22:52	8/19/2009 22:52	0.5	0	0.25	8/19/2009	23:28	8/19/09 23:28	34.38	32.02	89.63	
8/19/2009	23:07	8/19/2009 23:07	0.5	0	0.25	8/19/2009	23:43	8/19/09 23:43	34.30	32.02	89.64	
8/19/2009	23:22	8/19/2009 23:22	0.5	0	0.25	8/19/2009	23:58	8/19/09 23:58	34.34	32.02	89.63	
8/19/2009	23:37	8/19/2009 23:37	0	0	0	8/20/2009	0:13	8/20/09 0:13	34.42	32.02	89.63	
8/19/2009	23:52	8/19/2009 23:52	0.5	0	0.25	8/20/2009	0:28	8/20/09 0:28	34.47	32.01	89.61	
8/20/2009	0:07	8/20/2009 0:07	0.5	0	0.25	8/20/2009	0:43	8/20/09 0:43	34.39	32.01	89.62	
8/20/2009	0:22	8/20/2009 0:22	0.5	0	0.25	8/20/2009	0:58	8/20/09 0:58	34.20	32.00	89.60	
8/20/2009	0:37	8/20/2009 0:37	0.5	0	0.25	8/20/2009	1:13	8/20/09 1:13	34.10	31.97	89.55	
8/20/2009	0:52	8/20/2009 0:52	0	-0.5	-0.25	8/20/2009	1:28	8/20/09 1:28	34.03	31.97	89.55	
8/20/2009	1:07	8/20/2009 1:07	0.5	0	0.25	8/20/2009	1:43	8/20/09 1:43	34.00	31.96	89.53	
8/20/2009	1:22	8/20/2009 1:22	0	0	0	8/20/2009	1:58	8/20/09 1:58	34.08	31.96	89.52	
8/20/2009	1:37	8/20/2009 1:37	0	0	0	8/20/2009	2:13	8/20/09 2:13	34.04	31.94	89.50	
8/20/2009	1:52	8/20/2009 1:52	0.5	0	0.25	8/20/2009	2:28	8/20/09 2:28	34.04	31.92	89.46	
8/20/2009	2:07	8/20/2009 2:07	0.5	0	0.25	8/20/2009	2:43	8/20/09 2:43	34.01	31.91	89.43	
8/20/2009	2:22	8/20/2009 2:22	0	0	0	8/20/2009	2:58	8/20/09 2:58	34.00	31.88	89.39	

Table G-1

Phase I Pressure Difference Measurements [a]

St. Julien's Creek Annex Building 1556

Date	Time	Date + Time	Maximum Differential Pressure[d] [Pa]	Minimum Differential Pressure[d] [Pa]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
8/20/2009	2:37	8/20/2009 2:37	0.5	0	0.25	8/20/2009	3:13	8/20/09 3:13	34.06	31.86	89.35	
8/20/2009	2:52	8/20/2009 2:52	0	0	0	8/20/2009	3:28	8/20/09 3:28	34.08	31.86	89.34	
8/20/2009	3:07	8/20/2009 3:07	0.5	0	0.25	8/20/2009	3:43	8/20/09 3:43	34.03	31.85	89.32	
8/20/2009	3:22	8/20/2009 3:22	0.5	0	0.25	8/20/2009	3:58	8/20/09 3:58	34.05	31.83	89.30	
8/20/2009	3:37	8/20/2009 3:37	0	0	0	8/20/2009	4:13	8/20/09 4:13	34.02	31.79	89.23	
8/20/2009	3:52	8/20/2009 3:52	0.5	0	0.25	8/20/2009	4:28	8/20/09 4:28	34.01	31.78	89.20	
8/20/2009	4:07	8/20/2009 4:07	0	0	0	8/20/2009	4:43	8/20/09 4:43	33.95	31.74	89.14	
8/20/2009	4:22	8/20/2009 4:22	0	0	0	8/20/2009	4:58	8/20/09 4:58	33.99	31.70	89.06	
8/20/2009	4:37	8/20/2009 4:37	0.5	0	0.25	8/20/2009	5:13	8/20/09 5:13	33.99	31.66	88.99	
8/20/2009	4:52	8/20/2009 4:52	0.5	0	0.25	8/20/2009	5:28	8/20/09 5:28	33.98	31.63	88.94	
8/20/2009	5:07	8/20/2009 5:07	0.5	0	0.25	8/20/2009	5:43	8/20/09 5:43	34.01	31.63	88.93	
8/20/2009	5:22	8/20/2009 5:22	0.5	0	0.25	8/20/2009	5:58	8/20/09 5:58	34.03	31.63	88.93	
8/20/2009	5:37	8/20/2009 5:37	0.5	0	0.25	8/20/2009	6:13	8/20/09 6:13	34.05	31.65	88.97	
8/20/2009	5:52	8/20/2009 5:52	0.5	0	0.25	8/20/2009	6:28	8/20/09 6:28	34.02	31.67	89.00	
8/20/2009	6:07	8/20/2009 6:07	0	0	0	8/20/2009	6:43	8/20/09 6:43	34.07	31.68	89.03	
8/20/2009	6:22	8/20/2009 6:22	0.5	0	0.25	8/20/2009	6:58	8/20/09 6:58	34.14	31.69	89.04	
8/20/2009	6:37	8/20/2009 6:37	0.5	0	0.25	8/20/2009	7:13	8/20/09 7:13	34.12	31.70	89.06	
8/20/2009	6:52	8/20/2009 6:52	0.5	0	0.25	8/20/2009	7:28	8/20/09 7:28	34.14	31.67	89.00	
8/20/2009	7:07	8/20/2009 7:07	0.5	0	0.25	8/20/2009	7:43	8/20/09 7:43	34.13	31.68	89.02	
8/20/2009	7:22	8/20/2009 7:22	0.5	0	0.25	8/20/2009	7:58	8/20/09 7:58	34.20	31.65	88.98	
8/20/2009	7:37	8/20/2009 7:37	0	-0.5	-0.25	8/20/2009	8:13	8/20/09 8:13	34.11	31.64	88.95	
8/20/2009	7:52	8/20/2009 7:52	0.5	0	0.25	8/20/2009	8:28	8/20/09 8:28	34.17	31.66	88.98	
8/20/2009	8:07	8/20/2009 8:07	0.5	0	0.25	8/20/2009	8:43	8/20/09 8:43	34.26	31.66	88.99	
8/20/2009	8:22	8/20/2009 8:22	0	0	0	8/20/2009	8:58	8/20/09 8:58	34.27	31.68	89.02	
8/20/2009	8:37	8/20/2009 8:37	0.5	0	0.25	8/20/2009	9:13	8/20/09 9:13	34.22	31.64	88.94	
8/20/2009	8:52	8/20/2009 8:52	0.5	0	0.25	8/20/2009	9:28	8/20/09 9:28	34.21	31.70	89.06	
8/20/2009	9:07	8/20/2009 9:07	0.5	0	0.25	8/20/2009	9:43	8/20/09 9:43	34.29	31.67	89.00	
8/20/2009	9:22	8/20/2009 9:22	0.5	-0.5	0	8/20/2009	9:58	8/20/09 9:58	34.36	31.64	88.95	
8/20/2009	9:37	8/20/2009 9:37	0.5	0	0.25	8/20/2009	10:13	8/20/09 10:13	34.43	31.67	89.00	
8/20/2009	9:52	8/20/2009 9:52	0.5	0	0.25	8/20/2009	10:28	8/20/09 10:28	34.48	31.65	88.98	
8/20/2009	10:07	8/20/2009 10:07	0.5	0	0.25	8/20/2009	10:43	8/20/09 10:43	34.51	31.68	89.03	
8/20/2009	10:22	8/20/2009 10:22	0.5	0	0.25	8/20/2009	10:58	8/20/09 10:58	34.52	31.70	89.05	
8/20/2009	10:37	8/20/2009 10:37	0.5	0	0.25	8/20/2009	11:13	8/20/09 11:13	34.54	31.73	89.11	
8/20/2009	10:52	8/20/2009 10:52	0.5	-0.5	0	8/20/2009	11:28	8/20/09 11:28	34.52	31.75	89.15	
8/20/2009	11:07	8/20/2009 11:07	0.5	0	0.25	8/20/2009	11:43	8/20/09 11:43	34.53	31.80	89.24	
8/20/2009	11:22	8/20/2009 11:22	0.5	0	0.25	8/20/2009	11:58	8/20/09 11:58	34.46	31.84	89.32	
8/20/2009	11:37	8/20/2009 11:37	0.5	-0.5	0	8/20/2009	12:13	8/20/09 12:13	34.39	31.88	89.39	
8/20/2009	11:52	8/20/2009 11:52	0.5	-0.5	0	8/20/2009	12:28	8/20/09 12:28	34.32	31.91	89.44	
8/20/2009	12:07	8/20/2009 12:07	0.5	-0.5	0	8/20/2009	12:43	8/20/09 12:43	34.29	31.93	89.48	
8/20/2009	12:22	8/20/2009 12:22	0.5	-0.5	0	8/20/2009	12:58	8/20/09 12:58	34.28	31.96	89.52	
8/20/2009	12:37	8/20/2009 12:37	0.5	-0.5	0	8/20/2009	13:13	8/20/09 13:13	34.22	31.96	89.53	
8/20/2009	12:52	8/20/2009 12:52	0.5	-0.5	0	8/20/2009	13:28	8/20/09 13:28	34.17	31.96	89.53	
8/20/2009	13:07	8/20/2009 13:07	0.5	-0.5	0	8/20/2009	13:43	8/20/09 13:43	34.12	31.96	89.54	
8/20/2009	13:22	8/20/2009 13:22	0.5	-0.5	0	8/20/2009	13:58	8/20/09 13:58	34.03	31.98	89.57	
8/20/2009	13:37	8/20/2009 13:37	0.5	-0.5	0	8/20/2009	14:13	8/20/09 14:13	33.99	32.08	89.74	
8/20/2009	13:52	8/20/2009 13:52	0.5	-0.5	0	8/20/2009	14:28	8/20/09 14:28	33.88	32.15	89.87	
8/20/2009	14:07	8/20/2009 14:07	0.5	-0.5	0	8/20/2009	14:43	8/20/09 14:43	33.78	32.22	89.99	
8/20/2009	14:22	8/20/2009 14:22	0.5	-0.5	0	8/20/2009	14:58	8/20/09 14:58	33.70	32.29	90.11	
8/20/2009	14:37	8/20/2009 14:37	0.5	-0.5	0	8/20/2009	15:13	8/20/09 15:13	33.57	32.36	90.24	
8/20/2009	14:52	8/20/2009 14:52	0.5	-0.5	0	8/20/2009	15:28	8/20/09 15:28	33.48	32.40	90.32	
8/20/2009	15:07	8/20/2009 15:07	0	-1	-0.5	8/20/2009	15:43	8/20/09 15:43	33.47	32.46	90.43	
8/20/2009	15:22	8/20/2009 15:22	0.5	-0.5	0	8/20/2009	15:58	8/20/09 15:58	33.43	32.48	90.46	
8/20/2009	15:37	8/20/2009 15:37	0.5	-0.5	0	8/20/2009	16:13	8/20/09 16:13	33.37	32.42	90.35	
8/20/2009	15:52	8/20/2009 15:52	0.5	-0.5	0	8/20/2009	16:28	8/20/09 16:28	33.40	32.38	90.28	
8/20/2009	16:07	8/20/2009 16:07	0.5	-0.5	0	8/20/2009	16:43	8/20/09 16:43	33.46	32.37	90.27	
8/20/2009	16:22	8/20/2009 16:22	0.5	0	0.25	8/20/2009	16:58	8/20/09 16:58	33.45	32.37	90.27	
8/20/2009	16:37	8/20/2009 16:37	0.5	0	0.25	8/20/2009	17:13	8/20/09 17:13	33.45	32.38	90.28	
8/20/2009	16:52	8/20/2009 16:52	0.5	0	0.25	8/20/2009	17:28	8/20/09 17:28	33.37	32.39	90.30	
8/20/2009	17:07	8/20/2009 17:07	0.5	0	0.25	8/20/2009	17:43	8/20/09 17:43	33.34	32.39	90.30	
8/20/2009	17:22	8/20/2009 17:22	0.5	0	0.25	8/20/2009	17:58	8/20/09 17:58	33.29	32.40	90.31	
8/20/2009	17:37	8/20/2009 17:37	0.5	0	0.25	8/20/2009	18:13	8/20/09 18:13	33.30	32.37	90.27	
8/20/2009	17:52	8/20/2009 17:52	0.5	0	0.25	8/20/2009	18:28	8/20/09 18:28	33.27	32.35	90.23	

Table G-1

Phase I Pressure Difference Measurements [a]

St. Julien's Creek Annex Building 1556

Date	Time	Date + Time	Maximum Differential Pressure[d] [Pa]	Minimum Differential Pressure[d] [Pa]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
8/20/2009	18:07	8/20/2009 18:07	0.5	0	0.25	8/20/2009	18:43	8/20/09 18:43	33.22	32.37	90.27	
8/20/2009	18:22	8/20/2009 18:22	0.5	0	0.25	8/20/2009	18:58	8/20/09 18:58	33.23	32.41	90.33	
8/20/2009	18:37	8/20/2009 18:37	0.5	0	0.25	8/20/2009	19:13	8/20/09 19:13	33.24	32.45	90.42	
8/20/2009	18:52	8/20/2009 18:52	0.5	0	0.25	8/20/2009	19:28	8/20/09 19:28	33.32	32.47	90.45	
8/20/2009	19:07	8/20/2009 19:07	0.5	0	0.25	8/20/2009	19:43	8/20/09 19:43	33.36	32.47	90.44	
8/20/2009	19:22	8/20/2009 19:22	0.5	0	0.25	8/20/2009	19:58	8/20/09 19:58	33.42	32.47	90.44	
8/20/2009	19:37	8/20/2009 19:37	0.5	0	0.25	8/20/2009	20:13	8/20/09 20:13	33.47	32.47	90.44	
8/20/2009	19:52	8/20/2009 19:52	0.5	0	0.25	8/20/2009	20:28	8/20/09 20:28	33.56	32.47	90.44	
8/20/2009	20:07	8/20/2009 20:07	0.5	0	0.25	8/20/2009	20:43	8/20/09 20:43	33.68	32.46	90.43	
8/20/2009	20:22	8/20/2009 20:22	0.5	0	0.25	8/20/2009	20:58	8/20/09 20:58	33.71	32.46	90.42	
8/20/2009	20:37	8/20/2009 20:37	0.5	0	0.25	8/20/2009	21:13	8/20/09 21:13	33.75	32.45	90.40	
8/20/2009	20:52	8/20/2009 20:52	0.5	0	0.25	8/20/2009	21:28	8/20/09 21:28	33.72	32.43	90.37	
8/20/2009	21:07	8/20/2009 21:07	0.5	0	0.25	8/20/2009	21:43	8/20/09 21:43	33.73	32.41	90.35	
8/20/2009	21:22	8/20/2009 21:22	0.5	0	0.25	8/20/2009	21:58	8/20/09 21:58	33.76	32.40	90.31	
8/20/2009	21:37	8/20/2009 21:37	0.5	0	0.25	8/20/2009	22:13	8/20/09 22:13	33.77	32.38	90.29	
8/20/2009	21:52	8/20/2009 21:52	0.5	0	0.25	8/20/2009	22:28	8/20/09 22:28	33.76	32.36	90.25	
8/20/2009	22:07	8/20/2009 22:07	0.5	0	0.25	8/20/2009	22:43	8/20/09 22:43	33.76	32.35	90.23	
8/20/2009	22:22	8/20/2009 22:22	0.5	0	0.25	8/20/2009	22:58	8/20/09 22:58	33.78	32.33	90.20	
8/20/2009	22:37	8/20/2009 22:37	0.5	0	0.25	8/20/2009	23:13	8/20/09 23:13	33.90	32.31	90.15	
8/20/2009	22:52	8/20/2009 22:52	0.5	0	0.25	8/20/2009	23:28	8/20/09 23:28	33.91	32.30	90.14	
8/20/2009	23:07	8/20/2009 23:07	0.5	0	0.25	8/20/2009	23:43	8/20/09 23:43	33.98	32.29	90.13	
8/20/2009	23:22	8/20/2009 23:22	0.5	0	0.25	8/20/2009	23:58	8/20/09 23:58	33.98	32.28	90.11	
8/20/2009	23:37	8/20/2009 23:37	0.5	0	0.25	8/21/2009	0:13	8/21/09 0:13	33.95	32.28	90.10	
8/20/2009	23:52	8/20/2009 23:52	0.5	0	0.25	8/21/2009	0:28	8/21/09 0:28	33.96	32.27	90.08	
8/21/2009	0:07	8/21/2009 0:07	0.5	0	0.25	8/21/2009	0:43	8/21/09 0:43	33.99	32.26	90.06	
8/21/2009	0:22	8/21/2009 0:22	0.5	0	0.25	8/21/2009	0:58	8/21/09 0:58	33.94	32.24	90.03	
8/21/2009	0:37	8/21/2009 0:37	0.5	0	0.25	8/21/2009	1:13	8/21/09 1:13	33.96	32.23	90.01	
8/21/2009	0:52	8/21/2009 0:52	0	0	0	8/21/2009	1:28	8/21/09 1:28	33.91	32.22	89.99	
8/21/2009	1:07	8/21/2009 1:07	0.5	0	0.25	8/21/2009	1:43	8/21/09 1:43	33.84	32.21	89.97	
8/21/2009	1:22	8/21/2009 1:22	0	0	0	8/21/2009	1:58	8/21/09 1:58	33.79	32.19	89.94	
8/21/2009	1:37	8/21/2009 1:37	0.5	0	0.25	8/21/2009	2:13	8/21/09 2:13	33.72	32.18	89.93	
8/21/2009	1:52	8/21/2009 1:52	0	0	0	8/21/2009	2:28	8/21/09 2:28	33.71	32.17	89.91	
8/21/2009	2:07	8/21/2009 2:07	0	0	0	8/21/2009	2:43	8/21/09 2:43	33.66	32.17	89.90	
8/21/2009	2:22	8/21/2009 2:22	0.5	0	0.25	8/21/2009	2:58	8/21/09 2:58	33.59	32.15	89.87	
8/21/2009	2:37	8/21/2009 2:37	0.5	0	0.25	8/21/2009	3:13	8/21/09 3:13	33.62	32.14	89.85	
8/21/2009	2:52	8/21/2009 2:52	0.5	0	0.25	8/21/2009	3:28	8/21/09 3:28	33.68	32.12	89.82	
8/21/2009	3:07	8/21/2009 3:07	0.5	0	0.25	8/21/2009	3:43	8/21/09 3:43	33.67	32.09	89.77	
8/21/2009	3:22	8/21/2009 3:22	0.5	0	0.25	8/21/2009	3:58	8/21/09 3:58	33.71	32.06	89.71	
8/21/2009	3:37	8/21/2009 3:37	0.5	0	0.25	8/21/2009	4:13	8/21/09 4:13	33.70	32.02	89.64	
8/21/2009	3:52	8/21/2009 3:52	0.5	0	0.25	8/21/2009	4:28	8/21/09 4:28	33.68	31.99	89.59	
8/21/2009	4:07	8/21/2009 4:07	0.5	0	0.25	8/21/2009	4:43	8/21/09 4:43	33.66	31.96	89.53	
8/21/2009	4:22	8/21/2009 4:22	0.5	0	0.25	8/21/2009	4:58	8/21/09 4:58	33.69	31.93	89.48	
8/21/2009	4:37	8/21/2009 4:37	0.5	0	0.25	8/21/2009	5:13	8/21/09 5:13	33.59	31.94	89.49	
8/21/2009	4:52	8/21/2009 4:52	0.5	0	0.25	8/21/2009	5:28	8/21/09 5:28	33.60	31.94	89.49	
8/21/2009	5:07	8/21/2009 5:07	0.5	-0.5	0	8/21/2009	5:43	8/21/09 5:43	33.63	31.92	89.45	
8/21/2009	5:22	8/21/2009 5:22	0.5	0	0.25	8/21/2009	5:58	8/21/09 5:58	33.61	31.92	89.45	
8/21/2009	5:37	8/21/2009 5:37	0.5	0	0.25	8/21/2009	6:13	8/21/09 6:13	33.62	31.90	89.43	
8/21/2009	5:52	8/21/2009 5:52	0	0	0	8/21/2009	6:28	8/21/09 6:28	33.70	31.91	89.44	
8/21/2009	6:07	8/21/2009 6:07	0.5	0	0.25	8/21/2009	6:43	8/21/09 6:43	33.74	31.91	89.44	
8/21/2009	6:22	8/21/2009 6:22	0.5	0	0.25	8/21/2009	6:58	8/21/09 6:58	33.80	31.89	89.40	
8/21/2009	6:37	8/21/2009 6:37	0.5	0	0.25	8/21/2009	7:13	8/21/09 7:13	33.80	31.92	89.45	
8/21/2009	6:52	8/21/2009 6:52	0.5	0	0.25	8/21/2009	7:28	8/21/09 7:28	33.82	31.92	89.45	
8/21/2009	7:07	8/21/2009 7:07	0.5	0	0.25	8/21/2009	7:43	8/21/09 7:43	33.95	31.90	89.42	
8/21/2009	7:22	8/21/2009 7:22	0.5	0	0.25	8/21/2009	7:58	8/21/09 7:58	33.96	31.84	89.31	
8/21/2009	7:37	8/21/2009 7:37	0.5	0	0.25	8/21/2009	8:13	8/21/09 8:13	33.98	31.84	89.32	
8/21/2009	7:52	8/21/2009 7:52	0.5	0	0.25	8/21/2009	8:28	8/21/09 8:28	33.91	31.74	89.12	
8/21/2009	8:07	8/21/2009 8:07	0	0	0	8/21/2009	8:43	8/21/09 8:43	33.89	31.67	89.01	
8/21/2009	8:22	8/21/2009 8:22	0.5	0	0.25	8/21/2009	8:58	8/21/09 8:58	33.90	31.64	88.94	
8/21/2009	8:37	8/21/2009 8:37	0	0	0	8/21/2009	9:13	8/21/09 9:13	33.86	31.55	88.79	
8/21/2009	8:52	8/21/2009 8:52	0.5	-0.5	0	8/21/2009	9:28	8/21/09 9:28	33.87	31.53	88.76	
8/21/2009	9:07	8/21/2009 9:07	0.5	-0.5	0	8/21/2009	9:43	8/21/09 9:43	33.85	31.51	88.71	
8/21/2009	9:22	8/21/2009 9:22	0	0	0	8/21/2009	9:58	8/21/09 9:58	33.89	31.55	88.78	

Table G-1

Phase I Pressure Difference Measurements [a]

St. Julien's Creek Annex Building 1556

Date	Time	Date + Time	Maximum Differential Pressure[d] [Pa]	Minimum Differential Pressure[d] [Pa]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
8/21/2009	9:37	8/21/2009 9:37	0.5	-0.5	0	8/21/2009	10:13	8/21/09 10:13	33.90	31.59	88.87	
8/21/2009	9:52	8/21/2009 9:52	0.5	-0.5	0	8/21/2009	10:28	8/21/09 10:28	33.95	31.64	88.96	
8/21/2009	10:07	8/21/2009 10:07	0.5	0	0.25	8/21/2009	10:43	8/21/09 10:43	33.94	31.72	89.09	
8/21/2009	10:22	8/21/2009 10:22	0.5	0	0.25	8/21/2009	10:58	8/21/09 10:58	33.96	31.76	89.18	
8/21/2009	10:37	8/21/2009 10:37	0.5	0	0.25	8/21/2009	11:13	8/21/09 11:13	33.98	31.83	89.29	
8/21/2009	10:52	8/21/2009 10:52	0.5	-0.5	0	8/21/2009	11:28	8/21/09 11:28	33.90	31.93	89.48	
8/21/2009	11:07	8/21/2009 11:07	0.5	-0.5	0	8/21/2009	11:43	8/21/09 11:43	33.86	31.99	89.58	
8/21/2009	11:22	8/21/2009 11:22	0.5	-1	-0.25	8/21/2009	11:58	8/21/09 11:58	33.77	32.02	89.64	
8/21/2009	11:37	8/21/2009 11:37	1	-0.5	0.25	8/21/2009	12:13	8/21/09 12:13	33.73	32.09	89.76	
8/21/2009	11:52	8/21/2009 11:52	0.5	-0.5	0	8/21/2009	12:28	8/21/09 12:28	33.64	32.17	89.90	
8/21/2009	12:07	8/21/2009 12:07	0.5	-0.5	0	8/21/2009	12:43	8/21/09 12:43	33.48	32.17	89.91	
8/21/2009	12:22	8/21/2009 12:22	0	-0.5	-0.25	8/21/2009	12:58	8/21/09 12:58	33.42	32.22	89.99	
8/21/2009	12:37	8/21/2009 12:37	0.5	-0.5	0	8/21/2009	13:13	8/21/09 13:13	33.48	32.24	90.02	
8/21/2009	12:52	8/21/2009 12:52	0.5	-0.5	0	8/21/2009	13:28	8/21/09 13:28	33.34	32.28	90.10	
8/21/2009	13:07	8/21/2009 13:07	0.5	-0.5	0	8/21/2009	13:43	8/21/09 13:43	33.25	32.35	90.22	
8/21/2009	13:22	8/21/2009 13:22	0.5	-0.5	0	8/21/2009	13:58	8/21/09 13:58	33.16	32.38	90.28	
8/21/2009	13:37	8/21/2009 13:37	0.5	-0.5	0	8/21/2009	14:13	8/21/09 14:13	33.01	32.41	90.33	
8/21/2009	13:52	8/21/2009 13:52	0	-0.5	-0.25	8/21/2009	14:28	8/21/09 14:28	32.96	32.46	90.42	
8/21/2009	14:07	8/21/2009 14:07	0.5	-0.5	0	8/21/2009	14:43	8/21/09 14:43	32.93	32.49	90.47	
8/21/2009	14:22	8/21/2009 14:22	0.5	-0.5	0	8/21/2009	14:58	8/21/09 14:58	32.98	32.49	90.48	
8/21/2009	14:37	8/21/2009 14:37	0	-0.5	-0.25	8/21/2009	15:13	8/21/09 15:13	32.94	32.42	90.35	
8/21/2009	14:52	8/21/2009 14:52	1	-0.5	0.25	8/21/2009	15:28	8/21/09 15:28	32.93	32.38	90.29	
8/21/2009	15:07	8/21/2009 15:07	0.5	-0.5	0	8/21/2009	15:43	8/21/09 15:43	32.89	32.37	90.26	
8/21/2009	15:22	8/21/2009 15:22	0.5	0	0.25	8/21/2009	15:58	8/21/09 15:58	32.69	32.37	90.26	
8/21/2009	15:37	8/21/2009 15:37	0	0	0	8/21/2009	16:13	8/21/09 16:13	32.76	32.33	90.20	
8/21/2009	15:52	8/21/2009 15:52	0	0	0	8/21/2009	16:28	8/21/09 16:28	32.68	32.28	90.11	
8/21/2009	16:07	8/21/2009 16:07	0.5	0	0.25	8/21/2009	16:43	8/21/09 16:43	32.76	32.26	90.06	
8/21/2009	16:22	8/21/2009 16:22	0.5	0	0.25	8/21/2009	16:58	8/21/09 16:58	32.78	32.24	90.03	
8/21/2009	16:37	8/21/2009 16:37	0.5	0	0.25	8/21/2009	17:13	8/21/09 17:13	32.77	32.23	90.02	
8/21/2009	16:52	8/21/2009 16:52	1	-0.5	0.25	8/21/2009	17:28	8/21/09 17:28	32.81	32.24	90.03	
8/21/2009	17:07	8/21/2009 17:07	0.5	0	0.25	8/21/2009	17:43	8/21/09 17:43	32.73	32.25	90.06	
8/21/2009	17:22	8/21/2009 17:22	0.5	0	0.25	8/21/2009	17:58	8/21/09 17:58	32.45	32.26	90.06	
8/21/2009	17:37	8/21/2009 17:37	0.5	-0.5	0	8/21/2009	18:13	8/21/09 18:13	32.50	32.26	90.07	
8/21/2009	17:52	8/21/2009 17:52	0	-0.5	-0.25	8/21/2009	18:28	8/21/09 18:28	32.46	32.26	90.06	
8/21/2009	18:07	8/21/2009 18:07	1	-0.5	0.25	8/21/2009	18:43	8/21/09 18:43	32.45	32.25	90.05	
8/21/2009	18:22	8/21/2009 18:22	0.5	0	0.25	8/21/2009	18:58	8/21/09 18:58	32.54	32.25	90.05	
8/21/2009	18:37	8/21/2009 18:37	0.5	-0.5	0	8/21/2009	19:13	8/21/09 19:13	32.50	32.24	90.04	
8/21/2009	18:52	8/21/2009 18:52	0.5	0	0.25	8/21/2009	19:28	8/21/09 19:28	32.52	32.23	90.01	
8/21/2009	19:07	8/21/2009 19:07	0.5	0	0.25	8/21/2009	19:43	8/21/09 19:43	32.53	32.23	90.01	
8/21/2009	19:22	8/21/2009 19:22	0.5	0	0.25	8/21/2009	19:58	8/21/09 19:58	32.52	32.22	89.99	
8/21/2009	19:37	8/21/2009 19:37	0.5	0	0.25	8/21/2009	20:13	8/21/09 20:13	32.54	32.20	89.96	
8/21/2009	19:52	8/21/2009 19:52	0.5	0	0.25	8/21/2009	20:28	8/21/09 20:28	32.55	32.20	89.96	
8/21/2009	20:07	8/21/2009 20:07	0.5	0	0.25	8/21/2009	20:43	8/21/09 20:43	32.51	32.18	89.92	
8/21/2009	20:22	8/21/2009 20:22	0.5	0	0.25	8/21/2009	20:58	8/21/09 20:58	32.57	32.16	89.88	
8/21/2009	20:37	8/21/2009 20:37	0.5	0	0.25	8/21/2009	21:13	8/21/09 21:13	32.67	32.14	89.85	
8/21/2009	20:52	8/21/2009 20:52	0.5	0	0.25	8/21/2009	21:28	8/21/09 21:28	32.78	32.12	89.81	
8/21/2009	21:07	8/21/2009 21:07	0.5	0	0.25	8/21/2009	21:43	8/21/09 21:43	32.85	32.10	89.78	
8/21/2009	21:22	8/21/2009 21:22	0.5	0	0.25	8/21/2009	21:58	8/21/09 21:58	32.91	32.09	89.76	
8/21/2009	21:37	8/21/2009 21:37	0.5	0	0.25	8/21/2009	22:13	8/21/09 22:13	32.94	32.07	89.73	
8/21/2009	21:52	8/21/2009 21:52	0.5	0	0.25	8/21/2009	22:28	8/21/09 22:28	32.87	32.07	89.73	
8/21/2009	22:07	8/21/2009 22:07	0.5	0	0.25	8/21/2009	22:43	8/21/09 22:43	32.89	32.06	89.71	
8/21/2009	22:22	8/21/2009 22:22	0.5	0	0.25	8/21/2009	22:58	8/21/09 22:58	32.90	32.04	89.67	
8/21/2009	22:37	8/21/2009 22:37	0.5	0	0.25	8/21/2009	23:13	8/21/09 23:13	32.89	32.03	89.66	
8/21/2009	22:52	8/21/2009 22:52	0.5	0	0.25	8/21/2009	23:28	8/21/09 23:28	32.83	32.02	89.64	
8/21/2009	23:07	8/21/2009 23:07	0.5	0	0.25	8/21/2009	23:43	8/21/09 23:43	32.81	32.00	89.59	
8/21/2009	23:22	8/21/2009 23:22	0.5	0	0.25	8/21/2009	23:58	8/21/09 23:58	32.82	31.99	89.57	
8/21/2009	23:37	8/21/2009 23:37	0.5	0	0.25	8/22/2009	0:13	8/22/09 0:13	32.84	31.97	89.54	
8/21/2009	23:52	8/21/2009 23:52	0.5	0	0.25	8/22/2009	0:28	8/22/09 0:28	32.80	31.96	89.52	
8/22/2009	0:07	8/22/2009 0:07	0.5	0	0.25	8/22/2009	0:43	8/22/09 0:43	32.76	31.95	89.51	
8/22/2009	0:22	8/22/2009 0:22	0.5	0	0.25	8/22/2009	0:58	8/22/09 0:58	32.74	31.95	89.50	
8/22/2009	0:37	8/22/2009 0:37	0.5	0	0.25	8/22/2009	1:13	8/22/09 1:13	32.71	31.95	89.50	
8/22/2009	0:52	8/22/2009 0:52	0.5	0	0.25	8/22/2009	1:28	8/22/09 1:28	32.67	31.95	89.51	

Table G-1

Phase I Pressure Difference Measurements [a]

St. Julien's Creek Annex Building 1556

Date	Time	Date + Time	Maximum Differential Pressure[d] [Pa]	Minimum Differential Pressure[d] [Pa]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
8/22/2009	1:07	8/22/2009 1:07	0.5	0	0.25	8/22/2009	1:43	8/22/09 1:43	32.58	31.94	89.49	
8/22/2009	1:22	8/22/2009 1:22	0.5	0	0.25	8/22/2009	1:58	8/22/09 1:58	32.51	31.95	89.50	
8/22/2009	1:37	8/22/2009 1:37	0	0	0	8/22/2009	2:13	8/22/09 2:13	32.45	31.94	89.49	
8/22/2009	1:52	8/22/2009 1:52	0	0	0	8/22/2009	2:28	8/22/09 2:28	32.42	31.93	89.48	
8/22/2009	2:07	8/22/2009 2:07	0.5	0	0.25	8/22/2009	2:43	8/22/09 2:43	32.42	31.92	89.46	
8/22/2009	2:22	8/22/2009 2:22	0	0	0	8/22/2009	2:58	8/22/09 2:58	32.38	31.92	89.46	
8/22/2009	2:37	8/22/2009 2:37	0.5	0	0.25	8/22/2009	3:13	8/22/09 3:13	32.35	31.91	89.44	
8/22/2009	2:52	8/22/2009 2:52	0.5	0	0.25	8/22/2009	3:28	8/22/09 3:28	32.33	31.90	89.42	
8/22/2009	3:07	8/22/2009 3:07	0.5	0	0.25	8/22/2009	3:43	8/22/09 3:43	32.21	31.88	89.39	
8/22/2009	3:22	8/22/2009 3:22	0	0	0	8/22/2009	3:58	8/22/09 3:58	32.13	31.87	89.36	
8/22/2009	3:37	8/22/2009 3:37	0	0	0	8/22/2009	4:13	8/22/09 4:13	32.13	31.86	89.35	
8/22/2009	3:52	8/22/2009 3:52	0	0	0	8/22/2009	4:28	8/22/09 4:28	32.13	31.85	89.34	
8/22/2009	4:07	8/22/2009 4:07	0.5	0	0.25	8/22/2009	4:43	8/22/09 4:43	32.16	31.86	89.34	
8/22/2009	4:22	8/22/2009 4:22	0.5	0	0.25	8/22/2009	4:58	8/22/09 4:58	32.02	31.86	89.34	
8/22/2009	4:37	8/22/2009 4:37	0.5	0	0.25	8/22/2009	5:13	8/22/09 5:13	31.96	31.85	89.32	
8/22/2009	4:52	8/22/2009 4:52	0.5	0	0.25	8/22/2009	5:28	8/22/09 5:28	31.96	31.85	89.34	
8/22/2009	5:07	8/22/2009 5:07	0	0	0	8/22/2009	5:43	8/22/09 5:43	31.94	31.84	89.31	
8/22/2009	5:22	8/22/2009 5:22	0	0	0	8/22/2009	5:58	8/22/09 5:58	31.86	31.85	89.33	
8/22/2009	5:37	8/22/2009 5:37	0.5	0	0.25	8/22/2009	6:13	8/22/09 6:13	31.87	31.86	89.35	
8/22/2009	5:52	8/22/2009 5:52	0	0	0	8/22/2009	6:28	8/22/09 6:28	31.88	31.74	89.14	
8/22/2009	6:07	8/22/2009 6:07	0.5	0	0.25	8/22/2009	6:43	8/22/09 6:43	31.86	31.71	89.07	
8/22/2009	6:22	8/22/2009 6:22	0	0	0	8/22/2009	6:58	8/22/09 6:58	31.86	31.73	89.11	
8/22/2009	6:37	8/22/2009 6:37	0	0	0	8/22/2009	7:13	8/22/09 7:13	31.91	31.73	89.11	
8/22/2009	6:52	8/22/2009 6:52	0	0	0	8/22/2009	7:28	8/22/09 7:28	31.91	31.73	89.12	
8/22/2009	7:07	8/22/2009 7:07	0.5	0	0.25	8/22/2009	7:43	8/22/09 7:43	31.90	31.75	89.15	
8/22/2009	7:22	8/22/2009 7:22	0.5	0	0.25	8/22/2009	7:58	8/22/09 7:58	31.88	31.75	89.15	
8/22/2009	7:37	8/22/2009 7:37	0	0	0	8/22/2009	8:13	8/22/09 8:13	31.85	31.70	89.05	
8/22/2009	7:52	8/22/2009 7:52	0	0	0	8/22/2009	8:28	8/22/09 8:28	31.86	31.69	89.04	
8/22/2009	8:07	8/22/2009 8:07	0	0	0	8/22/2009	8:43	8/22/09 8:43	31.84	31.72	89.09	
8/22/2009	8:22	8/22/2009 8:22	0	0	0	8/22/2009	8:58	8/22/09 8:58	31.82	31.70	89.06	
8/22/2009	8:37	8/22/2009 8:37	0	0	0	8/22/2009	9:13	8/22/09 9:13	31.82	31.69	89.05	
8/22/2009	8:52	8/22/2009 8:52	0	0	0	8/22/2009	9:28	8/22/09 9:28	31.82	31.65	88.97	
8/22/2009	9:07	8/22/2009 9:07	0	0	0	8/22/2009	9:43	8/22/09 9:43	31.85	31.66	88.99	
8/22/2009	9:22	8/22/2009 9:22	0	0	0	8/22/2009	9:58	8/22/09 9:58	31.85	31.68	89.02	
8/22/2009	9:37	8/22/2009 9:37	0.5	0	0.25	8/22/2009	10:13	8/22/09 10:13	31.79	31.75	89.15	
8/22/2009	9:52	8/22/2009 9:52	0.5	0	0.25	8/22/2009	10:28	8/22/09 10:28	31.80	31.79	89.21	
8/22/2009	10:07	8/22/2009 10:07	0	0	0	8/22/2009	10:43	8/22/09 10:43	31.74	31.79	89.23	
8/22/2009	10:22	8/22/2009 10:22	0.5	0	0.25	8/22/2009	10:58	8/22/09 10:58	31.67	31.74	89.13	
8/22/2009	10:37	8/22/2009 10:37				8/22/2009	11:13	8/22/09 11:13	31.69	31.72	89.10	Power Failure on OmniGuard
8/22/2009	10:52	8/22/2009 10:52				8/22/2009	11:28	8/22/09 11:28	31.70	31.59	88.86	Power Failure on OmniGuard
8/22/2009	11:07	8/22/2009 11:07				8/22/2009	11:43	8/22/09 11:43	31.59	31.53	88.75	Power Failure on OmniGuard
8/22/2009	11:22	8/22/2009 11:22				8/22/2009	11:58	8/22/09 11:58	31.50	31.54	88.77	Power Failure on OmniGuard
8/22/2009	11:37	8/22/2009 11:37				8/22/2009	12:13	8/22/09 12:13	31.33	31.58	88.84	Power Failure on OmniGuard
8/22/2009	11:52	8/22/2009 11:52				8/22/2009	12:28	8/22/09 12:28	31.20	31.62	88.91	Power Failure on OmniGuard
8/22/2009	12:07	8/22/2009 12:07				8/22/2009	12:43	8/22/09 12:43	31.06	31.64	88.94	Power Failure on OmniGuard
8/22/2009	12:22	8/22/2009 12:22				8/22/2009	12:58	8/22/09 12:58	30.97	31.63	88.94	Power Failure on OmniGuard
8/22/2009	12:37	8/22/2009 12:37				8/22/2009	13:13	8/22/09 13:13	30.75	31.64	88.95	Power Failure on OmniGuard
8/22/2009	12:52	8/22/2009 12:52				8/22/2009	13:28	8/22/09 13:28	30.55	31.64	88.96	Power Failure on OmniGuard
8/22/2009	13:07	8/22/2009 13:07				8/22/2009	13:43	8/22/09 13:43	30.43	31.63	88.93	Power Failure on OmniGuard
8/22/2009	13:22	8/22/2009 13:22				8/22/2009	13:58	8/22/09 13:58	30.38	31.63	88.93	Power Failure on OmniGuard

Table G-1
Phase I Pressure Difference Measurements [a]
St. Julien's Creek Annex Building 1556

Date	Time	Date + Time	Maximum Differential Pressure[d] [Pa]	Minimum Differential Pressure[d] [Pa]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
8/22/2009	13:37	8/22/2009 13:37				8/22/2009	14:13	8/22/09 14:13	30.35	31.63	88.94	Power Failure on OmniGuard
8/22/2009	13:52	8/22/2009 13:52				8/22/2009	14:28	8/22/09 14:28	30.14	31.64	88.95	Power Failure on OmniGuard
8/22/2009	14:07	8/22/2009 14:07				8/22/2009	14:43	8/22/09 14:43	30.11	31.66	88.99	Power Failure on OmniGuard
8/22/2009	14:22	8/22/2009 14:22				8/22/2009	14:58	8/22/09 14:58	30.21	31.72	89.09	Power Failure on OmniGuard
8/22/2009	14:37	8/22/2009 14:37				8/22/2009	15:13	8/22/09 15:13	30.18	31.80	89.24	Power Failure on OmniGuard
8/22/2009	14:52	8/22/2009 14:52				8/22/2009	15:28	8/22/09 15:28	30.31	31.88	89.38	Power Failure on OmniGuard
8/22/2009	14:57	8/22/2009 14:57	0	-59	-29.5	8/22/2009	15:43	8/22/09 15:43	30.11	31.97	89.54	
8/22/2009	15:12	8/22/2009 15:12	0	0	0	8/22/2009	15:58	8/22/09 15:58	30.16	32.03	89.65	
8/22/2009	15:27	8/22/2009 15:27	0	0	0	8/22/2009	16:13	8/22/09 16:13	30.80	32.09	89.77	
8/22/2009	15:42	8/22/2009 15:42	0	0	0	8/22/2009	16:28	8/22/09 16:28	30.89	32.09	89.75	
8/22/2009	15:57	8/22/2009 15:57	0	0	0	8/22/2009	16:43	8/22/09 16:43	30.91	32.06	89.71	
8/22/2009	16:12	8/22/2009 16:12	0	0	0	8/22/2009	16:58	8/22/09 16:58	30.97	32.04	89.67	
8/22/2009	16:27	8/22/2009 16:27	0	0	0	8/22/2009	17:13	8/22/09 17:13	31.00	32.00	89.61	
8/22/2009	16:42	8/22/2009 16:42	0	0	0	8/22/2009	17:28	8/22/09 17:28	31.08	31.97	89.55	
8/22/2009	16:57	8/22/2009 16:57	0	0	0	8/22/2009	17:43	8/22/09 17:43	30.97	31.95	89.50	
8/22/2009	17:12	8/22/2009 17:12	0	0	0	8/22/2009	17:58	8/22/09 17:58	31.06	31.91	89.43	
8/22/2009	17:27	8/22/2009 17:27	0	0	0	8/22/2009	18:13	8/22/09 18:13	31.24	31.87	89.37	
8/22/2009	17:42	8/22/2009 17:42	0	0	0	8/22/2009	18:28	8/22/09 18:28	31.19	31.83	89.30	
8/22/2009	17:57	8/22/2009 17:57	0	0	0	8/22/2009	18:43	8/22/09 18:43	31.05	31.81	89.26	
8/22/2009	18:12	8/22/2009 18:12	0	0	0	8/22/2009	18:58	8/22/09 18:58	30.98	31.77	89.18	
8/22/2009	18:27	8/22/2009 18:27	0	0	0	8/22/2009	19:13	8/22/09 19:13	30.95	31.71	89.08	
8/22/2009	18:42	8/22/2009 18:42	0	0	0	8/22/2009	19:28	8/22/09 19:28	30.93	31.66	88.99	
8/22/2009	18:57	8/22/2009 18:57	0	0	0	8/22/2009	19:43	8/22/09 19:43	30.83	31.61	88.90	
8/22/2009	19:12	8/22/2009 19:12	0	0	0	8/22/2009	19:58	8/22/09 19:58	30.72	31.56	88.80	
8/22/2009	19:27	8/22/2009 19:27	0	0	0	8/22/2009	20:13	8/22/09 20:13	30.72	31.50	88.70	
8/22/2009	19:42	8/22/2009 19:42	0	0	0	8/22/2009	20:28	8/22/09 20:28	30.81	31.46	88.63	
8/22/2009	19:57	8/22/2009 19:57	0	0	0	8/22/2009	20:43	8/22/09 20:43	30.85	31.42	88.56	
8/22/2009	20:12	8/22/2009 20:12	0	0	0	8/22/2009	20:58	8/22/09 20:58	30.97	31.38	88.49	
8/22/2009	20:27	8/22/2009 20:27	0	0	0	8/22/2009	21:13	8/22/09 21:13	30.98	31.37	88.46	
8/22/2009	20:42	8/22/2009 20:42	0	0	0	8/22/2009	21:28	8/22/09 21:28	31.09	31.34	88.40	
8/22/2009	20:57	8/22/2009 20:57	0	0	0	8/22/2009	21:43	8/22/09 21:43	31.18	31.31	88.37	
8/22/2009	21:12	8/22/2009 21:12	0	0	0	8/22/2009	21:58	8/22/09 21:58	31.33	31.29	88.32	
8/22/2009	21:27	8/22/2009 21:27	0	0	0	8/22/2009	22:13	8/22/09 22:13	31.31	31.27	88.28	
8/22/2009	21:42	8/22/2009 21:42	0	0	0	8/22/2009	22:28	8/22/09 22:28	31.34	31.25	88.25	
8/22/2009	21:57	8/22/2009 21:57	0	0	0	8/22/2009	22:43	8/22/09 22:43	31.37	31.23	88.21	
8/22/2009	22:12	8/22/2009 22:12	0	0	0	8/22/2009	22:58	8/22/09 22:58	31.28	31.21	88.18	
8/22/2009	22:27	8/22/2009 22:27	0	0	0	8/22/2009	23:13	8/22/09 23:13	31.35	31.18	88.13	
8/22/2009	22:42	8/22/2009 22:42	0	0	0	8/22/2009	23:28	8/22/09 23:28	31.31	31.16	88.09	
8/22/2009	22:57	8/22/2009 22:57	0	0	0	8/22/2009	23:43	8/22/09 23:43	31.42	31.14	88.04	
8/22/2009	23:12	8/22/2009 23:12	0	0	0	8/22/2009	23:58	8/22/09 23:58	31.46	31.10	87.99	
8/22/2009	23:27	8/22/2009 23:27	0	0	0	8/23/2009	0:13	8/23/09 0:13	31.47	31.06	87.91	
8/22/2009	23:42	8/22/2009 23:42	0	0	0	8/23/2009	0:28	8/23/09 0:28	31.51	31.04	87.87	
8/22/2009	23:57	8/22/2009 23:57	0	0	0	8/23/2009	0:43	8/23/09 0:43	31.50	31.00	87.80	
8/23/2009	0:12	8/23/2009 0:12	0	0	0	8/23/2009	0:58	8/23/09 0:58	31.47	30.97	87.75	
8/23/2009	0:27	8/23/2009 0:27	0	0	0	8/23/2009	1:13	8/23/09 1:13	31.45	30.94	87.68	
8/23/2009	0:42	8/23/2009 0:42	0	0	0	8/23/2009	1:28	8/23/09 1:28	31.45	30.92	87.65	
8/23/2009	0:57	8/23/2009 0:57	0	0	0	8/23/2009	1:43	8/23/09 1:43	31.39	30.89	87.60	
8/23/2009	1:12	8/23/2009 1:12	0	0	0	8/23/2009	1:58	8/23/09 1:58	31.44	30.86	87.55	
8/23/2009	1:27	8/23/2009 1:27	0	0	0	8/23/2009	2:13	8/23/09 2:13	31.45	30.83	87.50	
8/23/2009	1:42	8/23/2009 1:42	0	0	0	8/23/2009	2:28	8/23/09 2:28	31.42	30.80	87.43	
8/23/2009	1:57	8/23/2009 1:57	0	0	0	8/23/2009	2:43	8/23/09 2:43	31.49	30.76	87.37	
8/23/2009	2:12	8/23/2009 2:12	0	0	0	8/23/2009	2:58	8/23/09 2:58	31.49	30.73	87.32	
8/23/2009	2:27	8/23/2009 2:27	0	0	0	8/23/2009	3:13	8/23/09 3:13	31.52	30.70	87.26	
8/23/2009	2:42	8/23/2009 2:42	0	0	0	8/23/2009	3:28	8/23/09 3:28	31.57	30.67	87.20	
8/23/2009	2:57	8/23/2009 2:57	0	0	0	8/23/2009	3:43	8/23/09 3:43	31.67	30.64	87.15	
8/23/2009	3:12	8/23/2009 3:12	0	0	0	8/23/2009	3:58	8/23/09 3:58	31.64	30.61	87.09	

Table G-1

Phase I Pressure Difference Measurements [a]

St. Julien's Creek Annex Building 1556

Date	Time	Date + Time	Maximum Differential Pressure[d] [Pa]	Minimum Differential Pressure[d] [Pa]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
8/23/2009	3:27	8/23/2009 3:27	0	0	0	8/23/2009	4:13	8/23/09 4:13	31.61	30.57	87.03	
8/23/2009	3:42	8/23/2009 3:42	0	0	0	8/23/2009	4:28	8/23/09 4:28	31.59	30.55	86.98	
8/23/2009	3:57	8/23/2009 3:57	0	0	0	8/23/2009	4:43	8/23/09 4:43	31.61	30.51	86.91	
8/23/2009	4:12	8/23/2009 4:12	0	0	0	8/23/2009	4:58	8/23/09 4:58	31.69	30.48	86.86	
8/23/2009	4:27	8/23/2009 4:27	0	0	0	8/23/2009	5:13	8/23/09 5:13	31.69	30.45	86.80	
8/23/2009	4:42	8/23/2009 4:42	0	0	0	8/23/2009	5:28	8/23/09 5:28	31.70	30.41	86.74	
8/23/2009	4:57	8/23/2009 4:57	0	0	0	8/23/2009	5:43	8/23/09 5:43	31.86	30.38	86.69	
8/23/2009	5:12	8/23/2009 5:12	0	0	0	8/23/2009	5:58	8/23/09 5:58	31.92	30.36	86.64	
8/23/2009	5:27	8/23/2009 5:27	0	0	0	8/23/2009	6:13	8/23/09 6:13	31.91	30.33	86.60	
8/23/2009	5:42	8/23/2009 5:42	0	0	0	8/23/2009	6:28	8/23/09 6:28	31.97	30.31	86.56	
8/23/2009	5:57	8/23/2009 5:57	0	0	0	8/23/2009	6:43	8/23/09 6:43	32.13	30.29	86.52	
8/23/2009	6:12	8/23/2009 6:12	0	0	0	8/23/2009	6:58	8/23/09 6:58	32.26	30.27	86.48	
8/23/2009	6:27	8/23/2009 6:27	0	0	0	8/23/2009	7:13	8/23/09 7:13	32.33	30.26	86.46	
8/23/2009	6:42	8/23/2009 6:42	0	0	0	8/23/2009	7:28	8/23/09 7:28	32.38	30.24	86.43	
8/23/2009	6:57	8/23/2009 6:57	0	0	0	8/23/2009	7:43	8/23/09 7:43	32.40	30.23	86.41	
8/23/2009	7:12	8/23/2009 7:12	0	0	0	8/23/2009	7:58	8/23/09 7:58	32.43	30.23	86.41	
8/23/2009	7:27	8/23/2009 7:27	0	0	0	8/23/2009	8:13	8/23/09 8:13	32.41	30.22	86.40	
8/23/2009	7:42	8/23/2009 7:42	0	0	0	8/23/2009	8:28	8/23/09 8:28	32.38	30.23	86.41	
8/23/2009	7:57	8/23/2009 7:57	0	0	0	8/23/2009	8:43	8/23/09 8:43	32.44	30.25	86.45	
8/23/2009	8:12	8/23/2009 8:12	0	0	0	8/23/2009	8:58	8/23/09 8:58	32.49	30.28	86.51	
8/23/2009	8:27	8/23/2009 8:27	0	0	0	8/23/2009	9:13	8/23/09 9:13	32.47	30.32	86.58	
8/23/2009	8:42	8/23/2009 8:42	0	0	0	8/23/2009	9:28	8/23/09 9:28	32.45	30.36	86.65	
8/23/2009	8:57	8/23/2009 8:57	0	0	0	8/23/2009	9:43	8/23/09 9:43	32.52	30.41	86.74	
8/23/2009	9:12	8/23/2009 9:12	0	0	0	8/23/2009	9:58	8/23/09 9:58	32.58	30.47	86.84	
8/23/2009	9:27	8/23/2009 9:27	0	0	0	8/23/2009	10:13	8/23/09 10:13	32.63	30.54	86.97	
8/23/2009	9:42	8/23/2009 9:42	0	0	0	8/23/2009	10:28	8/23/09 10:28	32.68	30.61	87.10	
8/23/2009	9:57	8/23/2009 9:57	0	0	0	8/23/2009	10:43	8/23/09 10:43	32.72	30.67	87.21	
8/23/2009	10:12	8/23/2009 10:12	0	0	0	8/23/2009	10:58	8/23/09 10:58	32.74	30.71	87.28	
8/23/2009	10:27	8/23/2009 10:27	0	0	0	8/23/2009	11:13	8/23/09 11:13	32.78	30.76	87.36	
8/23/2009	10:42	8/23/2009 10:42	0	0	0	8/23/2009	11:28	8/23/09 11:28	32.76	30.83	87.49	
8/23/2009	10:57	8/23/2009 10:57	0	0	0	8/23/2009	11:43	8/23/09 11:43	32.77	30.87	87.56	
8/23/2009	11:12	8/23/2009 11:12	0	0	0	8/23/2009	11:58	8/23/09 11:58	32.70	30.90	87.62	
8/23/2009	11:27	8/23/2009 11:27	0	0	0	8/23/2009	12:13	8/23/09 12:13	32.71	30.92	87.66	
8/23/2009	11:42	8/23/2009 11:42	0	0	0	8/23/2009	12:28	8/23/09 12:28	32.69	30.95	87.71	
8/23/2009	11:57	8/23/2009 11:57	0	0	0	8/23/2009	12:43	8/23/09 12:43	32.71	30.97	87.74	
8/23/2009	12:12	8/23/2009 12:12	0	0	0	8/23/2009	12:58	8/23/09 12:58	32.70	30.97	87.75	
8/23/2009	12:27	8/23/2009 12:27	0	0	0	8/23/2009	13:13	8/23/09 13:13	32.75	30.99	87.79	
8/23/2009	12:42	8/23/2009 12:42	0	0	0	8/23/2009	13:28	8/23/09 13:28	32.73	31.01	87.82	
8/23/2009	12:57	8/23/2009 12:57	0	0	0	8/23/2009	13:43	8/23/09 13:43	32.75	31.04	87.87	
8/23/2009	13:12	8/23/2009 13:12	0	0	0	8/23/2009	13:58	8/23/09 13:58	32.73	31.06	87.90	
8/23/2009	13:27	8/23/2009 13:27	0	0	0	8/23/2009	14:13	8/23/09 14:13	32.70	31.07	87.93	
8/23/2009	13:42	8/23/2009 13:42	0	0	0	8/23/2009	14:28	8/23/09 14:28	32.69	31.09	87.96	
8/23/2009	13:57	8/23/2009 13:57	0	0	0	8/23/2009	14:43	8/23/09 14:43	32.67	31.11	88.00	
8/23/2009	14:12	8/23/2009 14:12	0	0	0	8/23/2009	14:58	8/23/09 14:58	32.65	31.12	88.02	
8/23/2009	14:27	8/23/2009 14:27	0	0	0	8/23/2009	15:13	8/23/09 15:13	32.62	31.14	88.05	
8/23/2009	14:42	8/23/2009 14:42	0	0	0	8/23/2009	15:28	8/23/09 15:28	32.57	31.13	88.04	
8/23/2009	14:57	8/23/2009 14:57	0	0	0	8/23/2009	15:43	8/23/09 15:43	32.55	31.14	88.06	
8/23/2009	15:12	8/23/2009 15:12	0	0	0	8/23/2009	15:58	8/23/09 15:58	32.54	31.16	88.08	
8/23/2009	15:27	8/23/2009 15:27	0	0	0	8/23/2009	16:13	8/23/09 16:13	32.53	31.17	88.10	
8/23/2009	15:42	8/23/2009 15:42	0	0	0	8/23/2009	16:28	8/23/09 16:28	32.50	31.19	88.14	
8/23/2009	15:57	8/23/2009 15:57	0	0	0	8/23/2009	16:43	8/23/09 16:43	32.54	31.20	88.17	
8/23/2009	16:12	8/23/2009 16:12	0	0	0	8/23/2009	16:58	8/23/09 16:58	32.54	31.22	88.19	
8/23/2009	16:27	8/23/2009 16:27	0	0	0	8/23/2009	17:13	8/23/09 17:13	32.50	31.22	88.20	
8/23/2009	16:42	8/23/2009 16:42	0	0	0	8/23/2009	17:28	8/23/09 17:28	32.52	31.23	88.21	
8/23/2009	16:57	8/23/2009 16:57	0	0	0	8/23/2009	17:43	8/23/09 17:43	32.59	31.23	88.22	
8/23/2009	17:12	8/23/2009 17:12	0	0	0	8/23/2009	17:58	8/23/09 17:58	32.55	31.23	88.21	
8/23/2009	17:27	8/23/2009 17:27	0	0	0	8/23/2009	18:13	8/23/09 18:13	32.59	31.23	88.21	
8/23/2009	17:42	8/23/2009 17:42	0	0	0	8/23/2009	18:28	8/23/09 18:28	32.62	31.22	88.20	
8/23/2009	17:57	8/23/2009 17:57	0	0	0	8/23/2009	18:43	8/23/09 18:43	32.58	31.22	88.19	
8/23/2009	18:12	8/23/2009 18:12	0	0	0	8/23/2009	18:58	8/23/09 18:58	32.62	31.22	88.19	
8/23/2009	18:27	8/23/2009 18:27	0	0	0	8/23/2009	19:13	8/23/09 19:13	32.66	31.21	88.19	
8/23/2009	18:42	8/23/2009 18:42	0	0	0	8/23/2009	19:28	8/23/09 19:28	32.65	31.21	88.18	

Table G-1

Phase I Pressure Difference Measurements [a]

St. Julien's Creek Annex Building 1556

Date	Time	Date + Time	Maximum Differential Pressure[d] [Pa]	Minimum Differential Pressure[d] [Pa]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
8/23/2009	18:57	8/23/2009 18:57	0	0	0	8/23/2009	19:43	8/23/09 19:43	32.68	31.20	88.16	
8/23/2009	19:12	8/23/2009 19:12	0	0	0	8/23/2009	19:58	8/23/09 19:58	32.84	31.19	88.15	
8/23/2009	19:27	8/23/2009 19:27	0	0	0	8/23/2009	20:13	8/23/09 20:13	32.87	31.20	88.15	
8/23/2009	19:42	8/23/2009 19:42	0	0	0	8/23/2009	20:28	8/23/09 20:28	32.97	31.20	88.15	
8/23/2009	19:57	8/23/2009 19:57	0	0	0	8/23/2009	20:43	8/23/09 20:43	33.11	31.18	88.13	
8/23/2009	20:12	8/23/2009 20:12	0	0	0	8/23/2009	20:58	8/23/09 20:58	33.19	31.17	88.10	
8/23/2009	20:27	8/23/2009 20:27	0	0	0	8/23/2009	21:13	8/23/09 21:13	33.23	31.15	88.06	
8/23/2009	20:42	8/23/2009 20:42	0	0	0	8/23/2009	21:28	8/23/09 21:28	33.32	31.14	88.05	
8/23/2009	20:57	8/23/2009 20:57	0	0	0	8/23/2009	21:43	8/23/09 21:43	33.37	31.12	88.02	
8/23/2009	21:12	8/23/2009 21:12	0	0	0	8/23/2009	21:58	8/23/09 21:58	33.44	31.12	88.02	
8/23/2009	21:27	8/23/2009 21:27	0	0	0	8/23/2009	22:13	8/23/09 22:13	33.48	31.12	88.01	
8/23/2009	21:42	8/23/2009 21:42	0	0	0	8/23/2009	22:28	8/23/09 22:28	33.43	31.12	88.01	
8/23/2009	21:57	8/23/2009 21:57	0	0	0	8/23/2009	22:43	8/23/09 22:43	33.41	31.10	87.98	
8/23/2009	22:12	8/23/2009 22:12	0	0	0	8/23/2009	22:58	8/23/09 22:58	33.35	31.08	87.94	
8/23/2009	22:27	8/23/2009 22:27	0	0	0	8/23/2009	23:13	8/23/09 23:13	33.36	31.06	87.91	
8/23/2009	22:42	8/23/2009 22:42	0	0	0	8/23/2009	23:28	8/23/09 23:28	33.43	31.05	87.88	
8/23/2009	22:57	8/23/2009 22:57	0	0	0	8/23/2009	23:43	8/23/09 23:43	33.49	31.02	87.84	
8/23/2009	23:12	8/23/2009 23:12	0	0	0	8/23/2009	23:58	8/23/09 23:58	33.49	31.02	87.84	
8/23/2009	23:27	8/23/2009 23:27	0	0	0	8/24/2009	0:13	8/24/09 0:13	33.52	31.00	87.81	
8/23/2009	23:42	8/23/2009 23:42	0	0	0	8/24/2009	0:28	8/24/09 0:28	33.53	30.99	87.78	
8/23/2009	23:57	8/23/2009 23:57	0	0	0	8/24/2009	0:43	8/24/09 0:43	33.55	30.98	87.77	
8/24/2009	0:12	8/24/2009 0:12	0	0	0	8/24/2009	0:58	8/24/09 0:58	33.59	30.98	87.76	
8/24/2009	0:27	8/24/2009 0:27	0	0	0	8/24/2009	1:13	8/24/09 1:13	33.65	30.97	87.74	
8/24/2009	0:42	8/24/2009 0:42	0	0	0	8/24/2009	1:28	8/24/09 1:28	33.59	30.96	87.72	
8/24/2009	0:57	8/24/2009 0:57	0	0	0	8/24/2009	1:43	8/24/09 1:43	33.61	30.93	87.67	
8/24/2009	1:12	8/24/2009 1:12	0	0	0	8/24/2009	1:58	8/24/09 1:58	33.64	30.90	87.62	
8/24/2009	1:27	8/24/2009 1:27	0	0	0	8/24/2009	2:13	8/24/09 2:13	33.57	30.87	87.56	
8/24/2009	1:42	8/24/2009 1:42	0	0	0	8/24/2009	2:28	8/24/09 2:28	33.48	30.85	87.52	
8/24/2009	1:57	8/24/2009 1:57	0	0	0	8/24/2009	2:43	8/24/09 2:43	33.41	30.81	87.46	
8/24/2009	2:12	8/24/2009 2:12	0	0	0	8/24/2009	2:58	8/24/09 2:58	33.39	30.78	87.41	
8/24/2009	2:27	8/24/2009 2:27	0	0	0	8/24/2009	3:13	8/24/09 3:13	33.38	30.76	87.37	
8/24/2009	2:42	8/24/2009 2:42	0	0	0	8/24/2009	3:28	8/24/09 3:28	33.46	30.73	87.32	
8/24/2009	2:57	8/24/2009 2:57	0	0	0	8/24/2009	3:43	8/24/09 3:43	33.43	30.70	87.26	
8/24/2009	3:12	8/24/2009 3:12	0	0	0	8/24/2009	3:58	8/24/09 3:58	33.49	30.67	87.21	
8/24/2009	3:27	8/24/2009 3:27	0	0	0	8/24/2009	4:13	8/24/09 4:13	33.55	30.63	87.14	
8/24/2009	3:42	8/24/2009 3:42	0	0	0	8/24/2009	4:28	8/24/09 4:28	33.53	30.60	87.09	
8/24/2009	3:57	8/24/2009 3:57	0	0	0	8/24/2009	4:43	8/24/09 4:43	33.60	30.56	87.02	
8/24/2009	4:12	8/24/2009 4:12	0	0	0	8/24/2009	4:58	8/24/09 4:58	33.62	30.54	86.97	
8/24/2009	4:27	8/24/2009 4:27	0	0	0	8/24/2009	5:13	8/24/09 5:13	33.65	30.51	86.92	
8/24/2009	4:42	8/24/2009 4:42	0	0	0	8/24/2009	5:28	8/24/09 5:28	33.69	30.48	86.87	
8/24/2009	4:57	8/24/2009 4:57	0	0	0	8/24/2009	5:43	8/24/09 5:43	33.78	30.45	86.80	
8/24/2009	5:12	8/24/2009 5:12	0	0	0	8/24/2009	5:58	8/24/09 5:58	33.84	30.42	86.76	
8/24/2009	5:27	8/24/2009 5:27	0	0	0	8/24/2009	6:13	8/24/09 6:13	33.95	30.39	86.71	
8/24/2009	5:42	8/24/2009 5:42	0	0	0	8/24/2009	6:28	8/24/09 6:28	34.02	30.37	86.67	
8/24/2009	5:57	8/24/2009 5:57	0	0	0	8/24/2009	6:43	8/24/09 6:43	34.08	30.32	86.57	
8/24/2009	6:12	8/24/2009 6:12	0	0	0	8/24/2009	6:58	8/24/09 6:58	34.12	30.30	86.54	
8/24/2009	6:27	8/24/2009 6:27	0	0	0	8/24/2009	7:13	8/24/09 7:13	34.21	30.29	86.53	
8/24/2009	6:42	8/24/2009 6:42	0	0	0	8/24/2009	7:28	8/24/09 7:28	34.18	30.30	86.55	
8/24/2009	6:57	8/24/2009 6:57	0	0	0	8/24/2009	7:43	8/24/09 7:43	34.09	30.31	86.56	
8/24/2009	7:12	8/24/2009 7:12	0	0	0	8/24/2009	7:58	8/24/09 7:58	34.11	30.35	86.64	
8/24/2009	7:27	8/24/2009 7:27	0	0	0	8/24/2009	8:13	8/24/09 8:13	34.16	30.36	86.65	
8/24/2009	7:42	8/24/2009 7:42	0	0	0	8/24/2009	8:28	8/24/09 8:28	34.16	30.39	86.70	
8/24/2009	7:57	8/24/2009 7:57	0	0	0	8/24/2009	8:43	8/24/09 8:43	34.22	30.31	86.55	
8/24/2009	8:12	8/24/2009 8:12	0	0	0	8/24/2009	8:58	8/24/09 8:58	34.23	30.26	86.47	
8/24/2009	8:27	8/24/2009 8:27	0	0	0	8/24/2009	9:13	8/24/09 9:13	34.24	30.28	86.50	
8/24/2009	8:42	8/24/2009 8:42	0	0	0	8/24/2009	9:28	8/24/09 9:28	34.32	30.27	86.49	
8/24/2009	8:57	8/24/2009 8:57	0	0	0	8/24/2009	9:43	8/24/09 9:43	34.32	30.30	86.55	
8/24/2009	9:12	8/24/2009 9:12	0	0	0	8/24/2009	9:58	8/24/09 9:58	34.32	30.37	86.67	
8/24/2009	9:27	8/24/2009 9:27	0	0	0	8/24/2009	10:13	8/24/09 10:13	34.34	30.45	86.81	
8/24/2009	9:42	8/24/2009 9:42	0	0	0	8/24/2009	10:28	8/24/09 10:28	34.36	30.47	86.85	
8/24/2009	9:57	8/24/2009 9:57	0	0	0	8/24/2009	10:43	8/24/09 10:43	34.43	30.55	87.00	
8/24/2009	10:12	8/24/2009 10:12	0	0	0	8/24/2009	10:58	8/24/09 10:58	34.50	30.59	87.06	

Table G-1

Phase I Pressure Difference Measurements [a]

St. Julien's Creek Annex Building 1556

Date	Time	Date + Time	Maximum Differential Pressure[d] [Pa]	Minimum Differential Pressure[d] [Pa]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
8/24/2009	10:27	8/24/2009 10:27	0	0	0	8/24/2009	11:13	8/24/09 11:13	34.57	30.65	87.18	
8/24/2009	10:42	8/24/2009 10:42	0	0	0	8/24/2009	11:28	8/24/09 11:28	34.59	30.71	87.28	
8/24/2009	10:57	8/24/2009 10:57	0	0	0	8/24/2009	11:43	8/24/09 11:43	34.59	30.76	87.37	
8/24/2009	11:12	8/24/2009 11:12	0	0	0	8/24/2009	11:58	8/24/09 11:58	34.60	30.86	87.55	
8/24/2009	11:27	8/24/2009 11:27	0	0	0	8/24/2009	12:13	8/24/09 12:13	34.59	30.96	87.72	
8/24/2009	11:42	8/24/2009 11:42	0	0	0	8/24/2009	12:28	8/24/09 12:28	34.58	31.02	87.84	
8/24/2009	11:57	8/24/2009 11:57	0	0	0	8/24/2009	12:43	8/24/09 12:43	34.56	31.07	87.93	
8/24/2009	12:12	8/24/2009 12:12	0	0	0	8/24/2009	12:58	8/24/09 12:58	34.53	31.13	88.04	
8/24/2009	12:27	8/24/2009 12:27	0	0	0	8/24/2009	13:13	8/24/09 13:13	34.47	31.17	88.11	
8/24/2009	12:42	8/24/2009 12:42	0	0	0	8/24/2009	13:28	8/24/09 13:28	34.44	31.23	88.21	
8/24/2009	12:57	8/24/2009 12:57	0	0	0	8/24/2009	13:43	8/24/09 13:43	34.46	31.29	88.32	
8/24/2009	13:12	8/24/2009 13:12	0	0	0	8/24/2009	13:58	8/24/09 13:58	34.45	31.34	88.41	
8/24/2009	13:27	8/24/2009 13:27	0	0	0	8/24/2009	14:13	8/24/09 14:13	34.45	31.37	88.46	
8/24/2009	13:39	8/24/2009 13:39	0	0	0	8/24/2009	14:28	8/24/09 14:28	34.47	31.43	88.57	
8/24/2009	13:44	8/24/2009 13:44	0	0	0	8/24/2009	14:43	8/24/09 14:43	34.56	31.44	88.60	
8/24/2009	13:59	8/24/2009 13:59	0	0	0	8/24/2009	14:58	8/24/09 14:58	34.52	31.45	88.61	
8/24/2009	14:14	8/24/2009 14:14	0	0	0	8/24/2009	15:13	8/24/09 15:13	34.37	31.47	88.65	
8/24/2009	14:29	8/24/2009 14:29	0	0	0	8/24/2009	15:28	8/24/09 15:28	34.31	31.50	88.70	
8/24/2009	14:44	8/24/2009 14:44	0	0	0	8/24/2009	15:43	8/24/09 15:43	34.30	31.51	88.71	
8/24/2009	14:59	8/24/2009 14:59	0	0	0	8/24/2009	15:58	8/24/09 15:58	34.30	31.53	88.76	
8/24/2009	15:14	8/24/2009 15:14	0	0	0	8/24/2009	16:13	8/24/09 16:13	34.28	31.55	88.78	
8/24/2009	15:29	8/24/2009 15:29	0	0	0	8/24/2009	16:28	8/24/09 16:28	34.29	31.51	88.72	
8/24/2009	15:44	8/24/2009 15:44	0	0	0	8/24/2009	16:43	8/24/09 16:43	34.28	31.49	88.69	
8/24/2009	15:59	8/24/2009 15:59	0	0	0	8/24/2009	16:58	8/24/09 16:58	34.27	31.47	88.64	
8/24/2009	16:14	8/24/2009 16:14	0	0	0	8/24/2009	17:13	8/24/09 17:13	34.37	31.44	88.60	
8/24/2009	16:29	8/24/2009 16:29	0	0	0	8/24/2009	17:28	8/24/09 17:28	34.37	31.42	88.55	
8/24/2009	16:44	8/24/2009 16:44	0	0	0	8/24/2009	17:43	8/24/09 17:43	34.41	31.39	88.51	
8/24/2009	16:59	8/24/2009 16:59	0	0	0	8/24/2009	17:58	8/24/09 17:58	34.42	31.33	88.40	
8/24/2009	17:14	8/24/2009 17:14	0	0	0	8/24/2009	18:13	8/24/09 18:13	34.43	31.31	88.36	
8/24/2009	17:29	8/24/2009 17:29	0	0	0	8/24/2009	18:28	8/24/09 18:28	34.48	31.29	88.32	
8/24/2009	17:44	8/24/2009 17:44	0	0	0	8/24/2009	18:43	8/24/09 18:43	34.60	31.28	88.30	
8/24/2009	17:59	8/24/2009 17:59	0	0	0	8/24/2009	18:58	8/24/09 18:58	34.59	31.25	88.26	
8/24/2009	18:14	8/24/2009 18:14	0	0	0	8/24/2009	19:13	8/24/09 19:13	34.63	31.24	88.22	
8/24/2009	18:29	8/24/2009 18:29	0	0	0	8/24/2009	19:28	8/24/09 19:28	34.73	31.21	88.17	
8/24/2009	18:44	8/24/2009 18:44	0	0	0	8/24/2009	19:43	8/24/09 19:43	34.88	31.19	88.14	
8/24/2009	18:59	8/24/2009 18:59	0	0	0	8/24/2009	19:58	8/24/09 19:58	34.98	31.17	88.10	
8/24/2009	19:14	8/24/2009 19:14	0	0	0	8/24/2009	20:13	8/24/09 20:13	35.02	31.16	88.08	
8/24/2009	19:29	8/24/2009 19:29	0	0	0	8/24/2009	20:28	8/24/09 20:28	35.05	31.16	88.08	
8/24/2009	19:44	8/24/2009 19:44	0	0	0	8/24/2009	20:43	8/24/09 20:43	35.06	31.16	88.08	
8/24/2009	19:59	8/24/2009 19:59	0	0	0	8/24/2009	20:58	8/24/09 20:58	34.99	31.15	88.08	
8/24/2009	20:14	8/24/2009 20:14	0	0	0	8/24/2009	21:13	8/24/09 21:13	35.05	31.11	88.00	
8/24/2009	20:29	8/24/2009 20:29	0	0	0	8/24/2009	21:28	8/24/09 21:28	35.06	31.07	87.92	
8/24/2009	20:44	8/24/2009 20:44	0	0	0	8/24/2009	21:43	8/24/09 21:43	35.03	31.03	87.85	
8/24/2009	20:59	8/24/2009 20:59	0	0	0	8/24/2009	21:58	8/24/09 21:58	35.02	30.96	87.74	
8/24/2009	21:14	8/24/2009 21:14	0	0	0	8/24/2009	22:13	8/24/09 22:13	35.03	30.91	87.65	
8/24/2009	21:29	8/24/2009 21:29	0	0	0	8/24/2009	22:28	8/24/09 22:28	35.05	30.87	87.56	
8/24/2009	21:44	8/24/2009 21:44	0	0	0	8/24/2009	22:43	8/24/09 22:43	35.06	30.82	87.48	
8/24/2009	21:59	8/24/2009 21:59	0	0	0	8/24/2009	22:58	8/24/09 22:58	35.04	30.79	87.42	
8/24/2009	22:14	8/24/2009 22:14	0	0	0	8/24/2009	23:13	8/24/09 23:13	35.05	30.75	87.36	
8/24/2009	22:29	8/24/2009 22:29	0	0	0	8/24/2009	23:28	8/24/09 23:28	35.04	30.72	87.30	
8/24/2009	22:44	8/24/2009 22:44	0	0	0	8/24/2009	23:43	8/24/09 23:43	35.09	30.69	87.24	
8/24/2009	22:59	8/24/2009 22:59	0	0	0	8/24/2009	23:58	8/24/09 23:58	35.06	30.65	87.17	
8/24/2009	23:14	8/24/2009 23:14	0	0	0	8/25/2009	0:13	8/25/09 0:13	35.09	30.62	87.12	
8/24/2009	23:29	8/24/2009 23:29	0	0	0	8/25/2009	0:28	8/25/09 0:28	35.14	30.59	87.05	
8/24/2009	23:44	8/24/2009 23:44	0	0	0	8/25/2009	0:43	8/25/09 0:43	35.10	30.56	87.00	
8/24/2009	23:59	8/24/2009 23:59	0	0	0	8/25/2009	0:58	8/25/09 0:58	35.16	30.52	86.93	
8/25/2009	0:14	8/25/2009 0:14	0	0	0	8/25/2009	1:13	8/25/09 1:13	35.16	30.49	86.88	
8/25/2009	0:29	8/25/2009 0:29	0	0	0	8/25/2009	1:28	8/25/09 1:28	35.17	30.46	86.82	
8/25/2009	0:44	8/25/2009 0:44	0	0	0	8/25/2009	1:43	8/25/09 1:43	35.21	30.43	86.77	
8/25/2009	0:59	8/25/2009 0:59	0	0	0	8/25/2009	1:58	8/25/09 1:58	35.22	30.38	86.69	
8/25/2009	1:14	8/25/2009 1:14	0	0	0	8/25/2009	2:13	8/25/09 2:13	35.26	30.35	86.63	
8/25/2009	1:29	8/25/2009 1:29	0	0	0	8/25/2009	2:28	8/25/09 2:28	35.26	30.32	86.57	

Table G-1
Phase I Pressure Difference Measurements [a]
St. Julien's Creek Annex Building 1556

Date	Time	Date + Time	Maximum Differential Pressure[d] [Pa]	Minimum Differential Pressure[d] [Pa]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
8/25/2009	1:44	8/25/2009 1:44	0	0	0	8/25/2009	2:43	8/25/09 2:43	35.32	30.28	86.51	
8/25/2009	1:59	8/25/2009 1:59	0	0	0	8/25/2009	2:58	8/25/09 2:58	35.30	30.26	86.46	
8/25/2009	2:14	8/25/2009 2:14	0	0	0	8/25/2009	3:13	8/25/09 3:13	35.30	30.23	86.42	
8/25/2009	2:29	8/25/2009 2:29	0	0	0	8/25/2009	3:28	8/25/09 3:28	35.34	30.21	86.38	
8/25/2009	2:44	8/25/2009 2:44	0	0	0	8/25/2009	3:43	8/25/09 3:43	35.30	30.18	86.33	
8/25/2009	2:59	8/25/2009 2:59	0	0	0	8/25/2009	3:58	8/25/09 3:58	35.34	30.16	86.29	
8/25/2009	3:14	8/25/2009 3:14	0	0	0	8/25/2009	4:13	8/25/09 4:13	35.33	30.13	86.23	
8/25/2009	3:29	8/25/2009 3:29	0	0	0	8/25/2009	4:28	8/25/09 4:28	35.34	30.10	86.18	
8/25/2009	3:44	8/25/2009 3:44	0	0	0	8/25/2009	4:43	8/25/09 4:43	35.32	30.08	86.14	
8/25/2009	3:59	8/25/2009 3:59	0	0	0	8/25/2009	4:58	8/25/09 4:58	35.39	30.06	86.11	
8/25/2009	4:14	8/25/2009 4:14	0	0	0	8/25/2009	5:13	8/25/09 5:13	35.37	30.03	86.06	
8/25/2009	4:29	8/25/2009 4:29	0	0	0	8/25/2009	5:28	8/25/09 5:28	35.39	30.01	86.02	
8/25/2009	4:44	8/25/2009 4:44	0	0	0	8/25/2009	5:43	8/25/09 5:43	35.37	29.99	85.98	
8/25/2009	4:59	8/25/2009 4:59	0	0	0	8/25/2009	5:58	8/25/09 5:58	35.32	29.97	85.94	
8/25/2009	5:14	8/25/2009 5:14	0	0	0	8/25/2009	6:13	8/25/09 6:13	35.35	29.95	85.91	
8/25/2009	5:29	8/25/2009 5:29	0	0	0	8/25/2009	6:28	8/25/09 6:28	35.37	29.97	85.95	
8/25/2009	5:44	8/25/2009 5:44	0	0	0	8/25/2009	6:43	8/25/09 6:43	35.38	30.02	86.03	
8/25/2009	5:59	8/25/2009 5:59	0	0	0	8/25/2009	6:58	8/25/09 6:58	35.38	30.06	86.10	
8/25/2009	6:14	8/25/2009 6:14	0	0	0	8/25/2009	7:13	8/25/09 7:13	35.46	30.08	86.14	
8/25/2009	6:29	8/25/2009 6:29	0	0	0	8/25/2009	7:28	8/25/09 7:28	35.48	30.10	86.18	
8/25/2009	6:44	8/25/2009 6:44	0	0	0	8/25/2009	7:43	8/25/09 7:43	35.55	30.15	86.28	
8/25/2009	6:59	8/25/2009 6:59	0	0	0	8/25/2009	7:58	8/25/09 7:58	35.63	30.13	86.23	
8/25/2009	7:14	8/25/2009 7:14	0	0	0	8/25/2009	8:13	8/25/09 8:13	35.67	30.17	86.31	
8/25/2009	7:29	8/25/2009 7:29	0	0	0	8/25/2009	8:28	8/25/09 8:28	35.77	30.22	86.40	
8/25/2009	7:44	8/25/2009 7:44	0	0	0	8/25/2009	8:43	8/25/09 8:43	35.81	30.21	86.38	
8/25/2009	7:59	8/25/2009 7:59	0	0	0	8/25/2009	8:58	8/25/09 8:58	35.93	30.24	86.43	
8/25/2009	8:14	8/25/2009 8:14	0	0	0	8/25/2009	9:13	8/25/09 9:13	36.02	30.22	86.39	
8/25/2009	8:29	8/25/2009 8:29	0	0	0	8/25/2009	9:28	8/25/09 9:28	36.03	30.24	86.44	
8/25/2009	8:44	8/25/2009 8:44	0	0	0	8/25/2009	9:43	8/25/09 9:43	35.99	30.34	86.60	
8/25/2009	8:59	8/25/2009 8:59	0	0	0	8/25/2009	9:58	8/25/09 9:58	36.05	30.38	86.69	
8/25/2009	9:14	8/25/2009 9:14	0	0	0	8/25/2009	10:13	8/25/09 10:13	36.09	30.41	86.74	
8/25/2009	9:29	8/25/2009 9:29	0	0	0	8/25/2009	10:28	8/25/09 10:28	36.14	30.45	86.81	
8/25/2009	9:44	8/25/2009 9:44	0	0	0	8/25/2009	10:43	8/25/09 10:43	36.21	30.47	86.85	
8/25/2009	9:59	8/25/2009 9:59	0	0	0	8/25/2009	10:58	8/25/09 10:58	36.19	30.50	86.90	
8/25/2009	10:14	8/25/2009 10:14	0	0	0	8/25/2009	11:13	8/25/09 11:13	36.17	30.55	87.00	
8/25/2009	10:29	8/25/2009 10:29	0	0	0	8/25/2009	11:28	8/25/09 11:28	36.09	30.64	87.15	
8/25/2009	10:44	8/25/2009 10:44	0	0	0	8/25/2009	11:43	8/25/09 11:43	36.02	30.72	87.30	
8/25/2009	10:59	8/25/2009 10:59	0	0	0	8/25/2009	11:58	8/25/09 11:58	35.94	30.81	87.45	
8/25/2009	11:14	8/25/2009 11:14	0	0	0	8/25/2009	12:13	8/25/09 12:13	35.87	30.87	87.57	
8/25/2009	11:29	8/25/2009 11:29	0	0	0	8/25/2009	12:28	8/25/09 12:28	35.90	30.93	87.68	
8/25/2009	11:44	8/25/2009 11:44	0	0	0	8/25/2009	12:43	8/25/09 12:43	35.91	31.00	87.79	
8/25/2009	11:59	8/25/2009 11:59	0	0	0	8/25/2009	12:58	8/25/09 12:58	35.89	31.02	87.84	
8/25/2009	12:14	8/25/2009 12:14	0	0	0	8/25/2009	13:13	8/25/09 13:13	35.85	31.04	87.87	
8/25/2009	12:29	8/25/2009 12:29	0	0	0	8/25/2009	13:28	8/25/09 13:28	35.85	31.12	88.02	
8/25/2009	12:44	8/25/2009 12:44	0	0	0	8/25/2009	13:43	8/25/09 13:43	35.83	31.20	88.16	
8/25/2009	12:59	8/25/2009 12:59	0	0	0	8/25/2009	13:58	8/25/09 13:58	35.76	31.27	88.28	
8/25/2009	13:14	8/25/2009 13:14	0	0	0	8/25/2009	14:13	8/25/09 14:13	35.71	31.32	88.37	
8/25/2009	13:29	8/25/2009 13:29	0	0	0	8/25/2009	14:28	8/25/09 14:28	35.68	31.40	88.51	
8/25/2009	13:44	8/25/2009 13:44	0	0	0	8/25/2009	14:43	8/25/09 14:43	35.62	31.46	88.64	
8/25/2009	13:59	8/25/2009 13:59	0	0	0	8/25/2009	14:58	8/25/09 14:58	35.56	31.53	88.75	
8/25/2009	14:14	8/25/2009 14:14	0	0	0	8/25/2009	15:13	8/25/09 15:13	35.52	31.57	88.82	
8/25/2009	14:29	8/25/2009 14:29	0	0	0	8/25/2009	15:28	8/25/09 15:28	35.42	31.60	88.87	
8/25/2009	14:44	8/25/2009 14:44	0	0	0	8/25/2009	15:43	8/25/09 15:43	35.40	31.55	88.78	
8/25/2009	14:59	8/25/2009 14:59	0	0	0	8/25/2009	15:58	8/25/09 15:58	35.36	31.51	88.71	
8/25/2009	15:14	8/25/2009 15:14	0	0	0	8/25/2009	16:13	8/25/09 16:13	35.34	31.52	88.74	
8/25/2009	15:29	8/25/2009 15:29	0	0	0	8/25/2009	16:28	8/25/09 16:28	35.29	31.58	88.84	
8/25/2009	15:44	8/25/2009 15:44	0	0	0	8/25/2009	16:43	8/25/09 16:43	35.33	31.60	88.87	
8/25/2009	15:59	8/25/2009 15:59	0	0	0	8/25/2009	16:58	8/25/09 16:58	35.31	31.59	88.85	
8/25/2009	16:14	8/25/2009 16:14	0	0	0	8/25/2009	17:13	8/25/09 17:13	35.36	31.49	88.68	
8/25/2009	16:29	8/25/2009 16:29	0	0	0	8/25/2009	17:28	8/25/09 17:28	35.38	31.42	88.56	
8/25/2009	16:44	8/25/2009 16:44	0	0	0	8/25/2009	17:43	8/25/09 17:43	35.33	31.38	88.48	
8/25/2009	16:59	8/25/2009 16:59	0	0	0	8/25/2009	17:58	8/25/09 17:58	35.29	31.31	88.36	

Table G-1

Phase I Pressure Difference Measurements [a]

St. Julien's Creek Annex Building 1556

Date	Time	Date + Time	Maximum Differential Pressure[d] [Pa]	Minimum Differential Pressure[d] [Pa]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
8/25/2009	17:14	8/25/2009 17:14	0	0	0	8/25/2009	18:13	8/25/09 18:13	35.30	31.31	88.36	
8/25/2009	17:29	8/25/2009 17:29	0	0	0	8/25/2009	18:28	8/25/09 18:28	35.24	31.32	88.37	
8/25/2009	17:44	8/25/2009 17:44	0	0	0	8/25/2009	18:43	8/25/09 18:43	35.23	31.31	88.36	
8/25/2009	17:59	8/25/2009 17:59	0	0	0	8/25/2009	18:58	8/25/09 18:58	35.21	31.29	88.33	
8/25/2009	18:14	8/25/2009 18:14	0	0	0	8/25/2009	19:13	8/25/09 19:13	35.21	31.23	88.21	
8/25/2009	18:29	8/25/2009 18:29	0	0	0	8/25/2009	19:28	8/25/09 19:28	35.24	31.19	88.15	
8/25/2009	18:44	8/25/2009 18:44	0	0	0	8/25/2009	19:43	8/25/09 19:43	35.24	31.15	88.08	
8/25/2009	18:59	8/25/2009 18:59	0	0	0	8/25/2009	19:58	8/25/09 19:58	35.25	31.14	88.05	
8/25/2009	19:14	8/25/2009 19:14	0	0	0	8/25/2009	20:13	8/25/09 20:13	35.33	31.15	88.07	
8/25/2009	19:29	8/25/2009 19:29	0	0	0	8/25/2009	20:28	8/25/09 20:28	35.39	31.15	88.07	
8/25/2009	19:44	8/25/2009 19:44	0	0	0	8/25/2009	20:43	8/25/09 20:43	35.47	31.14	88.06	
8/25/2009	19:59	8/25/2009 19:59	0	0	0	8/25/2009	20:58	8/25/09 20:58	35.48	31.14	88.06	
8/25/2009	20:14	8/25/2009 20:14	0	0	0	8/25/2009	21:13	8/25/09 21:13	35.49	31.12	88.01	
8/25/2009	20:29	8/25/2009 20:29	0	0	0	8/25/2009	21:28	8/25/09 21:28	35.52	31.10	87.98	
8/25/2009	20:44	8/25/2009 20:44	0	0	0	8/25/2009	21:43	8/25/09 21:43	35.50	31.09	87.96	
8/25/2009	20:59	8/25/2009 20:59	0	0	0	8/25/2009	21:58	8/25/09 21:58	35.53	31.06	87.90	
8/25/2009	21:14	8/25/2009 21:14	0	0	0	8/25/2009	22:13	8/25/09 22:13	35.53	31.03	87.86	
8/25/2009	21:29	8/25/2009 21:29	0	0	0	8/25/2009	22:28	8/25/09 22:28	35.55	31.01	87.82	
8/25/2009	21:44	8/25/2009 21:44	0	0	0	8/25/2009	22:43	8/25/09 22:43	35.62	30.99	87.77	
8/25/2009	21:59	8/25/2009 21:59	0	0	0	8/25/2009	22:58	8/25/09 22:58	35.56	30.96	87.74	
8/25/2009	22:14	8/25/2009 22:14	0	0	0	8/25/2009	23:13	8/25/09 23:13	35.54	30.93	87.67	
8/25/2009	22:29	8/25/2009 22:29	0	0	0	8/25/2009	23:28	8/25/09 23:28	35.56	30.90	87.61	
8/25/2009	22:44	8/25/2009 22:44	0	0	0	8/25/2009	23:43	8/25/09 23:43	35.57	30.87	87.57	
8/25/2009	22:59	8/25/2009 22:59	0	0	0	8/25/2009	23:58	8/25/09 23:58	35.56	30.84	87.51	
8/25/2009	23:14	8/25/2009 23:14	0	0	0	8/26/2009	0:13	8/26/09 0:13	35.54	30.81	87.46	
8/25/2009	23:29	8/25/2009 23:29	0	0	0	8/26/2009	0:28	8/26/09 0:28	35.50	30.78	87.41	
8/25/2009	23:44	8/25/2009 23:44	0	0	0	8/26/2009	0:43	8/26/09 0:43	35.52	30.75	87.35	
8/25/2009	23:59	8/25/2009 23:59	0	0	0	8/26/2009	0:58	8/26/09 0:58	35.50	30.72	87.30	
8/26/2009	0:14	8/26/2009 0:14	0	0	0	8/26/2009	1:13	8/26/09 1:13	35.46	30.69	87.25	
8/26/2009	0:29	8/26/2009 0:29	0	0	0	8/26/2009	1:28	8/26/09 1:28	35.43	30.67	87.21	
8/26/2009	0:44	8/26/2009 0:44	0	0	0	8/26/2009	1:43	8/26/09 1:43	35.42	30.66	87.18	
8/26/2009	0:59	8/26/2009 0:59	0	0	0	8/26/2009	1:58	8/26/09 1:58	35.41	30.64	87.15	
8/26/2009	1:14	8/26/2009 1:14	0	0	0	8/26/2009	2:13	8/26/09 2:13	35.40	30.62	87.12	
8/26/2009	1:29	8/26/2009 1:29	0	0	0	8/26/2009	2:28	8/26/09 2:28	35.37	30.60	87.09	
8/26/2009	1:44	8/26/2009 1:44	0	0	0	8/26/2009	2:43	8/26/09 2:43	35.35	30.59	87.06	
8/26/2009	1:59	8/26/2009 1:59	0	0	0	8/26/2009	2:58	8/26/09 2:58	35.33	30.56	87.01	
8/26/2009	2:14	8/26/2009 2:14	0	0	0	8/26/2009	3:13	8/26/09 3:13	35.35	30.55	86.99	
8/26/2009	2:29	8/26/2009 2:29	0	0	0	8/26/2009	3:28	8/26/09 3:28	35.31	30.54	86.97	
8/26/2009	2:44	8/26/2009 2:44	0	0	0	8/26/2009	3:43	8/26/09 3:43	35.31	30.54	86.96	
8/26/2009	2:59	8/26/2009 2:59	0	0	0	8/26/2009	3:58	8/26/09 3:58	35.33	30.52	86.94	
8/26/2009	3:14	8/26/2009 3:14	0	0	0	8/26/2009	4:13	8/26/09 4:13	35.28	30.50	86.90	
8/26/2009	3:29	8/26/2009 3:29	0	0	0	8/26/2009	4:28	8/26/09 4:28	35.32	30.48	86.86	
8/26/2009	3:44	8/26/2009 3:44	0	0	0	8/26/2009	4:43	8/26/09 4:43	35.34	30.46	86.83	
8/26/2009	3:59	8/26/2009 3:59	0	0	0	8/26/2009	4:58	8/26/09 4:58	35.33	30.43	86.78	
8/26/2009	4:14	8/26/2009 4:14	0	0	0	8/26/2009	5:13	8/26/09 5:13	35.33	30.41	86.73	
8/26/2009	4:29	8/26/2009 4:29	0	0	0	8/26/2009	5:28	8/26/09 5:28	35.34	30.37	86.67	
8/26/2009	4:44	8/26/2009 4:44	0	0	0	8/26/2009	5:43	8/26/09 5:43	35.36	30.35	86.62	
8/26/2009	4:59	8/26/2009 4:59	0	0	0	8/26/2009	5:58	8/26/09 5:58	35.42	30.32	86.58	
8/26/2009	5:14	8/26/2009 5:14	0	0	0	8/26/2009	6:13	8/26/09 6:13	35.49	30.29	86.53	
8/26/2009	5:29	8/26/2009 5:29	0	0	0	8/26/2009	6:28	8/26/09 6:28	35.56	30.30	86.53	
8/26/2009	5:44	8/26/2009 5:44	0	0	0	8/26/2009	6:43	8/26/09 6:43	35.61	30.31	86.56	
8/26/2009	5:59	8/26/2009 5:59	0	0	0	8/26/2009	6:58	8/26/09 6:58	35.63	30.35	86.62	
8/26/2009	6:14	8/26/2009 6:14	0	0	0	8/26/2009	7:13	8/26/09 7:13	35.62	30.36	86.65	
8/26/2009	6:29	8/26/2009 6:29	0	0	0	8/26/2009	7:28	8/26/09 7:28	35.60	30.38	86.69	
8/26/2009	6:44	8/26/2009 6:44	0	0	0	8/26/2009	7:43	8/26/09 7:43	35.63	30.39	86.69	
8/26/2009	6:59	8/26/2009 6:59	0	0	0	8/26/2009	7:58	8/26/09 7:58	35.63	30.42	86.76	
8/26/2009	7:14	8/26/2009 7:14	0	0	0	8/26/2009	8:13	8/26/09 8:13	35.67	30.41	86.73	
8/26/2009	7:29	8/26/2009 7:29	0	0	0	8/26/2009	8:28	8/26/09 8:28	35.69	30.42	86.76	
8/26/2009	7:44	8/26/2009 7:44	0	0	0	8/26/2009	8:43	8/26/09 8:43	35.67	30.45	86.82	
8/26/2009	7:59	8/26/2009 7:59	0	0	0	8/26/2009	8:58	8/26/09 8:58	35.63	30.48	86.87	
8/26/2009	8:14	8/26/2009 8:14	0	0	0	8/26/2009	9:13	8/26/09 9:13	35.63	30.47	86.85	
8/26/2009	8:29	8/26/2009 8:29	0	0	0	8/26/2009	9:28	8/26/09 9:28	35.65	30.44	86.79	

Table G-1

Phase I Pressure Difference Measurements [a]

St. Julien's Creek Annex Building 1556

Date	Time	Date + Time	Maximum Differential Pressure[d] [Pa]	Minimum Differential Pressure[d] [Pa]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
8/26/2009	8:44	8/26/2009 8:44	0	0	0	8/26/2009	9:43	8/26/09 9:43	35.65	30.47	86.85	
8/26/2009	8:59	8/26/2009 8:59	0	0	0	8/26/2009	9:58	8/26/09 9:58	35.69	30.46	86.83	
8/26/2009	9:14	8/26/2009 9:14	0	0	0	8/26/2009	10:13	8/26/09 10:13	35.68	30.55	86.98	
8/26/2009	9:29	8/26/2009 9:29	0	0	0	8/26/2009	10:28	8/26/09 10:28	35.66	30.65	87.16	
8/26/2009	9:44	8/26/2009 9:44	0	0	0	8/26/2009	10:43	8/26/09 10:43	35.63	30.75	87.36	
8/26/2009	9:59	8/26/2009 9:59	0	0	0	8/26/2009	10:58	8/26/09 10:58	35.57	30.83	87.49	
8/26/2009	10:14	8/26/2009 10:14	0	0	0	8/26/2009	11:13	8/26/09 11:13	35.55	30.90	87.63	
8/26/2009	10:29	8/26/2009 10:29	0	0	0	8/26/2009	11:28	8/26/09 11:28	35.54	30.96	87.73	
8/26/2009	10:44	8/26/2009 10:44	0	0	0	8/26/2009	11:43	8/26/09 11:43	35.46	31.04	87.88	
8/26/2009	10:59	8/26/2009 10:59	0	0	0	8/26/2009	11:58	8/26/09 11:58	35.35	31.11	88.00	
8/26/2009	11:14	8/26/2009 11:14	0	0	0	8/26/2009	12:13	8/26/09 12:13	35.30	31.18	88.12	
8/26/2009	11:29	8/26/2009 11:29	0	0	0	8/26/2009	12:28	8/26/09 12:28	35.23	31.23	88.21	
8/26/2009	11:44	8/26/2009 11:44	0	0	0	8/26/2009	12:43	8/26/09 12:43	35.18	31.30	88.33	
8/26/2009	11:59	8/26/2009 11:59	0	0	0	8/26/2009	12:58	8/26/09 12:58	35.12	31.36	88.45	
8/26/2009	12:14	8/26/2009 12:14	0	0	0	8/26/2009	13:13	8/26/09 13:13	35.08	31.40	88.51	
8/26/2009	12:29	8/26/2009 12:29	0	0	0	8/26/2009	13:28	8/26/09 13:28	35.00	31.46	88.63	
8/26/2009	12:44	8/26/2009 12:44	0	0	0	8/26/2009	13:43	8/26/09 13:43	34.95	31.51	88.71	
8/26/2009	12:59	8/26/2009 12:59	0	0	0	8/26/2009	13:58	8/26/09 13:58	34.93	31.57	88.83	
8/26/2009	13:14	8/26/2009 13:14	0	0	0	8/26/2009	14:13	8/26/09 14:13	34.87	31.58	88.84	
8/26/2009	13:29	8/26/2009 13:29	0	0	0	8/26/2009	14:28	8/26/09 14:28	34.83	31.64	88.94	
8/26/2009	13:44	8/26/2009 13:44	0	0	0	8/26/2009	14:43	8/26/09 14:43	34.74	31.65	88.97	
8/26/2009	13:59	8/26/2009 13:59	0	0	0	8/26/2009	14:58	8/26/09 14:58	34.72	31.69	89.04	
8/26/2009	14:14	8/26/2009 14:14	0	0	0	8/26/2009	15:13	8/26/09 15:13	34.65	31.76	89.16	
8/26/2009	14:29	8/26/2009 14:29	0	0	0	8/26/2009	15:28	8/26/09 15:28	34.62	31.82	89.27	
8/26/2009	14:44	8/26/2009 14:44	0	0	0	8/26/2009	15:43	8/26/09 15:43	34.55	31.83	89.29	
8/26/2009	14:59	8/26/2009 14:59	0	0	0	8/26/2009	15:58	8/26/09 15:58	34.45	31.86	89.34	
8/26/2009	15:14	8/26/2009 15:14	0	0	0	8/26/2009	16:13	8/26/09 16:13	34.42	31.87	89.37	
8/26/2009	15:29	8/26/2009 15:29	0	0	0	8/26/2009	16:28	8/26/09 16:28	34.40	31.87	89.36	
8/26/2009	15:44	8/26/2009 15:44	0	0	0	8/26/2009	16:43	8/26/09 16:43	34.32	31.87	89.37	
8/26/2009	15:59	8/26/2009 15:59	0	0	0	8/26/2009	16:58	8/26/09 16:58	34.33	31.84	89.32	
8/26/2009	16:14	8/26/2009 16:14	0	0	0	8/26/2009	17:13	8/26/09 17:13	34.35	31.81	89.27	
8/26/2009	16:29	8/26/2009 16:29	0	0	0	8/26/2009	17:28	8/26/09 17:28	34.35	31.80	89.23	
8/26/2009	16:44	8/26/2009 16:44	0	0	0	8/26/2009	17:43	8/26/09 17:43	34.38	31.76	89.16	
8/26/2009	16:59	8/26/2009 16:59	0	0	0	8/26/2009	17:58	8/26/09 17:58	34.40	31.74	89.13	
8/26/2009	17:14	8/26/2009 17:14	0	0	0	8/26/2009	18:13	8/26/09 18:13	34.42	31.71	89.08	
8/26/2009	17:29	8/26/2009 17:29	0	0	0	8/26/2009	18:28	8/26/09 18:28	34.41	31.69	89.04	
8/26/2009	17:44	8/26/2009 17:44	0	0	0	8/26/2009	18:43	8/26/09 18:43	34.38	31.68	89.02	
8/26/2009	17:59	8/26/2009 17:59	0	0	0	8/26/2009	18:58	8/26/09 18:58	34.35	31.67	89.00	
8/26/2009	18:14	8/26/2009 18:14	0	0	0	8/26/2009	19:13	8/26/09 19:13	34.35	31.65	88.97	
8/26/2009	18:29	8/26/2009 18:29	0	0	0	8/26/2009	19:28	8/26/09 19:28	34.38	31.63	88.93	
8/26/2009	18:44	8/26/2009 18:44	0	0	0	8/26/2009	19:43	8/26/09 19:43	34.43	31.63	88.94	
8/26/2009	18:59	8/26/2009 18:59	0	0	0	8/26/2009	19:58	8/26/09 19:58	34.43	31.61	88.90	
8/26/2009	19:14	8/26/2009 19:14	0	0	0	8/26/2009	20:13	8/26/09 20:13	34.51	31.60	88.87	
8/26/2009	19:29	8/26/2009 19:29	0	0	0	8/26/2009	20:28	8/26/09 20:28	34.57	31.58	88.85	
8/26/2009	19:44	8/26/2009 19:44	0	0	0	8/26/2009	20:43	8/26/09 20:43	34.67	31.57	88.82	
8/26/2009	19:59	8/26/2009 19:59	0	0	0	8/26/2009	20:58	8/26/09 20:58	34.77	31.56	88.81	
8/26/2009	20:14	8/26/2009 20:14	0	0	0	8/26/2009	21:13	8/26/09 21:13	34.86	31.55	88.79	
8/26/2009	20:29	8/26/2009 20:29	0	0	0	8/26/2009	21:28	8/26/09 21:28	34.91	31.54	88.78	
8/26/2009	20:44	8/26/2009 20:44	0	0	0	8/26/2009	21:43	8/26/09 21:43	34.93	31.53	88.75	
8/26/2009	20:59	8/26/2009 20:59	0	0	0	8/26/2009	21:58	8/26/09 21:58	34.99	31.52	88.73	
8/26/2009	21:14	8/26/2009 21:14	0	0	0	8/26/2009	22:13	8/26/09 22:13	34.94	31.51	88.72	
8/26/2009	21:29	8/26/2009 21:29	0	0	0	8/26/2009	22:28	8/26/09 22:28	34.89	31.48	88.66	
8/26/2009	21:44	8/26/2009 21:44	0	0	0	8/26/2009	22:43	8/26/09 22:43	34.90	31.42	88.55	
8/26/2009	21:59	8/26/2009 21:59	0	0	0	8/26/2009	22:58	8/26/09 22:58	34.90	31.37	88.47	
8/26/2009	22:14	8/26/2009 22:14	0	0	0	8/26/2009	23:13	8/26/09 23:13	34.89	31.34	88.42	
8/26/2009	22:29	8/26/2009 22:29	0	0	0	8/26/2009	23:28	8/26/09 23:28	34.88	31.30	88.34	
8/26/2009	22:44	8/26/2009 22:44	0	0	0	8/26/2009	23:43	8/26/09 23:43	34.88	31.28	88.31	
8/26/2009	22:59	8/26/2009 22:59	0	0	0	8/26/2009	23:58	8/26/09 23:58	34.89	31.26	88.26	
8/26/2009	23:14	8/26/2009 23:14	0	0	0	8/27/2009	0:13	8/27/09 0:13	34.87	31.22	88.19	
8/26/2009	23:29	8/26/2009 23:29	0	0	0	8/27/2009	0:28	8/27/09 0:28	34.91	31.17	88.11	
8/26/2009	23:44	8/26/2009 23:44	0	0	0	8/27/2009	0:43	8/27/09 0:43	34.91	31.13	88.04	
8/26/2009	23:59	8/26/2009 23:59	0	0	0	8/27/2009	0:58	8/27/09 0:58	34.86	31.10	87.99	

Table G-1

Phase I Pressure Difference Measurements [a]

St. Julien's Creek Annex Building 1556

Date	Time	Date + Time	Maximum Differential Pressure[d] [Pa]	Minimum Differential Pressure[d] [Pa]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
8/27/2009	0:14	8/27/2009 0:14	0	0	0	8/27/2009	1:13	8/27/09 1:13	34.84	31.08	87.94	
8/27/2009	0:29	8/27/2009 0:29	0	0	0	8/27/2009	1:28	8/27/09 1:28	34.80	31.05	87.89	
8/27/2009	0:44	8/27/2009 0:44	0	0	0	8/27/2009	1:43	8/27/09 1:43	34.71	31.04	87.87	
8/27/2009	0:59	8/27/2009 0:59	0	0	0	8/27/2009	1:58	8/27/09 1:58	34.63	31.03	87.85	
8/27/2009	1:14	8/27/2009 1:14	0	0	0	8/27/2009	2:13	8/27/09 2:13	34.63	31.03	87.85	
8/27/2009	1:29	8/27/2009 1:29	0	0	0	8/27/2009	2:28	8/27/09 2:28	34.65	31.02	87.83	
8/27/2009	1:44	8/27/2009 1:44	0	0	0	8/27/2009	2:43	8/27/09 2:43	34.69	31.01	87.81	
8/27/2009	1:59	8/27/2009 1:59	0	0	0	8/27/2009	2:58	8/27/09 2:58	34.66	30.98	87.77	
8/27/2009	2:14	8/27/2009 2:14	0	0	0	8/27/2009	3:13	8/27/09 3:13	34.66	30.97	87.74	
8/27/2009	2:29	8/27/2009 2:29	0	0	0	8/27/2009	3:28	8/27/09 3:28	34.64	30.95	87.70	
8/27/2009	2:44	8/27/2009 2:44	0	0	0	8/27/2009	3:43	8/27/09 3:43	34.65	30.92	87.65	
8/27/2009	2:59	8/27/2009 2:59	0	0	0	8/27/2009	3:58	8/27/09 3:58	34.65	30.90	87.61	
8/27/2009	3:14	8/27/2009 3:14	0	0	0	8/27/2009	4:13	8/27/09 4:13	34.62	30.86	87.55	
8/27/2009	3:29	8/27/2009 3:29	0	0	0	8/27/2009	4:28	8/27/09 4:28	34.65	30.84	87.51	
8/27/2009	3:44	8/27/2009 3:44	0	0	0	8/27/2009	4:43	8/27/09 4:43	34.65	30.82	87.47	
8/27/2009	3:59	8/27/2009 3:59	0	0	0	8/27/2009	4:58	8/27/09 4:58	34.64	30.79	87.43	
8/27/2009	4:14	8/27/2009 4:14	0	0	0	8/27/2009	5:13	8/27/09 5:13	34.65	30.77	87.38	
8/27/2009	4:29	8/27/2009 4:29	0	0	0	8/27/2009	5:28	8/27/09 5:28	34.65	30.75	87.35	
8/27/2009	4:44	8/27/2009 4:44	0	0	0	8/27/2009	5:43	8/27/09 5:43	34.68	30.74	87.33	
8/27/2009	4:59	8/27/2009 4:59	0	0	0	8/27/2009	5:58	8/27/09 5:58	34.69	30.72	87.29	
8/27/2009	5:14	8/27/2009 5:14	0	0	0	8/27/2009	6:13	8/27/09 6:13	34.74	30.71	87.27	
8/27/2009	5:29	8/27/2009 5:29	0	0	0	8/27/2009	6:28	8/27/09 6:28	34.77	30.63	87.13	
8/27/2009	5:44	8/27/2009 5:44	0	0	0	8/27/2009	6:43	8/27/09 6:43	34.80	30.59	87.05	
8/27/2009	5:59	8/27/2009 5:59	0	0	0	8/27/2009	6:58	8/27/09 6:58	34.85	30.45	86.81	
8/27/2009	6:14	8/27/2009 6:14	0	0	0	8/27/2009	7:13	8/27/09 7:13	34.80	30.56	87.02	
8/27/2009	6:29	8/27/2009 6:29	0	0	0							
8/27/2009	6:44	8/27/2009 6:44	0	0	0							
8/27/2009	6:59	8/27/2009 6:59	0	0	0							
8/27/2009	7:14	8/27/2009 7:14	0	0	0							

Notes:

a : Differential pressure measurements are monitored continuously and the maximum and minimum differential pressure in Pascals [Pa] are recorded during each 15 minute monitoring period.

b : Average maximum and average minimum differential pressure over seven day monitoring period (August 20 to August 27, 2009).

c : Average maximum and average minimum differential pressure during work hours or during night time hours over each day of the seven day monitoring period (August 20 to August 27, 2009).

d: Differential pressure measurements were made using a Omniguard 4 differential pressure monitor with data logger (http://www.engsolinc.com/docs/og/OG4broch.pdf).

e : Barometric pressure measurements were made using a Solinst barometric data logger (http://www.solinst.com/Downloads/3001/3001Manual/Introduction/Barologger.html).

Table G-2

Phase I Pressure Difference Measurements [a]

St. Julien's Creek Annex Building 47

Averages over all measurements: [b]	
Maximum Differential Pressure:	1.3 Pa
Minimum Differential Pressure:	-0.4 Pa

Averages during Work Hours and Night Time: [c]

		Work Hours, Daily 10-hour Average Pressure Difference (7 am to 5 pm)		**Night Time, Daily 14-hour Average Pressure Difference (5 pm to 7 am)**	
Date	**Time**	**max (Pa)**	**min (Pa)**	**max (Pa)**	**min (Pa)**
8/20/2009	average	2.11	-1.84	1.12	-0.24
8/21/2009	average	1.28	-1.79	0.97	-0.25
8/22/2009	average	0.96	-0.04	N/A	N/A
8/23/2009	average	N/A	N/A	N/A	N/A
8/24/2009	average	2.74	0.32	0.59	0.08
8/25/2009	average	4.36	0.64	0.55	-0.04
8/26/2009	average	1.01	-1.89	0.80	0.07
8/27/2009	average	0.83	0.83	N/A	N/A
	Median:	1.28	-0.04	0.80	-0.04

Date	**Time**	**Date + Time**	**Maximum Differential Pressure** [d]	**Maximum Differential Pressure** [d]	**Average Pressure [Pa]**	**Date**	**Time**	**Date + Time**	**Indoor Barometric Pressure (in)** [e]	**Temperature (°C)**	**Temperature (°F)**	**Notes**
8/20/2009	10:08	8/20/09 10:08	1.5	-1.0	0.3	8/20/2009	10:08	8/20/09 10:08	33.96	21.23	70.22	
8/20/2009	10:23	8/20/09 10:23	1.5	-0.5	0.5	8/20/2009	10:23	8/20/09 10:23	34.02	21.01	69.82	
8/20/2009	10:38	8/20/09 10:38	1.5	-1.0	0.3	8/20/2009	10:38	8/20/09 10:38	34.03	20.99	69.78	
8/20/2009	10:53	8/20/09 10:53	1.5	-1.5	0.0	8/20/2009	10:53	8/20/09 10:53	34.04	21.15	70.06	
8/20/2009	11:08	8/20/09 11:08	2.0	-0.5	0.8	8/20/2009	11:08	8/20/09 11:08	34.07	21.19	70.14	
8/20/2009	11:23	8/20/09 11:23	2.0	0.0	1.0	8/20/2009	11:23	8/20/09 11:23	34.09	21.00	69.79	
8/20/2009	11:38	8/20/09 11:38	3.0	-1.5	0.8	8/20/2009	11:38	8/20/09 11:38	34.09	20.80	69.45	
8/20/2009	11:53	8/20/09 11:53	2.5	-1.5	0.5	8/20/2009	11:53	8/20/09 11:53	34.02	20.62	69.11	
8/20/2009	12:08	8/20/09 12:08	2.5	-3.0	-0.3	8/20/2009	12:08	8/20/09 12:08	33.97	20.44	68.78	
8/20/2009	12:23	8/20/09 12:23	2.0	-3.5	-0.8	8/20/2009	12:23	8/20/09 12:23	33.90	20.29	68.52	
8/20/2009	12:38	8/20/09 12:38	2.0	-1.0	0.5	8/20/2009	12:38	8/20/09 12:38	33.81	20.16	68.28	
8/20/2009	12:53	8/20/09 12:53	2.0	-2.0	0.0	8/20/2009	12:53	8/20/09 12:53	33.79	20.56	69.00	
8/20/2009	13:08	8/20/09 13:08	2.0	-4.0	-1.0	8/20/2009	13:08	8/20/09 13:08	33.78	20.50	68.90	
8/20/2009	13:23	8/20/09 13:23	2.0	-2.0	0.0	8/20/2009	13:23	8/20/09 13:23	33.70	20.38	68.68	
8/20/2009	13:38	8/20/09 13:38	3.0	-3.0	0.0	8/20/2009	13:38	8/20/09 13:38	33.65	20.27	68.48	
8/20/2009	13:53	8/20/09 13:53	3.0	-2.0	0.5	8/20/2009	13:53	8/20/09 13:53	33.59	20.16	68.30	
8/20/2009	14:08	8/20/09 14:08	2.0	-2.0	0.0	8/20/2009	14:08	8/20/09 14:08	33.53	20.10	68.18	
8/20/2009	14:23	8/20/09 14:23	3.0	-2.5	0.3	8/20/2009	14:23	8/20/09 14:23	33.43	20.03	68.05	
8/20/2009	14:38	8/20/09 14:38	2.0	-1.5	0.3	8/20/2009	14:38	8/20/09 14:38	33.34	20.00	68.01	
8/20/2009	14:53	8/20/09 14:53	2.0	-1.0	0.5	8/20/2009	14:53	8/20/09 14:53	33.26	19.97	67.95	
8/20/2009	15:08	8/20/09 15:08	3.0	-1.5	0.8	8/20/2009	15:08	8/20/09 15:08	33.11	20.04	68.07	
8/20/2009	15:23	8/20/09 15:23	2.0	-3.0	-0.5	8/20/2009	15:23	8/20/09 15:23	33.04	20.06	68.10	
8/20/2009	15:38	8/20/09 15:38	2.5	-3.5	-0.5	8/20/2009	15:38	8/20/09 15:38	32.95	20.03	68.06	
8/20/2009	15:53	8/20/09 15:53	2.0	-3.0	-0.5	8/20/2009	15:53	8/20/09 15:53	32.98	20.20	68.36	
8/20/2009	16:08	8/20/09 16:08	2.0	-1.5	0.3	8/20/2009	16:08	8/20/09 16:08	32.84	20.81	69.46	
8/20/2009	16:23	8/20/09 16:23	1.0	-1.5	-0.3	8/20/2009	16:23	8/20/09 16:23	32.88	21.10	69.98	
8/20/2009	16:38	8/20/09 16:38	2.0	-1.0	0.5	8/20/2009	16:38	8/20/09 16:38	32.99	21.06	69.90	
8/20/2009	16:53	8/20/09 16:53	1.5	-1.5	0.0	8/20/2009	16:53	8/20/09 16:53	33.01	20.94	69.69	
8/20/2009	17:08	8/20/09 17:08	2.0	-1.0	0.5	8/20/2009	17:08	8/20/09 17:08	32.96	20.78	69.40	
8/20/2009	17:23	8/20/09 17:23	1.0	-0.5	0.3	8/20/2009	17:23	8/20/09 17:23	32.92	20.64	69.15	
8/20/2009	17:38	8/20/09 17:38	1.5	-1.0	0.3	8/20/2009	17:38	8/20/09 17:38	32.88	20.51	68.91	
8/20/2009	17:53	8/20/09 17:53	1.5	-0.5	0.5	8/20/2009	17:53	8/20/09 17:53	32.80	20.39	68.70	
8/20/2009	18:08	8/20/09 18:08	2.0	0.0	1.0	8/20/2009	18:08	8/20/09 18:08	32.79	20.30	68.54	

Table G-2

Phase I Pressure Difference Measurements [a]

St. Julien's Creek Annex Building 47

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
8/20/2009	18:23	8/20/09 18:23	1.0	-1.0	0.0	8/20/2009	18:23	8/20/09 18:23	32.79	20.22	68.40	
8/20/2009	18:38	8/20/09 18:38	1.5	0.0	0.8	8/20/2009	18:38	8/20/09 18:38	32.76	20.16	68.29	
8/20/2009	18:53	8/20/09 18:53	1.5	0.0	0.8	8/20/2009	18:53	8/20/09 18:53	32.74	20.09	68.17	
8/20/2009	19:08	8/20/09 19:08	1.0	0.5	0.8	8/20/2009	19:08	8/20/09 19:08	32.74	20.06	68.10	
8/20/2009	19:23	8/20/09 19:23	1.5	0.5	1.0	8/20/2009	19:23	8/20/09 19:23	32.82	19.99	67.99	
8/20/2009	19:38	8/20/09 19:38	1.0	0.0	0.5	8/20/2009	19:38	8/20/09 19:38	32.86	19.96	67.93	
8/20/2009	19:53	8/20/09 19:53	1.0	0.5	0.8	8/20/2009	19:53	8/20/09 19:53	32.93	19.91	67.83	
8/20/2009	20:08	8/20/09 20:08	1.0	0.5	0.8	8/20/2009	20:08	8/20/09 20:08	32.95	19.86	67.75	
8/20/2009	20:23	8/20/09 20:23	1.5	0.5	1.0	8/20/2009	20:23	8/20/09 20:23	33.03	19.81	67.66	
8/20/2009	20:38	8/20/09 20:38	1.0	0.0	0.5	8/20/2009	20:38	8/20/09 20:38	33.14	20.08	68.14	
8/20/2009	20:53	8/20/09 20:53	1.0	0.0	0.5	8/20/2009	20:53	8/20/09 20:53	33.19	20.30	68.54	
8/20/2009	21:08	8/20/09 21:08	1.0	0.5	0.8	8/20/2009	21:08	8/20/09 21:08	33.27	20.18	68.33	
8/20/2009	21:23	8/20/09 21:23	1.5	0.0	0.8	8/20/2009	21:23	8/20/09 21:23	33.24	20.08	68.14	
8/20/2009	21:38	8/20/09 21:38	1.5	0.0	0.8	8/20/2009	21:38	8/20/09 21:38	33.21	20.34	68.61	
8/20/2009	21:53	8/20/09 21:53	1.0	-0.5	0.3	8/20/2009	21:53	8/20/09 21:53	33.27	20.44	68.80	
8/20/2009	22:08	8/20/09 22:08	1.0	-0.5	0.3	8/20/2009	22:08	8/20/09 22:08	33.30	20.25	68.45	
8/20/2009	22:23	8/20/09 22:23	1.0	0.0	0.5	8/20/2009	22:23	8/20/09 22:23	33.30	20.08	68.15	
8/20/2009	22:38	8/20/09 22:38	1.5	-0.5	0.5	8/20/2009	22:38	8/20/09 22:38	33.26	20.42	68.75	
8/20/2009	22:53	8/20/09 22:53	1.0	-0.5	0.3	8/20/2009	22:53	8/20/09 22:53	33.32	20.49	68.87	
8/20/2009	23:08	8/20/09 23:08	1.5	-0.5	0.5	8/20/2009	23:08	8/20/09 23:08	33.40	20.29	68.51	
8/20/2009	23:23	8/20/09 23:23	2.0	-0.5	0.8	8/20/2009	23:23	8/20/09 23:23	33.41	20.43	68.77	
8/20/2009	23:38	8/20/09 23:38	1.0	-0.5	0.3	8/20/2009	23:38	8/20/09 23:38	33.48	20.51	68.92	
8/20/2009	23:53	8/20/09 23:53	1.5	-0.5	0.5	8/20/2009	23:53	8/20/09 23:53	33.52	20.26	68.47	
8/21/2009	0:08	8/21/09 0:08	1.5	-1.0	0.3	8/21/2009	0:08	8/21/09 0:08	33.47	20.26	68.48	
8/21/2009	0:23	8/21/09 0:23	1.0	-0.5	0.3	8/21/2009	0:23	8/21/09 0:23	33.48	20.67	69.21	
8/21/2009	0:38	8/21/09 0:38	1.0	-0.5	0.3	8/21/2009	0:38	8/21/09 0:38	33.55	20.43	68.78	
8/21/2009	0:53	8/21/09 0:53	1.0	-0.5	0.3	8/21/2009	0:53	8/21/09 0:53	33.44	20.31	68.55	
8/21/2009	1:08	8/21/09 1:08	1.0	0.0	0.5	8/21/2009	1:08	8/21/09 1:08	33.49	20.65	69.17	
8/21/2009	1:23	8/21/09 1:23	1.0	-0.5	0.3	8/21/2009	1:23	8/21/09 1:23	33.46	20.38	68.68	
8/21/2009	1:38	8/21/09 1:38	1.0	0.0	0.5	8/21/2009	1:38	8/21/09 1:38	33.36	20.57	69.03	
8/21/2009	1:53	8/21/09 1:53	1.0	-0.5	0.3	8/21/2009	1:53	8/21/09 1:53	33.36	20.52	68.94	
8/21/2009	2:08	8/21/09 2:08	1.0	0.0	0.5	8/21/2009	2:08	8/21/09 2:08	33.28	20.24	68.44	
8/21/2009	2:23	8/21/09 2:23	1.0	0.0	0.5	8/21/2009	2:23	8/21/09 2:23	33.20	20.64	69.15	
8/21/2009	2:38	8/21/09 2:38	1.0	0.0	0.5	8/21/2009	2:38	8/21/09 2:38	33.20	20.58	69.04	
8/21/2009	2:53	8/21/09 2:53	1.0	0.0	0.5	8/21/2009	2:53	8/21/09 2:53	33.16	20.30	68.53	
8/21/2009	3:08	8/21/09 3:08	1.0	0.0	0.5	8/21/2009	3:08	8/21/09 3:08	33.10	20.65	69.17	
8/21/2009	3:23	8/21/09 3:23	0.5	0.0	0.3	8/21/2009	3:23	8/21/09 3:23	33.20	20.53	68.96	
8/21/2009	3:38	8/21/09 3:38	1.0	0.0	0.5	8/21/2009	3:38	8/21/09 3:38	33.20	20.45	68.80	
8/21/2009	3:53	8/21/09 3:53	1.0	-0.5	0.3	8/21/2009	3:53	8/21/09 3:53	33.23	20.71	69.27	
8/21/2009	4:08	8/21/09 4:08	1.0	-0.5	0.3	8/21/2009	4:08	8/21/09 4:08	33.27	20.36	68.65	
8/21/2009	4:23	8/21/09 4:23	1.0	-0.5	0.3	8/21/2009	4:23	8/21/09 4:23	33.21	20.74	69.33	
8/21/2009	4:38	8/21/09 4:38	1.0	-0.5	0.3	8/21/2009	4:38	8/21/09 4:38	33.17	20.52	68.93	
8/21/2009	4:53	8/21/09 4:53	0.5	-0.5	0.0	8/21/2009	4:53	8/21/09 4:53	33.21	20.41	68.74	
8/21/2009	5:08	8/21/09 5:08	0.5	-0.5	0.0	8/21/2009	5:08	8/21/09 5:08	33.15	20.81	69.46	
8/21/2009	5:23	8/21/09 5:23	1.0	0.0	0.5	8/21/2009	5:23	8/21/09 5:23	33.15	20.51	68.92	
8/21/2009	5:38	8/21/09 5:38	1.0	-0.5	0.3	8/21/2009	5:38	8/21/09 5:38	33.16	20.58	69.04	
8/21/2009	5:53	8/21/09 5:53	0.5	0.0	0.3	8/21/2009	5:53	8/21/09 5:53	33.15	20.68	69.23	
8/21/2009	6:08	8/21/09 6:08	1.0	0.0	0.5	8/21/2009	6:08	8/21/09 6:08	33.15	20.42	68.76	
8/21/2009	6:23	8/21/09 6:23	0.5	0.0	0.3	8/21/2009	6:23	8/21/09 6:23	33.21	20.80	69.44	
8/21/2009	6:38	8/21/09 6:38	1.0	-0.5	0.3	8/21/2009	6:38	8/21/09 6:38	33.27	20.75	69.35	
8/21/2009	6:53	8/21/09 6:53	1.0	-1.0	0.0	8/21/2009	6:53	8/21/09 6:53	33.32	20.73	69.32	
8/21/2009	7:08	8/21/09 7:08	1.5	-0.5	0.5	8/21/2009	7:08	8/21/09 7:08	33.36	20.69	69.24	
8/21/2009	7:23	8/21/09 7:23	1.0	-1.0	0.0	8/21/2009	7:23	8/21/09 7:23	33.34	20.74	69.32	
8/21/2009	7:38	8/21/09 7:38	1.0	-0.5	0.3	8/21/2009	7:38	8/21/09 7:38	33.42	20.98	69.76	

Table G-2

Phase I Pressure Difference Measurements [a]

St. Julien's Creek Annex Building 47

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
8/21/2009	7:53	8/21/09 7:53	0.5	-1.0	-0.3	8/21/2009	7:53	8/21/09 7:53	33.51	21.40	70.53	
8/21/2009	8:08	8/21/09 8:08	1.0	-1.5	-0.3	8/21/2009	8:08	8/21/09 8:08	33.50	21.45	70.61	
8/21/2009	8:23	8/21/09 8:23	0.5	-1.0	-0.3	8/21/2009	8:23	8/21/09 8:23	33.50	21.35	70.42	
8/21/2009	8:38	8/21/09 8:38	1.0	-1.5	-0.3	8/21/2009	8:38	8/21/09 8:38	33.46	21.11	70.00	
8/21/2009	8:53	8/21/09 8:53	1.0	-1.0	0.0	8/21/2009	8:53	8/21/09 8:53	33.45	20.87	69.57	
8/21/2009	9:08	8/21/09 9:08	1.0	-2.0	-0.5	8/21/2009	9:08	8/21/09 9:08	33.42	20.70	69.25	
8/21/2009	9:23	8/21/09 9:23	1.5	-1.5	0.0	8/21/2009	9:23	8/21/09 9:23	33.41	20.96	69.73	
8/21/2009	9:38	8/21/09 9:38	1.5	-2.5	-0.5	8/21/2009	9:38	8/21/09 9:38	33.37	20.76	69.36	
8/21/2009	9:53	8/21/09 9:53	1.0	-1.5	-0.3	8/21/2009	9:53	8/21/09 9:53	33.39	20.85	69.53	
8/21/2009	10:08	8/21/09 10:08	1.5	-1.5	0.0	8/21/2009	10:08	8/21/09 10:08	33.45	20.87	69.56	
8/21/2009	10:23	8/21/09 10:23	1.0	-2.0	-0.5	8/21/2009	10:23	8/21/09 10:23	33.47	20.64	69.14	
8/21/2009	10:38	8/21/09 10:38	1.5	-2.0	-0.3	8/21/2009	10:38	8/21/09 10:38	33.50	20.48	68.86	
8/21/2009	10:53	8/21/09 10:53	1.0	-1.5	-0.3	8/21/2009	10:53	8/21/09 10:53	33.48	20.37	68.67	
8/21/2009	11:08	8/21/09 11:08	1.0	-4.0	-1.5	8/21/2009	11:08	8/21/09 11:08	33.52	20.31	68.56	
8/21/2009	11:23	8/21/09 11:23	1.5	-2.5	-0.5	8/21/2009	11:23	8/21/09 11:23	33.46	20.32	68.58	
8/21/2009	11:38	8/21/09 11:38	1.0	-3.0	-1.0	8/21/2009	11:38	8/21/09 11:38	33.39	20.46	68.83	
8/21/2009	11:53	8/21/09 11:53	1.5	-3.5	-1.0	8/21/2009	11:53	8/21/09 11:53	33.33	20.63	69.13	
8/21/2009	12:08	8/21/09 12:08	1.5	-4.5	-1.5	8/21/2009	12:08	8/21/09 12:08	33.25	20.68	69.23	
8/21/2009	12:23	8/21/09 12:23	1.5	-1.5	0.0	8/21/2009	12:23	8/21/09 12:23	33.19	20.74	69.33	
8/21/2009	12:38	8/21/09 12:38	2.0	-2.5	-0.3	8/21/2009	12:38	8/21/09 12:38	33.07	20.79	69.43	
8/21/2009	12:53	8/21/09 12:53	1.5	-2.0	-0.3	8/21/2009	12:53	8/21/09 12:53	32.96	20.91	69.64	
8/21/2009	13:08	8/21/09 13:08	2.0	-3.0	-0.5	8/21/2009	13:08	8/21/09 13:08	33.05	20.95	69.71	
8/21/2009	13:23	8/21/09 13:23	1.0	-4.5	-1.8	8/21/2009	13:23	8/21/09 13:23	32.96	20.82	69.48	
8/21/2009	13:38	8/21/09 13:38	1.5	-1.5	0.0	8/21/2009	13:38	8/21/09 13:38	32.85	20.71	69.27	
8/21/2009	13:53	8/21/09 13:53	1.5	-1.5	0.0	8/21/2009	13:53	8/21/09 13:53	32.67	20.62	69.12	
8/21/2009	14:08	8/21/09 14:08	1.5	-2.5	-0.5	8/21/2009	14:08	8/21/09 14:08	32.61	20.73	69.31	
8/21/2009	14:23	8/21/09 14:23	1.0	-1.5	-0.3	8/21/2009	14:23	8/21/09 14:23	32.55	20.74	69.33	
8/21/2009	14:38	8/21/09 14:38	1.5	-1.0	0.3	8/21/2009	14:38	8/21/09 14:38	32.45	20.79	69.42	
8/21/2009	14:53	8/21/09 14:53	1.5	-2.5	-0.5	8/21/2009	14:53	8/21/09 14:53	32.46	20.81	69.46	
8/21/2009	15:08	8/21/09 15:08	2.0	-4.5	-1.3	8/21/2009	15:08	8/21/09 15:08	32.49	20.78	69.41	
8/21/2009	15:23	8/21/09 15:23	1.0	-1.0	0.0	8/21/2009	15:23	8/21/09 15:23	32.50	20.68	69.23	
8/21/2009	15:38	8/21/09 15:38	1.0	0.0	0.5	8/21/2009	15:38	8/21/09 15:38	32.48	20.54	68.98	
8/21/2009	15:53	8/21/09 15:53	1.0	0.0	0.5	8/21/2009	15:53	8/21/09 15:53	32.31	20.41	68.74	
8/21/2009	16:08	8/21/09 16:08	1.0	0.0	0.5	8/21/2009	16:08	8/21/09 16:08	32.23	20.27	68.48	
8/21/2009	16:23	8/21/09 16:23	1.5	0.0	0.8	8/21/2009	16:23	8/21/09 16:23	32.24	20.18	68.32	
8/21/2009	16:38	8/21/09 16:38	1.5	0.0	0.8	8/21/2009	16:38	8/21/09 16:38	32.24	20.07	68.13	
8/21/2009	16:53	8/21/09 16:53	1.5	-2.0	-0.3	8/21/2009	16:53	8/21/09 16:53	32.34	20.01	68.02	
8/21/2009	17:08	8/21/09 17:08	1.5	-1.5	0.0	8/21/2009	17:08	8/21/09 17:08	32.31	19.95	67.91	
8/21/2009	17:23	8/21/09 17:23	1.5	-1.0	0.3	8/21/2009	17:23	8/21/09 17:23	32.30	19.95	67.90	
8/21/2009	17:38	8/21/09 17:38	2.0	-3.0	-0.5	8/21/2009	17:38	8/21/09 17:38	32.30	20.55	68.99	
8/21/2009	17:53	8/21/09 17:53	2.0	-1.5	0.3	8/21/2009	17:53	8/21/09 17:53	32.05	20.44	68.79	
8/21/2009	18:08	8/21/09 18:08	1.5	-3.0	-0.8	8/21/2009	18:08	8/21/09 18:08	32.08	20.30	68.54	
8/21/2009	18:23	8/21/09 18:23	1.5	-1.0	0.3	8/21/2009	18:23	8/21/09 18:23	32.02	20.17	68.30	
8/21/2009	18:38	8/21/09 18:38	1.0	-0.5	0.3	8/21/2009	18:38	8/21/09 18:38	31.98	20.58	69.05	
8/21/2009	18:53	8/21/09 18:53	1.0	-0.5	0.3	8/21/2009	18:53	8/21/09 18:53	32.07	20.45	68.82	
8/21/2009	19:08	8/21/09 19:08	1.0	0.0	0.5	8/21/2009	19:08	8/21/09 19:08	32.07	20.28	68.50	
8/21/2009	19:23	8/21/09 19:23	1.0	0.0	0.5	8/21/2009	19:23	8/21/09 19:23	32.03	20.27	68.49	
8/21/2009	19:38	8/21/09 19:38	0.5	0.0	0.3	8/21/2009	19:38	8/21/09 19:38	32.05	20.67	69.20	
8/21/2009	19:53	8/21/09 19:53	1.0	0.0	0.5	8/21/2009	19:53	8/21/09 19:53	32.08	20.44	68.80	
8/21/2009	20:08	8/21/09 20:08	1.0	-0.5	0.3	8/21/2009	20:08	8/21/09 20:08	32.05	20.71	69.28	
8/21/2009	20:23	8/21/09 20:23	1.0	0.0	0.5	8/21/2009	20:23	8/21/09 20:23	32.10	20.59	69.06	
8/21/2009	20:38	8/21/09 20:38	1.0	0.0	0.5	8/21/2009	20:38	8/21/09 20:38	32.10	20.36	68.65	
8/21/2009	20:53	8/21/09 20:53	1.0	0.0	0.5	8/21/2009	20:53	8/21/09 20:53	32.08	20.61	69.09	
8/21/2009	21:08	8/21/09 21:08	0.5	0.0	0.3	8/21/2009	21:08	8/21/09 21:08	32.17	20.66	69.18	

Table G-2

Phase I Pressure Difference Measurements [a]

St. Julien's Creek Annex Building 47

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
8/21/2009	21:23	8/21/09 21:23	1.0	0.0	0.5	8/21/2009	21:23	8/21/09 21:23	32.33	20.38	68.68	
8/21/2009	21:38	8/21/09 21:38	1.0	0.0	0.5	8/21/2009	21:38	8/21/09 21:38	32.36	20.75	69.35	
8/21/2009	21:53	8/21/09 21:53	1.0	0.0	0.5	8/21/2009	21:53	8/21/09 21:53	32.44	20.54	68.97	
8/21/2009	22:08	8/21/09 22:08	1.0	0.0	0.5	8/21/2009	22:08	8/21/09 22:08	32.48	20.43	68.77	
8/21/2009	22:23	8/21/09 22:23	0.5	0.0	0.3	8/21/2009	22:23	8/21/09 22:23	32.41	20.86	69.55	
8/21/2009	22:38	8/21/09 22:38	1.0	0.0	0.5	8/21/2009	22:38	8/21/09 22:38	32.42	20.57	69.03	
8/21/2009	22:53	8/21/09 22:53	1.0	0.0	0.5	8/21/2009	22:53	8/21/09 22:53	32.47	20.51	68.91	
8/21/2009	23:08	8/21/09 23:08	1.0	0.0	0.5	8/21/2009	23:08	8/21/09 23:08	32.46	20.75	69.35	
8/21/2009	23:23	8/21/09 23:23	1.0	0.0	0.5	8/21/2009	23:23	8/21/09 23:23	32.42	20.46	68.83	
8/21/2009	23:38	8/21/09 23:38	1.0	0.0	0.5	8/21/2009	23:38	8/21/09 23:38	32.33	20.52	68.94	
8/21/2009	23:53	8/21/09 23:53	1.0	0.0	0.5	8/21/2009	23:53	8/21/09 23:53	32.34	20.74	69.33	
8/22/2009	0:08	8/22/09 0:08	1.0	0.0	0.5	8/22/2009	0:08	8/22/09 0:08	32.43	20.42	68.76	
8/22/2009	0:23	8/22/09 0:23	1.0	0.0	0.5	8/22/2009	0:23	8/22/09 0:23	32.34	20.67	69.20	
8/22/2009	0:38	8/22/09 0:38	1.0	0.0	0.5	8/22/2009	0:38	8/22/09 0:38	32.33	20.60	69.09	
8/22/2009	0:53	8/22/09 0:53	1.0	0.0	0.5	8/22/2009	0:53	8/22/09 0:53	32.28	20.50	68.89	
8/22/2009	1:08	8/22/09 1:08	1.0	-0.5	0.3	8/22/2009	1:08	8/22/09 1:08	32.26	20.86	69.54	
8/22/2009	1:23	8/22/09 1:23	1.0	-0.5	0.3	8/22/2009	1:23	8/22/09 1:23	32.28	20.51	68.92	
8/22/2009	1:38	8/22/09 1:38	1.0	0.0	0.5	8/22/2009	1:38	8/22/09 1:38	32.13	20.57	69.03	
8/22/2009	1:53	8/22/09 1:53	1.0	0.0	0.5	8/22/2009	1:53	8/22/09 1:53	32.06	20.86	69.55	
8/22/2009	2:08	8/22/09 2:08	1.0	0.0	0.5	8/22/2009	2:08	8/22/09 2:08	32.02	20.52	68.94	
8/22/2009	2:23	8/22/09 2:23	0.5	0.0	0.3	8/22/2009	2:23	8/22/09 2:23	31.93	20.68	69.22	
8/22/2009	2:38	8/22/09 2:38	0.5	0.0	0.3	8/22/2009	2:38	8/22/09 2:38	31.96	20.66	69.18	
8/22/2009	2:53	8/22/09 2:53	1.0	0.0	0.5	8/22/2009	2:53	8/22/09 2:53	31.90	20.49	68.88	
8/22/2009	3:08	8/22/09 3:08	0.5	0.0	0.3	8/22/2009	3:08	8/22/09 3:08	31.92	20.90	69.63	
8/22/2009	3:23	8/22/09 3:23	0.5	0.0	0.3	8/22/2009	3:23	8/22/09 3:23	31.89	20.56	69.01	
8/22/2009	3:38	8/22/09 3:38	0.5	0.0	0.3	8/22/2009	3:38	8/22/09 3:38	31.78	20.47	68.84	
8/22/2009	3:53	8/22/09 3:53	0.5	-0.5	0.0	8/22/2009	3:53	8/22/09 3:53	31.69	20.87	69.56	
8/22/2009	4:08	8/22/09 4:08	1.5	0.0	0.8	8/22/2009	4:08	8/22/09 4:08	31.71	20.54	68.97	
8/22/2009	4:23	8/22/09 4:23	1.0	0.0	0.5	8/22/2009	4:23	8/22/09 4:23	31.66	20.62	69.11	
8/22/2009	4:38	8/22/09 4:38	0.5	0.0	0.3	8/22/2009	4:38	8/22/09 4:38	31.71	20.72	69.30	
8/22/2009	4:53	8/22/09 4:53	1.0	0.0	0.5	8/22/2009	4:53	8/22/09 4:53	31.63	20.44	68.79	
8/22/2009	5:08	8/22/09 5:08	0.5	0.0	0.3	8/22/2009	5:08	8/22/09 5:08	31.48	20.88	69.58	
8/22/2009	5:23	8/22/09 5:23	1.0	0.0	0.5	8/22/2009	5:23	8/22/09 5:23	31.53	20.57	69.02	
8/22/2009	5:38	8/22/09 5:38	1.0	0.0	0.5	8/22/2009	5:38	8/22/09 5:38	31.50	20.49	68.88	
8/22/2009	5:53	8/22/09 5:53	0.5	0.0	0.3	8/22/2009	5:53	8/22/09 5:53	31.43	20.92	69.66	
8/22/2009	6:08	8/22/09 6:08	1.0	0.0	0.5	8/22/2009	6:08	8/22/09 6:08	31.47	20.64	69.14	
8/22/2009	6:23	8/22/09 6:23	1.0	0.0	0.5	8/22/2009	6:23	8/22/09 6:23	31.42	20.52	68.94	
8/22/2009	6:38	8/22/09 6:38	1.0	0.0	0.5	8/22/2009	6:38	8/22/09 6:38	31.41	20.87	69.57	
8/22/2009	6:53	8/22/09 6:53	1.0	0.0	0.5	8/22/2009	6:53	8/22/09 6:53	31.43	20.50	68.91	
8/22/2009	7:08	8/22/09 7:08	0.5	0.0	0.3	8/22/2009	7:08	8/22/09 7:08	31.44	20.80	69.43	
8/22/2009	7:23	8/22/09 7:23	1.0	0.0	0.5	8/22/2009	7:23	8/22/09 7:23	31.48	20.62	69.11	
8/22/2009	7:38	8/22/09 7:38	1.0	0.0	0.5	8/22/2009	7:38	8/22/09 7:38	31.46	20.58	69.05	
8/22/2009	7:53	8/22/09 7:53	0.5	0.0	0.3	8/22/2009	7:53	8/22/09 7:53	31.41	20.93	69.67	
8/22/2009	8:08	8/22/09 8:08	1.0	0.0	0.5	8/22/2009	8:08	8/22/09 8:08	31.44	20.55	68.98	
8/22/2009	8:23	8/22/09 8:23	1.0	-0.5	0.3	8/22/2009	8:23	8/22/09 8:23	31.38	20.55	68.99	
8/22/2009	8:38	8/22/09 8:38	0.5	0.0	0.3	8/22/2009	8:38	8/22/09 8:38	31.40	20.88	69.59	
8/22/2009	8:53	8/22/09 8:53	1.0	0.0	0.5	8/22/2009	8:53	8/22/09 8:53	31.40	20.51	68.92	
8/22/2009	9:08	8/22/09 9:08	1.5	0.0	0.8	8/22/2009	9:08	8/22/09 9:08	31.36	20.61	69.09	
8/22/2009	9:23	8/22/09 9:23	1.0	0.0	0.5	8/22/2009	9:23	8/22/09 9:23	31.37	20.81	69.46	
8/22/2009	9:38	8/22/09 9:38	1.0	-0.5	0.3	8/22/2009	9:38	8/22/09 9:38	31.41	20.46	68.83	
8/22/2009	9:53	8/22/09 9:53	1.0	0.0	0.5	8/22/2009	9:53	8/22/09 9:53	31.39	20.55	68.99	
8/22/2009	10:08	8/22/09 10:08	1.0	0.0	0.5	8/22/2009	10:08	8/22/09 10:08	31.35	20.82	69.47	
8/22/2009	10:23	8/22/09 10:23	1.5	0.5	1.0	8/22/2009	10:23	8/22/09 10:23	31.36	20.49	68.88	

Table G-2
Phase I Pressure Difference Measurements [a]
St. Julien's Creek Annex Building 47

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
8/22/2009	10:38	8/22/09 10:38				8/22/2009	10:38	8/22/09 10:38	31.31	20.53	68.95	Power Failure on OmniGuard
8/22/2009	10:53	8/22/09 10:53				8/22/2009	10:53	8/22/09 10:53	31.24	20.72	69.30	Power Failure on OmniGuard
8/22/2009	11:08	8/22/09 11:08				8/22/2009	11:08	8/22/09 11:08	31.28	20.53	68.95	Power Failure on OmniGuard
8/22/2009	11:23	8/22/09 11:23				8/22/2009	11:23	8/22/09 11:23	31.24	20.75	69.34	Power Failure on OmniGuard
8/22/2009	11:38	8/22/09 11:38				8/22/2009	11:38	8/22/09 11:38	31.16	20.64	69.14	Power Failure on OmniGuard
8/22/2009	11:53	8/22/09 11:53				8/22/2009	11:53	8/22/09 11:53	31.12	20.46	68.82	Power Failure on OmniGuard
8/22/2009	12:08	8/22/09 12:08				8/22/2009	12:08	8/22/09 12:08	30.91	20.50	68.91	Power Failure on OmniGuard
8/22/2009	12:23	8/22/09 12:23				8/22/2009	12:23	8/22/09 12:23	30.82	20.59	69.07	Power Failure on OmniGuard
8/22/2009	12:38	8/22/09 12:38				8/22/2009	12:38	8/22/09 12:38	30.68	20.46	68.82	Power Failure on OmniGuard
8/22/2009	12:53	8/22/09 12:53				8/22/2009	12:53	8/22/09 12:53	30.55	20.33	68.59	Power Failure on OmniGuard
8/22/2009	13:08	8/22/09 13:08				8/22/2009	13:08	8/22/09 13:08	30.40	20.22	68.40	Power Failure on OmniGuard
8/22/2009	13:23	8/22/09 13:23				8/22/2009	13:23	8/22/09 13:23	30.17	20.54	68.97	Power Failure on OmniGuard
8/22/2009	13:38	8/22/09 13:38				8/22/2009	13:38	8/22/09 13:38	30.03	20.45	68.80	Power Failure on OmniGuard
8/22/2009	13:53	8/22/09 13:53				8/22/2009	13:53	8/22/09 13:53	29.91	20.36	68.64	Power Failure on OmniGuard
8/22/2009	14:08	8/22/09 14:08				8/22/2009	14:08	8/22/09 14:08	29.90	20.32	68.58	Power Failure on OmniGuard
8/22/2009	14:23	8/22/09 14:23				8/22/2009	14:23	8/22/09 14:23	29.75	20.30	68.55	Power Failure on OmniGuard
8/22/2009	14:38	8/22/09 14:38				8/22/2009	14:38	8/22/09 14:38	29.63	20.27	68.49	Power Failure on OmniGuard
8/22/2009	14:53	8/22/09 14:53				8/22/2009	14:53	8/22/09 14:53	29.78	20.21	68.38	Power Failure on OmniGuard
8/22/2009	15:08	8/22/09 15:08				8/22/2009	15:08	8/22/09 15:08	29.69	20.22	68.39	Power Failure on OmniGuard
8/22/2009	15:23	8/22/09 15:23				8/22/2009	15:23	8/22/09 15:23	29.89	20.22	68.39	Power Failure on OmniGuard
8/22/2009	15:38	8/22/09 15:38				8/22/2009	15:38	8/22/09 15:38	29.80	20.19	68.33	Power Failure on OmniGuard
8/22/2009	15:53	8/22/09 15:53				8/22/2009	15:53	8/22/09 15:53	29.82	20.15	68.28	Power Failure on OmniGuard
8/22/2009	16:08	8/22/09 16:08				8/22/2009	16:08	8/22/09 16:08	29.63	20.09	68.16	Power Failure on OmniGuard
8/22/2009	16:23	8/22/09 16:23				8/22/2009	16:23	8/22/09 16:23	30.35	20.06	68.11	Power Failure on OmniGuard
8/22/2009	16:38	8/22/09 16:38				8/22/2009	16:38	8/22/09 16:38	30.44	20.01	68.02	Power Failure on OmniGuard
8/22/2009	16:53	8/22/09 16:53				8/22/2009	16:53	8/22/09 16:53	30.54	19.97	67.95	Power Failure on OmniGuard
8/22/2009	17:08	8/22/09 17:08				8/22/2009	17:08	8/22/09 17:08	30.48	20.43	68.78	Power Failure on OmniGuard

Table G-2
Phase I Pressure Difference Measurements [a]
St. Julien's Creek Annex Building 47

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
8/22/2009	17:23	8/22/09 17:23				8/22/2009	17:23	8/22/09 17:23	30.61	20.30	68.55	Power Failure on OmniGuard
8/22/2009	17:38	8/22/09 17:38				8/22/2009	17:38	8/22/09 17:38	30.53	20.08	68.15	Power Failure on OmniGuard
8/22/2009	17:53	8/22/09 17:53				8/22/2009	17:53	8/22/09 17:53	30.56	20.49	68.89	Power Failure on OmniGuard
8/22/2009	18:08	8/22/09 18:08				8/22/2009	18:08	8/22/09 18:08	30.79	20.40	68.72	Power Failure on OmniGuard
8/22/2009	18:23	8/22/09 18:23				8/22/2009	18:23	8/22/09 18:23	30.75	20.47	68.84	Power Failure on OmniGuard
8/22/2009	18:38	8/22/09 18:38				8/22/2009	18:38	8/22/09 18:38	30.64	20.54	68.98	Power Failure on OmniGuard
8/22/2009	18:53	8/22/09 18:53				8/22/2009	18:53	8/22/09 18:53	30.54	20.37	68.66	Power Failure on OmniGuard
8/22/2009	19:08	8/22/09 19:08				8/22/2009	19:08	8/22/09 19:08	30.53	20.75	69.34	Power Failure on OmniGuard
8/22/2009	19:23	8/22/09 19:23				8/22/2009	19:23	8/22/09 19:23	30.52	20.36	68.64	Power Failure on OmniGuard
8/22/2009	19:38	8/22/09 19:38				8/22/2009	19:38	8/22/09 19:38	30.40	20.65	69.16	Power Failure on OmniGuard
8/22/2009	19:53	8/22/09 19:53				8/22/2009	19:53	8/22/09 19:53	30.31	20.73	69.31	Power Failure on OmniGuard
8/22/2009	20:08	8/22/09 20:08				8/22/2009	20:08	8/22/09 20:08	30.24	20.35	68.64	Power Failure on OmniGuard
8/22/2009	20:23	8/22/09 20:23				8/22/2009	20:23	8/22/09 20:23	30.30	20.71	69.27	Power Failure on OmniGuard
8/22/2009	20:38	8/22/09 20:38				8/22/2009	20:38	8/22/09 20:38	30.39	20.65	69.16	Power Failure on OmniGuard
8/22/2009	20:53	8/22/09 20:53				8/22/2009	20:53	8/22/09 20:53	30.50	20.52	68.93	Power Failure on OmniGuard
8/22/2009	21:08	8/22/09 21:08				8/22/2009	21:08	8/22/09 21:08	30.52	20.84	69.51	Power Failure on OmniGuard
8/22/2009	21:23	8/22/09 21:23				8/22/2009	21:23	8/22/09 21:23	30.63	20.41	68.73	Power Failure on OmniGuard
8/22/2009	21:38	8/22/09 21:38				8/22/2009	21:38	8/22/09 21:38	30.70	20.71	69.27	Power Failure on OmniGuard
8/22/2009	21:53	8/22/09 21:53				8/22/2009	21:53	8/22/09 21:53	30.85	20.78	69.40	Power Failure on OmniGuard
8/22/2009	22:08	8/22/09 22:08				8/22/2009	22:08	8/22/09 22:08	30.86	20.46	68.83	Power Failure on OmniGuard
8/22/2009	22:23	8/22/09 22:23				8/22/2009	22:23	8/22/09 22:23	30.84	20.84	69.52	Power Failure on OmniGuard
8/22/2009	22:38	8/22/09 22:38				8/22/2009	22:38	8/22/09 22:38	30.95	20.75	69.35	Power Failure on OmniGuard
8/22/2009	22:53	8/22/09 22:53				8/22/2009	22:53	8/22/09 22:53	30.90	20.36	68.66	Power Failure on OmniGuard
8/22/2009	23:08	8/22/09 23:08				8/22/2009	23:08	8/22/09 23:08	30.84	20.71	69.27	Power Failure on OmniGuard
8/22/2009	23:23	8/22/09 23:23				8/22/2009	23:23	8/22/09 23:23	30.90	20.72	69.30	Power Failure on OmniGuard
8/22/2009	23:38	8/22/09 23:38				8/22/2009	23:38	8/22/09 23:38	30.93	20.53	68.96	Power Failure on OmniGuard
8/22/2009	23:53	8/22/09 23:53				8/22/2009	23:53	8/22/09 23:53	30.98	20.92	69.65	Power Failure on OmniGuard

Table G-2
Phase I Pressure Difference Measurements [a]
St. Julien's Creek Annex Building 47

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
8/23/2009	0:08	8/23/09 0:08				8/23/2009	0:08	8/23/09 0:08	31.03	20.69	69.25	Power Failure on OmniGuard
8/23/2009	0:23	8/23/09 0:23				8/23/2009	0:23	8/23/09 0:23	31.01	20.62	69.11	Power Failure on OmniGuard
8/23/2009	0:38	8/23/09 0:38				8/23/2009	0:38	8/23/09 0:38	31.02	20.96	69.73	Power Failure on OmniGuard
8/23/2009	0:53	8/23/09 0:53				8/23/2009	0:53	8/23/09 0:53	31.08	20.65	69.16	Power Failure on OmniGuard
8/23/2009	1:08	8/23/09 1:08				8/23/2009	1:08	8/23/09 1:08	30.99	20.65	69.17	Power Failure on OmniGuard
8/23/2009	1:23	8/23/09 1:23				8/23/2009	1:23	8/23/09 1:23	30.99	21.01	69.81	Power Failure on OmniGuard
8/23/2009	1:38	8/23/09 1:38				8/23/2009	1:38	8/23/09 1:38	30.97	20.54	68.97	Power Failure on OmniGuard
8/23/2009	1:53	8/23/09 1:53				8/23/2009	1:53	8/23/09 1:53	30.96	20.71	69.28	Power Failure on OmniGuard
8/23/2009	2:08	8/23/09 2:08				8/23/2009	2:08	8/23/09 2:08	30.99	21.05	69.89	Power Failure on OmniGuard
8/23/2009	2:23	8/23/09 2:23				8/23/2009	2:23	8/23/09 2:23	31.02	20.62	69.11	Power Failure on OmniGuard
8/23/2009	2:38	8/23/09 2:38				8/23/2009	2:38	8/23/09 2:38	30.99	20.72	69.29	Power Failure on OmniGuard
8/23/2009	2:53	8/23/09 2:53				8/23/2009	2:53	8/23/09 2:53	31.09	20.96	69.74	Power Failure on OmniGuard
8/23/2009	3:08	8/23/09 3:08				8/23/2009	3:08	8/23/09 3:08	31.05	20.51	68.92	Power Failure on OmniGuard
8/23/2009	3:23	8/23/09 3:23				8/23/2009	3:23	8/23/09 3:23	31.10	20.83	69.50	Power Failure on OmniGuard
8/23/2009	3:38	8/23/09 3:38				8/23/2009	3:38	8/23/09 3:38	31.20	21.05	69.89	Power Failure on OmniGuard
8/23/2009	3:53	8/23/09 3:53				8/23/2009	3:53	8/23/09 3:53	31.20	20.56	69.01	Power Failure on OmniGuard
8/23/2009	4:08	8/23/09 4:08				8/23/2009	4:08	8/23/09 4:08	31.18	20.81	69.45	Power Failure on OmniGuard
8/23/2009	4:23	8/23/09 4:23				8/23/2009	4:23	8/23/09 4:23	31.20	20.94	69.69	Power Failure on OmniGuard
8/23/2009	4:38	8/23/09 4:38				8/23/2009	4:38	8/23/09 4:38	31.15	20.56	69.01	Power Failure on OmniGuard
8/23/2009	4:53	8/23/09 4:53				8/23/2009	4:53	8/23/09 4:53	31.20	20.86	69.54	Power Failure on OmniGuard
8/23/2009	5:08	8/23/09 5:08				8/23/2009	5:08	8/23/09 5:08	31.27	21.04	69.88	Power Failure on OmniGuard
8/23/2009	5:23	8/23/09 5:23				8/23/2009	5:23	8/23/09 5:23	31.26	20.58	69.05	Power Failure on OmniGuard
8/23/2009	5:38	8/23/09 5:38				8/23/2009	5:38	8/23/09 5:38	31.33	20.88	69.59	Power Failure on OmniGuard
8/23/2009	5:53	8/23/09 5:53				8/23/2009	5:53	8/23/09 5:53	31.46	21.17	70.11	Power Failure on OmniGuard
8/23/2009	6:08	8/23/09 6:08				8/23/2009	6:08	8/23/09 6:08	31.50	20.66	69.19	Power Failure on OmniGuard
8/23/2009	6:23	8/23/09 6:23				8/23/2009	6:23	8/23/09 6:23	31.54	20.77	69.38	Power Failure on OmniGuard
8/23/2009	6:38	8/23/09 6:38				8/23/2009	6:38	8/23/09 6:38	31.61	21.08	69.95	Power Failure on OmniGuard

Table G-2
Phase I Pressure Difference Measurements [a]
St. Julien's Creek Annex Building 47

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
8/23/2009	6:53	8/23/09 6:53				8/23/2009	6:53	8/23/09 6:53	31.80	20.60	69.07	Power Failure on OmniGuard
8/23/2009	7:08	8/23/09 7:08				8/23/2009	7:08	8/23/09 7:08	31.86	20.82	69.48	Power Failure on OmniGuard
8/23/2009	7:23	8/23/09 7:23				8/23/2009	7:23	8/23/09 7:23	31.90	21.13	70.03	Power Failure on OmniGuard
8/23/2009	7:38	8/23/09 7:38				8/23/2009	7:38	8/23/09 7:38	32.00	20.76	69.36	Power Failure on OmniGuard
8/23/2009	7:53	8/23/09 7:53				8/23/2009	7:53	8/23/09 7:53	31.96	20.74	69.33	Power Failure on OmniGuard
8/23/2009	8:08	8/23/09 8:08				8/23/2009	8:08	8/23/09 8:08	31.98	21.04	69.88	Power Failure on OmniGuard
8/23/2009	8:23	8/23/09 8:23				8/23/2009	8:23	8/23/09 8:23	32.00	20.89	69.60	Power Failure on OmniGuard
8/23/2009	8:38	8/23/09 8:38				8/23/2009	8:38	8/23/09 8:38	31.99	20.69	69.23	Power Failure on OmniGuard
8/23/2009	8:53	8/23/09 8:53				8/23/2009	8:53	8/23/09 8:53	32.01	20.98	69.76	Power Failure on OmniGuard
8/23/2009	9:08	8/23/09 9:08				8/23/2009	9:08	8/23/09 9:08	32.06	20.93	69.67	Power Failure on OmniGuard
8/23/2009	9:23	8/23/09 9:23				8/23/2009	9:23	8/23/09 9:23	32.03	20.60	69.08	Power Failure on OmniGuard
8/23/2009	9:38	8/23/09 9:38				8/23/2009	9:38	8/23/09 9:38	32.05	20.94	69.68	Power Failure on OmniGuard
8/23/2009	9:53	8/23/09 9:53				8/23/2009	9:53	8/23/09 9:53	32.15	20.93	69.67	Power Failure on OmniGuard
8/23/2009	10:08	8/23/09 10:08				8/23/2009	10:08	8/23/09 10:08	32.19	20.48	68.86	Power Failure on OmniGuard
8/23/2009	10:23	8/23/09 10:23				8/23/2009	10:23	8/23/09 10:23	32.21	20.80	69.43	Power Failure on OmniGuard
8/23/2009	10:38	8/23/09 10:38				8/23/2009	10:38	8/23/09 10:38	32.29	20.86	69.54	Power Failure on OmniGuard
8/23/2009	10:53	8/23/09 10:53				8/23/2009	10:53	8/23/09 10:53	32.31	20.48	68.86	Power Failure on OmniGuard
8/23/2009	11:08	8/23/09 11:08				8/23/2009	11:08	8/23/09 11:08	32.30	20.86	69.55	Power Failure on OmniGuard
8/23/2009	11:23	8/23/09 11:23				8/23/2009	11:23	8/23/09 11:23	32.35	20.81	69.46	Power Failure on OmniGuard
8/23/2009	11:38	8/23/09 11:38				8/23/2009	11:38	8/23/09 11:38	32.33	20.45	68.82	Power Failure on OmniGuard
8/23/2009	11:53	8/23/09 11:53				8/23/2009	11:53	8/23/09 11:53	32.28	20.83	69.49	Power Failure on OmniGuard
8/23/2009	12:08	8/23/09 12:08				8/23/2009	12:08	8/23/09 12:08	32.27	20.74	69.33	Power Failure on OmniGuard
8/23/2009	12:23	8/23/09 12:23				8/23/2009	12:23	8/23/09 12:23	32.25	20.50	68.90	Power Failure on OmniGuard
8/23/2009	12:38	8/23/09 12:38				8/23/2009	12:38	8/23/09 12:38	32.26	20.88	69.59	Power Failure on OmniGuard
8/23/2009	12:53	8/23/09 12:53				8/23/2009	12:53	8/23/09 12:53	32.29	20.52	68.94	Power Failure on OmniGuard
8/23/2009	13:08	8/23/09 13:08				8/23/2009	13:08	8/23/09 13:08	32.26	20.65	69.17	Power Failure on OmniGuard
8/23/2009	13:23	8/23/09 13:23				8/23/2009	13:23	8/23/09 13:23	32.31	20.76	69.36	Power Failure on OmniGuard

Table G-2
Phase I Pressure Difference Measurements [a]
St. Julien's Creek Annex Building 47

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
8/23/2009	13:38	8/23/09 13:38				8/23/2009	13:38	8/23/09 13:38	32.31	20.40	68.72	Power Failure on OmniGuard
8/23/2009	13:53	8/23/09 13:53				8/23/2009	13:53	8/23/09 13:53	32.25	20.63	69.13	Power Failure on OmniGuard
8/23/2009	14:08	8/23/09 14:08				8/23/2009	14:08	8/23/09 14:08	32.28	20.73	69.31	Power Failure on OmniGuard
8/23/2009	14:23	8/23/09 14:23				8/23/2009	14:23	8/23/09 14:23	32.23	20.37	68.66	Power Failure on OmniGuard
8/23/2009	14:38	8/23/09 14:38				8/23/2009	14:38	8/23/09 14:38	32.21	20.70	69.26	Power Failure on OmniGuard
8/23/2009	14:53	8/23/09 14:53				8/23/2009	14:53	8/23/09 14:53	32.24	20.59	69.07	Power Failure on OmniGuard
8/23/2009	15:08	8/23/09 15:08				8/23/2009	15:08	8/23/09 15:08	32.18	20.31	68.56	Power Failure on OmniGuard
8/23/2009	15:23	8/23/09 15:23				8/23/2009	15:23	8/23/09 15:23	32.10	20.76	69.37	Power Failure on OmniGuard
8/23/2009	15:38	8/23/09 15:38				8/23/2009	15:38	8/23/09 15:38	32.13	20.65	69.17	Power Failure on OmniGuard
8/23/2009	15:53	8/23/09 15:53				8/23/2009	15:53	8/23/09 15:53	32.12	20.32	68.58	Power Failure on OmniGuard
8/23/2009	16:08	8/23/09 16:08				8/23/2009	16:08	8/23/09 16:08	32.07	20.73	69.31	Power Failure on OmniGuard
8/23/2009	16:23	8/23/09 16:23				8/23/2009	16:23	8/23/09 16:23	32.10	20.51	68.92	Power Failure on OmniGuard
8/23/2009	16:38	8/23/09 16:38				8/23/2009	16:38	8/23/09 16:38	32.09	20.33	68.59	Power Failure on OmniGuard
8/23/2009	16:53	8/23/09 16:53				8/23/2009	16:53	8/23/09 16:53	32.05	20.82	69.47	Power Failure on OmniGuard
8/23/2009	17:08	8/23/09 17:08				8/23/2009	17:08	8/23/09 17:08	32.08	20.58	69.05	Power Failure on OmniGuard
8/23/2009	17:23	8/23/09 17:23				8/23/2009	17:23	8/23/09 17:23	32.04	20.37	68.67	Power Failure on OmniGuard
8/23/2009	17:38	8/23/09 17:38				8/23/2009	17:38	8/23/09 17:38	32.08	20.76	69.37	Power Failure on OmniGuard
8/23/2009	17:53	8/23/09 17:53				8/23/2009	17:53	8/23/09 17:53	32.10	20.47	68.84	Power Failure on OmniGuard
8/23/2009	18:08	8/23/09 18:08				8/23/2009	18:08	8/23/09 18:08	32.12	20.50	68.91	Power Failure on OmniGuard
8/23/2009	18:23	8/23/09 18:23				8/23/2009	18:23	8/23/09 18:23	32.14	20.68	69.22	Power Failure on OmniGuard
8/23/2009	18:38	8/23/09 18:38				8/23/2009	18:38	8/23/09 18:38	32.12	20.37	68.66	Power Failure on OmniGuard
8/23/2009	18:53	8/23/09 18:53				8/23/2009	18:53	8/23/09 18:53	32.13	20.49	68.88	Power Failure on OmniGuard
8/23/2009	19:08	8/23/09 19:08				8/23/2009	19:08	8/23/09 19:08	32.21	20.71	69.28	Power Failure on OmniGuard
8/23/2009	19:23	8/23/09 19:23				8/23/2009	19:23	8/23/09 19:23	32.26	20.40	68.71	Power Failure on OmniGuard
8/23/2009	19:38	8/23/09 19:38				8/23/2009	19:38	8/23/09 19:38	32.21	20.61	69.10	Power Failure on OmniGuard
8/23/2009	19:53	8/23/09 19:53				8/23/2009	19:53	8/23/09 19:53	32.29	20.57	69.03	Power Failure on OmniGuard
8/23/2009	20:08	8/23/09 20:08				8/23/2009	20:08	8/23/09 20:08	32.40	20.33	68.59	Power Failure on OmniGuard

Table G-2
Phase I Pressure Difference Measurements [a]
St. Julien's Creek Annex Building 47

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
8/23/2009	20:23	8/23/09 20:23				8/23/2009	20:23	8/23/09 20:23	32.44	20.80	69.44	Power Failure on OmniGuard
8/23/2009	20:38	8/23/09 20:38				8/23/2009	20:38	8/23/09 20:38	32.61	20.59	69.07	Power Failure on OmniGuard
8/23/2009	20:53	8/23/09 20:53				8/23/2009	20:53	8/23/09 20:53	32.72	20.47	68.85	Power Failure on OmniGuard
8/23/2009	21:08	8/23/09 21:08				8/23/2009	21:08	8/23/09 21:08	32.75	20.84	69.51	Power Failure on OmniGuard
8/23/2009	21:23	8/23/09 21:23				8/23/2009	21:23	8/23/09 21:23	32.85	20.49	68.89	Power Failure on OmniGuard
8/23/2009	21:38	8/23/09 21:38				8/23/2009	21:38	8/23/09 21:38	32.87	20.66	69.19	Power Failure on OmniGuard
8/23/2009	21:53	8/23/09 21:53				8/23/2009	21:53	8/23/09 21:53	32.99	20.67	69.20	Power Failure on OmniGuard
8/23/2009	22:08	8/23/09 22:08				8/23/2009	22:08	8/23/09 22:08	33.00	20.43	68.77	Power Failure on OmniGuard
8/23/2009	22:23	8/23/09 22:23				8/23/2009	22:23	8/23/09 22:23	33.00	20.88	69.58	Power Failure on OmniGuard
8/23/2009	22:38	8/23/09 22:38				8/23/2009	22:38	8/23/09 22:38	33.01	20.64	69.16	Power Failure on OmniGuard
8/23/2009	22:53	8/23/09 22:53				8/23/2009	22:53	8/23/09 22:53	32.93	20.45	68.81	Power Failure on OmniGuard
8/23/2009	23:08	8/23/09 23:08				8/23/2009	23:08	8/23/09 23:08	32.92	20.86	69.55	Power Failure on OmniGuard
8/23/2009	23:23	8/23/09 23:23				8/23/2009	23:23	8/23/09 23:23	32.99	20.53	68.96	Power Failure on OmniGuard
8/23/2009	23:38	8/23/09 23:38				8/23/2009	23:38	8/23/09 23:38	33.03	20.62	69.11	Power Failure on OmniGuard
8/23/2009	23:53	8/23/09 23:53				8/23/2009	23:53	8/23/09 23:53	33.08	20.92	69.66	Power Failure on OmniGuard
8/24/2009	0:08	8/24/09 0:08				8/24/2009	0:08	8/24/09 0:08	33.11	20.53	68.95	Power Failure on OmniGuard
8/24/2009	0:23	8/24/09 0:23				8/24/2009	0:23	8/24/09 0:23	33.04	20.57	69.02	Power Failure on OmniGuard
8/24/2009	0:38	8/24/09 0:38				8/24/2009	0:38	8/24/09 0:38	33.11	20.72	69.29	Power Failure on OmniGuard
8/24/2009	0:53	8/24/09 0:53				8/24/2009	0:53	8/24/09 0:53	33.13	20.47	68.84	Power Failure on OmniGuard
8/24/2009	1:08	8/24/09 1:08				8/24/2009	1:08	8/24/09 1:08	33.15	20.91	69.64	Power Failure on OmniGuard
8/24/2009	1:23	8/24/09 1:23				8/24/2009	1:23	8/24/09 1:23	33.21	20.63	69.13	Power Failure on OmniGuard
8/24/2009	1:38	8/24/09 1:38				8/24/2009	1:38	8/24/09 1:38	33.16	20.54	68.97	Power Failure on OmniGuard
8/24/2009	1:53	8/24/09 1:53				8/24/2009	1:53	8/24/09 1:53	33.18	20.94	69.69	Power Failure on OmniGuard
8/24/2009	2:08	8/24/09 2:08				8/24/2009	2:08	8/24/09 2:08	33.19	20.61	69.09	Power Failure on OmniGuard
8/24/2009	2:23	8/24/09 2:23				8/24/2009	2:23	8/24/09 2:23	33.05	20.65	69.17	Power Failure on OmniGuard
8/24/2009	2:38	8/24/09 2:38				8/24/2009	2:38	8/24/09 2:38	32.98	20.86	69.54	Power Failure on OmniGuard
8/24/2009	2:53	8/24/09 2:53				8/24/2009	2:53	8/24/09 2:53	32.96	20.52	68.93	Power Failure on OmniGuard

Table G-2
Phase I Pressure Difference Measurements [a]
St. Julien's Creek Annex Building 47

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
8/24/2009	3:08	8/24/09 3:08				8/24/2009	3:08	8/24/09 3:08	32.92	20.91	69.63	Power Failure on OmniGuard
8/24/2009	3:23	8/24/09 3:23				8/24/2009	3:23	8/24/09 3:23	33.03	20.72	69.30	Power Failure on OmniGuard
8/24/2009	3:38	8/24/09 3:38				8/24/2009	3:38	8/24/09 3:38	32.94	20.61	69.10	Power Failure on OmniGuard
8/24/2009	3:53	8/24/09 3:53				8/24/2009	3:53	8/24/09 3:53	32.99	20.98	69.77	Power Failure on OmniGuard
8/24/2009	4:08	8/24/09 4:08				8/24/2009	4:08	8/24/09 4:08	33.14	20.74	69.33	Power Failure on OmniGuard
8/24/2009	4:23	8/24/09 4:23				8/24/2009	4:23	8/24/09 4:23	33.07	20.67	69.21	Power Failure on OmniGuard
8/24/2009	4:38	8/24/09 4:38				8/24/2009	4:38	8/24/09 4:38	33.15	21.03	69.85	Power Failure on OmniGuard
8/24/2009	4:53	8/24/09 4:53				8/24/2009	4:53	8/24/09 4:53	33.21	20.58	69.05	Power Failure on OmniGuard
8/24/2009	5:08	8/24/09 5:08				8/24/2009	5:08	8/24/09 5:08	33.19	20.80	69.44	Power Failure on OmniGuard
8/24/2009	5:23	8/24/09 5:23				8/24/2009	5:23	8/24/09 5:23	33.22	21.08	69.95	Power Failure on OmniGuard
8/24/2009	5:38	8/24/09 5:38				8/24/2009	5:38	8/24/09 5:38	33.32	20.60	69.08	Power Failure on OmniGuard
8/24/2009	5:53	8/24/09 5:53				8/24/2009	5:53	8/24/09 5:53	33.38	20.79	69.43	Power Failure on OmniGuard
8/24/2009	6:08	8/24/09 6:08				8/24/2009	6:08	8/24/09 6:08	33.46	20.97	69.75	Power Failure on OmniGuard
8/24/2009	6:23	8/24/09 6:23				8/24/2009	6:23	8/24/09 6:23	33.56	20.62	69.11	Power Failure on OmniGuard
8/24/2009	6:38	8/24/09 6:38				8/24/2009	6:38	8/24/09 6:38	33.60	20.96	69.73	Power Failure on OmniGuard
8/24/2009	6:53	8/24/09 6:53				8/24/2009	6:53	8/24/09 6:53	33.65	20.86	69.55	Power Failure on OmniGuard
8/24/2009	7:08	8/24/09 7:08				8/24/2009	7:08	8/24/09 7:08	33.77	20.59	69.06	Power Failure on OmniGuard
8/24/2009	7:23	8/24/09 7:23				8/24/2009	7:23	8/24/09 7:23	33.73	20.38	68.69	Power Failure on OmniGuard
8/24/2009	7:38	8/24/09 7:38				8/24/2009	7:38	8/24/09 7:38	33.71	20.36	68.65	Power Failure on OmniGuard
8/24/2009	7:53	8/24/09 7:53				8/24/2009	7:53	8/24/09 7:53	33.62	20.44	68.78	Power Failure on OmniGuard
8/24/2009	8:08	8/24/09 8:08				8/24/2009	8:08	8/24/09 8:08	33.70	20.90	69.62	Power Failure on OmniGuard
8/24/2009	8:23	8/24/09 8:23				8/24/2009	8:23	8/24/09 8:23	33.73	20.82	69.48	Power Failure on OmniGuard
8/24/2009	8:38	8/24/09 8:38				8/24/2009	8:38	8/24/09 8:38	33.77	20.76	69.36	Power Failure on OmniGuard
8/24/2009	8:53	8/24/09 8:53				8/24/2009	8:53	8/24/09 8:53	33.78	21.08	69.95	Power Failure on OmniGuard
8/24/2009	9:08	8/24/09 9:08				8/24/2009	9:08	8/24/09 9:08	33.82	20.74	69.34	Power Failure on OmniGuard
8/24/2009	9:23	8/24/09 9:23				8/24/2009	9:23	8/24/09 9:23	33.85	21.01	69.81	Power Failure on OmniGuard
8/24/2009	9:38	8/24/09 9:38				8/24/2009	9:38	8/24/09 9:38	33.91	21.03	69.86	Power Failure on OmniGuard

Table G-2

Phase I Pressure Difference Measurements [a]

St. Julien's Creek Annex Building 47

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
8/24/2009	9:53	8/24/09 9:53				8/24/2009	9:53	8/24/09 9:53	33.89	20.75	69.36	Power Failure on OmniGuard
8/24/2009	10:08	8/24/09 10:08				8/24/2009	10:08	8/24/09 10:08	33.92	21.05	69.89	Power Failure on OmniGuard
8/24/2009	10:23	8/24/09 10:23				8/24/2009	10:23	8/24/09 10:23	33.94	20.89	69.60	Power Failure on OmniGuard
8/24/2009	10:38	8/24/09 10:38				8/24/2009	10:38	8/24/09 10:38	33.96	20.88	69.59	Power Failure on OmniGuard
8/24/2009	10:53	8/24/09 10:53				8/24/2009	10:53	8/24/09 10:53	34.07	21.13	70.03	Power Failure on OmniGuard
8/24/2009	11:08	8/24/09 11:08				8/24/2009	11:08	8/24/09 11:08	34.14	20.87	69.57	Power Failure on OmniGuard
8/24/2009	11:23	8/24/09 11:23				8/24/2009	11:23	8/24/09 11:23	34.16	20.76	69.38	Power Failure on OmniGuard
8/24/2009	11:38	8/24/09 11:38				8/24/2009	11:38	8/24/09 11:38	34.14	20.95	69.71	Power Failure on OmniGuard
8/24/2009	11:53	8/24/09 11:53				8/24/2009	11:53	8/24/09 11:53	34.18	20.75	69.34	Power Failure on OmniGuard
8/24/2009	12:08	8/24/09 12:08				8/24/2009	12:08	8/24/09 12:08	34.19	20.64	69.14	Power Failure on OmniGuard
8/24/2009	12:23	8/24/09 12:23				8/24/2009	12:23	8/24/09 12:23	34.20	20.53	68.95	Power Failure on OmniGuard
8/24/2009	12:38	8/24/09 12:38				8/24/2009	12:38	8/24/09 12:38	34.12	20.55	68.98	Power Failure on OmniGuard
8/24/2009	12:53	8/24/09 12:53				8/24/2009	12:53	8/24/09 12:53	34.10	20.59	69.06	Power Failure on OmniGuard
8/24/2009	13:08	8/24/09 13:08				8/24/2009	13:08	8/24/09 13:08	34.07	20.77	69.39	Power Failure on OmniGuard
8/24/2009	13:16	8/24/09 13:16	1.0	0.5	0.8	8/24/2009	13:23	8/24/09 13:23	34.03	20.74	69.33	
8/24/2009	13:21	8/24/09 13:21	1.5	-1.0	0.3	8/24/2009	13:38	8/24/09 13:38	34.05	20.75	69.36	
8/24/2009	13:26	8/24/09 13:26	0.5	-1.0	-0.3	8/24/2009	13:53	8/24/09 13:53	34.01	20.82	69.47	
8/24/2009	13:32	8/24/09 13:32	1.0	0.0	0.5	8/24/2009	14:08	8/24/09 14:08	34.04	20.96	69.73	
8/24/2009	13:47	8/24/09 13:47	1.5	0.0	0.8	8/24/2009	14:23	8/24/09 14:23	34.05	20.78	69.40	
8/24/2009	14:02	8/24/09 14:02	2.0	0.0	1.0	8/24/2009	14:38	8/24/09 14:38	34.10	21.02	69.83	
8/24/2009	14:17	8/24/09 14:17	2.5	0.5	1.5	8/24/2009	14:53	8/24/09 14:53	34.08	20.75	69.35	
8/24/2009	14:32	8/24/09 14:32	5.0	1.5	3.3	8/24/2009	15:08	8/24/09 15:08	33.97	21.09	69.97	
8/24/2009	14:47	8/24/09 14:47	3.0	1.0	2.0	8/24/2009	15:23	8/24/09 15:23	33.90	21.17	70.11	
8/24/2009	15:02	8/24/09 15:02	2.5	1.0	1.8	8/24/2009	15:38	8/24/09 15:38	33.93	21.05	69.89	
8/24/2009	15:17	8/24/09 15:17	2.5	0.5	1.5	8/24/2009	15:53	8/24/09 15:53	33.89	20.90	69.61	
8/24/2009	15:32	8/24/09 15:32	4.0	0.0	2.0	8/24/2009	16:08	8/24/09 16:08	33.90	20.84	69.50	
8/24/2009	15:47	8/24/09 15:47	6.0	0.5	3.3	8/24/2009	16:23	8/24/09 16:23	33.85	20.65	69.17	
8/24/2009	16:02	8/24/09 16:02	4.5	1.0	2.8	8/24/2009	16:38	8/24/09 16:38	33.86	20.71	69.27	
8/24/2009	16:17	8/24/09 16:17	5.5	0.5	3.0	8/24/2009	16:53	8/24/09 16:53	33.81	21.02	69.83	
8/24/2009	16:32	8/24/09 16:32	1.5	0.5	1.0	8/24/2009	17:08	8/24/09 17:08	33.92	20.77	69.39	
8/24/2009	16:47	8/24/09 16:47	2.0	0.0	1.0	8/24/2009	17:23	8/24/09 17:23	33.91	20.72	69.30	
8/24/2009	17:02	8/24/09 17:02	2.0	0.5	1.3	8/24/2009	17:38	8/24/09 17:38	33.96	21.07	69.93	
8/24/2009	17:17	8/24/09 17:17	1.5	0.5	1.0	8/24/2009	17:53	8/24/09 17:53	34.00	20.82	69.48	
8/24/2009	17:32	8/24/09 17:32	1.5	0.5	1.0	8/24/2009	18:08	8/24/09 18:08	33.99	20.74	69.33	
8/24/2009	17:47	8/24/09 17:47	3.0	0.5	1.8	8/24/2009	18:23	8/24/09 18:23	34.03	21.05	69.89	
8/24/2009	18:02	8/24/09 18:02	4.0	0.5	2.3	8/24/2009	18:38	8/24/09 18:38	34.13	20.80	69.43	
8/24/2009	18:17	8/24/09 18:17	3.5	1.0	2.3	8/24/2009	18:53	8/24/09 18:53	34.15	20.71	69.28	
8/24/2009	18:32	8/24/09 18:32	3.0	0.5	1.8	8/24/2009	19:08	8/24/09 19:08	34.17	21.08	69.95	
8/24/2009	18:47	8/24/09 18:47	1.5	0.5	1.0	8/24/2009	19:23	8/24/09 19:23	34.26	20.83	69.50	
8/24/2009	19:02	8/24/09 19:02	1.5	0.5	1.0	8/24/2009	19:38	8/24/09 19:38	34.37	20.73	69.31	

Table G-2

Phase I Pressure Difference Measurements [a]

St. Julien's Creek Annex Building 47

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
8/24/2009	19:17	8/24/09 19:17	1.0	0.5	0.8	8/24/2009	19:53	8/24/09 19:53	34.49	21.10	69.98	
8/24/2009	19:32	8/24/09 19:32	1.5	0.0	0.8	8/24/2009	20:08	8/24/09 20:08	34.62	20.82	69.48	
8/24/2009	19:47	8/24/09 19:47	1.0	0.0	0.5	8/24/2009	20:23	8/24/09 20:23	34.60	20.77	69.39	
8/24/2009	20:02	8/24/09 20:02	0.5	-0.5	0.0	8/24/2009	20:38	8/24/09 20:38	34.62	21.14	70.05	
8/24/2009	20:17	8/24/09 20:17	0.5	0.0	0.3	8/24/2009	20:53	8/24/09 20:53	34.56	20.88	69.59	
8/24/2009	20:32	8/24/09 20:32	0.5	0.0	0.3	8/24/2009	21:08	8/24/09 21:08	34.58	20.85	69.52	
8/24/2009	20:47	8/24/09 20:47	0.5	0.0	0.3	8/24/2009	21:23	8/24/09 21:23	34.63	21.15	70.07	
8/24/2009	21:02	8/24/09 21:02	0.5	0.0	0.3	8/24/2009	21:38	8/24/09 21:38	34.60	20.82	69.47	
8/24/2009	21:17	8/24/09 21:17	0.5	0.0	0.3	8/24/2009	21:53	8/24/09 21:53	34.59	20.88	69.58	
8/24/2009	21:32	8/24/09 21:32	0.5	0.0	0.3	8/24/2009	22:08	8/24/09 22:08	34.59	21.17	70.10	
8/24/2009	21:47	8/24/09 21:47	0.5	0.0	0.3	8/24/2009	22:23	8/24/09 22:23	34.62	20.84	69.51	
8/24/2009	22:02	8/24/09 22:02	0.0	0.0	0.0	8/24/2009	22:38	8/24/09 22:38	34.57	20.97	69.74	
8/24/2009	22:17	8/24/09 22:17	0.5	0.0	0.3	8/24/2009	22:53	8/24/09 22:53	34.63	21.21	70.18	
8/24/2009	22:32	8/24/09 22:32	0.5	0.0	0.3	8/24/2009	23:08	8/24/09 23:08	34.62	20.84	69.52	
8/24/2009	22:47	8/24/09 22:47	0.0	0.0	0.0	8/24/2009	23:23	8/24/09 23:23	34.60	20.93	69.67	
8/24/2009	23:02	8/24/09 23:02	0.0	0.0	0.0	8/24/2009	23:38	8/24/09 23:38	34.63	21.17	70.10	
8/24/2009	23:17	8/24/09 23:17	0.5	0.0	0.3	8/24/2009	23:53	8/24/09 23:53	34.67	20.82	69.47	
8/24/2009	23:32	8/24/09 23:32	0.5	0.0	0.3	8/25/2009	0:08	8/25/09 0:08	34.63	21.05	69.88	
8/24/2009	23:47	8/24/09 23:47	0.0	0.0	0.0	8/25/2009	0:23	8/25/09 0:23	34.69	21.27	70.29	
8/25/2009	0:02	8/25/09 0:02	0.0	0.0	0.0	8/25/2009	0:38	8/25/09 0:38	34.72	20.88	69.58	
8/25/2009	0:17	8/25/09 0:17	0.0	0.0	0.0	8/25/2009	0:53	8/25/09 0:53	34.71	20.98	69.76	
8/25/2009	0:32	8/25/09 0:32	0.0	0.0	0.0	8/25/2009	1:08	8/25/09 1:08	34.73	21.23	70.21	
8/25/2009	0:47	8/25/09 0:47	0.0	0.0	0.0	8/25/2009	1:23	8/25/09 1:23	34.77	20.84	69.52	
8/25/2009	1:02	8/25/09 1:02	0.0	0.0	0.0	8/25/2009	1:38	8/25/09 1:38	34.73	21.05	69.89	
8/25/2009	1:17	8/25/09 1:17	0.0	0.0	0.0	8/25/2009	1:53	8/25/09 1:53	34.79	21.33	70.39	
8/25/2009	1:32	8/25/09 1:32	0.0	0.0	0.0	8/25/2009	2:08	8/25/09 2:08	34.83	20.95	69.70	
8/25/2009	1:47	8/25/09 1:47	0.0	0.0	0.0	8/25/2009	2:23	8/25/09 2:23	34.80	21.01	69.82	
8/25/2009	2:02	8/25/09 2:02	0.0	0.0	0.0	8/25/2009	2:38	8/25/09 2:38	34.86	21.32	70.37	
8/25/2009	2:17	8/25/09 2:17	0.5	0.0	0.3	8/25/2009	2:53	8/25/09 2:53	34.88	21.06	69.91	
8/25/2009	2:32	8/25/09 2:32	0.0	0.0	0.0	8/25/2009	3:08	8/25/09 3:08	34.88	20.94	69.69	
8/25/2009	2:47	8/25/09 2:47	0.0	0.0	0.0	8/25/2009	3:23	8/25/09 3:23	34.89	21.22	70.19	
8/25/2009	3:02	8/25/09 3:02	0.0	0.0	0.0	8/25/2009	3:38	8/25/09 3:38	34.90	21.19	70.15	
8/25/2009	3:17	8/25/09 3:17	0.0	0.0	0.0	8/25/2009	3:53	8/25/09 3:53	34.91	20.87	69.57	
8/25/2009	3:32	8/25/09 3:32	0.0	0.0	0.0	8/25/2009	4:08	8/25/09 4:08	34.88	21.11	69.99	
8/25/2009	3:47	8/25/09 3:47	0.0	0.0	0.0	8/25/2009	4:23	8/25/09 4:23	34.89	21.26	70.27	
8/25/2009	4:02	8/25/09 4:02	0.0	0.0	0.0	8/25/2009	4:38	8/25/09 4:38	34.92	20.88	69.59	
8/25/2009	4:17	8/25/09 4:17	0.0	0.0	0.0	8/25/2009	4:53	8/25/09 4:53	34.91	21.12	70.01	
8/25/2009	4:32	8/25/09 4:32	0.5	0.0	0.3	8/25/2009	5:08	8/25/09 5:08	34.94	21.39	70.51	
8/25/2009	4:47	8/25/09 4:47	0.5	0.0	0.3	8/25/2009	5:23	8/25/09 5:23	34.99	21.03	69.85	
8/25/2009	5:02	8/25/09 5:02	0.0	0.0	0.0	8/25/2009	5:38	8/25/09 5:38	34.92	21.01	69.82	
8/25/2009	5:17	8/25/09 5:17	0.0	0.0	0.0	8/25/2009	5:53	8/25/09 5:53	34.88	21.29	70.31	
8/25/2009	5:32	8/25/09 5:32	0.0	0.0	0.0	8/25/2009	6:08	8/25/09 6:08	34.94	21.27	70.29	
8/25/2009	5:47	8/25/09 5:47	0.0	0.0	0.0	8/25/2009	6:23	8/25/09 6:23	34.93	20.92	69.66	
8/25/2009	6:02	8/25/09 6:02	0.0	0.0	0.0	8/25/2009	6:38	8/25/09 6:38	34.95	21.14	70.05	
8/25/2009	6:17	8/25/09 6:17	0.0	0.0	0.0	8/25/2009	6:53	8/25/09 6:53	34.97	21.06	69.90	
8/25/2009	6:32	8/25/09 6:32	0.0	0.0	0.0	8/25/2009	7:08	8/25/09 7:08	34.99	20.78	69.40	
8/25/2009	6:47	8/25/09 6:47	0.5	-0.5	0.0	8/25/2009	7:23	8/25/09 7:23	35.07	20.67	69.21	
8/25/2009	7:02	8/25/09 7:02	0.5	0.0	0.3	8/25/2009	7:38	8/25/09 7:38	35.13	20.43	68.77	
8/25/2009	7:17	8/25/09 7:17	0.5	0.0	0.3	8/25/2009	7:53	8/25/09 7:53	35.15	20.83	69.50	
8/25/2009	7:32	8/25/09 7:32	1.0	0.0	0.5	8/25/2009	8:08	8/25/09 8:08	35.25	20.66	69.18	
8/25/2009	7:47	8/25/09 7:47	1.0	0.0	0.5	8/25/2009	8:23	8/25/09 8:23	35.29	20.65	69.16	
8/25/2009	8:02	8/25/09 8:02	2.0	0.0	1.0	8/25/2009	8:38	8/25/09 8:38	35.35	21.08	69.94	
8/25/2009	8:17	8/25/09 8:17	2.5	0.5	1.5	8/25/2009	8:53	8/25/09 8:53	35.49	20.78	69.40	
8/25/2009	8:32	8/25/09 8:32	3.5	0.5	2.0	8/25/2009	9:08	8/25/09 9:08	35.57	20.60	69.07	

Table G-2

Phase I Pressure Difference Measurements [a]

St. Julien's Creek Annex Building 47

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
8/25/2009	8:47	8/25/09 8:47	3.5	1.0	2.3	8/25/2009	9:23	8/25/09 9:23	35.56	21.01	69.81	
8/25/2009	9:02	8/25/09 9:02	4.0	1.0	2.5	8/25/2009	9:38	8/25/09 9:38	35.61	20.75	69.34	
8/25/2009	9:17	8/25/09 9:17	4.0	1.0	2.5	8/25/2009	9:53	8/25/09 9:53	35.62	20.41	68.74	
8/25/2009	9:32	8/25/09 9:32	5.0	0.5	2.8	8/25/2009	10:08	8/25/09 10:08	35.65	20.16	68.30	
8/25/2009	9:47	8/25/09 9:47	6.0	1.0	3.5	8/25/2009	10:23	8/25/09 10:23	35.72	20.01	68.01	
8/25/2009	10:02	8/25/09 10:02	4.5	1.5	3.0	8/25/2009	10:38	8/25/09 10:38	35.73	19.98	67.96	
8/25/2009	10:17	8/25/09 10:17	5.0	1.0	3.0	8/25/2009	10:53	8/25/09 10:53	35.76	20.47	68.85	
8/25/2009	10:32	8/25/09 10:32	5.5	1.0	3.3	8/25/2009	11:08	8/25/09 11:08	35.74	20.36	68.64	
8/25/2009	10:47	8/25/09 10:47	6.5	1.5	4.0	8/25/2009	11:23	8/25/09 11:23	35.71	20.22	68.40	
8/25/2009	11:02	8/25/09 11:02	5.0	1.0	3.0	8/25/2009	11:38	8/25/09 11:38	35.55	20.37	68.67	
8/25/2009	11:17	8/25/09 11:17	7.5	1.0	4.3	8/25/2009	11:53	8/25/09 11:53	35.53	20.47	68.84	
8/25/2009	11:32	8/25/09 11:32	6.0	0.5	3.3	8/25/2009	12:08	8/25/09 12:08	35.47	20.24	68.42	
8/25/2009	11:47	8/25/09 11:47	6.0	0.5	3.3	8/25/2009	12:23	8/25/09 12:23	35.44	20.76	69.36	
8/25/2009	12:02	8/25/09 12:02	5.5	1.0	3.3	8/25/2009	12:38	8/25/09 12:38	35.51	20.52	68.93	
8/25/2009	12:17	8/25/09 12:17	4.5	0.5	2.5	8/25/2009	12:53	8/25/09 12:53	35.49	20.23	68.42	
8/25/2009	12:32	8/25/09 12:32	6.0	0.5	3.3	8/25/2009	13:08	8/25/09 13:08	35.40	20.69	69.24	
8/25/2009	12:47	8/25/09 12:47	7.5	1.0	4.3	8/25/2009	13:23	8/25/09 13:23	35.42	20.69	69.24	
8/25/2009	13:02	8/25/09 13:02	5.5	1.0	3.3	8/25/2009	13:38	8/25/09 13:38	35.43	20.32	68.57	
8/25/2009	13:17	8/25/09 13:17	4.5	0.0	2.3	8/25/2009	13:53	8/25/09 13:53	35.31	20.79	69.43	
8/25/2009	13:32	8/25/09 13:32	6.0	0.5	3.3	8/25/2009	14:08	8/25/09 14:08	35.31	20.56	69.00	
8/25/2009	13:47	8/25/09 13:47	5.5	1.5	3.5	8/25/2009	14:23	8/25/09 14:23	35.28	20.40	68.72	
8/25/2009	14:02	8/25/09 14:02	5.5	0.0	2.8	8/25/2009	14:38	8/25/09 14:38	35.22	20.31	68.56	
8/25/2009	14:17	8/25/09 14:17	5.5	1.0	3.3	8/25/2009	14:53	8/25/09 14:53	35.14	20.31	68.55	
8/25/2009	14:32	8/25/09 14:32	5.0	0.5	2.8	8/25/2009	15:08	8/25/09 15:08	35.11	20.22	68.40	
8/25/2009	14:47	8/25/09 14:47	5.0	0.0	2.5	8/25/2009	15:23	8/25/09 15:23	35.02	20.22	68.39	
8/25/2009	15:02	8/25/09 15:02	7.0	0.0	3.5	8/25/2009	15:38	8/25/09 15:38	35.00	20.29	68.52	
8/25/2009	15:17	8/25/09 15:17	4.5	1.0	2.8	8/25/2009	15:53	8/25/09 15:53	34.93	20.29	68.51	
8/25/2009	15:32	8/25/09 15:32	3.5	0.5	2.0	8/25/2009	16:08	8/25/09 16:08	34.94	20.10	68.18	
8/25/2009	15:47	8/25/09 15:47	5.5	1.0	3.3	8/25/2009	16:23	8/25/09 16:23	34.82	20.59	69.07	
8/25/2009	16:02	8/25/09 16:02	4.0	0.5	2.3	8/25/2009	16:38	8/25/09 16:38	34.89	20.58	69.04	
8/25/2009	16:17	8/25/09 16:17	1.5	0.5	1.0	8/25/2009	16:53	8/25/09 16:53	34.91	20.29	68.52	
8/25/2009	16:32	8/25/09 16:32	1.5	0.5	1.0	8/25/2009	17:08	8/25/09 17:08	34.87	20.68	69.23	
8/25/2009	16:47	8/25/09 16:47	1.5	0.5	1.0	8/25/2009	17:23	8/25/09 17:23	34.95	20.63	69.14	
8/25/2009	17:02	8/25/09 17:02	1.5	0.0	0.8	8/25/2009	17:38	8/25/09 17:38	34.93	20.35	68.62	
8/25/2009	17:17	8/25/09 17:17	0.5	-0.5	0.0	8/25/2009	17:53	8/25/09 17:53	34.81	20.49	68.87	
8/25/2009	17:32	8/25/09 17:32	0.0	-1.0	-0.5	8/25/2009	18:08	8/25/09 18:08	34.87	20.74	69.33	
8/25/2009	17:47	8/25/09 17:47	0.5	0.0	0.3	8/25/2009	18:23	8/25/09 18:23	34.86	20.40	68.73	
8/25/2009	18:02	8/25/09 18:02	0.5	0.0	0.3	8/25/2009	18:38	8/25/09 18:38	34.77	20.57	69.03	
8/25/2009	18:17	8/25/09 18:17	0.5	0.0	0.3	8/25/2009	18:53	8/25/09 18:53	34.76	20.78	69.40	
8/25/2009	18:32	8/25/09 18:32	0.5	0.0	0.3	8/25/2009	19:08	8/25/09 19:08	34.79	20.46	68.82	
8/25/2009	18:47	8/25/09 18:47	0.5	0.0	0.3	8/25/2009	19:23	8/25/09 19:23	34.76	20.52	68.93	
8/25/2009	19:02	8/25/09 19:02	1.0	0.0	0.5	8/25/2009	19:38	8/25/09 19:38	34.81	20.79	69.43	
8/25/2009	19:17	8/25/09 19:17	0.5	0.0	0.3	8/25/2009	19:53	8/25/09 19:53	34.84	20.44	68.78	
8/25/2009	19:32	8/25/09 19:32	0.5	0.0	0.3	8/25/2009	20:08	8/25/09 20:08	34.86	20.67	69.21	
8/25/2009	19:47	8/25/09 19:47	0.5	0.0	0.3	8/25/2009	20:23	8/25/09 20:23	34.92	20.85	69.53	
8/25/2009	20:02	8/25/09 20:02	1.0	0.0	0.5	8/25/2009	20:38	8/25/09 20:38	35.06	20.49	68.89	
8/25/2009	20:17	8/25/09 20:17	1.0	0.0	0.5	8/25/2009	20:53	8/25/09 20:53	35.04	20.63	69.13	
8/25/2009	20:32	8/25/09 20:32	1.0	0.0	0.5	8/25/2009	21:08	8/25/09 21:08	35.06	20.84	69.51	
8/25/2009	20:47	8/25/09 20:47	1.0	0.0	0.5	8/25/2009	21:23	8/25/09 21:23	35.09	20.45	68.82	
8/25/2009	21:02	8/25/09 21:02	0.5	0.0	0.3	8/25/2009	21:38	8/25/09 21:38	35.03	20.62	69.11	
8/25/2009	21:17	8/25/09 21:17	0.5	0.0	0.3	8/25/2009	21:53	8/25/09 21:53	35.07	21.00	69.80	
8/25/2009	21:32	8/25/09 21:32	0.5	0.0	0.3	8/25/2009	22:08	8/25/09 22:08	35.11	20.60	69.08	
8/25/2009	21:47	8/25/09 21:47	0.5	0.0	0.3	8/25/2009	22:23	8/25/09 22:23	35.09	20.63	69.13	
8/25/2009	22:02	8/25/09 22:02	0.5	0.0	0.3	8/25/2009	22:38	8/25/09 22:38	35.17	21.01	69.81	

Table G-2

Phase I Pressure Difference Measurements [a]

St. Julien's Creek Annex Building 47

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
8/25/2009	22:17	8/25/09 22:17	0.5	0.0	0.3	8/25/2009	22:53	8/25/09 22:53	35.16	20.57	69.02	
8/25/2009	22:32	8/25/09 22:32	0.5	0.0	0.3	8/25/2009	23:08	8/25/09 23:08	35.08	20.61	69.11	
8/25/2009	22:47	8/25/09 22:47	0.5	0.0	0.3	8/25/2009	23:23	8/25/09 23:23	35.07	21.02	69.83	
8/25/2009	23:02	8/25/09 23:02	0.5	0.0	0.3	8/25/2009	23:38	8/25/09 23:38	35.12	20.62	69.12	
8/25/2009	23:17	8/25/09 23:17	0.5	0.0	0.3	8/25/2009	23:53	8/25/09 23:53	35.13	20.62	69.12	
8/25/2009	23:32	8/25/09 23:32	0.5	0.0	0.3	8/26/2009	0:08	8/26/09 0:08	35.08	21.05	69.89	
8/25/2009	23:47	8/25/09 23:47	0.5	0.0	0.3	8/26/2009	0:23	8/26/09 0:23	35.10	20.69	69.25	
8/26/2009	0:02	8/26/09 0:02	0.5	0.0	0.3	8/26/2009	0:38	8/26/09 0:38	35.06	20.54	68.97	
8/26/2009	0:17	8/26/09 0:17	0.5	0.0	0.3	8/26/2009	0:53	8/26/09 0:53	35.04	20.95	69.71	
8/26/2009	0:32	8/26/09 0:32	0.5	0.0	0.3	8/26/2009	1:08	8/26/09 1:08	35.05	20.70	69.27	
8/26/2009	0:47	8/26/09 0:47	0.5	0.0	0.3	8/26/2009	1:23	8/26/09 1:23	35.00	20.60	69.08	
8/26/2009	1:02	8/26/09 1:02	0.5	0.0	0.3	8/26/2009	1:38	8/26/09 1:38	34.94	21.00	69.80	
8/26/2009	1:17	8/26/09 1:17	0.5	0.0	0.3	8/26/2009	1:53	8/26/09 1:53	34.99	20.89	69.59	
8/26/2009	1:32	8/26/09 1:32	0.5	0.0	0.3	8/26/2009	2:08	8/26/09 2:08	34.95	20.53	68.96	
8/26/2009	1:47	8/26/09 1:47	0.5	0.0	0.3	8/26/2009	2:23	8/26/09 2:23	34.92	20.91	69.64	
8/26/2009	2:02	8/26/09 2:02	0.5	0.0	0.3	8/26/2009	2:38	8/26/09 2:38	34.93	20.96	69.72	
8/26/2009	2:17	8/26/09 2:17	0.5	0.0	0.3	8/26/2009	2:53	8/26/09 2:53	34.93	20.50	68.89	
8/26/2009	2:32	8/26/09 2:32	0.5	0.0	0.3	8/26/2009	3:08	8/26/09 3:08	34.87	20.65	69.17	
8/26/2009	2:47	8/26/09 2:47	0.5	0.0	0.3	8/26/2009	3:23	8/26/09 3:23	34.88	21.07	69.92	
8/26/2009	3:02	8/26/09 3:02	0.5	0.0	0.3	8/26/2009	3:38	8/26/09 3:38	34.89	20.63	69.13	
8/26/2009	3:17	8/26/09 3:17	0.5	0.0	0.3	8/26/2009	3:53	8/26/09 3:53	34.87	20.65	69.17	
8/26/2009	3:32	8/26/09 3:32	0.5	0.0	0.3	8/26/2009	4:08	8/26/09 4:08	34.84	21.04	69.86	
8/26/2009	3:47	8/26/09 3:47	0.5	0.0	0.3	8/26/2009	4:23	8/26/09 4:23	34.89	20.71	69.28	
8/26/2009	4:02	8/26/09 4:02	0.5	0.0	0.3	8/26/2009	4:38	8/26/09 4:38	34.90	20.69	69.23	
8/26/2009	4:17	8/26/09 4:17	0.5	0.0	0.3	8/26/2009	4:53	8/26/09 4:53	34.88	21.07	69.92	
8/26/2009	4:32	8/26/09 4:32	0.5	0.0	0.3	8/26/2009	5:08	8/26/09 5:08	34.92	20.84	69.50	
8/26/2009	4:47	8/26/09 4:47	0.5	0.0	0.3	8/26/2009	5:23	8/26/09 5:23	34.88	20.60	69.08	
8/26/2009	5:02	8/26/09 5:02	0.5	0.0	0.3	8/26/2009	5:38	8/26/09 5:38	34.88	20.95	69.72	
8/26/2009	5:17	8/26/09 5:17	0.5	0.0	0.3	8/26/2009	5:53	8/26/09 5:53	34.98	20.91	69.63	
8/26/2009	5:32	8/26/09 5:32	0.5	0.0	0.3	8/26/2009	6:08	8/26/09 6:08	35.02	20.59	69.07	
8/26/2009	5:47	8/26/09 5:47	0.0	0.0	0.0	8/26/2009	6:23	8/26/09 6:23	35.08	20.94	69.68	
8/26/2009	6:02	8/26/09 6:02	0.5	0.0	0.3	8/26/2009	6:38	8/26/09 6:38	35.16	20.97	69.75	
8/26/2009	6:17	8/26/09 6:17	0.5	0.0	0.3	8/26/2009	6:53	8/26/09 6:53	35.19	20.68	69.23	
8/26/2009	6:32	8/26/09 6:32	0.5	-0.5	0.0	8/26/2009	7:08	8/26/09 7:08	35.21	20.54	68.96	
8/26/2009	6:47	8/26/09 6:47	1.0	0.0	0.5	8/26/2009	7:23	8/26/09 7:23	35.18	20.35	68.62	
8/26/2009	7:02	8/26/09 7:02	1.0	0.0	0.5	8/26/2009	7:38	8/26/09 7:38	35.15	20.79	69.42	
8/26/2009	7:17	8/26/09 7:17	0.5	-0.5	0.0	8/26/2009	7:53	8/26/09 7:53	35.22	20.76	69.37	
8/26/2009	7:32	8/26/09 7:32	0.5	-0.5	0.0	8/26/2009	8:08	8/26/09 8:08	35.22	20.78	69.41	
8/26/2009	7:47	8/26/09 7:47	0.5	-0.5	0.0	8/26/2009	8:23	8/26/09 8:23	35.24	21.09	69.96	
8/26/2009	8:02	8/26/09 8:02	0.5	-1.5	-0.5	8/26/2009	8:38	8/26/09 8:38	35.25	20.74	69.33	
8/26/2009	8:17	8/26/09 8:17	0.5	-1.5	-0.5	8/26/2009	8:53	8/26/09 8:53	35.18	21.03	69.85	
8/26/2009	8:32	8/26/09 8:32	0.5	-1.0	-0.3	8/26/2009	9:08	8/26/09 9:08	35.20	20.98	69.76	
8/26/2009	8:47	8/26/09 8:47	0.5	-1.5	-0.5	8/26/2009	9:23	8/26/09 9:23	35.21	20.74	69.32	
8/26/2009	9:02	8/26/09 9:02	0.5	-1.5	-0.5	8/26/2009	9:38	8/26/09 9:38	35.20	21.12	70.01	
8/26/2009	9:17	8/26/09 9:17	0.5	-2.0	-0.8	8/26/2009	9:53	8/26/09 9:53	35.27	20.85	69.53	
8/26/2009	9:32	8/26/09 9:32	0.5	-1.5	-0.5	8/26/2009	10:08	8/26/09 10:08	35.24	20.72	69.29	
8/26/2009	9:47	8/26/09 9:47	1.0	-2.0	-0.5	8/26/2009	10:23	8/26/09 10:23	35.23	21.08	69.94	
8/26/2009	10:02	8/26/09 10:02	0.5	-2.0	-0.8	8/26/2009	10:38	8/26/09 10:38	35.23	20.84	69.51	
8/26/2009	10:17	8/26/09 10:17	0.5	-2.0	-0.8	8/26/2009	10:53	8/26/09 10:53	35.19	20.59	69.06	
8/26/2009	10:32	8/26/09 10:32	1.0	-1.5	-0.3	8/26/2009	11:08	8/26/09 11:08	35.14	20.39	68.69	
8/26/2009	10:47	8/26/09 10:47	1.0	-2.0	-0.5	8/26/2009	11:23	8/26/09 11:23	35.13	20.26	68.46	
8/26/2009	11:02	8/26/09 11:02	1.0	-2.0	-0.5	8/26/2009	11:38	8/26/09 11:38	35.06	20.22	68.39	
8/26/2009	11:17	8/26/09 11:17	1.5	-3.0	-0.8	8/26/2009	11:53	8/26/09 11:53	34.95	20.17	68.30	
8/26/2009	11:32	8/26/09 11:32	1.5	-3.0	-0.8	8/26/2009	12:08	8/26/09 12:08	34.88	20.14	68.25	

Table G-2

Phase I Pressure Difference Measurements [a]

St. Julien's Creek Annex Building 47

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
8/26/2009	11:47	8/26/09 11:47	1.0	-3.0	-1.0	8/26/2009	12:23	8/26/09 12:23	34.79	20.10	68.19	
8/26/2009	12:02	8/26/09 12:02	1.0	-5.0	-2.0	8/26/2009	12:38	8/26/09 12:38	34.76	20.07	68.13	
8/26/2009	12:17	8/26/09 12:17	1.0	-3.5	-1.3	8/26/2009	12:53	8/26/09 12:53	34.70	20.07	68.13	
8/26/2009	12:32	8/26/09 12:32	1.5	-1.0	0.3	8/26/2009	13:08	8/26/09 13:08	34.65	20.05	68.08	
8/26/2009	12:47	8/26/09 12:47	1.5	-2.0	-0.3	8/26/2009	13:23	8/26/09 13:23	34.58	19.98	67.96	
8/26/2009	13:02	8/26/09 13:02	1.0	-2.5	-0.8	8/26/2009	13:38	8/26/09 13:38	34.51	20.52	68.94	
8/26/2009	13:17	8/26/09 13:17	1.5	-3.5	-1.0	8/26/2009	13:53	8/26/09 13:53	34.51	20.50	68.90	
8/26/2009	13:32	8/26/09 13:32	1.5	-2.0	-0.3	8/26/2009	14:08	8/26/09 14:08	34.44	20.47	68.85	
8/26/2009	13:47	8/26/09 13:47	1.5	-2.5	-0.5	8/26/2009	14:23	8/26/09 14:23	34.42	20.50	68.90	
8/26/2009	14:02	8/26/09 14:02	2.0	-3.0	-0.5	8/26/2009	14:38	8/26/09 14:38	34.34	20.46	68.83	
8/26/2009	14:17	8/26/09 14:17	1.0	-2.5	-0.8	8/26/2009	14:53	8/26/09 14:53	34.27	20.34	68.61	
8/26/2009	14:32	8/26/09 14:32	1.0	-2.0	-0.5	8/26/2009	15:08	8/26/09 15:08	34.22	20.33	68.60	
8/26/2009	14:47	8/26/09 14:47	1.0	-2.0	-0.5	8/26/2009	15:23	8/26/09 15:23	34.18	20.46	68.83	
8/26/2009	15:02	8/26/09 15:02	1.5	-2.5	-0.5	8/26/2009	15:38	8/26/09 15:38	34.12	20.54	68.97	
8/26/2009	15:17	8/26/09 15:17	1.5	-1.5	0.0	8/26/2009	15:53	8/26/09 15:53	34.04	20.74	69.33	
8/26/2009	15:32	8/26/09 15:32	2.0	-0.5	0.8	8/26/2009	16:08	8/26/09 16:08	33.98	20.94	69.69	
8/26/2009	15:47	8/26/09 15:47	1.0	-1.0	0.0	8/26/2009	16:23	8/26/09 16:23	33.95	21.01	69.82	
8/26/2009	16:02	8/26/09 16:02	1.0	-0.5	0.3	8/26/2009	16:38	8/26/09 16:38	33.92	20.87	69.56	
8/26/2009	16:17	8/26/09 16:17	1.0	-2.0	-0.5	8/26/2009	16:53	8/26/09 16:53	33.90	20.67	69.20	
8/26/2009	16:32	8/26/09 16:32	1.0	-2.0	-0.5	8/26/2009	17:08	8/26/09 17:08	33.93	20.48	68.86	
8/26/2009	16:47	8/26/09 16:47	1.0	-1.5	-0.3	8/26/2009	17:23	8/26/09 17:23	33.93	20.34	68.60	
8/26/2009	17:02	8/26/09 17:02	2.0	-1.0	0.5	8/26/2009	17:38	8/26/09 17:38	33.93	20.19	68.35	
8/26/2009	17:17	8/26/09 17:17	1.0	-0.5	0.3	8/26/2009	17:53	8/26/09 17:53	33.94	20.09	68.16	
8/26/2009	17:32	8/26/09 17:32	1.5	-1.0	0.3	8/26/2009	18:08	8/26/09 18:08	33.97	19.99	67.99	
8/26/2009	17:47	8/26/09 17:47	1.0	-0.5	0.3	8/26/2009	18:23	8/26/09 18:23	33.96	20.52	68.94	
8/26/2009	18:02	8/26/09 18:02	1.5	0.0	0.8	8/26/2009	18:38	8/26/09 18:38	33.97	20.45	68.81	
8/26/2009	18:17	8/26/09 18:17	1.0	-1.5	-0.3	8/26/2009	18:53	8/26/09 18:53	33.93	20.31	68.55	
8/26/2009	18:32	8/26/09 18:32	1.0	-1.0	0.0	8/26/2009	19:08	8/26/09 19:08	33.91	20.18	68.32	
8/26/2009	18:47	8/26/09 18:47	1.0	0.0	0.5	8/26/2009	19:23	8/26/09 19:23	33.93	20.04	68.07	
8/26/2009	19:02	8/26/09 19:02	1.0	0.0	0.5	8/26/2009	19:38	8/26/09 19:38	33.97	20.12	68.21	
8/26/2009	19:17	8/26/09 19:17	1.0	0.5	0.8	8/26/2009	19:53	8/26/09 19:53	33.96	20.55	68.99	
8/26/2009	19:32	8/26/09 19:32	1.0	0.5	0.8	8/26/2009	20:08	8/26/09 20:08	34.07	20.33	68.60	
8/26/2009	19:47	8/26/09 19:47	1.0	0.5	0.8	8/26/2009	20:23	8/26/09 20:23	34.14	20.15	68.26	
8/26/2009	20:02	8/26/09 20:02	1.0	0.5	0.8	8/26/2009	20:38	8/26/09 20:38	34.16	20.42	68.76	
8/26/2009	20:17	8/26/09 20:17	1.0	0.5	0.8	8/26/2009	20:53	8/26/09 20:53	34.32	20.62	69.11	
8/26/2009	20:32	8/26/09 20:32	1.0	0.5	0.8	8/26/2009	21:08	8/26/09 21:08	34.39	20.36	68.65	
8/26/2009	20:47	8/26/09 20:47	1.0	0.0	0.5	8/26/2009	21:23	8/26/09 21:23	34.43	20.34	68.60	
8/26/2009	21:02	8/26/09 21:02	1.0	0.5	0.8	8/26/2009	21:38	8/26/09 21:38	34.49	20.68	69.22	
8/26/2009	21:17	8/26/09 21:17	1.0	0.5	0.8	8/26/2009	21:53	8/26/09 21:53	34.54	20.38	68.68	
8/26/2009	21:32	8/26/09 21:32	0.5	0.0	0.3	8/26/2009	22:08	8/26/09 22:08	34.49	20.41	68.74	
8/26/2009	21:47	8/26/09 21:47	1.0	0.5	0.8	8/26/2009	22:23	8/26/09 22:23	34.47	20.76	69.36	
8/26/2009	22:02	8/26/09 22:02	0.5	0.0	0.3	8/26/2009	22:38	8/26/09 22:38	34.47	20.43	68.77	
8/26/2009	22:17	8/26/09 22:17	0.5	0.0	0.3	8/26/2009	22:53	8/26/09 22:53	34.43	20.30	68.55	
8/26/2009	22:32	8/26/09 22:32	0.5	0.0	0.3	8/26/2009	23:08	8/26/09 23:08	34.41	20.83	69.50	
8/26/2009	22:47	8/26/09 22:47	1.0	0.0	0.5	8/26/2009	23:23	8/26/09 23:23	34.45	20.60	69.08	
8/26/2009	23:02	8/26/09 23:02	0.5	0.0	0.3	8/26/2009	23:38	8/26/09 23:38	34.45	20.39	68.70	
8/26/2009	23:17	8/26/09 23:17	1.0	0.0	0.5	8/26/2009	23:53	8/26/09 23:53	34.44	20.80	69.45	
8/26/2009	23:32	8/26/09 23:32	1.0	0.0	0.5	8/27/2009	0:08	8/27/09 0:08	34.44	20.49	68.88	
8/26/2009	23:47	8/26/09 23:47	1.0	0.0	0.5	8/27/2009	0:23	8/27/09 0:23	34.45	20.42	68.75	
8/27/2009	0:02	8/27/09 0:02	1.0	0.0	0.5	8/27/2009	0:38	8/27/09 0:38	34.45	20.86	69.55	
8/27/2009	0:17	8/27/09 0:17	1.0	0.0	0.5	8/27/2009	0:53	8/27/09 0:53	34.43	20.53	68.96	
8/27/2009	0:32	8/27/09 0:32	1.0	0.0	0.5	8/27/2009	1:08	8/27/09 1:08	34.40	20.52	68.93	
8/27/2009	0:47	8/27/09 0:47	0.5	0.0	0.3	8/27/2009	1:23	8/27/09 1:23	34.35	20.89	69.59	
8/27/2009	1:02	8/27/09 1:02	1.0	0.0	0.5	8/27/2009	1:38	8/27/09 1:38	34.32	20.52	68.93	

Table G-2

Phase I Pressure Difference Measurements [a]

St. Julien's Creek Annex Building 47

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
8/27/2009	1:17	8/27/09 1:17	1.0	0.0	0.5	8/27/2009	1:53	8/27/09 1:53	34.19	20.62	69.11	
8/27/2009	1:32	8/27/09 1:32	0.5	0.0	0.3	8/27/2009	2:08	8/27/09 2:08	34.21	20.81	69.46	
8/27/2009	1:47	8/27/09 1:47	0.5	0.0	0.3	8/27/2009	2:23	8/27/09 2:23	34.21	20.42	68.75	
8/27/2009	2:02	8/27/09 2:02	0.5	0.5	0.5	8/27/2009	2:38	8/27/09 2:38	34.22	20.76	69.38	
8/27/2009	2:17	8/27/09 2:17	1.0	0.0	0.5	8/27/2009	2:53	8/27/09 2:53	34.25	20.69	69.24	
8/27/2009	2:32	8/27/09 2:32	1.0	0.0	0.5	8/27/2009	3:08	8/27/09 3:08	34.23	20.49	68.88	
8/27/2009	2:47	8/27/09 2:47	0.5	0.0	0.3	8/27/2009	3:23	8/27/09 3:23	34.19	20.92	69.66	
8/27/2009	3:02	8/27/09 3:02	0.5	0.0	0.3	8/27/2009	3:38	8/27/09 3:38	34.23	20.56	69.01	
8/27/2009	3:17	8/27/09 3:17	0.5	0.0	0.3	8/27/2009	3:53	8/27/09 3:53	34.19	20.64	69.14	
8/27/2009	3:32	8/27/09 3:32	0.5	0.0	0.3	8/27/2009	4:08	8/27/09 4:08	34.19	20.85	69.54	
8/27/2009	3:47	8/27/09 3:47	0.5	0.5	0.5	8/27/2009	4:23	8/27/09 4:23	34.22	20.46	68.82	
8/27/2009	4:02	8/27/09 4:02	0.5	0.5	0.5	8/27/2009	4:38	8/27/09 4:38	34.19	20.84	69.52	
8/27/2009	4:17	8/27/09 4:17	0.5	0.5	0.5	8/27/2009	4:53	8/27/09 4:53	34.23	20.72	69.30	
8/27/2009	4:32	8/27/09 4:32	0.5	0.5	0.5	8/27/2009	5:08	8/27/09 5:08	34.20	20.59	69.06	
8/27/2009	4:47	8/27/09 4:47	0.5	0.0	0.3	8/27/2009	5:23	8/27/09 5:23	34.18	21.03	69.85	
8/27/2009	5:02	8/27/09 5:02	0.5	0.0	0.3	8/27/2009	5:38	8/27/09 5:38	34.24	20.63	69.14	
8/27/2009	5:17	8/27/09 5:17	0.5	0.5	0.5	8/27/2009	5:53	8/27/09 5:53	34.21	20.74	69.33	
8/27/2009	5:32	8/27/09 5:32	0.5	0.5	0.5	8/27/2009	6:08	8/27/09 6:08	34.29	21.05	69.88	
8/27/2009	5:47	8/27/09 5:47	0.5	0.0	0.3	8/27/2009	6:23	8/27/09 6:23	34.36	20.58	69.05	
8/27/2009	6:02	8/27/09 6:02	0.5	0.5	0.5	8/27/2009	6:38	8/27/09 6:38	34.36	20.30	68.55	
8/27/2009	6:17	8/27/09 6:17	0.5	0.0	0.3	8/27/2009	6:53	8/27/09 6:53	34.38	20.68	69.22	
8/27/2009	6:32	8/27/09 6:32	0.5	0.5	0.5	8/27/2009	7:08	8/27/09 7:08	34.39	20.64	69.16	
8/27/2009	6:47	8/27/09 6:47	0.5	0.5	0.5	8/27/2009	7:23	8/27/09 7:23	34.40	20.53	68.96	
8/27/2009	7:02	8/27/09 7:02	0.5	0.0	0.3	8/27/2009	7:38	8/27/09 7:38	34.37	20.67	69.21	
8/27/2009	7:17	8/27/09 7:17	1.0	1.0	1.0							
8/27/2009	7:32	8/27/09 7:32	1.0	1.5	1.3							

Notes:

a : Differential pressure measurements are monitored continuously and the maximum and minimum differential pressure in Pascals [Pa] are recorded during each 15 minute monitoring period.

b : Average maximum and average minimum differential pressure over seven day monitoring period (August 20 to August 27, 2009).

c : Average maximum and average minimum differential pressure during work hours or during night time hours over each day of the seven day monitoring period (August 20 to August 27, 2009).

d: Differential pressure measurements were made using a Omniguard 4 differential pressure monitor with data logger (http://www.engsolinc.com/docs/og/OG4broch.pdf).

e : Barometric pressure measurements were made using a Solinst barometric data logger (http://www.solinst.com/Downloads/3001/3001Manual/Introduction/Barologger.html).

Table G-3

Phase II Pressure Difference Measurements [a]

St. Julien's Creek Annex Building 1556

Averages over all measurements: [b]		
Maximum Differential Pressure:	0.3	Pa
Minimum Differential Pressure:	-0.1	Pa

Averages during Work Hours and Night Time: [c]

		Work Hours, Daily 10-hour Average Pressure Difference (7 am to 5 pm)		**Night Time, Daily 14-hour Average Pressure Difference (5 pm to 7 am)**	
Date	**Time**	**max (Pa)**	**min (Pa)**	**max (Pa)**	**min (Pa)**
10/23/2009	average	0.50	-0.13	0.18	-0.01
10/24/2009	average	0.35	-0.54	0.44	-0.18
10/25/2009	average	0.51	-0.06	0.24	0.00
10/26/2009	average	0.75	-0.14	0.11	-0.01
10/27/2009	average	0.14	-0.03	0.17	-0.18
10/28/2009	average	0.41	-0.23	0.13	0.00
10/29/2009	average	0.60	-0.01	0.18	0.00
10/30/2009	average	0.36	0.00	N/A	N/A
	Median:	0.46	-0.09	0.18	-0.01

Date	**Time**	**Date + Time**	**Maximum Differential Pressure**[d]	**Maximum Differential Pressure**[d]	**Average Pressure [Pa]**	**Date**	**Time**	**Date + Time**	**Indoor Barometric Pressure (in)** [e]	**Temperature (°C)**	**Temperature (°F)**	**Notes**
						10/23/2009	15:52	10/23/09 15:52	32.88	25.93	78.68	
10/23/2009	16:07	10/23/09 16:07	0.5	0.0	0.3	10/23/2009	16:07	10/23/09 16:07	32.92	26.88	80.38	
10/23/2009	16:22	10/23/09 16:22	0.5	0.0	0.3	10/23/2009	16:22	10/23/09 16:22	32.87	26.77	80.19	
10/23/2009	16:37	10/23/09 16:37	0.5	-0.5	0.0	10/23/2009	16:37	10/23/09 16:37	32.86	26.75	80.16	
10/23/2009	16:52	10/23/09 16:52	0.5	0.0	0.3	10/23/2009	16:52	10/23/09 16:52	32.94	26.75	80.15	
10/23/2009	17:07	10/23/09 17:07	0.0	0.0	0.0	10/23/2009	17:07	10/23/09 17:07	32.97	26.75	80.15	
10/23/2009	17:22	10/23/09 17:22	0.0	0.0	0.0	10/23/2009	17:22	10/23/09 17:22	32.98	26.75	80.15	
10/23/2009	17:37	10/23/09 17:37	0.0	-0.5	-0.3	10/23/2009	17:37	10/23/09 17:37	32.99	26.74	80.14	
10/23/2009	17:52	10/23/09 17:52	0.5	0.0	0.3	10/23/2009	17:52	10/23/09 17:52	33.01	26.74	80.12	
10/23/2009	18:07	10/23/09 18:07	0.0	0.0	0.0	10/23/2009	18:07	10/23/09 18:07	33.08	26.72	80.09	
10/23/2009	18:22	10/23/09 18:22	0.5	0.0	0.3	10/23/2009	18:22	10/23/09 18:22	33.12	26.70	80.06	
10/23/2009	18:37	10/23/09 18:37	0.5	0.0	0.3	10/23/2009	18:37	10/23/09 18:37	33.15	26.68	80.03	
10/23/2009	18:52	10/23/09 18:52	0.0	0.0	0.0	10/23/2009	18:52	10/23/09 18:52	33.17	26.66	79.99	
10/23/2009	19:07	10/23/09 19:07	0.5	0.0	0.3	10/23/2009	19:07	10/23/09 19:07	33.20	26.64	79.96	
10/23/2009	19:22	10/23/09 19:22	0.0	0.0	0.0	10/23/2009	19:22	10/23/09 19:22	33.23	26.62	79.92	
10/23/2009	19:37	10/23/09 19:37	0.5	0.0	0.3	10/23/2009	19:37	10/23/09 19:37	33.32	26.61	79.89	
10/23/2009	19:52	10/23/09 19:52	0.5	0.0	0.3	10/23/2009	19:52	10/23/09 19:52	33.32	26.60	79.87	
10/23/2009	20:07	10/23/09 20:07	0.0	0.0	0.0	10/23/2009	20:07	10/23/09 20:07	33.29	26.59	79.85	
10/23/2009	20:22	10/23/09 20:22	0.0	0.0	0.0	10/23/2009	20:22	10/23/09 20:22	33.25	26.57	79.83	
10/23/2009	20:37	10/23/09 20:37	0.0	0.0	0.0	10/23/2009	20:37	10/23/09 20:37	33.24	26.56	79.81	
10/23/2009	20:52	10/23/09 20:52	0.5	0.0	0.3	10/23/2009	20:52	10/23/09 20:52	33.26	26.56	79.81	
10/23/2009	21:07	10/23/09 21:07	0.0	0.0	0.0	10/23/2009	21:07	10/23/09 21:07	33.24	26.55	79.79	
10/23/2009	21:22	10/23/09 21:22	0.0	0.0	0.0	10/23/2009	21:22	10/23/09 21:22	33.25	26.54	79.78	
10/23/2009	21:37	10/23/09 21:37	0.0	0.0	0.0	10/23/2009	21:37	10/23/09 21:37	33.21	26.53	79.76	
10/23/2009	21:52	10/23/09 21:52	0.5	0.0	0.3	10/23/2009	21:52	10/23/09 21:52	33.24	26.52	79.74	
10/23/2009	22:07	10/23/09 22:07	0.0	0.0	0.0	10/23/2009	22:07	10/23/09 22:07	33.31	26.52	79.73	
10/23/2009	22:22	10/23/09 22:22	0.0	0.0	0.0	10/23/2009	22:22	10/23/09 22:22	33.25	26.52	79.73	
10/23/2009	22:37	10/23/09 22:37	0.5	0.0	0.3	10/23/2009	22:37	10/23/09 22:37	33.23	26.51	79.72	
10/23/2009	22:52	10/23/09 22:52	0.0	0.0	0.0	10/23/2009	22:52	10/23/09 22:52	33.15	26.50	79.70	
10/23/2009	23:07	10/23/09 23:07	0.5	0.0	0.3	10/23/2009	23:07	10/23/09 23:07	33.10	26.50	79.69	
10/23/2009	23:22	10/23/09 23:22	0.0	0.0	0.0	10/23/2009	23:22	10/23/09 23:22	33.02	26.49	79.68	
10/23/2009	23:37	10/23/09 23:37	0.5	0.0	0.3	10/23/2009	23:37	10/23/09 23:37	32.98	26.48	79.67	
10/23/2009	23:52	10/23/09 23:52	0.5	0.0	0.3	10/23/2009	23:52	10/23/09 23:52	32.94	26.47	79.65	

Table G-3

Phase II Pressure Difference Measurements [a]

St. Julien's Creek Annex Building 1556

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
10/24/2009	0:07	10/24/09 0:07	0.0	0.0	0.0	10/24/2009	0:07	10/24/09 0:07	32.87	26.47	79.65	
10/24/2009	0:22	10/24/09 0:22	0.0	0.0	0.0	10/24/2009	0:22	10/24/09 0:22	32.81	26.46	79.63	
10/24/2009	0:37	10/24/09 0:37	0.0	0.0	0.0	10/24/2009	0:37	10/24/09 0:37	32.81	26.45	79.62	
10/24/2009	0:52	10/24/09 0:52	0.0	0.0	0.0	10/24/2009	0:52	10/24/09 0:52	32.71	26.45	79.61	
10/24/2009	1:07	10/24/09 1:07	0.0	0.0	0.0	10/24/2009	1:07	10/24/09 1:07	32.69	26.44	79.59	
10/24/2009	1:22	10/24/09 1:22	0.0	0.0	0.0	10/24/2009	1:22	10/24/09 1:22	32.68	26.44	79.58	
10/24/2009	1:37	10/24/09 1:37	0.0	0.0	0.0	10/24/2009	1:37	10/24/09 1:37	32.64	26.43	79.58	
10/24/2009	1:52	10/24/09 1:52	0.0	0.0	0.0	10/24/2009	1:52	10/24/09 1:52	32.62	26.43	79.58	
10/24/2009	2:07	10/24/09 2:07	0.5	0.0	0.3	10/24/2009	2:07	10/24/09 2:07	32.60	26.43	79.57	
10/24/2009	2:22	10/24/09 2:22	0.0	0.0	0.0	10/24/2009	2:22	10/24/09 2:22	32.58	26.43	79.57	
10/24/2009	2:37	10/24/09 2:37	0.0	0.0	0.0	10/24/2009	2:37	10/24/09 2:37	32.52	26.43	79.57	
10/24/2009	2:52	10/24/09 2:52	0.0	0.0	0.0	10/24/2009	2:52	10/24/09 2:52	32.44	26.42	79.56	
10/24/2009	3:07	10/24/09 3:07	0.0	0.0	0.0	10/24/2009	3:07	10/24/09 3:07	32.37	26.42	79.55	
10/24/2009	3:22	10/24/09 3:22	0.0	0.0	0.0	10/24/2009	3:22	10/24/09 3:22	32.31	26.41	79.54	
10/24/2009	3:37	10/24/09 3:37	0.0	0.0	0.0	10/24/2009	3:37	10/24/09 3:37	32.18	26.41	79.54	
10/24/2009	3:52	10/24/09 3:52	0.0	0.0	0.0	10/24/2009	3:52	10/24/09 3:52	32.11	26.41	79.54	
10/24/2009	4:07	10/24/09 4:07	0.5	0.0	0.3	10/24/2009	4:07	10/24/09 4:07	32.08	26.41	79.53	
10/24/2009	4:22	10/24/09 4:22	0.5	0.0	0.3	10/24/2009	4:22	10/24/09 4:22	32.04	26.41	79.53	
10/24/2009	4:37	10/24/09 4:37	0.5	0.0	0.3	10/24/2009	4:37	10/24/09 4:37	32.01	26.41	79.53	
10/24/2009	4:52	10/24/09 4:52	0.0	0.0	0.0	10/24/2009	4:52	10/24/09 4:52	31.96	26.41	79.53	
10/24/2009	5:07	10/24/09 5:07	0.5	0.0	0.3	10/24/2009	5:07	10/24/09 5:07	32.04	26.41	79.53	
10/24/2009	5:22	10/24/09 5:22	0.5	0.0	0.3	10/24/2009	5:22	10/24/09 5:22	32.04	26.41	79.53	
10/24/2009	5:37	10/24/09 5:37	0.0	0.0	0.0	10/24/2009	5:37	10/24/09 5:37	31.97	26.41	79.53	
10/24/2009	5:52	10/24/09 5:52	0.0	0.0	0.0	10/24/2009	5:52	10/24/09 5:52	31.98	26.41	79.53	
10/24/2009	6:07	10/24/09 6:07	0.0	0.0	0.0	10/24/2009	6:07	10/24/09 6:07	31.95	26.40	79.52	
10/24/2009	6:22	10/24/09 6:22	0.0	0.0	0.0	10/24/2009	6:22	10/24/09 6:22	31.95	26.40	79.52	
10/24/2009	6:37	10/24/09 6:37	0.5	0.0	0.3	10/24/2009	6:37	10/24/09 6:37	31.94	26.42	79.56	
10/24/2009	6:52	10/24/09 6:52	0.5	0.0	0.3	10/24/2009	6:52	10/24/09 6:52	31.94	26.46	79.62	
10/24/2009	7:07	10/24/09 7:07	0.0	0.0	0.0	10/24/2009	7:07	10/24/09 7:07	31.83	26.50	79.70	
10/24/2009	7:22	10/24/09 7:22	0.5	0.0	0.3	10/24/2009	7:22	10/24/09 7:22	31.81	26.54	79.76	
10/24/2009	7:37	10/24/09 7:37	0.0	0.0	0.0	10/24/2009	7:37	10/24/09 7:37	31.81	26.57	79.82	
10/24/2009	7:52	10/24/09 7:52	0.0	-0.5	-0.3	10/24/2009	7:52	10/24/09 7:52	31.80	26.60	79.88	
10/24/2009	8:07	10/24/09 8:07	0.0	-0.5	-0.3	10/24/2009	8:07	10/24/09 8:07	31.86	26.63	79.93	
10/24/2009	8:22	10/24/09 8:22	0.0	0.0	0.0	10/24/2009	8:22	10/24/09 8:22	31.86	26.66	79.98	
10/24/2009	8:37	10/24/09 8:37	0.0	0.0	0.0	10/24/2009	8:37	10/24/09 8:37	31.89	26.68	80.03	
10/24/2009	8:52	10/24/09 8:52	0.0	0.0	0.0	10/24/2009	8:52	10/24/09 8:52	31.87	26.71	80.08	
10/24/2009	9:07	10/24/09 9:07	0.0	-0.5	-0.3	10/24/2009	9:07	10/24/09 9:07	31.84	26.74	80.14	
10/24/2009	9:22	10/24/09 9:22	0.0	-0.5	-0.3	10/24/2009	9:22	10/24/09 9:22	31.82	26.77	80.19	
10/24/2009	9:37	10/24/09 9:37	0.0	0.0	0.0	10/24/2009	9:37	10/24/09 9:37	31.80	26.81	80.26	
10/24/2009	9:52	10/24/09 9:52	0.5	0.0	0.3	10/24/2009	9:52	10/24/09 9:52	31.82	26.84	80.31	
10/24/2009	10:07	10/24/09 10:07	0.5	-0.5	0.0	10/24/2009	10:07	10/24/09 10:07	31.77	26.87	80.37	
10/24/2009	10:22	10/24/09 10:22	0.5	-0.5	0.0	10/24/2009	10:22	10/24/09 10:22	31.72	26.91	80.43	
10/24/2009	10:37	10/24/09 10:37	0.5	-0.5	0.0	10/24/2009	10:37	10/24/09 10:37	31.63	26.92	80.46	
10/24/2009	10:52	10/24/09 10:52	0.5	-0.5	0.0	10/24/2009	10:52	10/24/09 10:52	31.61	26.92	80.46	
10/24/2009	11:07	10/24/09 11:07	0.5	-0.5	0.0	10/24/2009	11:07	10/24/09 11:07	31.58	26.93	80.47	
10/24/2009	11:22	10/24/09 11:22	0.5	-1.0	-0.3	10/24/2009	11:22	10/24/09 11:22	31.50	26.96	80.53	
10/24/2009	11:37	10/24/09 11:37	0.5	-1.0	-0.3	10/24/2009	11:37	10/24/09 11:37	31.41	27.01	80.61	
10/24/2009	11:52	10/24/09 11:52	0.5	-1.0	-0.3	10/24/2009	11:52	10/24/09 11:52	31.35	27.08	80.75	
10/24/2009	12:07	10/24/09 12:07	0.5	-1.5	-0.5	10/24/2009	12:07	10/24/09 12:07	31.28	27.15	80.87	
10/24/2009	12:22	10/24/09 12:22	0.0	-0.5	-0.3	10/24/2009	12:22	10/24/09 12:22	31.17	27.21	80.97	
10/24/2009	12:37	10/24/09 12:37	1.0	-1.0	0.0	10/24/2009	12:37	10/24/09 12:37	31.04	27.26	81.06	
10/24/2009	12:52	10/24/09 12:52	0.5	-1.0	-0.3	10/24/2009	12:52	10/24/09 12:52	30.89	27.30	81.14	
10/24/2009	13:07	10/24/09 13:07	0.5	-1.0	-0.3	10/24/2009	13:07	10/24/09 13:07	30.73	27.34	81.22	
10/24/2009	13:22	10/24/09 13:22	0.5	-0.5	0.0	10/24/2009	13:22	10/24/09 13:22	30.55	27.40	81.33	

Table G-3

Phase II Pressure Difference Measurements [a]

St. Julien's Creek Annex Building 1556

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
10/24/2009	13:37	10/24/09 13:37	0.0	-0.5	-0.3	10/24/2009	13:37	10/24/09 13:37	30.44	27.45	81.41	
10/24/2009	13:52	10/24/09 13:52	0.5	-0.5	0.0	10/24/2009	13:52	10/24/09 13:52	30.36	27.47	81.45	
10/24/2009	14:07	10/24/09 14:07	0.5	-1.0	-0.3	10/24/2009	14:07	10/24/09 14:07	30.27	27.47	81.45	
10/24/2009	14:22	10/24/09 14:22	0.5	-1.0	-0.3	10/24/2009	14:22	10/24/09 14:22	30.19	27.47	81.44	
10/24/2009	14:37	10/24/09 14:37	0.5	-1.0	-0.3	10/24/2009	14:37	10/24/09 14:37	30.13	27.46	81.42	
10/24/2009	14:52	10/24/09 14:52	0.0	-0.5	-0.3	10/24/2009	14:52	10/24/09 14:52	29.99	27.45	81.41	
10/24/2009	15:07	10/24/09 15:07	0.5	-0.5	0.0	10/24/2009	15:07	10/24/09 15:07	29.89	27.44	81.39	
10/24/2009	15:22	10/24/09 15:22	0.5	-0.5	0.0	10/24/2009	15:22	10/24/09 15:22	29.81	27.44	81.38	
10/24/2009	15:37	10/24/09 15:37	0.5	-0.5	0.0	10/24/2009	15:37	10/24/09 15:37	29.78	27.43	81.37	
10/24/2009	15:52	10/24/09 15:52	0.5	-0.5	0.0	10/24/2009	15:52	10/24/09 15:52	29.72	27.43	81.37	
10/24/2009	16:07	10/24/09 16:07	0.5	-0.5	0.0	10/24/2009	16:07	10/24/09 16:07	29.78	27.42	81.36	
10/24/2009	16:22	10/24/09 16:22	0.5	-0.5	0.0	10/24/2009	16:22	10/24/09 16:22	29.74	27.43	81.37	
10/24/2009	16:37	10/24/09 16:37	0.5	-0.5	0.0	10/24/2009	16:37	10/24/09 16:37	29.71	27.42	81.36	
10/24/2009	16:52	10/24/09 16:52	0.5	-0.5	0.0	10/24/2009	16:52	10/24/09 16:52	29.68	27.42	81.36	
10/24/2009	17:07	10/24/09 17:07	0.5	-0.5	0.0	10/24/2009	17:07	10/24/09 17:07	29.70	27.42	81.36	
10/24/2009	17:22	10/24/09 17:22	1.0	-1.0	0.0	10/24/2009	17:22	10/24/09 17:22	29.75	27.42	81.35	
10/24/2009	17:37	10/24/09 17:37	0.5	-0.5	0.0	10/24/2009	17:37	10/24/09 17:37	29.88	27.42	81.35	
10/24/2009	17:52	10/24/09 17:52	0.5	-1.5	-0.5	10/24/2009	17:52	10/24/09 17:52	29.89	27.42	81.35	
10/24/2009	18:07	10/24/09 18:07	0.5	-1.0	-0.3	10/24/2009	18:07	10/24/09 18:07	29.85	27.41	81.35	
10/24/2009	18:22	10/24/09 18:22	0.5	-0.5	0.0	10/24/2009	18:22	10/24/09 18:22	29.89	27.41	81.33	
10/24/2009	18:37	10/24/09 18:37	0.5	-0.5	0.0	10/24/2009	18:37	10/24/09 18:37	29.98	27.40	81.32	
10/24/2009	18:52	10/24/09 18:52	0.5	-0.5	0.0	10/24/2009	18:52	10/24/09 18:52	30.02	27.39	81.31	
10/24/2009	19:07	10/24/09 19:07	0.5	0.0	0.3	10/24/2009	19:07	10/24/09 19:07	30.03	27.38	81.29	
10/24/2009	19:22	10/24/09 19:22	0.0	-0.5	-0.3	10/24/2009	19:22	10/24/09 19:22	30.03	27.38	81.28	
10/24/2009	19:37	10/24/09 19:37	0.0	0.0	0.0	10/24/2009	19:37	10/24/09 19:37	30.05	27.37	81.26	
10/24/2009	19:52	10/24/09 19:52	0.0	-0.5	-0.3	10/24/2009	19:52	10/24/09 19:52	30.04	27.36	81.25	
10/24/2009	20:07	10/24/09 20:07	0.5	-0.5	0.0	10/24/2009	20:07	10/24/09 20:07	30.03	27.36	81.24	
10/24/2009	20:22	10/24/09 20:22	0.5	-0.5	0.0	10/24/2009	20:22	10/24/09 20:22	30.07	27.35	81.23	
10/24/2009	20:37	10/24/09 20:37	0.5	0.0	0.3	10/24/2009	20:37	10/24/09 20:37	30.13	27.35	81.23	
10/24/2009	20:52	10/24/09 20:52	0.0	0.0	0.0	10/24/2009	20:52	10/24/09 20:52	30.15	27.35	81.22	
10/24/2009	21:07	10/24/09 21:07	0.0	-0.5	-0.3	10/24/2009	21:07	10/24/09 21:07	30.20	27.34	81.22	
10/24/2009	21:22	10/24/09 21:22	0.0	0.0	0.0	10/24/2009	21:22	10/24/09 21:22	30.21	27.34	81.21	
10/24/2009	21:37	10/24/09 21:37	0.0	-0.5	-0.3	10/24/2009	21:37	10/24/09 21:37	30.18	27.33	81.20	
10/24/2009	21:52	10/24/09 21:52	0.5	0.0	0.3	10/24/2009	21:52	10/24/09 21:52	30.31	27.33	81.19	
10/24/2009	22:07	10/24/09 22:07	0.5	0.0	0.3	10/24/2009	22:07	10/24/09 22:07	30.40	27.33	81.19	
10/24/2009	22:22	10/24/09 22:22	1.0	0.0	0.5	10/24/2009	22:22	10/24/09 22:22	30.63	27.33	81.19	
10/24/2009	22:37	10/24/09 22:37	0.5	0.0	0.3	10/24/2009	22:37	10/24/09 22:37	30.67	27.34	81.20	
10/24/2009	22:52	10/24/09 22:52	0.5	0.0	0.3	10/24/2009	22:52	10/24/09 22:52	30.62	27.34	81.22	
10/24/2009	23:07	10/24/09 23:07	0.5	0.0	0.3	10/24/2009	23:07	10/24/09 23:07	30.66	27.35	81.22	
10/24/2009	23:22	10/24/09 23:22	0.0	0.0	0.0	10/24/2009	23:22	10/24/09 23:22	30.62	27.35	81.23	
10/24/2009	23:37	10/24/09 23:37	0.5	0.0	0.3	10/24/2009	23:37	10/24/09 23:37	30.67	27.35	81.23	
10/24/2009	23:52	10/24/09 23:52	0.5	0.0	0.3	10/24/2009	23:52	10/24/09 23:52	30.75	27.34	81.22	
10/25/2009	0:07	10/25/09 0:07	0.5	0.0	0.3	10/25/2009	0:07	10/25/09 0:07	30.84	27.33	81.20	
10/25/2009	0:22	10/25/09 0:22	0.5	0.0	0.3	10/25/2009	0:22	10/25/09 0:22	30.87	27.32	81.18	
10/25/2009	0:37	10/25/09 0:37	0.0	0.0	0.0	10/25/2009	0:37	10/25/09 0:37	30.97	27.31	81.16	
10/25/2009	0:52	10/25/09 0:52	0.5	0.0	0.3	10/25/2009	0:52	10/25/09 0:52	31.07	27.29	81.13	
10/25/2009	1:07	10/25/09 1:07	0.5	0.0	0.3	10/25/2009	1:07	10/25/09 1:07	31.17	27.28	81.10	
10/25/2009	1:22	10/25/09 1:22	0.5	0.0	0.3	10/25/2009	1:22	10/25/09 1:22	31.25	27.26	81.07	
10/25/2009	1:37	10/25/09 1:37	0.0	0.0	0.0	10/25/2009	1:37	10/25/09 1:37	31.36	27.25	81.04	
10/25/2009	1:52	10/25/09 1:52	0.5	0.0	0.3	10/25/2009	1:52	10/25/09 1:52	31.39	27.23	81.01	
10/25/2009	2:07	10/25/09 2:07	0.5	0.0	0.3	10/25/2009	2:07	10/25/09 2:07	31.45	27.20	80.97	
10/25/2009	2:22	10/25/09 2:22	0.0	0.0	0.0	10/25/2009	2:22	10/25/09 2:22	31.51	27.18	80.92	
10/25/2009	2:37	10/25/09 2:37	0.5	0.0	0.3	10/25/2009	2:37	10/25/09 2:37	31.62	27.15	80.87	
10/25/2009	2:52	10/25/09 2:52	0.0	0.0	0.0	10/25/2009	2:52	10/25/09 2:52	31.67	27.13	80.83	

Table G-3

Phase II Pressure Difference Measurements [a]

St. Julien's Creek Annex Building 1556

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
10/25/2009	3:07	10/25/09 3:07	0.5	0.0	0.3	10/25/2009	3:07	10/25/09 3:07	31.82	27.11	80.79	
10/25/2009	3:22	10/25/09 3:22	1.0	0.0	0.5	10/25/2009	3:22	10/25/09 3:22	32.12	27.08	80.75	
10/25/2009	3:37	10/25/09 3:37	1.0	-0.5	0.3	10/25/2009	3:37	10/25/09 3:37	32.15	27.04	80.67	
10/25/2009	3:52	10/25/09 3:52	0.5	0.0	0.3	10/25/2009	3:52	10/25/09 3:52	32.21	26.98	80.56	
10/25/2009	4:07	10/25/09 4:07	0.5	0.0	0.3	10/25/2009	4:07	10/25/09 4:07	32.33	26.91	80.44	
10/25/2009	4:22	10/25/09 4:22	0.5	0.0	0.3	10/25/2009	4:22	10/25/09 4:22	32.37	26.84	80.30	
10/25/2009	4:37	10/25/09 4:37	0.5	0.0	0.3	10/25/2009	4:37	10/25/09 4:37	32.49	26.76	80.17	
10/25/2009	4:52	10/25/09 4:52	0.5	0.0	0.3	10/25/2009	4:52	10/25/09 4:52	32.55	26.69	80.04	
10/25/2009	5:07	10/25/09 5:07	0.5	0.0	0.3	10/25/2009	5:07	10/25/09 5:07	32.73	26.61	79.90	
10/25/2009	5:22	10/25/09 5:22	0.5	0.0	0.3	10/25/2009	5:22	10/25/09 5:22	32.86	26.54	79.76	
10/25/2009	5:37	10/25/09 5:37	0.5	0.0	0.3	10/25/2009	5:37	10/25/09 5:37	32.93	26.47	79.64	
10/25/2009	5:52	10/25/09 5:52	1.0	-0.5	0.3	10/25/2009	5:52	10/25/09 5:52	32.99	26.41	79.53	
10/25/2009	6:07	10/25/09 6:07	0.5	0.0	0.3	10/25/2009	6:07	10/25/09 6:07	33.21	26.34	79.42	
10/25/2009	6:22	10/25/09 6:22	0.5	0.0	0.3	10/25/2009	6:22	10/25/09 6:22	33.32	26.28	79.30	
10/25/2009	6:37	10/25/09 6:37	0.5	0.0	0.3	10/25/2009	6:37	10/25/09 6:37	33.49	26.22	79.20	
10/25/2009	6:52	10/25/09 6:52	0.5	0.0	0.3	10/25/2009	6:52	10/25/09 6:52	33.59	26.18	79.13	
10/25/2009	7:07	10/25/09 7:07	0.5	0.0	0.3	10/25/2009	7:07	10/25/09 7:07	33.63	26.16	79.09	
10/25/2009	7:22	10/25/09 7:22	0.5	0.0	0.3	10/25/2009	7:22	10/25/09 7:22	33.74	26.16	79.08	
10/25/2009	7:37	10/25/09 7:37	0.5	0.0	0.3	10/25/2009	7:37	10/25/09 7:37	33.83	26.15	79.06	
10/25/2009	7:52	10/25/09 7:52	0.5	0.0	0.3	10/25/2009	7:52	10/25/09 7:52	34.03	26.15	79.06	
10/25/2009	8:07	10/25/09 8:07	0.5	0.0	0.3	10/25/2009	8:07	10/25/09 8:07	34.13	26.14	79.06	
10/25/2009	8:22	10/25/09 8:22	0.5	0.0	0.3	10/25/2009	8:22	10/25/09 8:22	34.24	26.13	79.04	
10/25/2009	8:37	10/25/09 8:37	0.5	0.0	0.3	10/25/2009	8:37	10/25/09 8:37	34.41	26.12	79.02	
10/25/2009	8:52	10/25/09 8:52	0.5	0.0	0.3	10/25/2009	8:52	10/25/09 8:52	34.53	26.11	79.01	
10/25/2009	9:07	10/25/09 9:07	1.0	0.0	0.5	10/25/2009	9:07	10/25/09 9:07	34.63	26.11	79.01	
10/25/2009	9:22	10/25/09 9:22	1.0	0.0	0.5	10/25/2009	9:22	10/25/09 9:22	34.70	26.12	79.01	
10/25/2009	9:37	10/25/09 9:37	0.5	0.0	0.3	10/25/2009	9:37	10/25/09 9:37	34.79	26.11	78.99	
10/25/2009	9:52	10/25/09 9:52	0.5	0.0	0.3	10/25/2009	9:52	10/25/09 9:52	34.89	26.12	79.01	
10/25/2009	10:07	10/25/09 10:07	0.5	0.0	0.3	10/25/2009	10:07	10/25/09 10:07	35.01	26.12	79.02	
10/25/2009	10:22	10/25/09 10:22	0.5	0.0	0.3	10/25/2009	10:22	10/25/09 10:22	35.06	26.13	79.04	
10/25/2009	10:37	10/25/09 10:37	0.5	0.0	0.3	10/25/2009	10:37	10/25/09 10:37	35.12	26.13	79.03	
10/25/2009	10:52	10/25/09 10:52	0.5	0.0	0.3	10/25/2009	10:52	10/25/09 10:52	35.19	26.12	79.02	
10/25/2009	11:07	10/25/09 11:07	0.5	0.0	0.3	10/25/2009	11:07	10/25/09 11:07	35.27	26.10	78.99	
10/25/2009	11:22	10/25/09 11:22	0.5	0.0	0.3	10/25/2009	11:22	10/25/09 11:22	35.44	26.07	78.93	
10/25/2009	11:37	10/25/09 11:37	0.5	0.0	0.3	10/25/2009	11:37	10/25/09 11:37	35.26	26.03	78.86	
10/25/2009	11:52	10/25/09 11:52	0.5	0.0	0.3	10/25/2009	11:52	10/25/09 11:52	35.42	25.99	78.79	
10/25/2009	12:07	10/25/09 12:07	0.5	0.0	0.3	10/25/2009	12:07	10/25/09 12:07	35.37	25.96	78.74	
10/25/2009	12:22	10/25/09 12:22	0.5	0.0	0.3	10/25/2009	12:22	10/25/09 12:22	35.37	25.94	78.69	
10/25/2009	12:37	10/25/09 12:37	0.5	0.0	0.3	10/25/2009	12:37	10/25/09 12:37	35.38	25.92	78.66	
10/25/2009	12:52	10/25/09 12:52	0.5	0.0	0.3	10/25/2009	12:52	10/25/09 12:52	35.26	25.91	78.63	
10/25/2009	13:07	10/25/09 13:07	0.5	0.0	0.3	10/25/2009	13:07	10/25/09 13:07	35.26	25.89	78.61	
10/25/2009	13:22	10/25/09 13:22	0.5	0.0	0.3	10/25/2009	13:22	10/25/09 13:22	35.24	25.88	78.58	
10/25/2009	13:37	10/25/09 13:37	0.5	0.0	0.3	10/25/2009	13:37	10/25/09 13:37	35.25	25.87	78.56	
10/25/2009	13:52	10/25/09 13:52	0.5	0.0	0.3	10/25/2009	13:52	10/25/09 13:52	35.30	25.85	78.53	
10/25/2009	14:07	10/25/09 14:07	0.5	0.0	0.3	10/25/2009	14:07	10/25/09 14:07	35.31	25.82	78.48	
10/25/2009	14:22	10/25/09 14:22	0.5	-0.5	0.0	10/25/2009	14:22	10/25/09 14:22	35.39	25.80	78.43	
10/25/2009	14:37	10/25/09 14:37	0.0	0.0	0.0	10/25/2009	14:37	10/25/09 14:37	35.21	25.77	78.38	
10/25/2009	14:52	10/25/09 14:52	0.5	0.0	0.3	10/25/2009	14:52	10/25/09 14:52	35.32	25.74	78.33	
10/25/2009	15:07	10/25/09 15:07	0.5	-0.5	0.0	10/25/2009	15:07	10/25/09 15:07	35.29	25.72	78.29	
10/25/2009	15:22	10/25/09 15:22	0.5	0.0	0.3	10/25/2009	15:22	10/25/09 15:22	35.27	25.69	78.25	
10/25/2009	15:37	10/25/09 15:37	0.5	0.0	0.3	10/25/2009	15:37	10/25/09 15:37	35.15	25.67	78.20	
10/25/2009	15:52	10/25/09 15:52	0.5	-0.5	0.0	10/25/2009	15:52	10/25/09 15:52	35.16	25.65	78.17	
10/25/2009	16:07	10/25/09 16:07	0.5	-0.5	0.0	10/25/2009	16:07	10/25/09 16:07	35.21	25.63	78.14	
10/25/2009	16:22	10/25/09 16:22	0.5	0.0	0.3	10/25/2009	16:22	10/25/09 16:22	35.10	25.61	78.10	

Table G-3

Phase II Pressure Difference Measurements [a]

St. Julien's Creek Annex Building 1556

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
10/25/2009	16:37	10/25/09 16:37	0.5	0.0	0.3	10/25/2009	16:37	10/25/09 16:37	35.21	25.59	78.07	
10/25/2009	16:52	10/25/09 16:52	0.5	-0.5	0.0	10/25/2009	16:52	10/25/09 16:52	35.26	25.58	78.04	
10/25/2009	17:07	10/25/09 17:07	0.5	0.0	0.3	10/25/2009	17:07	10/25/09 17:07	35.34	25.55	78.00	
10/25/2009	17:22	10/25/09 17:22	0.5	0.0	0.3	10/25/2009	17:22	10/25/09 17:22	35.45	25.53	77.96	
10/25/2009	17:37	10/25/09 17:37	0.0	0.0	0.0	10/25/2009	17:37	10/25/09 17:37	35.38	25.52	77.93	
10/25/2009	17:52	10/25/09 17:52	0.5	0.0	0.3	10/25/2009	17:52	10/25/09 17:52	35.50	25.49	77.88	
10/25/2009	18:07	10/25/09 18:07	0.0	0.0	0.0	10/25/2009	18:07	10/25/09 18:07	35.48	25.46	77.83	
10/25/2009	18:22	10/25/09 18:22	0.0	0.0	0.0	10/25/2009	18:22	10/25/09 18:22	35.48	25.44	77.78	
10/25/2009	18:37	10/25/09 18:37	0.5	0.0	0.3	10/25/2009	18:37	10/25/09 18:37	35.54	25.40	77.73	
10/25/2009	18:52	10/25/09 18:52	0.5	0.0	0.3	10/25/2009	18:52	10/25/09 18:52	35.61	25.37	77.67	
10/25/2009	19:07	10/25/09 19:07	0.0	0.0	0.0	10/25/2009	19:07	10/25/09 19:07	35.65	25.34	77.61	
10/25/2009	19:22	10/25/09 19:22	0.5	0.0	0.3	10/25/2009	19:22	10/25/09 19:22	35.62	25.31	77.56	
10/25/2009	19:37	10/25/09 19:37	0.5	0.0	0.3	10/25/2009	19:37	10/25/09 19:37	35.71	25.28	77.51	
10/25/2009	19:52	10/25/09 19:52	0.5	0.0	0.3	10/25/2009	19:52	10/25/09 19:52	35.87	25.26	77.47	
10/25/2009	20:07	10/25/09 20:07	0.5	0.0	0.3	10/25/2009	20:07	10/25/09 20:07	35.89	25.24	77.43	
10/25/2009	20:22	10/25/09 20:22	0.5	0.0	0.3	10/25/2009	20:22	10/25/09 20:22	35.90	25.22	77.39	
10/25/2009	20:37	10/25/09 20:37	0.5	0.0	0.3	10/25/2009	20:37	10/25/09 20:37	35.95	25.20	77.36	
10/25/2009	20:52	10/25/09 20:52	0.5	0.0	0.3	10/25/2009	20:52	10/25/09 20:52	36.05	25.18	77.32	
10/25/2009	21:07	10/25/09 21:07	0.0	0.0	0.0	10/25/2009	21:07	10/25/09 21:07	36.04	25.15	77.28	
10/25/2009	21:22	10/25/09 21:22	0.5	0.0	0.3	10/25/2009	21:22	10/25/09 21:22	36.12	25.14	77.24	
10/25/2009	21:37	10/25/09 21:37	0.5	0.0	0.3	10/25/2009	21:37	10/25/09 21:37	36.18	25.12	77.21	
10/25/2009	21:52	10/25/09 21:52	0.0	0.0	0.0	10/25/2009	21:52	10/25/09 21:52	36.15	25.10	77.17	
10/25/2009	22:07	10/25/09 22:07	0.0	0.0	0.0	10/25/2009	22:07	10/25/09 22:07	36.18	25.07	77.13	
10/25/2009	22:22	10/25/09 22:22	0.0	0.0	0.0	10/25/2009	22:22	10/25/09 22:22	36.22	25.04	77.08	
10/25/2009	22:37	10/25/09 22:37	0.0	0.0	0.0	10/25/2009	22:37	10/25/09 22:37	36.24	25.01	77.02	
10/25/2009	22:52	10/25/09 22:52	0.5	0.0	0.3	10/25/2009	22:52	10/25/09 22:52	36.23	24.98	76.96	
10/25/2009	23:07	10/25/09 23:07	0.0	0.0	0.0	10/25/2009	23:07	10/25/09 23:07	36.15	24.95	76.90	
10/25/2009	23:22	10/25/09 23:22	0.5	0.0	0.3	10/25/2009	23:22	10/25/09 23:22	36.24	24.91	76.84	
10/25/2009	23:37	10/25/09 23:37	0.0	0.0	0.0	10/25/2009	23:37	10/25/09 23:37	36.30	24.89	76.79	
10/25/2009	23:52	10/25/09 23:52	0.0	0.0	0.0	10/25/2009	23:52	10/25/09 23:52	36.32	24.86	76.75	
10/26/2009	0:07	10/26/09 0:07	0.5	0.0	0.3	10/26/2009	0:07	10/26/09 0:07	36.25	24.84	76.70	
10/26/2009	0:22	10/26/09 0:22	0.0	0.0	0.0	10/26/2009	0:22	10/26/09 0:22	36.18	24.81	76.66	
10/26/2009	0:37	10/26/09 0:37	0.0	0.0	0.0	10/26/2009	0:37	10/26/09 0:37	36.11	24.79	76.62	
10/26/2009	0:52	10/26/09 0:52	0.0	0.0	0.0	10/26/2009	0:52	10/26/09 0:52	36.17	24.76	76.58	
10/26/2009	1:07	10/26/09 1:07	0.0	0.0	0.0	10/26/2009	1:07	10/26/09 1:07	36.22	24.75	76.54	
10/26/2009	1:22	10/26/09 1:22	0.0	0.0	0.0	10/26/2009	1:22	10/26/09 1:22	36.20	24.73	76.51	
10/26/2009	1:37	10/26/09 1:37	0.0	0.0	0.0	10/26/2009	1:37	10/26/09 1:37	36.26	24.71	76.47	
10/26/2009	1:52	10/26/09 1:52	0.0	0.0	0.0	10/26/2009	1:52	10/26/09 1:52	36.10	24.68	76.42	
10/26/2009	2:07	10/26/09 2:07	0.0	0.0	0.0	10/26/2009	2:07	10/26/09 2:07	36.03	24.65	76.36	
10/26/2009	2:22	10/26/09 2:22	0.0	0.0	0.0	10/26/2009	2:22	10/26/09 2:22	36.08	24.61	76.30	
10/26/2009	2:37	10/26/09 2:37	0.0	0.0	0.0	10/26/2009	2:37	10/26/09 2:37	36.00	24.58	76.24	
10/26/2009	2:52	10/26/09 2:52	0.5	0.0	0.3	10/26/2009	2:52	10/26/09 2:52	36.05	24.55	76.18	
10/26/2009	3:07	10/26/09 3:07	0.0	0.0	0.0	10/26/2009	3:07	10/26/09 3:07	36.11	24.53	76.15	
10/26/2009	3:22	10/26/09 3:22	0.0	0.0	0.0	10/26/2009	3:22	10/26/09 3:22	36.12	24.51	76.12	
10/26/2009	3:37	10/26/09 3:37	0.5	0.0	0.3	10/26/2009	3:37	10/26/09 3:37	36.16	24.49	76.09	
10/26/2009	3:52	10/26/09 3:52	0.0	0.0	0.0	10/26/2009	3:52	10/26/09 3:52	36.05	24.48	76.07	
10/26/2009	4:07	10/26/09 4:07	0.0	0.0	0.0	10/26/2009	4:07	10/26/09 4:07	36.08	24.47	76.05	
10/26/2009	4:22	10/26/09 4:22	0.5	0.0	0.3	10/26/2009	4:22	10/26/09 4:22	36.05	24.46	76.03	
10/26/2009	4:37	10/26/09 4:37	0.5	0.0	0.3	10/26/2009	4:37	10/26/09 4:37	36.09	24.45	76.01	
10/26/2009	4:52	10/26/09 4:52	0.5	0.0	0.3	10/26/2009	4:52	10/26/09 4:52	36.14	24.44	75.99	
10/26/2009	5:07	10/26/09 5:07	0.5	0.0	0.3	10/26/2009	5:07	10/26/09 5:07	36.27	24.44	75.99	
10/26/2009	5:22	10/26/09 5:22	0.5	0.0	0.3	10/26/2009	5:22	10/26/09 5:22	36.20	24.43	75.98	
10/26/2009	5:37	10/26/09 5:37	0.5	0.0	0.3	10/26/2009	5:37	10/26/09 5:37	36.31	24.43	75.97	
10/26/2009	5:52	10/26/09 5:52	0.0	0.0	0.0	10/26/2009	5:52	10/26/09 5:52	36.29	24.42	75.96	

Table G-3

Phase II Pressure Difference Measurements [a]

St. Julien's Creek Annex Building 1556

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
10/26/2009	6:07	10/26/09 6:07	0.0	0.0	0.0	10/26/2009	6:07	10/26/09 6:07	36.43	24.42	75.95	
10/26/2009	6:22	10/26/09 6:22	0.5	0.0	0.3	10/26/2009	6:22	10/26/09 6:22	36.43	24.44	75.99	
10/26/2009	6:37	10/26/09 6:37	0.5	0.0	0.3	10/26/2009	6:37	10/26/09 6:37	36.40	24.48	76.06	
10/26/2009	6:52	10/26/09 6:52	0.0	0.0	0.0	10/26/2009	6:52	10/26/09 6:52	36.46	24.53	76.15	
10/26/2009	7:07	10/26/09 7:07	0.0	0.0	0.0	10/26/2009	7:07	10/26/09 7:07	36.44	24.58	76.24	
10/26/2009	7:22	10/26/09 7:22	0.5	0.0	0.3	10/26/2009	7:22	10/26/09 7:22	36.58	24.63	76.34	
10/26/2009	7:37	10/26/09 7:37	0.5	0.0	0.3	10/26/2009	7:37	10/26/09 7:37	36.64	24.68	76.42	
10/26/2009	7:52	10/26/09 7:52	0.5	0.0	0.3	10/26/2009	7:52	10/26/09 7:52	36.56	24.71	76.48	
10/26/2009	8:07	10/26/09 8:07	0.5	0.0	0.3	10/26/2009	8:07	10/26/09 8:07	36.58	24.72	76.50	
10/26/2009	8:22	10/26/09 8:22	0.5	0.0	0.3	10/26/2009	8:22	10/26/09 8:22	36.67	24.74	76.53	
10/26/2009	8:37	10/26/09 8:37	0.5	0.0	0.3	10/26/2009	8:37	10/26/09 8:37	36.80	24.73	76.52	
10/26/2009	8:52	10/26/09 8:52	0.5	0.0	0.3	10/26/2009	8:52	10/26/09 8:52	36.78	24.72	76.50	
10/26/2009	9:07	10/26/09 9:07	0.5	0.0	0.3	10/26/2009	9:07	10/26/09 9:07	36.85	24.68	76.42	
10/26/2009	9:22	10/26/09 9:22	0.5	0.0	0.3	10/26/2009	9:22	10/26/09 9:22	36.94	24.64	76.36	
10/26/2009	9:37	10/26/09 9:37	0.5	0.0	0.3	10/26/2009	9:37	10/26/09 9:37	36.97	24.66	76.39	
10/26/2009	9:52	10/26/09 9:52	0.5	0.0	0.3	10/26/2009	9:52	10/26/09 9:52	36.88	24.66	76.39	
10/26/2009	10:07	10/26/09 10:07	1.0	-0.5	0.3	10/26/2009	10:07	10/26/09 10:07	36.88	24.64	76.36	
10/26/2009	10:22	10/26/09 10:22	1.0	0.0	0.5	10/26/2009	10:22	10/26/09 10:22	36.87	24.65	76.37	
10/26/2009	10:37	10/26/09 10:37	1.0	0.0	0.5	10/26/2009	10:37	10/26/09 10:37	37.01	24.67	76.40	
10/26/2009	10:52	10/26/09 10:52	0.5	0.0	0.3	10/26/2009	10:52	10/26/09 10:52	37.04	24.70	76.47	
10/26/2009	11:07	10/26/09 11:07	1.0	-0.5	0.3	10/26/2009	11:07	10/26/09 11:07	37.07	24.74	76.52	
10/26/2009	11:22	10/26/09 11:22	1.0	-0.5	0.3	10/26/2009	11:22	10/26/09 11:22	37.12	24.76	76.56	
10/26/2009	11:37	10/26/09 11:37	0.5	-0.5	0.0	10/26/2009	11:37	10/26/09 11:37	37.09	24.82	76.68	
10/26/2009	11:52	10/26/09 11:52	1.0	0.0	0.5	10/26/2009	11:52	10/26/09 11:52	37.06	24.87	76.76	
10/26/2009	12:07	10/26/09 12:07	1.0	-0.5	0.3	10/26/2009	12:07	10/26/09 12:07	37.00	24.90	76.83	
10/26/2009	12:22	10/26/09 12:22	1.0	-0.5	0.3	10/26/2009	12:22	10/26/09 12:22	36.92	24.95	76.92	
10/26/2009	12:37	10/26/09 12:37	2.0	0.0	1.0	10/26/2009	12:37	10/26/09 12:37	36.85	24.98	76.97	
10/26/2009	12:52	10/26/09 12:52	1.0	-0.5	0.3	10/26/2009	12:52	10/26/09 12:52	36.70	25.01	77.02	
10/26/2009	13:07	10/26/09 13:07	1.0	-0.5	0.3	10/26/2009	13:07	10/26/09 13:07	36.67	25.02	77.03	
10/26/2009	13:22	10/26/09 13:22	1.0	0.0	0.5	10/26/2009	13:22	10/26/09 13:22	36.71	25.04	77.08	
10/26/2009	13:37	10/26/09 13:37	1.0	0.0	0.5	10/26/2009	13:37	10/26/09 13:37	36.60	25.06	77.11	
10/26/2009	13:52	10/26/09 13:52	1.0	-0.5	0.3	10/26/2009	13:52	10/26/09 13:52	36.55	25.04	77.08	
10/26/2009	14:07	10/26/09 14:07	1.0	0.0	0.5	10/26/2009	14:07	10/26/09 14:07	36.54	25.06	77.11	
10/26/2009	14:22	10/26/09 14:22	1.0	0.0	0.5	10/26/2009	14:22	10/26/09 14:22	36.50	25.10	77.18	
10/26/2009	14:37	10/26/09 14:37	1.0	-0.5	0.3	10/26/2009	14:37	10/26/09 14:37	36.48	25.15	77.26	
10/26/2009	14:52	10/26/09 14:52	1.0	0.0	0.5	10/26/2009	14:52	10/26/09 14:52	36.51	25.16	77.29	
10/26/2009	15:07	10/26/09 15:07	1.0	0.0	0.5	10/26/2009	15:07	10/26/09 15:07	36.43	25.16	77.29	
10/26/2009	15:22	10/26/09 15:22	1.0	0.0	0.5	10/26/2009	15:22	10/26/09 15:22	36.53	25.19	77.34	
10/26/2009	15:37	10/26/09 15:37	1.0	-0.5	0.3	10/26/2009	15:37	10/26/09 15:37	36.60	25.20	77.36	
10/26/2009	15:52	10/26/09 15:52	1.0	0.0	0.5	10/26/2009	15:52	10/26/09 15:52	36.58	25.22	77.39	
10/26/2009	16:07	10/26/09 16:07	0.5	0.0	0.3	10/26/2009	16:07	10/26/09 16:07	36.56	25.24	77.43	
10/26/2009	16:22	10/26/09 16:22	0.0	0.0	0.0	10/26/2009	16:22	10/26/09 16:22	36.53	25.28	77.50	
10/26/2009	16:37	10/26/09 16:37	0.0	0.0	0.0	10/26/2009	16:37	10/26/09 16:37	36.47	25.29	77.53	
10/26/2009	16:52	10/26/09 16:52	0.0	0.0	0.0	10/26/2009	16:52	10/26/09 16:52	36.42	25.29	77.52	
10/26/2009	17:07	10/26/09 17:07	0.5	0.0	0.3	10/26/2009	17:07	10/26/09 17:07	36.49	25.27	77.49	
10/26/2009	17:22	10/26/09 17:22	0.0	0.0	0.0	10/26/2009	17:22	10/26/09 17:22	36.31	25.25	77.46	
10/26/2009	17:37	10/26/09 17:37	0.0	0.0	0.0	10/26/2009	17:37	10/26/09 17:37	36.14	25.23	77.42	
10/26/2009	17:52	10/26/09 17:52	0.5	0.0	0.3	10/26/2009	17:52	10/26/09 17:52	36.20	25.21	77.37	
10/26/2009	18:07	10/26/09 18:07	0.5	-0.5	0.0	10/26/2009	18:07	10/26/09 18:07	36.22	25.18	77.33	
10/26/2009	18:22	10/26/09 18:22	0.5	0.0	0.3	10/26/2009	18:22	10/26/09 18:22	36.22	25.16	77.29	
10/26/2009	18:37	10/26/09 18:37	0.5	0.0	0.3	10/26/2009	18:37	10/26/09 18:37	36.26	25.14	77.25	
10/26/2009	18:52	10/26/09 18:52	0.0	0.0	0.0	10/26/2009	18:52	10/26/09 18:52	36.30	25.12	77.21	
10/26/2009	19:07	10/26/09 19:07	0.5	0.0	0.3	10/26/2009	19:07	10/26/09 19:07	36.26	25.10	77.17	
10/26/2009	19:22	10/26/09 19:22	0.0	0.0	0.0	10/26/2009	19:22	10/26/09 19:22	36.12	25.08	77.14	

Table G-3

Phase II Pressure Difference Measurements [a]

St. Julien's Creek Annex Building 1556

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
10/26/2009	19:37	10/26/09 19:37	0.0	0.0	0.0	10/26/2009	19:37	10/26/09 19:37	36.10	25.06	77.11	
10/26/2009	19:52	10/26/09 19:52	0.0	0.0	0.0	10/26/2009	19:52	10/26/09 19:52	36.14	25.04	77.08	
10/26/2009	20:07	10/26/09 20:07	0.0	0.0	0.0	10/26/2009	20:07	10/26/09 20:07	35.94	25.03	77.05	
10/26/2009	20:22	10/26/09 20:22	0.0	0.0	0.0	10/26/2009	20:22	10/26/09 20:22	35.84	25.02	77.04	
10/26/2009	20:37	10/26/09 20:37	0.0	0.0	0.0	10/26/2009	20:37	10/26/09 20:37	35.83	25.01	77.01	
10/26/2009	20:52	10/26/09 20:52	0.0	0.0	0.0	10/26/2009	20:52	10/26/09 20:52	35.85	25.00	76.99	
10/26/2009	21:07	10/26/09 21:07	0.5	0.0	0.3	10/26/2009	21:07	10/26/09 21:07	35.91	24.99	76.98	
10/26/2009	21:22	10/26/09 21:22	0.5	0.0	0.3	10/26/2009	21:22	10/26/09 21:22	35.99	24.99	76.97	
10/26/2009	21:37	10/26/09 21:37	0.0	0.0	0.0	10/26/2009	21:37	10/26/09 21:37	35.96	24.98	76.96	
10/26/2009	21:52	10/26/09 21:52	0.0	0.0	0.0	10/26/2009	21:52	10/26/09 21:52	35.84	24.98	76.96	
10/26/2009	22:07	10/26/09 22:07	0.0	0.0	0.0	10/26/2009	22:07	10/26/09 22:07	35.74	24.97	76.95	
10/26/2009	22:22	10/26/09 22:22	0.0	0.0	0.0	10/26/2009	22:22	10/26/09 22:22	35.66	24.96	76.93	
10/26/2009	22:37	10/26/09 22:37	0.0	0.0	0.0	10/26/2009	22:37	10/26/09 22:37	35.58	24.96	76.93	
10/26/2009	22:52	10/26/09 22:52	0.0	0.0	0.0	10/26/2009	22:52	10/26/09 22:52	35.51	24.96	76.92	
10/26/2009	23:07	10/26/09 23:07	0.0	0.0	0.0	10/26/2009	23:07	10/26/09 23:07	35.41	24.95	76.91	
10/26/2009	23:22	10/26/09 23:22	0.5	0.0	0.3	10/26/2009	23:22	10/26/09 23:22	35.34	24.95	76.91	
10/26/2009	23:37	10/26/09 23:37	0.0	0.0	0.0	10/26/2009	23:37	10/26/09 23:37	35.28	24.96	76.92	
10/26/2009	23:52	10/26/09 23:52	0.0	0.0	0.0	10/26/2009	23:52	10/26/09 23:52	35.14	24.97	76.94	
10/27/2009	0:07	10/27/09 0:07	0.0	0.0	0.0	10/27/2009	0:07	10/27/09 0:07	35.04	24.97	76.95	
10/27/2009	0:22	10/27/09 0:22	0.0	0.0	0.0	10/27/2009	0:22	10/27/09 0:22	35.03	24.98	76.96	
10/27/2009	0:37	10/27/09 0:37	0.0	0.0	0.0	10/27/2009	0:37	10/27/09 0:37	35.03	24.99	76.97	
10/27/2009	0:52	10/27/09 0:52	0.0	0.0	0.0	10/27/2009	0:52	10/27/09 0:52	34.87	25.00	76.99	
10/27/2009	1:07	10/27/09 1:07	0.0	0.0	0.0	10/27/2009	1:07	10/27/09 1:07	34.68	25.00	77.00	
10/27/2009	1:22	10/27/09 1:22	0.0	0.0	0.0	10/27/2009	1:22	10/27/09 1:22	34.56	25.01	77.02	
10/27/2009	1:37	10/27/09 1:37	0.0	0.0	0.0	10/27/2009	1:37	10/27/09 1:37	34.49	25.02	77.04	
10/27/2009	1:52	10/27/09 1:52	0.0	0.0	0.0	10/27/2009	1:52	10/27/09 1:52	34.44	25.03	77.06	
10/27/2009	2:07	10/27/09 2:07	0.0	0.0	0.0	10/27/2009	2:07	10/27/09 2:07	34.40	25.04	77.08	
10/27/2009	2:22	10/27/09 2:22	0.0	0.0	0.0	10/27/2009	2:22	10/27/09 2:22	34.31	25.05	77.09	
10/27/2009	2:37	10/27/09 2:37	0.0	0.0	0.0	10/27/2009	2:37	10/27/09 2:37	34.32	25.06	77.11	
10/27/2009	2:52	10/27/09 2:52	0.5	0.0	0.3	10/27/2009	2:52	10/27/09 2:52	34.26	25.08	77.14	
10/27/2009	3:07	10/27/09 3:07	0.0	0.0	0.0	10/27/2009	3:07	10/27/09 3:07	34.10	25.08	77.15	
10/27/2009	3:22	10/27/09 3:22	0.0	0.0	0.0	10/27/2009	3:22	10/27/09 3:22	34.01	25.09	77.17	
10/27/2009	3:37	10/27/09 3:37	0.0	0.0	0.0	10/27/2009	3:37	10/27/09 3:37	33.88	25.10	77.19	
10/27/2009	3:52	10/27/09 3:52	0.0	0.0	0.0	10/27/2009	3:52	10/27/09 3:52	33.80	25.11	77.20	
10/27/2009	4:07	10/27/09 4:07	0.0	0.0	0.0	10/27/2009	4:07	10/27/09 4:07	33.68	25.13	77.23	
10/27/2009	4:22	10/27/09 4:22	0.0	0.0	0.0	10/27/2009	4:22	10/27/09 4:22	33.61	25.14	77.25	
10/27/2009	4:37	10/27/09 4:37	0.0	0.0	0.0	10/27/2009	4:37	10/27/09 4:37	33.49	25.15	77.27	
10/27/2009	4:52	10/27/09 4:52	0.0	0.0	0.0	10/27/2009	4:52	10/27/09 4:52	33.41	25.16	77.28	
10/27/2009	5:07	10/27/09 5:07	0.0	0.0	0.0	10/27/2009	5:07	10/27/09 5:07	33.47	25.17	77.30	
10/27/2009	5:22	10/27/09 5:22	0.0	0.0	0.0	10/27/2009	5:22	10/27/09 5:22	33.55	25.18	77.32	
10/27/2009	5:37	10/27/09 5:37	0.0	0.0	0.0	10/27/2009	5:37	10/27/09 5:37	33.55	25.19	77.34	
10/27/2009	5:52	10/27/09 5:52	0.0	0.0	0.0	10/27/2009	5:52	10/27/09 5:52	33.66	25.20	77.35	
10/27/2009	6:07	10/27/09 6:07	0.0	0.0	0.0	10/27/2009	6:07	10/27/09 6:07	33.76	25.20	77.37	
10/27/2009	6:22	10/27/09 6:22	0.5	0.0	0.3	10/27/2009	6:22	10/27/09 6:22	33.76	25.23	77.42	
10/27/2009	6:37	10/27/09 6:37	0.0	0.0	0.0	10/27/2009	6:37	10/27/09 6:37	33.64	25.27	77.49	
10/27/2009	6:52	10/27/09 6:52	0.5	0.0	0.3	10/27/2009	6:52	10/27/09 6:52	33.61	25.32	77.57	
10/27/2009	7:07	10/27/09 7:07	0.5	0.0	0.3	10/27/2009	7:07	10/27/09 7:07	33.75	25.36	77.65	
10/27/2009	7:22	10/27/09 7:22	0.0	0.0	0.0	10/27/2009	7:22	10/27/09 7:22	33.78	25.40	77.72	
10/27/2009	7:37	10/27/09 7:37	0.5	0.0	0.3	10/27/2009	7:37	10/27/09 7:37	33.84	25.44	77.79	
10/27/2009	7:52	10/27/09 7:52	0.0	0.0	0.0	10/27/2009	7:52	10/27/09 7:52	33.86	25.47	77.84	
10/27/2009	8:07	10/27/09 8:07	0.5	0.0	0.3	10/27/2009	8:07	10/27/09 8:07	33.98	25.48	77.86	
10/27/2009	8:22	10/27/09 8:22	0.0	0.0	0.0	10/27/2009	8:22	10/27/09 8:22	34.00	25.47	77.84	
10/27/2009	8:37	10/27/09 8:37	0.5	0.0	0.3	10/27/2009	8:37	10/27/09 8:37	34.07	25.45	77.80	
10/27/2009	8:52	10/27/09 8:52	0.5	0.0	0.3	10/27/2009	8:52	10/27/09 8:52	34.11	25.42	77.75	

Table G-3

Phase II Pressure Difference Measurements [a]

St. Julien's Creek Annex Building 1556

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
10/27/2009	9:07	10/27/09 9:07	0.5	0.0	0.3	10/27/2009	9:07	10/27/09 9:07	34.16	25.40	77.71	
10/27/2009	9:22	10/27/09 9:22	0.0	0.0	0.0	10/27/2009	9:22	10/27/09 9:22	34.12	25.39	77.70	
10/27/2009	9:37	10/27/09 9:37	0.5	0.0	0.3	10/27/2009	9:37	10/27/09 9:37	34.13	25.40	77.73	
10/27/2009	9:52	10/27/09 9:52	0.0	0.0	0.0	10/27/2009	9:52	10/27/09 9:52	34.03	25.44	77.78	
10/27/2009	10:07	10/27/09 10:07	0.5	0.0	0.3	10/27/2009	10:07	10/27/09 10:07	34.09	25.46	77.83	
10/27/2009	10:22	10/27/09 10:22	0.0	0.0	0.0	10/27/2009	10:22	10/27/09 10:22	34.15	25.49	77.88	
10/27/2009	10:37	10/27/09 10:37	0.0	0.0	0.0	10/27/2009	10:37	10/27/09 10:37	34.11	25.52	77.94	
10/27/2009	10:52	10/27/09 10:52	0.0	0.0	0.0	10/27/2009	10:52	10/27/09 10:52	34.30	25.54	77.97	
10/27/2009	11:07	10/27/09 11:07	0.0	0.0	0.0	10/27/2009	11:07	10/27/09 11:07	34.29	25.56	78.02	
10/27/2009	11:22	10/27/09 11:22	0.0	0.0	0.0	10/27/2009	11:22	10/27/09 11:22	34.32	25.58	78.04	
10/27/2009	11:37	10/27/09 11:37	0.0	0.0	0.0	10/27/2009	11:37	10/27/09 11:37	34.32	25.59	78.06	
10/27/2009	11:52	10/27/09 11:52	0.0	0.0	0.0	10/27/2009	11:52	10/27/09 11:52	34.24	25.59	78.07	
10/27/2009	12:07	10/27/09 12:07	0.0	0.0	0.0	10/27/2009	12:07	10/27/09 12:07	34.13	25.61	78.09	
10/27/2009	12:22	10/27/09 12:22	0.0	0.0	0.0	10/27/2009	12:22	10/27/09 12:22	33.97	25.62	78.12	
10/27/2009	12:37	10/27/09 12:37	0.0	0.0	0.0	10/27/2009	12:37	10/27/09 12:37	33.95	25.64	78.16	
10/27/2009	12:52	10/27/09 12:52	0.0	0.0	0.0	10/27/2009	12:52	10/27/09 12:52	33.87	25.67	78.21	
10/27/2009	13:07	10/27/09 13:07	0.0	-0.5	-0.3	10/27/2009	13:07	10/27/09 13:07	33.78	25.71	78.27	
10/27/2009	13:22	10/27/09 13:22	0.0	0.0	0.0	10/27/2009	13:22	10/27/09 13:22	33.69	25.75	78.35	
10/27/2009	13:37	10/27/09 13:37	0.0	0.0	0.0	10/27/2009	13:37	10/27/09 13:37	33.61	25.80	78.43	
10/27/2009	13:52	10/27/09 13:52	0.0	0.0	0.0	10/27/2009	13:52	10/27/09 13:52	33.66	25.83	78.49	
10/27/2009	14:07	10/27/09 14:07	0.5	0.0	0.3	10/27/2009	14:07	10/27/09 14:07	33.70	25.85	78.53	
10/27/2009	14:22	10/27/09 14:22	0.0	0.0	0.0	10/27/2009	14:22	10/27/09 14:22	33.64	25.87	78.56	
10/27/2009	14:37	10/27/09 14:37	0.0	0.0	0.0	10/27/2009	14:37	10/27/09 14:37	33.77	25.87	78.57	
10/27/2009	14:52	10/27/09 14:52	0.0	-0.5	-0.3	10/27/2009	14:52	10/27/09 14:52	33.61	25.87	78.57	
10/27/2009	15:07	10/27/09 15:07	0.5	0.0	0.3	10/27/2009	15:07	10/27/09 15:07	33.68	25.87	78.56	
10/27/2009	15:22	10/27/09 15:22	0.5	0.0	0.3	10/27/2009	15:22	10/27/09 15:22	33.84	25.87	78.56	
10/27/2009	15:37	10/27/09 15:37	0.0	0.0	0.0	10/27/2009	15:37	10/27/09 15:37	33.83	25.87	78.57	
10/27/2009	15:52	10/27/09 15:52	0.0	0.0	0.0	10/27/2009	15:52	10/27/09 15:52	33.80	25.89	78.59	
10/27/2009	16:07	10/27/09 16:07	0.0	0.0	0.0	10/27/2009	16:07	10/27/09 16:07	33.82	25.90	78.62	
10/27/2009	16:22	10/27/09 16:22	0.0	0.0	0.0	10/27/2009	16:22	10/27/09 16:22	33.62	25.92	78.65	
10/27/2009	16:37	10/27/09 16:37	0.0	0.0	0.0	10/27/2009	16:37	10/27/09 16:37	33.59	25.94	78.68	
10/27/2009	16:52	10/27/09 16:52	0.0	0.0	0.0	10/27/2009	16:52	10/27/09 16:52	33.64	25.95	78.71	
10/27/2009	17:07	10/27/09 17:07	0.0	0.0	0.0	10/27/2009	17:07	10/27/09 17:07	33.82	25.97	78.74	
10/27/2009	17:22	10/27/09 17:22	0.0	0.0	0.0	10/27/2009	17:22	10/27/09 17:22	33.79	25.98	78.76	
10/27/2009	17:37	10/27/09 17:37	0.5	0.0	0.3	10/27/2009	17:37	10/27/09 17:37	33.81	25.99	78.77	
10/27/2009	17:52	10/27/09 17:52	0.5	0.0	0.3	10/27/2009	17:52	10/27/09 17:52	33.86	25.99	78.79	
10/27/2009	18:07	10/27/09 18:07	0.0	0.0	0.0	10/27/2009	18:07	10/27/09 18:07	33.92	26.00	78.80	
10/27/2009	18:22	10/27/09 18:22	0.0	0.0	0.0	10/27/2009	18:22	10/27/09 18:22	33.98	26.00	78.80	
10/27/2009	18:37	10/27/09 18:37	0.0	0.0	0.0	10/27/2009	18:37	10/27/09 18:37	33.98	26.00	78.80	
10/27/2009	18:52	10/27/09 18:52	0.0	0.0	0.0	10/27/2009	18:52	10/27/09 18:52	33.95	26.00	78.80	
10/27/2009	19:07	10/27/09 19:07	0.0	0.0	0.0	10/27/2009	19:07	10/27/09 19:07	33.94	26.00	78.81	
10/27/2009	19:22	10/27/09 19:22	0.5	0.0	0.3	10/27/2009	19:22	10/27/09 19:22	34.17	26.00	78.81	
10/27/2009	19:37	10/27/09 19:37	0.5	0.0	0.3	10/27/2009	19:37	10/27/09 19:37	34.25	26.01	78.81	
10/27/2009	19:52	10/27/09 19:52	0.0	0.0	0.0	10/27/2009	19:52	10/27/09 19:52	34.19	26.01	78.81	
10/27/2009	20:07	10/27/09 20:07	0.0	0.0	0.0	10/27/2009	20:07	10/27/09 20:07	34.11	26.01	78.82	
10/27/2009	20:22	10/27/09 20:22	0.0	0.0	0.0	10/27/2009	20:22	10/27/09 20:22	34.05	26.02	78.83	
10/27/2009	20:37	10/27/09 20:37	0.0	0.0	0.0	10/27/2009	20:37	10/27/09 20:37	33.97	26.02	78.84	
10/27/2009	20:52	10/27/09 20:52	0.0	0.0	0.0	10/27/2009	20:52	10/27/09 20:52	33.82	26.02	78.84	
10/27/2009	21:07	10/27/09 21:07	0.0	0.0	0.0	10/27/2009	21:07	10/27/09 21:07	33.77	26.02	78.84	
10/27/2009	21:22	10/27/09 21:22	0.0	0.0	0.0	10/27/2009	21:22	10/27/09 21:22	33.73	26.02	78.84	
10/27/2009	21:37	10/27/09 21:37	0.5	0.0	0.3	10/27/2009	21:37	10/27/09 21:37	33.78	26.03	78.85	
10/27/2009	21:52	10/27/09 21:52	0.0	0.0	0.0	10/27/2009	21:52	10/27/09 21:52	33.64	26.03	78.86	
10/27/2009	22:07	10/27/09 22:07	0.0	0.0	0.0	10/27/2009	22:07	10/27/09 22:07	33.65	26.04	78.87	
10/27/2009	22:22	10/27/09 22:22	0.0	0.0	0.0	10/27/2009	22:22	10/27/09 22:22	33.72	26.05	78.88	

Table G-3

Phase II Pressure Difference Measurements [a]

St. Julien's Creek Annex Building 1556

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
10/27/2009	22:37	10/27/09 22:37	0.0	0.0	0.0	10/27/2009	22:37	10/27/09 22:37	33.62	26.05	78.89	
10/27/2009	22:52	10/27/09 22:52	0.0	0.0	0.0	10/27/2009	22:52	10/27/09 22:52	33.56	26.06	78.90	
10/27/2009	23:07	10/27/09 23:07	0.0	0.0	0.0	10/27/2009	23:07	10/27/09 23:07	33.53	26.06	78.91	
10/27/2009	23:22	10/27/09 23:22	0.0	0.0	0.0	10/27/2009	23:22	10/27/09 23:22	33.38	26.07	78.92	
10/27/2009	23:37	10/27/09 23:37	0.0	0.0	0.0	10/27/2009	23:37	10/27/09 23:37	33.23	26.07	78.93	
10/27/2009	23:52	10/27/09 23:52	0.0	-0.5	-0.3	10/27/2009	23:52	10/27/09 23:52	33.03	26.07	78.93	
10/28/2009	0:07	10/28/09 0:07	0.0	0.0	0.0	10/28/2009	0:07	10/28/09 0:07	32.90	26.07	78.93	
10/28/2009	0:22	10/28/09 0:22	0.0	0.0	0.0	10/28/2009	0:22	10/28/09 0:22	32.73	26.07	78.93	
10/28/2009	0:37	10/28/09 0:37	0.0	0.0	0.0	10/28/2009	0:37	10/28/09 0:37	32.60	26.07	78.93	
10/28/2009	0:52	10/28/09 0:52	0.0	0.0	0.0	10/28/2009	0:52	10/28/09 0:52	32.51	26.08	78.94	
10/28/2009	1:07	10/28/09 1:07	0.0	0.0	0.0	10/28/2009	1:07	10/28/09 1:07	32.52	26.08	78.95	
10/28/2009	1:22	10/28/09 1:22	0.0	0.0	0.0	10/28/2009	1:22	10/28/09 1:22	32.46	26.09	78.96	
10/28/2009	1:37	10/28/09 1:37	0.0	0.0	0.0	10/28/2009	1:37	10/28/09 1:37	32.32	26.10	78.97	
10/28/2009	1:52	10/28/09 1:52	0.0	0.0	0.0	10/28/2009	1:52	10/28/09 1:52	32.18	26.11	78.99	
10/28/2009	2:07	10/28/09 2:07	0.5	0.0	0.3	10/28/2009	2:07	10/28/09 2:07	32.14	26.12	79.01	
10/28/2009	2:22	10/28/09 2:22	0.0	0.0	0.0	10/28/2009	2:22	10/28/09 2:22	31.95	26.13	79.03	
10/28/2009	2:37	10/28/09 2:37	0.0	-0.5	-0.3	10/28/2009	2:37	10/28/09 2:37	31.79	26.14	79.05	
10/28/2009	2:52	10/28/09 2:52	0.0	-0.5	-0.3	10/28/2009	2:52	10/28/09 2:52	31.71	26.15	79.06	
10/28/2009	3:07	10/28/09 3:07	0.0	0.0	0.0	10/28/2009	3:07	10/28/09 3:07	31.74	26.16	79.08	
10/28/2009	3:22	10/28/09 3:22	0.0	-0.5	-0.3	10/28/2009	3:22	10/28/09 3:22	31.59	26.17	79.10	
10/28/2009	3:37	10/28/09 3:37	0.5	-0.5	0.0	10/28/2009	3:37	10/28/09 3:37	31.43	26.18	79.12	
10/28/2009	3:52	10/28/09 3:52	0.0	-0.5	-0.3	10/28/2009	3:52	10/28/09 3:52	31.32	26.19	79.14	
10/28/2009	4:07	10/28/09 4:07	0.0	-0.5	-0.3	10/28/2009	4:07	10/28/09 4:07	31.10	26.20	79.17	
10/28/2009	4:22	10/28/09 4:22	0.0	-0.5	-0.3	10/28/2009	4:22	10/28/09 4:22	30.83	26.22	79.19	
10/28/2009	4:37	10/28/09 4:37	1.5	-1.0	0.3	10/28/2009	4:37	10/28/09 4:37	31.04	26.23	79.21	
10/28/2009	4:52	10/28/09 4:52	0.5	-1.0	-0.3	10/28/2009	4:52	10/28/09 4:52	30.97	26.25	79.24	
10/28/2009	5:07	10/28/09 5:07	1.0	-0.5	0.3	10/28/2009	5:07	10/28/09 5:07	30.84	26.27	79.28	
10/28/2009	5:22	10/28/09 5:22	0.5	-0.5	0.0	10/28/2009	5:22	10/28/09 5:22	30.90	26.29	79.32	
10/28/2009	5:37	10/28/09 5:37	0.5	-0.5	0.0	10/28/2009	5:37	10/28/09 5:37	30.82	26.31	79.36	
10/28/2009	5:52	10/28/09 5:52	0.0	-0.5	-0.3	10/28/2009	5:52	10/28/09 5:52	30.85	26.34	79.41	
10/28/2009	6:07	10/28/09 6:07	0.5	-0.5	0.0	10/28/2009	6:07	10/28/09 6:07	30.84	26.37	79.46	
10/28/2009	6:22	10/28/09 6:22	0.5	-0.5	0.0	10/28/2009	6:22	10/28/09 6:22	30.89	26.40	79.51	
10/28/2009	6:37	10/28/09 6:37	0.5	-0.5	0.0	10/28/2009	6:37	10/28/09 6:37	30.91	26.42	79.56	
10/28/2009	6:52	10/28/09 6:52	0.5	-0.5	0.0	10/28/2009	6:52	10/28/09 6:52	31.00	26.45	79.61	
10/28/2009	7:07	10/28/09 7:07	0.5	-0.5	0.0	10/28/2009	7:07	10/28/09 7:07	30.99	26.48	79.66	
10/28/2009	7:22	10/28/09 7:22	0.5	0.0	0.3	10/28/2009	7:22	10/28/09 7:22	30.96	26.51	79.72	
10/28/2009	7:37	10/28/09 7:37	0.0	-0.5	-0.3	10/28/2009	7:37	10/28/09 7:37	30.96	26.54	79.77	
10/28/2009	7:52	10/28/09 7:52	0.0	0.0	0.0	10/28/2009	7:52	10/28/09 7:52	30.95	26.58	79.84	
10/28/2009	8:07	10/28/09 8:07	0.5	0.0	0.3	10/28/2009	8:07	10/28/09 8:07	31.01	26.61	79.90	
10/28/2009	8:22	10/28/09 8:22	0.0	0.0	0.0	10/28/2009	8:22	10/28/09 8:22	31.06	26.65	79.97	
10/28/2009	8:37	10/28/09 8:37	0.0	0.0	0.0	10/28/2009	8:37	10/28/09 8:37	31.11	26.69	80.05	
10/28/2009	8:52	10/28/09 8:52	0.5	0.0	0.3	10/28/2009	8:52	10/28/09 8:52	31.24	26.74	80.12	
10/28/2009	9:07	10/28/09 9:07	0.0	0.0	0.0	10/28/2009	9:07	10/28/09 9:07	31.25	26.77	80.19	
10/28/2009	9:22	10/28/09 9:22	0.0	-0.5	-0.3	10/28/2009	9:22	10/28/09 9:22	31.29	26.80	80.24	
10/28/2009	9:37	10/28/09 9:37	0.5	-0.5	0.0	10/28/2009	9:37	10/28/09 9:37	31.29	26.83	80.30	
10/28/2009	9:52	10/28/09 9:52	0.5	-0.5	0.0	10/28/2009	9:52	10/28/09 9:52	31.35	26.87	80.36	
10/28/2009	10:07	10/28/09 10:07	0.5	-1.0	-0.3	10/28/2009	10:07	10/28/09 10:07	31.36	26.91	80.43	
10/28/2009	10:22	10/28/09 10:22	0.5	-0.5	0.0	10/28/2009	10:22	10/28/09 10:22	31.48	26.95	80.51	
10/28/2009	10:37	10/28/09 10:37	0.5	-0.5	0.0	10/28/2009	10:37	10/28/09 10:37	31.47	27.00	80.59	
10/28/2009	10:52	10/28/09 10:52	0.5	0.0	0.3	10/28/2009	10:52	10/28/09 10:52	31.50	27.04	80.66	
10/28/2009	11:07	10/28/09 11:07	0.5	0.0	0.3	10/28/2009	11:07	10/28/09 11:07	31.59	27.07	80.72	
10/28/2009	11:22	10/28/09 11:22	0.5	0.0	0.3	10/28/2009	11:22	10/28/09 11:22	31.62	27.09	80.77	
10/28/2009	11:37	10/28/09 11:37	0.5	-0.5	0.0	10/28/2009	11:37	10/28/09 11:37	31.64	27.11	80.80	
10/28/2009	11:52	10/28/09 11:52	0.5	-0.5	0.0	10/28/2009	11:52	10/28/09 11:52	31.55	27.13	80.83	

Table G-3

Phase II Pressure Difference Measurements [a]

St. Julien's Creek Annex Building 1556

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
10/28/2009	12:07	10/28/09 12:07	0.5	0.0	0.3	10/28/2009	12:07	10/28/09 12:07	31.55	27.14	80.85	
10/28/2009	12:22	10/28/09 12:22	0.5	-0.5	0.0	10/28/2009	12:22	10/28/09 12:22	31.53	27.16	80.89	
10/28/2009	12:37	10/28/09 12:37	0.5	-0.5	0.0	10/28/2009	12:37	10/28/09 12:37	31.53	27.19	80.93	
10/28/2009	12:52	10/28/09 12:52	0.5	0.0	0.3	10/28/2009	12:52	10/28/09 12:52	31.55	27.21	80.97	
10/28/2009	13:07	10/28/09 13:07	0.5	-0.5	0.0	10/28/2009	13:07	10/28/09 13:07	31.53	27.23	81.02	
10/28/2009	13:22	10/28/09 13:22	0.5	-0.5	0.0	10/28/2009	13:22	10/28/09 13:22	31.51	27.25	81.05	
10/28/2009	13:37	10/28/09 13:37	0.5	0.0	0.3	10/28/2009	13:37	10/28/09 13:37	31.46	27.26	81.08	
10/28/2009	13:52	10/28/09 13:52	0.5	-0.5	0.0	10/28/2009	13:52	10/28/09 13:52	31.45	27.27	81.08	
10/28/2009	14:07	10/28/09 14:07	0.5	-0.5	0.0	10/28/2009	14:07	10/28/09 14:07	31.46	27.27	81.08	
10/28/2009	14:22	10/28/09 14:22	0.5	-0.5	0.0	10/28/2009	14:22	10/28/09 14:22	31.48	27.27	81.08	
10/28/2009	14:37	10/28/09 14:37	0.5	0.0	0.3	10/28/2009	14:37	10/28/09 14:37	31.49	27.27	81.09	
10/28/2009	14:52	10/28/09 14:52	0.5	0.0	0.3	10/28/2009	14:52	10/28/09 14:52	31.54	27.27	81.09	
10/28/2009	15:07	10/28/09 15:07	0.5	0.0	0.3	10/28/2009	15:07	10/28/09 15:07	31.59	27.28	81.10	
10/28/2009	15:22	10/28/09 15:22	0.5	0.0	0.3	10/28/2009	15:22	10/28/09 15:22	31.65	27.28	81.10	
10/28/2009	15:37	10/28/09 15:37	0.5	0.0	0.3	10/28/2009	15:37	10/28/09 15:37	31.71	27.28	81.10	
10/28/2009	15:52	10/28/09 15:52	0.0	0.0	0.0	10/28/2009	15:52	10/28/09 15:52	31.69	27.28	81.10	
10/28/2009	16:07	10/28/09 16:07	0.5	0.0	0.3	10/28/2009	16:07	10/28/09 16:07	31.73	27.29	81.12	
10/28/2009	16:22	10/28/09 16:22	0.5	0.0	0.3	10/28/2009	16:22	10/28/09 16:22	31.81	27.30	81.14	
10/28/2009	16:37	10/28/09 16:37	0.5	0.0	0.3	10/28/2009	16:37	10/28/09 16:37	31.90	27.28	81.11	
10/28/2009	16:52	10/28/09 16:52	0.5	0.0	0.3	10/28/2009	16:52	10/28/09 16:52	31.91	27.25	81.04	
10/28/2009	17:07	10/28/09 17:07	0.5	0.0	0.3	10/28/2009	17:07	10/28/09 17:07	32.00	27.21	80.97	
10/28/2009	17:22	10/28/09 17:22	0.0	0.0	0.0	10/28/2009	17:22	10/28/09 17:22	32.04	27.17	80.90	
10/28/2009	17:37	10/28/09 17:37	0.5	0.0	0.3	10/28/2009	17:37	10/28/09 17:37	32.15	27.13	80.83	
10/28/2009	17:52	10/28/09 17:52	0.0	0.0	0.0	10/28/2009	17:52	10/28/09 17:52	32.22	27.09	80.76	
10/28/2009	18:07	10/28/09 18:07	0.5	0.0	0.3	10/28/2009	18:07	10/28/09 18:07	32.37	27.05	80.68	
10/28/2009	18:22	10/28/09 18:22	0.5	0.0	0.3	10/28/2009	18:22	10/28/09 18:22	32.49	27.00	80.61	
10/28/2009	18:37	10/28/09 18:37	0.5	0.0	0.3	10/28/2009	18:37	10/28/09 18:37	32.61	26.96	80.52	
10/28/2009	18:52	10/28/09 18:52	0.5	0.0	0.3	10/28/2009	18:52	10/28/09 18:52	32.74	26.91	80.45	
10/28/2009	19:07	10/28/09 19:07	0.0	0.0	0.0	10/28/2009	19:07	10/28/09 19:07	32.86	26.87	80.37	
10/28/2009	19:22	10/28/09 19:22	0.5	0.0	0.3	10/28/2009	19:22	10/28/09 19:22	32.96	26.83	80.29	
10/28/2009	19:37	10/28/09 19:37	0.0	0.0	0.0	10/28/2009	19:37	10/28/09 19:37	33.00	26.79	80.23	
10/28/2009	19:52	10/28/09 19:52	0.0	0.0	0.0	10/28/2009	19:52	10/28/09 19:52	33.08	26.76	80.16	
10/28/2009	20:07	10/28/09 20:07	0.0	0.0	0.0	10/28/2009	20:07	10/28/09 20:07	33.13	26.73	80.11	
10/28/2009	20:22	10/28/09 20:22	0.0	0.0	0.0	10/28/2009	20:22	10/28/09 20:22	33.26	26.69	80.04	
10/28/2009	20:37	10/28/09 20:37	0.0	0.0	0.0	10/28/2009	20:37	10/28/09 20:37	33.31	26.65	79.98	
10/28/2009	20:52	10/28/09 20:52	0.0	0.0	0.0	10/28/2009	20:52	10/28/09 20:52	33.29	26.62	79.91	
10/28/2009	21:07	10/28/09 21:07	0.0	0.0	0.0	10/28/2009	21:07	10/28/09 21:07	33.32	26.58	79.84	
10/28/2009	21:22	10/28/09 21:22	0.0	0.0	0.0	10/28/2009	21:22	10/28/09 21:22	33.44	26.54	79.78	
10/28/2009	21:37	10/28/09 21:37	0.0	0.0	0.0	10/28/2009	21:37	10/28/09 21:37	33.49	26.51	79.71	
10/28/2009	21:52	10/28/09 21:52	0.0	0.0	0.0	10/28/2009	21:52	10/28/09 21:52	33.57	26.47	79.65	
10/28/2009	22:07	10/28/09 22:07	0.5	0.0	0.3	10/28/2009	22:07	10/28/09 22:07	33.66	26.43	79.58	
10/28/2009	22:22	10/28/09 22:22	0.5	0.0	0.3	10/28/2009	22:22	10/28/09 22:22	33.70	26.39	79.51	
10/28/2009	22:37	10/28/09 22:37	0.0	0.0	0.0	10/28/2009	22:37	10/28/09 22:37	33.70	26.36	79.44	
10/28/2009	22:52	10/28/09 22:52	0.0	0.0	0.0	10/28/2009	22:52	10/28/09 22:52	33.71	26.32	79.37	
10/28/2009	23:07	10/28/09 23:07	0.0	0.0	0.0	10/28/2009	23:07	10/28/09 23:07	33.70	26.29	79.31	
10/28/2009	23:22	10/28/09 23:22	0.0	0.0	0.0	10/28/2009	23:22	10/28/09 23:22	33.75	26.26	79.26	
10/28/2009	23:37	10/28/09 23:37	0.5	0.0	0.3	10/28/2009	23:37	10/28/09 23:37	33.89	26.22	79.20	
10/28/2009	23:52	10/28/09 23:52	0.0	0.0	0.0	10/28/2009	23:52	10/28/09 23:52	33.91	26.19	79.14	
10/29/2009	0:07	10/29/09 0:07	0.0	0.0	0.0	10/29/2009	0:07	10/29/09 0:07	33.92	26.16	79.09	
10/29/2009	0:22	10/29/09 0:22	0.0	0.0	0.0	10/29/2009	0:22	10/29/09 0:22	33.98	26.13	79.03	
10/29/2009	0:37	10/29/09 0:37	0.0	0.0	0.0	10/29/2009	0:37	10/29/09 0:37	34.08	26.10	78.98	
10/29/2009	0:52	10/29/09 0:52	0.0	0.0	0.0	10/29/2009	0:52	10/29/09 0:52	34.14	26.07	78.93	
10/29/2009	1:07	10/29/09 1:07	0.0	0.0	0.0	10/29/2009	1:07	10/29/09 1:07	34.21	26.05	78.89	
10/29/2009	1:22	10/29/09 1:22	0.0	0.0	0.0	10/29/2009	1:22	10/29/09 1:22	34.29	26.03	78.85	

Table G-3

Phase II Pressure Difference Measurements [a]

St. Julien's Creek Annex Building 1556

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
10/29/2009	1:37	10/29/09 1:37	0.0	0.0	0.0	10/29/2009	1:37	10/29/09 1:37	34.37	26.01	78.81	
10/29/2009	1:52	10/29/09 1:52	0.5	0.0	0.3	10/29/2009	1:52	10/29/09 1:52	34.44	25.99	78.78	
10/29/2009	2:07	10/29/09 2:07	0.0	0.0	0.0	10/29/2009	2:07	10/29/09 2:07	34.53	25.97	78.74	
10/29/2009	2:22	10/29/09 2:22	0.0	0.0	0.0	10/29/2009	2:22	10/29/09 2:22	34.54	25.94	78.70	
10/29/2009	2:37	10/29/09 2:37	0.0	0.0	0.0	10/29/2009	2:37	10/29/09 2:37	34.62	25.92	78.66	
10/29/2009	2:52	10/29/09 2:52	0.0	0.0	0.0	10/29/2009	2:52	10/29/09 2:52	34.67	25.90	78.62	
10/29/2009	3:07	10/29/09 3:07	0.0	0.0	0.0	10/29/2009	3:07	10/29/09 3:07	34.72	25.88	78.58	
10/29/2009	3:22	10/29/09 3:22	0.0	0.0	0.0	10/29/2009	3:22	10/29/09 3:22	34.74	25.86	78.55	
10/29/2009	3:37	10/29/09 3:37	0.0	0.0	0.0	10/29/2009	3:37	10/29/09 3:37	34.75	25.84	78.51	
10/29/2009	3:52	10/29/09 3:52	0.0	0.0	0.0	10/29/2009	3:52	10/29/09 3:52	34.74	25.81	78.47	
10/29/2009	4:07	10/29/09 4:07	0.0	0.0	0.0	10/29/2009	4:07	10/29/09 4:07	34.74	25.79	78.42	
10/29/2009	4:22	10/29/09 4:22	0.0	0.0	0.0	10/29/2009	4:22	10/29/09 4:22	34.74	25.76	78.38	
10/29/2009	4:37	10/29/09 4:37	0.0	0.0	0.0	10/29/2009	4:37	10/29/09 4:37	34.77	25.73	78.32	
10/29/2009	4:52	10/29/09 4:52	0.0	0.0	0.0	10/29/2009	4:52	10/29/09 4:52	34.81	25.71	78.27	
10/29/2009	5:07	10/29/09 5:07	0.5	0.0	0.3	10/29/2009	5:07	10/29/09 5:07	34.95	25.68	78.22	
10/29/2009	5:22	10/29/09 5:22	0.5	0.0	0.3	10/29/2009	5:22	10/29/09 5:22	35.12	25.66	78.18	
10/29/2009	5:37	10/29/09 5:37	0.0	0.0	0.0	10/29/2009	5:37	10/29/09 5:37	35.20	25.63	78.13	
10/29/2009	5:52	10/29/09 5:52	0.0	0.0	0.0	10/29/2009	5:52	10/29/09 5:52	35.36	25.61	78.09	
10/29/2009	6:07	10/29/09 6:07	0.0	0.0	0.0	10/29/2009	6:07	10/29/09 6:07	35.48	25.59	78.06	
10/29/2009	6:22	10/29/09 6:22	0.5	0.0	0.3	10/29/2009	6:22	10/29/09 6:22	35.55	25.59	78.06	
10/29/2009	6:37	10/29/09 6:37	0.0	0.0	0.0	10/29/2009	6:37	10/29/09 6:37	35.57	25.61	78.10	
10/29/2009	6:52	10/29/09 6:52	0.0	0.0	0.0	10/29/2009	6:52	10/29/09 6:52	35.65	25.65	78.16	
10/29/2009	7:07	10/29/09 7:07	0.0	0.0	0.0	10/29/2009	7:07	10/29/09 7:07	35.76	25.69	78.23	
10/29/2009	7:22	10/29/09 7:22	0.5	0.0	0.3	10/29/2009	7:22	10/29/09 7:22	35.84	25.72	78.30	
10/29/2009	7:37	10/29/09 7:37	0.5	0.0	0.3	10/29/2009	7:37	10/29/09 7:37	35.89	25.76	78.36	
10/29/2009	7:52	10/29/09 7:52	0.5	0.0	0.3	10/29/2009	7:52	10/29/09 7:52	35.97	25.72	78.30	
10/29/2009	8:07	10/29/09 8:07	0.5	0.0	0.3	10/29/2009	8:07	10/29/09 8:07	36.10	25.61	78.09	
10/29/2009	8:22	10/29/09 8:22	1.0	0.0	0.5	10/29/2009	8:22	10/29/09 8:22	36.19	25.50	77.90	
10/29/2009	8:37	10/29/09 8:37	0.5	0.0	0.3	10/29/2009	8:37	10/29/09 8:37	36.32	25.44	77.80	
10/29/2009	8:52	10/29/09 8:52	0.5	0.0	0.3	10/29/2009	8:52	10/29/09 8:52	36.46	25.40	77.72	
10/29/2009	9:07	10/29/09 9:07	0.5	0.0	0.3	10/29/2009	9:07	10/29/09 9:07	36.52	25.34	77.61	
10/29/2009	9:22	10/29/09 9:22	1.0	0.0	0.5	10/29/2009	9:22	10/29/09 9:22	36.53	25.29	77.51	
10/29/2009	9:37	10/29/09 9:37	1.0	0.0	0.5	10/29/2009	9:37	10/29/09 9:37	36.58	25.23	77.42	
10/29/2009	9:52	10/29/09 9:52	1.0	0.0	0.5	10/29/2009	9:52	10/29/09 9:52	36.59	25.20	77.36	
10/29/2009	10:07	10/29/09 10:07	1.0	0.0	0.5	10/29/2009	10:07	10/29/09 10:07	36.68	25.16	77.29	
10/29/2009	10:22	10/29/09 10:22	0.5	0.0	0.3	10/29/2009	10:22	10/29/09 10:22	36.78	25.17	77.31	
10/29/2009	10:37	10/29/09 10:37	0.5	0.0	0.3	10/29/2009	10:37	10/29/09 10:37	36.85	25.22	77.39	
10/29/2009	10:52	10/29/09 10:52	0.0	0.0	0.0	10/29/2009	10:52	10/29/09 10:52	36.86	25.26	77.46	
10/29/2009	11:07	10/29/09 11:07	0.5	0.0	0.3	10/29/2009	11:07	10/29/09 11:07	36.89	25.30	77.53	
10/29/2009	11:22	10/29/09 11:22	1.0	0.0	0.5	10/29/2009	11:22	10/29/09 11:22	36.98	25.30	77.53	
10/29/2009	11:37	10/29/09 11:37	1.0	0.0	0.5	10/29/2009	11:37	10/29/09 11:37	37.00	25.24	77.44	
10/29/2009	11:52	10/29/09 11:52	0.5	0.0	0.3	10/29/2009	11:52	10/29/09 11:52	37.01	25.23	77.41	
10/29/2009	12:07	10/29/09 12:07	0.5	0.0	0.3	10/29/2009	12:07	10/29/09 12:07	36.95	25.22	77.39	
10/29/2009	12:22	10/29/09 12:22	1.5	0.0	0.8	10/29/2009	12:22	10/29/09 12:22	36.93	25.18	77.32	
10/29/2009	12:37	10/29/09 12:37	1.0	0.0	0.5	10/29/2009	12:37	10/29/09 12:37	36.90	25.14	77.25	
10/29/2009	12:52	10/29/09 12:52	0.5	0.0	0.3	10/29/2009	12:52	10/29/09 12:52	36.84	25.18	77.33	
10/29/2009	13:07	10/29/09 13:07	0.5	0.0	0.3	10/29/2009	13:07	10/29/09 13:07	36.79	25.22	77.39	
10/29/2009	13:22	10/29/09 13:22	0.5	0.0	0.3	10/29/2009	13:22	10/29/09 13:22	36.69	25.21	77.37	
10/29/2009	13:37	10/29/09 13:37	0.5	0.0	0.3	10/29/2009	13:37	10/29/09 13:37	36.72	25.20	77.36	
10/29/2009	13:52	10/29/09 13:52	0.5	0.0	0.3	10/29/2009	13:52	10/29/09 13:52	36.76	25.18	77.32	
10/29/2009	14:07	10/29/09 14:07	0.5	0.0	0.3	10/29/2009	14:07	10/29/09 14:07	36.83	25.15	77.26	
10/29/2009	14:22	10/29/09 14:22	0.5	0.0	0.3	10/29/2009	14:22	10/29/09 14:22	36.75	25.10	77.17	
10/29/2009	14:37	10/29/09 14:37	0.5	0.0	0.3	10/29/2009	14:37	10/29/09 14:37	36.65	25.08	77.15	
10/29/2009	14:52	10/29/09 14:52	1.0	0.0	0.5	10/29/2009	14:52	10/29/09 14:52	36.58	25.08	77.14	

Table G-3

Phase II Pressure Difference Measurements [a]

St. Julien's Creek Annex Building 1556

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
10/29/2009	15:07	10/29/09 15:07	0.5	0.0	0.3	10/29/2009	15:07	10/29/09 15:07	36.65	25.06	77.10	
10/29/2009	15:22	10/29/09 15:22	0.5	0.0	0.3	10/29/2009	15:22	10/29/09 15:22	36.58	25.09	77.16	
10/29/2009	15:37	10/29/09 15:37	1.0	-0.5	0.3	10/29/2009	15:37	10/29/09 15:37	36.73	25.09	77.17	
10/29/2009	15:52	10/29/09 15:52	0.5	0.0	0.3	10/29/2009	15:52	10/29/09 15:52	36.79	25.13	77.23	
10/29/2009	16:07	10/29/09 16:07	0.0	0.0	0.0	10/29/2009	16:07	10/29/09 16:07	36.84	25.20	77.36	
10/29/2009	16:22	10/29/09 16:22	0.5	0.0	0.3	10/29/2009	16:22	10/29/09 16:22	36.84	25.26	77.46	
10/29/2009	16:37	10/29/09 16:37	0.0	0.0	0.0	10/29/2009	16:37	10/29/09 16:37	36.84	25.30	77.53	
10/29/2009	16:52	10/29/09 16:52	0.5	0.0	0.3	10/29/2009	16:52	10/29/09 16:52	36.81	25.32	77.58	
10/29/2009	17:07	10/29/09 17:07	0.5	0.0	0.3	10/29/2009	17:07	10/29/09 17:07	36.87	25.34	77.62	
10/29/2009	17:22	10/29/09 17:22	0.0	0.0	0.0	10/29/2009	17:22	10/29/09 17:22	36.88	25.35	77.64	
10/29/2009	17:37	10/29/09 17:37	0.5	0.0	0.3	10/29/2009	17:37	10/29/09 17:37	36.91	25.36	77.64	
10/29/2009	17:52	10/29/09 17:52	0.5	0.0	0.3	10/29/2009	17:52	10/29/09 17:52	36.93	25.36	77.64	
10/29/2009	18:07	10/29/09 18:07	0.0	0.0	0.0	10/29/2009	18:07	10/29/09 18:07	36.90	25.35	77.63	
10/29/2009	18:22	10/29/09 18:22	0.5	0.0	0.3	10/29/2009	18:22	10/29/09 18:22	36.98	25.34	77.61	
10/29/2009	18:37	10/29/09 18:37	0.5	0.0	0.3	10/29/2009	18:37	10/29/09 18:37	37.05	25.33	77.59	
10/29/2009	18:52	10/29/09 18:52	0.0	0.0	0.0	10/29/2009	18:52	10/29/09 18:52	37.13	25.31	77.57	
10/29/2009	19:07	10/29/09 19:07	0.0	0.0	0.0	10/29/2009	19:07	10/29/09 19:07	37.16	25.30	77.54	
10/29/2009	19:22	10/29/09 19:22	0.0	0.0	0.0	10/29/2009	19:22	10/29/09 19:22	37.14	25.29	77.52	
10/29/2009	19:37	10/29/09 19:37	0.5	0.0	0.3	10/29/2009	19:37	10/29/09 19:37	37.10	25.27	77.49	
10/29/2009	19:52	10/29/09 19:52	0.5	0.0	0.3	10/29/2009	19:52	10/29/09 19:52	37.18	25.26	77.46	
10/29/2009	20:07	10/29/09 20:07	0.5	0.0	0.3	10/29/2009	20:07	10/29/09 20:07	37.19	25.25	77.44	
10/29/2009	20:22	10/29/09 20:22	0.5	0.0	0.3	10/29/2009	20:22	10/29/09 20:22	37.26	25.23	77.42	
10/29/2009	20:37	10/29/09 20:37	0.5	0.0	0.3	10/29/2009	20:37	10/29/09 20:37	37.29	25.22	77.40	
10/29/2009	20:52	10/29/09 20:52	0.5	0.0	0.3	10/29/2009	20:52	10/29/09 20:52	37.37	25.21	77.37	
10/29/2009	21:07	10/29/09 21:07	0.5	0.0	0.3	10/29/2009	21:07	10/29/09 21:07	37.37	25.20	77.36	
10/29/2009	21:22	10/29/09 21:22	0.5	0.0	0.3	10/29/2009	21:22	10/29/09 21:22	37.38	25.19	77.33	
10/29/2009	21:37	10/29/09 21:37	0.5	0.0	0.3	10/29/2009	21:37	10/29/09 21:37	37.44	25.17	77.31	
10/29/2009	21:52	10/29/09 21:52	0.5	0.0	0.3	10/29/2009	21:52	10/29/09 21:52	37.44	25.16	77.28	
10/29/2009	22:07	10/29/09 22:07	0.0	0.0	0.0	10/29/2009	22:07	10/29/09 22:07	37.48	25.14	77.26	
10/29/2009	22:22	10/29/09 22:22	0.5	0.0	0.3	10/29/2009	22:22	10/29/09 22:22	37.51	25.13	77.23	
10/29/2009	22:37	10/29/09 22:37	0.0	0.0	0.0	10/29/2009	22:37	10/29/09 22:37	37.47	25.11	77.20	
10/29/2009	22:52	10/29/09 22:52	0.0	0.0	0.0	10/29/2009	22:52	10/29/09 22:52	37.39	25.10	77.17	
10/29/2009	23:07	10/29/09 23:07	0.0	0.0	0.0	10/29/2009	23:07	10/29/09 23:07	37.32	25.08	77.14	
10/29/2009	23:22	10/29/09 23:22	0.5	0.0	0.3	10/29/2009	23:22	10/29/09 23:22	37.29	25.06	77.11	
10/29/2009	23:37	10/29/09 23:37	0.0	0.0	0.0	10/29/2009	23:37	10/29/09 23:37	37.21	25.05	77.08	
10/29/2009	23:52	10/29/09 23:52	0.0	0.0	0.0	10/29/2009	23:52	10/29/09 23:52	37.22	25.03	77.05	
10/30/2009	0:07	10/30/09 0:07	0.0	0.0	0.0	10/30/2009	0:07	10/30/09 0:07	37.17	25.02	77.03	
10/30/2009	0:22	10/30/09 0:22	0.0	0.0	0.0	10/30/2009	0:22	10/30/09 0:22	37.21	25.01	77.01	
10/30/2009	0:37	10/30/09 0:37	0.0	0.0	0.0	10/30/2009	0:37	10/30/09 0:37	37.21	24.99	76.98	
10/30/2009	0:52	10/30/09 0:52	0.0	0.0	0.0	10/30/2009	0:52	10/30/09 0:52	37.16	24.98	76.96	
10/30/2009	1:07	10/30/09 1:07	0.5	0.0	0.3	10/30/2009	1:07	10/30/09 1:07	37.20	24.96	76.93	
10/30/2009	1:22	10/30/09 1:22	0.0	0.0	0.0	10/30/2009	1:22	10/30/09 1:22	37.16	24.95	76.91	
10/30/2009	1:37	10/30/09 1:37	0.0	0.0	0.0	10/30/2009	1:37	10/30/09 1:37	37.08	24.94	76.89	
10/30/2009	1:52	10/30/09 1:52	0.0	0.0	0.0	10/30/2009	1:52	10/30/09 1:52	37.00	24.92	76.86	
10/30/2009	2:07	10/30/09 2:07	0.0	0.0	0.0	10/30/2009	2:07	10/30/09 2:07	36.97	24.90	76.83	
10/30/2009	2:22	10/30/09 2:22	0.0	0.0	0.0	10/30/2009	2:22	10/30/09 2:22	36.84	24.88	76.79	
10/30/2009	2:37	10/30/09 2:37	0.0	0.0	0.0	10/30/2009	2:37	10/30/09 2:37	36.87	24.86	76.75	
10/30/2009	2:52	10/30/09 2:52	0.0	0.0	0.0	10/30/2009	2:52	10/30/09 2:52	36.80	24.85	76.72	
10/30/2009	3:07	10/30/09 3:07	0.0	0.0	0.0	10/30/2009	3:07	10/30/09 3:07	36.80	24.83	76.70	
10/30/2009	3:22	10/30/09 3:22	0.0	0.0	0.0	10/30/2009	3:22	10/30/09 3:22	36.77	24.82	76.68	
10/30/2009	3:37	10/30/09 3:37	0.0	0.0	0.0	10/30/2009	3:37	10/30/09 3:37	36.68	24.81	76.66	
10/30/2009	3:52	10/30/09 3:52	0.0	0.0	0.0	10/30/2009	3:52	10/30/09 3:52	36.63	24.80	76.64	
10/30/2009	4:07	10/30/09 4:07	0.5	0.0	0.3	10/30/2009	4:07	10/30/09 4:07	36.69	24.79	76.62	
10/30/2009	4:22	10/30/09 4:22	0.0	0.0	0.0	10/30/2009	4:22	10/30/09 4:22	36.73	24.78	76.61	

Table G-3

Phase II Pressure Difference Measurements [a]

St. Julien's Creek Annex Building 1556

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
10/30/2009	4:37	10/30/09 4:37	0.0	0.0	0.0	10/30/2009	4:37	10/30/09 4:37	36.76	24.78	76.60	
10/30/2009	4:52	10/30/09 4:52	0.0	0.0	0.0	10/30/2009	4:52	10/30/09 4:52	36.80	24.77	76.59	
10/30/2009	5:07	10/30/09 5:07	0.5	0.0	0.3	10/30/2009	5:07	10/30/09 5:07	36.89	24.77	76.58	
10/30/2009	5:22	10/30/09 5:22	0.0	0.0	0.0	10/30/2009	5:22	10/30/09 5:22	36.95	24.76	76.57	
10/30/2009	5:37	10/30/09 5:37	0.0	0.0	0.0	10/30/2009	5:37	10/30/09 5:37	36.96	24.75	76.56	
10/30/2009	5:52	10/30/09 5:52	0.0	0.0	0.0	10/30/2009	5:52	10/30/09 5:52	36.92	24.75	76.55	
10/30/2009	6:07	10/30/09 6:07	0.0	0.0	0.0	10/30/2009	6:07	10/30/09 6:07	36.98	24.76	76.57	
10/30/2009	6:22	10/30/09 6:22	0.0	0.0	0.0	10/30/2009	6:22	10/30/09 6:22	37.03	24.80	76.64	
10/30/2009	6:37	10/30/09 6:37	0.0	0.0	0.0	10/30/2009	6:37	10/30/09 6:37	36.99	24.84	76.71	
10/30/2009	6:52	10/30/09 6:52	0.0	0.0	0.0	10/30/2009	6:52	10/30/09 6:52	36.99	24.89	76.80	
10/30/2009	7:07	10/30/09 7:07	0.5	0.0	0.3	10/30/2009	7:07	10/30/09 7:07	37.05	24.93	76.87	
10/30/2009	7:22	10/30/09 7:22	0.0	0.0	0.0	10/30/2009	7:22	10/30/09 7:22	37.08	24.96	76.93	
10/30/2009	7:37	10/30/09 7:37	0.0	0.0	0.0	10/30/2009	7:37	10/30/09 7:37	37.03	25.00	76.99	
10/30/2009	7:52	10/30/09 7:52	0.5	0.0	0.3	10/30/2009	7:52	10/30/09 7:52	37.07	24.97	76.94	
10/30/2009	8:07	10/30/09 8:07	0.5	0.0	0.3	10/30/2009	8:07	10/30/09 8:07	37.08	24.85	76.73	
10/30/2009	8:22	10/30/09 8:22	0.5	0.0	0.3	10/30/2009	8:22	10/30/09 8:22	37.13	24.75	76.55	
10/30/2009	8:37	10/30/09 8:37	0.5	0.0	0.3	10/30/2009	8:37	10/30/09 8:37	37.18	24.66	76.39	
10/30/2009	8:52	10/30/09 8:52	0.5	0.0	0.3	10/30/2009	8:52	10/30/09 8:52	37.22	24.60	76.29	
10/30/2009	9:07	10/30/09 9:07	0.5	0.0	0.3	10/30/2009	9:07	10/30/09 9:07	37.32	24.58	76.24	
10/30/2009	9:22	10/30/09 9:22	0.0	0.0	0.0	10/30/2009	9:22	10/30/09 9:22	37.29	24.56	76.21	
10/30/2009	9:37	10/30/09 9:37	0.0	0.0	0.0	10/30/2009	9:37	10/30/09 9:37	37.26	24.57	76.22	
10/30/2009	9:52	10/30/09 9:52	0.5	0.0	0.3	10/30/2009	9:52	10/30/09 9:52	37.27	24.57	76.22	
10/30/2009	10:07	10/30/09 10:07	0.5	0.0	0.3	10/30/2009	10:07	10/30/09 10:07	37.21	24.58	76.24	
10/30/2009	10:22	10/30/09 10:22	0.5	0.0	0.3	10/30/2009	10:22	10/30/09 10:22	37.24	24.57	76.23	

Notes:

a : Differential pressure measurements are monitored continuously and the maximum and minimum differential pressure in Pascals [Pa] are recorded during each 15 minute monitoring period.

b : Average maximum and average minimum differential pressure over seven day monitoring period (October 23 to October 30, 2009).

c : Average maximum and average minimum differential pressure during work hours or during night time hours over each day of the seven day monitoring period (October 23 to October 30, 2009).

d: Differential pressure measurements were made using a Omniguard 4 differential pressure monitor with data logger (http://www.engsolinc.com/docs/og/OG4broch.pdf).

e : Barometric pressure measurements were made using a Solinst barometric data logger (http://www.solinst.com/Downloads/3001/3001Manual/Introduction/Barologger.html).

Table G-4
Phase II Pressure Difference Measurements a
St. Julien's Creek Annex Building 47

Averages over all measurements: [b]		
Maximum Differential Pressure:	0.7	Pa
Minimum Differential Pressure:	-1.6	Pa

Averages during Work Hours and Night Time: [c]

		Work Hours, Daily 10-hour Average Pressure Difference (7 am to 5 pm)		**Night Time, Daily 14-hour Average Pressure Difference (5 pm to 7 am)**	
Date	**Time**	**max (Pa)**	**min (Pa)**	**max (Pa)**	**min (Pa)**
10/23/2009	average	0.75	-2.71	0.45	-1.05
10/24/2009	average	1.63	-3.75	0.72	-2.31
10/25/2009	average	0.68	-1.53	-0.10	-0.94
10/26/2009	average	1.08	-0.79	0.21	-0.95
10/27/2009	average	0.10	-2.38	0.11	-1.31
10/28/2009	average	0.98	-5.10	0.04	-1.04
10/29/2009	average	3.43	-0.09	0.20	-0.77
10/30/2009	average	2.19	-0.31	N/A	N/A
	Median:	1.03	-1.95	0.20	-1.04

Date	**Time**	**Date + Time**	**Maximum Differential Pressure**[d]	**Maximum Differential Pressure**[d]	**Average Pressure [Pa]**	**Date**	**Time**	**Date + Time**	**Indoor Barometric Pressure (in)** [e]	**Temperature (°C)**	**Temperature (°F)**	**Notes**
						10/23/2009	13:18	10/23/2009 13:18	33.38	23.67	74.60	
10/23/2009	13:33	10/23/2009 13:33	1	-2.5	-0.8	10/23/2009	13:33	10/23/2009 13:33	33.32	24.01	75.22	
10/23/2009	13:48	10/23/2009 13:48	1.5	-3.5	-1.0	10/23/2009	13:48	10/23/2009 13:48	33.22	23.66	74.59	
10/23/2009	14:03	10/23/2009 14:03	1	-4.5	-1.8	10/23/2009	14:03	10/23/2009 14:03	33.13	23.45	74.21	
10/23/2009	14:18	10/23/2009 14:18	1	-3	-1.0	10/23/2009	14:18	10/23/2009 14:18	33.12	23.32	73.97	
10/23/2009	14:33	10/23/2009 14:33	0.5	-2	-0.8	10/23/2009	14:33	10/23/2009 14:33	33.04	23.23	73.81	
10/23/2009	14:48	10/23/2009 14:48	0.5	-3	-1.3	10/23/2009	14:48	10/23/2009 14:48	33.04	23.17	73.71	
10/23/2009	15:03	10/23/2009 15:03	0.5	-2.5	-1.0	10/23/2009	15:03	10/23/2009 15:03	33.01	23.14	73.64	
10/23/2009	15:18	10/23/2009 15:18	0.5	-2.5	-1.0	10/23/2009	15:18	10/23/2009 15:18	32.93	23.15	73.67	
10/23/2009	15:33	10/23/2009 15:33	1	-3	-1.0	10/23/2009	15:33	10/23/2009 15:33	32.90	23.23	73.81	
10/23/2009	15:48	10/23/2009 15:48	0.5	-2	-0.8	10/23/2009	15:48	10/23/2009 15:48	32.84	23.33	74.00	
10/23/2009	16:03	10/23/2009 16:03	0.5	-2.5	-1.0	10/23/2009	16:03	10/23/2009 16:03	32.78	23.44	74.20	
10/23/2009	16:18	10/23/2009 16:18	1	-2.5	-0.8	10/23/2009	16:18	10/23/2009 16:18	32.82	23.55	74.40	
10/23/2009	16:33	10/23/2009 16:33	1	-2.5	-0.8	10/23/2009	16:33	10/23/2009 16:33	32.77	23.61	74.50	
10/23/2009	16:48	10/23/2009 16:48	0	-2	-1.0	10/23/2009	16:48	10/23/2009 16:48	32.83	23.64	74.54	
10/23/2009	17:03	10/23/2009 17:03	0.5	-3	-1.3	10/23/2009	17:03	10/23/2009 17:03	32.86	23.65	74.56	
10/23/2009	17:18	10/23/2009 17:18	0.5	-1	-0.3	10/23/2009	17:18	10/23/2009 17:18	32.89	23.67	74.60	
10/23/2009	17:33	10/23/2009 17:33	1	-1	0.0	10/23/2009	17:33	10/23/2009 17:33	32.89	23.68	74.63	
10/23/2009	17:48	10/23/2009 17:48	0.5	-1	-0.3	10/23/2009	17:48	10/23/2009 17:48	32.91	23.66	74.60	
10/23/2009	18:03	10/23/2009 18:03	0.5	-1	-0.3	10/23/2009	18:03	10/23/2009 18:03	32.97	23.61	74.50	
10/23/2009	18:18	10/23/2009 18:18	0	-0.5	-0.3	10/23/2009	18:18	10/23/2009 18:18	33.01	23.55	74.40	
10/23/2009	18:33	10/23/2009 18:33	0.5	-0.5	0.0	10/23/2009	18:33	10/23/2009 18:33	33.04	23.49	74.27	
10/23/2009	18:48	10/23/2009 18:48	0.5	-0.5	0.0	10/23/2009	18:48	10/23/2009 18:48	33.08	23.41	74.14	
10/23/2009	19:03	10/23/2009 19:03	0.5	-0.5	0.0	10/23/2009	19:03	10/23/2009 19:03	33.12	23.35	74.03	
10/23/2009	19:18	10/23/2009 19:18	0.5	-0.5	0.0	10/23/2009	19:18	10/23/2009 19:18	33.14	23.28	73.91	
10/23/2009	19:33	10/23/2009 19:33	0.5	-0.5	0.0	10/23/2009	19:33	10/23/2009 19:33	33.21	23.23	73.81	
10/23/2009	19:48	10/23/2009 19:48	0	-0.5	-0.3	10/23/2009	19:48	10/23/2009 19:48	33.23	23.17	73.71	
10/23/2009	20:03	10/23/2009 20:03	0	-0.5	-0.3	10/23/2009	20:03	10/23/2009 20:03	33.20	23.12	73.61	
10/23/2009	20:18	10/23/2009 20:18	0	-0.5	-0.3	10/23/2009	20:18	10/23/2009 20:18	33.19	23.08	73.54	
10/23/2009	20:33	10/23/2009 20:33	0.5	-0.5	0.0	10/23/2009	20:33	10/23/2009 20:33	33.15	23.03	73.45	
10/23/2009	20:48	10/23/2009 20:48	0.5	-0.5	0.0	10/23/2009	20:48	10/23/2009 20:48	33.13	22.99	73.38	

Table G-4
Phase II Pressure Difference Measurements a
St. Julien's Creek Annex Building 47

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
10/23/2009	21:03	10/23/2009 21:03	0	-0.5	-0.3	10/23/2009	21:03	10/23/2009 21:03	33.14	22.95	73.31	
10/23/2009	21:18	10/23/2009 21:18	0	-1	-0.5	10/23/2009	21:18	10/23/2009 21:18	33.15	22.92	73.25	
10/23/2009	21:33	10/23/2009 21:33	0	-0.5	-0.3	10/23/2009	21:33	10/23/2009 21:33	33.15	22.88	73.19	
10/23/2009	21:48	10/23/2009 21:48	0	-1	-0.5	10/23/2009	21:48	10/23/2009 21:48	33.13	22.85	73.12	
10/23/2009	22:03	10/23/2009 22:03	0.5	-1	-0.3	10/23/2009	22:03	10/23/2009 22:03	33.18	22.82	73.08	
10/23/2009	22:18	10/23/2009 22:18	0	-1	-0.5	10/23/2009	22:18	10/23/2009 22:18	33.17	22.79	73.01	
10/23/2009	22:33	10/23/2009 22:33	0.5	-0.5	0.0	10/23/2009	22:33	10/23/2009 22:33	33.14	22.76	72.97	
10/23/2009	22:48	10/23/2009 22:48	0.5	-1	-0.3	10/23/2009	22:48	10/23/2009 22:48	33.08	22.73	72.91	
10/23/2009	23:03	10/23/2009 23:03	0	-0.5	-0.3	10/23/2009	23:03	10/23/2009 23:03	33.03	22.71	72.87	
10/23/2009	23:18	10/23/2009 23:18	0	-1	-0.5	10/23/2009	23:18	10/23/2009 23:18	32.95	22.68	72.83	
10/23/2009	23:33	10/23/2009 23:33	0	-0.5	-0.3	10/23/2009	23:33	10/23/2009 23:33	32.89	22.66	72.79	
10/23/2009	23:48	10/23/2009 23:48	0	-0.5	-0.3	10/23/2009	23:48	10/23/2009 23:48	32.88	22.64	72.75	
10/24/2009	0:03	10/24/2009 0:03	0.5	-0.5	0.0	10/24/2009	0:03	10/24/2009 0:03	32.81	22.62	72.71	
10/24/2009	0:18	10/24/2009 0:18	0.5	-1	-0.3	10/24/2009	0:18	10/24/2009 0:18	32.73	22.60	72.69	
10/24/2009	0:33	10/24/2009 0:33	0.5	-1	-0.3	10/24/2009	0:33	10/24/2009 0:33	32.73	22.58	72.65	
10/24/2009	0:48	10/24/2009 0:48	0.5	-0.5	0.0	10/24/2009	0:48	10/24/2009 0:48	32.65	22.57	72.63	
10/24/2009	1:03	10/24/2009 1:03	0.5	-1	-0.3	10/24/2009	1:03	10/24/2009 1:03	32.61	22.55	72.60	
10/24/2009	1:18	10/24/2009 1:18	0.5	-1	-0.3	10/24/2009	1:18	10/24/2009 1:18	32.59	22.54	72.57	
10/24/2009	1:33	10/24/2009 1:33	0.5	-2	-0.8	10/24/2009	1:33	10/24/2009 1:33	32.58	22.52	72.54	
10/24/2009	1:48	10/24/2009 1:48	1	-1	0.0	10/24/2009	1:48	10/24/2009 1:48	32.49	22.51	72.52	
10/24/2009	2:03	10/24/2009 2:03	0.5	-1.5	-0.5	10/24/2009	2:03	10/24/2009 2:03	32.53	22.50	72.50	
10/24/2009	2:18	10/24/2009 2:18	0.5	-1	-0.3	10/24/2009	2:18	10/24/2009 2:18	32.48	22.48	72.47	
10/24/2009	2:33	10/24/2009 2:33	1	-1	0.0	10/24/2009	2:33	10/24/2009 2:33	32.42	22.48	72.46	
10/24/2009	2:48	10/24/2009 2:48	0.5	-1	-0.3	10/24/2009	2:48	10/24/2009 2:48	32.37	22.46	72.43	
10/24/2009	3:03	10/24/2009 3:03	0.5	-1	-0.3	10/24/2009	3:03	10/24/2009 3:03	32.28	22.45	72.41	
10/24/2009	3:18	10/24/2009 3:18	0.5	-1.5	-0.5	10/24/2009	3:18	10/24/2009 3:18	32.26	22.44	72.39	
10/24/2009	3:33	10/24/2009 3:33	0.5	-1.5	-0.5	10/24/2009	3:33	10/24/2009 3:33	32.14	22.43	72.37	
10/24/2009	3:48	10/24/2009 3:48	0.5	-1.5	-0.5	10/24/2009	3:48	10/24/2009 3:48	32.03	22.42	72.36	
10/24/2009	4:03	10/24/2009 4:03	0.5	-1.5	-0.5	10/24/2009	4:03	10/24/2009 4:03	31.99	22.41	72.33	
10/24/2009	4:18	10/24/2009 4:18	0.5	-1.5	-0.5	10/24/2009	4:18	10/24/2009 4:18	31.98	22.40	72.33	
10/24/2009	4:33	10/24/2009 4:33	0.5	-2	-0.8	10/24/2009	4:33	10/24/2009 4:33	31.94	22.39	72.31	
10/24/2009	4:48	10/24/2009 4:48	1.5	-2	-0.3	10/24/2009	4:48	10/24/2009 4:48	31.88	22.39	72.30	
10/24/2009	5:03	10/24/2009 5:03	1	-2	-0.5	10/24/2009	5:03	10/24/2009 5:03	31.89	22.38	72.28	
10/24/2009	5:18	10/24/2009 5:18	0.5	-1.5	-0.5	10/24/2009	5:18	10/24/2009 5:18	31.95	22.38	72.28	
10/24/2009	5:33	10/24/2009 5:33	1	-1.5	-0.3	10/24/2009	5:33	10/24/2009 5:33	31.84	22.37	72.26	
10/24/2009	5:48	10/24/2009 5:48	0.5	-1.5	-0.5	10/24/2009	5:48	10/24/2009 5:48	31.89	22.36	72.25	
10/24/2009	6:03	10/24/2009 6:03	0.5	-1.5	-0.5	10/24/2009	6:03	10/24/2009 6:03	31.88	22.36	72.24	
10/24/2009	6:18	10/24/2009 6:18	0.5	-1.5	-0.5	10/24/2009	6:18	10/24/2009 6:18	31.85	22.35	72.23	
10/24/2009	6:33	10/24/2009 6:33	0.5	-1.5	-0.5	10/24/2009	6:33	10/24/2009 6:33	31.87	22.35	72.22	
10/24/2009	6:48	10/24/2009 6:48	0.5	-1.5	-0.5	10/24/2009	6:48	10/24/2009 6:48	31.84	22.34	72.21	
10/24/2009	7:03	10/24/2009 7:03	0.5	-1.5	-0.5	10/24/2009	7:03	10/24/2009 7:03	31.73	22.34	72.22	
10/24/2009	7:18	10/24/2009 7:18	2	-1.5	0.3	10/24/2009	7:18	10/24/2009 7:18	31.74	22.40	72.32	
10/24/2009	7:33	10/24/2009 7:33	1	-2.5	-0.8	10/24/2009	7:33	10/24/2009 7:33	31.69	22.46	72.44	
10/24/2009	7:48	10/24/2009 7:48	1	-2.5	-0.8	10/24/2009	7:48	10/24/2009 7:48	31.71	22.54	72.58	
10/24/2009	8:03	10/24/2009 8:03	1	-2.5	-0.8	10/24/2009	8:03	10/24/2009 8:03	31.77	22.65	72.76	
10/24/2009	8:18	10/24/2009 8:18	0	-2	-1.0	10/24/2009	8:18	10/24/2009 8:18	31.75	22.75	72.95	
10/24/2009	8:33	10/24/2009 8:33	1	-2.5	-0.8	10/24/2009	8:33	10/24/2009 8:33	31.82	22.86	73.14	
10/24/2009	8:48	10/24/2009 8:48	1	-2.5	-0.8	10/24/2009	8:48	10/24/2009 8:48	31.79	22.93	73.27	
10/24/2009	9:03	10/24/2009 9:03	0.5	-1.5	-0.5	10/24/2009	9:03	10/24/2009 9:03	31.78	22.97	73.34	
10/24/2009	9:18	10/24/2009 9:18	0.5	-2.5	-1.0	10/24/2009	9:18	10/24/2009 9:18	31.76	22.99	73.38	
10/24/2009	9:33	10/24/2009 9:33	1.5	-3	-0.8	10/24/2009	9:33	10/24/2009 9:33	31.72	23.01	73.41	
10/24/2009	9:48	10/24/2009 9:48	1.5	-2.5	-0.5	10/24/2009	9:48	10/24/2009 9:48	31.73	23.02	73.44	
10/24/2009	10:03	10/24/2009 10:03	1	-3	-1.0	10/24/2009	10:03	10/24/2009 10:03	31.67	23.07	73.52	
10/24/2009	10:18	10/24/2009 10:18	2	-3	-0.5	10/24/2009	10:18	10/24/2009 10:18	31.65	23.12	73.62	

Table G-4
Phase II Pressure Difference Measurements a
St. Julien's Creek Annex Building 47

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
10/24/2009	10:33	10/24/2009 10:33	2.5	-3	-0.3	10/24/2009	10:33	10/24/2009 10:33	31.62	23.19	73.75	
10/24/2009	10:48	10/24/2009 10:48	2.5	-5	-1.3	10/24/2009	10:48	10/24/2009 10:48	31.56	23.28	73.91	
10/24/2009	11:03	10/24/2009 11:03	3	-4	-0.5	10/24/2009	11:03	10/24/2009 11:03	31.51	23.36	74.06	
10/24/2009	11:18	10/24/2009 11:18	2	-3.5	-0.8	10/24/2009	11:18	10/24/2009 11:18	31.45	23.44	74.20	
10/24/2009	11:33	10/24/2009 11:33	4	-4	0.0	10/24/2009	11:33	10/24/2009 11:33	31.36	23.51	74.31	
10/24/2009	11:48	10/24/2009 11:48	3.5	-6	-1.3	10/24/2009	11:48	10/24/2009 11:48	31.28	23.57	74.42	
10/24/2009	12:03	10/24/2009 12:03	3.5	-5	-0.8	10/24/2009	12:03	10/24/2009 12:03	31.24	23.63	74.53	
10/24/2009	12:18	10/24/2009 12:18	1.5	-7	-2.8	10/24/2009	12:18	10/24/2009 12:18	31.12	23.71	74.67	
10/24/2009	12:33	10/24/2009 12:33	2	-6	-2.0	10/24/2009	12:33	10/24/2009 12:33	30.97	23.73	74.71	
10/24/2009	12:48	10/24/2009 12:48	1.5	-4.5	-1.5	10/24/2009	12:48	10/24/2009 12:48	30.85	23.68	74.62	
10/24/2009	13:03	10/24/2009 13:03	1	-5	-2.0	10/24/2009	13:03	10/24/2009 13:03	30.72	23.62	74.52	
10/24/2009	13:18	10/24/2009 13:18	2	-6	-2.0	10/24/2009	13:18	10/24/2009 13:18	30.54	23.58	74.44	
10/24/2009	13:33	10/24/2009 13:33	2	-5	-1.5	10/24/2009	13:33	10/24/2009 13:33	30.38	23.56	74.40	
10/24/2009	13:48	10/24/2009 13:48	1.5	-4.5	-1.5	10/24/2009	13:48	10/24/2009 13:48	30.28	23.54	74.38	
10/24/2009	14:03	10/24/2009 14:03	1.5	-4.5	-1.5	10/24/2009	14:03	10/24/2009 14:03	30.19	23.58	74.44	
10/24/2009	14:18	10/24/2009 14:18	1.5	-3.5	-1.0	10/24/2009	14:18	10/24/2009 14:18	30.12	23.62	74.51	
10/24/2009	14:33	10/24/2009 14:33	1.5	-4	-1.3	10/24/2009	14:33	10/24/2009 14:33	30.04	23.64	74.56	
10/24/2009	14:48	10/24/2009 14:48	1	-3	-1.0	10/24/2009	14:48	10/24/2009 14:48	29.95	23.68	74.62	
10/24/2009	15:03	10/24/2009 15:03	1	-4	-1.5	10/24/2009	15:03	10/24/2009 15:03	29.81	23.69	74.63	
10/24/2009	15:18	10/24/2009 15:18	1	-4	-1.5	10/24/2009	15:18	10/24/2009 15:18	29.73	23.68	74.62	
10/24/2009	15:33	10/24/2009 15:33	2	-4	-1.0	10/24/2009	15:33	10/24/2009 15:33	29.69	23.66	74.59	
10/24/2009	15:48	10/24/2009 15:48	1.5	-6.5	-2.5	10/24/2009	15:48	10/24/2009 15:48	29.63	23.64	74.54	
10/24/2009	16:03	10/24/2009 16:03	1	-4	-1.5	10/24/2009	16:03	10/24/2009 16:03	29.63	23.62	74.51	
10/24/2009	16:18	10/24/2009 16:18	3.5	-4.5	-0.5	10/24/2009	16:18	10/24/2009 16:18	29.65	23.59	74.46	
10/24/2009	16:33	10/24/2009 16:33	0.5	-3.5	-1.5	10/24/2009	16:33	10/24/2009 16:33	29.63	23.57	74.42	
10/24/2009	16:48	10/24/2009 16:48	2	-3	-0.5	10/24/2009	16:48	10/24/2009 16:48	29.60	23.54	74.37	
10/24/2009	17:03	10/24/2009 17:03	1.5	-3	-0.8	10/24/2009	17:03	10/24/2009 17:03	29.63	23.52	74.34	
10/24/2009	17:18	10/24/2009 17:18	1.5	-5	-1.8	10/24/2009	17:18	10/24/2009 17:18	29.63	23.50	74.30	
10/24/2009	17:33	10/24/2009 17:33	1.5	-4.5	-1.5	10/24/2009	17:33	10/24/2009 17:33	29.75	23.48	74.27	
10/24/2009	17:48	10/24/2009 17:48	2	-6	-2.0	10/24/2009	17:48	10/24/2009 17:48	29.80	23.47	74.24	
10/24/2009	18:03	10/24/2009 18:03	1	-4.5	-1.8	10/24/2009	18:03	10/24/2009 18:03	29.77	23.45	74.22	
10/24/2009	18:18	10/24/2009 18:18	2	-4	-1.0	10/24/2009	18:18	10/24/2009 18:18	29.81	23.44	74.20	
10/24/2009	18:33	10/24/2009 18:33	1	-4	-1.5	10/24/2009	18:33	10/24/2009 18:33	29.86	23.43	74.17	
10/24/2009	18:48	10/24/2009 18:48	0.5	-2.5	-1.0	10/24/2009	18:48	10/24/2009 18:48	29.91	23.42	74.15	
10/24/2009	19:03	10/24/2009 19:03	1	-2.5	-0.8	10/24/2009	19:03	10/24/2009 19:03	29.97	23.40	74.12	
10/24/2009	19:18	10/24/2009 19:18	1	-3	-1.0	10/24/2009	19:18	10/24/2009 19:18	29.91	23.39	74.10	
10/24/2009	19:33	10/24/2009 19:33	0.5	-2.5	-1.0	10/24/2009	19:33	10/24/2009 19:33	29.96	23.38	74.08	
10/24/2009	19:48	10/24/2009 19:48	1	-2.5	-0.8	10/24/2009	19:48	10/24/2009 19:48	29.98	23.37	74.06	
10/24/2009	20:03	10/24/2009 20:03	1	-2.5	-0.8	10/24/2009	20:03	10/24/2009 20:03	29.91	23.35	74.03	
10/24/2009	20:18	10/24/2009 20:18	0.5	-2.5	-1.0	10/24/2009	20:18	10/24/2009 20:18	30.01	23.34	74.01	
10/24/2009	20:33	10/24/2009 20:33	0.5	-2.5	-1.0	10/24/2009	20:33	10/24/2009 20:33	30.01	23.33	73.99	
10/24/2009	20:48	10/24/2009 20:48	1	-2.5	-0.8	10/24/2009	20:48	10/24/2009 20:48	30.07	23.31	73.97	
10/24/2009	21:03	10/24/2009 21:03	1	-2.5	-0.8	10/24/2009	21:03	10/24/2009 21:03	30.12	23.30	73.94	
10/24/2009	21:18	10/24/2009 21:18	0.5	-2	-0.8	10/24/2009	21:18	10/24/2009 21:18	30.12	23.29	73.92	
10/24/2009	21:33	10/24/2009 21:33	1.5	-2.5	-0.5	10/24/2009	21:33	10/24/2009 21:33	30.10	23.27	73.89	
10/24/2009	21:48	10/24/2009 21:48	0.5	-2.5	-1.0	10/24/2009	21:48	10/24/2009 21:48	30.17	23.26	73.87	
10/24/2009	22:03	10/24/2009 22:03	1.5	-2	-0.3	10/24/2009	22:03	10/24/2009 22:03	30.26	23.25	73.85	
10/24/2009	22:18	10/24/2009 22:18	1	-3	-1.0	10/24/2009	22:18	10/24/2009 22:18	30.47	23.24	73.82	
10/24/2009	22:33	10/24/2009 22:33	0	-3.5	-1.8	10/24/2009	22:33	10/24/2009 22:33	30.57	23.23	73.81	
10/24/2009	22:48	10/24/2009 22:48	0	-2	-1.0	10/24/2009	22:48	10/24/2009 22:48	30.55	23.22	73.79	
10/24/2009	23:03	10/24/2009 23:03	0	-2	-1.0	10/24/2009	23:03	10/24/2009 23:03	30.57	23.21	73.77	
10/24/2009	23:18	10/24/2009 23:18	0	-2.5	-1.3	10/24/2009	23:18	10/24/2009 23:18	30.54	23.20	73.75	
10/24/2009	23:33	10/24/2009 23:33	0	-3	-1.5	10/24/2009	23:33	10/24/2009 23:33	30.55	23.19	73.73	
10/24/2009	23:48	10/24/2009 23:48	0	-2	-1.0	10/24/2009	23:48	10/24/2009 23:48	30.66	23.17	73.71	

Table G-4
Phase II Pressure Difference Measurements a
St. Julien's Creek Annex Building 47

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
10/25/2009	0:03	10/25/2009 0:03	0	-1.5	-0.8	10/25/2009	0:03	10/25/2009 0:03	30.72	23.16	73.69	
10/25/2009	0:18	10/25/2009 0:18	0	-1	-0.5	10/25/2009	0:18	10/25/2009 0:18	30.78	23.15	73.67	
10/25/2009	0:33	10/25/2009 0:33	0	-1.5	-0.8	10/25/2009	0:33	10/25/2009 0:33	30.87	23.14	73.65	
10/25/2009	0:48	10/25/2009 0:48	0	-1	-0.5	10/25/2009	0:48	10/25/2009 0:48	30.94	23.13	73.63	
10/25/2009	1:03	10/25/2009 1:03	0	-2.5	-1.3	10/25/2009	1:03	10/25/2009 1:03	31.08	23.11	73.61	
10/25/2009	1:18	10/25/2009 1:18	0	-1.5	-0.8	10/25/2009	1:18	10/25/2009 1:18	31.18	23.10	73.58	
10/25/2009	1:33	10/25/2009 1:33	0	-1.5	-0.8	10/25/2009	1:33	10/25/2009 1:33	31.26	23.08	73.55	
10/25/2009	1:48	10/25/2009 1:48	-0.5	-1	-0.8	10/25/2009	1:48	10/25/2009 1:48	31.29	23.07	73.53	
10/25/2009	2:03	10/25/2009 2:03	-0.5	-1	-0.8	10/25/2009	2:03	10/25/2009 2:03	31.34	23.07	73.52	
10/25/2009	2:18	10/25/2009 2:18	0	-1	-0.5	10/25/2009	2:18	10/25/2009 2:18	31.44	23.06	73.51	
10/25/2009	2:33	10/25/2009 2:33	0	-1	-0.5	10/25/2009	2:33	10/25/2009 2:33	31.52	23.05	73.49	
10/25/2009	2:48	10/25/2009 2:48	0	-1	-0.5	10/25/2009	2:48	10/25/2009 2:48	31.57	23.04	73.46	
10/25/2009	3:03	10/25/2009 3:03	0	-1	-0.5	10/25/2009	3:03	10/25/2009 3:03	31.67	23.02	73.44	
10/25/2009	3:18	10/25/2009 3:18	1.5	-1	0.3	10/25/2009	3:18	10/25/2009 3:18	32.00	23.01	73.41	
10/25/2009	3:33	10/25/2009 3:33	1.5	-3	-0.8	10/25/2009	3:33	10/25/2009 3:33	32.06	22.99	73.38	
10/25/2009	3:48	10/25/2009 3:48	1	-1.5	-0.3	10/25/2009	3:48	10/25/2009 3:48	32.13	22.97	73.35	
10/25/2009	4:03	10/25/2009 4:03	1	-3.5	-1.3	10/25/2009	4:03	10/25/2009 4:03	32.24	22.95	73.31	
10/25/2009	4:18	10/25/2009 4:18	2.5	-3	-0.3	10/25/2009	4:18	10/25/2009 4:18	32.28	22.93	73.27	
10/25/2009	4:33	10/25/2009 4:33	1	-2	-0.5	10/25/2009	4:33	10/25/2009 4:33	32.39	22.90	73.22	
10/25/2009	4:48	10/25/2009 4:48	1.5	-2	-0.3	10/25/2009	4:48	10/25/2009 4:48	32.52	22.87	73.17	
10/25/2009	5:03	10/25/2009 5:03	1	-1.5	-0.3	10/25/2009	5:03	10/25/2009 5:03	32.60	22.84	73.11	
10/25/2009	5:18	10/25/2009 5:18	1	-1.5	-0.3	10/25/2009	5:18	10/25/2009 5:18	32.74	22.81	73.06	
10/25/2009	5:33	10/25/2009 5:33	1	-1.5	-0.3	10/25/2009	5:33	10/25/2009 5:33	32.85	22.78	73.00	
10/25/2009	5:48	10/25/2009 5:48	1	-1.5	-0.3	10/25/2009	5:48	10/25/2009 5:48	32.91	22.75	72.95	
10/25/2009	6:03	10/25/2009 6:03	1.5	-1.5	0.0	10/25/2009	6:03	10/25/2009 6:03	33.11	22.72	72.89	
10/25/2009	6:18	10/25/2009 6:18	0.5	-2.5	-1.0	10/25/2009	6:18	10/25/2009 6:18	33.24	22.69	72.84	
10/25/2009	6:33	10/25/2009 6:33	1	-2	-0.5	10/25/2009	6:33	10/25/2009 6:33	33.41	22.66	72.79	
10/25/2009	6:48	10/25/2009 6:48	1	-1.5	-0.3	10/25/2009	6:48	10/25/2009 6:48	33.53	22.63	72.73	
10/25/2009	7:03	10/25/2009 7:03	0.5	-1.5	-0.5	10/25/2009	7:03	10/25/2009 7:03	33.59	22.58	72.64	
10/25/2009	7:18	10/25/2009 7:18	1	-2	-0.5	10/25/2009	7:18	10/25/2009 7:18	33.71	22.54	72.56	
10/25/2009	7:33	10/25/2009 7:33	0.5	-1	-0.3	10/25/2009	7:33	10/25/2009 7:33	33.72	22.50	72.51	
10/25/2009	7:48	10/25/2009 7:48	0.5	-1.5	-0.5	10/25/2009	7:48	10/25/2009 7:48	33.90	22.27	72.08	
10/25/2009	8:03	10/25/2009 8:03	0.5	-1	-0.3	10/25/2009	8:03	10/25/2009 8:03	34.07	22.03	71.65	
10/25/2009	8:18	10/25/2009 8:18	2	-1.5	0.3	10/25/2009	8:18	10/25/2009 8:18	34.14	21.81	71.25	
10/25/2009	8:33	10/25/2009 8:33	1	-2	-0.5	10/25/2009	8:33	10/25/2009 8:33	34.33	21.77	71.18	
10/25/2009	8:48	10/25/2009 8:48	1.5	-3	-0.8	10/25/2009	8:48	10/25/2009 8:48	34.47	21.81	71.26	
10/25/2009	9:03	10/25/2009 9:03	1.5	-2	-0.3	10/25/2009	9:03	10/25/2009 9:03	34.56	21.88	71.38	
10/25/2009	9:18	10/25/2009 9:18	1.5	-3	-0.8	10/25/2009	9:18	10/25/2009 9:18	34.60	21.93	71.47	
10/25/2009	9:33	10/25/2009 9:33	2	-1.5	0.3	10/25/2009	9:33	10/25/2009 9:33	34.69	21.97	71.55	
10/25/2009	9:48	10/25/2009 9:48	0.5	-1.5	-0.5	10/25/2009	9:48	10/25/2009 9:48	34.84	22.00	71.60	
10/25/2009	10:03	10/25/2009 10:03	1	-1	0.0	10/25/2009	10:03	10/25/2009 10:03	34.96	22.02	71.63	
10/25/2009	10:18	10/25/2009 10:18	1	-1	0.0	10/25/2009	10:18	10/25/2009 10:18	35.01	22.03	71.65	
10/25/2009	10:33	10/25/2009 10:33	1	-2	-0.5	10/25/2009	10:33	10/25/2009 10:33	35.04	22.03	71.65	
10/25/2009	10:48	10/25/2009 10:48	1	-1.5	-0.3	10/25/2009	10:48	10/25/2009 10:48	35.10	22.03	71.65	
10/25/2009	11:03	10/25/2009 11:03	2	-3.5	-0.8	10/25/2009	11:03	10/25/2009 11:03	35.22	22.01	71.62	
10/25/2009	11:18	10/25/2009 11:18	1	-2	-0.5	10/25/2009	11:18	10/25/2009 11:18	35.37	21.92	71.46	
10/25/2009	11:33	10/25/2009 11:33	1	-1.5	-0.3	10/25/2009	11:33	10/25/2009 11:33	35.29	21.81	71.25	
10/25/2009	11:48	10/25/2009 11:48	1	-1.5	-0.3	10/25/2009	11:48	10/25/2009 11:48	35.27	21.72	71.09	
10/25/2009	12:03	10/25/2009 12:03	0.5	-1.5	-0.5	10/25/2009	12:03	10/25/2009 12:03	35.29	21.65	70.97	
10/25/2009	12:18	10/25/2009 12:18	0.5	-1.5	-0.5	10/25/2009	12:18	10/25/2009 12:18	35.32	21.60	70.87	
10/25/2009	12:33	10/25/2009 12:33	1	-1.5	-0.3	10/25/2009	12:33	10/25/2009 12:33	35.32	21.57	70.82	
10/25/2009	12:48	10/25/2009 12:48	0.5	-1.5	-0.5	10/25/2009	12:48	10/25/2009 12:48	35.23	21.54	70.77	
10/25/2009	13:03	10/25/2009 13:03	0.5	-1	-0.3	10/25/2009	13:03	10/25/2009 13:03	35.24	21.53	70.75	
10/25/2009	13:18	10/25/2009 13:18	0.5	-1	-0.3	10/25/2009	13:18	10/25/2009 13:18	35.19	21.52	70.73	

Table G-4
Phase II Pressure Difference Measurements a
St. Julien's Creek Annex Building 47

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
10/25/2009	13:33	10/25/2009 13:33	0.5	-1	-0.3	10/25/2009	13:33	10/25/2009 13:33	35.21	21.51	70.72	
10/25/2009	13:48	10/25/2009 13:48	0	-1.5	-0.8	10/25/2009	13:48	10/25/2009 13:48	35.23	21.50	70.71	
10/25/2009	14:03	10/25/2009 14:03	0	-1.5	-0.8	10/25/2009	14:03	10/25/2009 14:03	35.23	21.49	70.69	
10/25/2009	14:18	10/25/2009 14:18	0.5	-1	-0.3	10/25/2009	14:18	10/25/2009 14:18	35.24	21.49	70.67	
10/25/2009	14:33	10/25/2009 14:33	0	-1	-0.5	10/25/2009	14:33	10/25/2009 14:33	35.23	21.47	70.65	
10/25/2009	14:48	10/25/2009 14:48	0.5	-1.5	-0.5	10/25/2009	14:48	10/25/2009 14:48	35.30	21.46	70.63	
10/25/2009	15:03	10/25/2009 15:03	0	-1.5	-0.8	10/25/2009	15:03	10/25/2009 15:03	35.29	21.45	70.60	
10/25/2009	15:18	10/25/2009 15:18	0	-1	-0.5	10/25/2009	15:18	10/25/2009 15:18	35.23	21.44	70.59	
10/25/2009	15:33	10/25/2009 15:33	0	-1.5	-0.8	10/25/2009	15:33	10/25/2009 15:33	35.21	21.43	70.57	
10/25/2009	15:48	10/25/2009 15:48	0	-1.5	-0.8	10/25/2009	15:48	10/25/2009 15:48	35.20	21.42	70.56	
10/25/2009	16:03	10/25/2009 16:03	0	-1.5	-0.8	10/25/2009	16:03	10/25/2009 16:03	35.21	21.41	70.54	
10/25/2009	16:18	10/25/2009 16:18	0	-1	-0.5	10/25/2009	16:18	10/25/2009 16:18	35.12	21.41	70.53	
10/25/2009	16:33	10/25/2009 16:33	0	-1	-0.5	10/25/2009	16:33	10/25/2009 16:33	35.09	21.40	70.52	
10/25/2009	16:48	10/25/2009 16:48	0	-1	-0.5	10/25/2009	16:48	10/25/2009 16:48	35.20	21.39	70.50	
10/25/2009	17:03	10/25/2009 17:03	0	-1	-0.5	10/25/2009	17:03	10/25/2009 17:03	35.23	21.38	70.49	
10/25/2009	17:18	10/25/2009 17:18	0	-0.5	-0.3	10/25/2009	17:18	10/25/2009 17:18	35.38	21.37	70.47	
10/25/2009	17:33	10/25/2009 17:33	0	-0.5	-0.3	10/25/2009	17:33	10/25/2009 17:33	35.37	21.37	70.47	
10/25/2009	17:48	10/25/2009 17:48	0	-0.5	-0.3	10/25/2009	17:48	10/25/2009 17:48	35.36	21.36	70.44	
10/25/2009	18:03	10/25/2009 18:03	0	-0.5	-0.3	10/25/2009	18:03	10/25/2009 18:03	35.48	21.35	70.44	
10/25/2009	18:18	10/25/2009 18:18	0	-0.5	-0.3	10/25/2009	18:18	10/25/2009 18:18	35.42	21.34	70.41	
10/25/2009	18:33	10/25/2009 18:33	0	-1	-0.5	10/25/2009	18:33	10/25/2009 18:33	35.46	21.32	70.38	
10/25/2009	18:48	10/25/2009 18:48	0	-1	-0.5	10/25/2009	18:48	10/25/2009 18:48	35.43	21.31	70.37	
10/25/2009	19:03	10/25/2009 19:03	0	-1	-0.5	10/25/2009	19:03	10/25/2009 19:03	35.61	21.30	70.34	
10/25/2009	19:18	10/25/2009 19:18	0	-1	-0.5	10/25/2009	19:18	10/25/2009 19:18	35.56	21.29	70.31	
10/25/2009	19:33	10/25/2009 19:33	0	-1.5	-0.8	10/25/2009	19:33	10/25/2009 19:33	35.67	21.26	70.27	
10/25/2009	19:48	10/25/2009 19:48	0	-1	-0.5	10/25/2009	19:48	10/25/2009 19:48	35.83	21.24	70.23	
10/25/2009	20:03	10/25/2009 20:03	0.5	-1.5	-0.5	10/25/2009	20:03	10/25/2009 20:03	35.85	21.22	70.20	
10/25/2009	20:18	10/25/2009 20:18	0	-1	-0.5	10/25/2009	20:18	10/25/2009 20:18	35.88	21.23	70.21	
10/25/2009	20:33	10/25/2009 20:33	0	-1	-0.5	10/25/2009	20:33	10/25/2009 20:33	35.99	21.24	70.22	
10/25/2009	20:48	10/25/2009 20:48	0	-1	-0.5	10/25/2009	20:48	10/25/2009 20:48	35.98	21.22	70.20	
10/25/2009	21:03	10/25/2009 21:03	0	-1	-0.5	10/25/2009	21:03	10/25/2009 21:03	36.00	21.21	70.18	
10/25/2009	21:18	10/25/2009 21:18	0	-1	-0.5	10/25/2009	21:18	10/25/2009 21:18	36.07	21.19	70.14	
10/25/2009	21:33	10/25/2009 21:33	0	-0.5	-0.3	10/25/2009	21:33	10/25/2009 21:33	36.13	21.17	70.10	
10/25/2009	21:48	10/25/2009 21:48	0	-1	-0.5	10/25/2009	21:48	10/25/2009 21:48	36.12	21.15	70.06	
10/25/2009	22:03	10/25/2009 22:03	0	-1	-0.5	10/25/2009	22:03	10/25/2009 22:03	36.11	21.11	70.01	
10/25/2009	22:18	10/25/2009 22:18	-0.5	-1	-0.8	10/25/2009	22:18	10/25/2009 22:18	36.13	21.10	69.97	
10/25/2009	22:33	10/25/2009 22:33	0	-1	-0.5	10/25/2009	22:33	10/25/2009 22:33	36.20	21.07	69.92	
10/25/2009	22:48	10/25/2009 22:48	0	-1	-0.5	10/25/2009	22:48	10/25/2009 22:48	36.11	21.05	69.89	
10/25/2009	23:03	10/25/2009 23:03	-0.5	-1	-0.8	10/25/2009	23:03	10/25/2009 23:03	36.13	21.02	69.83	
10/25/2009	23:18	10/25/2009 23:18	-0.5	-1	-0.8	10/25/2009	23:18	10/25/2009 23:18	36.15	21.00	69.80	
10/25/2009	23:33	10/25/2009 23:33	-0.5	-1	-0.8	10/25/2009	23:33	10/25/2009 23:33	36.23	20.97	69.75	
10/25/2009	23:48	10/25/2009 23:48	-0.5	-1	-0.8	10/25/2009	23:48	10/25/2009 23:48	36.24	20.95	69.70	
10/26/2009	0:03	10/26/2009 0:03	-0.5	-1	-0.8	10/26/2009	0:03	10/26/2009 0:03	36.23	20.92	69.66	
10/26/2009	0:18	10/26/2009 0:18	0	-1.5	-0.8	10/26/2009	0:18	10/26/2009 0:18	36.14	20.90	69.61	
10/26/2009	0:33	10/26/2009 0:33	0	-1	-0.5	10/26/2009	0:33	10/26/2009 0:33	36.10	20.87	69.57	
10/26/2009	0:48	10/26/2009 0:48	0	-1	-0.5	10/26/2009	0:48	10/26/2009 0:48	36.15	20.85	69.53	
10/26/2009	1:03	10/26/2009 1:03	0	-1	-0.5	10/26/2009	1:03	10/26/2009 1:03	36.20	20.83	69.49	
10/26/2009	1:18	10/26/2009 1:18	-0.5	-1	-0.8	10/26/2009	1:18	10/26/2009 1:18	36.14	20.80	69.44	
10/26/2009	1:33	10/26/2009 1:33	-0.5	-1	-0.8	10/26/2009	1:33	10/26/2009 1:33	36.18	20.78	69.41	
10/26/2009	1:48	10/26/2009 1:48	-0.5	-1	-0.8	10/26/2009	1:48	10/26/2009 1:48	36.09	20.75	69.36	
10/26/2009	2:03	10/26/2009 2:03	-0.5	-1	-0.8	10/26/2009	2:03	10/26/2009 2:03	36.02	20.73	69.32	
10/26/2009	2:18	10/26/2009 2:18	-0.5	-1	-0.8	10/26/2009	2:18	10/26/2009 2:18	36.03	20.70	69.26	
10/26/2009	2:33	10/26/2009 2:33	0	-1	-0.5	10/26/2009	2:33	10/26/2009 2:33	36.00	20.67	69.21	
10/26/2009	2:48	10/26/2009 2:48	-0.5	-1	-0.8	10/26/2009	2:48	10/26/2009 2:48	36.01	20.65	69.17	

Table G-4
Phase II Pressure Difference Measurements a
St. Julien's Creek Annex Building 47

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
10/26/2009	3:03	10/26/2009 3:03	0	-1	-0.5	10/26/2009	3:03	10/26/2009 3:03	36.09	20.62	69.12	
10/26/2009	3:18	10/26/2009 3:18	0	-1	-0.5	10/26/2009	3:18	10/26/2009 3:18	36.08	20.60	69.07	
10/26/2009	3:33	10/26/2009 3:33	0	-1	-0.5	10/26/2009	3:33	10/26/2009 3:33	36.13	20.57	69.03	
10/26/2009	3:48	10/26/2009 3:48	0	-1	-0.5	10/26/2009	3:48	10/26/2009 3:48	36.05	20.56	69.00	
10/26/2009	4:03	10/26/2009 4:03	0	-1	-0.5	10/26/2009	4:03	10/26/2009 4:03	36.05	20.53	68.96	
10/26/2009	4:18	10/26/2009 4:18	0	-1	-0.5	10/26/2009	4:18	10/26/2009 4:18	36.08	20.52	68.94	
10/26/2009	4:33	10/26/2009 4:33	0	-1	-0.5	10/26/2009	4:33	10/26/2009 4:33	36.03	20.50	68.90	
10/26/2009	4:48	10/26/2009 4:48	0	-1	-0.5	10/26/2009	4:48	10/26/2009 4:48	36.03	20.49	68.88	
10/26/2009	5:03	10/26/2009 5:03	0	-0.5	-0.3	10/26/2009	5:03	10/26/2009 5:03	36.18	20.48	68.86	
10/26/2009	5:18	10/26/2009 5:18	0	-0.5	-0.3	10/26/2009	5:18	10/26/2009 5:18	36.19	20.47	68.84	
10/26/2009	5:33	10/26/2009 5:33	0	-1	-0.5	10/26/2009	5:33	10/26/2009 5:33	36.22	20.46	68.82	
10/26/2009	5:48	10/26/2009 5:48	0	-0.5	-0.3	10/26/2009	5:48	10/26/2009 5:48	36.22	20.44	68.80	
10/26/2009	6:03	10/26/2009 6:03	0	-1	-0.5	10/26/2009	6:03	10/26/2009 6:03	36.32	20.44	68.79	
10/26/2009	6:18	10/26/2009 6:18	0	-0.5	-0.3	10/26/2009	6:18	10/26/2009 6:18	36.39	20.43	68.77	
10/26/2009	6:33	10/26/2009 6:33	0	-1	-0.5	10/26/2009	6:33	10/26/2009 6:33	36.37	20.42	68.75	
10/26/2009	6:48	10/26/2009 6:48	0	-1	-0.5	10/26/2009	6:48	10/26/2009 6:48	36.42	20.44	68.80	
10/26/2009	7:03	10/26/2009 7:03	0	-1	-0.5	10/26/2009	7:03	10/26/2009 7:03	36.39	20.52	68.94	
10/26/2009	7:18	10/26/2009 7:18	0	-1	-0.5	10/26/2009	7:18	10/26/2009 7:18	36.45	20.64	69.15	
10/26/2009	7:33	10/26/2009 7:33	0	-1	-0.5	10/26/2009	7:33	10/26/2009 7:33	36.56	20.67	69.21	
10/26/2009	7:48	10/26/2009 7:48	0	-0.5	-0.3	10/26/2009	7:48	10/26/2009 7:48	36.53	20.53	68.95	
10/26/2009	8:03	10/26/2009 8:03	0	-0.5	-0.3	10/26/2009	8:03	10/26/2009 8:03	36.51	20.39	68.69	
10/26/2009	8:18	10/26/2009 8:18	0	-0.5	-0.3	10/26/2009	8:18	10/26/2009 8:18	36.61	20.28	68.51	
10/26/2009	8:33	10/26/2009 8:33	0.5	-0.5	0.0	10/26/2009	8:33	10/26/2009 8:33	36.74	20.22	68.39	
10/26/2009	8:48	10/26/2009 8:48	0.5	-0.5	0.0	10/26/2009	8:48	10/26/2009 8:48	36.74	20.17	68.31	
10/26/2009	9:03	10/26/2009 9:03	0.5	-0.5	0.0	10/26/2009	9:03	10/26/2009 9:03	36.74	20.16	68.28	
10/26/2009	9:18	10/26/2009 9:18	0	-1	-0.5	10/26/2009	9:18	10/26/2009 9:18	36.86	20.25	68.45	
10/26/2009	9:33	10/26/2009 9:33	0	-0.5	-0.3	10/26/2009	9:33	10/26/2009 9:33	36.86	20.42	68.75	
10/26/2009	9:48	10/26/2009 9:48	0	-1	-0.5	10/26/2009	9:48	10/26/2009 9:48	36.84	20.57	69.03	
10/26/2009	10:03	10/26/2009 10:03	0	-1	-0.5	10/26/2009	10:03	10/26/2009 10:03	36.74	20.71	69.27	
10/26/2009	10:18	10/26/2009 10:18	1	-1	0.0	10/26/2009	10:18	10/26/2009 10:18	36.87	20.81	69.46	
10/26/2009	10:33	10/26/2009 10:33	0.5	-0.5	0.0	10/26/2009	10:33	10/26/2009 10:33	36.89	20.88	69.58	
10/26/2009	10:48	10/26/2009 10:48	1.5	-1	0.3	10/26/2009	10:48	10/26/2009 10:48	37.03	20.86	69.55	
10/26/2009	11:03	10/26/2009 11:03	2	-2	0.0	10/26/2009	11:03	10/26/2009 11:03	37.06	20.84	69.52	
10/26/2009	11:18	10/26/2009 11:18	1.5	-1	0.3	10/26/2009	11:18	10/26/2009 11:18	37.05	20.93	69.67	
10/26/2009	11:33	10/26/2009 11:33	2	-1	0.5	10/26/2009	11:33	10/26/2009 11:33	37.06	20.99	69.79	
10/26/2009	11:48	10/26/2009 11:48	1.5	-1	0.3	10/26/2009	11:48	10/26/2009 11:48	37.04	21.03	69.85	
10/26/2009	12:03	10/26/2009 12:03	1.5	-0.5	0.5	10/26/2009	12:03	10/26/2009 12:03	36.97	21.09	69.96	
10/26/2009	12:18	10/26/2009 12:18	2.5	-0.5	1.0	10/26/2009	12:18	10/26/2009 12:18	36.86	21.16	70.08	
10/26/2009	12:33	10/26/2009 12:33	1.5	-0.5	0.5	10/26/2009	12:33	10/26/2009 12:33	36.87	21.23	70.21	
10/26/2009	12:48	10/26/2009 12:48	2	-0.5	0.8	10/26/2009	12:48	10/26/2009 12:48	36.68	21.22	70.19	
10/26/2009	13:03	10/26/2009 13:03	1.5	-1	0.3	10/26/2009	13:03	10/26/2009 13:03	36.65	21.18	70.13	
10/26/2009	13:18	10/26/2009 13:18	1.5	-0.5	0.5	10/26/2009	13:18	10/26/2009 13:18	36.63	21.16	70.08	
10/26/2009	13:33	10/26/2009 13:33	1.5	-0.5	0.5	10/26/2009	13:33	10/26/2009 13:33	36.61	21.15	70.06	
10/26/2009	13:48	10/26/2009 13:48	1.5	-0.5	0.5	10/26/2009	13:48	10/26/2009 13:48	36.53	21.15	70.06	
10/26/2009	14:03	10/26/2009 14:03	6.5	-0.5	3.0	10/26/2009	14:03	10/26/2009 14:03	36.52	21.16	70.08	
10/26/2009	14:18	10/26/2009 14:18	2	-0.5	0.8	10/26/2009	14:18	10/26/2009 14:18	36.51	21.16	70.10	
10/26/2009	14:33	10/26/2009 14:33	1.5	-0.5	0.5	10/26/2009	14:33	10/26/2009 14:33	36.39	21.18	70.12	
10/26/2009	14:48	10/26/2009 14:48	1.5	-1	0.3	10/26/2009	14:48	10/26/2009 14:48	36.35	21.26	70.26	
10/26/2009	15:03	10/26/2009 15:03	1.5	-0.5	0.5	10/26/2009	15:03	10/26/2009 15:03	36.32	21.30	70.33	
10/26/2009	15:18	10/26/2009 15:18	1.5	-1	0.3	10/26/2009	15:18	10/26/2009 15:18	36.36	21.35	70.42	
10/26/2009	15:33	10/26/2009 15:33	1	-1	0.0	10/26/2009	15:33	10/26/2009 15:33	36.42	21.42	70.56	
10/26/2009	15:48	10/26/2009 15:48	0.5	-1	-0.3	10/26/2009	15:48	10/26/2009 15:48	36.46	21.50	70.69	
10/26/2009	16:03	10/26/2009 16:03	0.5	-1	-0.3	10/26/2009	16:03	10/26/2009 16:03	36.40	21.57	70.82	
10/26/2009	16:18	10/26/2009 16:18	0.5	-1	-0.3	10/26/2009	16:18	10/26/2009 16:18	36.41	21.62	70.92	

Table G-4
Phase II Pressure Difference Measurements a
St. Julien's Creek Annex Building 47

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
10/26/2009	16:33	10/26/2009 16:33	0.5	-1	-0.3	10/26/2009	16:33	10/26/2009 16:33	36.35	21.65	70.97	
10/26/2009	16:48	10/26/2009 16:48	0.5	-1	-0.3	10/26/2009	16:48	10/26/2009 16:48	36.32	21.68	71.02	
10/26/2009	17:03	10/26/2009 17:03	0.5	-1	-0.3	10/26/2009	17:03	10/26/2009 17:03	36.35	21.68	71.03	
10/26/2009	17:18	10/26/2009 17:18	2.5	-1.5	0.5	10/26/2009	17:18	10/26/2009 17:18	36.29	21.68	71.02	
10/26/2009	17:33	10/26/2009 17:33	0.5	-0.5	0.0	10/26/2009	17:33	10/26/2009 17:33	36.07	21.67	71.00	
10/26/2009	17:48	10/26/2009 17:48	0.5	-1	-0.3	10/26/2009	17:48	10/26/2009 17:48	36.06	21.65	70.98	
10/26/2009	18:03	10/26/2009 18:03	1	-1.5	-0.3	10/26/2009	18:03	10/26/2009 18:03	36.06	21.64	70.94	
10/26/2009	18:18	10/26/2009 18:18	0.5	-1	-0.3	10/26/2009	18:18	10/26/2009 18:18	36.11	21.62	70.91	
10/26/2009	18:33	10/26/2009 18:33	1	-2	-0.5	10/26/2009	18:33	10/26/2009 18:33	36.10	21.60	70.89	
10/26/2009	18:48	10/26/2009 18:48	1.5	-1	0.3	10/26/2009	18:48	10/26/2009 18:48	36.16	21.59	70.86	
10/26/2009	19:03	10/26/2009 19:03	0.5	-1	-0.3	10/26/2009	19:03	10/26/2009 19:03	36.19	21.57	70.82	
10/26/2009	19:18	10/26/2009 19:18	0	-1	-0.5	10/26/2009	19:18	10/26/2009 19:18	36.06	21.55	70.80	
10/26/2009	19:33	10/26/2009 19:33	0	-1	-0.5	10/26/2009	19:33	10/26/2009 19:33	35.96	21.54	70.77	
10/26/2009	19:48	10/26/2009 19:48	0.5	-1	-0.3	10/26/2009	19:48	10/26/2009 19:48	36.03	21.52	70.74	
10/26/2009	20:03	10/26/2009 20:03	0	-1	-0.5	10/26/2009	20:03	10/26/2009 20:03	35.90	21.51	70.72	
10/26/2009	20:18	10/26/2009 20:18	0	-1	-0.5	10/26/2009	20:18	10/26/2009 20:18	35.74	21.50	70.70	
10/26/2009	20:33	10/26/2009 20:33	0.5	-1	-0.3	10/26/2009	20:33	10/26/2009 20:33	35.74	21.49	70.68	
10/26/2009	20:48	10/26/2009 20:48	0	-1	-0.5	10/26/2009	20:48	10/26/2009 20:48	35.74	21.48	70.66	
10/26/2009	21:03	10/26/2009 21:03	0.5	-1	-0.3	10/26/2009	21:03	10/26/2009 21:03	35.80	21.47	70.64	
10/26/2009	21:18	10/26/2009 21:18	1	-2	-0.5	10/26/2009	21:18	10/26/2009 21:18	35.88	21.46	70.63	
10/26/2009	21:33	10/26/2009 21:33	0.5	-2	-0.8	10/26/2009	21:33	10/26/2009 21:33	35.84	21.45	70.62	
10/26/2009	21:48	10/26/2009 21:48	0	-0.5	-0.3	10/26/2009	21:48	10/26/2009 21:48	35.77	21.44	70.60	
10/26/2009	22:03	10/26/2009 22:03	0.5	-0.5	0.0	10/26/2009	22:03	10/26/2009 22:03	35.69	21.43	70.58	
10/26/2009	22:18	10/26/2009 22:18	0.5	-0.5	0.0	10/26/2009	22:18	10/26/2009 22:18	35.55	21.43	70.57	
10/26/2009	22:33	10/26/2009 22:33	0.5	-1	-0.3	10/26/2009	22:33	10/26/2009 22:33	35.49	21.42	70.55	
10/26/2009	22:48	10/26/2009 22:48	0	-1	-0.5	10/26/2009	22:48	10/26/2009 22:48	35.44	21.41	70.54	
10/26/2009	23:03	10/26/2009 23:03	0	-1	-0.5	10/26/2009	23:03	10/26/2009 23:03	35.31	21.40	70.53	
10/26/2009	23:18	10/26/2009 23:18	0	-1	-0.5	10/26/2009	23:18	10/26/2009 23:18	35.26	21.39	70.51	
10/26/2009	23:33	10/26/2009 23:33	0	-0.5	-0.3	10/26/2009	23:33	10/26/2009 23:33	35.17	21.39	70.49	
10/26/2009	23:48	10/26/2009 23:48	0	-0.5	-0.3	10/26/2009	23:48	10/26/2009 23:48	35.06	21.38	70.49	
10/27/2009	0:03	10/27/2009 0:03	0	-1	-0.5	10/27/2009	0:03	10/27/2009 0:03	34.96	21.38	70.48	
10/27/2009	0:18	10/27/2009 0:18	0	-0.5	-0.3	10/27/2009	0:18	10/27/2009 0:18	34.92	21.37	70.47	
10/27/2009	0:33	10/27/2009 0:33	0	-0.5	-0.3	10/27/2009	0:33	10/27/2009 0:33	34.92	21.37	70.47	
10/27/2009	0:48	10/27/2009 0:48	0	-0.5	-0.3	10/27/2009	0:48	10/27/2009 0:48	34.81	21.37	70.47	
10/27/2009	1:03	10/27/2009 1:03	0	-0.5	-0.3	10/27/2009	1:03	10/27/2009 1:03	34.60	21.37	70.47	
10/27/2009	1:18	10/27/2009 1:18	0	-1	-0.5	10/27/2009	1:18	10/27/2009 1:18	34.46	21.37	70.47	
10/27/2009	1:33	10/27/2009 1:33	0	-0.5	-0.3	10/27/2009	1:33	10/27/2009 1:33	34.37	21.37	70.47	
10/27/2009	1:48	10/27/2009 1:48	0	-0.5	-0.3	10/27/2009	1:48	10/27/2009 1:48	34.37	21.37	70.47	
10/27/2009	2:03	10/27/2009 2:03	0	-0.5	-0.3	10/27/2009	2:03	10/27/2009 2:03	34.28	21.37	70.47	
10/27/2009	2:18	10/27/2009 2:18	0	-0.5	-0.3	10/27/2009	2:18	10/27/2009 2:18	34.22	21.37	70.47	
10/27/2009	2:33	10/27/2009 2:33	0	-0.5	-0.3	10/27/2009	2:33	10/27/2009 2:33	34.20	21.38	70.48	
10/27/2009	2:48	10/27/2009 2:48	0	-0.5	-0.3	10/27/2009	2:48	10/27/2009 2:48	34.16	21.38	70.48	
10/27/2009	3:03	10/27/2009 3:03	0	-0.5	-0.3	10/27/2009	3:03	10/27/2009 3:03	33.98	21.38	70.49	
10/27/2009	3:18	10/27/2009 3:18	0	-0.5	-0.3	10/27/2009	3:18	10/27/2009 3:18	33.88	21.38	70.49	
10/27/2009	3:33	10/27/2009 3:33	0	-0.5	-0.3	10/27/2009	3:33	10/27/2009 3:33	33.77	21.39	70.50	
10/27/2009	3:48	10/27/2009 3:48	0	-0.5	-0.3	10/27/2009	3:48	10/27/2009 3:48	33.69	21.39	70.51	
10/27/2009	4:03	10/27/2009 4:03	0	-0.5	-0.3	10/27/2009	4:03	10/27/2009 4:03	33.56	21.39	70.51	
10/27/2009	4:18	10/27/2009 4:18	0	-0.5	-0.3	10/27/2009	4:18	10/27/2009 4:18	33.51	21.40	70.52	
10/27/2009	4:33	10/27/2009 4:33	0	-0.5	-0.3	10/27/2009	4:33	10/27/2009 4:33	33.41	21.40	70.52	
10/27/2009	4:48	10/27/2009 4:48	0	-0.5	-0.3	10/27/2009	4:48	10/27/2009 4:48	33.30	21.40	70.52	
10/27/2009	5:03	10/27/2009 5:03	0	-1	-0.5	10/27/2009	5:03	10/27/2009 5:03	33.33	21.41	70.53	
10/27/2009	5:18	10/27/2009 5:18	-0.5	-2.5	-1.5	10/27/2009	5:18	10/27/2009 5:18	33.38	21.41	70.54	
10/27/2009	5:33	10/27/2009 5:33	-0.5	-2	-1.3	10/27/2009	5:33	10/27/2009 5:33	33.39	21.41	70.54	
10/27/2009	5:48	10/27/2009 5:48	-0.5	-1	-0.8	10/27/2009	5:48	10/27/2009 5:48	33.50	21.42	70.55	

Table G-4
Phase II Pressure Difference Measurements a
St. Julien's Creek Annex Building 47

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
10/27/2009	6:03	10/27/2009 6:03	0	-2	-1.0	10/27/2009	6:03	10/27/2009 6:03	33.64	21.42	70.56	
10/27/2009	6:18	10/27/2009 6:18	0	-1.5	-0.8	10/27/2009	6:18	10/27/2009 6:18	33.62	21.42	70.56	
10/27/2009	6:33	10/27/2009 6:33	0	-1.5	-0.8	10/27/2009	6:33	10/27/2009 6:33	33.52	21.43	70.57	
10/27/2009	6:48	10/27/2009 6:48	0	-1.5	-0.8	10/27/2009	6:48	10/27/2009 6:48	33.44	21.43	70.58	
10/27/2009	7:03	10/27/2009 7:03	0	-2.5	-1.3	10/27/2009	7:03	10/27/2009 7:03	33.57	21.44	70.58	
10/27/2009	7:18	10/27/2009 7:18	0	-3.5	-1.8	10/27/2009	7:18	10/27/2009 7:18	33.61	21.48	70.66	
10/27/2009	7:33	10/27/2009 7:33	0	-3	-1.5	10/27/2009	7:33	10/27/2009 7:33	33.68	21.54	70.78	
10/27/2009	7:48	10/27/2009 7:48	-0.5	-2.5	-1.5	10/27/2009	7:48	10/27/2009 7:48	33.71	21.61	70.89	
10/27/2009	8:03	10/27/2009 8:03	0	-3	-1.5	10/27/2009	8:03	10/27/2009 8:03	33.85	21.66	70.99	
10/27/2009	8:18	10/27/2009 8:18	0	-2	-1.0	10/27/2009	8:18	10/27/2009 8:18	33.87	21.67	71.00	
10/27/2009	8:33	10/27/2009 8:33	0	-3.5	-1.8	10/27/2009	8:33	10/27/2009 8:33	33.87	21.65	70.98	
10/27/2009	8:48	10/27/2009 8:48	0	-2.5	-1.3	10/27/2009	8:48	10/27/2009 8:48	34.02	21.57	70.83	
10/27/2009	9:03	10/27/2009 9:03	0.5	-2	-0.8	10/27/2009	9:03	10/27/2009 9:03	34.03	21.47	70.65	
10/27/2009	9:18	10/27/2009 9:18	1	-2	-0.5	10/27/2009	9:18	10/27/2009 9:18	34.02	21.47	70.64	
10/27/2009	9:33	10/27/2009 9:33	0	-2	-1.0	10/27/2009	9:33	10/27/2009 9:33	34.08	21.51	70.71	
10/27/2009	9:48	10/27/2009 9:48	0	-2.5	-1.3	10/27/2009	9:48	10/27/2009 9:48	33.97	21.51	70.72	
10/27/2009	10:03	10/27/2009 10:03	0.5	-2	-0.8	10/27/2009	10:03	10/27/2009 10:03	33.97	21.53	70.76	
10/27/2009	10:18	10/27/2009 10:18	0	-2.5	-1.3	10/27/2009	10:18	10/27/2009 10:18	34.01	21.54	70.78	
10/27/2009	10:33	10/27/2009 10:33	0	-2	-1.0	10/27/2009	10:33	10/27/2009 10:33	34.03	21.55	70.78	
10/27/2009	10:48	10/27/2009 10:48	0	-1.5	-0.8	10/27/2009	10:48	10/27/2009 10:48	34.10	21.55	70.79	
10/27/2009	11:03	10/27/2009 11:03	0	-3	-1.5	10/27/2009	11:03	10/27/2009 11:03	34.23	21.55	70.80	
10/27/2009	11:18	10/27/2009 11:18	0	-3	-1.5	10/27/2009	11:18	10/27/2009 11:18	34.15	21.55	70.80	
10/27/2009	11:33	10/27/2009 11:33	0	-2	-1.0	10/27/2009	11:33	10/27/2009 11:33	34.23	21.56	70.81	
10/27/2009	11:48	10/27/2009 11:48	0	-2	-1.0	10/27/2009	11:48	10/27/2009 11:48	34.08	21.60	70.87	
10/27/2009	12:03	10/27/2009 12:03	0	-1.5	-0.8	10/27/2009	12:03	10/27/2009 12:03	34.01	21.67	71.00	
10/27/2009	12:18	10/27/2009 12:18	0	-2	-1.0	10/27/2009	12:18	10/27/2009 12:18	33.86	21.73	71.12	
10/27/2009	12:33	10/27/2009 12:33	0	-1.5	-0.8	10/27/2009	12:33	10/27/2009 12:33	33.85	21.79	71.23	
10/27/2009	12:48	10/27/2009 12:48	0	-1.5	-0.8	10/27/2009	12:48	10/27/2009 12:48	33.77	21.84	71.31	
10/27/2009	13:03	10/27/2009 13:03	0	-3	-1.5	10/27/2009	13:03	10/27/2009 13:03	33.70	21.85	71.32	
10/27/2009	13:18	10/27/2009 13:18	0	-2.5	-1.3	10/27/2009	13:18	10/27/2009 13:18	33.52	21.81	71.26	
10/27/2009	13:33	10/27/2009 13:33	0.5	-2	-0.8	10/27/2009	13:33	10/27/2009 13:33	33.48	21.79	71.22	
10/27/2009	13:48	10/27/2009 13:48	0.5	-1.5	-0.5	10/27/2009	13:48	10/27/2009 13:48	33.52	21.78	71.21	
10/27/2009	14:03	10/27/2009 14:03	1	-3	-1.0	10/27/2009	14:03	10/27/2009 14:03	33.57	21.77	71.19	
10/27/2009	14:18	10/27/2009 14:18	0.5	-2.5	-1.0	10/27/2009	14:18	10/27/2009 14:18	33.56	21.76	71.18	
10/27/2009	14:33	10/27/2009 14:33	0	-2	-1.0	10/27/2009	14:33	10/27/2009 14:33	33.57	21.77	71.18	
10/27/2009	14:48	10/27/2009 14:48	0	-2.5	-1.3	10/27/2009	14:48	10/27/2009 14:48	33.52	21.75	71.16	
10/27/2009	15:03	10/27/2009 15:03	0	-2.5	-1.3	10/27/2009	15:03	10/27/2009 15:03	33.47	21.73	71.11	
10/27/2009	15:18	10/27/2009 15:18	0	-3.5	-1.8	10/27/2009	15:18	10/27/2009 15:18	33.59	21.73	71.12	
10/27/2009	15:33	10/27/2009 15:33	0.5	-2.5	-1.0	10/27/2009	15:33	10/27/2009 15:33	33.72	21.79	71.22	
10/27/2009	15:48	10/27/2009 15:48	0	-3	-1.5	10/27/2009	15:48	10/27/2009 15:48	33.62	21.91	71.43	
10/27/2009	16:03	10/27/2009 16:03	0	-3	-1.5	10/27/2009	16:03	10/27/2009 16:03	33.69	22.03	71.65	
10/27/2009	16:18	10/27/2009 16:18	0	-2	-1.0	10/27/2009	16:18	10/27/2009 16:18	33.52	22.07	71.72	
10/27/2009	16:33	10/27/2009 16:33	0	-2.5	-1.3	10/27/2009	16:33	10/27/2009 16:33	33.52	22.05	71.68	
10/27/2009	16:48	10/27/2009 16:48	-0.5	-1.5	-1.0	10/27/2009	16:48	10/27/2009 16:48	33.51	22.00	71.59	
10/27/2009	17:03	10/27/2009 17:03	0	-1.5	-0.8	10/27/2009	17:03	10/27/2009 17:03	33.59	21.92	71.46	
10/27/2009	17:18	10/27/2009 17:18	0	-1	-0.5	10/27/2009	17:18	10/27/2009 17:18	33.58	21.87	71.36	
10/27/2009	17:33	10/27/2009 17:33	0	-1	-0.5	10/27/2009	17:33	10/27/2009 17:33	33.65	21.85	71.32	
10/27/2009	17:48	10/27/2009 17:48	-0.5	-1.5	-1.0	10/27/2009	17:48	10/27/2009 17:48	33.71	21.84	71.30	
10/27/2009	18:03	10/27/2009 18:03	0	-1.5	-0.8	10/27/2009	18:03	10/27/2009 18:03	33.73	21.84	71.31	
10/27/2009	18:18	10/27/2009 18:18	-0.5	-1.5	-1.0	10/27/2009	18:18	10/27/2009 18:18	33.84	21.85	71.34	
10/27/2009	18:33	10/27/2009 18:33	-0.5	-1.5	-1.0	10/27/2009	18:33	10/27/2009 18:33	33.85	21.87	71.36	
10/27/2009	18:48	10/27/2009 18:48	-0.5	-1	-0.8	10/27/2009	18:48	10/27/2009 18:48	33.82	21.87	71.37	
10/27/2009	19:03	10/27/2009 19:03	-0.5	-1	-0.8	10/27/2009	19:03	10/27/2009 19:03	33.79	21.89	71.40	
10/27/2009	19:18	10/27/2009 19:18	-0.5	-1	-0.8	10/27/2009	19:18	10/27/2009 19:18	33.93	21.90	71.42	

Table G-4
Phase II Pressure Difference Measurements a
St. Julien's Creek Annex Building 47

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
10/27/2009	19:33	10/27/2009 19:33	-0.5	-1	-0.8	10/27/2009	19:33	10/27/2009 19:33	34.14	21.91	71.44	
10/27/2009	19:48	10/27/2009 19:48	0	-2	-1.0	10/27/2009	19:48	10/27/2009 19:48	34.07	21.93	71.47	
10/27/2009	20:03	10/27/2009 20:03	0	-1	-0.5	10/27/2009	20:03	10/27/2009 20:03	33.97	21.94	71.48	
10/27/2009	20:18	10/27/2009 20:18	0	-1	-0.5	10/27/2009	20:18	10/27/2009 20:18	33.91	21.94	71.48	
10/27/2009	20:33	10/27/2009 20:33	0	-0.5	-0.3	10/27/2009	20:33	10/27/2009 20:33	33.83	21.95	71.51	
10/27/2009	20:48	10/27/2009 20:48	0	-0.5	-0.3	10/27/2009	20:48	10/27/2009 20:48	33.76	21.96	71.53	
10/27/2009	21:03	10/27/2009 21:03	0	-0.5	-0.3	10/27/2009	21:03	10/27/2009 21:03	33.65	21.97	71.54	
10/27/2009	21:18	10/27/2009 21:18	0	-0.5	-0.3	10/27/2009	21:18	10/27/2009 21:18	33.59	21.98	71.57	
10/27/2009	21:33	10/27/2009 21:33	0	-0.5	-0.3	10/27/2009	21:33	10/27/2009 21:33	33.62	21.99	71.59	
10/27/2009	21:48	10/27/2009 21:48	0	-0.5	-0.3	10/27/2009	21:48	10/27/2009 21:48	33.54	21.99	71.59	
10/27/2009	22:03	10/27/2009 22:03	0	-0.5	-0.3	10/27/2009	22:03	10/27/2009 22:03	33.49	22.00	71.61	
10/27/2009	22:18	10/27/2009 22:18	0	-1	-0.5	10/27/2009	22:18	10/27/2009 22:18	33.56	22.02	71.63	
10/27/2009	22:33	10/27/2009 22:33	0	-1	-0.5	10/27/2009	22:33	10/27/2009 22:33	33.48	22.02	71.63	
10/27/2009	22:48	10/27/2009 22:48	0	-1	-0.5	10/27/2009	22:48	10/27/2009 22:48	33.45	22.03	71.65	
10/27/2009	23:03	10/27/2009 23:03	0	-1	-0.5	10/27/2009	23:03	10/27/2009 23:03	33.40	22.03	71.66	
10/27/2009	23:18	10/27/2009 23:18	0	-1	-0.5	10/27/2009	23:18	10/27/2009 23:18	33.28	22.04	71.67	
10/27/2009	23:33	10/27/2009 23:33	-0.5	-1	-0.8	10/27/2009	23:33	10/27/2009 23:33	33.14	22.06	71.70	
10/27/2009	23:48	10/27/2009 23:48	0	-1	-0.5	10/27/2009	23:48	10/27/2009 23:48	32.95	22.08	71.75	
10/28/2009	0:03	10/28/2009 0:03	0	-1	-0.5	10/28/2009	0:03	10/28/2009 0:03	32.79	22.10	71.78	
10/28/2009	0:18	10/28/2009 0:18	0	-1	-0.5	10/28/2009	0:18	10/28/2009 0:18	32.67	22.10	71.77	
10/28/2009	0:33	10/28/2009 0:33	0	-1	-0.5	10/28/2009	0:33	10/28/2009 0:33	32.48	22.10	71.77	
10/28/2009	0:48	10/28/2009 0:48	0	-1	-0.5	10/28/2009	0:48	10/28/2009 0:48	32.38	22.10	71.79	
10/28/2009	1:03	10/28/2009 1:03	0	-1	-0.5	10/28/2009	1:03	10/28/2009 1:03	32.37	22.10	71.78	
10/28/2009	1:18	10/28/2009 1:18	0	-1	-0.5	10/28/2009	1:18	10/28/2009 1:18	32.33	22.09	71.77	
10/28/2009	1:33	10/28/2009 1:33	0	-1	-0.5	10/28/2009	1:33	10/28/2009 1:33	32.24	22.10	71.79	
10/28/2009	1:48	10/28/2009 1:48	0	-1	-0.5	10/28/2009	1:48	10/28/2009 1:48	32.08	22.10	71.78	
10/28/2009	2:03	10/28/2009 2:03	0	-1	-0.5	10/28/2009	2:03	10/28/2009 2:03	31.95	22.09	71.77	
10/28/2009	2:18	10/28/2009 2:18	0	-1.5	-0.8	10/28/2009	2:18	10/28/2009 2:18	31.87	22.10	71.78	
10/28/2009	2:33	10/28/2009 2:33	0	-1.5	-0.8	10/28/2009	2:33	10/28/2009 2:33	31.72	22.10	71.79	
10/28/2009	2:48	10/28/2009 2:48	0	-1.5	-0.8	10/28/2009	2:48	10/28/2009 2:48	31.60	22.10	71.78	
10/28/2009	3:03	10/28/2009 3:03	0	-1.5	-0.8	10/28/2009	3:03	10/28/2009 3:03	31.57	22.11	71.79	
10/28/2009	3:18	10/28/2009 3:18	0	-1	-0.5	10/28/2009	3:18	10/28/2009 3:18	31.46	22.11	71.81	
10/28/2009	3:33	10/28/2009 3:33	0.5	-1.5	-0.5	10/28/2009	3:33	10/28/2009 3:33	31.29	22.11	71.80	
10/28/2009	3:48	10/28/2009 3:48	0	-1.5	-0.8	10/28/2009	3:48	10/28/2009 3:48	31.23	22.12	71.81	
10/28/2009	4:03	10/28/2009 4:03	0	-1.5	-0.8	10/28/2009	4:03	10/28/2009 4:03	31.05	22.13	71.84	
10/28/2009	4:18	10/28/2009 4:18	0	-1.5	-0.8	10/28/2009	4:18	10/28/2009 4:18	30.79	22.13	71.84	
10/28/2009	4:33	10/28/2009 4:33	1	-2	-0.5	10/28/2009	4:33	10/28/2009 4:33	30.89	22.14	71.86	
10/28/2009	4:48	10/28/2009 4:48	0.5	-1	-0.3	10/28/2009	4:48	10/28/2009 4:48	30.75	22.16	71.89	
10/28/2009	5:03	10/28/2009 5:03	1.5	-1.5	0.0	10/28/2009	5:03	10/28/2009 5:03	30.82	22.18	71.92	
10/28/2009	5:18	10/28/2009 5:18	0.5	-2.5	-1.0	10/28/2009	5:18	10/28/2009 5:18	30.70	22.19	71.94	
10/28/2009	5:33	10/28/2009 5:33	0.5	-2	-0.8	10/28/2009	5:33	10/28/2009 5:33	30.78	22.22	71.99	
10/28/2009	5:48	10/28/2009 5:48	0.5	-2	-0.8	10/28/2009	5:48	10/28/2009 5:48	30.68	22.24	72.03	
10/28/2009	6:03	10/28/2009 6:03	1	-2.5	-0.8	10/28/2009	6:03	10/28/2009 6:03	30.66	22.27	72.08	
10/28/2009	6:18	10/28/2009 6:18	1	-2.5	-0.8	10/28/2009	6:18	10/28/2009 6:18	30.81	22.31	72.15	
10/28/2009	6:33	10/28/2009 6:33	1.5	-3.5	-1.0	10/28/2009	6:33	10/28/2009 6:33	30.75	22.35	72.22	
10/28/2009	6:48	10/28/2009 6:48	1.5	-4	-1.3	10/28/2009	6:48	10/28/2009 6:48	30.81	22.38	72.28	
10/28/2009	7:03	10/28/2009 7:03	2	-2.5	-0.3	10/28/2009	7:03	10/28/2009 7:03	30.81	22.50	72.50	
10/28/2009	7:18	10/28/2009 7:18	1	-2.5	-0.8	10/28/2009	7:18	10/28/2009 7:18	30.88	22.66	72.79	
10/28/2009	7:33	10/28/2009 7:33	0.5	-2	-0.8	10/28/2009	7:33	10/28/2009 7:33	30.86	22.82	73.07	
10/28/2009	7:48	10/28/2009 7:48	1	-2	-0.5	10/28/2009	7:48	10/28/2009 7:48	30.79	22.96	73.33	
10/28/2009	8:03	10/28/2009 8:03	1	-2.5	-0.8	10/28/2009	8:03	10/28/2009 8:03	30.86	23.05	73.50	
10/28/2009	8:18	10/28/2009 8:18	1	-2	-0.5	10/28/2009	8:18	10/28/2009 8:18	30.91	23.11	73.60	
10/28/2009	8:33	10/28/2009 8:33	1	-2.5	-0.8	10/28/2009	8:33	10/28/2009 8:33	30.96	23.11	73.60	
10/28/2009	8:48	10/28/2009 8:48	1	-1.5	-0.3	10/28/2009	8:48	10/28/2009 8:48	31.03	23.08	73.55	

Table G-4
Phase II Pressure Difference Measurements a
St. Julien's Creek Annex Building 47

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
10/28/2009	9:03	10/28/2009 9:03	1	-2	-0.5	10/28/2009	9:03	10/28/2009 9:03	31.12	23.04	73.47	
10/28/2009	9:18	10/28/2009 9:18	1.5	-2.5	-0.5	10/28/2009	9:18	10/28/2009 9:18	31.15	22.98	73.36	
10/28/2009	9:33	10/28/2009 9:33	4.5	-4	0.3	10/28/2009	9:33	10/28/2009 9:33	31.11	22.92	73.25	
10/28/2009	9:48	10/28/2009 9:48	1	-3.5	-1.3	10/28/2009	9:48	10/28/2009 9:48	31.20	22.87	73.17	
10/28/2009	10:03	10/28/2009 10:03	4.5	-6	-0.8	10/28/2009	10:03	10/28/2009 10:03	31.20	22.83	73.10	
10/28/2009	10:18	10/28/2009 10:18	1.5	-5	-1.8	10/28/2009	10:18	10/28/2009 10:18	31.29	22.80	73.04	
10/28/2009	10:33	10/28/2009 10:33	0	-7.5	-3.8	10/28/2009	10:33	10/28/2009 10:33	31.31	22.80	73.05	
10/28/2009	10:48	10/28/2009 10:48	0	-8.5	-4.3	10/28/2009	10:48	10/28/2009 10:48	31.34	22.84	73.10	
10/28/2009	11:03	10/28/2009 11:03	0.5	-7	-3.3	10/28/2009	11:03	10/28/2009 11:03	31.43	22.88	73.19	
10/28/2009	11:18	10/28/2009 11:18	0.5	-5.5	-2.5	10/28/2009	11:18	10/28/2009 11:18	31.47	22.98	73.37	
10/28/2009	11:33	10/28/2009 11:33	0.5	-7.5	-3.5	10/28/2009	11:33	10/28/2009 11:33	31.54	23.14	73.64	
10/28/2009	11:48	10/28/2009 11:48	0	-7	-3.5	10/28/2009	11:48	10/28/2009 11:48	31.42	23.10	73.58	
10/28/2009	12:03	10/28/2009 12:03	2.5	-6	-1.8	10/28/2009	12:03	10/28/2009 12:03	31.40	22.68	72.82	
10/28/2009	12:18	10/28/2009 12:18	0.5	-6.5	-3.0	10/28/2009	12:18	10/28/2009 12:18	31.34	22.29	72.12	
10/28/2009	12:33	10/28/2009 12:33	1	-5.5	-2.3	10/28/2009	12:33	10/28/2009 12:33	31.40	22.34	72.20	
10/28/2009	12:48	10/28/2009 12:48	0.5	-5	-2.3	10/28/2009	12:48	10/28/2009 12:48	31.39	22.50	72.51	
10/28/2009	13:03	10/28/2009 13:03	1.5	-7.5	-3.0	10/28/2009	13:03	10/28/2009 13:03	31.38	22.34	72.21	
10/28/2009	13:18	10/28/2009 13:18	1	-5.5	-2.3	10/28/2009	13:18	10/28/2009 13:18	31.35	22.33	72.19	
10/28/2009	13:33	10/28/2009 13:33	0.5	-5	-2.3	10/28/2009	13:33	10/28/2009 13:33	31.30	22.42	72.36	
10/28/2009	13:48	10/28/2009 13:48	0.5	-8	-3.8	10/28/2009	13:48	10/28/2009 13:48	31.33	22.53	72.55	
10/28/2009	14:03	10/28/2009 14:03	0	-6	-3.0	10/28/2009	14:03	10/28/2009 14:03	31.30	22.65	72.77	
10/28/2009	14:18	10/28/2009 14:18	-0.5	-8.5	-4.5	10/28/2009	14:18	10/28/2009 14:18	31.31	22.75	72.96	
10/28/2009	14:33	10/28/2009 14:33	1.5	-9	-3.8	10/28/2009	14:33	10/28/2009 14:33	31.35	22.87	73.17	
10/28/2009	14:48	10/28/2009 14:48	2	-5	-1.5	10/28/2009	14:48	10/28/2009 14:48	31.37	22.97	73.34	
10/28/2009	15:03	10/28/2009 15:03	0.5	-5.5	-2.5	10/28/2009	15:03	10/28/2009 15:03	31.43	22.72	72.90	
10/28/2009	15:18	10/28/2009 15:18	0.5	-7.5	-3.5	10/28/2009	15:18	10/28/2009 15:18	31.45	22.14	71.85	
10/28/2009	15:33	10/28/2009 15:33	0.5	-3	-1.3	10/28/2009	15:33	10/28/2009 15:33	31.53	21.75	71.15	
10/28/2009	15:48	10/28/2009 15:48	1	-5	-2.0	10/28/2009	15:48	10/28/2009 15:48	31.54	21.73	71.11	
10/28/2009	16:03	10/28/2009 16:03	0	-6	-3.0	10/28/2009	16:03	10/28/2009 16:03	31.54	21.45	70.61	
10/28/2009	16:18	10/28/2009 16:18	1	-4	-1.5	10/28/2009	16:18	10/28/2009 16:18	31.62	21.43	70.58	
10/28/2009	16:33	10/28/2009 16:33	0	-7.5	-3.8	10/28/2009	16:33	10/28/2009 16:33	31.70	21.46	70.63	
10/28/2009	16:48	10/28/2009 16:48	0.5	-4.5	-2.0	10/28/2009	16:48	10/28/2009 16:48	31.75	21.28	70.30	
10/28/2009	17:03	10/28/2009 17:03	1	-4.5	-1.8	10/28/2009	17:03	10/28/2009 17:03	31.81	21.07	69.92	
10/28/2009	17:18	10/28/2009 17:18	0	-3	-1.5	10/28/2009	17:18	10/28/2009 17:18	31.85	20.88	69.59	
10/28/2009	17:33	10/28/2009 17:33	0	-3	-1.5	10/28/2009	17:33	10/28/2009 17:33	31.94	20.72	69.30	
10/28/2009	17:48	10/28/2009 17:48	0	-2	-1.0	10/28/2009	17:48	10/28/2009 17:48	32.01	20.59	69.07	
10/28/2009	18:03	10/28/2009 18:03	0	-1	-0.5	10/28/2009	18:03	10/28/2009 18:03	32.13	20.65	69.17	
10/28/2009	18:18	10/28/2009 18:18	0	-0.5	-0.3	10/28/2009	18:18	10/28/2009 18:18	32.29	20.99	69.78	
10/28/2009	18:33	10/28/2009 18:33	0	-2	-1.0	10/28/2009	18:33	10/28/2009 18:33	32.41	21.36	70.45	
10/28/2009	18:48	10/28/2009 18:48	0	-1	-0.5	10/28/2009	18:48	10/28/2009 18:48	32.52	21.46	70.62	
10/28/2009	19:03	10/28/2009 19:03	0	-1	-0.5	10/28/2009	19:03	10/28/2009 19:03	32.67	21.45	70.61	
10/28/2009	19:18	10/28/2009 19:18	0	-1	-0.5	10/28/2009	19:18	10/28/2009 19:18	32.78	21.57	70.83	
10/28/2009	19:33	10/28/2009 19:33	0	-0.5	-0.3	10/28/2009	19:33	10/28/2009 19:33	32.86	21.74	71.12	
10/28/2009	19:48	10/28/2009 19:48	0	-0.5	-0.3	10/28/2009	19:48	10/28/2009 19:48	32.90	21.90	71.41	
10/28/2009	20:03	10/28/2009 20:03	0	-1	-0.5	10/28/2009	20:03	10/28/2009 20:03	32.99	22.02	71.64	
10/28/2009	20:18	10/28/2009 20:18	0	-0.5	-0.3	10/28/2009	20:18	10/28/2009 20:18	33.09	22.12	71.81	
10/28/2009	20:33	10/28/2009 20:33	0	-0.5	-0.3	10/28/2009	20:33	10/28/2009 20:33	33.18	22.18	71.93	
10/28/2009	20:48	10/28/2009 20:48	0	-0.5	-0.3	10/28/2009	20:48	10/28/2009 20:48	33.17	22.23	72.02	
10/28/2009	21:03	10/28/2009 21:03	0	-0.5	-0.3	10/28/2009	21:03	10/28/2009 21:03	33.17	22.25	72.05	
10/28/2009	21:18	10/28/2009 21:18	0	-0.5	-0.3	10/28/2009	21:18	10/28/2009 21:18	33.26	22.27	72.08	
10/28/2009	21:33	10/28/2009 21:33	0	-1	-0.5	10/28/2009	21:33	10/28/2009 21:33	33.33	22.27	72.08	
10/28/2009	21:48	10/28/2009 21:48	0	-1	-0.5	10/28/2009	21:48	10/28/2009 21:48	33.41	22.27	72.08	
10/28/2009	22:03	10/28/2009 22:03	0	-1	-0.5	10/28/2009	22:03	10/28/2009 22:03	33.47	22.25	72.05	
10/28/2009	22:18	10/28/2009 22:18	0	-1	-0.5	10/28/2009	22:18	10/28/2009 22:18	33.57	22.24	72.03	

Table G-4
Phase II Pressure Difference Measurements a
St. Julien's Creek Annex Building 47

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
10/28/2009	22:33	10/28/2009 22:33	-0.5	-0.5	-0.5	10/28/2009	22:33	10/28/2009 22:33	33.57	22.22	72.00	
10/28/2009	22:48	10/28/2009 22:48	-0.5	-1	-0.8	10/28/2009	22:48	10/28/2009 22:48	33.59	22.20	71.96	
10/28/2009	23:03	10/28/2009 23:03	0	-0.5	-0.3	10/28/2009	23:03	10/28/2009 23:03	33.60	22.18	71.92	
10/28/2009	23:18	10/28/2009 23:18	0	-1	-0.5	10/28/2009	23:18	10/28/2009 23:18	33.60	22.16	71.89	
10/28/2009	23:33	10/28/2009 23:33	0	-1	-0.5	10/28/2009	23:33	10/28/2009 23:33	33.72	22.13	71.84	
10/28/2009	23:48	10/28/2009 23:48	0	-1.5	-0.8	10/28/2009	23:48	10/28/2009 23:48	33.79	22.11	71.79	
10/29/2009	0:03	10/29/2009 0:03	0	-1	-0.5	10/29/2009	0:03	10/29/2009 0:03	33.80	22.08	71.75	
10/29/2009	0:18	10/29/2009 0:18	0	-1	-0.5	10/29/2009	0:18	10/29/2009 0:18	33.87	22.06	71.71	
10/29/2009	0:33	10/29/2009 0:33	0	-0.5	-0.3	10/29/2009	0:33	10/29/2009 0:33	33.94	22.04	71.66	
10/29/2009	0:48	10/29/2009 0:48	0	-1	-0.5	10/29/2009	0:48	10/29/2009 0:48	34.02	22.02	71.63	
10/29/2009	1:03	10/29/2009 1:03	0	-0.5	-0.3	10/29/2009	1:03	10/29/2009 1:03	34.07	22.00	71.59	
10/29/2009	1:18	10/29/2009 1:18	0	-0.5	-0.3	10/29/2009	1:18	10/29/2009 1:18	34.13	21.97	71.55	
10/29/2009	1:33	10/29/2009 1:33	0	-1	-0.5	10/29/2009	1:33	10/29/2009 1:33	34.22	21.96	71.52	
10/29/2009	1:48	10/29/2009 1:48	0	-1	-0.5	10/29/2009	1:48	10/29/2009 1:48	34.33	21.93	71.48	
10/29/2009	2:03	10/29/2009 2:03	0.5	-1	-0.3	10/29/2009	2:03	10/29/2009 2:03	34.38	21.92	71.45	
10/29/2009	2:18	10/29/2009 2:18	0	-0.5	-0.3	10/29/2009	2:18	10/29/2009 2:18	34.41	21.90	71.42	
10/29/2009	2:33	10/29/2009 2:33	0	-0.5	-0.3	10/29/2009	2:33	10/29/2009 2:33	34.47	21.88	71.38	
10/29/2009	2:48	10/29/2009 2:48	0	-1	-0.5	10/29/2009	2:48	10/29/2009 2:48	34.50	21.86	71.34	
10/29/2009	3:03	10/29/2009 3:03	0	-1	-0.5	10/29/2009	3:03	10/29/2009 3:03	34.59	21.84	71.31	
10/29/2009	3:18	10/29/2009 3:18	0	-1	-0.5	10/29/2009	3:18	10/29/2009 3:18	34.60	21.82	71.27	
10/29/2009	3:33	10/29/2009 3:33	0	-1	-0.5	10/29/2009	3:33	10/29/2009 3:33	34.64	21.80	71.23	
10/29/2009	3:48	10/29/2009 3:48	0	-0.5	-0.3	10/29/2009	3:48	10/29/2009 3:48	34.62	21.77	71.19	
10/29/2009	4:03	10/29/2009 4:03	0	-1	-0.5	10/29/2009	4:03	10/29/2009 4:03	34.61	21.76	71.16	
10/29/2009	4:18	10/29/2009 4:18	0	-1	-0.5	10/29/2009	4:18	10/29/2009 4:18	34.64	21.73	71.11	
10/29/2009	4:33	10/29/2009 4:33	0	-1	-0.5	10/29/2009	4:33	10/29/2009 4:33	34.67	21.71	71.07	
10/29/2009	4:48	10/29/2009 4:48	0	-1	-0.5	10/29/2009	4:48	10/29/2009 4:48	34.67	21.68	71.02	
10/29/2009	5:03	10/29/2009 5:03	0	-1.5	-0.8	10/29/2009	5:03	10/29/2009 5:03	34.78	21.66	70.99	
10/29/2009	5:18	10/29/2009 5:18	0	-1	-0.5	10/29/2009	5:18	10/29/2009 5:18	34.97	21.63	70.94	
10/29/2009	5:33	10/29/2009 5:33	0	-1	-0.5	10/29/2009	5:33	10/29/2009 5:33	35.06	21.61	70.90	
10/29/2009	5:48	10/29/2009 5:48	0	-1	-0.5	10/29/2009	5:48	10/29/2009 5:48	35.21	21.59	70.86	
10/29/2009	6:03	10/29/2009 6:03	0	-1	-0.5	10/29/2009	6:03	10/29/2009 6:03	35.33	21.57	70.82	
10/29/2009	6:18	10/29/2009 6:18	0	-1	-0.5	10/29/2009	6:18	10/29/2009 6:18	35.43	21.55	70.78	
10/29/2009	6:33	10/29/2009 6:33	0	-1	-0.5	10/29/2009	6:33	10/29/2009 6:33	35.44	21.53	70.75	
10/29/2009	6:48	10/29/2009 6:48	1.5	-1	0.3	10/29/2009	6:48	10/29/2009 6:48	35.51	21.52	70.73	
10/29/2009	7:03	10/29/2009 7:03	1	0	0.5	10/29/2009	7:03	10/29/2009 7:03	35.61	21.59	70.86	
10/29/2009	7:18	10/29/2009 7:18	2	-0.5	0.8	10/29/2009	7:18	10/29/2009 7:18	35.71	21.73	71.12	
10/29/2009	7:33	10/29/2009 7:33	3	-0.5	1.3	10/29/2009	7:33	10/29/2009 7:33	35.78	21.89	71.40	
10/29/2009	7:48	10/29/2009 7:48	1.5	-0.5	0.5	10/29/2009	7:48	10/29/2009 7:48	35.85	21.95	71.51	
10/29/2009	8:03	10/29/2009 8:03	2	-0.5	0.8	10/29/2009	8:03	10/29/2009 8:03	35.95	21.95	71.52	
10/29/2009	8:18	10/29/2009 8:18	5.5	0	2.8	10/29/2009	8:18	10/29/2009 8:18	36.06	21.94	71.48	
10/29/2009	8:33	10/29/2009 8:33	8	0	4.0	10/29/2009	8:33	10/29/2009 8:33	36.18	21.91	71.44	
10/29/2009	8:48	10/29/2009 8:48	5	-0.5	2.3	10/29/2009	8:48	10/29/2009 8:48	36.33	21.88	71.38	
10/29/2009	9:03	10/29/2009 9:03	5.5	0.5	3.0	10/29/2009	9:03	10/29/2009 9:03	36.43	21.84	71.31	
10/29/2009	9:18	10/29/2009 9:18	5.5	0	2.8	10/29/2009	9:18	10/29/2009 9:18	36.48	21.79	71.22	
10/29/2009	9:33	10/29/2009 9:33	7	1	4.0	10/29/2009	9:33	10/29/2009 9:33	36.47	21.73	71.11	
10/29/2009	9:48	10/29/2009 9:48	7.5	1	4.3	10/29/2009	9:48	10/29/2009 9:48	36.47	21.66	70.99	
10/29/2009	10:03	10/29/2009 10:03	7	1	4.0	10/29/2009	10:03	10/29/2009 10:03	36.54	21.59	70.87	
10/29/2009	10:18	10/29/2009 10:18	5	0.5	2.8	10/29/2009	10:18	10/29/2009 10:18	36.65	21.53	70.76	
10/29/2009	10:33	10/29/2009 10:33	4.5	-0.5	2.0	10/29/2009	10:33	10/29/2009 10:33	36.73	21.47	70.65	
10/29/2009	10:48	10/29/2009 10:48	1.5	0	0.8	10/29/2009	10:48	10/29/2009 10:48	36.77	21.43	70.58	
10/29/2009	11:03	10/29/2009 11:03	3	0	1.5	10/29/2009	11:03	10/29/2009 11:03	36.78	21.39	70.51	
10/29/2009	11:18	10/29/2009 11:18	3	0	1.5	10/29/2009	11:18	10/29/2009 11:18	36.86	21.37	70.46	
10/29/2009	11:33	10/29/2009 11:33	3	-0.5	1.3	10/29/2009	11:33	10/29/2009 11:33	36.89	21.35	70.43	
10/29/2009	11:48	10/29/2009 11:48	3.5	0	1.8	10/29/2009	11:48	10/29/2009 11:48	36.91	21.39	70.49	

Table G-4
Phase II Pressure Difference Measurements a
St. Julien's Creek Annex Building 47

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
10/29/2009	12:03	10/29/2009 12:03	3.5	0	1.8	10/29/2009	12:03	10/29/2009 12:03	36.86	21.49	70.68	
10/29/2009	12:18	10/29/2009 12:18	3.5	0	1.8	10/29/2009	12:18	10/29/2009 12:18	36.79	21.65	70.96	
10/29/2009	12:33	10/29/2009 12:33	3	-0.5	1.3	10/29/2009	12:33	10/29/2009 12:33	36.82	21.76	71.17	
10/29/2009	12:48	10/29/2009 12:48	3.5	0	1.8	10/29/2009	12:48	10/29/2009 12:48	36.78	21.86	71.35	
10/29/2009	13:03	10/29/2009 13:03	2.5	0	1.3	10/29/2009	13:03	10/29/2009 13:03	36.69	21.94	71.49	
10/29/2009	13:18	10/29/2009 13:18	2	0	1.0	10/29/2009	13:18	10/29/2009 13:18	36.61	21.98	71.56	
10/29/2009	13:33	10/29/2009 13:33	4	0	2.0	10/29/2009	13:33	10/29/2009 13:33	36.61	21.97	71.54	
10/29/2009	13:48	10/29/2009 13:48	3.5	0	1.8	10/29/2009	13:48	10/29/2009 13:48	36.67	21.93	71.47	
10/29/2009	14:03	10/29/2009 14:03	1.5	0	0.8	10/29/2009	14:03	10/29/2009 14:03	36.73	21.87	71.36	
10/29/2009	14:18	10/29/2009 14:18	3.5	0	1.8	10/29/2009	14:18	10/29/2009 14:18	36.68	21.81	71.26	
10/29/2009	14:33	10/29/2009 14:33	2.5	-1	0.8	10/29/2009	14:33	10/29/2009 14:33	36.54	21.75	71.14	
10/29/2009	14:48	10/29/2009 14:48	4	0	2.0	10/29/2009	14:48	10/29/2009 14:48	36.53	21.69	71.04	
10/29/2009	15:03	10/29/2009 15:03	2.5	0	1.3	10/29/2009	15:03	10/29/2009 15:03	36.53	21.63	70.94	
10/29/2009	15:18	10/29/2009 15:18	2.5	0	1.3	10/29/2009	15:18	10/29/2009 15:18	36.45	21.53	70.76	
10/29/2009	15:33	10/29/2009 15:33	3.5	0	1.8	10/29/2009	15:33	10/29/2009 15:33	36.61	21.45	70.61	
10/29/2009	15:48	10/29/2009 15:48	3.5	-0.5	1.5	10/29/2009	15:48	10/29/2009 15:48	36.66	21.46	70.62	
10/29/2009	16:03	10/29/2009 16:03	3.5	-0.5	1.5	10/29/2009	16:03	10/29/2009 16:03	36.71	21.53	70.75	
10/29/2009	16:18	10/29/2009 16:18	0	-0.5	-0.3	10/29/2009	16:18	10/29/2009 16:18	36.75	21.59	70.85	
10/29/2009	16:33	10/29/2009 16:33	0.5	-0.5	0.0	10/29/2009	16:33	10/29/2009 16:33	36.73	21.62	70.91	
10/29/2009	16:48	10/29/2009 16:48	0	-0.5	-0.3	10/29/2009	16:48	10/29/2009 16:48	36.71	21.62	70.91	
10/29/2009	17:03	10/29/2009 17:03	0	-0.5	-0.3	10/29/2009	17:03	10/29/2009 17:03	36.72	21.61	70.89	
10/29/2009	17:18	10/29/2009 17:18	0.5	-1	-0.3	10/29/2009	17:18	10/29/2009 17:18	36.78	21.58	70.85	
10/29/2009	17:33	10/29/2009 17:33	0	-1.5	-0.8	10/29/2009	17:33	10/29/2009 17:33	36.79	21.56	70.80	
10/29/2009	17:48	10/29/2009 17:48	1	-1	0.0	10/29/2009	17:48	10/29/2009 17:48	36.79	21.52	70.74	
10/29/2009	18:03	10/29/2009 18:03	0.5	-1	-0.3	10/29/2009	18:03	10/29/2009 18:03	36.74	21.50	70.69	
10/29/2009	18:18	10/29/2009 18:18	0.5	-0.5	0.0	10/29/2009	18:18	10/29/2009 18:18	36.84	21.47	70.65	
10/29/2009	18:33	10/29/2009 18:33	0	-1	-0.5	10/29/2009	18:33	10/29/2009 18:33	36.88	21.45	70.60	
10/29/2009	18:48	10/29/2009 18:48	0.5	-0.5	0.0	10/29/2009	18:48	10/29/2009 18:48	36.97	21.42	70.56	
10/29/2009	19:03	10/29/2009 19:03	0.5	-1	-0.3	10/29/2009	19:03	10/29/2009 19:03	37.04	21.40	70.52	
10/29/2009	19:18	10/29/2009 19:18	0.5	-1	-0.3	10/29/2009	19:18	10/29/2009 19:18	37.05	21.38	70.48	
10/29/2009	19:33	10/29/2009 19:33	0	-0.5	-0.3	10/29/2009	19:33	10/29/2009 19:33	36.99	21.36	70.44	
10/29/2009	19:48	10/29/2009 19:48	0.5	-0.5	0.0	10/29/2009	19:48	10/29/2009 19:48	37.08	21.34	70.41	
10/29/2009	20:03	10/29/2009 20:03	0.5	-1	-0.3	10/29/2009	20:03	10/29/2009 20:03	37.09	21.32	70.37	
10/29/2009	20:18	10/29/2009 20:18	0	-0.5	-0.3	10/29/2009	20:18	10/29/2009 20:18	37.16	21.30	70.35	
10/29/2009	20:33	10/29/2009 20:33	0	-1	-0.5	10/29/2009	20:33	10/29/2009 20:33	37.17	21.29	70.31	
10/29/2009	20:48	10/29/2009 20:48	0.5	-1	-0.3	10/29/2009	20:48	10/29/2009 20:48	37.23	21.27	70.29	
10/29/2009	21:03	10/29/2009 21:03	0.5	-1	-0.3	10/29/2009	21:03	10/29/2009 21:03	37.24	21.26	70.26	
10/29/2009	21:18	10/29/2009 21:18	0.5	-1	-0.3	10/29/2009	21:18	10/29/2009 21:18	37.27	21.25	70.24	
10/29/2009	21:33	10/29/2009 21:33	0.5	-0.5	0.0	10/29/2009	21:33	10/29/2009 21:33	37.30	21.23	70.22	
10/29/2009	21:48	10/29/2009 21:48	0	-1	-0.5	10/29/2009	21:48	10/29/2009 21:48	37.34	21.22	70.19	
10/29/2009	22:03	10/29/2009 22:03	0	-1	-0.5	10/29/2009	22:03	10/29/2009 22:03	37.38	21.20	70.16	
10/29/2009	22:18	10/29/2009 22:18	0.5	-1	-0.3	10/29/2009	22:18	10/29/2009 22:18	37.40	21.19	70.13	
10/29/2009	22:33	10/29/2009 22:33	0.5	-0.5	0.0	10/29/2009	22:33	10/29/2009 22:33	37.36	21.17	70.11	
10/29/2009	22:48	10/29/2009 22:48	0	-1	-0.5	10/29/2009	22:48	10/29/2009 22:48	37.30	21.16	70.08	
10/29/2009	23:03	10/29/2009 23:03	0	-1	-0.5	10/29/2009	23:03	10/29/2009 23:03	37.23	21.14	70.06	
10/29/2009	23:18	10/29/2009 23:18	0	-0.5	-0.3	10/29/2009	23:18	10/29/2009 23:18	37.18	21.13	70.03	
10/29/2009	23:33	10/29/2009 23:33	0	-1	-0.5	10/29/2009	23:33	10/29/2009 23:33	37.12	21.12	70.01	
10/29/2009	23:48	10/29/2009 23:48	0	-0.5	-0.3	10/29/2009	23:48	10/29/2009 23:48	37.08	21.10	69.98	
10/30/2009	0:03	10/30/2009 0:03	0	-0.5	-0.3	10/30/2009	0:03	10/30/2009 0:03	37.05	21.09	69.96	
10/30/2009	0:18	10/30/2009 0:18	0.5	-0.5	0.0	10/30/2009	0:18	10/30/2009 0:18	37.10	21.08	69.95	
10/30/2009	0:33	10/30/2009 0:33	0	-1	-0.5	10/30/2009	0:33	10/30/2009 0:33	37.08	21.07	69.92	
10/30/2009	0:48	10/30/2009 0:48	0	-1	-0.5	10/30/2009	0:48	10/30/2009 0:48	37.05	21.06	69.90	
10/30/2009	1:03	10/30/2009 1:03	0.5	-1	-0.3	10/30/2009	1:03	10/30/2009 1:03	37.06	21.06	69.91	
10/30/2009	1:18	10/30/2009 1:18	0	-0.5	-0.3	10/30/2009	1:18	10/30/2009 1:18	37.06	21.06	69.91	

Table G-4
Phase II Pressure Difference Measurements a
St. Julien's Creek Annex Building 47

Date	Time	Date + Time	Maximum Differential Pressure[d]	Maximum Differential Pressure[d]	Average Pressure [Pa]	Date	Time	Date + Time	Indoor Barometric Pressure (in) [e]	Temperature (°C)	Temperature (°F)	Notes
10/30/2009	1:33	10/30/2009 1:33	0	-1	-0.5	10/30/2009	1:33	10/30/2009 1:33	36.99	21.06	69.91	
10/30/2009	1:48	10/30/2009 1:48	0	-1	-0.5	10/30/2009	1:48	10/30/2009 1:48	36.93	21.05	69.89	
10/30/2009	2:03	10/30/2009 2:03	0	-1	-0.5	10/30/2009	2:03	10/30/2009 2:03	36.85	21.04	69.86	
10/30/2009	2:18	10/30/2009 2:18	0	-0.5	-0.3	10/30/2009	2:18	10/30/2009 2:18	36.76	21.02	69.83	
10/30/2009	2:33	10/30/2009 2:33	0	-1	-0.5	10/30/2009	2:33	10/30/2009 2:33	36.73	21.01	69.81	
10/30/2009	2:48	10/30/2009 2:48	0	-0.5	-0.3	10/30/2009	2:48	10/30/2009 2:48	36.74	20.99	69.79	
10/30/2009	3:03	10/30/2009 3:03	0	-1	-0.5	10/30/2009	3:03	10/30/2009 3:03	36.64	20.98	69.76	
10/30/2009	3:18	10/30/2009 3:18	0	-0.5	-0.3	10/30/2009	3:18	10/30/2009 3:18	36.68	20.96	69.73	
10/30/2009	3:33	10/30/2009 3:33	0	-1	-0.5	10/30/2009	3:33	10/30/2009 3:33	36.59	20.95	69.70	
10/30/2009	3:48	10/30/2009 3:48	0	-0.5	-0.3	10/30/2009	3:48	10/30/2009 3:48	36.52	20.93	69.67	
10/30/2009	4:03	10/30/2009 4:03	0	-1	-0.5	10/30/2009	4:03	10/30/2009 4:03	36.55	20.92	69.66	
10/30/2009	4:18	10/30/2009 4:18	0	-0.5	-0.3	10/30/2009	4:18	10/30/2009 4:18	36.57	20.91	69.64	
10/30/2009	4:33	10/30/2009 4:33	0	-1	-0.5	10/30/2009	4:33	10/30/2009 4:33	36.66	20.90	69.63	
10/30/2009	4:48	10/30/2009 4:48	0	-0.5	-0.3	10/30/2009	4:48	10/30/2009 4:48	36.67	20.89	69.61	
10/30/2009	5:03	10/30/2009 5:03	0	-0.5	-0.3	10/30/2009	5:03	10/30/2009 5:03	36.75	20.89	69.59	
10/30/2009	5:18	10/30/2009 5:18	0	-1	-0.5	10/30/2009	5:18	10/30/2009 5:18	36.81	20.88	69.58	
10/30/2009	5:33	10/30/2009 5:33	0	-0.5	-0.3	10/30/2009	5:33	10/30/2009 5:33	36.87	20.88	69.58	
10/30/2009	5:48	10/30/2009 5:48	0	-0.5	-0.3	10/30/2009	5:48	10/30/2009 5:48	36.80	20.87	69.56	
10/30/2009	6:03	10/30/2009 6:03	0	-0.5	-0.3	10/30/2009	6:03	10/30/2009 6:03	36.85	20.86	69.56	
10/30/2009	6:18	10/30/2009 6:18	0	-0.5	-0.3	10/30/2009	6:18	10/30/2009 6:18	36.92	20.86	69.56	
10/30/2009	6:33	10/30/2009 6:33	0.5	-0.5	0.0	10/30/2009	6:33	10/30/2009 6:33	36.91	20.85	69.54	
10/30/2009	6:48	10/30/2009 6:48	1.5	0	0.8	10/30/2009	6:48	10/30/2009 6:48	36.89	20.81	69.45	
10/30/2009	7:03	10/30/2009 7:03	3	0	1.5	10/30/2009	7:03	10/30/2009 7:03	36.89	20.81	69.45	
10/30/2009	7:18	10/30/2009 7:18	3	0	1.5	10/30/2009	7:18	10/30/2009 7:18	36.98	20.83	69.50	
10/30/2009	7:33	10/30/2009 7:33	1.5	-0.5	0.5	10/30/2009	7:33	10/30/2009 7:33	36.93	20.85	69.53	
10/30/2009	7:48	10/30/2009 7:48	3	0	1.5	10/30/2009	7:48	10/30/2009 7:48	36.95	20.81	69.45	
10/30/2009	8:03	10/30/2009 8:03	2	-0.5	0.8	10/30/2009	8:03	10/30/2009 8:03	36.96	20.80	69.43	
10/30/2009	8:18	10/30/2009 8:18	3.5	-0.5	1.5	10/30/2009	8:18	10/30/2009 8:18	36.99	20.91	69.64	
10/30/2009	8:33	10/30/2009 8:33	1.5	-0.5	0.5	10/30/2009	8:33	10/30/2009 8:33	37.05	21.03	69.86	
10/30/2009	8:48	10/30/2009 8:48	1.5	-0.5	0.5	10/30/2009	8:48	10/30/2009 8:48	37.09	21.14	70.04	
10/30/2009	9:03	10/30/2009 9:03	1	-0.5	0.3	10/30/2009	9:03	10/30/2009 9:03	37.19	21.20	70.16	
10/30/2009	9:18	10/30/2009 9:18	2	-0.5	0.8							
10/30/2009	9:33	10/30/2009 9:33	2	-0.5	0.8							
10/30/2009	9:48	10/30/2009 9:48	2.5	0	1.3							
10/30/2009	10:03	10/30/2009 10:03	2	0	1.0							

Notes:

a : Differential pressure measurements are monitored continuously and the maximum and minimum differential pressure in Pascals [Pa] are recorded during each 15 minute monitoring period.

b : Average maximum and average minimum differential pressure over seven day monitoring period (October 23 to October 30, 2009).

c : Average maximum and average minimum differential pressure during work hours or during night time hours over each day of the seven day monitoring period (October 23 to October 30, 2009).

d: Differential pressure measurements were made using a Omniguard 4 differential pressure monitor with data logger (http://www.engsolinc.com/docs/og/OG4broch.pdf).

e : Barometric pressure measurements were made using a Solinst barometric data logger (http://www.solinst.com/Downloads/3001/3001Manual/Introduction/Barologger.html).

Table G-5
Suggested Interpretation of Differential Pressure Level Measurements
Vapor Intrusion Evaluation
SJCA Site 21

Condition	Description	Comments	Possible Outcome
Positively Pressurized	Consistent pressure measurements of > 6 to 9 Pa relative to outdoors or subsurface.	Based on the pressure difference needed to prevent soil gas intrusion in a structure with combined heating and appliance or fan operation effects (0.025 or 0.035 in water, based on USEPA, 1993).	No apparent driver for vapor intrusion pathway. Further investigation may not be needed.
Neutral to Positively Pressurized	Consistent pressure measurements of < 2 to 5 Pa relative to outdoors or subsurface. OR Highly variable pressure measurements typically greater than zero.	Minimum acceptable pressure difference needed to prevent in a structure with either heating effects OR appliance/fan effects (0.01 to 0.02 in water, based on USEPA, 1993).	Potential transient (intermittent) driver for vapor intrusion pathway may be present. Further investigation may be warranted to identify a potential source for vapor intrusion (i.e. groundwater sampling).
Neutral to Negatively Pressurized	Consistent pressure measurements of -5 to < 2 Pa relative to outdoors or subsurface. OR Highly variable pressure measurements < 5 Pa.	Range of depressurization that could occur either from heating effects OR appliance/fan effects (0.01 to 0.02 in water, based on USEPA, 1993).	Potential transient (intermittent) driver for vapor intrusion pathway may be present. Further investigation may be warranted to identify a potential source and transport pathways for vapor intrusion (i.e. groundwater and near utility conduits).
Negatively Pressurized	Consistent pressure measurements of > -6 to -9 Pa relative to outdoors or subsurface.	Range of depressurization that could occur either from heating effects OR appliance/fan effects (0.025 to 0.035 in water, based on USEPA, 1993).	Potential driver for vapor intrusion pathway. Further investigation may be warranted. Consideration may need to be given to sub slab and/or indoor air sampling.

Note: 1 Pa = 0.004 inches of water
Table Adapted from U.S. Environmental Protection Agency (USEPA). 1993. *Radon Reduction Techniques for Existing Detached Houses. Technical Guidance (Third Edition) for Active Soil Depressurization Systems.* EPA/625/R-03/011.

Figure G-1: Building 1556
Phase I Averaged Pressure Difference
and Barometric Pressure

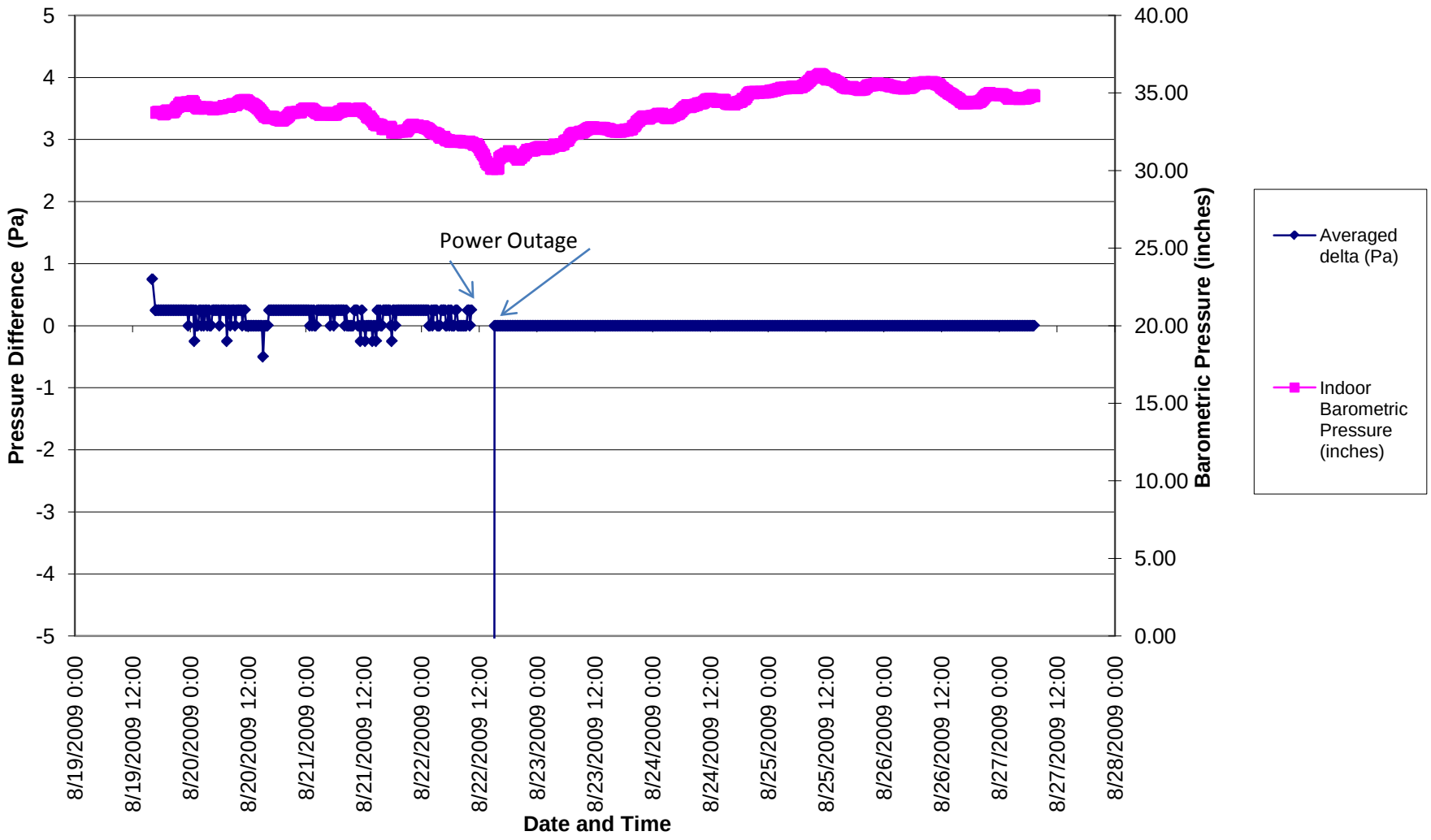
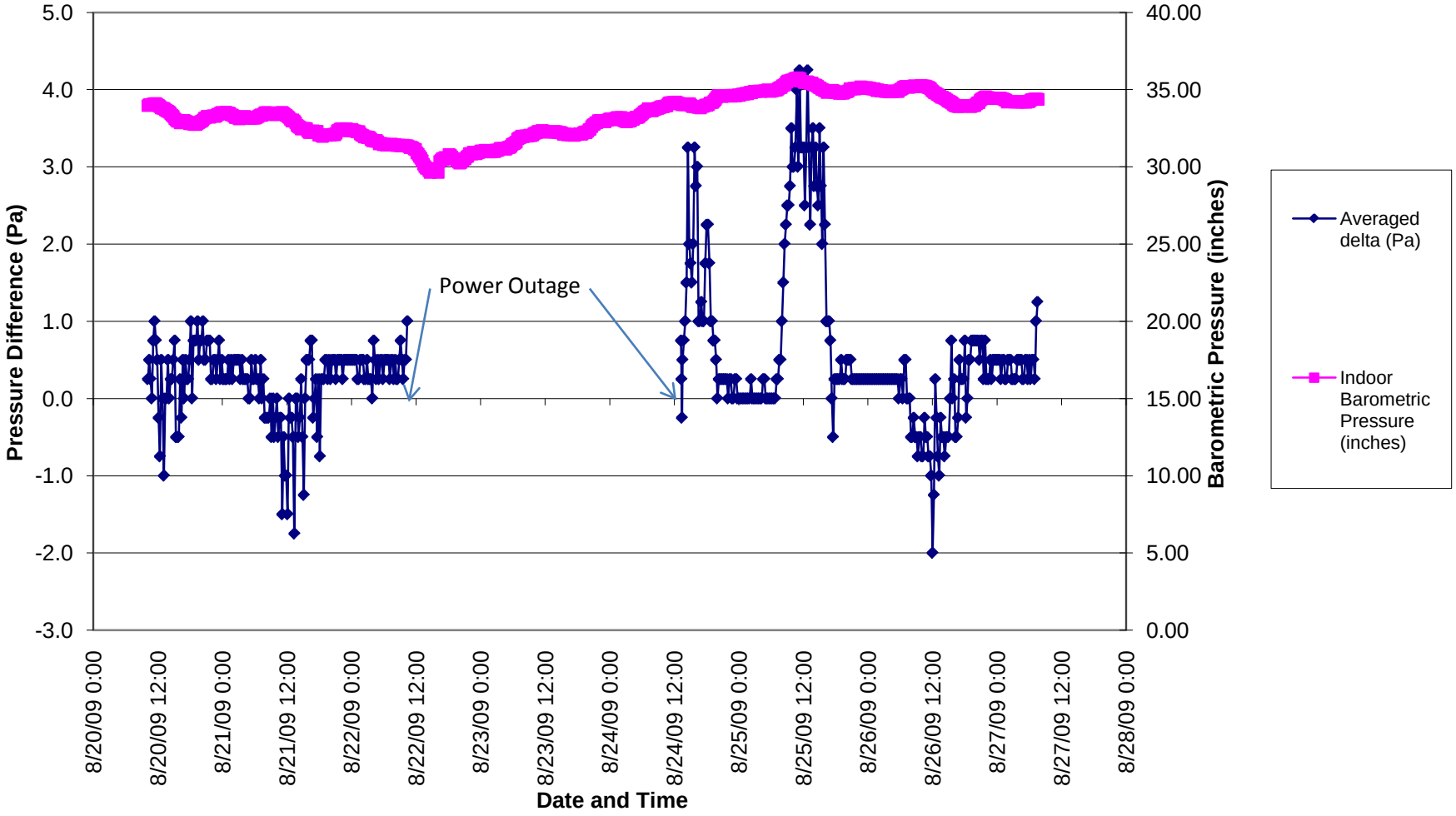


Figure G-2: Building 47
Phase I Averaged Pressure Difference
and Barometric Pressure



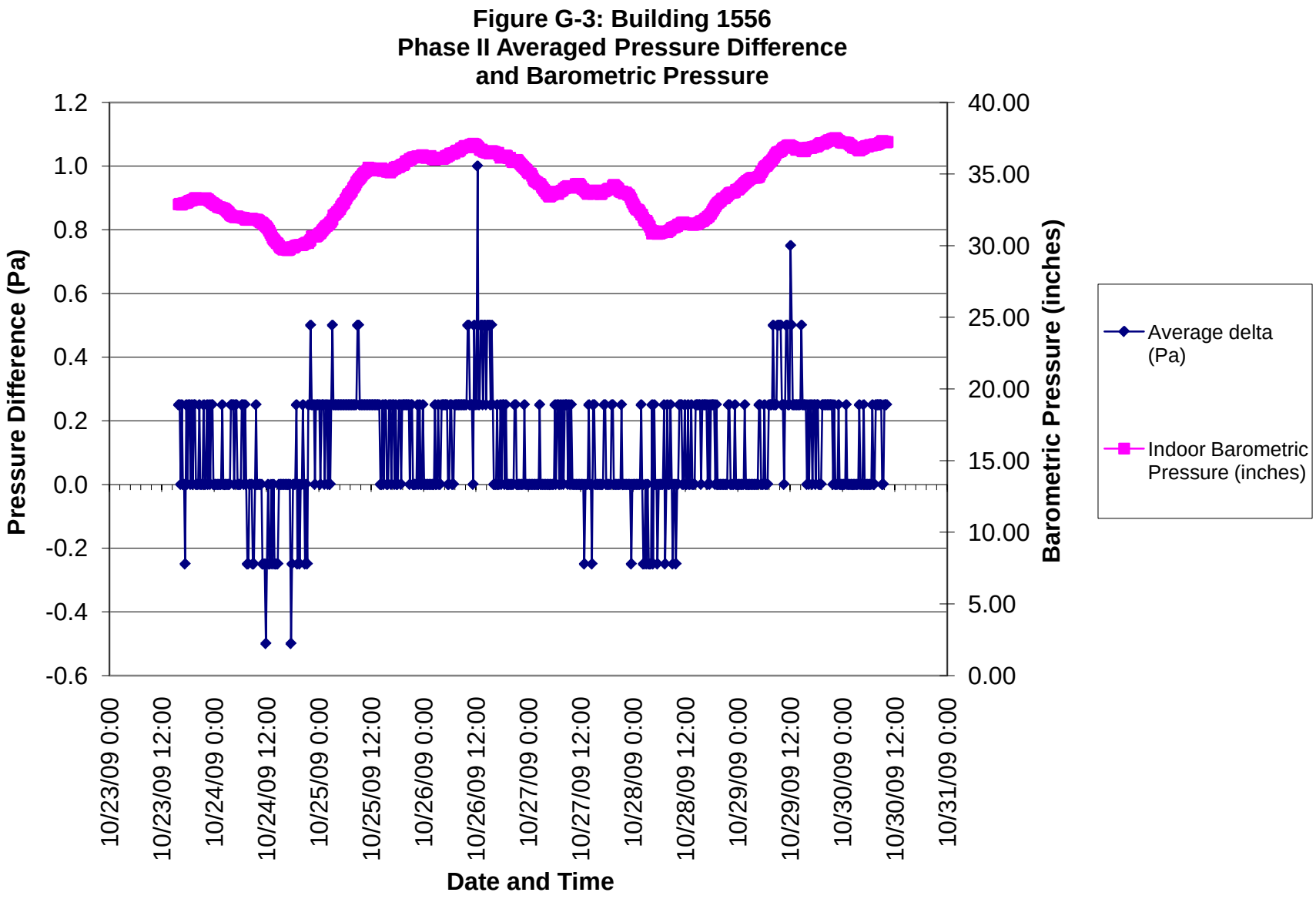
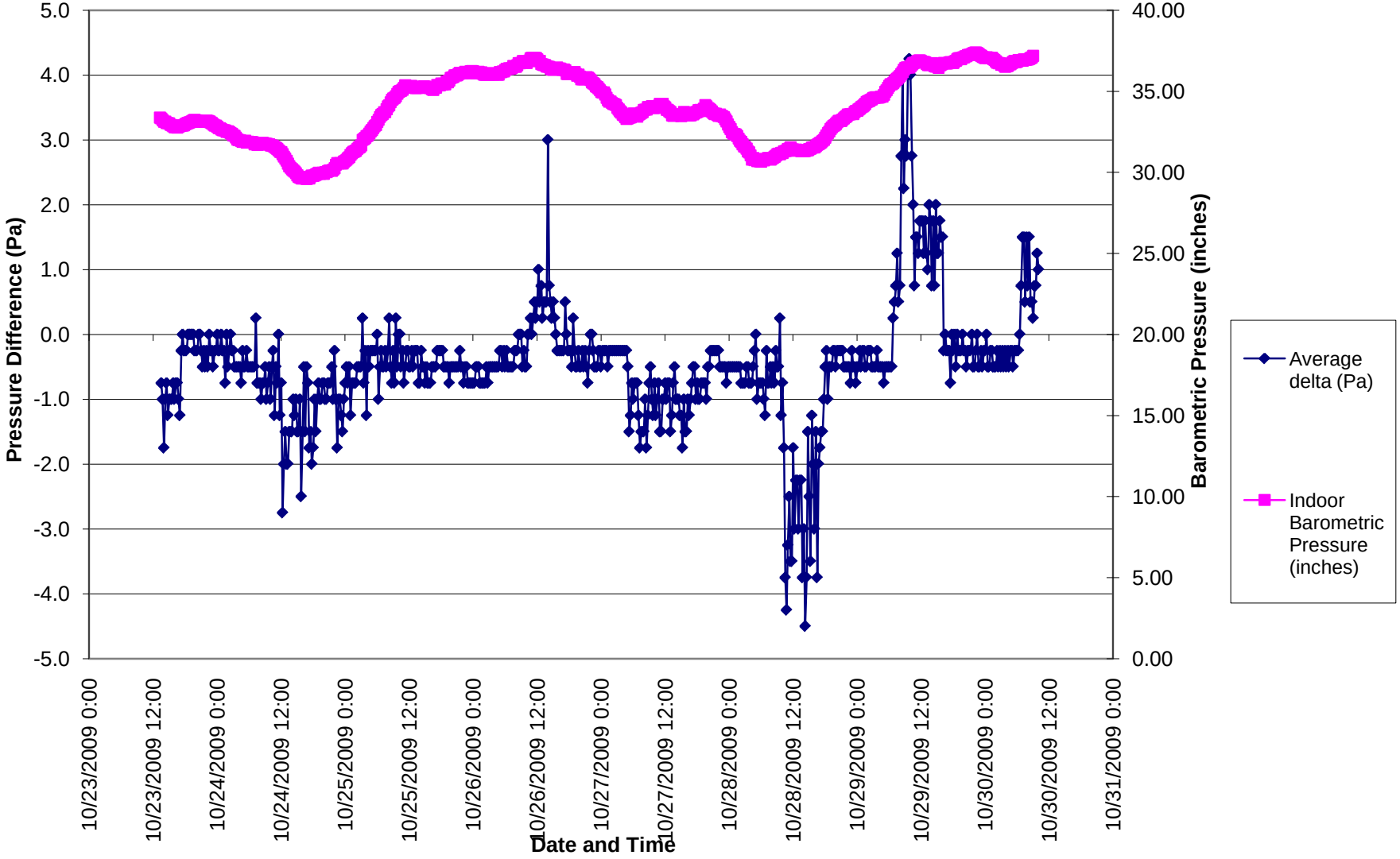


Figure G-3: Building 1556
Phase II Averaged Pressure Difference
and Barometric Pressure
Pressure Difference (Pa)
1.2
1.0
0.8
0.6
0.4
0.2
0.0
-0.2
-0.4
-0.6
Barometric Pressure (inches)
40.00
35.00
30.00
25.00
20.00
15.00
10.00
5.00
0.00
10/23/09 0:00
10/23/09 12:00
10/24/09 0:00
10/24/09 12:00
10/25/09 0:00
10/25/09 12:00
10/26/09 0:00
10/26/09 12:00
10/27/09 0:00
10/27/09 12:00
10/28/09 0:00
10/28/09 12:00
10/29/09 0:00
10/29/09 12:00
10/30/09 0:00
10/30/09 12:00
10/31/09 0:00
Date and Time
Average delta (Pa)
Indoor Barometric Pressure (inches)

Figure G-4: Building 47
Phase II Averaged Pressure Difference
and Barometric Pressure



Attachment H
Weather Station Data

SJCA Site 21 10/24/09

Date	Time	Temp Out	Hi Temp	Low Temp	Out Hum	Dew Pt.	Wind Speed	Wind Dir	Wind Run	Hi Speed	Hi Dir	Wind Chill	Heat Index	THW Index	THSW Index	Bar	Rain	Rain Rate	Solar Rad.
10/24/09	11:04a	---	---	---	---	---	0.0	---	0.00	0.0	---	---	---	---	---	------	0.00	0.00	---
10/24/09	11:05a	75.1	75.1	75.1	74	66.2	0.0	---	0.00	0.0	---	75.1	77.1	77.1	---	29.775	0.00	0.00	---
10/24/09	11:06a	---	75.1	75.1	---	---	0.0	---	0.00	0.0	---	---	---	---	---	------	0.00	0.00	---
10/24/09	11:07a	75.1	75.1	75.1	74	66.2	0.0	NW	0.00	1.0	NW	75.1	77.1	77.1	75.9	29.776	0.00	0.00	5
10/24/09	11:08a	75.1	75.1	75.1	74	66.2	4.0	SSW	0.07	9.0	SSW	75.1	77.1	77.1	75.7	29.776	0.00	0.00	0
10/24/09	11:09a	75.1	75.1	75.1	74	66.2	0.0	---	0.00	0.0	---	75.1	77.1	77.1	75.7	29.774	0.00	0.00	0
10/24/09	11:10a	75.1	75.1	75.1	74	66.2	0.0	---	0.00	0.0	---	75.1	77.1	77.1	75.7	29.771	0.00	0.00	0
10/24/09	11:11a	75.1	75.2	75.1	74	66.2	0.0	---	0.00	0.0	---	75.1	77.1	77.1	75.7	29.772	0.00	0.00	0
10/24/09	11:12a	75.2	75.2	75.1	74	66.3	0.0	---	0.00	0.0	---	75.2	77.3	77.3	75.9	29.771	0.00	0.00	0
10/24/09	11:13a	75.2	75.2	75.2	74	66.3	0.0	---	0.00	0.0	---	75.2	77.3	77.3	75.9	29.770	0.00	0.00	0
10/24/09	11:14a	75.2	75.2	75.2	74	66.3	1.0	SSE	0.02	8.0	SSE	75.2	77.3	77.3	75.9	29.774	0.00	0.00	0
10/24/09	11:15a	75.2	75.2	75.2	74	66.3	0.0	---	0.00	0.0	---	75.2	77.3	77.3	75.9	29.769	0.00	0.00	0
10/24/09	11:16a	75.2	75.2	75.2	74	66.3	0.0	---	0.00	0.0	---	75.2	77.3	77.3	75.9	29.770	0.00	0.00	0
10/24/09	11:17a	75.2	75.2	75.2	74	66.3	0.0	---	0.00	0.0	---	75.2	77.3	77.3	75.9	29.771	0.00	0.00	0
10/24/09	11:18a	75.2	75.2	75.2	74	66.3	0.0	---	0.00	0.0	---	75.2	77.3	77.3	75.9	29.769	0.00	0.00	0
10/24/09	11:19a	75.2	75.2	75.2	74	66.3	0.0	---	0.00	0.0	---	75.2	77.3	77.3	75.9	29.768	0.00	0.00	0
10/24/09	11:20a	75.2	75.2	75.2	74	66.3	0.0	---	0.00	0.0	---	75.2	77.3	77.3	75.9	29.769	0.00	0.00	0
10/24/09	11:21a	75.2	75.2	75.2	74	66.3	0.0	---	0.00	0.0	---	75.2	77.3	77.3	75.9	29.769	0.00	0.00	0
10/24/09	11:22a	75.2	75.2	75.2	74	66.3	0.0	---	0.00	0.0	---	75.2	77.3	77.3	75.9	29.766	0.00	0.00	0
10/24/09	11:23a	75.2	75.2	75.2	74	66.3	0.0	---	0.00	0.0	---	75.2	77.3	77.3	75.9	29.770	0.00	0.00	0
10/24/09	11:24a	75.2	75.2	75.2	74	66.3	0.0	---	0.00	0.0	---	75.2	77.3	77.3	75.9	29.769	0.00	0.00	0
10/24/09	11:25a	75.2	75.2	75.1	74	66.3	0.0	---	0.00	0.0	---	75.2	77.3	77.3	75.9	29.769	0.00	0.00	0
10/24/09	11:26a	75.1	75.1	75.1	74	66.2	0.0	---	0.00	0.0	---	75.1	77.1	77.1	75.7	29.767	0.00	0.00	0
10/24/09	11:27a	75.1	75.1	75.1	74	66.2	0.0	---	0.00	0.0	---	75.1	77.1	77.1	75.7	29.768	0.00	0.00	0
10/24/09	11:28a	75.1	75.1	75.1	74	66.2	0.0	---	0.00	0.0	---	75.1	77.1	77.1	75.7	29.768	0.00	0.00	0
10/24/09	11:29a	75.1	75.1	75.1	74	66.2	0.0	---	0.00	0.0	---	75.1	77.1	77.1	75.7	29.767	0.00	0.00	0
10/24/09	11:30a	75.1	75.1	75.1	74	66.2	0.0	---	0.00	0.0	---	75.1	77.1	77.1	75.7	29.765	0.00	0.00	0
10/24/09	11:31a	75.1	75.1	75.1	74	66.2	0.0	---	0.00	0.0	---	75.1	77.1	77.1	75.7	29.766	0.00	0.00	0
10/24/09	11:32a	75.1	75.1	75.1	74	66.2	0.0	---	0.00	0.0	---	75.1	77.1	77.1	75.7	29.763	0.00	0.00	0
10/24/09	11:33a	75.0	75.1	75.0	74	66.1	0.0	---	0.00	0.0	---	75.0	77.0	77.0	75.6	29.765	0.00	0.00	0
10/24/09	11:34a	75.0	75.1	75.0	74	66.1	0.0	---	0.00	0.0	---	75.0	77.0	77.0	75.6	29.765	0.00	0.00	0
10/24/09	11:35a	75.0	75.1	75.0	74	66.1	0.0	---	0.00	0.0	---	75.0	77.0	77.0	75.6	29.763	0.00	0.00	0
10/24/09	11:36a	75.0	75.0	75.0	75	66.5	0.0	---	0.00	0.0	---	75.0	77.1	77.1	75.7	29.762	0.00	0.00	0
10/24/09	11:37a	75.0	75.0	75.0	75	66.5	0.0	---	0.00	0.0	---	75.0	77.1	77.1	75.7	29.761	0.00	0.00	0
10/24/09	11:38a	75.0	75.0	75.0	75	66.5	0.0	---	0.00	0.0	---	75.0	77.1	77.1	75.7	29.762	0.00	0.00	0
10/24/09	11:39a	75.0	75.0	74.9	75	66.5	0.0	---	0.00	0.0	---	75.0	77.1	77.1	75.7	29.760	0.00	0.00	0
10/24/09	11:40a	75.0	75.0	74.9	75	66.5	0.0	---	0.00	0.0	---	75.0	77.1	77.1	75.7	29.762	0.00	0.00	0
10/24/09	11:41a	74.9	75.0	74.9	75	66.4	0.0	---	0.00	0.0	---	74.9	77.0	77.0	75.6	29.760	0.00	0.00	0
10/24/09	11:42a	74.9	74.9	74.9	75	66.4	0.0	---	0.00	0.0	---	74.9	77.0	77.0	75.6	29.763	0.00	0.00	0
10/24/09	11:43a	74.9	74.9	74.9	75	66.4	0.0	---	0.00	0.0	---	74.9	77.0	77.0	75.6	29.758	0.00	0.00	0
10/24/09	11:44a	74.9	74.9	74.9	75	66.4	0.0	---	0.00	0.0	---	74.9	77.0	77.0	75.6	29.759	0.00	0.00	0
10/24/09	11:45a	74.9	74.9	74.9	75	66.4	0.0	---	0.00	0.0	---	74.9	77.0	77.0	75.6	29.757	0.00	0.00	0
10/24/09	11:46a	74.9	74.9	74.9	75	66.4	0.0	---	0.00	0.0	---	74.9	77.0	77.0	75.6	29.757	0.00	0.00	0
10/24/09	11:47a	74.9	74.9	74.9	75	66.4	0.0	---	0.00	0.0	---	74.9	77.0	77.0	75.6	29.758	0.00	0.00	0
10/24/09	11:48a	74.9	74.9	74.9	75	66.4	0.0	---	0.00	0.0	---	74.9	77.0	77.0	75.6	29.759	0.00	0.00	0
10/24/09	11:49a	74.9	74.9	74.9	75	66.4	0.0	---	0.00	0.0	---	74.9	77.0	77.0	75.6	29.756	0.00	0.00	0
10/24/09	11:50a	74.8	74.9	74.8	75	66.3	0.0	---	0.00	0.0	---	74.8	76.9	76.9	75.5	29.760	0.00	0.00	0
10/24/09	11:51a	74.8	74.8	74.8	75	66.3	0.0	---	0.00	0.0	---	74.8	76.9	76.9	75.5	29.757	0.00	0.00	0
10/24/09	11:52a	74.8	74.8	74.8	76	66.7	0.0	---	0.00	0.0	---	74.8	76.9	76.9	75.5	29.758	0.00	0.00	0
10/24/09	11:53a	74.8	74.8	74.8	76	66.7	0.0	---	0.00	0.0	---	74.8	76.9	76.9	75.5	29.760	0.00	0.00	0
10/24/09	11:54a	74.8	74.8	74.8	76	66.7	0.0	---	0.00	0.0	---	74.8	76.9	76.9	75.5	29.755	0.00	0.00	0
10/24/09	11:55a	74.8	74.8	74.8	76	66.7	0.0	---	0.00	0.0	---	74.8	76.9	76.9	75.5	29.755	0.00	0.00	0
10/24/09	11:56a	74.8	74.8	74.8	76	66.7	0.0	---	0.00	0.0	---	74.8	76.9	76.9	75.5	29.758	0.00	0.00	0

SJCA Site 21 10/24/09

Date	Time	Temp Out	Hi Temp	Low Temp	Out Hum	Dew Pt.	Wind Speed	Wind Dir	Wind Run	Hi Speed	Hi Dir	Wind Chill	Heat Index	THW Index	THSW Index	Bar	Rain	Rain Rate	Solar Rad.
10/24/09	11:57a	74.8	74.8	74.8	76	66.7	0.0	---	0.00	0.0	---	74.8	76.9	76.9	75.5	29.754	0.00	0.00	0
10/24/09	11:58a	74.8	74.8	74.7	76	66.7	0.0	---	0.00	0.0	---	74.8	76.9	76.9	75.5	29.754	0.00	0.00	0
10/24/09	11:59a	74.8	74.8	74.7	76	66.7	0.0	---	0.00	0.0	---	74.8	76.9	76.9	75.5	29.755	0.00	0.00	0
10/24/09	12:00p	74.8	74.8	74.8	76	66.7	0.0	---	0.00	0.0	---	74.8	76.9	76.9	75.5	29.755	0.00	0.00	0
10/24/09	12:01p	74.7	74.8	74.7	76	66.6	0.0	---	0.00	0.0	---	74.7	76.8	76.8	75.4	29.756	0.00	0.00	0
10/24/09	12:02p	74.7	74.8	74.7	76	66.6	0.0	---	0.00	0.0	---	74.7	76.8	76.8	75.4	29.756	0.00	0.00	0
10/24/09	12:11p	---	---	---	77	---	0.0	---	0.00	0.0	---	---	---	---	---	29.850	0.00	0.00	0
10/24/09	12:15p	74.7	74.7	74.7	78	67.4	0.0	---	0.00	0.0	---	74.7	76.9	76.9	75.5	29.844	0.00	0.00	0
10/24/09	12:30p	79.7	79.7	74.7	73	70.3	1.0	SSE	0.25	12.0	SSE	79.7	82.8	82.8	85.2	29.831	0.00	0.00	134
10/24/09	12:45p	82.5	82.5	79.8	64	69.1	0.0	---	0.00	0.0	---	82.5	85.8	85.8	87.8	29.824	0.00	0.00	121
10/24/09	1:00p	84.3	84.3	82.6	61	69.4	0.0	---	0.00	0.0	---	84.3	88.5	88.5	91.1	29.816	0.00	0.00	145
10/24/09	1:15p	84.1	84.4	84.1	61	69.2	0.0	---	0.00	0.0	---	84.1	88.2	88.2	91.0	29.803	0.00	0.00	155
10/24/09	1:30p	84.2	84.2	84.1	61	69.3	0.0	---	0.00	0.0	---	84.2	88.3	88.3	93.2	29.789	0.00	0.00	240
10/24/09	1:45p	83.6	84.5	83.6	61	68.7	6.0	SE	1.50	19.0	SE	83.6	87.2	87.2	98.1	29.778	0.00	0.00	561
10/24/09	2:00p	83.0	83.6	83.0	61	68.2	6.0	SE	1.50	15.0	SSW	83.0	85.9	85.9	94.1	29.780	0.00	0.00	386
10/24/09	2:15p	82.4	83.0	82.4	63	68.5	7.0	S	1.75	18.0	SSW	82.4	85.4	85.4	92.1	29.771	0.00	0.00	321
10/24/09	2:30p	82.5	82.5	82.3	63	68.6	6.0	SE	1.50	20.0	SSE	82.5	85.6	85.6	93.9	29.767	0.00	0.00	384
10/24/09	2:45p	82.4	82.6	82.3	63	68.5	6.0	SSE	1.50	16.0	SSW	82.4	85.4	85.4	91.7	29.764	0.00	0.00	283
10/24/09	3:00p	82.7	82.8	82.4	62	68.4	5.0	SSE	1.25	16.0	SSE	82.7	85.7	85.7	93.6	29.749	0.00	0.00	352
10/24/09	3:15p	82.3	82.7	82.3	62	68.0	5.0	SSE	1.25	18.0	S	82.3	85.1	85.1	90.6	29.742	0.00	0.00	241
10/24/09	3:30p	82.5	82.5	82.3	61	67.7	4.0	SE	1.00	13.0	SSE	82.5	85.2	85.2	90.8	29.741	0.00	0.00	236
10/24/09	3:45p	82.5	82.5	82.4	62	68.2	5.0	SSE	1.25	15.0	ENE	82.5	85.4	85.4	93.3	29.740	0.00	0.00	319
10/24/09	4:00p	82.8	82.8	82.5	61	68.0	6.0	SE	1.50	19.0	SSW	82.8	85.6	85.6	96.5	29.735	0.00	0.00	474
10/24/09	4:15p	82.1	82.8	82.1	63	68.3	6.0	SE	1.50	13.0	SE	82.1	85.0	85.0	91.4	29.743	0.00	0.00	237
10/24/09	4:30p	81.6	82.1	81.6	64	68.2	5.0	SE	1.25	13.0	SSE	81.6	84.3	84.3	88.2	29.735	0.00	0.00	149
10/24/09	4:45p	81.7	81.7	81.5	65	68.8	6.0	SE	1.50	15.0	S	81.7	84.7	84.7	91.4	29.737	0.00	0.00	228
10/24/09	5:00p	81.4	81.8	81.4	66	68.9	5.0	SSE	1.25	14.0	SSW	81.4	84.4	84.4	87.8	29.735	0.00	0.00	120
10/24/09	5:15p	80.6	81.4	80.6	68	69.1	6.0	SSE	1.50	13.0	SE	80.6	83.4	83.4	84.5	29.739	0.00	0.00	55
10/24/09	5:30p	80.0	80.6	80.0	71	69.7	6.0	S	1.50	15.0	SSE	80.0	82.9	82.9	83.5	29.743	0.00	0.00	41
10/24/09	5:45p	79.4	80.0	79.4	74	70.4	6.0	S	1.50	18.0	S	79.4	82.5	82.5	83.5	29.749	0.00	0.00	45
10/24/09	6:00p	78.7	79.4	78.7	75	70.1	6.0	SE	1.50	16.0	SSE	78.7	81.6	81.6	81.6	29.747	0.00	0.00	24
10/24/09	6:15p	78.1	78.7	78.1	76	69.9	6.0	S	1.50	15.0	SE	78.1	80.9	80.9	79.6	29.752	0.00	0.00	10
10/24/09	6:30p	77.5	78.1	77.5	77	69.7	5.0	SSW	1.25	13.0	SE	77.5	80.3	80.3	78.7	29.752	0.00	0.00	0
10/24/09	6:45p	76.9	77.5	76.9	78	69.5	5.0	SSE	1.25	15.0	SSW	76.9	79.7	79.7	78.1	29.758	0.00	0.00	0
10/24/09	7:00p	76.4	76.9	76.4	80	69.8	4.0	SSE	1.00	13.0	S	76.4	79.3	79.3	77.7	29.764	0.00	0.00	0
10/24/09	7:15p	76.0	76.4	76.0	81	69.7	5.0	SE	1.25	12.0	SE	76.0	79.0	79.0	77.4	29.757	0.00	0.00	0
10/24/09	7:30p	75.6	76.0	75.6	82	69.7	3.0	SSE	0.75	12.0	S	75.6	78.5	78.5	76.9	29.762	0.00	0.00	0
10/24/09	7:45p	75.4	75.6	75.3	83	69.9	3.0	SE	0.75	10.0	SE	75.4	78.3	78.3	76.7	29.765	0.00	0.00	0
10/24/09	8:00p	75.2	75.4	75.2	84	70.0	4.0	SE	1.00	12.0	SSE	75.2	78.1	78.1	76.6	29.758	0.00	0.00	0
10/24/09	8:15p	75.1	75.3	75.1	84	69.9	3.0	SE	0.75	13.0	SSE	75.1	78.0	78.0	76.4	29.762	0.00	0.00	0
10/24/09	8:30p	74.9	75.1	74.9	85	70.1	4.0	SSW	1.00	12.0	S	74.9	77.8	77.8	76.3	29.765	0.00	0.00	0
10/24/09	8:45p	74.7	74.9	74.7	86	70.2	4.0	SSW	1.00	14.0	SSW	74.7	77.5	77.5	76.0	29.770	0.00	0.00	0
10/24/09	9:00p	74.6	74.7	74.6	86	70.1	4.0	S	1.00	12.0	SSW	74.6	77.3	77.3	75.8	29.773	0.00	0.00	0
10/24/09	9:15p	74.5	74.6	74.5	87	70.4	5.0	S	1.25	12.0	S	74.5	77.2	77.2	75.7	29.773	0.00	0.00	0
10/24/09	9:30p	74.4	74.5	74.4	87	70.3	4.0	S	1.00	11.0	SE	74.4	77.0	77.0	75.5	29.774	0.00	0.00	0
10/24/09	9:45p	74.3	74.4	74.3	88	70.5	4.0	SSE	1.00	10.0	SSW	74.3	76.9	76.9	75.4	29.777	0.00	0.00	0
10/24/09	10:00p	74.4	74.4	74.3	88	70.6	5.0	SSW	1.25	11.0	SSW	74.4	77.1	77.1	75.6	29.783	0.00	0.00	0
10/24/09	10:15p	74.4	74.5	74.4	88	70.6	5.0	SSW	1.25	12.0	SSW	74.4	77.1	77.1	75.6	29.795	0.00	0.00	0
10/24/09	10:30p	73.4	74.5	73.4	89	70.0	6.0	WSW	1.50	18.0	SW	73.4	75.8	75.8	74.2	29.802	0.00	0.00	0
10/24/09	10:45p	72.7	73.4	72.7	90	69.6	4.0	WSW	1.00	10.0	WSW	72.7	75.1	75.1	73.5	29.805	0.00	0.00	0
10/24/09	11:00p	72.3	72.7	72.3	90	69.2	3.0	WSW	0.75	9.0	WSW	72.3	74.6	74.6	73.0	29.806	0.00	0.00	0
10/24/09	11:15p	72.0	72.3	72.0	90	68.9	4.0	WSW	1.00	10.0	WSW	72.0	74.2	74.2	72.6	29.806	0.00	0.00	0
10/24/09	11:30p	71.7	72.0	71.7	88	68.0	4.0	WSW	1.00	9.0	WSW	71.7	73.7	73.7	72.0	29.806	0.00	0.00	0

SJCA Site 21 10/24/09

Date	Time	Temp Out	Hi Temp	Low Temp	Out Hum	Dew Pt.	Wind Speed	Wind Dir	Wind Run	Hi Speed	Hi Dir	Wind Chill	Heat Index	THW Index	THSW Index	Bar	Rain	Rain Rate	Solar Rad.
10/24/09	11:45p	71.3	71.7	71.3	87	67.2	4.0	WSW	1.00	11.0	SSW	71.3	73.3	73.3	71.6	29.812	0.00	0.00	0
10/25/09	12:00a	71.0	71.3	71.0	87	66.9	3.0	WSW	0.75	6.0	SW	71.0	73.0	73.0	71.3	29.819	0.00	0.00	0

SJCA Site 21 10/25/09

Date	Time	Temp Out	Hi Temp	Low Temp	Out Hum	Dew Pt.	Wind Speed	Wind Dir	Wind Run	Hi Speed	Hi Dir	Wind Chill	Heat Index	THW Index	THSW Index	Bar	Rain	Rain Rate	Solar Rad.
10/25/09	12:15a	70.6	71.0	70.6	87	66.5	2.0	WSW	0.50	7.0	WSW	70.6	72.5	72.5	70.8	29.821	0.00	0.00	0
10/25/09	12:30a	70.3	70.6	70.3	87	66.2	3.0	WSW	0.75	6.0	WSW	70.3	72.1	72.1	70.4	29.827	0.00	0.00	0
10/25/09	12:45a	69.9	70.3	69.9	87	65.9	3.0	WSW	0.75	6.0	WSW	69.9	71.6	71.6	69.8	29.834	0.00	0.00	0
10/25/09	1:00a	69.5	69.9	69.5	87	65.5	3.0	WSW	0.75	6.0	WSW	69.5	71.3	71.3	69.5	29.840	0.00	0.00	0
10/25/09	1:15a	69.3	69.6	69.3	87	65.3	3.0	WSW	0.75	8.0	WSW	69.3	71.1	71.1	69.3	29.850	0.00	0.00	0
10/25/09	1:30a	68.8	69.3	68.8	88	65.1	4.0	WSW	1.00	7.0	WSW	68.8	70.7	70.7	68.9	29.858	0.00	0.00	0
10/25/09	1:45a	68.5	68.8	68.5	88	64.8	2.0	SW	0.50	5.0	WSW	68.5	70.3	70.3	68.5	29.858	0.00	0.00	0
10/25/09	2:00a	68.0	68.5	68.0	89	64.6	3.0	WSW	0.75	6.0	W	68.0	69.7	69.7	67.9	29.863	0.00	0.00	0
10/25/09	2:15a	67.6	68.0	67.6	90	64.6	2.0	W	0.50	6.0	W	67.6	69.2	69.2	67.4	29.871	0.00	0.00	0
10/25/09	2:30a	67.4	67.6	67.4	90	64.4	3.0	W	0.75	6.0	W	67.4	69.0	69.0	67.2	29.875	0.00	0.00	0
10/25/09	2:45a	67.4	67.4	67.3	90	64.4	3.0	W	0.75	7.0	WNW	67.4	69.0	69.0	67.2	29.880	0.00	0.00	0
10/25/09	3:00a	67.2	67.4	67.2	90	64.2	3.0	WNW	0.75	6.0	WNW	67.2	68.7	68.7	66.9	29.887	0.00	0.00	0
10/25/09	3:15a	65.5	67.2	65.5	78	58.5	5.0	WNW	1.25	18.0	N	65.5	66.1	66.1	64.0	29.910	0.00	0.00	0
10/25/09	3:30a	64.0	65.5	64.0	76	56.3	9.0	NNW	2.25	15.0	NNW	62.4	64.2	62.6	60.6	29.917	0.00	0.00	0
10/25/09	3:45a	63.4	64.0	63.4	72	54.2	9.0	NNW	2.25	20.0	NNW	61.7	63.2	61.5	59.4	29.921	0.00	0.00	0
10/25/09	4:00a	63.3	63.4	63.3	69	53.0	8.0	NNW	2.00	19.0	NE	62.4	63.0	62.1	59.9	29.928	0.00	0.00	0
10/25/09	4:15a	63.1	63.3	63.1	67	52.0	9.0	NNW	2.25	19.0	N	61.3	62.6	60.8	58.6	29.933	0.00	0.00	0
10/25/09	4:30a	62.7	63.1	62.7	67	51.6	8.0	NNW	2.00	18.0	NW	61.7	62.2	61.2	58.9	29.939	0.00	0.00	0
10/25/09	4:45a	62.5	62.7	62.5	68	51.8	10.0	NNW	2.50	20.0	WNW	59.9	62.0	59.4	57.3	29.950	0.00	0.00	0
10/25/09	5:00a	62.1	62.5	62.1	69	51.8	10.0	NNW	2.50	21.0	NNW	59.4	61.6	58.9	56.8	29.955	0.00	0.00	0
10/25/09	5:15a	61.7	62.2	61.7	70	51.8	9.0	NNW	2.25	20.0	NNW	59.7	61.2	59.2	57.0	29.966	0.00	0.00	0
10/25/09	5:30a	61.3	61.7	61.3	69	51.0	8.0	NNW	2.00	18.0	NNW	60.1	60.7	59.5	57.2	29.974	0.00	0.00	0
10/25/09	5:45a	61.0	61.3	61.0	70	51.1	8.0	NNW	2.00	15.0	N	59.7	60.4	59.1	56.8	29.979	0.00	0.00	0
10/25/09	6:00a	60.5	61.0	60.5	67	49.5	10.0	NNW	2.50	18.0	NW	57.6	59.8	56.9	54.7	29.992	0.00	0.00	0
10/25/09	6:15a	60.0	60.6	60.0	68	49.4	8.0	NNW	2.00	19.0	NW	58.5	59.3	57.8	55.4	30.002	0.00	0.00	0
10/25/09	6:30a	59.8	60.0	59.8	68	49.2	7.0	NNW	1.75	16.0	NNE	59.0	59.1	58.3	55.8	30.013	0.00	0.00	0
10/25/09	6:45a	59.4	59.8	59.4	67	48.4	8.0	NNW	2.00	15.0	NW	57.8	58.6	57.0	54.6	30.022	0.00	0.00	0
10/25/09	7:00a	59.1	59.4	59.1	68	48.5	7.0	NNW	1.75	15.0	WNW	58.1	58.3	57.3	54.8	30.027	0.00	0.00	0
10/25/09	7:15a	59.0	59.1	59.0	68	48.4	7.0	NNW	1.75	13.0	NNW	58.0	58.2	57.2	54.7	30.037	0.00	0.00	0
10/25/09	7:30a	59.0	59.0	59.0	67	48.1	8.0	NNW	2.00	13.0	NW	57.3	58.1	56.4	54.5	30.040	0.00	0.00	2
10/25/09	7:45a	58.9	59.0	58.8	67	48.0	7.0	NNW	1.75	16.0	NNW	57.9	58.0	57.0	55.7	30.051	0.00	0.00	16
10/25/09	8:00a	59.4	59.4	58.9	66	48.0	8.0	NNW	2.00	16.0	NW	57.8	58.5	56.9	56.5	30.068	0.00	0.00	35
10/25/09	8:15a	59.3	59.4	59.3	66	47.9	9.0	NNW	2.25	23.0	NW	56.9	58.4	56.0	55.9	30.070	0.00	0.00	45
10/25/09	8:30a	59.4	59.4	59.3	67	48.4	8.0	NNW	2.00	15.0	NNE	57.8	58.6	57.0	58.2	30.084	0.00	0.00	83
10/25/09	8:45a	59.5	59.5	59.4	66	48.1	9.0	NW	2.25	16.0	NW	57.1	58.6	56.2	58.0	30.096	0.00	0.00	107
10/25/09	9:00a	59.9	59.9	59.5	66	48.5	8.0	NNW	2.00	18.0	N	58.4	59.1	57.6	61.0	30.101	0.00	0.00	160
10/25/09	9:15a	59.6	59.9	59.6	66	48.2	11.0	NNW	2.75	23.0	NW	55.9	58.7	55.0	58.2	30.105	0.00	0.00	177
10/25/09	9:30a	60.2	60.2	59.7	64	48.0	11.0	NNW	2.75	20.0	NW	56.5	59.2	55.5	61.6	30.112	0.00	0.00	316
10/25/09	9:45a	59.8	60.2	59.8	64	47.6	9.0	NNW	2.25	20.0	NNW	57.5	58.8	56.5	60.5	30.120	0.00	0.00	213
10/25/09	10:00a	59.3	59.8	59.3	65	47.5	10.0	N	2.50	18.0	NNE	56.2	58.3	55.2	58.5	30.134	0.00	0.00	198
10/25/09	10:15a	59.3	59.3	59.2	64	47.1	9.0	NNW	2.25	16.0	N	56.9	58.3	55.9	59.2	30.135	0.00	0.00	195
10/25/09	10:30a	59.0	59.3	58.9	64	46.8	10.0	NNW	2.50	20.0	NW	55.8	57.9	54.7	59.3	30.140	0.00	0.00	269
10/25/09	10:45a	59.2	59.2	58.9	63	46.6	9.0	NNW	2.25	19.0	NNW	56.7	58.1	55.6	60.7	30.142	0.00	0.00	292
10/25/09	11:00a	58.8	59.3	58.8	61	45.4	10.0	NNW	2.50	18.0	NNW	55.6	57.6	54.4	60.8	30.152	0.00	0.00	383
10/25/09	11:15a	59.4	59.4	58.8	60	45.5	10.0	NNW	2.50	21.0	NW	56.3	58.1	55.0	62.6	30.160	0.00	0.00	466
10/25/09	11:30a	58.8	59.3	58.8	61	45.4	10.0	NNW	2.50	21.0	NNW	55.6	57.6	54.4	61.3	30.161	0.00	0.00	424
10/25/09	11:45a	58.6	58.9	58.5	62	45.6	10.0	NNW	2.50	19.0	NW	55.3	57.4	54.1	61.1	30.156	0.00	0.00	435
10/25/09	12:00p	59.1	59.1	58.5	61	45.7	9.0	NW	2.25	15.0	NW	56.6	57.9	55.4	63.0	30.158	0.00	0.00	454
10/25/09	12:15p	59.1	59.4	59.1	61	45.7	10.0	NW	2.50	15.0	NNW	55.9	57.9	54.7	62.1	30.162	0.00	0.00	467
10/25/09	12:30p	59.6	59.7	59.2	60	45.7	8.0	NNW	2.00	18.0	NW	58.0	58.3	56.7	64.6	30.160	0.00	0.00	459
10/25/09	12:45p	59.2	59.6	59.2	61	45.8	7.0	NNW	1.75	13.0	WNW	58.2	58.0	57.0	62.5	30.158	0.00	0.00	312
10/25/09	1:00p	59.0	59.3	59.0	60	45.1	8.0	NNW	2.00	15.0	NW	57.3	57.7	56.0	62.4	30.155	0.00	0.00	361
10/25/09	1:15p	59.2	59.3	58.7	60	45.3	7.0	NNW	1.75	12.0	N	58.2	57.9	56.9	62.4	30.153	0.00	0.00	307

SJCA Site 21 10/25/09

Date	Time	Temp Out	Hi Temp	Low Temp	Out Hum	Dew Pt.	Wind Speed	Wind Dir	Wind Run	Hi Speed	Hi Dir	Wind Chill	Heat Index	THW Index	THSW Index	Bar	Rain	Rain Rate	Solar Rad.
10/25/09	1:30p	58.8	59.2	58.8	60	44.9	6.0	NNW	1.50	13.0	WNW	58.2	57.5	56.9	60.6	30.153	0.00	0.00	219
10/25/09	1:45p	58.5	58.8	58.5	61	45.1	7.0	NNW	1.75	13.0	NW	57.4	57.3	56.2	58.2	30.154	0.00	0.00	145
10/25/09	2:00p	58.5	58.5	58.3	61	45.1	6.0	NNW	1.50	12.0	NNW	57.8	57.3	56.6	58.5	30.156	0.00	0.00	140
10/25/09	2:15p	58.5	58.6	58.5	61	45.1	6.0	NNW	1.50	11.0	N	57.8	57.3	56.6	58.5	30.155	0.00	0.00	135
10/25/09	2:30p	58.8	58.8	58.5	60	44.9	6.0	NNW	1.50	10.0	NW	58.2	57.5	56.9	59.4	30.158	0.00	0.00	153
10/25/09	2:45p	58.9	58.9	58.8	60	45.0	7.0	NW	1.75	12.0	WNW	57.9	57.6	56.6	60.0	30.159	0.00	0.00	180
10/25/09	3:00p	58.8	58.9	58.8	60	44.9	6.0	NW	1.50	11.0	NW	58.2	57.5	56.9	60.1	30.160	0.00	0.00	168
10/25/09	3:15p	58.7	58.8	58.6	60	44.8	6.0	NW	1.50	11.0	NW	58.0	57.4	56.7	59.9	30.156	0.00	0.00	160
10/25/09	3:30p	59.1	59.1	58.6	59	44.8	5.0	NNW	1.25	11.0	NNE	58.9	57.7	57.5	62.6	30.147	0.00	0.00	213
10/25/09	3:45p	59.0	59.1	58.9	59	44.7	4.0	N	1.00	8.0	N	59.0	57.6	57.6	61.9	30.147	0.00	0.00	180
10/25/09	4:00p	59.0	59.0	58.9	60	45.1	6.0	NW	1.50	11.0	NW	58.4	57.7	57.1	61.5	30.155	0.00	0.00	174
10/25/09	4:15p	59.0	59.0	58.9	60	45.1	6.0	NNW	1.50	9.0	NNW	58.4	57.7	57.1	60.5	30.151	0.00	0.00	139
10/25/09	4:30p	58.9	59.0	58.8	62	45.9	6.0	NNW	1.50	10.0	NNW	58.3	57.7	57.1	59.7	30.147	0.00	0.00	110
10/25/09	4:45p	58.7	58.9	58.7	61	45.3	6.0	NW	1.50	10.0	NW	58.0	57.5	56.8	58.6	30.161	0.00	0.00	88
10/25/09	5:00p	58.5	58.7	58.5	62	45.5	5.0	NNW	1.25	9.0	NW	58.2	57.3	57.0	58.8	30.156	0.00	0.00	90
10/25/09	5:15p	58.5	58.6	58.5	61	45.1	5.0	NNW	1.25	9.0	NNW	58.2	57.3	57.0	55.6	30.165	0.00	0.00	69
10/25/09	5:30p	58.2	58.5	58.2	62	45.2	4.0	NNW	1.00	9.0	NNW	58.2	57.0	57.0	54.8	30.167	0.00	0.00	35
10/25/09	5:45p	58.0	58.2	58.0	64	45.9	4.0	NNW	1.00	7.0	NW	58.0	56.9	56.9	54.5	30.163	0.00	0.00	26
10/25/09	6:00p	57.9	58.0	57.9	64	45.8	3.0	N	0.75	8.0	NNW	57.9	56.8	56.8	54.1	30.177	0.00	0.00	14
10/25/09	6:15p	57.7	57.9	57.7	65	46.0	3.0	N	0.75	7.0	N	57.7	56.7	56.7	53.8	30.169	0.00	0.00	3
10/25/09	6:30p	57.6	57.7	57.6	65	45.9	3.0	N	0.75	8.0	NW	57.6	56.6	56.6	53.6	30.173	0.00	0.00	0
10/25/09	6:45p	57.5	57.6	57.5	66	46.2	3.0	NNW	0.75	6.0	NNW	57.5	56.5	56.5	53.6	30.170	0.00	0.00	0
10/25/09	7:00p	57.5	57.5	57.4	68	47.0	2.0	NNW	0.50	8.0	NNW	57.5	56.6	56.6	53.7	30.182	0.00	0.00	0
10/25/09	7:15p	57.5	57.5	57.4	68	47.0	4.0	NNW	1.00	7.0	NW	57.5	56.6	56.6	53.7	30.180	0.00	0.00	0
10/25/09	7:30p	57.5	57.5	57.5	69	47.4	4.0	NNW	1.00	9.0	NNW	57.5	56.7	56.7	53.8	30.183	0.00	0.00	0
10/25/09	7:45p	57.4	57.5	57.4	69	47.3	3.0	NNW	0.75	7.0	NNW	57.4	56.6	56.6	53.7	30.198	0.00	0.00	0
10/25/09	8:00p	57.4	57.5	57.4	69	47.3	4.0	NNW	1.00	10.0	NW	57.4	56.6	56.6	53.7	30.200	0.00	0.00	0
10/25/09	8:15p	57.5	57.5	57.4	69	47.4	4.0	NNW	1.00	9.0	N	57.5	56.7	56.7	53.8	30.201	0.00	0.00	0
10/25/09	8:30p	57.3	57.5	57.3	69	47.2	3.0	N	0.75	9.0	NW	57.3	56.5	56.5	53.6	30.208	0.00	0.00	0
10/25/09	8:45p	57.4	57.4	57.3	69	47.3	5.0	NNW	1.25	11.0	NNW	56.9	56.6	56.1	53.2	30.210	0.00	0.00	0
10/25/09	9:00p	57.4	57.5	57.4	68	46.9	5.0	NNW	1.25	10.0	NW	56.9	56.5	56.0	53.1	30.212	0.00	0.00	0
10/25/09	9:15p	57.4	57.5	57.4	68	46.9	4.0	NNW	1.00	8.0	NW	57.4	56.5	56.5	53.6	30.218	0.00	0.00	0
10/25/09	9:30p	57.3	57.4	57.3	69	47.2	3.0	NNW	0.75	6.0	NNW	57.3	56.5	56.5	53.6	30.223	0.00	0.00	0
10/25/09	9:45p	56.9	57.3	56.9	68	46.4	2.0	N	0.50	6.0	N	56.9	56.0	56.0	53.1	30.220	0.00	0.00	0
10/25/09	10:00p	56.4	56.9	56.4	69	46.4	2.0	NNE	0.50	5.0	NNE	56.4	55.6	55.6	52.7	30.219	0.00	0.00	0
10/25/09	10:15p	56.1	56.4	56.1	70	46.4	1.0	NNE	0.25	4.0	NNE	56.1	55.3	55.3	52.4	30.222	0.00	0.00	0
10/25/09	10:30p	55.7	56.1	55.7	71	46.4	1.0	N	0.25	5.0	N	55.7	54.9	54.9	52.0	30.228	0.00	0.00	0
10/25/09	10:45p	55.5	55.8	55.5	71	46.2	1.0	N	0.25	6.0	N	55.5	54.8	54.8	51.9	30.223	0.00	0.00	0
10/25/09	11:00p	55.4	55.5	55.3	73	46.9	1.0	NE	0.25	4.0	NNE	55.4	54.8	54.8	51.9	30.223	0.00	0.00	0
10/25/09	11:15p	55.2	55.4	55.1	73	46.7	1.0	NNE	0.25	5.0	NNE	55.2	54.6	54.6	51.7	30.224	0.00	0.00	0
10/25/09	11:30p	55.0	55.2	55.0	74	46.9	0.0	NNE	0.00	2.0	NNE	55.0	54.4	54.4	51.5	30.230	0.00	0.00	0
10/25/09	11:45p	54.8	55.0	54.8	75	47.0	0.0	NNE	0.00	1.0	NNE	54.8	54.3	54.3	51.4	30.231	0.00	0.00	0
10/26/09	12:00a	54.2	54.8	54.2	77	47.1	0.0	NNE	0.00	1.0	NNE	54.2	53.8	53.8	50.9	30.231	0.00	0.00	0

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Date	Time	Temp Out	Hi Temp	Low Temp	Out Hum	Dew Pt.	Wind Speed	Wind Dir	Wind Run	Hi Speed	Hi Dir	Wind Chill	Heat Index	THW Index	THSW Index	Bar	Rain	Rain Rate	Solar Rad.
10/26/09	12:15a	54.6	54.6	54.2	76	47.2	1.0	NNW	0.25	6.0	NNW	54.6	54.1	54.1	51.2	30.227	0.00	0.00	0
10/26/09	12:30a	55.5	55.5	54.6	72	46.6	3.0	N	0.75	10.0	NW	55.5	54.8	54.8	51.9	30.220	0.00	0.00	0
10/26/09	12:45a	55.9	55.9	55.5	69	45.9	3.0	N	0.75	9.0	NNW	55.9	55.1	55.1	52.1	30.225	0.00	0.00	0
10/26/09	1:00a	55.6	55.9	55.6	69	45.6	1.0	NNE	0.25	6.0	N	55.6	54.8	54.8	51.8	30.226	0.00	0.00	0
10/26/09	1:15a	54.9	55.6	54.9	71	45.7	0.0	ENE	0.00	2.0	ENE	54.9	54.2	54.2	51.2	30.223	0.00	0.00	0
10/26/09	1:30a	54.1	54.8	54.1	72	45.3	0.0	ENE	0.00	2.0	ENE	54.1	53.5	53.5	50.5	30.227	0.00	0.00	0
10/26/09	1:45a	53.0	54.1	53.0	75	45.3	0.0	NE	0.00	2.0	NE	53.0	52.5	52.5	49.5	30.220	0.00	0.00	0
10/26/09	2:00a	53.0	53.0	52.8	77	46.0	0.0	NE	0.00	2.0	NE	53.0	52.6	52.6	49.6	30.214	0.00	0.00	0
10/26/09	2:15a	53.1	53.3	53.0	77	46.1	1.0	NNE	0.25	4.0	NNE	53.1	52.7	52.7	49.8	30.216	0.00	0.00	0
10/26/09	2:30a	53.1	53.1	52.9	80	47.1	1.0	NNE	0.25	5.0	NNW	53.1	52.8	52.8	49.9	30.216	0.00	0.00	0
10/26/09	2:45a	53.9	53.9	53.1	80	47.9	2.0	NNW	0.50	5.0	NNW	53.9	53.6	53.6	50.7	30.216	0.00	0.00	0
10/26/09	3:00a	54.5	54.5	53.8	79	48.1	2.0	N	0.50	4.0	N	54.5	54.2	54.2	51.4	30.220	0.00	0.00	0
10/26/09	3:15a	54.6	54.7	54.5	79	48.2	2.0	N	0.50	7.0	N	54.6	54.3	54.3	51.5	30.219	0.00	0.00	0
10/26/09	3:30a	54.5	54.6	54.5	79	48.1	2.0	N	0.50	5.0	NNW	54.5	54.2	54.2	51.4	30.220	0.00	0.00	0
10/26/09	3:45a	54.6	54.6	54.5	79	48.2	2.0	NNW	0.50	6.0	NNW	54.6	54.3	54.3	51.5	30.220	0.00	0.00	0
10/26/09	4:00a	55.0	55.0	54.6	78	48.3	2.0	NNE	0.50	5.0	N	55.0	54.6	54.6	51.8	30.219	0.00	0.00	0
10/26/09	4:15a	55.5	55.5	55.0	77	48.4	3.0	N	0.75	9.0	NNE	55.5	55.1	55.1	52.3	30.224	0.00	0.00	0
10/26/09	4:30a	55.8	55.8	55.5	76	48.3	4.0	NNE	1.00	9.0	NNW	55.6	55.3	55.1	52.3	30.219	0.00	0.00	0
10/26/09	4:45a	55.9	55.9	55.8	76	48.4	3.0	N	0.75	8.0	NNW	55.9	55.4	55.4	52.6	30.223	0.00	0.00	0
10/26/09	5:00a	56.0	56.0	55.9	76	48.5	3.0	NNE	0.75	9.0	NNE	56.0	55.5	55.5	52.7	30.230	0.00	0.00	0
10/26/09	5:15a	55.9	56.0	55.9	75	48.1	3.0	NNE	0.75	6.0	N	55.9	55.3	55.3	52.5	30.231	0.00	0.00	0
10/26/09	5:30a	55.7	55.9	55.7	76	48.2	2.0	N	0.50	7.0	N	55.7	55.2	55.2	52.4	30.232	0.00	0.00	0
10/26/09	5:45a	55.8	55.9	55.7	76	48.3	2.0	NNE	0.50	8.0	N	55.8	55.3	55.3	52.5	30.231	0.00	0.00	0
10/26/09	6:00a	55.9	55.9	55.8	76	48.4	2.0	NNE	0.50	7.0	NNE	55.9	55.4	55.4	52.6	30.237	0.00	0.00	0
10/26/09	6:15a	55.9	55.9	55.8	77	48.8	2.0	NNE	0.50	5.0	NNE	55.9	55.4	55.4	52.6	30.245	0.00	0.00	0
10/26/09	6:30a	56.0	56.0	55.9	78	49.2	2.0	N	0.50	6.0	N	56.0	55.6	55.6	52.8	30.239	0.00	0.00	0
10/26/09	6:45a	56.1	56.1	56.0	79	49.7	1.0	NNE	0.25	5.0	N	56.1	55.7	55.7	52.9	30.243	0.00	0.00	0
10/26/09	7:00a	56.3	56.3	56.1	80	50.2	2.0	N	0.50	7.0	N	56.3	56.0	56.0	53.2	30.246	0.00	0.00	0
10/26/09	7:15a	56.5	56.5	56.3	80	50.4	3.0	N	0.75	7.0	N	56.5	56.2	56.2	53.4	30.245	0.00	0.00	0
10/26/09	7:30a	56.7	56.7	56.5	81	50.9	3.0	N	0.75	7.0	N	56.7	56.4	56.4	54.5	30.252	0.00	0.00	2
10/26/09	7:45a	56.8	56.8	56.7	81	51.0	2.0	NNE	0.50	5.0	NNE	56.8	56.5	56.5	55.4	30.255	0.00	0.00	18
10/26/09	8:00a	57.1	57.1	56.8	82	51.7	1.0	NNE	0.25	5.0	NNE	57.1	56.9	56.9	56.2	30.252	0.00	0.00	28
10/26/09	8:15a	57.3	57.3	57.1	81	51.5	1.0	NNE	0.25	5.0	N	57.3	57.1	57.1	56.7	30.260	0.00	0.00	36
10/26/09	8:30a	57.8	57.8	57.2	77	50.6	3.0	NNE	0.75	8.0	NE	57.8	57.4	57.4	57.3	30.267	0.00	0.00	46
10/26/09	8:45a	58.7	58.7	57.8	74	50.4	3.0	NE	0.75	8.0	E	58.7	58.2	58.2	58.8	30.275	0.00	0.00	68
10/26/09	9:00a	59.5	59.5	58.7	72	50.5	5.0	ENE	1.25	10.0	ENE	59.4	58.9	58.8	60.1	30.274	0.00	0.00	90
10/26/09	9:15a	59.9	59.9	59.5	71	50.5	5.0	ENE	1.25	10.0	NE	59.9	59.3	59.3	60.6	30.277	0.00	0.00	95
10/26/09	9:30a	60.2	60.2	59.9	71	50.8	7.0	ENE	1.75	10.0	ENE	59.4	59.6	58.8	60.8	30.274	0.00	0.00	118
10/26/09	9:45a	60.6	60.6	60.2	70	50.8	5.0	NE	1.25	10.0	ENE	60.6	60.0	60.0	62.9	30.277	0.00	0.00	154
10/26/09	10:00a	60.9	60.9	60.5	70	51.0	7.0	ENE	1.75	13.0	ENE	60.3	60.3	59.7	62.9	30.269	0.00	0.00	168
10/26/09	10:15a	61.2	61.2	60.9	70	51.3	6.0	ENE	1.50	11.0	NE	61.0	60.6	60.4	63.6	30.280	0.00	0.00	174
10/26/09	10:30a	61.4	61.4	61.2	71	51.9	8.0	ENE	2.00	16.0	NE	60.2	60.9	59.7	62.7	30.278	0.00	0.00	178
10/26/09	10:45a	61.8	61.8	61.4	71	52.3	7.0	ENE	1.75	13.0	ENE	61.4	61.3	60.9	64.9	30.288	0.00	0.00	217
10/26/09	11:00a	62.2	62.2	61.8	70	52.3	10.0	ENE	2.50	16.0	ENE	59.5	61.7	59.0	62.7	30.292	0.00	0.00	226
10/26/09	11:15a	62.5	62.5	62.1	71	53.0	9.0	ENE	2.25	15.0	ENE	60.6	62.2	60.3	64.3	30.287	0.00	0.00	240
10/26/09	11:30a	62.6	62.8	62.5	71	53.1	9.0	ENE	2.25	18.0	ENE	60.7	62.3	60.4	63.3	30.293	0.00	0.00	190
10/26/09	11:45a	62.9	62.9	62.6	71	53.4	9.0	ENE	2.25	18.0	NE	61.1	62.6	60.8	64.5	30.290	0.00	0.00	224
10/26/09	12:00p	63.4	63.4	62.9	70	53.4	8.0	ENE	2.00	15.0	NNE	62.5	63.1	62.2	67.5	30.288	0.00	0.00	299
10/26/09	12:15p	64.1	64.1	63.4	70	54.1	8.0	ENE	2.00	16.0	E	63.3	63.9	63.1	69.5	30.278	0.00	0.00	356
10/26/09	12:30p	64.6	64.7	64.1	67	53.4	8.0	ENE	2.00	16.0	ENE	63.9	64.3	63.6	72.4	30.276	0.00	0.00	500
10/26/09	12:45p	64.9	64.9	64.6	68	54.1	8.0	NE	2.00	14.0	ENE	64.3	64.8	64.2	70.7	30.263	0.00	0.00	358
10/26/09	1:00p	64.7	64.9	64.6	67	53.5	8.0	NE	2.00	13.0	NNE	64.0	64.5	63.8	68.4	30.261	0.00	0.00	263
10/26/09	1:15p	65.1	65.1	64.7	69	54.7	8.0	ENE	2.00	13.0	ENE	64.5	65.1	64.5	71.3	30.257	0.00	0.00	367

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Date	Time	Temp Out	Hi Temp	Low Temp	Out Hum	Dew Pt.	Wind Speed	Wind Dir	Wind Run	Hi Speed	Hi Dir	Wind Chill	Heat Index	THW Index	THSW Index	Bar	Rain	Rain Rate	Solar Rad.
10/26/09	1:30p	65.3	65.4	65.2	68	54.5	8.0	NE	2.00	15.0	ENE	64.7	65.2	64.6	71.3	30.257	0.00	0.00	357
10/26/09	1:45p	65.2	65.4	65.2	68	54.4	7.0	NE	1.75	14.0	NNE	65.2	65.1	65.1	71.5	30.251	0.00	0.00	320
10/26/09	2:00p	65.1	65.4	65.1	69	54.7	8.0	NE	2.00	14.0	NE	64.5	65.1	64.5	69.6	30.253	0.00	0.00	267
10/26/09	2:15p	64.9	65.2	64.9	69	54.5	8.0	ENE	2.00	19.0	ENE	64.3	64.8	64.2	69.2	30.251	0.00	0.00	253
10/26/09	2:30p	64.7	64.9	64.6	70	54.7	8.0	NE	2.00	15.0	NNE	64.0	64.6	63.9	66.7	30.244	0.00	0.00	157
10/26/09	2:45p	64.3	64.7	64.3	71	54.7	7.0	NE	1.75	14.0	NE	64.3	64.2	64.2	65.6	30.240	0.00	0.00	102
10/26/09	3:00p	64.1	64.3	64.1	72	54.9	7.0	NE	1.75	14.0	NNE	64.1	64.0	64.0	66.5	30.237	0.00	0.00	131
10/26/09	3:15p	64.1	64.1	64.1	72	54.9	7.0	ENE	1.75	14.0	NE	64.1	64.0	64.0	66.5	30.239	0.00	0.00	127
10/26/09	3:30p	63.9	64.1	63.9	73	55.1	7.0	NE	1.75	16.0	NE	63.9	63.9	63.9	65.1	30.243	0.00	0.00	84
10/26/09	3:45p	63.5	63.9	63.5	74	55.1	7.0	NNE	1.75	13.0	NE	63.5	63.5	63.5	63.7	30.248	0.00	0.00	53
10/26/09	4:00p	62.8	63.5	62.8	77	55.5	7.0	NE	1.75	19.0	ENE	62.7	62.8	62.7	63.2	30.242	0.00	0.00	56
10/26/09	4:15p	61.6	62.7	61.6	80	55.4	7.0	NE	1.75	14.0	NNE	61.2	61.7	61.3	61.6	30.244	0.00	0.00	49
10/26/09	4:30p	60.6	61.5	60.6	82	55.1	8.0	NE	2.00	14.0	NE	59.2	60.6	59.2	59.4	30.238	0.00	0.00	43
10/26/09	4:45p	60.2	60.6	60.1	84	55.3	6.0	NE	1.50	13.0	NNE	59.8	60.3	59.9	59.5	30.237	0.00	0.00	29
10/26/09	5:00p	60.2	60.2	60.1	83	55.0	6.0	NNE	1.50	10.0	N	59.8	60.2	59.8	59.1	30.236	0.00	0.00	21
10/26/09	5:15p	60.4	60.4	60.2	82	54.9	5.0	NE	1.25	10.0	N	60.4	60.4	60.4	58.5	30.236	0.00	0.00	16
10/26/09	5:30p	60.9	60.9	60.4	80	54.7	7.0	ENE	1.75	13.0	NNE	60.3	60.9	60.3	58.6	30.219	0.00	0.00	24
10/26/09	5:45p	60.9	61.0	60.8	79	54.3	7.0	NE	1.75	18.0	ENE	60.3	60.8	60.2	58.3	30.214	0.00	0.00	16
10/26/09	6:00p	61.1	61.1	60.9	79	54.5	6.0	NE	1.50	15.0	ENE	60.9	61.1	60.9	58.7	30.218	0.00	0.00	3
10/26/09	6:15p	61.2	61.2	61.1	78	54.3	7.0	NE	1.75	16.0	N	60.7	61.1	60.6	58.4	30.219	0.00	0.00	0
10/26/09	6:30p	61.1	61.3	61.1	80	54.9	9.0	ENE	2.25	18.0	ENE	59.0	61.1	59.0	57.0	30.219	0.00	0.00	0
10/26/09	6:45p	60.6	61.1	60.6	83	55.4	8.0	ENE	2.00	18.0	N	59.2	60.7	59.3	57.2	30.223	0.00	0.00	0
10/26/09	7:00p	59.5	60.6	59.5	87	55.6	7.0	NE	1.75	15.0	NE	58.6	59.6	58.7	56.5	30.228	0.00	0.00	0
10/26/09	7:15p	59.1	59.5	59.1	89	55.9	5.0	NE	1.25	11.0	N	58.9	59.3	59.1	56.9	30.221	0.00	0.00	0
10/26/09	7:30p	58.9	59.1	58.9	90	56.0	5.0	NE	1.25	10.0	NNE	58.7	59.1	58.9	56.7	30.210	0.00	0.00	0
10/26/09	7:45p	58.9	58.9	58.8	90	56.0	4.0	N	1.00	10.0	NNE	58.9	59.1	59.1	56.9	30.216	0.00	0.00	0
10/26/09	8:00p	59.2	59.2	58.9	90	56.3	5.0	NNE	1.25	9.0	ENE	59.0	59.4	59.2	57.0	30.211	0.00	0.00	0
10/26/09	8:15p	59.4	59.4	59.2	89	56.2	5.0	NE	1.25	10.0	NE	59.3	59.6	59.5	57.3	30.195	0.00	0.00	0
10/26/09	8:30p	59.6	59.7	59.4	88	56.0	5.0	NE	1.25	12.0	N	59.5	59.8	59.7	57.5	30.194	0.00	0.00	0
10/26/09	8:45p	60.0	60.0	59.7	87	56.1	5.0	N	1.25	10.0	N	60.0	60.2	60.2	58.0	30.194	0.00	0.00	0
10/26/09	9:00p	60.4	60.4	60.0	86	56.2	5.0	NNE	1.25	10.0	NNE	60.4	60.6	60.6	58.4	30.197	0.00	0.00	0
10/26/09	9:15p	61.1	61.1	60.4	83	55.9	6.0	N	1.50	13.0	N	60.9	61.2	61.0	58.8	30.204	0.00	0.00	0
10/26/09	9:30p	61.6	61.6	61.2	82	56.0	5.0	NE	1.25	12.0	NNE	61.6	61.8	61.8	59.6	30.201	0.00	0.00	0
10/26/09	9:45p	61.8	61.8	61.7	83	56.6	4.0	NNE	1.00	9.0	NNE	61.8	62.0	62.0	59.8	30.198	0.00	0.00	0
10/26/09	10:00p	61.3	61.8	61.3	86	57.1	5.0	NE	1.25	10.0	NNE	61.3	61.6	61.6	59.5	30.194	0.00	0.00	0
10/26/09	10:15p	61.1	61.3	61.1	88	57.5	6.0	NE	1.50	12.0	NE	60.9	61.4	61.2	59.1	30.182	0.00	0.00	0
10/26/09	10:30p	61.0	61.1	60.9	89	57.7	4.0	NE	1.00	10.0	N	61.0	61.4	61.4	59.3	30.177	0.00	0.00	0
10/26/09	10:45p	60.9	61.0	60.9	90	57.9	5.0	N	1.25	12.0	N	60.9	61.3	61.3	59.2	30.173	0.00	0.00	0
10/26/09	11:00p	61.1	61.1	60.9	91	58.5	5.0	NNE	1.25	10.0	N	61.1	61.5	61.5	59.4	30.163	0.00	0.00	0
10/26/09	11:15p	61.3	61.3	61.1	91	58.7	4.0	NNE	1.00	10.0	NE	61.3	61.8	61.8	59.7	30.163	0.00	0.00	0
10/26/09	11:30p	61.4	61.5	61.3	91	58.7	4.0	N	1.00	9.0	E	61.4	61.9	61.9	59.8	30.153	0.00	0.00	0
10/26/09	11:45p	61.6	61.6	61.4	92	59.3	3.0	NNE	0.75	8.0	N	61.6	62.1	62.1	60.1	30.147	0.00	0.00	0
10/27/09	12:00a	61.6	61.7	61.6	92	59.3	3.0	N	0.75	7.0	N	61.6	62.1	62.1	60.1	30.137	0.00	0.00	0

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Date	Time	Temp Out	Hi Temp	Low Temp	Out Hum	Dew Pt.	Wind Speed	Wind Dir	Wind Run	Hi Speed	Hi Dir	Wind Chill	Heat Index	THW Index	THSW Index	Bar	Rain	Rain Rate	Solar Rad.
10/27/09	12:15a	61.8	61.8	61.6	92	59.5	3.0	NE	0.75	7.0	N	61.8	62.4	62.4	60.4	30.135	0.00	0.00	0
10/27/09	12:30a	61.9	61.9	61.8	93	59.9	2.0	N	0.50	6.0	NE	61.9	62.5	62.5	60.5	30.135	0.00	0.00	0
10/27/09	12:45a	62.1	62.1	61.9	93	60.1	2.0	NNE	0.50	5.0	NNE	62.1	62.7	62.7	60.7	30.127	0.00	0.00	0
10/27/09	1:00a	62.3	62.3	62.1	93	60.2	4.0	ENE	1.00	8.0	ENE	62.3	63.0	63.0	61.0	30.115	0.00	0.00	0
10/27/09	1:15a	62.6	62.6	62.3	93	60.5	3.0	ENE	0.75	6.0	NE	62.6	63.3	63.3	61.3	30.104	0.00	0.00	0
10/27/09	1:30a	63.0	63.0	62.6	93	60.9	5.0	ENE	1.25	7.0	ENE	63.0	63.8	63.8	61.8	30.095	0.00	0.00	0
10/27/09	1:45a	63.2	63.2	63.0	93	61.1	4.0	ENE	1.00	6.0	ENE	63.2	64.0	64.0	62.1	30.096	0.00	0.00	0
10/27/09	2:00a	63.5	63.5	63.2	93	61.4	2.0	ENE	0.50	6.0	NE	63.5	64.3	64.3	62.4	30.088	0.00	0.00	0
10/27/09	2:15a	63.6	63.6	63.5	93	61.5	1.0	NE	0.25	5.0	NNE	63.6	64.5	64.5	62.6	30.086	0.00	0.00	0
10/27/09	2:30a	63.8	63.8	63.6	93	61.7	2.0	NE	0.50	5.0	NNE	63.8	64.7	64.7	62.8	30.083	0.00	0.00	0
10/27/09	2:45a	63.8	63.8	63.7	93	61.7	0.0	NE	0.00	2.0	NE	63.8	64.7	64.7	62.8	30.078	0.00	0.00	0
10/27/09	3:00a	64.0	64.0	63.8	94	62.2	1.0	NE	0.25	3.0	NE	64.0	65.0	65.0	63.1	30.070	0.00	0.00	0
10/27/09	3:15a	64.1	64.1	64.0	94	62.3	0.0	NNE	0.00	4.0	NNE	64.1	65.1	65.1	63.2	30.063	0.00	0.00	0
10/27/09	3:30a	64.2	64.2	64.1	94	62.4	1.0	NNE	0.25	4.0	NNE	64.2	65.2	65.2	63.3	30.052	0.00	0.00	0
10/27/09	3:45a	64.4	64.5	64.2	94	62.6	0.0	NNE	0.00	4.0	NNE	64.4	65.4	65.4	63.5	30.047	0.00	0.00	0
10/27/09	4:00a	64.5	64.6	64.5	94	62.7	0.0	NNE	0.00	2.0	NNE	64.5	65.6	65.6	63.7	30.038	0.00	0.00	0
10/27/09	4:15a	64.7	64.7	64.5	94	62.9	0.0	NNE	0.00	1.0	NNE	64.7	65.8	65.8	63.9	30.032	0.00	0.00	0
10/27/09	4:30a	64.8	64.8	64.7	94	63.0	0.0	NNE	0.00	1.0	NNE	64.8	65.9	65.9	64.0	30.024	0.00	0.00	0
10/27/09	4:45a	65.0	65.0	64.8	94	63.2	0.0	NNE	0.00	1.0	NNE	65.0	66.2	66.2	64.3	30.016	0.00	0.00	0
10/27/09	5:00a	65.2	65.2	65.0	94	63.4	0.0	NNE	0.00	2.0	NNE	65.2	66.4	66.4	64.5	30.016	0.00	0.00	0
10/27/09	5:15a	64.8	65.2	64.8	94	63.0	4.0	W	1.00	9.0	WSW	64.8	65.9	65.9	64.0	30.022	0.00	0.00	0
10/27/09	5:30a	64.3	64.8	64.3	94	62.5	6.0	WSW	1.50	10.0	W	64.3	65.3	65.3	63.4	30.023	0.00	0.00	0
10/27/09	5:45a	64.2	64.3	64.2	94	62.4	4.0	WSW	1.00	6.0	WSW	64.2	65.2	65.2	63.3	30.032	0.00	0.00	0
10/27/09	6:00a	64.0	64.2	64.0	94	62.2	5.0	WNW	1.25	9.0	W	64.0	65.0	65.0	63.1	30.038	0.00	0.00	0
10/27/09	6:15a	63.2	64.0	63.2	94	61.4	6.0	WNW	1.50	11.0	W	63.2	64.0	64.0	62.1	30.040	0.00	0.00	0
10/27/09	6:30a	62.7	63.2	62.7	94	60.9	6.0	WNW	1.50	10.0	W	62.7	63.4	63.4	61.4	30.034	0.00	0.00	0
10/27/09	6:45a	62.4	62.7	62.4	94	60.7	6.0	WNW	1.50	9.0	WNW	62.4	63.1	63.1	61.1	30.028	0.00	0.00	0
10/27/09	7:00a	62.0	62.4	62.0	94	60.3	6.0	WNW	1.50	12.0	WSW	62.0	62.7	62.7	60.7	30.032	0.00	0.00	0
10/27/09	7:15a	61.3	62.0	61.3	94	59.6	8.0	W	2.00	13.0	WNW	60.1	61.8	60.6	58.7	30.039	0.00	0.00	0
10/27/09	7:30a	61.0	61.3	61.0	94	59.3	7.0	W	1.75	13.0	W	60.4	61.5	60.9	59.2	30.044	0.00	0.00	0
10/27/09	7:45a	60.6	61.0	60.6	94	58.9	6.0	W	1.50	11.0	W	60.3	61.0	60.7	59.1	30.046	0.00	0.00	2
10/27/09	8:00a	60.2	60.6	60.2	94	58.5	7.0	W	1.75	13.0	W	59.4	60.6	59.8	58.3	30.056	0.00	0.00	5
10/27/09	8:15a	59.9	60.2	59.9	94	58.2	7.0	W	1.75	13.0	W	59.1	60.3	59.5	58.3	30.056	0.00	0.00	12
10/27/09	8:30a	59.6	59.9	59.6	94	57.9	7.0	W	1.75	11.0	WNW	58.7	60.0	59.1	58.3	30.057	0.00	0.00	22
10/27/09	8:45a	59.5	59.6	59.5	94	57.8	7.0	WNW	1.75	12.0	W	58.6	59.9	59.0	58.7	30.068	0.00	0.00	38
10/27/09	9:00a	59.5	59.5	59.4	94	57.8	7.0	WNW	1.75	11.0	W	58.6	59.9	59.0	58.4	30.069	0.00	0.00	32
10/27/09	9:15a	59.4	59.5	59.3	94	57.7	6.0	W	1.50	11.0	W	58.9	59.8	59.3	58.6	30.068	0.00	0.00	29
10/27/09	9:30a	59.3	59.4	59.2	94	57.6	6.0	WNW	1.50	10.0	WNW	58.8	59.7	59.2	59.3	30.068	0.00	0.00	54
10/27/09	9:45a	59.3	59.4	59.3	94	57.6	6.0	W	1.50	10.0	WSW	58.8	59.7	59.2	59.5	30.068	0.00	0.00	64
10/27/09	10:00a	59.2	59.3	59.2	94	57.5	6.0	W	1.50	10.0	W	58.6	59.6	59.0	59.4	30.065	0.00	0.00	68
10/27/09	10:15a	59.3	59.3	59.2	94	57.6	5.0	W	1.25	10.0	W	59.2	59.7	59.6	61.6	30.068	0.00	0.00	124
10/27/09	10:30a	59.4	59.4	59.3	94	57.7	4.0	WSW	1.00	7.0	WSW	59.4	59.8	59.8	60.9	30.067	0.00	0.00	96
10/27/09	10:45a	59.6	59.6	59.4	94	57.9	5.0	WSW	1.25	7.0	WNW	59.5	60.0	59.9	60.5	30.073	0.00	0.00	82
10/27/09	11:00a	59.8	59.8	59.6	94	58.1	5.0	WSW	1.25	8.0	W	59.8	60.2	60.2	61.2	30.086	0.00	0.00	98
10/27/09	11:15a	59.9	59.9	59.8	94	58.2	4.0	WSW	1.00	9.0	WSW	59.9	60.3	60.3	62.0	30.077	0.00	0.00	123
10/27/09	11:30a	60.0	60.0	59.8	94	58.3	6.0	WSW	1.50	12.0	W	59.6	60.4	60.0	61.5	30.082	0.00	0.00	118
10/27/09	11:45a	60.2	60.2	60.0	94	58.5	5.0	W	1.25	11.0	WSW	60.2	60.6	60.6	62.6	30.077	0.00	0.00	136
10/27/09	12:00p	60.4	60.4	60.2	94	58.7	5.0	W	1.25	8.0	W	60.4	60.8	60.8	63.8	30.068	0.00	0.00	173
10/27/09	12:15p	60.6	60.7	60.4	93	58.6	5.0	W	1.25	8.0	WSW	60.6	61.0	61.0	64.3	30.059	0.00	0.00	185
10/27/09	12:30p	60.9	60.9	60.5	93	58.9	4.0	W	1.00	7.0	W	60.9	61.4	61.4	65.1	30.058	0.00	0.00	205
10/27/09	12:45p	61.1	61.1	60.9	92	58.8	6.0	W	1.50	9.0	W	60.9	61.6	61.4	63.3	30.051	0.00	0.00	135
10/27/09	1:00p	60.9	61.2	60.9	92	58.6	5.0	WSW	1.25	9.0	WSW	60.9	61.3	61.3	62.5	30.047	0.00	0.00	106
10/27/09	1:15p	61.0	61.1	60.9	92	58.7	4.0	WSW	1.00	9.0	WSW	61.0	61.4	61.4	63.9	30.037	0.00	0.00	152

SJCA Site 21 10/27/09

Date	Time	Temp Out	Hi Temp	Low Temp	Out Hum	Dew Pt.	Wind Speed	Wind Dir	Wind Run	Hi Speed	Hi Dir	Wind Chill	Heat Index	THW Index	THSW Index	Bar	Rain	Rain Rate	Solar Rad.
10/27/09	1:30p	61.1	61.1	61.0	91	58.5	5.0	WSW	1.25	10.0	WNW	61.1	61.5	61.5	64.1	30.031	0.00	0.00	153
10/27/09	1:45p	61.4	61.4	61.1	91	58.7	6.0	W	1.50	9.0	WSW	61.3	61.9	61.8	64.3	30.028	0.00	0.00	147
10/27/09	2:00p	61.3	61.4	61.3	90	58.3	6.0	WNW	1.50	10.0	W	61.2	61.7	61.6	63.8	30.037	0.00	0.00	135
10/27/09	2:15p	61.3	61.4	61.3	90	58.3	6.0	WSW	1.50	10.0	WSW	61.2	61.7	61.6	63.7	30.038	0.00	0.00	127
10/27/09	2:30p	61.3	61.3	61.3	90	58.3	6.0	W	1.50	11.0	WSW	61.2	61.7	61.6	63.6	30.034	0.00	0.00	120
10/27/09	2:45p	61.2	61.3	61.2	90	58.2	6.0	W	1.50	10.0	WNW	61.0	61.6	61.4	63.0	30.035	0.00	0.00	105
10/27/09	3:00p	61.2	61.3	61.2	90	58.2	5.0	W	1.25	9.0	W	61.2	61.6	61.6	63.3	30.028	0.00	0.00	103
10/27/09	3:15p	61.3	61.3	61.2	89	58.0	6.0	WSW	1.50	10.0	WNW	61.2	61.7	61.6	62.8	30.041	0.00	0.00	85
10/27/09	3:30p	61.2	61.3	61.2	90	58.2	5.0	WSW	1.25	9.0	WSW	61.2	61.6	61.6	63.3	30.047	0.00	0.00	93
10/27/09	3:45p	61.2	61.3	61.2	89	57.9	6.0	W	1.50	11.0	WSW	61.0	61.6	61.4	62.4	30.039	0.00	0.00	72
10/27/09	4:00p	61.2	61.2	61.1	89	57.9	6.0	WSW	1.50	10.0	W	61.0	61.6	61.4	62.4	30.047	0.00	0.00	66
10/27/09	4:15p	61.2	61.2	61.1	88	57.6	7.0	W	1.75	11.0	W	60.7	61.5	61.0	63.6	30.036	0.00	0.00	103
10/27/09	4:30p	61.2	61.3	61.2	88	57.6	5.0	W	1.25	9.0	W	61.2	61.5	61.5	62.9	30.030	0.00	0.00	68
10/27/09	4:45p	61.1	61.2	61.1	89	57.8	4.0	WSW	1.00	7.0	WSW	61.1	61.5	61.5	62.4	30.030	0.00	0.00	55
10/27/09	5:00p	61.1	61.1	61.1	89	57.8	5.0	WNW	1.25	7.0	W	61.1	61.5	61.5	61.4	30.033	0.00	0.00	32
10/27/09	5:15p	61.1	61.1	61.1	89	57.8	3.0	WSW	0.75	7.0	WSW	61.1	61.5	61.5	60.1	30.037	0.00	0.00	32
10/27/09	5:30p	61.0	61.1	61.0	89	57.7	5.0	WNW	1.25	9.0	WNW	61.0	61.4	61.4	60.0	30.038	0.00	0.00	32
10/27/09	5:45p	60.9	61.0	60.9	89	57.6	4.0	WNW	1.00	7.0	WSW	60.9	61.3	61.3	59.5	30.044	0.00	0.00	16
10/27/09	6:00p	60.8	60.9	60.8	89	57.5	3.0	WSW	0.75	8.0	WSW	60.8	61.1	61.1	59.0	30.046	0.00	0.00	2
10/27/09	6:15p	60.7	60.8	60.7	89	57.4	2.0	WSW	0.50	7.0	WSW	60.7	61.0	61.0	58.8	30.054	0.00	0.00	0
10/27/09	6:30p	60.7	60.7	60.7	89	57.4	1.0	WSW	0.25	4.0	WSW	60.7	61.0	61.0	58.8	30.057	0.00	0.00	0
10/27/09	6:45p	60.5	60.7	60.5	89	57.2	2.0	WSW	0.50	5.0	WSW	60.5	60.8	60.8	58.6	30.055	0.00	0.00	0
10/27/09	7:00p	60.4	60.5	60.4	90	57.5	0.0	SW	0.00	5.0	WSW	60.4	60.7	60.7	58.5	30.051	0.00	0.00	0
10/27/09	7:15p	60.4	60.5	60.4	90	57.5	1.0	SW	0.25	2.0	SW	60.4	60.7	60.7	58.5	30.058	0.00	0.00	0
10/27/09	7:30p	60.4	60.4	60.4	90	57.5	2.0	SW	0.50	6.0	SW	60.4	60.7	60.7	58.5	30.069	0.00	0.00	0
10/27/09	7:45p	60.3	60.4	60.3	90	57.4	3.0	WSW	0.75	8.0	WSW	60.3	60.6	60.6	58.4	30.074	0.00	0.00	0
10/27/09	8:00p	60.2	60.3	60.2	90	57.3	1.0	WSW	0.25	5.0	WSW	60.2	60.5	60.5	58.3	30.064	0.00	0.00	0
10/27/09	8:15p	60.2	60.2	60.2	90	57.3	1.0	W	0.25	3.0	W	60.2	60.5	60.5	58.3	30.062	0.00	0.00	0
10/27/09	8:30p	60.2	60.2	60.2	90	57.3	0.0	---	0.00	0.0	---	60.2	60.5	60.5	58.3	30.061	0.00	0.00	0
10/27/09	8:45p	60.1	60.2	60.1	91	57.5	0.0	W	0.00	1.0	W	60.1	60.4	60.4	58.2	30.053	0.00	0.00	0
10/27/09	9:00p	60.1	60.1	60.0	91	57.5	1.0	NNE	0.25	4.0	NNE	60.1	60.4	60.4	58.2	30.043	0.00	0.00	0
10/27/09	9:15p	60.1	60.1	60.0	91	57.5	1.0	ENE	0.25	5.0	ENE	60.1	60.4	60.4	58.2	30.038	0.00	0.00	0
10/27/09	9:30p	60.1	60.2	60.0	92	57.8	2.0	E	0.50	5.0	E	60.1	60.4	60.4	58.2	30.040	0.00	0.00	0
10/27/09	9:45p	60.2	60.2	60.1	92	57.9	2.0	E	0.50	5.0	E	60.2	60.6	60.6	58.4	30.036	0.00	0.00	0
10/27/09	10:00p	60.1	60.2	60.1	92	57.8	3.0	E	0.75	5.0	E	60.1	60.4	60.4	58.2	30.027	0.00	0.00	0
10/27/09	10:15p	60.2	60.2	60.1	92	57.9	1.0	ENE	0.25	4.0	ENE	60.2	60.6	60.6	58.4	30.033	0.00	0.00	0
10/27/09	10:30p	60.3	60.3	60.2	92	58.0	2.0	E	0.50	5.0	E	60.3	60.7	60.7	58.5	30.029	0.00	0.00	0
10/27/09	10:45p	60.3	60.3	60.2	92	58.0	3.0	E	0.75	6.0	ESE	60.3	60.7	60.7	58.5	30.028	0.00	0.00	0
10/27/09	11:00p	60.3	60.3	60.3	92	58.0	3.0	E	0.75	6.0	E	60.3	60.7	60.7	58.5	30.023	0.00	0.00	0
10/27/09	11:15p	60.3	60.3	60.3	92	58.0	3.0	E	0.75	6.0	E	60.3	60.7	60.7	58.5	30.016	0.00	0.00	0
10/27/09	11:30p	60.3	60.3	60.3	93	58.3	3.0	E	0.75	5.0	E	60.3	60.7	60.7	58.6	30.008	0.00	0.00	0
10/27/09	11:45p	60.3	60.3	60.2	93	58.3	3.0	E	0.75	6.0	ESE	60.3	60.7	60.7	58.6	29.994	0.00	0.00	0
10/28/09	12:00a	60.2	60.3	60.2	93	58.2	4.0	E	1.00	6.0	E	60.2	60.6	60.6	58.5	29.979	0.00	0.00	0

SJCA Site 21 10/28/09

Date	Time	Temp Out	Hi Temp	Low Temp	Out Hum	Dew Pt.	Wind Speed	Wind Dir	Wind Run	Hi Speed	Hi Dir	Wind Chill	Heat Index	THW Index	THSW Index	Bar	Rain	Rain Rate	Solar Rad.
10/28/09	12:15a	60.2	60.3	60.2	93	58.2	3.0	E	0.75	6.0	ESE	60.2	60.6	60.6	58.5	29.973	0.00	0.00	0
10/28/09	12:30a	60.3	60.3	60.2	93	58.3	4.0	E	1.00	7.0	E	60.3	60.7	60.7	58.6	29.958	0.00	0.00	0
10/28/09	12:45a	60.4	60.4	60.3	93	58.4	4.0	E	1.00	7.0	E	60.4	60.8	60.8	58.7	29.949	0.00	0.00	0
10/28/09	1:00a	60.5	60.5	60.4	93	58.5	4.0	E	1.00	7.0	E	60.5	60.9	60.9	58.8	29.949	0.00	0.00	0
10/28/09	1:15a	60.7	60.7	60.5	94	59.0	2.0	E	0.50	6.0	E	60.7	61.2	61.2	59.1	29.946	0.00	0.00	0
10/28/09	1:30a	60.9	60.9	60.7	93	58.9	3.0	E	0.75	6.0	E	60.9	61.4	61.4	59.3	29.941	0.00	0.00	0
10/28/09	1:45a	61.1	61.1	60.9	93	59.1	4.0	E	1.00	8.0	E	61.1	61.6	61.6	59.5	29.926	0.00	0.00	0
10/28/09	2:00a	61.3	61.3	61.1	94	59.6	3.0	E	0.75	8.0	ESE	61.3	61.8	61.8	59.7	29.921	0.00	0.00	0
10/28/09	2:15a	61.6	61.6	61.3	93	59.6	3.0	E	0.75	9.0	ESE	61.6	62.2	62.2	60.1	29.913	0.00	0.00	0
10/28/09	2:30a	61.8	61.8	61.6	93	59.8	5.0	E	1.25	10.0	ESE	61.8	62.4	62.4	60.3	29.906	0.00	0.00	0
10/28/09	2:45a	62.1	62.1	61.8	93	60.1	5.0	E	1.25	12.0	SSE	62.1	62.7	62.7	60.7	29.887	0.00	0.00	0
10/28/09	3:00a	62.4	62.4	62.1	93	60.3	4.0	E	1.00	9.0	E	62.4	63.1	63.1	61.1	29.887	0.00	0.00	0
10/28/09	3:15a	62.7	62.7	62.4	93	60.6	3.0	ESE	0.75	9.0	ESE	62.7	63.4	63.4	61.4	29.883	0.00	0.00	0
10/28/09	3:30a	63.2	63.2	62.7	93	61.1	3.0	ESE	0.75	9.0	ESE	63.2	64.0	64.0	62.0	29.874	0.00	0.00	0
10/28/09	3:45a	63.4	63.4	63.2	92	61.0	4.0	SE	1.00	12.0	SSE	63.4	64.2	64.2	62.2	29.863	0.00	0.00	0
10/28/09	4:00a	63.6	63.7	63.4	93	61.5	4.0	SE	1.00	11.0	SSE	63.6	64.5	64.5	62.5	29.850	0.00	0.00	0
10/28/09	4:15a	64.1	64.1	63.7	93	62.0	4.0	ESE	1.00	9.0	ENE	64.1	65.0	65.0	63.1	29.836	0.00	0.00	0
10/28/09	4:30a	64.8	64.8	64.0	93	62.7	5.0	SE	1.25	12.0	E	64.8	65.9	65.9	64.0	29.827	0.00	0.00	0
10/28/09	4:45a	65.4	65.4	64.8	94	63.6	2.0	ESE	0.50	7.0	SSW	65.4	66.6	66.6	64.7	29.826	0.00	0.00	0
10/28/09	5:00a	66.4	66.4	65.4	94	64.6	2.0	S	0.50	9.0	SE	66.4	67.9	67.9	66.1	29.839	0.00	0.00	0
10/28/09	5:15a	67.0	67.0	66.4	94	65.2	2.0	SSE	0.50	11.0	SE	67.0	68.6	68.6	66.8	29.823	0.00	0.00	0
10/28/09	5:30a	68.1	68.1	67.0	94	66.3	3.0	S	0.75	8.0	SSE	68.1	70.0	70.0	68.3	29.832	0.00	0.00	0
10/28/09	5:45a	69.1	69.1	68.1	95	67.6	4.0	S	1.00	11.0	S	69.1	71.4	71.4	69.7	29.821	0.00	0.00	0
10/28/09	6:00a	69.8	69.8	69.1	95	68.3	5.0	S	1.25	15.0	S	69.8	72.3	72.3	70.7	29.825	0.00	0.00	0
10/28/09	6:15a	70.4	70.4	69.8	94	68.6	6.0	S	1.50	13.0	SSW	70.4	72.9	72.9	71.3	29.832	0.00	0.00	0
10/28/09	6:30a	71.0	71.0	70.4	94	69.2	6.0	SSW	1.50	15.0	S	71.0	73.6	73.6	72.0	29.830	0.00	0.00	0
10/28/09	6:45a	71.5	71.5	71.0	94	69.7	6.0	SSW	1.50	13.0	SSW	71.5	74.1	74.1	72.5	29.828	0.00	0.00	0
10/28/09	7:00a	71.7	71.7	71.5	94	69.9	5.0	SSW	1.25	11.0	SSE	71.7	74.4	74.4	72.8	29.832	0.00	0.00	0
10/28/09	7:15a	72.0	72.0	71.7	93	69.9	5.0	SSW	1.25	11.0	S	72.0	74.6	74.6	73.0	29.834	0.00	0.00	0
10/28/09	7:30a	72.2	72.2	72.0	93	70.1	4.0	SSW	1.00	9.0	S	72.2	74.8	74.8	73.5	29.829	0.00	0.00	0
10/28/09	7:45a	72.3	72.3	72.1	93	70.2	4.0	SSW	1.00	8.0	SSW	72.3	74.9	74.9	74.0	29.829	0.00	0.00	7
10/28/09	8:00a	72.5	72.5	72.2	93	70.4	5.0	SSW	1.25	11.0	SSW	72.5	75.1	75.1	74.8	29.834	0.00	0.00	21
10/28/09	8:15a	72.7	72.7	72.5	93	70.6	4.0	SSW	1.00	10.0	S	72.7	75.3	75.3	75.9	29.840	0.00	0.00	42
10/28/09	8:30a	72.9	72.9	72.7	93	70.8	3.0	SSW	0.75	7.0	SW	72.9	75.6	75.6	75.6	29.838	0.00	0.00	31
10/28/09	8:45a	73.0	73.0	72.9	93	70.9	3.0	SSW	0.75	10.0	SSW	73.0	75.7	75.7	75.2	29.846	0.00	0.00	20
10/28/09	9:00a	73.2	73.2	73.0	93	71.1	3.0	SSW	0.75	9.0	SW	73.2	75.9	75.9	76.3	29.852	0.00	0.00	43
10/28/09	9:15a	73.6	73.6	73.2	93	71.4	4.0	SSW	1.00	10.0	SSW	73.6	76.3	76.3	78.1	29.854	0.00	0.00	86
10/28/09	9:30a	74.1	74.1	73.6	92	71.6	6.0	SSW	1.50	13.0	SSW	74.1	76.8	76.8	79.3	29.854	0.00	0.00	108
10/28/09	9:45a	74.7	74.7	74.1	90	71.6	6.0	SSW	1.50	15.0	SE	74.7	77.8	77.8	80.7	29.857	0.00	0.00	125
10/28/09	10:00a	75.1	75.1	74.7	89	71.6	6.0	SSW	1.50	16.0	S	75.1	78.4	78.4	81.8	29.857	0.00	0.00	147
10/28/09	10:15a	76.4	76.4	75.1	88	72.6	5.0	SW	1.25	12.0	SSW	76.4	80.0	80.0	89.8	29.861	0.00	0.00	417
10/28/09	10:30a	75.3	76.8	75.3	85	70.5	8.0	WSW	2.00	16.0	WSW	74.8	78.4	77.9	80.1	29.863	0.00	0.00	119
10/28/09	10:45a	74.9	75.3	74.7	85	70.1	8.0	WSW	2.00	20.0	SSW	74.4	77.8	77.3	81.5	29.867	0.00	0.00	202
10/28/09	11:00a	74.2	74.9	74.2	83	68.7	8.0	W	2.00	16.0	W	73.7	76.5	76.0	80.9	29.871	0.00	0.00	240
10/28/09	11:15a	74.1	74.3	74.1	81	67.9	8.0	WSW	2.00	13.0	WSW	73.6	76.2	75.7	80.3	29.874	0.00	0.00	230
10/28/09	11:30a	73.5	74.1	73.5	78	66.2	10.0	WSW	2.50	20.0	W	71.5	75.3	73.3	78.2	29.878	0.00	0.00	267
10/28/09	11:45a	73.7	73.7	73.5	79	66.8	7.0	WSW	1.75	21.0	WSW	73.7	75.6	75.6	85.4	29.869	0.00	0.00	494
10/28/09	12:00p	74.5	74.5	73.7	74	65.7	8.0	WSW	2.00	16.0	W	74.0	76.4	75.9	86.7	29.871	0.00	0.00	660
10/28/09	12:15p	75.0	75.0	74.5	71	65.0	7.0	WSW	1.75	14.0	WSW	75.0	76.8	76.8	87.9	29.866	0.00	0.00	661
10/28/09	12:30p	75.8	75.8	74.9	70	65.3	7.0	W	1.75	13.0	SW	75.8	77.6	77.6	88.6	29.868	0.00	0.00	695
10/28/09	12:45p	75.4	75.8	75.3	69	64.5	8.0	W	2.00	12.0	W	74.9	77.0	76.5	86.9	29.865	0.00	0.00	693
10/28/09	1:00p	75.8	76.0	75.4	62	61.8	7.0	W	1.75	16.0	W	75.8	76.7	76.7	87.1	29.868	0.00	0.00	694
10/28/09	1:15p	75.8	75.8	75.6	64	62.8	8.0	W	2.00	16.0	W	75.3	76.9	76.4	86.5	29.865	0.00	0.00	691

SJCA Site 21 10/28/09

Date	Time	Temp Out	Hi Temp	Low Temp	Out Hum	Dew Pt.	Wind Speed	Wind Dir	Wind Run	Hi Speed	Hi Dir	Wind Chill	Heat Index	THW Index	THSW Index	Bar	Rain	Rain Rate	Solar Rad.
10/28/09	1:30p	75.8	76.0	75.8	62	61.8	8.0	WSW	2.00	14.0	W	75.3	76.7	76.2	86.5	29.862	0.00	0.00	688
10/28/09	1:45p	75.8	75.9	75.8	61	61.4	9.0	WSW	2.25	19.0	WSW	74.5	76.6	75.3	85.7	29.858	0.00	0.00	692
10/28/09	2:00p	76.0	76.0	75.9	58	60.2	8.0	WSW	2.00	15.0	WSW	75.5	76.5	76.0	86.9	29.859	0.00	0.00	675
10/28/09	2:15p	76.0	76.1	75.9	59	60.6	8.0	WSW	2.00	16.0	WSW	75.5	76.6	76.1	87.6	29.860	0.00	0.00	673
10/28/09	2:30p	76.3	76.4	76.0	53	57.9	9.0	W	2.25	23.0	WSW	75.0	76.5	75.2	86.2	29.863	0.00	0.00	645
10/28/09	2:45p	76.5	76.5	76.2	53	58.1	7.0	W	1.75	13.0	W	76.5	76.6	76.6	88.5	29.866	0.00	0.00	613
10/28/09	3:00p	76.7	76.9	76.4	52	57.7	6.0	WSW	1.50	12.0	WSW	76.7	76.7	76.7	89.0	29.868	0.00	0.00	585
10/28/09	3:15p	76.4	76.7	76.4	52	57.5	7.0	WSW	1.75	14.0	WSW	76.4	76.5	76.5	88.7	29.873	0.00	0.00	555
10/28/09	3:30p	76.5	76.6	76.3	52	57.6	8.0	WSW	2.00	14.0	WSW	76.0	76.6	76.1	88.0	29.878	0.00	0.00	523
10/28/09	3:45p	76.5	76.7	76.5	53	58.1	6.0	W	1.50	12.0	WSW	76.5	76.6	76.6	89.3	29.881	0.00	0.00	484
10/28/09	4:00p	76.3	76.5	76.2	52	57.4	7.0	WSW	1.75	13.0	WSW	76.3	76.4	76.4	88.6	29.883	0.00	0.00	444
10/28/09	4:15p	76.0	76.3	76.0	53	57.6	7.0	W	1.75	12.0	WSW	76.0	76.2	76.2	88.3	29.886	0.00	0.00	404
10/28/09	4:30p	75.8	76.0	75.8	53	57.4	8.0	WSW	2.00	14.0	WSW	75.3	76.0	75.5	86.3	29.891	0.00	0.00	356
10/28/09	4:45p	75.3	75.8	75.3	54	57.5	7.0	WSW	1.75	15.0	WSW	75.3	75.7	75.7	85.9	29.896	0.00	0.00	307
10/28/09	5:00p	75.1	75.3	75.1	54	57.3	7.0	WSW	1.75	13.0	SSW	75.1	75.5	75.5	84.2	29.901	0.00	0.00	255
10/28/09	5:15p	75.2	75.3	75.1	55	57.9	4.0	WSW	1.00	10.0	SW	75.2	75.7	75.7	77.3	29.903	0.00	0.00	199
10/28/09	5:30p	74.6	75.2	74.6	56	57.9	5.0	WSW	1.25	11.0	SSW	74.6	75.1	75.1	75.4	29.910	0.00	0.00	141
10/28/09	5:45p	74.0	74.6	74.0	57	57.8	5.0	WSW	1.25	11.0	WSW	74.0	74.4	74.4	73.5	29.916	0.00	0.00	85
10/28/09	6:00p	73.1	74.0	73.1	59	57.9	3.0	WSW	0.75	7.0	SSW	73.1	73.4	73.4	71.3	29.924	0.00	0.00	26
10/28/09	6:15p	72.2	73.1	72.2	60	57.5	2.0	SW	0.50	6.0	SW	72.2	72.2	72.2	69.7	29.934	0.00	0.00	8
10/28/09	6:30p	71.5	72.2	71.5	61	57.3	1.0	SW	0.25	5.0	WSW	71.5	71.3	71.3	68.6	29.944	0.00	0.00	0
10/28/09	6:45p	70.6	71.4	70.6	62	56.9	3.0	W	0.75	7.0	W	70.6	70.2	70.2	67.5	29.951	0.00	0.00	0
10/28/09	7:00p	70.4	70.6	70.4	61	56.3	5.0	WSW	1.25	7.0	WSW	70.4	69.8	69.8	67.1	29.961	0.00	0.00	0
10/28/09	7:15p	69.8	70.4	69.8	63	56.6	3.0	WSW	0.75	7.0	WSW	69.8	69.3	69.3	66.6	29.971	0.00	0.00	0
10/28/09	7:30p	69.2	69.8	69.2	64	56.5	1.0	W	0.25	5.0	W	69.2	69.0	69.0	66.3	29.975	0.00	0.00	0
10/28/09	7:45p	68.6	69.2	68.6	66	56.8	0.0	WSW	0.00	3.0	WSW	68.6	68.7	68.7	66.0	29.980	0.00	0.00	0
10/28/09	8:00p	67.5	68.6	67.5	69	57.0	0.0	WSW	0.00	1.0	WSW	67.5	67.9	67.9	65.2	29.983	0.00	0.00	0
10/28/09	8:15p	66.7	67.5	66.7	70	56.6	0.0	WSW	0.00	3.0	WSW	66.7	67.0	67.0	64.3	29.993	0.00	0.00	0
10/28/09	8:30p	66.2	66.7	66.2	72	56.9	0.0	WSW	0.00	1.0	WSW	66.2	66.6	66.6	63.9	29.998	0.00	0.00	0
10/28/09	8:45p	65.8	66.2	65.8	73	56.9	0.0	WSW	0.00	1.0	WSW	65.8	66.1	66.1	63.4	29.998	0.00	0.00	0
10/28/09	9:00p	65.4	65.7	65.4	74	56.9	0.0	WSW	0.00	1.0	WSW	65.4	65.7	65.7	63.0	29.997	0.00	0.00	0
10/28/09	9:15p	64.5	65.4	64.5	76	56.8	0.0	WSW	0.00	1.0	WSW	64.5	64.8	64.8	62.1	30.003	0.00	0.00	0
10/28/09	9:30p	64.2	64.5	64.2	77	56.8	0.0	WSW	0.00	1.0	WSW	64.2	64.5	64.5	61.8	30.010	0.00	0.00	0
10/28/09	9:45p	64.0	64.2	64.0	78	57.0	0.0	WSW	0.00	2.0	WSW	64.0	64.3	64.3	61.6	30.016	0.00	0.00	0
10/28/09	10:00p	63.5	64.0	63.5	80	57.2	0.0	WSW	0.00	1.0	WSW	63.5	63.9	63.9	61.2	30.020	0.00	0.00	0
10/28/09	10:15p	63.0	63.5	63.0	80	56.7	0.0	WSW	0.00	1.0	WSW	63.0	63.3	63.3	60.6	30.029	0.00	0.00	0
10/28/09	10:30p	62.7	63.0	62.6	81	56.8	0.0	WSW	0.00	1.0	WSW	62.7	63.0	63.0	60.3	30.030	0.00	0.00	0
10/28/09	10:45p	62.2	62.7	62.2	82	56.6	0.0	WSW	0.00	1.0	WSW	62.2	62.5	62.5	59.8	30.030	0.00	0.00	0
10/28/09	11:00p	61.7	62.2	61.7	83	56.5	0.0	WSW	0.00	1.0	WSW	61.7	61.9	61.9	59.2	30.030	0.00	0.00	0
10/28/09	11:15p	61.4	61.7	61.4	83	56.2	0.0	WSW	0.00	1.0	WSW	61.4	61.6	61.6	58.9	30.029	0.00	0.00	0
10/28/09	11:30p	61.4	61.4	61.3	83	56.2	1.0	WSW	0.25	2.0	WSW	61.4	61.6	61.6	58.9	30.035	0.00	0.00	0
10/28/09	11:45p	61.5	61.5	61.1	83	56.3	4.0	W	1.00	9.0	WNW	61.5	61.7	61.7	59.0	30.045	0.00	0.00	0
10/29/09	12:00a	61.8	61.8	61.5	82	56.2	4.0	WNW	1.00	7.0	WNW	61.8	62.0	62.0	59.3	30.046	0.00	0.00	0

SJCA Site 21 10/29/09

Date	Time	Temp Out	Hi Temp	Low Temp	Out Hum	Dew Pt.	Wind Speed	Wind Dir	Wind Run	Hi Speed	Hi Dir	Wind Chill	Heat Index	THW Index	THSW Index	Bar	Rain	Rain Rate	Solar Rad.
10/29/09	12:15a	61.9	62.0	61.8	83	56.7	3.0	WNW	0.75	5.0	WNW	61.9	62.1	62.1	59.4	30.050	0.00	0.00	0
10/29/09	12:30a	62.0	62.0	61.9	82	56.4	3.0	NW	0.75	6.0	NW	62.0	62.2	62.2	59.5	30.054	0.00	0.00	0
10/29/09	12:45a	62.6	62.6	62.0	80	56.3	3.0	NW	0.75	10.0	NW	62.6	62.9	62.9	60.2	30.060	0.00	0.00	0
10/29/09	1:00a	63.6	63.6	62.6	77	56.3	5.0	NW	1.25	9.0	NW	63.6	63.8	63.8	61.1	30.065	0.00	0.00	0
10/29/09	1:15a	63.6	63.7	63.6	76	55.9	4.0	NNW	1.00	8.0	NNW	63.6	63.7	63.7	60.9	30.069	0.00	0.00	0
10/29/09	1:30a	63.3	63.6	63.3	78	56.3	3.0	NW	0.75	8.0	NW	63.3	63.5	63.5	60.8	30.078	0.00	0.00	0
10/29/09	1:45a	62.8	63.2	62.8	79	56.2	4.0	WNW	1.00	9.0	NW	62.8	63.0	63.0	60.3	30.085	0.00	0.00	0
10/29/09	2:00a	62.9	62.9	62.7	76	55.2	7.0	NW	1.75	12.0	NW	62.8	62.9	62.8	60.0	30.087	0.00	0.00	0
10/29/09	2:15a	62.8	62.9	62.7	76	55.1	6.0	NW	1.50	10.0	NW	62.8	62.8	62.8	60.0	30.092	0.00	0.00	0
10/29/09	2:30a	62.2	62.7	62.2	77	54.9	3.0	NW	0.75	8.0	WNW	62.2	62.2	62.2	59.4	30.095	0.00	0.00	0
10/29/09	2:45a	61.8	62.2	61.8	79	55.2	4.0	NW	1.00	8.0	WNW	61.8	61.9	61.9	59.1	30.096	0.00	0.00	0
10/29/09	3:00a	61.4	61.7	61.3	79	54.8	3.0	WNW	0.75	7.0	NW	61.4	61.4	61.4	58.6	30.104	0.00	0.00	0
10/29/09	3:15a	60.9	61.4	60.9	79	54.3	2.0	WNW	0.50	5.0	W	60.9	60.8	60.8	58.0	30.107	0.00	0.00	0
10/29/09	3:30a	60.6	60.9	60.6	80	54.4	3.0	WNW	0.75	7.0	WNW	60.6	60.6	60.6	57.8	30.110	0.00	0.00	0
10/29/09	3:45a	60.2	60.6	60.2	81	54.3	3.0	WNW	0.75	6.0	WNW	60.2	60.2	60.2	57.4	30.108	0.00	0.00	0
10/29/09	4:00a	59.9	60.2	59.9	81	54.1	4.0	WNW	1.00	7.0	NW	59.9	59.8	59.8	57.0	30.108	0.00	0.00	0
10/29/09	4:15a	59.6	59.9	59.6	81	53.8	3.0	WNW	0.75	7.0	NW	59.6	59.5	59.5	56.6	30.109	0.00	0.00	0
10/29/09	4:30a	59.6	59.6	59.5	81	53.8	4.0	WNW	1.00	7.0	WNW	59.6	59.5	59.5	56.6	30.112	0.00	0.00	0
10/29/09	4:45a	59.5	59.6	59.5	81	53.7	4.0	NW	1.00	9.0	NW	59.5	59.4	59.4	56.5	30.111	0.00	0.00	0
10/29/09	5:00a	59.5	59.6	59.5	81	53.7	4.0	NW	1.00	9.0	WNW	59.5	59.4	59.4	56.5	30.118	0.00	0.00	0
10/29/09	5:15a	59.3	59.5	59.3	82	53.8	3.0	NW	0.75	7.0	NNW	59.3	59.2	59.2	56.3	30.132	0.00	0.00	0
10/29/09	5:30a	59.2	59.3	59.1	82	53.7	3.0	WNW	0.75	6.0	W	59.2	59.1	59.1	56.2	30.140	0.00	0.00	0
10/29/09	5:45a	59.4	59.4	59.1	82	53.9	3.0	NW	0.75	7.0	WNW	59.4	59.3	59.3	56.4	30.150	0.00	0.00	0
10/29/09	6:00a	59.6	59.6	59.4	81	53.8	4.0	NW	1.00	7.0	WNW	59.6	59.5	59.5	56.6	30.159	0.00	0.00	0
10/29/09	6:15a	59.7	59.7	59.6	81	53.9	4.0	NW	1.00	8.0	NNW	59.7	59.6	59.6	56.7	30.168	0.00	0.00	0
10/29/09	6:30a	59.9	59.9	59.7	81	54.1	5.0	NW	1.25	7.0	WNW	59.9	59.8	59.8	57.0	30.170	0.00	0.00	0
10/29/09	6:45a	60.1	60.1	59.9	81	54.2	5.0	NW	1.25	9.0	NW	60.1	60.0	60.0	57.2	30.173	0.00	0.00	0
10/29/09	7:00a	60.4	60.4	60.1	81	54.5	5.0	NW	1.25	8.0	WNW	60.4	60.4	60.4	57.6	30.180	0.00	0.00	0
10/29/09	7:15a	60.8	60.8	60.4	81	54.9	4.0	NW	1.00	9.0	NW	60.8	60.8	60.8	58.0	30.188	0.00	0.00	0
10/29/09	7:30a	60.9	60.9	60.8	81	55.0	5.0	NNW	1.25	12.0	NW	60.9	60.9	60.9	59.1	30.193	0.00	0.00	0
10/29/09	7:45a	61.0	61.0	60.9	82	55.5	4.0	NNW	1.00	10.0	NW	61.0	61.1	61.1	59.8	30.199	0.00	0.00	10
10/29/09	8:00a	61.1	61.2	60.9	83	55.9	4.0	NNW	1.00	9.0	NW	61.1	61.2	61.2	60.2	30.204	0.00	0.00	18
10/29/09	8:15a	61.4	61.4	61.1	80	55.2	5.0	N	1.25	12.0	NNE	61.4	61.5	61.5	60.9	30.212	0.00	0.00	27
10/29/09	8:30a	61.5	61.5	61.4	78	54.6	6.0	N	1.50	13.0	NW	61.4	61.5	61.4	60.8	30.220	0.00	0.00	30
10/29/09	8:45a	61.6	61.6	61.5	80	55.4	5.0	N	1.25	12.0	NNE	61.6	61.7	61.7	61.3	30.231	0.00	0.00	37
10/29/09	9:00a	61.0	61.6	61.0	82	55.5	6.0	NE	1.50	12.0	NE	60.8	61.1	60.9	61.4	30.241	0.00	0.00	61
10/29/09	9:15a	60.4	60.9	60.4	82	54.9	7.0	NE	1.75	12.0	ENE	59.7	60.4	59.7	60.0	30.244	0.00	0.00	61
10/29/09	9:30a	60.7	60.7	60.4	81	54.8	7.0	NNE	1.75	14.0	NNW	60.0	60.7	60.0	63.5	30.245	0.00	0.00	161
10/29/09	9:45a	61.3	61.3	60.7	77	54.0	7.0	N	1.75	13.0	N	60.8	61.2	60.7	67.2	30.248	0.00	0.00	285
10/29/09	10:00a	61.1	61.4	61.1	77	53.8	8.0	NE	2.00	15.0	NNE	59.8	60.9	59.6	64.0	30.252	0.00	0.00	216
10/29/09	10:15a	60.8	61.1	60.8	80	54.6	6.0	N	1.50	14.0	NNE	60.6	60.8	60.6	63.2	30.257	0.00	0.00	146
10/29/09	10:30a	60.6	60.8	60.5	80	54.4	5.0	N	1.25	10.0	N	60.6	60.6	60.6	61.9	30.265	0.00	0.00	106
10/29/09	10:45a	61.0	61.0	60.6	80	54.8	3.0	N	0.75	6.0	NNW	61.0	61.0	61.0	62.3	30.268	0.00	0.00	110
10/29/09	11:00a	61.2	61.2	61.0	81	55.3	4.0	N	1.00	9.0	NNE	61.2	61.3	61.3	62.3	30.269	0.00	0.00	98
10/29/09	11:15a	61.0	61.2	60.9	81	55.1	6.0	N	1.50	9.0	N	60.8	61.0	60.8	62.2	30.275	0.00	0.00	117
10/29/09	11:30a	61.0	61.0	60.9	81	55.1	5.0	NNW	1.25	10.0	NNW	61.0	61.0	61.0	62.4	30.278	0.00	0.00	116
10/29/09	11:45a	60.9	61.1	60.9	81	55.0	5.0	N	1.25	10.0	NNW	60.9	60.9	60.9	62.0	30.278	0.00	0.00	108
10/29/09	12:00p	60.7	61.0	60.6	82	55.2	5.0	N	1.25	10.0	NNW	60.7	60.8	60.8	61.3	30.278	0.00	0.00	84
10/29/09	12:15p	60.5	60.7	60.5	83	55.3	5.0	NNW	1.25	10.0	N	60.5	60.6	60.6	62.3	30.269	0.00	0.00	131
10/29/09	12:30p	60.4	60.5	60.4	83	55.2	6.0	NNW	1.50	10.0	NW	60.1	60.5	60.2	61.1	30.273	0.00	0.00	99
10/29/09	12:45p	60.4	60.4	60.4	82	54.9	5.0	N	1.25	9.0	N	60.4	60.4	60.4	61.2	30.268	0.00	0.00	97
10/29/09	1:00p	60.5	60.5	60.4	83	55.3	4.0	N	1.00	10.0	NNW	60.5	60.6	60.6	61.5	30.261	0.00	0.00	98
10/29/09	1:15p	60.7	60.7	60.5	82	55.2	4.0	NNW	1.00	8.0	N	60.7	60.8	60.8	62.5	30.255	0.00	0.00	125

SJCA Site 21 10/29/09

Date	Time	Temp Out	Hi Temp	Low Temp	Out Hum	Dew Pt.	Wind Speed	Wind Dir	Wind Run	Hi Speed	Hi Dir	Wind Chill	Heat Index	THW Index	THSW Index	Bar	Rain	Rain Rate	Solar Rad.
10/29/09	1:30p	60.9	60.9	60.7	82	55.4	4.0	N	1.00	8.0	NNE	60.9	61.0	61.0	62.4	30.254	0.00	0.00	115
10/29/09	1:45p	60.7	60.9	60.7	82	55.2	5.0	N	1.25	10.0	N	60.7	60.8	60.8	62.0	30.258	0.00	0.00	105
10/29/09	2:00p	60.4	60.7	60.4	83	55.2	5.0	NNW	1.25	10.0	NNW	60.4	60.5	60.5	62.3	30.262	0.00	0.00	122
10/29/09	2:15p	60.4	60.5	60.3	83	55.2	5.0	NNW	1.25	11.0	N	60.4	60.5	60.5	61.5	30.264	0.00	0.00	94
10/29/09	2:30p	60.7	60.7	60.4	82	55.2	4.0	N	1.00	8.0	NNW	60.7	60.8	60.8	61.5	30.252	0.00	0.00	80
10/29/09	2:45p	60.1	60.7	60.1	84	55.2	6.0	N	1.50	13.0	N	59.7	60.2	59.8	60.1	30.253	0.00	0.00	66
10/29/09	3:00p	60.4	60.4	60.1	83	55.2	4.0	N	1.00	9.0	N	60.4	60.5	60.5	61.4	30.250	0.00	0.00	81
10/29/09	3:15p	60.6	60.6	60.4	82	55.1	3.0	N	0.75	8.0	N	60.6	60.6	60.6	61.2	30.248	0.00	0.00	69
10/29/09	3:30p	60.6	60.8	60.6	82	55.1	4.0	N	1.00	9.0	NW	60.6	60.6	60.6	60.7	30.253	0.00	0.00	51
10/29/09	3:45p	60.6	60.6	60.5	81	54.7	5.0	N	1.25	9.0	N	60.6	60.6	60.6	60.7	30.260	0.00	0.00	49
10/29/09	4:00p	60.8	60.8	60.6	80	54.6	5.0	N	1.25	11.0	NW	60.8	60.8	60.8	61.1	30.264	0.00	0.00	51
10/29/09	4:15p	60.8	60.9	60.8	80	54.6	5.0	NNW	1.25	12.0	N	60.8	60.8	60.8	61.1	30.268	0.00	0.00	48
10/29/09	4:30p	60.4	60.8	60.4	82	54.9	5.0	N	1.25	10.0	NE	60.4	60.4	60.4	60.4	30.263	0.00	0.00	39
10/29/09	4:45p	60.1	60.4	60.1	83	54.9	5.0	N	1.25	9.0	NNE	60.1	60.1	60.1	60.2	30.266	0.00	0.00	40
10/29/09	5:00p	59.8	60.1	59.7	84	55.0	4.0	N	1.00	10.0	NE	59.8	59.8	59.8	59.3	30.264	0.00	0.00	25
10/29/09	5:15p	59.7	59.8	59.7	83	54.5	5.0	N	1.25	10.0	N	59.6	59.7	59.6	57.8	30.269	0.00	0.00	21
10/29/09	5:30p	59.9	59.9	59.8	83	54.7	3.0	NNE	0.75	10.0	NNW	59.9	59.9	59.9	58.1	30.271	0.00	0.00	19
10/29/09	5:45p	59.8	60.0	59.8	83	54.6	4.0	N	1.00	9.0	NNW	59.8	59.8	59.8	57.8	30.269	0.00	0.00	13
10/29/09	6:00p	59.6	59.9	59.6	84	54.8	5.0	NNE	1.25	11.0	NNE	59.5	59.6	59.5	57.3	30.266	0.00	0.00	2
10/29/09	6:15p	59.1	59.6	59.1	85	54.6	4.0	N	1.00	9.0	NNW	59.1	59.1	59.1	56.8	30.274	0.00	0.00	0
10/29/09	6:30p	59.4	59.4	59.1	83	54.2	5.0	N	1.25	9.0	N	59.3	59.4	59.3	57.0	30.276	0.00	0.00	0
10/29/09	6:45p	59.5	59.6	59.4	83	54.3	4.0	N	1.00	10.0	NE	59.5	59.5	59.5	57.2	30.284	0.00	0.00	0
10/29/09	7:00p	59.1	59.5	59.1	85	54.6	5.0	N	1.25	12.0	NE	58.9	59.1	58.9	56.6	30.290	0.00	0.00	0
10/29/09	7:15p	59.0	59.1	59.0	84	54.2	4.0	N	1.00	11.0	N	59.0	59.0	59.0	56.7	30.291	0.00	0.00	0
10/29/09	7:30p	59.1	59.1	59.0	84	54.3	5.0	NE	1.25	11.0	NNE	58.9	59.1	58.9	56.6	30.288	0.00	0.00	0
10/29/09	7:45p	59.3	59.3	59.1	83	54.1	5.0	NE	1.25	12.0	ENE	59.2	59.2	59.1	56.8	30.291	0.00	0.00	0
10/29/09	8:00p	59.1	59.3	59.1	82	53.6	6.0	NNE	1.50	12.0	N	58.5	59.0	58.4	56.1	30.293	0.00	0.00	0
10/29/09	8:15p	59.1	59.1	59.0	82	53.6	5.0	NNE	1.25	11.0	NNE	58.9	59.0	58.8	56.5	30.298	0.00	0.00	0
10/29/09	8:30p	59.1	59.2	59.1	81	53.3	4.0	N	1.00	10.0	NNE	59.1	58.9	58.9	56.6	30.300	0.00	0.00	0
10/29/09	8:45p	59.1	59.2	59.1	81	53.3	5.0	NE	1.25	10.0	N	58.9	58.9	58.7	56.4	30.301	0.00	0.00	0
10/29/09	9:00p	59.0	59.2	59.0	81	53.2	5.0	NNE	1.25	11.0	NNE	58.8	58.8	58.6	56.3	30.303	0.00	0.00	0
10/29/09	9:15p	58.8	59.0	58.8	82	53.3	6.0	N	1.50	13.0	NNE	58.2	58.7	58.1	55.8	30.306	0.00	0.00	0
10/29/09	9:30p	58.7	58.8	58.6	81	52.9	7.0	NNE	1.75	14.0	ENE	57.6	58.5	57.4	55.0	30.309	0.00	0.00	0
10/29/09	9:45p	58.6	58.7	58.6	80	52.4	6.0	NE	1.50	14.0	ENE	57.9	58.4	57.7	55.3	30.311	0.00	0.00	0
10/29/09	10:00p	58.6	58.6	58.5	81	52.8	5.0	NE	1.25	13.0	ENE	58.3	58.4	58.1	55.7	30.315	0.00	0.00	0
10/29/09	10:15p	58.5	58.6	58.5	79	52.0	5.0	NNE	1.25	12.0	NE	58.2	58.2	57.9	55.5	30.315	0.00	0.00	0
10/29/09	10:30p	58.4	58.5	58.4	80	52.3	5.0	ENE	1.25	13.0	NE	58.1	58.2	57.9	55.5	30.313	0.00	0.00	0
10/29/09	10:45p	58.3	58.4	58.3	81	52.5	3.0	NNE	0.75	9.0	N	58.3	58.1	58.1	55.7	30.308	0.00	0.00	0
10/29/09	11:00p	58.3	58.4	58.3	80	52.2	5.0	NE	1.25	12.0	E	58.0	58.1	57.8	55.4	30.306	0.00	0.00	0
10/29/09	11:15p	58.3	58.4	58.2	80	52.2	4.0	N	1.00	9.0	ENE	58.3	58.1	58.1	55.7	30.301	0.00	0.00	0
10/29/09	11:30p	58.3	58.3	58.2	79	51.8	4.0	NNE	1.00	9.0	NE	58.3	58.0	58.0	55.6	30.296	0.00	0.00	0
10/29/09	11:45p	58.2	58.3	58.2	80	52.1	4.0	NNE	1.00	10.0	N	58.2	58.0	58.0	55.6	30.292	0.00	0.00	0
10/30/09	12:00a	58.3	58.3	58.2	81	52.5	4.0	NNE	1.00	10.0	NE	58.3	58.1	58.1	55.7	30.293	0.00	0.00	0

SJCA Site 21 10/30/09

Date	Time	Temp Out	Hi Temp	Low Temp	Out Hum	Dew Pt.	Wind Speed	Wind Dir	Wind Run	Hi Speed	Hi Dir	Wind Chill	Heat Index	THW Index	THSW Index	Bar	Rain	Rain Rate	Solar Rad.
10/30/09	12:15a	58.2	58.3	58.2	79	51.7	5.0	ENE	1.25	12.0	ENE	57.8	57.9	57.5	55.1	30.293	0.00	0.00	0
10/30/09	12:30a	58.1	58.2	58.1	78	51.3	4.0	NE	1.00	10.0	N	58.1	57.8	57.8	55.4	30.294	0.00	0.00	0
10/30/09	12:45a	58.0	58.1	58.0	79	51.5	4.0	NE	1.00	9.0	NE	58.0	57.7	57.7	55.3	30.291	0.00	0.00	0
10/30/09	1:00a	57.9	58.0	57.9	78	51.1	4.0	NNE	1.00	10.0	NNW	57.9	57.6	57.6	55.2	30.291	0.00	0.00	0
10/30/09	1:15a	57.9	57.9	57.8	79	51.4	3.0	NNE	0.75	8.0	NNE	57.9	57.6	57.6	55.2	30.292	0.00	0.00	0
10/30/09	1:30a	57.8	57.9	57.8	78	51.0	3.0	N	0.75	9.0	N	57.8	57.5	57.5	55.1	30.287	0.00	0.00	0
10/30/09	1:45a	57.5	57.8	57.5	78	50.7	4.0	N	1.00	10.0	NE	57.5	57.2	57.2	54.8	30.284	0.00	0.00	0
10/30/09	2:00a	57.0	57.5	57.0	79	50.5	2.0	N	0.50	5.0	N	57.0	56.7	56.7	54.3	30.274	0.00	0.00	0
10/30/09	2:15a	56.8	57.0	56.7	81	51.0	1.0	N	0.25	4.0	N	56.8	56.5	56.5	54.1	30.273	0.00	0.00	0
10/30/09	2:30a	57.0	57.0	56.8	81	51.2	2.0	N	0.50	6.0	NNE	57.0	56.7	56.7	54.3	30.267	0.00	0.00	0
10/30/09	2:45a	57.2	57.2	57.0	82	51.8	2.0	NNW	0.50	7.0	NNW	57.2	57.0	57.0	54.6	30.269	0.00	0.00	0
10/30/09	3:00a	57.3	57.3	57.2	82	51.9	2.0	NNW	0.50	8.0	NW	57.3	57.1	57.1	54.7	30.261	0.00	0.00	0
10/30/09	3:15a	57.5	57.5	57.3	82	52.0	2.0	N	0.50	6.0	NW	57.5	57.3	57.3	54.9	30.266	0.00	0.00	0
10/30/09	3:30a	57.5	57.6	57.5	82	52.0	2.0	NNW	0.50	7.0	N	57.5	57.3	57.3	54.9	30.259	0.00	0.00	0
10/30/09	3:45a	57.6	57.6	57.6	82	52.1	2.0	NNW	0.50	5.0	NNW	57.6	57.4	57.4	55.0	30.254	0.00	0.00	0
10/30/09	4:00a	57.7	57.7	57.6	83	52.6	2.0	NNW	0.50	7.0	NNW	57.7	57.5	57.5	55.1	30.255	0.00	0.00	0
10/30/09	4:15a	57.9	58.0	57.7	83	52.8	3.0	NNW	0.75	7.0	N	57.9	57.8	57.8	55.4	30.257	0.00	0.00	0
10/30/09	4:30a	58.1	58.1	57.9	83	53.0	4.0	N	1.00	11.0	NW	58.1	58.0	58.0	55.6	30.266	0.00	0.00	0
10/30/09	4:45a	58.0	58.1	58.0	83	52.9	3.0	N	0.75	9.0	N	58.0	57.9	57.9	55.5	30.262	0.00	0.00	0
10/30/09	5:00a	57.9	58.0	57.9	83	52.8	4.0	NNW	1.00	8.0	NNW	57.9	57.8	57.8	55.4	30.268	0.00	0.00	0
10/30/09	5:15a	58.0	58.0	57.9	83	52.9	4.0	NNW	1.00	8.0	NW	58.0	57.9	57.9	55.5	30.274	0.00	0.00	0
10/30/09	5:30a	58.0	58.0	57.9	83	52.9	4.0	NNW	1.00	8.0	NNW	58.0	57.9	57.9	55.5	30.279	0.00	0.00	0
10/30/09	5:45a	58.0	58.0	57.9	83	52.9	4.0	N	1.00	8.0	NNW	58.0	57.9	57.9	55.5	30.274	0.00	0.00	0
10/30/09	6:00a	57.9	58.0	57.9	84	53.1	4.0	NNW	1.00	11.0	NNW	57.9	57.8	57.8	55.5	30.276	0.00	0.00	0
10/30/09	6:15a	57.9	57.9	57.9	84	53.1	3.0	NNW	0.75	7.0	NW	57.9	57.8	57.8	55.5	30.281	0.00	0.00	0
10/30/09	6:30a	57.8	57.9	57.8	84	53.0	3.0	N	0.75	6.0	NNW	57.8	57.7	57.7	55.3	30.282	0.00	0.00	0
10/30/09	6:45a	57.8	57.8	57.8	84	53.0	2.0	NW	0.50	6.0	NW	57.8	57.7	57.7	55.3	30.280	0.00	0.00	0
10/30/09	7:00a	57.9	57.9	57.8	84	53.1	4.0	NNW	1.00	10.0	NNW	57.9	57.8	57.8	55.5	30.278	0.00	0.00	0
10/30/09	7:15a	58.0	58.0	57.9	84	53.2	5.0	NNW	1.25	12.0	N	57.6	57.9	57.5	55.2	30.285	0.00	0.00	0
10/30/09	7:30a	58.0	58.0	58.0	84	53.2	4.0	NNW	1.00	9.0	NW	58.0	57.9	57.9	55.6	30.285	0.00	0.00	1
10/30/09	7:45a	57.9	58.0	57.8	84	53.1	3.0	NNW	0.75	8.0	NNE	57.9	57.8	57.8	56.6	30.283	0.00	0.00	14
10/30/09	8:00a	57.8	57.8	57.8	85	53.3	4.0	NNW	1.00	8.0	N	57.8	57.7	57.7	57.1	30.287	0.00	0.00	27
10/30/09	8:15a	58.1	58.1	57.8	84	53.3	4.0	N	1.00	9.0	NNW	58.1	58.0	58.0	58.1	30.286	0.00	0.00	44
10/30/09	8:30a	58.4	58.4	58.1	84	53.6	4.0	N	1.00	10.0	NNW	58.4	58.3	58.3	59.9	30.291	0.00	0.00	83
10/30/09	8:45a	58.9	58.9	58.4	83	53.7	4.0	N	1.00	9.0	NNW	58.9	58.8	58.8	62.7	30.294	0.00	0.00	152
10/30/09	9:00a	59.1	59.1	58.9	84	54.3	4.0	NNW	1.00	8.0	NW	59.1	59.1	59.1	61.9	30.300	0.00	0.00	127

SJCA Site 21 10/24/09

Date	Time	Solar Energy	Hi Solar Rad.	UV Index	UV Dose	Hi UV	Heat D-D	Cool D-D	In Temp	In Hum	In Dew	In Heat	ET	Wind Samp	Wind Tx	ISS Recept	Arc. Int.
10/24/09	11:04a	---	---	---	---	---	---	---	---	---	---	---	0.000	0	1	0.0	1
10/24/09	11:05a	---	---	---	---	---	0.000	0.007	77.2	64	64.1	78.4	0.000	7	1	30.4	1
10/24/09	11:06a	---	---	---	---	---	---	---	---	---	---	---	0.000	13	1	56.5	1
10/24/09	11:07a	0.01	5	0.0	0.00	0.0	0.000	0.007	77.3	65	64.6	78.6	0.000	19	1	82.6	1
10/24/09	11:08a	0.00	0	0.0	0.00	0.0	0.000	0.007	77.3	65	64.6	78.6	0.000	23	1	100.0	1
10/24/09	11:09a	0.00	0	0.0	0.00	0.0	0.000	0.007	77.3	65	64.6	78.6	0.000	23	1	100.0	1
10/24/09	11:10a	0.00	0	0.0	0.00	0.0	0.000	0.007	77.3	64	64.2	78.5	0.000	22	1	95.7	1
10/24/09	11:11a	0.00	0	0.0	0.00	0.0	0.000	0.007	77.3	64	64.2	78.5	0.000	23	1	100.0	1
10/24/09	11:12a	0.00	0	0.0	0.00	0.0	0.000	0.007	77.2	64	64.1	78.4	0.000	23	1	100.0	1
10/24/09	11:13a	0.00	0	0.0	0.00	0.0	0.000	0.007	77.2	65	64.5	78.5	0.000	22	1	95.7	1
10/24/09	11:14a	0.00	0	0.0	0.00	0.0	0.000	0.007	77.2	65	64.5	78.5	0.000	23	1	100.0	1
10/24/09	11:15a	0.00	0	0.0	0.00	0.0	0.000	0.007	77.2	65	64.5	78.5	0.000	22	1	95.7	1
10/24/09	11:16a	0.00	0	0.0	0.00	0.0	0.000	0.007	77.2	65	64.5	78.5	0.000	24	1	100.0	1
10/24/09	11:17a	0.00	0	0.0	0.00	0.0	0.000	0.007	77.0	65	64.3	78.3	0.000	22	1	95.7	1
10/24/09	11:18a	0.00	0	0.0	0.00	0.0	0.000	0.007	77.0	65	64.3	78.3	0.000	23	1	100.0	1
10/24/09	11:19a	0.00	0	0.0	0.00	0.0	0.000	0.007	77.0	65	64.3	78.3	0.000	24	1	100.0	1
10/24/09	11:20a	0.00	0	0.0	0.00	0.0	0.000	0.007	76.8	66	64.6	78.2	0.000	23	1	100.0	1
10/24/09	11:21a	0.00	0	0.0	0.00	0.0	0.000	0.007	76.8	66	64.6	78.2	0.000	24	1	100.0	1
10/24/09	11:22a	0.00	0	0.0	0.00	0.0	0.000	0.007	76.6	66	64.4	78.0	0.000	23	1	100.0	1
10/24/09	11:23a	0.00	0	0.0	0.00	0.0	0.000	0.007	76.6	66	64.4	78.0	0.000	23	1	100.0	1
10/24/09	11:24a	0.00	0	0.0	0.00	0.0	0.000	0.007	76.6	66	64.4	78.0	0.000	24	1	100.0	1
10/24/09	11:25a	0.00	0	0.0	0.00	0.0	0.000	0.007	76.4	67	64.6	77.9	0.000	23	1	100.0	1
10/24/09	11:26a	0.00	0	0.0	0.00	0.0	0.000	0.007	76.4	67	64.6	77.9	0.000	24	1	100.0	1
10/24/09	11:27a	0.00	0	0.0	0.00	0.0	0.000	0.007	76.4	66	64.2	77.8	0.000	23	1	100.0	1
10/24/09	11:28a	0.00	0	0.0	0.00	0.0	0.000	0.007	76.3	67	64.5	77.8	0.000	24	1	100.0	1
10/24/09	11:29a	0.00	0	0.0	0.00	0.0	0.000	0.007	76.3	67	64.5	77.8	0.000	23	1	100.0	1
10/24/09	11:30a	0.00	0	0.0	0.00	0.0	0.000	0.007	76.3	67	64.5	77.8	0.000	22	1	95.7	1
10/24/09	11:31a	0.00	0	0.0	0.00	0.0	0.000	0.007	76.3	68	65.0	77.9	0.000	23	1	100.0	1
10/24/09	11:32a	0.00	0	0.0	0.00	0.0	0.000	0.007	76.1	67	64.3	77.5	0.000	23	1	100.0	1
10/24/09	11:33a	0.00	0	0.0	0.00	0.0	0.000	0.007	76.1	68	64.8	77.7	0.000	24	1	100.0	1
10/24/09	11:34a	0.00	0	0.0	0.00	0.0	0.000	0.007	76.1	68	64.8	77.7	0.000	23	1	100.0	1
10/24/09	11:35a	0.00	0	0.0	0.00	0.0	0.000	0.007	76.1	68	64.8	77.7	0.000	23	1	100.0	1
10/24/09	11:36a	0.00	0	0.0	0.00	0.0	0.000	0.007	76.1	68	64.8	77.7	0.000	24	1	100.0	1
10/24/09	11:37a	0.00	0	0.0	0.00	0.0	0.000	0.007	76.1	68	64.8	77.7	0.000	23	1	100.0	1
10/24/09	11:38a	0.00	0	0.0	0.00	0.0	0.000	0.007	75.9	68	64.6	77.5	0.000	24	1	100.0	1
10/24/09	11:39a	0.00	0	0.0	0.00	0.0	0.000	0.007	75.9	68	64.6	77.5	0.000	22	1	95.7	1
10/24/09	11:40a	0.00	0	0.0	0.00	0.0	0.000	0.007	75.9	69	65.0	77.6	0.000	24	1	100.0	1
10/24/09	11:41a	0.00	0	0.0	0.00	0.0	0.000	0.007	75.9	69	65.0	77.6	0.000	23	1	100.0	1
10/24/09	11:42a	0.00	0	0.0	0.00	0.0	0.000	0.007	75.9	69	65.0	77.6	0.000	23	1	100.0	1
10/24/09	11:43a	0.00	0	0.0	0.00	0.0	0.000	0.007	75.9	69	65.0	77.6	0.000	24	1	100.0	1
10/24/09	11:44a	0.00	0	0.0	0.00	0.0	0.000	0.007	75.9	69	65.0	77.6	0.000	22	1	95.7	1
10/24/09	11:45a	0.00	0	0.0	0.00	0.0	0.000	0.007	75.9	69	65.0	77.6	0.000	24	1	100.0	1
10/24/09	11:46a	0.00	0	0.0	0.00	0.0	0.000	0.007	75.9	69	65.0	77.6	0.000	22	1	95.7	1
10/24/09	11:47a	0.00	0	0.0	0.00	0.0	0.000	0.007	75.9	69	65.0	77.6	0.000	23	1	100.0	1
10/24/09	11:48a	0.00	0	0.0	0.00	0.0	0.000	0.007	75.9	69	65.0	77.6	0.000	24	1	100.0	1
10/24/09	11:49a	0.00	0	0.0	0.00	0.0	0.000	0.007	75.9	69	65.0	77.6	0.000	23	1	100.0	1
10/24/09	11:50a	0.00	0	0.0	0.00	0.0	0.000	0.007	75.9	69	65.0	77.6	0.000	24	1	100.0	1
10/24/09	11:51a	0.00	0	0.0	0.00	0.0	0.000	0.007	75.9	69	65.0	77.6	0.000	23	1	100.0	1
10/24/09	11:52a	0.00	0	0.0	0.00	0.0	0.000	0.007	75.9	69	65.0	77.6	0.000	24	1	100.0	1
10/24/09	11:53a	0.00	0	0.0	0.00	0.0	0.000	0.007	75.9	69	65.0	77.6	0.000	23	1	100.0	1
10/24/09	11:54a	0.00	0	0.0	0.00	0.0	0.000	0.007	75.7	69	64.8	77.4	0.000	23	1	100.0	1
10/24/09	11:55a	0.00	0	0.0	0.00	0.0	0.000	0.007	75.7	70	65.2	77.5	0.000	24	1	100.0	1
10/24/09	11:56a	0.00	0	0.0	0.00	0.0	0.000	0.007	75.7	69	64.8	77.4	0.000	23	1	100.0	1

SJCA Site 21 10/24/09

Date	Time	Solar Energy	Hi Solar Rad.	UV Index	UV Dose	Hi UV	Heat D-D	Cool D-D	In Temp	In Hum	In Dew	In Heat	ET	Wind Samp	Wind Tx	ISS Recept	Arc. Int.
10/24/09	11:57a	0.00	0	0.0	0.00	0.0	0.000	0.007	75.7	70	65.2	77.5	0.000	24	1	100.0	1
10/24/09	11:58a	0.00	0	0.0	0.00	0.0	0.000	0.007	75.7	70	65.2	77.5	0.000	22	1	95.7	1
10/24/09	11:59a	0.00	0	0.0	0.00	0.0	0.000	0.007	75.7	70	65.2	77.5	0.000	23	1	100.0	1
10/24/09	12:00p	0.00	0	0.0	0.00	0.0	0.000	0.007	75.7	70	65.2	77.5	0.000	23	1	100.0	1
10/24/09	12:01p	0.00	0	0.0	0.00	0.0	0.000	0.007	75.7	70	65.2	77.5	0.000	23	1	100.0	1
10/24/09	12:02p	0.00	0	0.0	0.00	0.0	0.000	0.007	75.9	70	65.4	77.7	0.000	23	1	100.0	1
10/24/09	12:11p	0.00	0	0.0	0.00	0.0	---	---	76.1	71	66.0	78.0	0.000	0	1	0.0	15
10/24/09	12:15p	0.00	0	0.0	0.00	0.0	0.000	0.101	77.5	68	66.1	79.2	0.000	42	1	12.3	15
10/24/09	12:30p	2.88	186	0.8	0.06	2.3	0.000	0.153	77.2	68	65.8	78.9	0.000	221	1	64.6	15
10/24/09	12:45p	2.60	137	1.0	0.08	1.0	0.000	0.182	77.0	69	66.0	78.8	0.000	171	1	50.0	15
10/24/09	1:00p	3.12	153	1.0	0.08	1.0	0.000	0.201	76.8	69	65.9	78.6	0.003	173	1	50.6	15
10/24/09	1:15p	3.33	216	0.9	0.07	1.0	0.000	0.199	77.0	70	66.5	78.9	0.000	159	1	46.5	15
10/24/09	1:30p	5.16	336	1.0	0.08	1.6	0.000	0.200	77.0	70	66.5	78.9	0.000	161	1	47.1	15
10/24/09	1:45p	12.06	714	3.9	0.31	4.9	0.000	0.194	77.2	70	66.7	79.1	0.000	282	1	82.5	15
10/24/09	2:00p	8.30	759	3.2	0.26	5.1	0.000	0.188	77.5	70	66.9	79.5	0.011	341	1	99.7	15
10/24/09	2:15p	6.90	538	2.6	0.21	3.8	0.000	0.181	77.2	70	66.7	79.1	0.000	338	1	98.8	15
10/24/09	2:30p	8.26	534	2.9	0.23	3.5	0.000	0.182	77.0	70	66.5	78.9	0.000	346	1	100.0	15
10/24/09	2:45p	6.09	369	2.2	0.18	2.7	0.000	0.181	77.0	70	66.5	78.9	0.000	344	1	100.0	15
10/24/09	3:00p	7.57	573	2.3	0.18	3.0	0.000	0.184	76.8	70	66.3	78.7	0.011	340	1	99.4	15
10/24/09	3:15p	5.18	290	1.6	0.13	2.1	0.000	0.180	76.6	70	66.1	78.5	0.000	342	1	100.0	15
10/24/09	3:30p	5.07	295	1.3	0.10	1.5	0.000	0.182	76.4	70	65.9	78.2	0.000	341	1	99.7	15
10/24/09	3:45p	6.86	603	1.4	0.11	1.9	0.000	0.182	76.3	70	65.8	78.1	0.000	340	1	99.4	15
10/24/09	4:00p	10.19	591	1.4	0.11	1.8	0.000	0.185	76.1	70	65.6	77.9	0.011	338	1	98.8	15
10/24/09	4:15p	5.10	436	0.8	0.06	1.2	0.000	0.178	75.9	70	65.4	77.7	0.000	339	1	99.1	15
10/24/09	4:30p	3.20	237	0.3	0.02	0.5	0.000	0.173	75.9	70	65.4	77.7	0.000	341	1	99.7	15
10/24/09	4:45p	4.90	425	0.0	0.00	0.0	0.000	0.174	75.7	70	65.2	77.5	0.000	334	1	97.7	15
10/24/09	5:00p	2.58	183	0.0	0.00	0.0	0.000	0.171	75.7	70	65.2	77.5	0.007	339	1	99.1	15
10/24/09	5:15p	1.18	72	0.0	0.00	0.0	0.000	0.162	75.6	70	65.1	77.4	0.000	343	1	100.0	15
10/24/09	5:30p	0.88	74	0.0	0.00	0.0	0.000	0.156	75.6	70	65.1	77.4	0.000	345	1	100.0	15
10/24/09	5:45p	0.97	56	0.0	0.00	0.0	0.000	0.150	75.4	70	64.9	77.1	0.000	342	1	100.0	15
10/24/09	6:00p	0.52	28	0.0	0.00	0.0	0.000	0.143	75.4	70	64.9	77.1	0.003	346	1	100.0	15
10/24/09	6:15p	0.22	21	0.0	0.00	0.0	0.000	0.136	75.4	70	64.9	77.1	0.000	342	1	100.0	15
10/24/09	6:30p	0.00	0	0.0	0.00	0.0	0.000	0.130	75.2	70	64.7	76.9	0.000	343	1	100.0	15
10/24/09	6:45p	0.00	0	0.0	0.00	0.0	0.000	0.124	75.2	70	64.7	76.9	0.000	341	1	99.7	15
10/24/09	7:00p	0.00	0	0.0	0.00	0.0	0.000	0.119	75.2	70	64.7	76.9	0.001	342	1	100.0	15
10/24/09	7:15p	0.00	0	0.0	0.00	0.0	0.000	0.115	75.0	70	64.5	76.7	0.000	341	1	99.7	15
10/24/09	7:30p	0.00	0	0.0	0.00	0.0	0.000	0.110	75.0	70	64.5	76.7	0.000	343	1	100.0	15
10/24/09	7:45p	0.00	0	0.0	0.00	0.0	0.000	0.108	74.9	70	64.5	76.6	0.000	343	1	100.0	15
10/24/09	8:00p	0.00	0	0.0	0.00	0.0	0.000	0.106	74.9	70	64.5	76.6	0.001	342	1	100.0	15
10/24/09	8:15p	0.00	0	0.0	0.00	0.0	0.000	0.105	74.9	70	64.5	76.6	0.000	342	1	100.0	15
10/24/09	8:30p	0.00	0	0.0	0.00	0.0	0.000	0.103	74.9	70	64.5	76.6	0.000	342	1	100.0	15
10/24/09	8:45p	0.00	0	0.0	0.00	0.0	0.000	0.101	74.7	70	64.3	76.4	0.000	343	1	100.0	15
10/24/09	9:00p	0.00	0	0.0	0.00	0.0	0.000	0.100	74.7	70	64.3	76.4	0.001	342	1	100.0	15
10/24/09	9:15p	0.00	0	0.0	0.00	0.0	0.000	0.099	74.7	70	64.3	76.4	0.000	339	1	99.1	15
10/24/09	9:30p	0.00	0	0.0	0.00	0.0	0.000	0.098	74.5	70	64.1	76.1	0.000	342	1	100.0	15
10/24/09	9:45p	0.00	0	0.0	0.00	0.0	0.000	0.097	74.5	70	64.1	76.1	0.000	344	1	100.0	15
10/24/09	10:00p	0.00	0	0.0	0.00	0.0	0.000	0.098	74.5	70	64.1	76.1	0.001	341	1	99.7	15
10/24/09	10:15p	0.00	0	0.0	0.00	0.0	0.000	0.098	74.3	70	63.9	75.9	0.000	343	1	100.0	15
10/24/09	10:30p	0.00	0	0.0	0.00	0.0	0.000	0.088	74.3	70	63.9	75.9	0.000	347	1	100.0	15
10/24/09	10:45p	0.00	0	0.0	0.00	0.0	0.000	0.080	74.3	71	64.3	76.0	0.000	343	1	100.0	15
10/24/09	11:00p	0.00	0	0.0	0.00	0.0	0.000	0.076	74.3	70	63.9	75.9	0.001	344	1	100.0	15
10/24/09	11:15p	0.00	0	0.0	0.00	0.0	0.000	0.073	74.2	71	64.2	75.9	0.000	345	1	100.0	15
10/24/09	11:30p	0.00	0	0.0	0.00	0.0	0.000	0.070	74.2	71	64.2	75.9	0.000	344	1	100.0	15

SJCA Site 21 10/24/09

Date	Time	Solar Energy	Hi Solar Rad.	UV Index	UV Dose	Hi UV	Heat D-D	Cool D-D	In Temp	In Hum	In Dew	In Heat	ET	Wind Samp	Wind Tx	ISS Recept	Arc. Int.
10/24/09	11:45p	0.00	0	0.0	0.00	0.0	0.000	0.066	74.2	71	64.2	75.9	0.000	346	1	100.0	15
10/25/09	12:00a	0.00	0	0.0	0.00	0.0	0.000	0.063	74.2	71	64.2	75.9	0.001	346	1	100.0	15

SJCA Site 21 10/25/09

Date	Time	Solar Energy	Hi Solar Rad.	UV Index	UV Dose	Hi UV	Heat D-D	Cool D-D	In Temp	In Hum	In Dew	In Heat	ET	Wind Samp	Wind Tx	ISS Recept	Arc. Int.
10/25/09	12:15a	0.00	0	0.0	0.00	0.0	0.000	0.058	74.0	71	64.0	75.7	0.000	340	1	99.4	15
10/25/09	12:30a	0.00	0	0.0	0.00	0.0	0.000	0.055	74.0	71	64.0	75.7	0.000	340	1	99.4	15
10/25/09	12:45a	0.00	0	0.0	0.00	0.0	0.000	0.051	74.0	71	64.0	75.7	0.000	342	1	100.0	15
10/25/09	1:00a	0.00	0	0.0	0.00	0.0	0.000	0.047	73.8	71	63.8	75.4	0.001	343	1	100.0	15
10/25/09	1:15a	0.00	0	0.0	0.00	0.0	0.000	0.045	73.8	71	63.8	75.4	0.000	342	1	100.0	15
10/25/09	1:30a	0.00	0	0.0	0.00	0.0	0.000	0.040	73.8	71	63.8	75.4	0.000	343	1	100.0	15
10/25/09	1:45a	0.00	0	0.0	0.00	0.0	0.000	0.036	73.8	71	63.8	75.4	0.000	343	1	100.0	15
10/25/09	2:00a	0.00	0	0.0	0.00	0.0	0.000	0.031	73.8	71	63.8	75.4	0.001	345	1	100.0	15
10/25/09	2:15a	0.00	0	0.0	0.00	0.0	0.000	0.027	73.6	71	63.6	75.1	0.000	342	1	100.0	15
10/25/09	2:30a	0.00	0	0.0	0.00	0.0	0.000	0.025	73.6	71	63.6	75.1	0.000	343	1	100.0	15
10/25/09	2:45a	0.00	0	0.0	0.00	0.0	0.000	0.025	73.6	71	63.6	75.1	0.000	343	1	100.0	15
10/25/09	3:00a	0.00	0	0.0	0.00	0.0	0.000	0.023	73.5	71	63.5	74.9	0.001	341	1	99.7	15
10/25/09	3:15a	0.00	0	0.0	0.00	0.0	0.000	0.005	73.5	71	63.5	74.9	0.000	339	1	99.1	15
10/25/09	3:30a	0.00	0	0.0	0.00	0.0	0.010	0.000	73.5	71	63.5	74.9	0.000	340	1	99.4	15
10/25/09	3:45a	0.00	0	0.0	0.00	0.0	0.017	0.000	73.3	71	63.3	74.6	0.000	340	1	99.4	15
10/25/09	4:00a	0.00	0	0.0	0.00	0.0	0.018	0.000	73.1	71	63.1	74.3	0.002	341	1	99.7	15
10/25/09	4:15a	0.00	0	0.0	0.00	0.0	0.020	0.000	73.1	70	62.7	74.2	0.000	342	1	100.0	15
10/25/09	4:30a	0.00	0	0.0	0.00	0.0	0.024	0.000	73.0	70	62.6	74.1	0.000	342	1	100.0	15
10/25/09	4:45a	0.00	0	0.0	0.00	0.0	0.026	0.000	72.8	69	62.0	73.7	0.000	343	1	100.0	15
10/25/09	5:00a	0.00	0	0.0	0.00	0.0	0.030	0.000	72.8	69	62.0	73.7	0.003	341	1	99.7	15
10/25/09	5:15a	0.00	0	0.0	0.00	0.0	0.034	0.000	72.6	69	61.8	73.5	0.000	341	1	99.7	15
10/25/09	5:30a	0.00	0	0.0	0.00	0.0	0.039	0.000	72.4	68	61.2	73.1	0.000	341	1	99.7	15
10/25/09	5:45a	0.00	0	0.0	0.00	0.0	0.042	0.000	72.3	68	61.1	73.0	0.000	344	1	100.0	15
10/25/09	6:00a	0.00	0	0.0	0.00	0.0	0.047	0.000	72.3	68	61.1	73.0	0.003	339	1	99.1	15
10/25/09	6:15a	0.00	0	0.0	0.00	0.0	0.052	0.000	72.1	67	60.5	72.6	0.000	340	1	99.4	15
10/25/09	6:30a	0.00	0	0.0	0.00	0.0	0.054	0.000	71.9	67	60.3	72.3	0.000	343	1	100.0	15
10/25/09	6:45a	0.00	0	0.0	0.00	0.0	0.058	0.000	71.8	67	60.2	72.2	0.000	342	1	100.0	15
10/25/09	7:00a	0.00	0	0.0	0.00	0.0	0.061	0.000	71.6	64	58.8	71.7	0.002	343	1	100.0	15
10/25/09	7:15a	0.00	0	0.0	0.00	0.0	0.063	0.000	71.4	65	59.0	71.5	0.000	344	1	100.0	15
10/25/09	7:30a	0.04	9	0.0	0.00	0.0	0.063	0.000	71.4	65	59.0	71.5	0.000	338	1	98.8	15
10/25/09	7:45a	0.34	21	0.0	0.00	0.0	0.064	0.000	70.7	54	53.2	69.5	0.000	334	1	97.7	15
10/25/09	8:00a	0.75	49	0.0	0.00	0.0	0.058	0.000	70.4	53	52.4	69.1	0.002	343	1	100.0	15
10/25/09	8:15a	0.97	67	0.0	0.00	0.0	0.059	0.000	70.1	52	51.7	68.6	0.000	334	1	97.7	15
10/25/09	8:30a	1.78	102	0.0	0.00	0.0	0.058	0.000	70.1	54	52.7	68.7	0.000	347	1	100.0	15
10/25/09	8:45a	2.30	120	0.0	0.00	0.0	0.057	0.000	70.2	55	53.3	69.0	0.000	347	1	100.0	15
10/25/09	9:00a	3.44	257	0.0	0.00	0.0	0.053	0.000	70.4	56	54.0	69.3	0.005	348	1	100.0	15
10/25/09	9:15a	3.81	243	0.2	0.02	0.6	0.056	0.000	70.4	56	54.0	69.3	0.000	348	1	100.0	15
10/25/09	9:30a	6.79	448	0.7	0.06	0.9	0.050	0.000	70.4	56	54.0	69.3	0.000	348	1	100.0	15
10/25/09	9:45a	4.58	236	0.7	0.06	0.8	0.054	0.000	70.4	57	54.4	69.4	0.000	348	1	100.0	15
10/25/09	10:00a	4.26	207	0.9	0.07	0.9	0.059	0.000	70.4	57	54.4	69.4	0.008	349	1	100.0	15
10/25/09	10:15a	4.19	220	1.0	0.08	1.1	0.059	0.000	70.2	57	54.2	69.2	0.000	347	1	100.0	15
10/25/09	10:30a	5.78	341	1.3	0.10	1.5	0.063	0.000	70.2	57	54.2	69.2	0.000	348	1	100.0	15
10/25/09	10:45a	6.28	364	1.8	0.14	2.2	0.060	0.000	70.2	57	54.2	69.2	0.000	348	1	100.0	15
10/25/09	11:00a	8.24	425	2.4	0.19	2.7	0.065	0.000	70.2	57	54.2	69.2	0.009	348	1	100.0	15
10/25/09	11:15a	10.02	526	3.0	0.24	3.5	0.058	0.000	70.1	55	53.2	68.8	0.000	345	1	100.0	15
10/25/09	11:30a	9.12	513	3.1	0.25	3.4	0.065	0.000	70.1	55	53.2	68.8	0.000	344	1	100.0	15
10/25/09	11:45a	9.35	666	2.9	0.23	3.7	0.067	0.000	69.9	55	53.0	68.6	0.000	348	1	100.0	15
10/25/09	12:00p	9.76	591	3.3	0.27	3.9	0.061	0.000	69.9	54	52.5	68.5	0.012	347	1	100.0	15
10/25/09	12:15p	10.04	568	3.3	0.27	3.8	0.061	0.000	69.9	54	52.5	68.5	0.000	347	1	100.0	15
10/25/09	12:30p	9.87	633	3.2	0.26	4.1	0.056	0.000	69.9	54	52.5	68.5	0.000	348	1	100.0	15
10/25/09	12:45p	6.71	348	2.3	0.18	2.5	0.060	0.000	69.9	54	52.5	68.5	0.000	348	1	100.0	15
10/25/09	1:00p	7.76	403	2.6	0.21	2.9	0.063	0.000	69.9	53	52.0	68.5	0.011	350	1	100.0	15
10/25/09	1:15p	6.60	320	2.2	0.18	2.4	0.060	0.000	69.9	54	52.5	68.5	0.000	348	1	100.0	15

SJCA Site 21 10/25/09

Date	Time	Solar Energy	Hi Solar Rad.	UV Index	UV Dose	Hi UV	Heat D-D	Cool D-D	In Temp	In Hum	In Dew	In Heat	ET	Wind Samp	Wind Tx	ISS Recept	Arc. Int.
10/25/09	1:30p	4.71	267	1.5	0.12	2.0	0.065	0.000	69.9	54	52.5	68.5	0.000	347	1	100.0	15
10/25/09	1:45p	3.12	167	0.9	0.07	1.1	0.068	0.000	69.9	53	52.0	68.5	0.000	349	1	100.0	15
10/25/09	2:00p	3.01	160	0.8	0.06	1.0	0.068	0.000	69.7	53	51.8	68.3	0.006	348	1	100.0	15
10/25/09	2:15p	2.90	160	0.7	0.06	1.0	0.068	0.000	69.7	53	51.8	68.3	0.000	348	1	100.0	15
10/25/09	2:30p	3.29	169	0.9	0.07	0.9	0.065	0.000	69.7	53	51.8	68.3	0.000	348	1	100.0	15
10/25/09	2:45p	3.87	192	1.0	0.08	1.1	0.064	0.000	69.7	53	51.8	68.3	0.000	347	1	100.0	15
10/25/09	3:00p	3.61	199	0.9	0.07	1.1	0.065	0.000	69.7	53	51.8	68.3	0.005	349	1	100.0	15
10/25/09	3:15p	3.44	181	0.7	0.06	0.8	0.066	0.000	69.7	53	51.8	68.3	0.000	348	1	100.0	15
10/25/09	3:30p	4.58	253	1.0	0.08	1.1	0.061	0.000	69.7	53	51.8	68.3	0.000	348	1	100.0	15
10/25/09	3:45p	3.87	192	0.7	0.06	0.9	0.063	0.000	69.7	52	51.3	68.2	0.000	348	1	100.0	15
10/25/09	4:00p	3.74	202	0.5	0.04	0.6	0.063	0.000	69.7	52	51.3	68.2	0.006	350	1	100.0	15
10/25/09	4:15p	2.99	155	0.0	0.00	0.0	0.063	0.000	69.7	52	51.3	68.2	0.000	347	1	100.0	15
10/25/09	4:30p	2.37	120	0.0	0.00	0.0	0.064	0.000	69.7	52	51.3	68.2	0.000	348	1	100.0	15
10/25/09	4:45p	1.89	97	0.0	0.00	0.0	0.066	0.000	69.6	52	51.2	68.2	0.000	349	1	100.0	15
10/25/09	5:00p	1.94	95	0.0	0.00	0.0	0.068	0.000	69.6	52	51.2	68.2	0.004	349	1	100.0	15
10/25/09	5:15p	1.48	84	0.0	0.00	0.0	0.068	0.000	69.6	52	51.2	68.2	0.000	349	1	100.0	15
10/25/09	5:30p	0.75	49	0.0	0.00	0.0	0.071	0.000	69.6	52	51.2	68.2	0.000	348	1	100.0	15
10/25/09	5:45p	0.56	30	0.0	0.00	0.0	0.073	0.000	69.6	52	51.2	68.2	0.000	349	1	100.0	15
10/25/09	6:00p	0.30	18	0.0	0.00	0.0	0.074	0.000	69.6	52	51.2	68.2	0.002	349	1	100.0	15
10/25/09	6:15p	0.06	9	0.0	0.00	0.0	0.076	0.000	69.6	52	51.2	68.2	0.000	347	1	100.0	15
10/25/09	6:30p	0.00	0	0.0	0.00	0.0	0.077	0.000	69.6	52	51.2	68.2	0.000	348	1	100.0	15
10/25/09	6:45p	0.00	0	0.0	0.00	0.0	0.078	0.000	69.6	52	51.2	68.2	0.000	348	1	100.0	15
10/25/09	7:00p	0.00	0	0.0	0.00	0.0	0.078	0.000	69.4	52	51.0	68.0	0.001	350	1	100.0	15
10/25/09	7:15p	0.00	0	0.0	0.00	0.0	0.078	0.000	69.4	52	51.0	68.0	0.000	348	1	100.0	15
10/25/09	7:30p	0.00	0	0.0	0.00	0.0	0.078	0.000	69.4	52	51.0	68.0	0.000	347	1	100.0	15
10/25/09	7:45p	0.00	0	0.0	0.00	0.0	0.079	0.000	69.4	52	51.0	68.0	0.000	348	1	100.0	15
10/25/09	8:00p	0.00	0	0.0	0.00	0.0	0.079	0.000	69.4	52	51.0	68.0	0.002	348	1	100.0	15
10/25/09	8:15p	0.00	0	0.0	0.00	0.0	0.078	0.000	69.4	52	51.0	68.0	0.000	347	1	100.0	15
10/25/09	8:30p	0.00	0	0.0	0.00	0.0	0.080	0.000	69.4	52	51.0	68.0	0.000	348	1	100.0	15
10/25/09	8:45p	0.00	0	0.0	0.00	0.0	0.079	0.000	69.4	52	51.0	68.0	0.000	347	1	100.0	15
10/25/09	9:00p	0.00	0	0.0	0.00	0.0	0.079	0.000	69.4	52	51.0	68.0	0.002	347	1	100.0	15
10/25/09	9:15p	0.00	0	0.0	0.00	0.0	0.079	0.000	69.2	52	50.8	67.9	0.000	350	1	100.0	15
10/25/09	9:30p	0.00	0	0.0	0.00	0.0	0.080	0.000	69.2	52	50.8	67.9	0.000	348	1	100.0	15
10/25/09	9:45p	0.00	0	0.0	0.00	0.0	0.084	0.000	69.2	52	50.8	67.9	0.000	348	1	100.0	15
10/25/09	10:00p	0.00	0	0.0	0.00	0.0	0.090	0.000	69.0	52	50.6	67.8	0.001	348	1	100.0	15
10/25/09	10:15p	0.00	0	0.0	0.00	0.0	0.093	0.000	69.0	52	50.6	67.8	0.000	347	1	100.0	15
10/25/09	10:30p	0.00	0	0.0	0.00	0.0	0.097	0.000	69.0	52	50.6	67.8	0.000	349	1	100.0	15
10/25/09	10:45p	0.00	0	0.0	0.00	0.0	0.099	0.000	69.0	52	50.6	67.8	0.000	349	1	100.0	15
10/25/09	11:00p	0.00	0	0.0	0.00	0.0	0.100	0.000	68.9	52	50.5	67.7	0.001	346	1	100.0	15
10/25/09	11:15p	0.00	0	0.0	0.00	0.0	0.102	0.000	68.9	52	50.5	67.7	0.000	350	1	100.0	15
10/25/09	11:30p	0.00	0	0.0	0.00	0.0	0.104	0.000	68.9	52	50.5	67.7	0.000	349	1	100.0	15
10/25/09	11:45p	0.00	0	0.0	0.00	0.0	0.106	0.000	68.7	52	50.4	67.5	0.000	346	1	100.0	15
10/26/09	12:00a	0.00	0	0.0	0.00	0.0	0.112	0.000	68.7	52	50.4	67.5	0.000	348	1	100.0	15

SJCA Site 21 10/26/09

Date	Time	Solar Energy	Hi Solar Rad.	UV Index	UV Dose	Hi UV	Heat D-D	Cool D-D	In Temp	In Hum	In Dew	In Heat	ET	Wind Samp	Wind Tx	ISS Recept	Arc. Int.
10/26/09	12:15a	0.00	0	0.0	0.00	0.0	0.108	0.000	68.7	52	50.4	67.5	0.000	347	1	100.0	15
10/26/09	12:30a	0.00	0	0.0	0.00	0.0	0.099	0.000	68.7	52	50.4	67.5	0.000	348	1	100.0	15
10/26/09	12:45a	0.00	0	0.0	0.00	0.0	0.095	0.000	68.5	52	50.2	67.3	0.000	348	1	100.0	15
10/26/09	1:00a	0.00	0	0.0	0.00	0.0	0.098	0.000	68.5	52	50.2	67.3	0.001	346	1	100.0	15
10/26/09	1:15a	0.00	0	0.0	0.00	0.0	0.105	0.000	68.5	52	50.2	67.3	0.000	347	1	100.0	15
10/26/09	1:30a	0.00	0	0.0	0.00	0.0	0.114	0.000	68.4	52	50.1	67.2	0.000	348	1	100.0	15
10/26/09	1:45a	0.00	0	0.0	0.00	0.0	0.125	0.000	68.4	52	50.1	67.2	0.000	349	1	100.0	15
10/26/09	2:00a	0.00	0	0.0	0.00	0.0	0.125	0.000	68.4	52	50.1	67.2	0.001	349	1	100.0	15
10/26/09	2:15a	0.00	0	0.0	0.00	0.0	0.124	0.000	68.4	51	49.6	67.2	0.000	349	1	100.0	15
10/26/09	2:30a	0.00	0	0.0	0.00	0.0	0.124	0.000	68.2	52	49.9	67.1	0.000	347	1	100.0	15
10/26/09	2:45a	0.00	0	0.0	0.00	0.0	0.116	0.000	68.2	52	49.9	67.1	0.000	348	1	100.0	15
10/26/09	3:00a	0.00	0	0.0	0.00	0.0	0.109	0.000	68.0	52	49.7	66.9	0.001	347	1	100.0	15
10/26/09	3:15a	0.00	0	0.0	0.00	0.0	0.108	0.000	68.0	52	49.7	66.9	0.000	348	1	100.0	15
10/26/09	3:30a	0.00	0	0.0	0.00	0.0	0.109	0.000	68.0	52	49.7	66.9	0.000	349	1	100.0	15
10/26/09	3:45a	0.00	0	0.0	0.00	0.0	0.108	0.000	68.0	52	49.7	66.9	0.000	349	1	100.0	15
10/26/09	4:00a	0.00	0	0.0	0.00	0.0	0.104	0.000	67.9	52	49.6	66.8	0.001	348	1	100.0	15
10/26/09	4:15a	0.00	0	0.0	0.00	0.0	0.099	0.000	67.9	52	49.6	66.8	0.000	348	1	100.0	15
10/26/09	4:30a	0.00	0	0.0	0.00	0.0	0.096	0.000	67.9	52	49.6	66.8	0.000	350	1	100.0	15
10/26/09	4:45a	0.00	0	0.0	0.00	0.0	0.095	0.000	67.9	52	49.6	66.8	0.000	347	1	100.0	15
10/26/09	5:00a	0.00	0	0.0	0.00	0.0	0.094	0.000	67.9	52	49.6	66.8	0.001	348	1	100.0	15
10/26/09	5:15a	0.00	0	0.0	0.00	0.0	0.095	0.000	67.9	52	49.6	66.8	0.000	348	1	100.0	15
10/26/09	5:30a	0.00	0	0.0	0.00	0.0	0.097	0.000	67.9	52	49.6	66.8	0.000	347	1	100.0	15
10/26/09	5:45a	0.00	0	0.0	0.00	0.0	0.096	0.000	67.7	52	49.4	66.6	0.000	344	1	100.0	15
10/26/09	6:00a	0.00	0	0.0	0.00	0.0	0.095	0.000	67.7	52	49.4	66.6	0.001	348	1	100.0	15
10/26/09	6:15a	0.00	0	0.0	0.00	0.0	0.095	0.000	67.7	52	49.4	66.6	0.000	347	1	100.0	15
10/26/09	6:30a	0.00	0	0.0	0.00	0.0	0.094	0.000	67.7	53	49.9	66.7	0.000	346	1	100.0	15
10/26/09	6:45a	0.00	0	0.0	0.00	0.0	0.093	0.000	67.9	53	50.1	66.9	0.000	342	1	100.0	15
10/26/09	7:00a	0.00	0	0.0	0.00	0.0	0.091	0.000	68.2	53	50.4	67.2	0.001	343	1	100.0	15
10/26/09	7:15a	0.00	0	0.0	0.00	0.0	0.089	0.000	68.5	54	51.2	67.5	0.000	343	1	100.0	15
10/26/09	7:30a	0.04	9	0.0	0.00	0.0	0.086	0.000	68.7	53	50.9	67.6	0.000	344	1	100.0	15
10/26/09	7:45a	0.39	30	0.0	0.00	0.0	0.085	0.000	68.2	53	50.4	67.2	0.000	346	1	100.0	15
10/26/09	8:00a	0.60	37	0.0	0.00	0.0	0.082	0.000	67.9	54	50.6	67.0	0.001	347	1	100.0	15
10/26/09	8:15a	0.77	51	0.0	0.00	0.0	0.080	0.000	67.7	55	50.9	66.9	0.000	345	1	100.0	15
10/26/09	8:30a	0.99	53	0.0	0.00	0.0	0.075	0.000	67.5	55	50.8	66.6	0.000	343	1	100.0	15
10/26/09	8:45a	1.46	77	0.0	0.00	0.0	0.066	0.000	67.5	55	50.8	66.6	0.000	346	1	100.0	15
10/26/09	9:00a	1.94	95	0.0	0.00	0.0	0.057	0.000	67.5	55	50.8	66.6	0.002	345	1	100.0	15
10/26/09	9:15a	2.04	102	0.0	0.00	0.0	0.053	0.000	67.9	55	51.1	67.1	0.000	339	1	99.1	15
10/26/09	9:30a	2.54	135	0.0	0.00	0.0	0.050	0.000	68.4	55	51.6	67.5	0.000	334	1	97.7	15
10/26/09	9:45a	3.31	162	0.2	0.02	0.5	0.046	0.000	68.7	55	51.9	67.8	0.000	341	1	99.7	15
10/26/09	10:00a	3.61	183	0.6	0.05	0.8	0.043	0.000	68.9	54	51.6	67.8	0.004	340	1	99.4	15
10/26/09	10:15a	3.74	183	0.8	0.06	0.9	0.040	0.000	69.0	54	51.7	67.9	0.000	339	1	99.1	15
10/26/09	10:30a	3.83	185	1.0	0.08	1.2	0.037	0.000	69.0	54	51.7	67.9	0.000	335	1	98.0	15
10/26/09	10:45a	4.67	246	1.4	0.11	1.6	0.033	0.000	69.0	54	51.7	67.9	0.000	335	1	98.0	15
10/26/09	11:00a	4.86	237	1.5	0.12	1.6	0.029	0.000	68.9	54	51.6	67.8	0.006	336	1	98.2	15
10/26/09	11:15a	5.16	272	1.7	0.14	1.9	0.026	0.000	69.4	55	52.5	68.3	0.000	344	1	100.0	15
10/26/09	11:30a	4.09	236	1.2	0.10	1.6	0.025	0.000	69.7	55	52.8	68.5	0.000	343	1	100.0	15
10/26/09	11:45a	4.82	301	1.4	0.11	2.0	0.022	0.000	69.6	55	52.7	68.4	0.000	336	1	98.2	15
10/26/09	12:00p	6.43	322	2.1	0.17	2.2	0.017	0.000	69.7	55	52.8	68.5	0.007	337	1	98.5	15
10/26/09	12:15p	7.65	480	2.6	0.21	3.1	0.009	0.000	69.9	56	53.5	68.7	0.000	337	1	98.5	15
10/26/09	12:30p	10.75	703	4.0	0.32	4.7	0.004	0.000	69.9	56	53.5	68.7	0.000	336	1	98.2	15
10/26/09	12:45p	7.70	427	3.0	0.24	3.3	0.001	0.000	69.9	56	53.5	68.7	0.000	339	1	99.1	15
10/26/09	1:00p	5.66	294	2.1	0.17	2.5	0.003	0.000	69.7	56	53.3	68.6	0.010	342	1	100.0	15
10/26/09	1:15p	7.89	475	2.9	0.23	3.3	0.000	0.001	69.6	56	53.2	68.5	0.000	341	1	99.7	15

SJCA Site 21 10/26/09

Date	Time	Solar Energy	Hi Solar Rad.	UV Index	UV Dose	Hi UV	Heat D-D	Cool D-D	In Temp	In Hum	In Dew	In Heat	ET	Wind Samp	Wind Tx	ISS Recept	Arc. Int.
10/26/09	1:30p	7.68	503	2.8	0.22	3.2	0.000	0.003	69.6	57	53.7	68.6	0.000	342	1	100.0	15
10/26/09	1:45p	6.88	394	2.5	0.20	2.6	0.000	0.002	69.7	57	53.8	68.7	0.000	341	1	99.7	15
10/26/09	2:00p	5.74	323	2.0	0.16	2.6	0.000	0.001	69.7	57	53.8	68.7	0.009	342	1	100.0	15
10/26/09	2:15p	5.44	295	1.8	0.14	2.0	0.001	0.000	69.7	57	53.8	68.7	0.000	342	1	100.0	15
10/26/09	2:30p	3.38	167	1.0	0.08	1.3	0.003	0.000	69.7	58	54.3	68.8	0.000	342	1	100.0	15
10/26/09	2:45p	2.19	127	0.3	0.02	0.6	0.007	0.000	69.9	57	54.0	68.8	0.000	341	1	99.7	15
10/26/09	3:00p	2.82	137	0.7	0.06	0.7	0.009	0.000	70.1	57	54.2	69.0	0.006	338	1	98.8	15
10/26/09	3:15p	2.73	141	0.5	0.04	0.7	0.009	0.000	70.2	58	54.7	69.3	0.000	344	1	100.0	15
10/26/09	3:30p	1.81	95	0.0	0.00	0.0	0.011	0.000	70.4	58	54.9	69.5	0.000	322	1	94.2	15
10/26/09	3:45p	1.14	69	0.0	0.00	0.0	0.016	0.000	70.7	58	55.2	69.9	0.000	323	1	94.4	15
10/26/09	4:00p	1.20	62	0.0	0.00	0.0	0.023	0.000	70.9	58	55.4	70.2	0.003	322	1	94.2	15
10/26/09	4:15p	1.05	60	0.0	0.00	0.0	0.035	0.000	70.9	58	55.4	70.2	0.000	329	1	96.2	15
10/26/09	4:30p	0.92	58	0.0	0.00	0.0	0.046	0.000	70.7	58	55.2	69.9	0.000	331	1	96.8	15
10/26/09	4:45p	0.62	33	0.0	0.00	0.0	0.050	0.000	70.6	58	55.1	69.8	0.000	327	1	95.6	15
10/26/09	5:00p	0.45	28	0.0	0.00	0.0	0.050	0.000	70.4	58	54.9	69.5	0.002	329	1	96.2	15
10/26/09	5:15p	0.34	18	0.0	0.00	0.0	0.048	0.000	70.4	58	54.9	69.5	0.000	337	1	98.5	15
10/26/09	5:30p	0.52	28	0.0	0.00	0.0	0.043	0.000	70.2	58	54.7	69.3	0.000	337	1	98.5	15
10/26/09	5:45p	0.34	23	0.0	0.00	0.0	0.043	0.000	70.2	58	54.7	69.3	0.000	328	1	95.9	15
10/26/09	6:00p	0.06	9	0.0	0.00	0.0	0.041	0.000	70.1	58	54.6	69.1	0.001	330	1	96.5	15
10/26/09	6:15p	0.00	0	0.0	0.00	0.0	0.040	0.000	69.9	58	54.4	68.9	0.000	329	1	96.2	15
10/26/09	6:30p	0.00	0	0.0	0.00	0.0	0.041	0.000	69.9	58	54.4	68.9	0.000	333	1	97.4	15
10/26/09	6:45p	0.00	0	0.0	0.00	0.0	0.046	0.000	69.9	58	54.4	68.9	0.000	334	1	97.7	15
10/26/09	7:00p	0.00	0	0.0	0.00	0.0	0.057	0.000	69.7	58	54.3	68.8	0.001	334	1	97.7	15
10/26/09	7:15p	0.00	0	0.0	0.00	0.0	0.061	0.000	69.7	58	54.3	68.8	0.000	329	1	96.2	15
10/26/09	7:30p	0.00	0	0.0	0.00	0.0	0.064	0.000	69.7	58	54.3	68.8	0.000	337	1	98.5	15
10/26/09	7:45p	0.00	0	0.0	0.00	0.0	0.064	0.000	69.6	58	54.2	68.7	0.000	334	1	97.7	15
10/26/09	8:00p	0.00	0	0.0	0.00	0.0	0.060	0.000	69.6	58	54.2	68.7	0.001	331	1	96.8	15
10/26/09	8:15p	0.00	0	0.0	0.00	0.0	0.058	0.000	69.6	58	54.2	68.7	0.000	333	1	97.4	15
10/26/09	8:30p	0.00	0	0.0	0.00	0.0	0.056	0.000	69.6	59	54.6	68.8	0.000	332	1	97.1	15
10/26/09	8:45p	0.00	0	0.0	0.00	0.0	0.052	0.000	69.4	59	54.4	68.6	0.000	326	1	95.3	15
10/26/09	9:00p	0.00	0	0.0	0.00	0.0	0.048	0.000	69.4	59	54.4	68.6	0.001	333	1	97.4	15
10/26/09	9:15p	0.00	0	0.0	0.00	0.0	0.041	0.000	69.4	59	54.4	68.6	0.000	328	1	95.9	15
10/26/09	9:30p	0.00	0	0.0	0.00	0.0	0.035	0.000	69.4	59	54.4	68.6	0.000	327	1	95.6	15
10/26/09	9:45p	0.00	0	0.0	0.00	0.0	0.033	0.000	69.4	59	54.4	68.6	0.000	332	1	97.1	15
10/26/09	10:00p	0.00	0	0.0	0.00	0.0	0.039	0.000	69.2	59	54.3	68.5	0.001	330	1	96.5	15
10/26/09	10:15p	0.00	0	0.0	0.00	0.0	0.041	0.000	69.2	59	54.3	68.5	0.000	330	1	96.5	15
10/26/09	10:30p	0.00	0	0.0	0.00	0.0	0.042	0.000	69.2	59	54.3	68.5	0.000	331	1	96.8	15
10/26/09	10:45p	0.00	0	0.0	0.00	0.0	0.043	0.000	69.2	59	54.3	68.5	0.000	329	1	96.2	15
10/26/09	11:00p	0.00	0	0.0	0.00	0.0	0.041	0.000	69.2	59	54.3	68.5	0.001	331	1	96.8	15
10/26/09	11:15p	0.00	0	0.0	0.00	0.0	0.039	0.000	69.2	60	54.7	68.6	0.000	325	1	95.0	15
10/26/09	11:30p	0.00	0	0.0	0.00	0.0	0.037	0.000	69.2	60	54.7	68.6	0.000	330	1	96.5	15
10/26/09	11:45p	0.00	0	0.0	0.00	0.0	0.035	0.000	69.2	60	54.7	68.6	0.000	328	1	95.9	15
10/27/09	12:00a	0.00	0	0.0	0.00	0.0	0.035	0.000	69.2	60	54.7	68.6	0.000	320	1	93.6	15

SJCA Site 21 10/27/09

Date	Time	Solar Energy	Hi Solar Rad.	UV Index	UV Dose	Hi UV	Heat D-D	Cool D-D	In Temp	In Hum	In Dew	In Heat	ET	Wind Samp	Wind Tx	ISS Recept	Arc. Int.
10/27/09	12:15a	0.00	0	0.0	0.00	0.0	0.033	0.000	69.2	60	54.7	68.6	0.000	324	1	94.7	15
10/27/09	12:30a	0.00	0	0.0	0.00	0.0	0.032	0.000	69.2	60	54.7	68.6	0.000	327	1	95.6	15
10/27/09	12:45a	0.00	0	0.0	0.00	0.0	0.030	0.000	69.2	60	54.7	68.6	0.000	324	1	94.7	15
10/27/09	1:00a	0.00	0	0.0	0.00	0.0	0.028	0.000	69.2	60	54.7	68.6	0.000	327	1	95.6	15
10/27/09	1:15a	0.00	0	0.0	0.00	0.0	0.025	0.000	69.2	60	54.7	68.6	0.000	324	1	94.7	15
10/27/09	1:30a	0.00	0	0.0	0.00	0.0	0.021	0.000	69.2	61	55.2	68.7	0.000	329	1	96.2	15
10/27/09	1:45a	0.00	0	0.0	0.00	0.0	0.019	0.000	69.2	61	55.2	68.7	0.000	327	1	95.6	15
10/27/09	2:00a	0.00	0	0.0	0.00	0.0	0.016	0.000	69.2	61	55.2	68.7	0.000	324	1	94.7	15
10/27/09	2:15a	0.00	0	0.0	0.00	0.0	0.015	0.000	69.2	61	55.2	68.7	0.000	326	1	95.3	15
10/27/09	2:30a	0.00	0	0.0	0.00	0.0	0.013	0.000	69.2	61	55.2	68.7	0.000	322	1	94.2	15
10/27/09	2:45a	0.00	0	0.0	0.00	0.0	0.013	0.000	69.2	61	55.2	68.7	0.000	318	1	93.0	15
10/27/09	3:00a	0.00	0	0.0	0.00	0.0	0.010	0.000	69.4	61	55.4	68.8	0.000	319	1	93.3	15
10/27/09	3:15a	0.00	0	0.0	0.00	0.0	0.009	0.000	69.4	61	55.4	68.8	0.000	321	1	93.9	15
10/27/09	3:30a	0.00	0	0.0	0.00	0.0	0.008	0.000	69.4	62	55.8	68.9	0.000	327	1	95.6	15
10/27/09	3:45a	0.00	0	0.0	0.00	0.0	0.006	0.000	69.4	62	55.8	68.9	0.000	321	1	93.9	15
10/27/09	4:00a	0.00	0	0.0	0.00	0.0	0.005	0.000	69.4	62	55.8	68.9	0.000	329	1	96.2	15
10/27/09	4:15a	0.00	0	0.0	0.00	0.0	0.003	0.000	69.4	62	55.8	68.9	0.000	324	1	94.7	15
10/27/09	4:30a	0.00	0	0.0	0.00	0.0	0.002	0.000	69.4	62	55.8	68.9	0.000	329	1	96.2	15
10/27/09	4:45a	0.00	0	0.0	0.00	0.0	0.000	0.000	69.4	62	55.8	68.9	0.000	327	1	95.6	15
10/27/09	5:00a	0.00	0	0.0	0.00	0.0	0.000	0.002	69.4	62	55.8	68.9	0.000	328	1	95.9	15
10/27/09	5:15a	0.00	0	0.0	0.00	0.0	0.002	0.000	69.6	62	56.0	69.1	0.000	327	1	95.6	15
10/27/09	5:30a	0.00	0	0.0	0.00	0.0	0.007	0.000	69.6	62	56.0	69.1	0.000	334	1	97.7	15
10/27/09	5:45a	0.00	0	0.0	0.00	0.0	0.008	0.000	69.6	62	56.0	69.1	0.000	330	1	96.5	15
10/27/09	6:00a	0.00	0	0.0	0.00	0.0	0.010	0.000	69.6	62	56.0	69.1	0.000	328	1	95.9	15
10/27/09	6:15a	0.00	0	0.0	0.00	0.0	0.019	0.000	69.6	63	56.4	69.2	0.000	325	1	95.0	15
10/27/09	6:30a	0.00	0	0.0	0.00	0.0	0.024	0.000	69.6	63	56.4	69.2	0.000	324	1	94.7	15
10/27/09	6:45a	0.00	0	0.0	0.00	0.0	0.027	0.000	69.7	63	56.5	69.3	0.000	334	1	97.7	15
10/27/09	7:00a	0.00	0	0.0	0.00	0.0	0.031	0.000	69.9	64	57.2	69.5	0.000	340	1	99.4	15
10/27/09	7:15a	0.00	0	0.0	0.00	0.0	0.039	0.000	70.2	65	57.9	69.9	0.000	344	1	100.0	15
10/27/09	7:30a	0.00	0	0.0	0.00	0.0	0.042	0.000	70.7	66	58.8	70.6	0.000	346	1	100.0	15
10/27/09	7:45a	0.04	5	0.0	0.00	0.0	0.046	0.000	71.1	66	59.2	71.1	0.000	346	1	100.0	15
10/27/09	8:00a	0.11	5	0.0	0.00	0.0	0.050	0.000	71.1	66	59.2	71.1	0.000	337	1	98.5	15
10/27/09	8:15a	0.26	16	0.0	0.00	0.0	0.053	0.000	71.1	66	59.2	71.1	0.000	336	1	98.2	15
10/27/09	8:30a	0.47	28	0.0	0.00	0.0	0.056	0.000	70.9	66	59.0	70.9	0.000	320	1	93.6	15
10/27/09	8:45a	0.82	51	0.0	0.00	0.0	0.057	0.000	70.6	66	58.7	70.5	0.000	329	1	96.2	15
10/27/09	9:00a	0.69	37	0.0	0.00	0.0	0.057	0.000	70.2	66	58.3	70.0	0.001	344	1	100.0	15
10/27/09	9:15a	0.62	32	0.0	0.00	0.0	0.058	0.000	70.2	66	58.3	70.0	0.000	311	1	90.9	15
10/27/09	9:30a	1.16	79	0.0	0.00	0.0	0.059	0.000	70.4	66	58.5	70.3	0.000	342	1	100.0	15
10/27/09	9:45a	1.38	88	0.0	0.00	0.0	0.059	0.000	70.4	66	58.5	70.3	0.000	332	1	97.1	15
10/27/09	10:00a	1.46	81	0.0	0.00	0.0	0.060	0.000	70.2	66	58.3	70.0	0.001	337	1	98.5	15
10/27/09	10:15a	2.67	149	0.3	0.02	0.6	0.059	0.000	70.1	65	57.8	69.8	0.000	334	1	97.7	15
10/27/09	10:30a	2.06	137	0.3	0.02	0.5	0.058	0.000	70.1	65	57.8	69.8	0.000	334	1	97.7	15
10/27/09	10:45a	1.76	127	0.1	0.01	0.5	0.056	0.000	70.1	65	57.8	69.8	0.000	328	1	95.9	15
10/27/09	11:00a	2.11	127	0.2	0.02	0.6	0.054	0.000	70.1	65	57.8	69.8	0.002	329	1	96.2	15
10/27/09	11:15a	2.64	151	0.8	0.06	1.0	0.053	0.000	70.2	65	57.9	69.9	0.000	326	1	95.3	15
10/27/09	11:30a	2.54	148	0.7	0.06	0.9	0.052	0.000	70.2	66	58.3	70.0	0.000	328	1	95.9	15
10/27/09	11:45a	2.92	206	1.0	0.08	1.3	0.050	0.000	70.4	67	58.9	70.4	0.000	334	1	97.7	15
10/27/09	12:00p	3.72	257	1.4	0.11	1.9	0.048	0.000	70.6	67	59.1	70.6	0.003	337	1	98.5	15
10/27/09	12:15p	3.98	214	1.5	0.12	1.8	0.046	0.000	70.7	67	59.2	70.7	0.000	323	1	94.4	15
10/27/09	12:30p	4.41	255	1.6	0.13	1.9	0.043	0.000	70.9	67	59.4	71.0	0.000	319	1	93.3	15
10/27/09	12:45p	2.90	183	1.0	0.08	1.4	0.041	0.000	71.1	67	59.6	71.2	0.000	325	1	95.0	15
10/27/09	1:00p	2.28	123	0.7	0.06	0.9	0.043	0.000	70.9	67	59.4	71.0	0.004	340	1	99.4	15
10/27/09	1:15p	3.27	171	1.1	0.09	1.3	0.042	0.000	70.9	66	59.0	70.9	0.000	334	1	97.7	15

SJCA Site 21 10/27/09

Date	Time	Solar Energy	Hi Solar Rad.	UV Index	UV Dose	Hi UV	Heat D-D	Cool D-D	In Temp	In Hum	In Dew	In Heat	ET	Wind Samp	Wind Tx	ISS Recept	Arc. Int.
10/27/09	1:30p	3.29	172	1.2	0.10	1.3	0.041	0.000	70.7	66	58.8	70.6	0.000	335	1	98.0	15
10/27/09	1:45p	3.16	188	1.1	0.09	1.4	0.037	0.000	70.7	66	58.8	70.6	0.000	331	1	96.8	15
10/27/09	2:00p	2.90	160	1.0	0.08	1.2	0.039	0.000	70.7	66	58.8	70.6	0.003	333	1	97.4	15
10/27/09	2:15p	2.73	156	0.9	0.07	1.1	0.039	0.000	70.7	66	58.8	70.6	0.000	328	1	95.9	15
10/27/09	2:30p	2.58	178	0.8	0.06	1.0	0.039	0.000	70.7	66	58.8	70.6	0.000	329	1	96.2	15
10/27/09	2:45p	2.26	162	0.4	0.03	1.0	0.040	0.000	70.7	66	58.8	70.6	0.000	336	1	98.2	15
10/27/09	3:00p	2.21	137	0.4	0.03	0.7	0.040	0.000	70.7	66	58.8	70.6	0.003	337	1	98.5	15
10/27/09	3:15p	1.83	95	0.0	0.00	0.5	0.039	0.000	70.7	66	58.8	70.6	0.000	336	1	98.2	15
10/27/09	3:30p	2.00	109	0.0	0.00	0.0	0.040	0.000	70.9	66	59.0	70.9	0.000	341	1	99.7	15
10/27/09	3:45p	1.55	83	0.0	0.00	0.0	0.040	0.000	71.2	67	59.7	71.4	0.000	340	1	99.4	15
10/27/09	4:00p	1.42	70	0.0	0.00	0.0	0.040	0.000	71.6	67	60.1	71.9	0.002	338	1	98.8	15
10/27/09	4:15p	2.21	151	0.0	0.00	0.0	0.040	0.000	71.4	66	59.4	71.6	0.000	330	1	96.5	15
10/27/09	4:30p	1.46	91	0.0	0.00	0.0	0.040	0.000	71.2	66	59.3	71.3	0.000	317	1	92.7	15
10/27/09	4:45p	1.18	63	0.0	0.00	0.0	0.041	0.000	70.9	66	59.0	70.9	0.000	319	1	93.3	15
10/27/09	5:00p	0.69	49	0.0	0.00	0.0	0.041	0.000	70.7	66	58.8	70.6	0.002	327	1	95.6	15
10/27/09	5:15p	0.69	39	0.0	0.00	0.0	0.041	0.000	70.7	66	58.8	70.6	0.000	332	1	97.1	15
10/27/09	5:30p	0.69	39	0.0	0.00	0.0	0.042	0.000	70.7	66	58.8	70.6	0.000	341	1	99.7	15
10/27/09	5:45p	0.34	23	0.0	0.00	0.0	0.043	0.000	70.9	66	59.0	70.9	0.000	335	1	98.0	15
10/27/09	6:00p	0.04	7	0.0	0.00	0.0	0.044	0.000	70.9	65	58.5	70.8	0.001	338	1	98.8	15
10/27/09	6:15p	0.00	0	0.0	0.00	0.0	0.045	0.000	71.1	65	58.7	71.0	0.000	338	1	98.8	15
10/27/09	6:30p	0.00	0	0.0	0.00	0.0	0.045	0.000	71.1	65	58.7	71.0	0.000	342	1	100.0	15
10/27/09	6:45p	0.00	0	0.0	0.00	0.0	0.047	0.000	71.1	65	58.7	71.0	0.000	340	1	99.4	15
10/27/09	7:00p	0.00	0	0.0	0.00	0.0	0.048	0.000	71.1	65	58.7	71.0	0.000	343	1	100.0	15
10/27/09	7:15p	0.00	0	0.0	0.00	0.0	0.048	0.000	71.1	65	58.7	71.0	0.000	340	1	99.4	15
10/27/09	7:30p	0.00	0	0.0	0.00	0.0	0.048	0.000	71.1	65	58.7	71.0	0.000	342	1	100.0	15
10/27/09	7:45p	0.00	0	0.0	0.00	0.0	0.049	0.000	71.2	65	58.8	71.2	0.000	341	1	99.7	15
10/27/09	8:00p	0.00	0	0.0	0.00	0.0	0.050	0.000	71.2	64	58.4	71.1	0.000	342	1	100.0	15
10/27/09	8:15p	0.00	0	0.0	0.00	0.0	0.050	0.000	71.2	64	58.4	71.1	0.000	341	1	99.7	15
10/27/09	8:30p	0.00	0	0.0	0.00	0.0	0.050	0.000	71.2	64	58.4	71.1	0.000	340	1	99.4	15
10/27/09	8:45p	0.00	0	0.0	0.00	0.0	0.051	0.000	71.2	64	58.4	71.1	0.000	342	1	100.0	15
10/27/09	9:00p	0.00	0	0.0	0.00	0.0	0.051	0.000	71.2	64	58.4	71.1	0.000	343	1	100.0	15
10/27/09	9:15p	0.00	0	0.0	0.00	0.0	0.051	0.000	71.2	64	58.4	71.1	0.000	342	1	100.0	15
10/27/09	9:30p	0.00	0	0.0	0.00	0.0	0.051	0.000	71.2	64	58.4	71.1	0.000	340	1	99.4	15
10/27/09	9:45p	0.00	0	0.0	0.00	0.0	0.050	0.000	71.2	64	58.4	71.1	0.000	336	1	98.2	15
10/27/09	10:00p	0.00	0	0.0	0.00	0.0	0.051	0.000	71.4	64	58.6	71.4	0.000	341	1	99.7	15
10/27/09	10:15p	0.00	0	0.0	0.00	0.0	0.050	0.000	71.4	64	58.6	71.4	0.000	342	1	100.0	15
10/27/09	10:30p	0.00	0	0.0	0.00	0.0	0.049	0.000	71.4	64	58.6	71.4	0.000	338	1	98.8	15
10/27/09	10:45p	0.00	0	0.0	0.00	0.0	0.049	0.000	71.4	64	58.6	71.4	0.000	340	1	99.4	15
10/27/09	11:00p	0.00	0	0.0	0.00	0.0	0.049	0.000	71.4	64	58.6	71.4	0.000	343	1	100.0	15
10/27/09	11:15p	0.00	0	0.0	0.00	0.0	0.049	0.000	71.4	64	58.6	71.4	0.000	344	1	100.0	15
10/27/09	11:30p	0.00	0	0.0	0.00	0.0	0.049	0.000	71.4	64	58.6	71.4	0.000	339	1	99.1	15
10/27/09	11:45p	0.00	0	0.0	0.00	0.0	0.049	0.000	71.6	64	58.8	71.7	0.000	339	1	99.1	15
10/28/09	12:00a	0.00	0	0.0	0.00	0.0	0.050	0.000	71.6	64	58.8	71.7	0.000	337	1	98.5	15

SJCA Site 21 10/28/09

Date	Time	Solar Energy	Hi Solar Rad.	UV Index	UV Dose	Hi UV	Heat D-D	Cool D-D	In Temp	In Hum	In Dew	In Heat	ET	Wind Samp	Wind Tx	ISS Recept	Arc. Int.
10/28/09	12:15a	0.00	0	0.0	0.00	0.0	0.050	0.000	71.6	64	58.8	71.7	0.000	338	1	98.8	15
10/28/09	12:30a	0.00	0	0.0	0.00	0.0	0.049	0.000	71.6	64	58.8	71.7	0.000	337	1	98.5	15
10/28/09	12:45a	0.00	0	0.0	0.00	0.0	0.048	0.000	71.6	64	58.8	71.7	0.000	343	1	100.0	15
10/28/09	1:00a	0.00	0	0.0	0.00	0.0	0.047	0.000	71.6	64	58.8	71.7	0.000	337	1	98.5	15
10/28/09	1:15a	0.00	0	0.0	0.00	0.0	0.045	0.000	71.4	64	58.6	71.4	0.000	342	1	100.0	15
10/28/09	1:30a	0.00	0	0.0	0.00	0.0	0.043	0.000	71.6	64	58.8	71.7	0.000	339	1	99.1	15
10/28/09	1:45a	0.00	0	0.0	0.00	0.0	0.041	0.000	71.6	64	58.8	71.7	0.000	342	1	100.0	15
10/28/09	2:00a	0.00	0	0.0	0.00	0.0	0.039	0.000	71.4	64	58.6	71.4	0.000	340	1	99.4	15
10/28/09	2:15a	0.00	0	0.0	0.00	0.0	0.035	0.000	71.6	64	58.8	71.7	0.000	340	1	99.4	15
10/28/09	2:30a	0.00	0	0.0	0.00	0.0	0.033	0.000	71.6	64	58.8	71.7	0.000	342	1	100.0	15
10/28/09	2:45a	0.00	0	0.0	0.00	0.0	0.030	0.000	71.4	64	58.6	71.4	0.000	340	1	99.4	15
10/28/09	3:00a	0.00	0	0.0	0.00	0.0	0.027	0.000	71.6	64	58.8	71.7	0.000	342	1	100.0	15
10/28/09	3:15a	0.00	0	0.0	0.00	0.0	0.024	0.000	71.6	64	58.8	71.7	0.000	342	1	100.0	15
10/28/09	3:30a	0.00	0	0.0	0.00	0.0	0.019	0.000	71.6	64	58.8	71.7	0.000	338	1	98.8	15
10/28/09	3:45a	0.00	0	0.0	0.00	0.0	0.017	0.000	71.6	64	58.8	71.7	0.000	342	1	100.0	15
10/28/09	4:00a	0.00	0	0.0	0.00	0.0	0.015	0.000	71.6	64	58.8	71.7	0.000	340	1	99.4	15
10/28/09	4:15a	0.00	0	0.0	0.00	0.0	0.009	0.000	71.6	65	59.2	71.7	0.000	339	1	99.1	15
10/28/09	4:30a	0.00	0	0.0	0.00	0.0	0.002	0.000	71.6	65	59.2	71.7	0.000	343	1	100.0	15
10/28/09	4:45a	0.00	0	0.0	0.00	0.0	0.000	0.004	71.8	65	59.4	72.0	0.000	336	1	98.2	15
10/28/09	5:00a	0.00	0	0.0	0.00	0.0	0.000	0.015	71.8	65	59.4	72.0	0.000	339	1	99.1	15
10/28/09	5:15a	0.00	0	0.0	0.00	0.0	0.000	0.021	71.8	66	59.8	72.1	0.000	334	1	97.7	15
10/28/09	5:30a	0.00	0	0.0	0.00	0.0	0.000	0.032	71.8	66	59.8	72.1	0.000	330	1	96.5	15
10/28/09	5:45a	0.00	0	0.0	0.00	0.0	0.000	0.043	71.9	66	59.9	72.2	0.000	330	1	96.5	15
10/28/09	6:00a	0.00	0	0.0	0.00	0.0	0.000	0.050	71.9	67	60.3	72.3	0.000	329	1	96.2	15
10/28/09	6:15a	0.00	0	0.0	0.00	0.0	0.000	0.056	72.1	67	60.5	72.6	0.000	324	1	94.7	15
10/28/09	6:30a	0.00	0	0.0	0.00	0.0	0.000	0.063	72.1	67	60.5	72.6	0.000	317	1	92.7	15
10/28/09	6:45a	0.00	0	0.0	0.00	0.0	0.000	0.068	72.1	68	61.0	72.7	0.000	316	1	92.4	15
10/28/09	7:00a	0.00	0	0.0	0.00	0.0	0.000	0.070	72.4	70	62.1	73.3	0.000	334	1	97.7	15
10/28/09	7:15a	0.00	0	0.0	0.00	0.0	0.000	0.073	73.1	72	63.5	74.4	0.000	329	1	96.2	15
10/28/09	7:30a	0.00	0	0.0	0.00	0.0	0.000	0.075	73.5	73	64.3	75.1	0.000	331	1	96.8	15
10/28/09	7:45a	0.15	19	0.0	0.00	0.0	0.000	0.076	73.8	73	64.6	75.5	0.000	338	1	98.8	15
10/28/09	8:00a	0.45	30	0.0	0.00	0.0	0.000	0.078	73.8	73	64.6	75.5	0.001	324	1	94.7	15
10/28/09	8:15a	0.90	60	0.0	0.00	0.0	0.000	0.080	73.8	73	64.6	75.5	0.000	327	1	95.6	15
10/28/09	8:30a	0.67	39	0.0	0.00	0.0	0.000	0.082	73.5	73	64.3	75.1	0.000	318	1	93.0	15
10/28/09	8:45a	0.43	26	0.0	0.00	0.0	0.000	0.083	73.3	73	64.1	74.8	0.000	316	1	92.4	15
10/28/09	9:00a	0.92	74	0.0	0.00	0.0	0.000	0.085	73.1	73	63.9	74.5	0.001	311	1	90.9	15
10/28/09	9:15a	1.85	144	0.0	0.00	0.0	0.000	0.090	73.0	73	63.8	74.3	0.000	311	1	90.9	15
10/28/09	9:30a	2.32	167	0.2	0.02	0.7	0.000	0.095	72.8	74	64.0	74.1	0.000	315	1	92.1	15
10/28/09	9:45a	2.69	162	0.7	0.06	0.9	0.000	0.101	72.8	74	64.0	74.1	0.000	327	1	95.6	15
10/28/09	10:00a	3.16	262	0.6	0.05	1.3	0.000	0.105	72.6	74	63.8	73.8	0.003	325	1	95.0	15
10/28/09	10:15a	8.97	636	1.9	0.15	2.6	0.000	0.119	72.6	75	64.2	73.9	0.000	320	1	93.6	15
10/28/09	10:30a	2.56	381	0.3	0.02	1.2	0.000	0.107	72.8	75	64.4	74.2	0.000	310	1	90.6	15
10/28/09	10:45a	4.34	388	1.7	0.14	2.4	0.000	0.103	73.0	75	64.6	74.5	0.000	310	1	90.6	15
10/28/09	11:00a	5.16	622	2.0	0.16	3.5	0.000	0.096	73.1	75	64.7	74.6	0.007	321	1	93.9	15
10/28/09	11:15a	4.95	320	2.2	0.18	2.8	0.000	0.095	73.5	76	65.5	75.2	0.000	333	1	97.4	15
10/28/09	11:30a	5.74	388	2.7	0.22	3.9	0.000	0.089	74.0	77	66.3	75.9	0.000	337	1	98.5	15
10/28/09	11:45a	10.62	680	3.9	0.31	4.6	0.000	0.091	73.5	70	63.1	74.8	0.000	336	1	98.2	15
10/28/09	12:00p	14.19	698	4.7	0.38	4.8	0.000	0.099	71.6	62	57.9	71.5	0.012	339	1	99.1	15
10/28/09	12:15p	14.21	668	4.8	0.39	4.9	0.000	0.104	70.9	68	59.8	71.1	0.000	332	1	97.1	15
10/28/09	12:30p	14.94	784	4.8	0.39	5.1	0.000	0.113	71.9	73	62.8	72.8	0.000	343	1	100.0	15
10/28/09	12:45p	14.90	742	4.9	0.39	5.2	0.000	0.108	72.8	75	64.4	74.2	0.000	346	1	100.0	15
10/28/09	1:00p	14.92	701	5.1	0.41	5.1	0.000	0.113	71.6	67	60.1	71.9	0.018	342	1	100.0	15
10/28/09	1:15p	14.86	700	4.9	0.39	5.0	0.000	0.113	72.1	72	62.6	73.0	0.000	345	1	100.0	15

SJCA Site 21 10/28/09

Date	Time	Solar Energy	Hi Solar Rad.	UV Index	UV Dose	Hi UV	Heat D-D	Cool D-D	In Temp	In Hum	In Dew	In Heat	ET	Wind Samp	Wind Tx	ISS Recept	Arc. Int.
10/28/09	1:30p	14.79	710	4.9	0.39	4.9	0.000	0.113	72.4	73	63.3	73.5	0.000	342	1	100.0	15
10/28/09	1:45p	14.88	715	4.6	0.37	4.8	0.000	0.113	72.6	74	63.8	73.8	0.000	336	1	98.2	15
10/28/09	2:00p	14.51	696	4.3	0.35	4.6	0.000	0.115	72.8	74	64.0	74.1	0.020	336	1	98.2	15
10/28/09	2:15p	14.47	712	4.1	0.33	4.3	0.000	0.115	73.0	74	64.2	74.4	0.000	337	1	98.5	15
10/28/09	2:30p	13.87	652	3.7	0.30	4.0	0.000	0.118	73.3	73	64.1	74.8	0.000	340	1	99.4	15
10/28/09	2:45p	13.18	635	3.4	0.27	3.6	0.000	0.120	73.3	72	63.7	74.7	0.000	330	1	96.5	15
10/28/09	3:00p	12.58	603	3.0	0.24	3.2	0.000	0.122	72.1	62	58.4	72.2	0.019	340	1	99.4	15
10/28/09	3:15p	11.93	568	2.6	0.21	2.8	0.000	0.119	70.2	57	54.2	69.2	0.000	343	1	100.0	15
10/28/09	3:30p	11.25	541	2.2	0.18	2.4	0.000	0.120	70.1	64	57.4	69.7	0.000	341	1	99.7	15
10/28/09	3:45p	10.41	504	1.8	0.14	1.9	0.000	0.120	70.9	64	58.1	70.7	0.000	334	1	97.7	15
10/28/09	4:00p	9.55	462	1.4	0.11	1.5	0.000	0.118	69.7	56	53.3	68.6	0.016	335	1	98.0	15
10/28/09	4:15p	8.69	424	1.0	0.08	1.2	0.000	0.115	70.2	65	57.9	69.9	0.000	337	1	98.5	15
10/28/09	4:30p	7.65	380	0.7	0.06	0.8	0.000	0.113	70.4	58	54.9	69.5	0.000	330	1	96.5	15
10/28/09	4:45p	6.60	330	0.2	0.02	0.5	0.000	0.107	69.7	57	53.8	68.7	0.000	324	1	94.7	15
10/28/09	5:00p	5.48	278	0.0	0.00	0.0	0.000	0.105	69.2	57	53.3	68.3	0.012	331	1	96.8	15
10/28/09	5:15p	4.28	227	0.0	0.00	0.0	0.000	0.106	69.0	57	53.1	68.2	0.000	334	1	97.7	15
10/28/09	5:30p	3.03	171	0.0	0.00	0.0	0.000	0.100	68.7	57	52.8	67.9	0.000	326	1	95.3	15
10/28/09	5:45p	1.83	109	0.0	0.00	0.0	0.000	0.094	68.5	57	52.7	67.8	0.000	328	1	95.9	15
10/28/09	6:00p	0.56	58	0.0	0.00	0.0	0.000	0.084	69.0	64	56.3	68.8	0.005	333	1	97.4	15
10/28/09	6:15p	0.17	12	0.0	0.00	0.0	0.000	0.075	70.2	66	58.3	70.0	0.000	339	1	99.1	15
10/28/09	6:30p	0.00	5	0.0	0.00	0.0	0.000	0.068	71.1	66	59.2	71.1	0.000	337	1	98.5	15
10/28/09	6:45p	0.00	0	0.0	0.00	0.0	0.000	0.058	70.2	60	55.7	69.5	0.000	341	1	99.7	15
10/28/09	7:00p	0.00	0	0.0	0.00	0.0	0.000	0.056	70.2	66	58.3	70.0	0.001	344	1	100.0	15
10/28/09	7:15p	0.00	0	0.0	0.00	0.0	0.000	0.050	70.6	66	58.7	70.5	0.000	346	1	100.0	15
10/28/09	7:30p	0.00	0	0.0	0.00	0.0	0.000	0.044	70.9	66	59.0	70.9	0.000	346	1	100.0	15
10/28/09	7:45p	0.00	0	0.0	0.00	0.0	0.000	0.037	71.2	65	58.8	71.2	0.000	347	1	100.0	15
10/28/09	8:00p	0.00	0	0.0	0.00	0.0	0.000	0.026	71.4	65	59.0	71.5	0.001	346	1	100.0	15
10/28/09	8:15p	0.00	0	0.0	0.00	0.0	0.000	0.018	71.6	65	59.2	71.7	0.000	340	1	99.4	15
10/28/09	8:30p	0.00	0	0.0	0.00	0.0	0.000	0.012	71.6	64	58.8	71.7	0.000	330	1	96.5	15
10/28/09	8:45p	0.00	0	0.0	0.00	0.0	0.000	0.008	71.6	64	58.8	71.7	0.000	332	1	97.1	15
10/28/09	9:00p	0.00	0	0.0	0.00	0.0	0.000	0.004	71.6	64	58.8	71.7	0.001	331	1	96.8	15
10/28/09	9:15p	0.00	0	0.0	0.00	0.0	0.005	0.000	71.6	63	58.3	71.6	0.000	330	1	96.5	15
10/28/09	9:30p	0.00	0	0.0	0.00	0.0	0.008	0.000	71.6	63	58.3	71.6	0.000	329	1	96.2	15
10/28/09	9:45p	0.00	0	0.0	0.00	0.0	0.010	0.000	71.6	63	58.3	71.6	0.000	331	1	96.8	15
10/28/09	10:00p	0.00	0	0.0	0.00	0.0	0.016	0.000	71.6	63	58.3	71.6	0.001	331	1	96.8	15
10/28/09	10:15p	0.00	0	0.0	0.00	0.0	0.021	0.000	71.4	63	58.1	71.3	0.000	329	1	96.2	15
10/28/09	10:30p	0.00	0	0.0	0.00	0.0	0.024	0.000	71.4	63	58.1	71.3	0.000	328	1	95.9	15
10/28/09	10:45p	0.00	0	0.0	0.00	0.0	0.029	0.000	71.4	63	58.1	71.3	0.000	329	1	96.2	15
10/28/09	11:00p	0.00	0	0.0	0.00	0.0	0.034	0.000	71.2	63	58.0	71.0	0.001	327	1	95.6	15
10/28/09	11:15p	0.00	0	0.0	0.00	0.0	0.037	0.000	71.2	63	58.0	71.0	0.000	329	1	96.2	15
10/28/09	11:30p	0.00	0	0.0	0.00	0.0	0.037	0.000	71.2	63	58.0	71.0	0.000	331	1	96.8	15
10/28/09	11:45p	0.00	0	0.0	0.00	0.0	0.036	0.000	71.2	63	58.0	71.0	0.000	330	1	96.5	15
10/29/09	12:00a	0.00	0	0.0	0.00	0.0	0.033	0.000	71.1	63	57.9	70.9	0.001	334	1	97.7	15

SJCA Site 21 10/29/09

Date	Time	Solar Energy	Hi Solar Rad.	UV Index	UV Dose	Hi UV	Heat D-D	Cool D-D	In Temp	In Hum	In Dew	In Heat	ET	Wind Samp	Wind Tx	ISS Recept	Arc. Int.
10/29/09	12:15a	0.00	0	0.0	0.00	0.0	0.032	0.000	71.1	63	57.9	70.9	0.000	331	1	96.8	15
10/29/09	12:30a	0.00	0	0.0	0.00	0.0	0.031	0.000	71.1	63	57.9	70.9	0.000	332	1	97.1	15
10/29/09	12:45a	0.00	0	0.0	0.00	0.0	0.025	0.000	70.9	63	57.7	70.6	0.000	334	1	97.7	15
10/29/09	1:00a	0.00	0	0.0	0.00	0.0	0.015	0.000	70.9	63	57.7	70.6	0.001	332	1	97.1	15
10/29/09	1:15a	0.00	0	0.0	0.00	0.0	0.015	0.000	70.9	63	57.7	70.6	0.000	331	1	96.8	15
10/29/09	1:30a	0.00	0	0.0	0.00	0.0	0.018	0.000	70.9	63	57.7	70.6	0.000	332	1	97.1	15
10/29/09	1:45a	0.00	0	0.0	0.00	0.0	0.023	0.000	70.7	63	57.5	70.4	0.000	330	1	96.5	15
10/29/09	2:00a	0.00	0	0.0	0.00	0.0	0.022	0.000	70.7	63	57.5	70.4	0.001	332	1	97.1	15
10/29/09	2:15a	0.00	0	0.0	0.00	0.0	0.023	0.000	70.7	63	57.5	70.4	0.000	332	1	97.1	15
10/29/09	2:30a	0.00	0	0.0	0.00	0.0	0.029	0.000	70.7	63	57.5	70.4	0.000	333	1	97.4	15
10/29/09	2:45a	0.00	0	0.0	0.00	0.0	0.033	0.000	70.6	62	56.9	70.2	0.000	331	1	96.8	15
10/29/09	3:00a	0.00	0	0.0	0.00	0.0	0.037	0.000	70.6	62	56.9	70.2	0.001	331	1	96.8	15
10/29/09	3:15a	0.00	0	0.0	0.00	0.0	0.043	0.000	70.6	62	56.9	70.2	0.000	328	1	95.9	15
10/29/09	3:30a	0.00	0	0.0	0.00	0.0	0.046	0.000	70.4	62	56.8	69.9	0.000	330	1	96.5	15
10/29/09	3:45a	0.00	0	0.0	0.00	0.0	0.050	0.000	70.4	62	56.8	69.9	0.000	331	1	96.8	15
10/29/09	4:00a	0.00	0	0.0	0.00	0.0	0.053	0.000	70.4	62	56.8	69.9	0.001	330	1	96.5	15
10/29/09	4:15a	0.00	0	0.0	0.00	0.0	0.056	0.000	70.4	62	56.8	69.9	0.000	329	1	96.2	15
10/29/09	4:30a	0.00	0	0.0	0.00	0.0	0.056	0.000	70.2	62	56.6	69.7	0.000	331	1	96.8	15
10/29/09	4:45a	0.00	0	0.0	0.00	0.0	0.057	0.000	70.2	62	56.6	69.7	0.000	334	1	97.7	15
10/29/09	5:00a	0.00	0	0.0	0.00	0.0	0.057	0.000	70.2	62	56.6	69.7	0.001	329	1	96.2	15
10/29/09	5:15a	0.00	0	0.0	0.00	0.0	0.059	0.000	70.1	62	56.5	69.5	0.000	330	1	96.5	15
10/29/09	5:30a	0.00	0	0.0	0.00	0.0	0.060	0.000	70.1	62	56.5	69.5	0.000	331	1	96.8	15
10/29/09	5:45a	0.00	0	0.0	0.00	0.0	0.058	0.000	70.1	62	56.5	69.5	0.000	334	1	97.7	15
10/29/09	6:00a	0.00	0	0.0	0.00	0.0	0.056	0.000	70.1	62	56.5	69.5	0.001	331	1	96.8	15
10/29/09	6:15a	0.00	0	0.0	0.00	0.0	0.055	0.000	69.9	61	55.8	69.2	0.000	329	1	96.2	15
10/29/09	6:30a	0.00	0	0.0	0.00	0.0	0.053	0.000	69.9	61	55.8	69.2	0.000	332	1	97.1	15
10/29/09	6:45a	0.00	0	0.0	0.00	0.0	0.051	0.000	69.9	61	55.8	69.2	0.000	343	1	100.0	15
10/29/09	7:00a	0.00	0	0.0	0.00	0.0	0.048	0.000	70.2	62	56.6	69.7	0.001	340	1	99.4	15
10/29/09	7:15a	0.00	0	0.0	0.00	0.0	0.044	0.000	70.7	63	57.5	70.4	0.000	344	1	100.0	15
10/29/09	7:30a	0.00	0	0.0	0.00	0.0	0.043	0.000	71.2	62	57.5	70.9	0.000	345	1	100.0	15
10/29/09	7:45a	0.22	14	0.0	0.00	0.0	0.042	0.000	71.2	61	57.1	70.9	0.000	347	1	100.0	15
10/29/09	8:00a	0.39	23	0.0	0.00	0.0	0.041	0.000	71.1	61	57.0	70.7	0.001	345	1	100.0	15
10/29/09	8:15a	0.58	32	0.0	0.00	0.0	0.037	0.000	70.9	61	56.8	70.5	0.000	340	1	99.4	15
10/29/09	8:30a	0.65	39	0.0	0.00	0.0	0.036	0.000	70.7	61	56.6	70.2	0.000	336	1	98.2	15
10/29/09	8:45a	0.80	44	0.0	0.00	0.0	0.035	0.000	70.7	61	56.6	70.2	0.000	342	1	100.0	15
10/29/09	9:00a	1.31	74	0.0	0.00	0.0	0.042	0.000	70.6	61	56.5	70.1	0.002	343	1	100.0	15
10/29/09	9:15a	1.31	105	0.0	0.00	0.0	0.048	0.000	70.4	61	56.3	69.8	0.000	337	1	98.5	15
10/29/09	9:30a	3.46	216	0.1	0.01	0.5	0.045	0.000	70.2	61	56.1	69.6	0.000	341	1	99.7	15
10/29/09	9:45a	6.13	478	1.0	0.08	1.4	0.039	0.000	70.1	61	56.0	69.4	0.000	339	1	99.1	15
10/29/09	10:00a	4.64	308	1.0	0.08	1.2	0.041	0.000	69.9	61	55.8	69.2	0.005	339	1	99.1	15
10/29/09	10:15a	3.14	171	0.7	0.06	0.8	0.044	0.000	69.9	61	55.8	69.2	0.000	342	1	100.0	15
10/29/09	10:30a	2.28	127	0.2	0.02	0.6	0.046	0.000	69.7	61	55.6	69.1	0.000	347	1	100.0	15
10/29/09	10:45a	2.37	116	0.5	0.04	0.6	0.042	0.000	69.7	61	55.6	69.1	0.000	348	1	100.0	15
10/29/09	11:00a	2.11	105	0.3	0.02	0.6	0.040	0.000	69.6	61	55.6	69.0	0.003	343	1	100.0	15
10/29/09	11:15a	2.52	130	0.7	0.06	0.8	0.042	0.000	69.6	61	55.6	69.0	0.000	340	1	99.4	15
10/29/09	11:30a	2.49	139	0.7	0.06	0.9	0.042	0.000	69.6	61	55.6	69.0	0.000	341	1	99.7	15
10/29/09	11:45a	2.32	130	0.7	0.06	0.8	0.043	0.000	69.9	62	56.3	69.3	0.000	340	1	99.4	15
10/29/09	12:00p	1.81	105	0.3	0.02	0.8	0.045	0.000	70.2	62	56.6	69.7	0.003	345	1	100.0	15
10/29/09	12:15p	2.82	185	1.0	0.08	1.6	0.047	0.000	70.7	62	57.0	70.3	0.000	345	1	100.0	15
10/29/09	12:30p	2.13	141	0.7	0.06	1.4	0.048	0.000	70.9	62	57.2	70.5	0.000	344	1	100.0	15
10/29/09	12:45p	2.09	114	0.7	0.06	0.8	0.048	0.000	71.1	62	57.4	70.8	0.000	343	1	100.0	15
10/29/09	1:00p	2.11	125	0.7	0.06	0.9	0.047	0.000	71.1	62	57.4	70.8	0.003	341	1	99.7	15
10/29/09	1:15p	2.69	165	0.9	0.07	1.4	0.045	0.000	71.1	62	57.4	70.8	0.000	341	1	99.7	15

SJCA Site 21 10/29/09

Date	Time	Solar Energy	Hi Solar Rad.	UV Index	UV Dose	Hi UV	Heat D-D	Cool D-D	In Temp	In Hum	In Dew	In Heat	ET	Wind Samp	Wind Tx	ISS Recept	Arc. Int.
10/29/09	1:30p	2.47	163	0.8	0.06	1.3	0.043	0.000	70.9	62	57.2	70.5	0.000	338	1	98.8	15
10/29/09	1:45p	2.26	155	0.6	0.05	1.2	0.045	0.000	70.7	62	57.0	70.3	0.000	342	1	100.0	15
10/29/09	2:00p	2.62	142	0.9	0.07	1.1	0.048	0.000	70.6	62	56.9	70.2	0.003	334	1	97.7	15
10/29/09	2:15p	2.02	111	0.5	0.04	0.7	0.048	0.000	70.4	62	56.8	69.9	0.000	341	1	99.7	15
10/29/09	2:30p	1.72	114	0.2	0.02	0.7	0.045	0.000	70.2	62	56.6	69.7	0.000	342	1	100.0	15
10/29/09	2:45p	1.42	81	0.0	0.00	0.0	0.051	0.000	70.1	62	56.5	69.5	0.000	341	1	99.7	15
10/29/09	3:00p	1.74	95	0.0	0.00	0.0	0.048	0.000	69.9	62	56.3	69.3	0.002	343	1	100.0	15
10/29/09	3:15p	1.48	72	0.0	0.00	0.0	0.046	0.000	69.7	61	55.6	69.1	0.000	347	1	100.0	15
10/29/09	3:30p	1.10	63	0.0	0.00	0.0	0.046	0.000	69.7	61	55.6	69.1	0.000	342	1	100.0	15
10/29/09	3:45p	1.05	58	0.0	0.00	0.0	0.046	0.000	69.9	62	56.3	69.3	0.000	347	1	100.0	15
10/29/09	4:00p	1.10	72	0.0	0.00	0.0	0.044	0.000	70.2	62	56.6	69.7	0.002	349	1	100.0	15
10/29/09	4:15p	1.03	72	0.0	0.00	0.0	0.044	0.000	70.2	62	56.6	69.7	0.000	342	1	100.0	15
10/29/09	4:30p	0.84	54	0.0	0.00	0.0	0.048	0.000	70.2	62	56.6	69.7	0.000	340	1	99.4	15
10/29/09	4:45p	0.86	56	0.0	0.00	0.0	0.051	0.000	70.1	62	56.5	69.5	0.000	340	1	99.4	15
10/29/09	5:00p	0.54	30	0.0	0.00	0.0	0.054	0.000	70.1	62	56.5	69.5	0.002	340	1	99.4	15
10/29/09	5:15p	0.45	23	0.0	0.00	0.0	0.055	0.000	69.9	62	56.3	69.3	0.000	335	1	98.0	15
10/29/09	5:30p	0.41	23	0.0	0.00	0.0	0.053	0.000	69.9	62	56.3	69.3	0.000	336	1	98.2	15
10/29/09	5:45p	0.28	14	0.0	0.00	0.0	0.054	0.000	69.7	62	56.1	69.2	0.000	340	1	99.4	15
10/29/09	6:00p	0.04	7	0.0	0.00	0.0	0.056	0.000	69.7	62	56.1	69.2	0.001	340	1	99.4	15
10/29/09	6:15p	0.00	0	0.0	0.00	0.0	0.061	0.000	69.7	62	56.1	69.2	0.000	342	1	100.0	15
10/29/09	6:30p	0.00	0	0.0	0.00	0.0	0.058	0.000	69.6	62	56.0	69.1	0.000	340	1	99.4	15
10/29/09	6:45p	0.00	0	0.0	0.00	0.0	0.057	0.000	69.6	62	56.0	69.1	0.000	339	1	99.1	15
10/29/09	7:00p	0.00	0	0.0	0.00	0.0	0.061	0.000	69.6	62	56.0	69.1	0.001	342	1	100.0	15
10/29/09	7:15p	0.00	0	0.0	0.00	0.0	0.063	0.000	69.6	62	56.0	69.1	0.000	338	1	98.8	15
10/29/09	7:30p	0.00	0	0.0	0.00	0.0	0.061	0.000	69.4	62	55.8	68.9	0.000	338	1	98.8	15
10/29/09	7:45p	0.00	0	0.0	0.00	0.0	0.059	0.000	69.4	62	55.8	68.9	0.000	339	1	99.1	15
10/29/09	8:00p	0.00	0	0.0	0.00	0.0	0.061	0.000	69.4	62	55.8	68.9	0.001	339	1	99.1	15
10/29/09	8:15p	0.00	0	0.0	0.00	0.0	0.061	0.000	69.4	61	55.4	68.8	0.000	338	1	98.8	15
10/29/09	8:30p	0.00	0	0.0	0.00	0.0	0.061	0.000	69.4	61	55.4	68.8	0.000	342	1	100.0	15
10/29/09	8:45p	0.00	0	0.0	0.00	0.0	0.061	0.000	69.2	61	55.2	68.7	0.000	340	1	99.4	15
10/29/09	9:00p	0.00	0	0.0	0.00	0.0	0.063	0.000	69.2	61	55.2	68.7	0.001	338	1	98.8	15
10/29/09	9:15p	0.00	0	0.0	0.00	0.0	0.065	0.000	69.2	61	55.2	68.7	0.000	338	1	98.8	15
10/29/09	9:30p	0.00	0	0.0	0.00	0.0	0.066	0.000	69.2	61	55.2	68.7	0.000	337	1	98.5	15
10/29/09	9:45p	0.00	0	0.0	0.00	0.0	0.067	0.000	69.2	61	55.2	68.7	0.000	339	1	99.1	15
10/29/09	10:00p	0.00	0	0.0	0.00	0.0	0.067	0.000	69.0	61	55.0	68.5	0.001	343	1	100.0	15
10/29/09	10:15p	0.00	0	0.0	0.00	0.0	0.068	0.000	69.0	61	55.0	68.5	0.000	336	1	98.2	15
10/29/09	10:30p	0.00	0	0.0	0.00	0.0	0.069	0.000	69.0	61	55.0	68.5	0.000	336	1	98.2	15
10/29/09	10:45p	0.00	0	0.0	0.00	0.0	0.070	0.000	69.0	61	55.0	68.5	0.000	341	1	99.7	15
10/29/09	11:00p	0.00	0	0.0	0.00	0.0	0.070	0.000	69.0	61	55.0	68.5	0.001	339	1	99.1	15
10/29/09	11:15p	0.00	0	0.0	0.00	0.0	0.070	0.000	69.0	61	55.0	68.5	0.000	336	1	98.2	15
10/29/09	11:30p	0.00	0	0.0	0.00	0.0	0.070	0.000	68.9	60	54.4	68.3	0.000	338	1	98.8	15
10/29/09	11:45p	0.00	0	0.0	0.00	0.0	0.071	0.000	68.9	60	54.4	68.3	0.000	340	1	99.4	15
10/30/09	12:00a	0.00	0	0.0	0.00	0.0	0.070	0.000	68.9	60	54.4	68.3	0.001	338	1	98.8	15

SJCA Site 21 10/30/09

Date	Time	Solar Energy	Hi Solar Rad.	UV Index	UV Dose	Hi UV	Heat D-D	Cool D-D	In Temp	In Hum	In Dew	In Heat	ET	Wind Samp	Wind Tx	ISS Recept	Arc. Int.
10/30/09	12:15a	0.00	0	0.0	0.00	0.0	0.071	0.000	68.9	60	54.4	68.3	0.000	286	1	83.6	15
10/30/09	12:30a	0.00	0	0.0	0.00	0.0	0.072	0.000	68.9	60	54.4	68.3	0.000	337	1	98.5	15
10/30/09	12:45a	0.00	0	0.0	0.00	0.0	0.073	0.000	68.9	60	54.4	68.3	0.000	337	1	98.5	15
10/30/09	1:00a	0.00	0	0.0	0.00	0.0	0.074	0.000	68.9	60	54.4	68.3	0.001	340	1	99.4	15
10/30/09	1:15a	0.00	0	0.0	0.00	0.0	0.074	0.000	68.9	60	54.4	68.3	0.000	336	1	98.2	15
10/30/09	1:30a	0.00	0	0.0	0.00	0.0	0.075	0.000	68.9	60	54.4	68.3	0.000	338	1	98.8	15
10/30/09	1:45a	0.00	0	0.0	0.00	0.0	0.078	0.000	68.9	60	54.4	68.3	0.000	334	1	97.7	15
10/30/09	2:00a	0.00	0	0.0	0.00	0.0	0.083	0.000	68.7	60	54.3	68.2	0.001	336	1	98.2	15
10/30/09	2:15a	0.00	0	0.0	0.00	0.0	0.085	0.000	68.7	59	53.8	68.1	0.000	336	1	98.2	15
10/30/09	2:30a	0.00	0	0.0	0.00	0.0	0.083	0.000	68.7	59	53.8	68.1	0.000	335	1	98.0	15
10/30/09	2:45a	0.00	0	0.0	0.00	0.0	0.081	0.000	68.7	59	53.8	68.1	0.000	339	1	99.1	15
10/30/09	3:00a	0.00	0	0.0	0.00	0.0	0.080	0.000	68.7	59	53.8	68.1	0.001	337	1	98.5	15
10/30/09	3:15a	0.00	0	0.0	0.00	0.0	0.078	0.000	68.5	59	53.6	68.0	0.000	338	1	98.8	15
10/30/09	3:30a	0.00	0	0.0	0.00	0.0	0.078	0.000	68.5	59	53.6	68.0	0.000	342	1	100.0	15
10/30/09	3:45a	0.00	0	0.0	0.00	0.0	0.077	0.000	68.5	59	53.6	68.0	0.000	342	1	100.0	15
10/30/09	4:00a	0.00	0	0.0	0.00	0.0	0.076	0.000	68.5	59	53.6	68.0	0.001	338	1	98.8	15
10/30/09	4:15a	0.00	0	0.0	0.00	0.0	0.074	0.000	68.5	59	53.6	68.0	0.000	337	1	98.5	15
10/30/09	4:30a	0.00	0	0.0	0.00	0.0	0.072	0.000	68.5	59	53.6	68.0	0.000	340	1	99.4	15
10/30/09	4:45a	0.00	0	0.0	0.00	0.0	0.073	0.000	68.5	59	53.6	68.0	0.000	340	1	99.4	15
10/30/09	5:00a	0.00	0	0.0	0.00	0.0	0.074	0.000	68.5	59	53.6	68.0	0.001	341	1	99.7	15
10/30/09	5:15a	0.00	0	0.0	0.00	0.0	0.073	0.000	68.5	59	53.6	68.0	0.000	342	1	100.0	15
10/30/09	5:30a	0.00	0	0.0	0.00	0.0	0.073	0.000	68.5	59	53.6	68.0	0.000	340	1	99.4	15
10/30/09	5:45a	0.00	0	0.0	0.00	0.0	0.073	0.000	68.5	60	54.1	68.0	0.000	340	1	99.4	15
10/30/09	6:00a	0.00	0	0.0	0.00	0.0	0.074	0.000	68.5	60	54.1	68.0	0.001	342	1	100.0	15
10/30/09	6:15a	0.00	0	0.0	0.00	0.0	0.074	0.000	68.4	60	54.0	68.0	0.000	343	1	100.0	15
10/30/09	6:30a	0.00	0	0.0	0.00	0.0	0.075	0.000	68.5	60	54.1	68.0	0.000	338	1	98.8	15
10/30/09	6:45a	0.00	0	0.0	0.00	0.0	0.075	0.000	68.4	60	54.0	68.0	0.000	342	1	100.0	15
10/30/09	7:00a	0.00	0	0.0	0.00	0.0	0.074	0.000	68.5	61	54.5	68.1	0.000	340	1	99.4	15
10/30/09	7:15a	0.00	0	0.0	0.00	0.0	0.073	0.000	68.7	61	54.7	68.3	0.000	343	1	100.0	15
10/30/09	7:30a	0.02	7	0.0	0.00	0.0	0.073	0.000	68.9	60	54.4	68.3	0.000	340	1	99.4	15
10/30/09	7:45a	0.30	23	0.0	0.00	0.0	0.074	0.000	68.9	60	54.4	68.3	0.000	342	1	100.0	15
10/30/09	8:00a	0.58	42	0.0	0.00	0.0	0.075	0.000	68.9	60	54.4	68.3	0.001	340	1	99.4	15
10/30/09	8:15a	0.95	65	0.0	0.00	0.0	0.072	0.000	69.2	61	55.2	68.7	0.000	345	1	100.0	15
10/30/09	8:30a	1.78	121	0.0	0.00	0.0	0.069	0.000	69.6	61	55.6	69.0	0.000	328	1	95.9	15
10/30/09	8:45a	3.27	204	0.0	0.00	0.0	0.064	0.000	69.7	60	55.2	69.0	0.000	320	1	93.6	15
10/30/09	9:00a	2.73	206	0.0	0.00	0.0	0.061	0.000	69.7	60	55.2	69.0	0.003	331	1	96.8	15