



**Final**  
**Phase I Environmental Site Assessment**  
**Environmental Re-Evaluation of I-25**  
**Highway 105 to Woodmen Road**  
**El Paso County, Colorado**

Project Information  
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**Prepared For:**  
*Wilson & Company*  
*5755 Mark Dabling Boulevard, Suite 220*  
*Colorado Springs, Colorado 80919*

*and*

*Colorado Department of Transportation*  
*Region 2*  
*1480 Quail Lake Loop, Suite A*  
*Colorado Springs, Colorado 80906*

**Prepared By:**  
*SUMMIT Technical Resources, Inc.*  
*5460 Ward Road, Suite 205*  
*Arvada, Colorado 80002*

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## EXECUTIVE SUMMARY

Summit Technical Resources, Inc. (SUMMIT), conducted a Phase I Environmental Site Assessment (ESA) for the Colorado Department of Transportation (CDOT), Region 2, Environmental Re-Evaluation of I-25 project, from Highway 105 to Woodmen Road (Site), in El Paso County, Colorado. The site visit was performed on January 17, 2012 by Ms. Monique Ammidown (SUMMIT).

The purpose of the inspection was to visually obtain information indicating the likelihood of potential environmental conditions in connection with the Site. This report includes a summary of the records review and site visit, as well as copies of supporting documentation and the CDOT Form 881, Initial Site Inspection Checklist which was completed for this project.

A total of five sites were identified as sites of potential concern presenting recognized environmental conditions or historic recognized environmental conditions. The following three sites are located at Highway 105 and I-25:

- Conoco Fuel Stop (currently doing business as Circle K) located at 534 Highway 105, in Monument, Colorado.
- Amoco Gas Station (currently doing business as Conoco) located at 1949 Woodmoor Drive, Monument, Colorado
- Southland 7 11 located at 283 Highway 105, in Monument, Colorado.

The following site is located at Baptist Road and I-25:

- Diamond Shamrock located at 1310 West Baptist Road, in Monument, Colorado.

The following site is located at Woodmen Road and I-25:

- Tiffany Square Mall located at 6805 Corporate Drive, in Colorado Springs, Colorado.

Of these five sites, three of the sites are recommended for further investigation based on known groundwater contamination, potential for purchase, proximity to the Site, and/or located upgradient of the Site. The **Conoco Fuel Stop**, **Amoco Gas Station**, and **Diamond Shamrock** are all active leaking underground storage tank (LUST) sites with ongoing groundwater remediation and monitoring.

The Southland 7 11 is also an active LUST site. However, this facility is located downgradient of the subject Site and at a significant enough distance as to not pose a concern. The Tiffany Square Mall is considered a historic recognized environmental condition as a release from an underground storage tank (LUST), and subsequent remediation and No Further Action Designation was over 20 years ago. The site is also located topographically downgradient of the subject Site. Therefore this site does not appear to pose a concern. No further investigation is recommended for either of these two sites.

**Lead-based paint** was detected at the **Academy Boulevard bridge**. Numerous **transformers** (potential for polychlorinated biphenyl-containing materials) were observed inside and within

close proximity of the CDOT right-of-way. Appropriate demolition, handling, and disposal practices for these hazardous materials as required by regulatory guidelines should be followed during demolition activities associated with the I-25 expansion.

## Phase I Environmental Site Assessment

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## Acronyms

AAI	All Appropriate Inquiry
AIRS	Aerometric Information Retrieval System
AST	aboveground storage tank
ASTM	American Society for Testing and Materials
bgs	below ground surface
CAP	Corrective Action Plan
CDLE	Colorado Department of Labor and Employment
CDOT	Colorado Department of Transportation
CERC-NFRAP	Comprehensive Environmental Response Compensation and Liability Information System-No Further Remedial Action Planned
CFR	Code of Federal Regulations
CORRACTS	RCRA Corrective Action Sites
COSMIX	Colorado Springs Metro Interstate Expansion
COSTIS	Colorado Storage Tank Information System
DOD	Department of Defense
EA	Environmental Assessment
EDR	Environmental Data Resources, Inc.
ERNS	Emergency Response Notification System
ESA	Phase I Environmental Site Assessment
FEMA	Federal Emergency Management Agency
FINDS	Facility Index System
ISA Checklist	CDOT Form 881, Initial Site Inspection Checklist
Kumar	Kumar and Associates
LBP	lead-based paint
LPG	liquid petroleum gas
LUST	leaking underground storage tank
MESA	Modified Environmental Site Assessment
NEPA	National Environmental Policy Act
NFA	No Further Action
OPS	Oil and Public Safety
OSHA	Occupational Safety and Health Administration
PADS	PCB Activity Database
PCB	polychlorinated biphenyl
RBSL	risk-based screening level
RCRA	Resource Conservation and Recovery Act
RCRA-NonGen	RCRA-Non Generators
RCRA-SQG	RCRA-Small Quantity Generator
RCRS-CESQG	RCRA-Conditionally Exempt Small Quantity Generator
ROW	right-of-way
SCR	Site Characterization Report
SSF	Site Summary Form
SUMMIT	Summit Technical Resources, Inc.
TCLP	Toxicity Characteristic Leaching Procedure
UMCR	Upper Monument Creek
USAF Academy	U.S. Air Force Academy
USEPA	U.S. Environmental Protection Agency
USGS	United States Geological Survey
UST	underground storage tank
WWTF	wastewater treatment facility

## 1.0 Introduction

Summit Technical Resources, Inc. (SUMMIT), conducted a Phase I Environmental Site Assessment (ESA) for the Colorado Department of Transportation (CDOT), Region 2, Environmental Re-Evaluation of I-25 project, from Highway 105 to Woodmen Road (Site), in El Paso County, Colorado.

The site visit was performed on January 17, 2012 by Ms. Monique Ammidown (SUMMIT). The purpose of the inspection was to visually obtain information indicating the likelihood of potential environmental conditions in connection with the Site. The Site was traversed by foot at major intersections, and visually observed from the roadway between intersections. The weather during the site visit was sunny and dry, with an average temperature approximately 40 degrees Fahrenheit and winds up to 20 miles per hour. Traffic along I-25 was constant, with heavier traffic at the intersections.

For discussion purposes in this report, the Site is broken into six segments, moving north to south along I-25:

Segment 1 – The intersection of I-25 and Highway 105 to just north of Baptist Road.

Segment 2 – The intersection of I-25 and Baptist Road to just north of Northgate Boulevard.

Segment 3 – The intersection of I-25 and Northgate Boulevard to just north of Interquest Parkway.

Segment 4 – The intersection of I-25 and Interquest Parkway to just north of Briargate Boulevard.

Segment 5 – The intersection of I-25 and Briargate Boulevard to just north of Academy Boulevard.

Segment 6 – The intersection of I-25 and Academy Boulevard to just south of Woodmen Road.

This report includes the following figures and appendices for reference. Figure 1 presents the location of the Site, Figures 2 through 6 show each of the Segments along with selected sites identified in the regulatory database. Appendix A includes the Environmental Data Resources, Inc. (EDR) DataMap™ Well Search Report. Appendix B includes the EDR DataMap™ Area Study. Topographic maps are included in Appendix C. Site photographs are included in Appendix D. Appendix E includes a completed CDOT Form 881, Initial Site Assessment Checklist (ISA Checklist).

### 1.1 Scope of Services, Methodology, and Limitations

This ESA was performed in general accordance with American Society for Testing and Materials (ASTM) E1527-05, *Standard Practice for Environmental Site Assessments: Phase I Environmental Site Assessment Process* and the U.S. Environmental Protection Agency All Appropriate Inquiries (AAI) Final Rule at 40 Code of Federal Regulations [CFR] Part 312. The

ESA is also a requirement of the National Environmental Policy Act (NEPA) for federally funded projects. Deviations from the ASTM standard are discussed in Section 1.2 below.

In accordance with the Scope of Services and SUMMIT's understanding of CDOT's requirements for this project, the objectives of this ESA were to:

- Perform historical and regulatory records review for the Site;
- Conduct a visual inspection of the Site;
- Provide completed CDOT Form 881 for the Site;
- Review the Modified Environmental Site Assessment (MESA) completed by Kumar and Associates (Kumar) in 2002 (Kumar 2002), referred to as the 2002 MESA hereafter, and identify any Site conditions which have changed since the completion of the 2002 MESA.

This ESA report has been prepared for the exclusive use of CDOT for the sole purpose of assisting in the evaluation of current and/or historical environmental conditions associated with the Site. The purpose of this ESA is to identify, to the extent feasible, *recognized environmental conditions* and *historical recognized environmental conditions* in connection with the Site.

The findings of this ESA, as represented within this report, must be viewed in recognition of certain limiting conditions. The scope of work commissioned for this project represents a reasonable inquiry, consistent with good commercial practice, in accordance with ASTM Standard E 1527-05 and the USEPA AAI Final Rule (40 CFR 312). The intent of this report is not as an exhaustive investigation, nor does it include an evaluation of issues that are not addressed in the ASTM Standard. This assessment is intended to reduce, but not eliminate, the level of uncertainty regarding the potential for current and/or historical environmental conditions associated with the Site.

The findings presented herein are based upon observations of Site conditions as of the date the assessment was performed and the findings and conclusions presented herein should not be assumed to apply to conditions or operating practices on this property occurring subsequent to actual on-site investigation. During the course of this assessment, the consultant has relied on information provided by outside sources, including but not limited to Site owner(s) and/or operator(s), appropriate local government officials, regulatory agencies and *reasonably ascertainable* standard records sources. For the purposes of this assessment, such third-party information is assumed to be accurate unless otherwise noted, and the consultant cannot verify, nor does the consultant guarantee the information obtained from third-party sources. Additionally, it should be noted that the accessibility of data may be limited, particularly in regard to historical Site uses. Any such limitations that are essential to the conclusions of the Site assessment have been identified in the Phase I ESA report.

The consultant's intention to complete the agreed scope of services within the proposed cost and time are based upon certain assumptions. These include the cooperation of the Site owners and occupants, and full access to the entire Site without delay or re-work. The consultant also assumes that CDOT personnel will communicate any specialized knowledge or experience that is material to *recognized environmental conditions* or *historical recognized environmental conditions* in connection with the property to the consultant prior to the Site visit.



There are additional considerations CDOT may wish to address in connection with a Phase I ESA. These services are outside the scope of work considered for a Phase I ESA as defined in the ASTM Standard E 1527-05. Examples of additional, but not all inclusive, considerations are listed below:

- Archeological, Historical, or other Cultural Resources
- Asbestos-Containing Materials
- Lead in Drinking Water
- Wetlands
- Ecological Resources
- Regulatory Compliance
- Industrial Hygiene
- Indoor Air Quality
- Occupational Safety and Health Hazards
- Radon
- Threatened or Endangered Plants and Animals
- Biological Agents
- Mold

The conclusions submitted in this report are based upon the site observations, data obtained from records and historical sources, and the anticipated use of the Site. The conclusions provided herein may change if the CDOT project scope or project Site changes, or if the CDOT project scope requires direct exposure to documented contamination. Nature and extent of soil or groundwater contamination was not evaluated as part of this ESA.

## **1.2 Exceptions, Deviations, and Data Gaps**

A city directory review, environmental lien search, property tax files review, land title records review, building department records review, and interviews of current and historic property owners were not conducted/completed for the Site as these resources are not considered *reasonably ascertainable* due to the size of the Site (an approximate 12.5-mile long corridor).

Only the visible land surface, features, and property conditions were observed during the site visit. Not all properties were immediately accessible and were therefore observed from a distance. Due to constant traffic conditions which presented a safety issue, SUMMIT personnel did not traverse the CDOT right-of-way (ROW) between major intersections. A visual inspection was conducted from the vehicle during numerous passes, and major observations were noted. Inspections of building interiors were not conducted as part of the scope of services.

Historical resources were not readily available in 5 year increments, however the dates available were sufficient to assist with identification of historic Site uses, and the general uses of the adjacent properties.

A limited records review was conducted for sites of concern identified by the regulatory database search. Only available digital (on-line) records were reviewed in order to provide an overall summary of environmental conditions/actions which have occurred at any sites of concern.

As part of a CDOT MESA, lead-based paint (LBP) samples are required to be collected from any surfaces with suspect LBP expected to be affected by construction activities (e.g. modification or demolition). No LBP samples were collected as part of this ESA because LBP samples were collected during the 2002 MESA (Kumar 2002) and it is assumed that any LBP conditions found during the 2002 MESA have either not changed, or new construction has occurred since that time and the LBP no longer exists. Refer to Section 3 for a summary of the LBP results from the 2002 MESA.

A review of available Sanborn Fire Insurance Maps found that maps were only available for Colorado City (known as Old Colorado City which is now part of Colorado Springs, not today's Colorado City which is located between Pueblo and Walsenburg), Colorado Springs, and Manitou Springs, which had development prior to 1907. Therefore, no Sanborn Fire Insurance Maps were available for the Site.

### 1.3 Historic and Regulatory Resources Used

This section provides a summary of the resources reviewed for this project.

- Modified Environmental Site Assessment, Interstate 25 Corridor, State Highway 105 to South Academy Boulevard, El Paso County, Colorado, prepared by Kumar and Associates on February 13, 2002, revised October 22, 2002.
- United States Geological Survey (USGS) Store Map Locator and Downloader: [http://store.usgs.gov/b2c\\_usgs/usgs/maplocator/\(xcm=r3standardpitrex\\_prd&layout=6\\_1\\_61\\_48&uiarea=2&ctype=areaDetails&care=%24ROOT\)/.do](http://store.usgs.gov/b2c_usgs/usgs/maplocator/(xcm=r3standardpitrex_prd&layout=6_1_61_48&uiarea=2&ctype=areaDetails&care=%24ROOT)/.do). The following available digital maps were downloaded on January 5, 2012:
  - Monument, Colorado, 7.5-Minute Quadrangle – 1954, 1961, 1961 (photorevised 1959), 1961 (photorevised 1969), 1961 (photorevised 1969 and 1971), 1986, and 2010
  - Pikeview, Colorado, 7.5-Minute Quadrangle – 1948, 1949, 1961, 1961 (photorevised 1969), 1961 (photorevised 1969 and 1975), 1986, 1986 (revised 1994), and 2010.
  - Castle Rock, Colorado, 30-Minute Quadrangle – 1894, 1894 (reprinted 1898), 1913, 1913 (reprinted 1914, 1928, 1942, 1948)
  - Colorado Springs, Colorado, 15-Minute Quadrangle – 1948, 1951
  - Colorado Springs, Colorado, 30-Minute Quadrangle – 1893, 1893 (reprinted 1898), 1909, 1909 (reprinted 1914, 1921, 1932, 1942)
- USGS National Geologic Map Database [http://ngmdb.usgs.gov/ngmdb/ngmdb\\_home.html](http://ngmdb.usgs.gov/ngmdb/ngmdb_home.html). The following geologic maps were reviewed on January 26, 2012:

- Geologic Map of the Monument Quadrangle, El Paso County, Colorado: Colorado Geological Survey Open-File Report OF02-04, Thorson, J.P. and Madole, R.F., 2004, 1:24000.
- Geologic Map of the Pikeview 7.5-Minute Quadrangle, El Paso, County, Colorado: Colorado Geological Survey, Open-File Report, OF01-03, Thorson, J.P. and Carroll, C.J., 2002, 1:24000.
- Geologic map of the Colorado Springs-Castle Rock Area, Front Range Urban Corridor, Colorado: U.S. Geological Survey, Miscellaneous Investigations Series Map I-857-F, Scale 1:100000, Trimble, D.E. and Machette, M.N., 1979.
- Federal Emergency Management Agency (FEMA) Issued Flood Maps for El Paso, County, Colorado:  
<https://msc.fema.gov/webapp/wcs/stores/servlet/CategoryDisplay?catalogId=10001&storeId=10001&categoryId=12001&langId=-1&userType=G&type=1&future=false>. The following FEMA map panels were reviewed on January 26, 2012:
  - 08041C0278 F, 08041C0286 F, 08041C0287 F, 08041C0290 F, 08041C0504 F, 08041C0506 F, 08041C0508 F
- FEMA Flood Map Viewer: <https://hazards.fema.gov/wps/portal/mapviewer>.
- FEMA Flood Zone definitions:  
[http://www.fema.gov/plan/prevent/floodplain/nfipkeywords/flood\\_zones.shtm](http://www.fema.gov/plan/prevent/floodplain/nfipkeywords/flood_zones.shtm).
- University of Colorado at Boulder, Sanborn Fire Insurance Map Collection, El Paso, County, Colorado:  
<http://libcudl.colorado.edu:8180/luna/servlet/view/all?sort=City%2CDate%2CSheet>.
- Google Earth Aerial Photographs, 1999, 2003, 2004, 2005, 2006, 2008, 2010, and 2011.
- USGS Ground Water Atlas of the United States, Arizona, Colorado, New Mexico, Utah, HA 730-C, 1995
- EDR DataMap™ Area Study, January 10, 2012.
- EDR DataMap™ Well Search Report, January 10, 2012.
- Colorado Department of Labor and Employment (CDLE), Oil Inspection Section, Oil and Public Safety (OPS), Colorado Storage Tank Information System (COSTIS) records:  
<http://costis.cdle.state.co.us/ois2000/home.asp>.
- U.S. Environmental Protection Agency (USEPA), Envirofacts:  
<http://www.epa.gov/enviro/facts/cerclis/search.html>.

For both the EDR Area Study and the Well Search Report, a 1000-foot buffer was selected from the centerline of I-25 (and associated interchanges). The search radius was expanded to 1 mile

outside this buffer for all regulatory databases, which meets or exceeds the minimum ASTM search distances for the standard environmental record sources.

## 1.4 Definitions

Recognized environmental conditions, as defined in ASTM E1527-05, are conditions that indicate “the presence or likely presence of any hazardous substances or petroleum products on a property under conditions that indicate an existing release, a past release, or a material threat of a release of any hazardous substances or petroleum products into structures on the property or into the ground, ground water, or surface water of the property.” Historic recognized environmental condition are defined by ASTM as “an environmental condition which in the past would have been considered a recognized environmental condition, but which may or may not be considered a recognized environmental condition currently. ... If a past release of any hazardous substances or petroleum products has occurred in connection with the property and has been remediated, with such remediation accepted by the responsible regulatory agency (for example, as evidenced by the issuance of a no further action letter or equivalent), this condition shall be considered an historical recognized environmental condition ... If this historical recognized environmental condition is determined to be a recognized environmental condition at the time the Phase I Environmental Site Assessment is conducted, the condition shall be identified as such ...” Conditions determined to be *de minimis* are not recognized environmental conditions.

FEMA flood zones identified as part of this ESA, and associated definitions are as follows:

Zone A: “Areas subject to inundation by the 1-percent-annual-chance flood event generally determined using approximate methodologies. Because detailed hydraulic analyses have not been performed, no Base Flood Elevations or flood depths are shown. Mandatory flood insurance purchase requirements and floodplain management standards apply.”

Zone AE: “Areas subject to inundation by the 1-percent-annual-chance flood event determined by detailed methods. Base Flood Elevations are shown. Mandatory flood insurance purchase requirements and floodplain management standards apply.”

Zone AH: “Areas subject to inundation by 1-percent-annual-chance shallow flooding (usually areas of ponding) where average depths are between one and three feet. Base Flood Elevations derived from detailed hydraulic analyses are shown in this zone. Mandatory flood insurance purchase requirements and floodplain management standards apply.”

## 2.0 General Site Information

The following section summarizes the project description, and the overall Site description based on site visit observations and records review including geologic maps, topographic maps, and groundwater resources. This section also includes a summary of the regulatory records search. Detailed findings for each Segment of the Site are included in Section 3.

### 2.1 Project Description

Wilson & Company prepared an Environmental Assessment (EA) and Finding of No Significant Impact (FONSI) in 2004 for the widening of I-25 between the Highway 105 (milepost 161) and South Academy Boulevard (milepost 135). A portion of the EA's proposed action has been implemented as part of the Colorado Springs Metro Interstate Expansion (COSMIX) project from June 2005 through December 2007, which included the expansion and improvement of I-25 from Woodmen Road (milepost 149) to South Academy Boulevard (milepost 135). Because the approved EA and FONSI are over seven years old, a re-evaluation of the area from Highway 105 (milepost 161) to Woodmen Road (milepost 149) is required.

### 2.2 Site Description

The Site includes an approximate 12.5-mile long corridor of CDOT ROW and permanent easement from the U.S. Air Force Academy (USAF Academy) from Highway 105 (milepost 161) to Woodmen Road (milepost 149). The ROW varies in width throughout the corridor, depending on the location. The Site includes the undeveloped ROW on either side of I-25 and associated interchanges along with the roadways which are concrete or asphalt paved. The undeveloped land was generally covered with native grasses, bushes, weeds, and trees. No evidence of dumping or stressed vegetation was observed. Most utilities were located outside the ROW, with the exception of buried fiber optic cable lines which were located throughout the entire Site in the ROW on the east side of I-25, and number of transformers (refer to Section 3).

#### 2.2.1 Geology

Based on the geologic maps of the Monument and Pikeview Quadrangles (Thorson and Madole 2004, Thorson and Carroll 2002), general surficial geology found throughout the Site include the following:

- Artificial fill – fill and waste rock placed during infrastructure construction.
- Channel and floodplain alluvium (late Holocene) – gravel, sand, silt, and clay underlying minor floodplains, stream channels, and locally low terraces flanking floodplains.
- Terrace alluvium (Holocene, late Pleistocene, and middle Pleistocene) – unconsolidated stream alluvium consisting of a sandy or silty matrix, with pebbles, gravels, cobbles, and locally some boulders.
- Older gravels (middle Pleistocene) – pebbles and cobble gravels within a sandy, clayey matrix.
- Undivided alluvium and colluvium (Holocene) - stream channel alluvium.

- Alluvial slope deposits (Holocene, late Pleistocene, and middle Pleistocene) – sand, and sandy fine gravels from sheet wash and fluvial origins.
- Eolian sand (Holocene to late Pleistocene) – Fine to coarse grained silty sand deposited by wind.
- Upper portion of the Dawson Formation (bedrock) (upper Cretaceous and Paleocene) – massive, coarse grained arkosic sandstone with thin interbeds or micaceous sandstones, feldspathic sandstones, or sandy claystones.

The Rampart Range Fault is a north-south trending, high-angle thrust fault located approximately 3 miles west of the Site (Trimble and Machette 1979). This fault begins around Larkspur, Colorado and ends to the south near Highway 24 in Colorado Spring, and forms the eastern range of the Rampart Range.

### 2.2.2 Physiographic Provinces

The physiographic provinces at or near the Site include the Southern Rocky Mountains province and Basin and Range province (USGS 1995). The Basin and Range area consists of arid to semiarid climatic conditions. The climate of the Southern Rocky Mountains varies greatly due to differences in altitude, as well as orientation of the mountain ranges/valleys, with respect to the movement of the storm systems. Precipitation that falls on land surface either flows directly into rivers/streams as runoff, or infiltrates the soil and into underlying aquifers. During warmer seasons, much of the precipitation is returned to the atmosphere via evapotranspiration.

### 2.2.3 Hydrogeology

Surficial aquifers present in some areas of the Site include the Arkansas River Valley area and the Upland Plains area (USGS 1995). Thickness of the alluvial and eolian deposits, and the depth to groundwater vary greatly across the Site.

The Denver Basin aquifer system is the major aquifer system underlying the Site (USGS 1995). The Denver Basin aquifer system is a consolidated-rock aquifer system with a layered sequence of four aquifers located within five geologic layers consisting of permeable conglomerates, sandstones, and siltstones separated by relatively impermeable shale layers which obstruct the vertical movement of groundwater between the aquifers. Locally, the Dawson Formation (Dawson Arkos) described above contains the Dawson Aquifer, which is the uppermost and least extensive water-yielding formation in the Denver Basin. The saturated thickness near the central part of the formation is approximately 300 to 400 feet.

The EDR DataMap™ Well Search Report (EDR 2112a) which is included in Appendix A, identified numerous groundwater wells within the 1000-foot buffer and within the 1-mile radius of the buffer. Wells registered to the USGS provided groundwater elevation data for the various aquifers underlying the Site. Shallow groundwater within the Arapahoe Conglomerate Member of the Laramie Formation occurred at approximately 17 to 67 feet below ground surface (bgs). Other wells which appear to be screened within the shallow groundwater aquifer had groundwater depths ranging from 11 to 48 feet bgs. Wells screened within the Dawson Aquifer had groundwater depths ranging from as shallow as 44 feet bgs, to 218 feet bgs. One well was listed as being screened in the Laramie Formation with groundwater depths at 407 to 477 feet

bgs. Privately owned wells did not provide any depth to groundwater measurements. Private well usage was noted as domestic, household use only, or municipal.

### 2.3 Regulatory Review Summary

As stated in Section 1, a 1000-foot buffer was selected from the centerline of I-25 (and associated interchanges). The search radius was expanded to 1 mile outside this buffer for all regulatory databases. The following table summarizes the number of sites identified in the associated federal, state, and local records found in the EDR DataMap™ Area Study (EDR 2012b), which is included in Appendix B. The sites are broken into two categories: sites located within the 1000-foot buffer, and sites outside the 1000-foot buffer. Section 3 includes detailed discussions for sites located within the 100-foot buffer. Sites located outside the 1000-foot buffer were determined to be at a sufficient enough distance from the project Site as to not pose a concern and are not discussed in this report.

The USAF Academy was identified in a number of regulatory databases, and although some of CDOT's ROW is on USAF Academy property, activities associated with the databases occur within the main portion of the USAF Academy and not within close proximity to the CDOT ROW. Therefore, the USAF Academy is considered a site outside the 1000-foot buffer.

Record and Brief Description	Number of Sites Within the 1000-foot Buffer	Number of Sites Outside the 1000-foot Buffer
CERC-NFRAP: Comprehensive Environmental Response Compensation and Liability Information System-No Further Remedial Action Planned contains archived sites that have been removed from the inventory of CERCLIS sites and EPA has determined that no further action is required.	0	1
CORRACTS: Resource Conservation and Recovery Act (RCRA) Corrective Action Sites provides a list of handlers with RCRA Corrective Action Activity.	0	3
RCRA-SQG: RCRA-Small Quantity Generator, generates between 100 kg and 1000 kg of hazardous waste per month.	0	5
RCRS-CESQG: RCRA-Conditionally Exempt Small Quantity Generator, generates less than 100 kg of hazardous waste, or less than 1 kg of acutely hazardous waste per month.	1	8
RCRA-NonGen: RCRA-Non Generators do not presently generate hazardous waste.	3	7
ERNS: Emergency Response Notification System provides information on reported releases of oil and hazardous substances.	1	0
DOD: Department of Defense Sites	0	1
PADS: Polychlorinated biphenyl (PCB) Activity Database identifies generators, transporters, storers, or brokers of PCBs.	0	1
FINDS: Facility Index System provides "pointers" to other sources of information that contain more detail.	18	17
CO LUST: Colorado Leaking Underground Storage Tank provides an inventory of LUST sites.	6	15
CO LUST TRUST: LUST reimbursement application.	3	6
CO UST: Registered underground storage tanks.	7	20
CO AST: Registered aboveground storage tanks.	3	10

<b>Record and Brief Description</b>	<b>Number of Sites Within the 1000-foot Buffer</b>	<b>Number of Sites Outside the 1000-foot Buffer</b>
<b>NY MANIFEST:</b> Lists and tracks hazardous waste from the generator, through the transporter, to a treatment, storage, and disposal (TSD) facility.	0	2
<b>CO ERNS:</b> State reported spills.	3	0
<b>CO DRYCLEANERS:</b> A list of drycleaner facilities.	1	2
<b>CA HAZNET:</b> Lists and tracks hazardous waste from the generator, through the transporter, to a TSD facility.	0	1
<b>CO NPDES:</b> National Pollutant Discharge Elimination System listing of permitted facilities from the Colorado Water Quality Control Division.	2	0
<b>CO AIRS:</b> Aerometric Information Retrieval System listing of Colorado Air Pollution Control Division permits and emissions data.	4	2
<b>CO ASBESTOS:</b> Asbestos abatement and demolition projects.	2	0

All other regulatory databases searched did not return any identified sites, including the Historical Landfill List and Colorado Meth Lab Locations.



### 3.0 Findings

The following section summarizes the findings of the site visit (including observed transformers), review of the 2002 MESA (Kumar 2002), review of historical resources (aerial photographs, topographic maps, FEMA maps), and regulatory database results for each Segment outlined in Section 1. The EDR DataMap™ Area Study (EDR 2012b) is included in Appendix B. Topographic maps are included in Appendix C. Site photographs are included in Appendix D. Aerial photographs are available on Google Earth, and FEMA maps/data are only available for viewing on line (see Section 1 for links).

#### 3.1 Segment 1

Segment 1 encompasses the intersection of I-25 and Highway 105 to just north of Baptist Road (Figure 2).

The 2002 MESA (Kumar 2002) identified the following two sites as potential sites of concern within this Segment.

- Conoco Fuel Stop, 534 Highway 105, Monument, Colorado.
- Amoco Gas Station, 1949 Woodmoor Drive, Monument, Colorado.

The 2002 MESA states that the Conoco site is an active LUST site where soil remediation has been conducted, and groundwater in the area has been impacted from a gasoline release. Groundwater remediation was being conducted through air sparging and vapor extraction. The report indicates that quarterly groundwater monitoring reports were reviewed and show that groundwater beneath the facility flows to the south-southwest and may impact the Site. The 2002 MESA recommended that if this property is acquired as part of the interstate improvement project, review of the quarterly monitoring reports and a surface/subsurface investigation should be conducted. This site was also identified in the EDR report (EDR 2012b) as Conoco Phillips 6507 (and Monument Conoco), an active LUST site, as well as an active FINDS, LUST TRUST, and UST site. Six USTs have been permanently closed at the site, one used oil, three gasoline, two diesel tanks. One liquid petroleum gas (LPG) tank has been closed. A total of six USTs are still in use, three gasoline and three diesel tanks. A visual inspection of the property during the site visit confirmed that it is still an active facility, doing business as Circle K. The property is located directly adjoining the western side of the CDOT ROW. Based on the local topography, it appears that groundwater would flow south-southwest, which would be side-gradient to downgradient of the Site. OPS records show that a release was confirmed in 1990. Cleanup was initiated in 1995, and a Corrective Action Plan (CAP) was implemented in 1996. Since that time, CAP activities have been extended and monitoring activities are ongoing. A release was confirmed in 2006. A Site Summary Form (SSF) was received by OPS, and a closure letter was sent indicating contaminants were less than risk-based screening levels (RBSLs). Although this facility is located hydrologically/topographically side-gradient to downgradient of the Site, due to the close proximity of this facility to the CDOT ROW, and the potential for purchase, this site presents a recognized environmental condition due to the known groundwater contamination.

The 2002 MESA states that the Amoco Gas Station (see Appendix D for photos) was granted a No Further Action (NFA) in 1999, but a Change Status was issued along with a site assessment

request in 2001, and that groundwater contamination was present off site. The 2002 MESA recommended that review of monitoring reports should be conducted. This site was identified in the EDR report (EDR 2012b) as K&G Petroleum, LLC (CO AIRS and FINDS), K&G Store #541 (AST, UST, LUST, and LUST TRUST), and BP Facility #13385 (RCRA-NonGen and FINDS). This site is also likely the Woodmoor Automotive Inc. facility listed as an AST site as an LPG AST was observed during the site visit. No violations were found regarding air pollutants or waste generation. Five USTs have been permanently closed at this site, three gasoline and two waste oil tanks. Three gasoline USTs are currently in use. A visual inspection of the property during the site visit confirmed it is still an active facility doing business as Conoco. Based on the local topography at the site, it appears this facility is upgradient of the Site as groundwater would likely flow west-southwest towards the Site. OPS records show that a release was confirmed in 1989. A CAP and cleanup were initiated in 1992. Cleanup was completed and an NFA was issued in 1999. However, since that time, it appears that the status of the facility changed in 2002. A Site Characterization Report (SCR) has been submitted, and groundwater monitoring activities are currently ongoing. A large parking lot is located between this facility and the CDOT ROW. However, given the on-going monitoring, known groundwater contamination, and the upgradient position of this property, this facility presents a recognized environmental condition.

The EDR report (EDR 2012b) also identified the following facilities within the 1000-foot buffer of the Site.

- Southland 7 11 No 20308, 283 Highway 105, Monument, Colorado – FINDS, LUST, LUST TRUST, UST.
- Phillips 66 Service Station, 3<sup>rd</sup> Street and Highway 105, Monument, Colorado – UST.
- Unknown site name, 263 Highway 105, Monument, Colorado – CO ASBESTOS.
- Royal 1 Hour Cleaners, 1736 Lake Woodmoor Drive, Monument, Colorado – RCRA-NonGen, FINDS, CO DRYCLEANERS.
- Former Chevron Service Station No 7 0524, 1925 Woodmoor, Monument, Colorado – FINDS.
- Lewis-Palmer High School, 1300 Higby Road, Monument, Colorado – FINDS, UST.
- R Rock Yard, Inc., 16140 Old Denver Road, Monument, Colorado – FINDS.

The Southland 7 11 was observed during the site visit as an active facility. The local topography at the facility appears to be to the southwest, downgradient of the Site. The property is located on the west side of Highway 105, approximately 300 feet away from the CDOT ROW. OPS records show that a release was reported in 1993. In 1995, cleanup was initiated and an NFA was issued. In 2002, a second release was confirmed. An SCR was submitted in 2003. A CAP was approved in 2004, and groundwater monitoring has been ongoing at this facility since that time. Given the known groundwater contamination and ongoing monitoring at this facility, this site does present a recognized environmental condition. However, this facility appears to be at a sufficient enough distance, and located hydrologically/topographically downgradient of the Site as to not pose a concern to the subject Site.

The Phillips 66 Service Station was not observed during the site visit and it is suspected that either the facility no longer exists, or given the approximate address of 3<sup>rd</sup> Street and Highway 105, this is now the current Southland 7 11. OPS records for the Phillips 66 site indicate there were three gasoline USTs which have been permanently closed. No leaks or spills have been reported with this facility. This site likely does not pose a concern to the subject Site.

The unknown site at 263 Highway 105 was observed during the site visit to be a Walgreens store. The demolition permit was likely associated with demolition/construction activities associated with the Walgreens in 2009. This site does not pose a concern to the subject Site.

The Royal 1 Hour Cleaners was observed during the site visit to be an active drycleaner facility. The observed local topography indicates the facility is located upgradient of the Site, and groundwater flow is to the southwest, towards the Site. No violations have been found at this facility. This site is at a significant enough distance from the Site, and has no indication of spills or environmental incidents. Therefore, this facility does not appear to pose a concern to the subject Site.

The former Chevron Station No 7 0524 was not observed during the site visit, however based on where the given address plots on a map, this site is likely the Amoco/K&G facility discussed above. This site is registered with OPS, but no records are associated.

Lewis-Palmer High School has one registered diesel UST which has been permanently closed. No releases from this site have been reported. The local topography at this location indicates that groundwater flow would be to the southwest, towards the Site. However, because this facility has no reported incidences and is located at a significant enough distance from the Site, this facility does not appear to pose a concern to the subject Site.

No records could be found regarding the R Rock Yard, Inc. site to indicate the reason for a FINDS database registration. This site is located topographically downgradient of the subject Site (based on topographic map review), and likely does not pose a concern.

In addition to the sites summarized above, Rocky Mountain Car Wash and Lube Center was observed during the site visit at 213 Highway 105, which is located at the northwest corner of Highway 105 and 2<sup>nd</sup> Avenue in Monument. This site was not identified in the EDR report (EDR 2012b) and no regulatory records were found. Petroleum products are likely present given the nature of the business at this location. However, this appears to be a relatively new facility and likely does not pose a concern to the subject Site.

### **3.1.1 Topographic Map Review**

This Segment is included on the Monument, Colorado 7.5-Minute Quadrangle and the Castle Rock, Colorado 30-Minute Quadrangle.

The 1894 and 1913 Castle Rock maps (along with the various reprints) show the town of Monument and although roadways are not labeled, Highway 105 is visible. I-25 has not been constructed, however a north/south trending roadway is present between two rail lines (Atchison Topeka and Santa Fe on the east, and Denver and Rio Grande on the west). With the exception of the town of Monument, and smaller local roadways, the Site is undeveloped.

The 1954 Monument map shows that Highway 85/87 has been constructed and is within the current footprint of I-25. Both rail lines are still present. Roadways and residential/commercial development in Monument are visible. Higby Road and Baptist Road appear to be present but are unlabeled. Most development is on the west side of the rail line. All other areas are predominantly undeveloped. A buried telephone line is shown on the east side of the highway.

The 1961 Monument map show additional development in Monument, specifically just west of I-25. Highway 85/87 has been widened and is now identified as I-25. A small pond is present near the northeast intersection of I-25 and Highway 105. The telephone line on the east side of I-25 is no longer shown. The rest of the area appears to be unchanged since 1954.

The 1961 Monument map (photorevised 1969) shows widening of Highway 105 to the east of I-25, with development along the eastern portion of the highway. A larger water body (Lake Woodmoor) is now present northwest of the smaller pond shown on the 1961 map. The rest of the area appears to be unchanged since 1954.

A building and additional small pond are visible near the northeast intersection of I-25 and Highway 105 on the 1961 Monument map (photorevised 1975). The eastern rail line (Atchison Topeka and Santa Fe has been removed and areas are shown as Old Railroad Grade. The rest of the area does not show much change since 1954.

The 1986 Monument map shows significant development throughout the area. I-25 has been widened. The intersection at Baptist Road has expanded. Lewis Palmer High School has been constructed.

The 2010 Monument map shows continued significant development throughout the area, and is representative of current conditions.

### **3.1.2 Aerial Photo Review**

The 1999 aerial photo shows significant residential/commercial development on either side of I-25 and Highway 105. Extensive new development/earthwork is visible north of Baptist Road.

No significant changes observed in the 2003 aerial photo with the exception of continued development in the area north of Baptist Road. Bridge and roadway improvements are visible beginning between June and August 2004 at the intersection of Highway 105 and I-25. Construction of new interchange ramps are visible, along with earthmoving activities. Continued development on the east and west sides of I-25 around Higby Road are visible.

Continued residential/commercial development on either side of I-25 is visible from 2004 to 2006. Little development is visible from 2006 to 2011.

No development within the CDOT ROW was observed in any of the photographs with the exception of the roadway/bridge improvement activity at the Highway 105 and I-25 intersection in 2004.

### 3.1.3 FEMA Flood Zones

FEMA identifies three 100-year floodplains within Segment 1. The floodplains are concentrated in narrow bands along local creeks. Dirty Woman Creek, which crosses Highway 105 just east of the intersection at I-25, and crosses I-25 just south of the intersection, is identified as Zone AE on the FEMA issued map (08041C0278 F), and as Zone AH in the FEMA Flood Map viewer. Teachout Creek and an unnamed creek cross I-25 approximately 1.5 miles south of the Highway 105 intersection. These are both identified as AH in the FEMA Flood Map viewer, and as Zone A on the FEMA issued map (08041C0278 F). Refer to Section 1 for flood zone definitions.

### 3.1.4 Transformers

No transformers were observed in the CDOT ROW within this Section, however these observations should be confirmed prior to construction activities, and appropriate handling of materials (PCBs if present) should be conducted.

### 3.1.5 Lead-Based Paint

In 2002, two LBP samples were collected by Kumar (Kumar 2002) from the green paint on the east end of the metal portion of the Highway 105 bridge. Lead was detected in both samples above the detection limit at 0.359% and 1.276%. Additionally, detectable concentrations of RCRA metals were also present in the samples. Aerial photos from 1999 show an older bridge present at Highway 105 and I-25. Bridge and roadway improvements began between June and August 2004, based on aerial photographs from that time period. The bridge that was observed during the 2011 site visit appeared to be recent construction consisting of concrete and stone. Therefore, it appears that any LBP present in 2002 has likely been removed during the bridge and roadway improvements in 2004 and is no longer present.

## 3.2 Segment 2

Segment 2 encompasses the intersection of I-25 and Baptist Road to just north of Northgate Boulevard (Figure 3).

The 2002 MESA (Kumar 2002) identified the following site as a potential site of concern within this Segment.

- Diamond Shamrock, 1310 West Baptist Road, Monument, Colorado – FINDS, LUST, LUST TRUST, UST, AST.

The 2002 MESA states that the Diamond Shamrock site is an active LUST site with soil and groundwater impacts. The 2002 MESA also indicates that a CAP is in place and that air sparging and soil vapor extraction is occurring. The 2002 MESA recommended that this property is acquired as part of the interstate improvement project, review of semi-annual monitoring reports and a surface/subsurface investigation should be conducted. This site was identified in the EDR report (EDR 2012b) as Diamond Shamrock 4136, an active LUST, LUST TRUST, UST, and AST site. The report also shows this site as Valero Diamond Metro, Inc. (FINDS and AIRS), Total #2738 (LUST), Shamrock 4136 (LUST), and Total Petroleum (AIRS). One LPG tank has been closed at the site. A total of five USTs are still in use, three gasoline and two diesel tanks. A visual inspection of the property during the site visit confirmed that it is still

an active facility doing business as Diamond Shamrock. The property is located directly adjoining the western side of the CDOT ROW (see Appendix D for photos). Based on the local topography, it appears that groundwater would flow to the south, which would be side-gradient of the Site. OPS records show that a release was confirmed in 1989. Cleanup was initiated in 1990, and a CAP was implemented in 1991. CAP activities and monitoring were conducted through 2009 when closure was granted. A release was confirmed in early 1996. Cleanup was immediately completed and an NFA was granted in mid-1996. A release was confirmed in early 2002. Cleanup was immediately completed and SSF was submitted by mid-2002. A release was confirmed in early 2009. An SSR was submitted, and a closure letter was sent indicating contaminants were less than RBSLs. Although this facility is located hydrologically/topographically side-gradient of the Site, due to the close proximity of this facility to the ROW, and the potential for purchase, this site presents a recognized environmental condition due to known groundwater contamination.

The EDR report (EDR 2012b) also identified the following site within the 1000-foot buffer of the Site.

- Upper Monument Creek (UMCR)-Wastewater Treatment Facility (WWTF) Phase 2 Expansion, 1335 West Baptist Road, Colorado Springs, Colorado – FINDS, NPDES, ERNS.

The records for this site indicate that an influent pump within the WWTF malfunctions and sewage was released within the facility, and to the soil outside the facility. No waterways were impacted and the soil outside the facility was sprayed with a water/chlorine solution. The faulty pump was repaired and the facility was put back into service. This site does not appear to pose a concern to the subject Site.

### **3.2.1 Topographic Map Review**

This Segment is included on the Monument, Colorado 7.5-Minute Quadrangle and the Castle Rock, Colorado 30-Minute Quadrangle.

The 1894 and 1913 Castle Rock maps (along with the various reprints) show the area as undeveloped with the exception of an unmarked north/south trending roadway between two rail lines (Atchison Topeka and Santa Fe on the east, and Denver and Rio Grande on the west), and smaller local roadways.

The 1954 Monument map shows that Highway 85/87 has been constructed and is within the current footprint of I-25. Both rail lines are still present. Baptist Road appears to be present but is unlabeled. Northgate Boulevard has not been constructed. The area is predominantly undeveloped. A buried telephone line is shown on the east side of the highway.

The 1961 Monument map shows the USAF Academy has developed, Highway 85/87 has been widened and is identified as I-25. Northgate Boulevard, along with some supporting roadway going into the USAF Academy has been constructed. The telephone line on the east side of I-25 is no longer shown. The area east of I-25 appears to be unchanged since 1954 with the exception of two small ponds which are now visible along Jackson Creek near the east side of I-25.

The 1961 Monument map (photorevised 1969) shows the area has not changed since 1961.

Residential development is shown to the east of I-25 and on the south side of Baptist Road on the 1961 Monument map (photorevised 1975). An unlabeled roadway extends from Northgate Boulevard to the east. The eastern rail line (Atchison Topeka and Santa Fe has been removed and areas are shown as Old Railroad Grade. The rest of the area does not show much change since 1961.

The 1986 Monument map shows significant development throughout the area. I-25 has been widened. The intersection at Baptist Road has expanded. Northgate Boulevard and the associated USAF Academy roadways have been expanded. Significant development is visible on the east side of I-25, including sewage disposal ponds, a golf course, residential areas, and numerous man-made ponds.

The 2010 Monument map shows continued significant development throughout the area, and is representative of current conditions.

### **3.2.2 Aerial Photo Review**

The 1999 aerial photo shows significant development on the east side of I-25, south of Baptist Road. New development beginning on the north side of Baptist Road. A linear stretch of earthwork/disturbance is visible on the USAF Academy property, approximately 1.5 miles south of Baptist road, and within 1200 feet of I-25. Earthwork visible to the west of the linear feature.

No significant changes observed in the 2003 aerial photo with the exception of continued development on the east side of I-25 and north side of Baptist Road. The linear feature observed in 1999 appears to now be asphalt paved with dashed line down the center. Numerous buildings now visible in the area west of the linear feature where earthwork was visible in 1999.

Continued residential/commercial development on east side of I-25 is visible from 2004 to 2005. Little development was visible from 2006 to 2011 with the exception of bridge and roadway improvements. The Baptist Road bridge was reconstructed and widened between this time.

No development within the CDOT ROW was observed in any of the photographs.

### **3.2.3 FEMA Flood Zones**

FEMA identifies three 100-year floodplains within Segment 2. The floodplains are concentrated in narrow bands along local creeks. Jackson Creek crosses Baptist Road just east of the intersection at I-25, and crosses I-25 south of the Baptist Road. Black Forrest Creek and Middle Black Forrest Tributary cross I-25 approximately 1 mile south of Jackson Creek. Jackson Creek is identified as Zone A on the FEMA issued map (08041C0286 F), and as Zone AH in the FEMA Flood Map viewer. Black Forrest Creek and Middle Black Forrest Tributary are identified as Zone AE on the FEMA issued map (08041C0287 F), and as Zone AH in the FEMA Flood Map viewer. Refer to Section 1 for flood zone definitions.

### 3.2.4 Transformers

One transformer was observed on the west side of I-25, south of the where the southbound on-ramp joins I-25. One transformer was observed on the east side of I-25 approximately between milepost markers 156.5 and 157. Pole-mounted transformers were observed on the east side of I-25, just south of the Baptist Road exit and near milepost marker 156.5. These observations should be confirmed prior to construction activities, and appropriate handling of materials (PCBs if present) should be conducted.

### 3.2.5 Lead-Based Paint

No LBP samples were collected from the Baptist Road bridge during the 2002 MESA, as the this bridge was constructed of unpainted concrete at that time. Additionally, a new bridge consisting of concrete and stone has been constructed between 2006 and 2010. Therefore, no LBP is expected to be present at the current Baptist Road bridge.

## 3.3 Segment 3

Segment 3 encompasses the intersection of I-25 and Northgate Boulevard to just north of Interquest Parkway (Figure 4).

The 2002 MESA, the January 2012 site visit, and the EDR report (EDR 2012b) did not identify any potential sites of concern within this Segment.

### 3.3.1 Topographic Map Review

This Segment is included on the Monument, Colorado and Pikeview, Colorado 7.5-Minute Quadrangles, and the Castle Rock, Colorado and Colorado Springs Colorado 30-Minute Quadrangles.

The 1894 and 1913 Castle Rock/Colorado Springs maps (along with the various reprints) show the area as undeveloped with the exception of an unmarked north/south trending roadway between two rail lines (Atchison Topeka and Santa Fe on the east, and Denver and Rio Grande on the west), some smaller local roadways, and a small town called Husted, located just south of the future Northgate Boulevard. The town is centered around the Denver and Rio Grande rail line.

The Monument map, which shows approximately the northern half of this segment is a 1954 version, while the two available Pikeview maps, which shows roughly the southern half of this segment are slightly earlier vintages of 1948 and 1949. All three maps will be discussed together herein, as all are within a similar time period. The 1954 Monument map shows that Highway 85/87 has been constructed and is within the current footprint of I-25. Both rail lines are still present. Northgate Boulevard has not been constructed. The area is predominantly undeveloped with the exception of the small town of Husted, and four structures labeled as Foothill Farms, located approximately 1 mile south of the future Northgate Boulevard, on the east side of the highway. A buried telephone line is shown on the east side of highway. The 1948/1949 Pikeview maps show that Highway 85/87 has been constructed and the area is undeveloped. A roadway labeled Stout Allen Road is located in the approximate location of the future Interquest Parkway.



The 1961 Monument/Pikeview maps shows the USAF Academy has developed, Highway 85/87 has been widened and is now identified as I-25. Northgate Boulevard, along with some supporting roadway going into the USAF Academy, has been constructed. The town of Husted and Foothill Farms are no longer visible. Development within the USAF Academy is visible, including Falcon Stadium and Douglas Valley School. The telephone line on the east side of I-25 is no longer shown. Ponds are now visible along Black Squirrel Creek on the east side of I-25.

The 1961 Monument/Pikeview maps (photorevised 1969) show the area has not changed since 1961.

The eastern rail line (Atchison Topeka and Santa Fe has been removed and areas are shown as Old Railroad Grade on the 1961 Monument/Pikeview maps (photorevised 1975). The rest of the area does not show much change since 1961.

The 1986 Monument/Pikeview maps show continued roadway development within the USAF Academy property. Stout Allen Road is no longer visible, however the location is now marked as Colorado Springs Corporate Boundary. A 1986 (photorevised 1994) version of the Pikeview map is available. No visible changes to the area as compared to the 1986 version.

The 2010 Monument/Pikeview maps show continued significant development throughout the area, construction of Interquest Parkway, and is representative of current conditions.

### **3.3.2 Aerial Photo Review**

The 1999 aerial photo shows development on the east side of I-25. Current alignment of Northgate Boulevard not completed.

No significant changes observed in the 2003 aerial photo with the exception of continued development on the east side of I-25. Continued residential/commercial development on east side of I-25 is visible from 2004 to 2006. By the 2010 photo, the current alignment of Northgate Boulevard is present.

No development within the CDOT ROW was observed in any of the photographs.

### **3.3.3 FEMA Flood Zones**

FEMA identifies two 100-year floodplains within Segment 3. The floodplains are concentrated in narrow bands along local creeks. Smith Creek and Black Squirrel Creek are identified as Zone A on the FEMA issued map (08041C0290 F and 08041C0506 F), and as Zone AH in the FEMA Flood Map viewer. However, the limits of the study areas shown on the maps stops just adjacent to the east side of I-25. However, it is assumed that because the streams cross beneath the highway, the flood zones would also continue to the west side of I-25. Refer to Section 1 for flood zone definitions.

### 3.3.4 Transformers

No transformers were observed in the CDOT ROW within this Section, however these observations should be confirmed prior to construction activities, and appropriate handling of materials (PCBs if present) should be conducted.

### 3.3.5 Lead-Based Paint

No LBP samples were collected from Northgate Boulevard bridge during the 2002 MESA, as this bridge was constructed of unpainted concrete at that time. During the January 2012 site visit, the bridge was observed to still be unpainted concrete. Therefore, no LBP is expected to be present at the Northgate Boulevard bridge.

## 3.4 Segment 4

Segment 4 encompasses the intersection of I-25 and Interquest Parkway to just north of Briargate Boulevard (Figure 5).

The 2002 MESA, the January 2012 site visit, and the EDR report (EDR 2012b) did not identify any potential sites of concern within this Segment.

### 3.4.1 Topographic Map Review

This Segment is included on the Pikeview, Colorado 7.5-Minute Quadrangle and the Colorado Springs Colorado 30-Minute Quadrangle.

The 1894 and 1913 Colorado Springs maps (along with the various reprints) show the area as undeveloped with the exception of an unmarked north/south trending roadway between two rail lines (Atchison Topeka and Santa Fe on the east, and Denver and Rio Grande on the west), some smaller local roadways, and a small town called Edgerton, marked with a few small, scattered buildings between the two rail lines.

The 1948/1949 Pikeview maps show that Highway 85/87 has been constructed but does not align with the current footprint of I-25. A roadway labeled Stout Allen Road is located in the approximate location of the future Interquest Parkway. Burgess Road is located approximately  $\frac{3}{4}$  to 1 mile south of Stout Allen Road, and runs from I-25 to the east only. A few small buildings are present at the intersection of Highway 85/87 and Burgess Road. Pine Valley Airpark, within the USAF Academy property, is visible to the southwest of the intersection of Highway 85/87 and Burgess Road. The rest of the area is undeveloped with the exception of small, local roadways. The town of Edgerton, along with the small, scattered buildings, are no longer present.

The 1961 Pikeview maps shows the USAF Academy has developed, and supporting roadway going into the USAF Academy has been constructed. The current alignment of I-25 is now present. A sewage disposal area is visible within the USAF Academy property, just west of the Denver and Rio Grande rail line. A large, man-made water body along with some local roadways and scattered buildings are visible just north of the future Briargate Boulevard interchange. A utility line is shown on the east side of I-25. Three borrow pits are marked on the west side of I-25, across from the water body, and within close proximity to I-25. One of the

borrow pits is labeled Pine Valley Airport. The footprint of the airport is not shown on the 1961 map, but is present on the 1969 photorevised map. The 1961 Pikeview map (photorevised 1969) shows the area has not changed since 1961.

The eastern rail line (Atchison Topeka and Santa Fe has been removed and areas are shown as Old Railroad Grade on the 1961 Pikeview map (photorevised 1975). The rest of the area does not show much change since 1961.

The 1986 Pikeview map show continued roadway development within the USAF Academy property. Stout Allen Road is no longer visible, however the location is now marked as Colorado Springs Corporate Boundary. Burgess Road is still present. Pine Valley Airpark is now labeled USAF Academy Airfield. Additional development around the large water body, including Mountain View School, is visible. A 1986 (photorevised 1994) version of the Pikeview map is available. No visible changes to the area as compared to the 1986 version.

The 2010 Pikeview map shows continued significant development throughout the area, construction of Briargate Boulevard, and is representative of current conditions. Large water body shown since the 1961 map is no longer present. Burgess Road is now labeled Old Ranch Road. Airport on east side of highway is now labeled Pine Valley Airport and US Air Force Academy Airstrip.

### **3.4.2 Aerial Photo Review**

The 1999 aerial photo shows development on the east side of I-25. Interquest Parkway and Briargate Boulevard, along with the associated interchanges, have been constructed. Pine Valley Airport is visible on the west side of I-25, within the USAF Academy property.

Continued development within the USAF Academy property on and on the east side of I-25 visible in 2003. Continued residential/commercial development on east side of I-25 is visible from 2004 to 2006. The 2010 photo shows current Site conditions.

No development within the CDOT ROW was observed in any of the photographs.

### **3.4.3 FEMA Flood Zones**

FEMA identifies one 100-year floodplain within Segment 4. The floodplain is concentrated in a narrow band along Kettle Creek. The flood zone is identified as Zone A on the FEMA issued map (08041C0506 F), and as Zone AH in the FEMA Flood Map viewer. However, the limits of the study areas shown on the map stops just adjacent to the east side of I-25 (along the USAF Academy property boundary), south of Interquest Parkway. However, it is assumed that because the stream crosses beneath the highway, the flood zone would also continue to the west side of I-25. Refer to Section 1 for flood zone definitions.

### **3.4.4 Transformers**

Three transformers were observed on the west side of I-25 located approximately:

- North of milepost marker 153.0 near the southbound I-25 on-ramp from Interquest Parkway.

- Near milepost marker 151.5.
- Near milepost marker 151.

Six transformers was observed on the east side of I-located approximately:

- Near exit 153.
- Near milepost marker 152.5.
- Between milepost markers 152.5 and 152.
- Near milepost marker 152
- Near exit 151 off-ramp from northbound I-25.
- Near milepost marker 151.

These observations should be confirmed prior to construction activities, and appropriate handling of materials (PCBs if present) should be conducted.

### **3.4.5 Lead-Based Paint**

In 2002, three LBP samples were collected by Kumar (Kumar 2002) from the light brown paint on the east end of the concrete girder of the Interquest Parkway bridge. Lead was not detected in any of the samples above the detection limit. Barium was detected in one of the paint samples. Based on these results, LBP is not suspected to be present at the Interquest Parkway bridge.

## **3.5 Segment 5**

Segment 5 encompasses the intersection of I-25 and Briargate Boulevard to just north of Academy Boulevard (Figure 6).

The 2002 MESA, the January 2012 site visit, and the EDR report (EDR 2012b) did not identify any potential sites of concern within this Segment.

### **3.5.1 Topographic Map Review**

This Segment is included on the Pikeview, Colorado 7.5-Minute Quadrangle and the Colorado Springs Colorado 30-Minute Quadrangle.

The 1894 and 1913 Colorado Springs maps (along with the various reprints) show the area as undeveloped with the exception of an unmarked north/south trending roadway between two rail lines (Atchison Topeka and Santa Fe on the east, and Denver and Rio Grande on the west).

The 1948/1949 Pikeview maps show that Highway 85/87 has been constructed but is not within the current alignment of I-25. Roadway development within the USAF Academy property is visible.

The 1961 Pikeview maps shows the USAF Academy has developed, and supporting roadway going into the USAF Academy has been constructed. The current alignment of I-25 is now present. The interchange at Academy Boulevard going into the USAF Academy has been

constructed. With the exception of the USAF Academy, the surrounding area is undeveloped. The 1961 Pikeview map (photorevised 1969) shows the area has not changed since 1961.

The eastern rail line (Atchison Topeka and Santa Fe has been removed and areas are shown as Old Railroad Grade on the 1961 Pikeview map (photorevised 1975). A borrow pit is shown on the west side of I-25 within close proximity to the highway. Three lagoons are shown on the west side of the highway within the USAF Academy property. The rest of the area does not show much change since 1961.

The 1986 Pikeview map shows continued roadway development within the USAF Academy property. The area east of I-25 shows some light development. The three lagoons identified on the 1961 map are now identified as Kettle Lakes Nos. 1, 2, and 3. A 1986 (photorevised 1994) version of the Pikeview map is available. No visible changes to the area as compared to the 1986 version.

The 2010 Pikeview map shows continued significant development throughout the area, construction of Briargate Parkway and Academy Boulevard to the east of the highway has been completed, and is representative of current conditions.

### **3.5.2 Aerial Photo Review**

The 1999 aerial photo shows significant development on the east side of I-25. The current alignments of Briargate Boulevard and Academy Boulevard, along with the associated interchanges, have been constructed. The three Kettle Lakes are visible on the west side of the highway within the USAF Academy property.

Continued development within the USAF Academy property on and on the east side of I-25 visible in 2003. Continued residential/commercial development on east side of I-25 is visible from 2004 to 2006. The 2011 photo shows the USAF Academy solar array located at the northwest corner of the I-25 and Academy Boulevard interchange.

No development within the CDOT ROW was observed in any of the photographs.

### **3.5.3 FEMA Flood Zones**

FEMA identifies one 100-year floodplain within Segment 5. The floodplain is concentrated in a narrow band along Pine Creek. The flood zone is identified as Zone AE on the FEMA issued map (08041C0508 F), and as Zone AH in the FEMA Flood Map viewer. However, the limits of the study areas shown on the map stops just adjacent to the east side of I-25 (along the USAF Academy property boundary), south of Briargate Boulevard. However, it is assumed that because the stream crosses beneath the highway, the flood zone would also continue to the west side of I-25. Refer to Section 1 for flood zone definitions.

### **3.5.4 Transformers**

One transformer was observed on the west side of I-25, near milepost marker 150.5. These observations should be confirmed prior to construction activities, and appropriate handling of materials (PCBs if present) should be conducted.

### 3.5.5 Lead-Based Paint

In 2002, three LBP samples were collected by Kumar (Kumar 2002) (two samples of beige paint and one sample of brown paint) from the east end of the concrete portions of the eastbound Briargate Boulevard bridge. No RCRA metals or lead were detected in any of the samples above the detection limits. Based on these results, LBP is not suspected to be present at the Briargate Boulevard bridge.

### 3.6 Segment 6

Segment 6 encompasses the intersection of I-25 and Academy Boulevard to just south of Woodmen Road (Figure 7).

The 2002 MESA (Kumar 2002) did not identify any sites as potential sites of concern within this Segment. The EDR report (EDR 2012b) also identified the following facilities within the 1000-foot buffer of the Site.

- Unknown site name, Vincent Drive and Fuller Road, Colorado Springs, Colorado – ERNS.
- Pietraszek Enterprises, Inc., 7130 Commerce Center Drive, Colorado Springs, Colorado – FINDS.
- Unknown site name, 7245 Commerce Center Drive, Colorado Springs, Colorado – ERNS.
- Embassy Suites Hotel, 7290 Commerce Center Drive, Colorado Springs, Colorado – FINDS.
- Circle K Store #2709840, 7055 Commerce Center Drive, Colorado Springs, Colorado – UST, AIRS, FINDS.
- Woodman Office Complex, 7150 Campus Drive, Colorado Springs, Colorado – ERNS.
- Omnipoint Corporation, 7150 Campus Drive, Suite 155, Colorado Springs, Colorado – RCRA-CESQG, FINDS.
- Tiffany Square Mall, 6805 Corporate Drive, Colorado Springs, Colorado – LUST, UST.
- Woodmen Nissan, 6890 Vincent Drive, Colorado Springs, Colorado – UST.

The ERNS incident at Vincent Drive and Fuller Road in Colorado Springs (approximately ½-mile north of Woodmen Road) was a release of 30 gallons of diesel fuel onto the roadway and shoulder of the roadway on November 19, 2008. A truck making a u-turn struck a curb and punctured the fuel tank. No waterways were impacted and the area was cleaned up. No evidence of the spill was observed during the site visit. This incident occurred at a significant enough distance from the Site, and was a low volume release. Therefore, this site does not appear to pose a concern to the subject Site.

No records could be found regarding the Pietraszek Enterprise, Inc. site to indicate the reason for a FINDS database registration. No evidence of spills or releases were observed during the site visit. The local topography at the facility appears to be to the southwest, downgradient of the

Site and the site is located at a significant enough distance from the subject Site. Therefore, this site likely does not pose a concern to the subject Site.

The ERNS incident at 7245 Commerce Center Drive in Colorado Springs (approximately ¼-mile north of Woodmen Road) is a Hampton Inn. The incident was a release of 35 gallons of diesel fuel onto the pavement and into a storm drain on August 26, 2011. A truck was parked in an incline and leaked the fuel from the tank due to gravity. The spill was cleaned up using absorbents on the pavement. No further information is available as to inspection of the storm drain. No evidence of the spill was observed during the site visit. The local topography at the facility appears to be to the southwest, downgradient of the Site. The spill was a low volume release, and this site is located downgradient of the Site. Therefore, this site does not appear to pose a concern to the subject Site.

No records could be found regarding the Embassy Suites Hotel site to indicate the reason for a FINDS database registration. The local topography at the facility appears to be to the southwest, downgradient of the Site. This site is located near the ERNS incident on Commerce Center Drive discussed above, and is hydrologically/topographically downgradient of the subject Site. No evidence of spills or releases were observed during the site visit. Therefore, this site does not appear to pose a concern to the subject Site.

The Circle K Store is also located near the ERNS incident on Commerce Center Drive, as well as the Embassy Suites Hotel site, discussed above. The Circle K Store was observed as an active facility during the site visit. The local topography at the facility appears to be to the southwest, downgradient of the Site. OPS records show three USTs are currently in use at the facility, two gasoline and one diesel. No reported spills or releases have occurred at this facility. This site does not appear to pose a concern to the subject Site.

The ERNS incident at the Woodman Office Complex (see Appendix D for photo) located at 7150 Campus Drive, consisted of a release of 4 gallons of sulfuric acid to a sidewalk from a battery which fell from a dolly. The local fire department neutralized the spill with soda ash, and contained the material in an approved container. No evidence of the spill was observed during the site visit. This site does not appear to pose a concern to the subject Site.

Omnipoint Corporation is listed as a RCRA-CESQG located at 7150 Campus Drive (see Appendix D for photo). Facility records indicate D-Listed wastes (ignitable and corrosive wastes) are generated at this site. No evidence of spills or releases were observed during the site visit, and no violations at this facility have been reported. The local topography at this facility appears to be to the southwest, towards the Site. The building appears to be a three-story commercial-type building with a large parking lot (see Appendix D for photograph). Based on the records review (no reported violations and limited quantity of waste generated), and the site visit, this facility does not appear to pose a concern to the subject Site.

Tiffany Square Mall was observed as an active commercial mall consisting of a church (Spring Calvary), a restaurant (Las Palmitas), and two companies (Ryla and Intellitec Medical Institute). The local topography at the facility appears to be to the southwest, downgradient of the Site. The property is located on the south side of Woodmen Road. The parking lot of the facility is adjacent to the raised I-25 roadway. OPS records show that a release was confirmed in 1989.

Cleanup was completed and the facility received a NFA in 1994. Given a reported release from a UST over 20 years ago, this site presents a historic recognized environmental condition. However, this site is located hydrologically/topographically downgradient of the Site. The highway is also elevated above this facility. Therefore, this site does not appear to pose a concern to the subject Site.

Woodman Nissan was observed as an active, large car dealership located at the southeast corner of the I-25 and Woodmen Road intersection, during the site visit. The facility has one gasoline UST currently in use, and two permanently closed USTs (one gasoline and one diesel). The local topography at this facility appears to be to the southwest, upgradient of the Site. No spills or releases have been reported at this facility. This facility does not appear to pose a concern to the subject Site.

Additionally, the following two sites were identified in the EDR report (EDR 2012b), which were just outside the 1000-foot buffer for the Site, near Academy Boulevard.

- Econo Lube N Tune #227, 8320 Razorback Road, Colorado Springs, Colorado – RCRA-NonGen, FINDS.
- The Pep Boys, Manny, Moe, & Jack #270, 7625 North Academy Boulevard, Colorado Springs, Colorado - RCRA-NonGen, FINDS.

The Econo Lube N Tune was observed as active facility during the site visit. The local topography at the site appears to be to the southwest, upgradient of the Site. The Pep Boys was inaccurately plotted on the EDR report and is actually located 1 mile southeast of the Academy Boulevard and I-25 intersection. Both facilities are located at a significant enough distance from the Site, and because neither facility has any reported releases or violations, neither facility appears to pose a concern to the subject site.

### **3.6.1 Topographic Map Review**

This Segment is included on the Pikeview, Colorado 7.5-Minute Quadrangle and the Colorado Springs Colorado 30-Minute Quadrangle.

The 1894 and 1913 Colorado Springs maps (along with the various reprints) show the area as undeveloped with the exception of an unmarked north/south trending roadway between two rail lines (Atchison Topeka and Santa Fe on the east, and Denver and Rio Grande on the west, and the town of Breed located just south of the future Academy Boulevard exit. The town is marked with one small building.

The 1948/1949 Pikeview maps show that Highway 85/87 has been constructed but is not within the current alignment of I-25. Roadway development within the USAF Academy property is visible. The current alignment of Woodmen Road is shown from Highway 85/87 to the west, into the USAF Academy property. The town of Breed is still visible and additional small buildings are shown in the area. The rest of the area is undeveloped.

The 1961 Pikeview maps shows the USAF Academy has developed, and supporting roadway going into the USAF Academy has been constructed. The current alignment of I-25 is now



present. The town of Breed is no longer shown. The interchange at Academy Boulevard going into the USAF Academy has been constructed. The current alignment of Woodmen Road on the east side of I-25 is visible. Some development shown on the east side of I-25. Gravel pits are identified in close proximity to the Academy Boulevard off-ramps on the east side of the highway, as well as south of the interchange on the west side of the highway. The 1961 Pikeview map (photorevised 1969) shows the area has not changed since 1961.

The eastern rail line (Atchison Topeka and Santa Fe has been removed and areas are shown as Old Railroad Grade on the 1961 Pikeview map (photorevised 1975). The gravel pits are no longer shown. Significant development is shown on either side of I-25.

The 1986 Pikeview map shows continued significant development throughout the area. Two aqueducts are shown on the west side of I-25, one of which crosses I-25 just north of Woodmen Avenue. A 1986 (photorevised 1994) version of the Pikeview map is available. No visible changes to the area as compared to the 1986 version.

The 2010 Pikeview map shows continued significant development throughout the area. The current alignment of Woodmen Road to the west of the highway is shown. The map is representative of current conditions.

### **3.6.2 Aerial Photo Review**

The 1999 aerial photo shows significant development on the both sides of I-25. The current alignments of Academy Boulevard and Woodmen Road, along with the associated interchanges, have been constructed.

Continued development within the USAF Academy property on and on the east side of I-25 visible in 2003. Continued residential/commercial development on east side of I-25 is visible from 2004 to 2006. The 2011 photo shows current site conditions.

No development within the CDOT ROW was observed in any of the photographs.

### **3.6.3 FEMA Flood Zones**

FEMA identifies two 100-year floodplains within Segment 6. The floodplains are concentrated in narrow bands along Pine Creek. One portion of the Pine Creek flood zone crosses Academy Boulevard adjacent to the interchange ramps on the east side of I-25. The other portion of the Pine Creek flood zone crosses I-25 approximately ½-mile north of Woodmen Road. The flood zone for both sections is identified as Zone AE on the FEMA issued maps (08041C0504 F and 08041C0508 F), and as Zone AH in the FEMA Flood Map viewer. Refer to Section 1 for flood zone definitions.

### **3.6.4 Transformers**

One transformer was observed on the east side of I-25, near milepost marker 150. These observations should be confirmed prior to construction activities, and appropriate handling of materials (PCBs if present) should be conducted.

### **3.6.5 Lead-Based Paint**

In 2002, three LBP samples were collected by Kumar (Kumar 2002) from the beige paint on the concrete girders of the east and west bound Academy Boulevard bridge. Lead was detected in all three samples above the detection limit at 0.042%, 0.018%, and 0.005%. No RCRA metals were detected in any of the samples above the detection limits. Aerial photograph review does not show any renovation activities to this bridge since its original construction. During the 2012 site visit, the bridge was observed to be an older construction, painted concrete bridge. Therefore, it assumed that LBP is still present at this bridge. All renovation/demolition activities conducted at this bridge should be completed within all regulatory requirements for handling LBP.

No LBP samples were collected from Woodmen Road bridge during the 2002 MESA, as this bridge was constructed of unpainted concrete at that time. During the January 2012 site visit, the bridge was observed to still be unpainted concrete. Therefore, no LBP is expected to be present at the Woodmen Road bridge.

## 4.0 Opinions and Recommendations

SUMMIT has performed a Phase I ESA in conformance with the scope and limitations of ASTM E 1527-05 for the Site. Any exceptions to, or deletions from, this practice are described in Section 1 of this report. This assessment has revealed no evidence of recognized environmental conditions in connection with the Site except for the sites discussed below.

### 4.1 Segments 1, 2, and 6

Segments 1, 2, and 6 have sites which have been determined to present recognized environmental conditions, historic recognized environmental conditions, or toxic materials have been identified which need to be handled in accordance with all applicable regulations.

The Conoco Fuel Stop site (currently doing business as Circle K) located at 534 Highway 105, in Monument, Colorado (Segment 1), is currently an active LUST site where soil remediation has been completed, and on-going groundwater treatment (via an air sparging and vapor extraction system) is occurring. Groundwater beneath the facility flows to the south-southwest, which is side-gradient to downgradient of the subject Site. Although this facility is hydrologically side-gradient to down gradient of the Site, due to the close proximity of this facility, the potential for purchase as part of the I-25 expansion, and the known groundwater contamination, this site presents a recognized environmental condition. SUMMIT recommends reviewing the most current groundwater monitoring reports and additional investigation of soil and groundwater impacts within the construction area prior to any construction activities.

The Amoco Gas Station (currently doing business as Conoco) located at 1949 Woodmoor Drive, Monument, Colorado (Segment 1) is currently an active LUST site. The facility had a historic release in 1989, and was granted a NFA in 1999. However, the facility status changed in 2002 when another release occurred. Since that time, a cleanup has been implemented and ongoing groundwater monitoring activities are being conducted. This site is located hydrologically/topographically upgradient of the subject Site. Although the facility is approximately 500 feet east of the CDOT ROW, given the known groundwater contamination and the upgradient position of this facility, this site presents a recognized environmental condition. SUMMIT recommends review of the most current monitoring plans prior to construction activities in order to determine the nature and extent of contamination at this facility. If the extent of contamination cannot be determined, or is determined to be within close proximity to the construction area, SUMMIT recommends additional investigation of soil and groundwater impacts within the construction area prior to construction activities.

The Southland 7 11 located at 283 Highway 105, in Monument, Colorado (Segment 1) is an active LUST site where ongoing groundwater monitoring is currently ongoing. The local topography at the facility appears to be to the southwest, downgradient of the Site. The property is located approximately 300 feet away from the CDOT ROW. Given the known groundwater contamination and ongoing monitoring at this facility, this site does present a recognized environmental condition. However, this facility appears to be at a sufficient enough distance, and located hydrologically/topographically downgradient of the Site as to not pose a concern to the subject Site, and no further investigation is recommended.

The Diamond Shamrock located at 1310 West Baptist Road, in Monument, Colorado (Segment 2) is currently an active LUST site where groundwater remediation via a soil vapor extraction system and groundwater monitoring is currently ongoing. Based on the local topography, it appears groundwater flows to the south, which would be side-gradient to the Site. The property is located directly adjoining the western side of the CDOT ROW. Although this facility is located hydrologically/topographically side-gradient of the Site, due to the close proximity of this facility to the ROW, the potential for purchase as part of the I-25 expansion, and the known groundwater contamination, this site presents a recognized environmental condition. SUMMIT recommends reviewing the most current groundwater monitoring reports and additional investigation of soil and groundwater impacts within the construction area prior to any construction activities.

Tiffany Square Mall located at 6805 Corporate Drive, in Colorado Springs, Colorado (Segment 6) is a closed LUST site. The mall was an active commercial marketplace consisting of various entities (church, restaurants, and two commercial businesses). OPS records show that a release was confirmed in 1989. Cleanup was completed and the facility received a NFA in 1994. The site is located on the west side of a raised segment of I-25, and is topographically downgradient of the Site. Due to the confirmed release and cleanup at this property over 20 years ago, this site presents a historic recognized environmental condition. However, because the site is located downgradient of the subject Site, and the highway segment in this area is elevated above the property, this site does not appear to pose a concern to the subject Site, and no further investigation is recommended.

Based on the results of the LBP sampling conducted by Kumar in 2002, LBP is present at the Academy Boulevard bridge. Cutting, grinding, or demolition activities where LBP is present, can cause a release of dust or fumes containing lead into the air, creating a breathing hazard to workers. Therefore, demolition activities involving LBP are covered under the Occupational Safety and Health Administration (OSHA) Construction Industry Standard for Lead (29 CFR, Part 1926.62). Strict controls for grinding, cutting, or abrading of LBP should be implemented during construction/demolition activities to ensure compliance with OSHA provisions and to reduce potential lead dust or fumes. All work should be conducted with appropriate engineering controls and work practices, and should be conducted by properly trained and protected personnel as required by OSHA regulations.

Additionally, waste materials generated during demolition which have LBP require a hazardous waste determination as outlined in 40 CFR 262.11 and 261.24. Waste characterization should be conducted on all materials coated with LBP by collection of representative composite samples of the wastestream, and analysis for metals by the Toxicity Characteristic Leaching Procedure (TCLP). Any materials which exceed the TCLP limit for lead of 5 parts per million in the leachate must be disposed of as hazardous waste. Materials that do not exceed this limit may be disposed of as solid waste at an appropriate landfill.

A number of transformers were observed inside or within close proximity to the CDOT ROW. If the transformers are impacted by the construction activities, then appropriate handling and disposal of any PCB-containing materials (if present) as required by regulatory guidelines should be followed during construction activities associated with the I-25 expansion.

## **4.2 Segments 3, 4, and 5**

This ESA did not identify any potential sites of concern, or sites which present recognized environmental conditions, in Segments 3, 4, or 5. No further investigation is recommended for these Segments. Additionally, this ESA did not identify any toxic materials within these three segments, with the exception of numerous transformers observed inside or within close proximity to the CDOT ROW. If the transformers are impacted by the construction activities, then appropriate handling and disposal of any PCB-containing materials (if present) as required by regulatory guidelines should be followed during construction activities associated with the I-25 expansion.

## 5.0 Certification and Qualifications

### 5.1 Certification

I have the specific qualifications based on education, training, and experience to assess a property of the nature, history, and setting of the subject property. I have developed and performed the all appropriate inquiries in conformance with the standards and practices set forth in 40 CFR Part 312, with the exception of the items discussed in Section 1 of this report.

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Monique R. Ammidown, P.G.  
Environmental Professional Completing the  
Site Visit and Phase I ESA  
Senior Geologist, Project Manager

### 5.2 Qualifications

Ms. Ammidown has worked in the environmental consulting industry for over 15 years, conducting Phase I ESAs throughout Colorado and across the United States. The ESAs have been conducted in general accordance with the ASTM *Standard Practice for Environmental Site Assessments: Phase I Environmental Site Assessment Process (Practices E 1527-97, E 1527-00, and E 1527-05)*, and the USEPA AAI Final Rule (40 CFR Part 312). In some instances, at the request of the client, the scope of work has included additional issues outside the standard practice. Her experience also includes Phase II ESAs, remedial investigations, Environmental Baseline Studies, as well as various field types of work and sampling activities. Ms. Ammidown has a B.S. Degree in Geology, and an M.E. Degree in Geographic Information Systems, both from the University of Colorado at Denver, and is a registered Professional Geologist in the State of Wyoming. Additionally, Ms. Ammidown is a Certified Asbestos Building Inspector in Colorado and Utah.

## 6.0 References

Kumar 2002. Modified Environmental Site Assessment, Interstate 25 Corridor, State Highway 105 to South Academy Boulevard, El Paso County, Colorado, February 13, 2002, revised October 22, 2002.

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EDR 2012b. Environmental Data Resources, Inc. DataMap™ Area Study, January 10, 2012.

EDR 2012a. Environmental Data Resources, Inc. DataMap™ Well Search Report, January 10, 2012.

## **Figures**



## **Appendix A**

# **Environmental Data Resources, Inc. DataMap™ Well Search Report (on CD only)**

## **Appendix B**

# **Environmental Data Resources, Inc. DataMap™ Area Study**

**(on CD only)**

**Appendix C**  
**Historical Topographic Maps**  
**(on CD only)**

# **Appendix D**

## **Site Photographs**

## **Appendix E**

# **Colorado Department of Transportation Form 881 Initial Site Assessment Checklist**