



Environmental Assessment

City of Munford, Tennessee Fire Department

City of Munford, Tennessee

ARRA-AFG/SCG Grant #: EMW-2009-FC-01275R

November 2010



FEMA

U.S. Department of Homeland Security
Federal Emergency Management Agency - Region IV
3003 Chamblee Tucker Rd - Hollins Bldg
Atlanta, GA 30341-4112

DRAFT
ENVIRONMENTAL ASSESSMENT REPORT
CITY OF MUNFORD PROPOSED NEW FIRE HOUSE
TIPTON COUNTY, TENNESSEE
ARRA GRANT APPLICATION NO.: EMW-2009-FC-01275R

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November 9, 2010

TABLE OF CONTENTS

Page

Contents

1.0	INTRODUCTION	3
2.0	PURPOSE AND NEED	3
3.0	ALTERNATIVES	4
3.1	No Action Alternative.....	4
3.2	Construction of a New Fire House (Preferred Action Alternative).....	4
3.3	Demolition and Rebuilding Alternative.....	5
4.0	AFFECTED ENVIRONMENT AND POTENTIAL IMPACTS	5
4.1	Geology and Soils.....	8
4.2	Water Resources	9
4.2.1	Surface Water	9
4.2.2	Waters of the United States Including Wetlands	9
4.2.3	Groundwater	10
4.2.4	Floodplains	10
4.3	Farmland Conversion Impact Rating.....	11
4.4	Biological Resources	11
4.5	Cultural Resources – Historic Properties.....	12
4.6	Cultural Resources – American Native/Indian Sites	13
4.7	Transportation and Traffic.....	14
4.8	Noise	14
4.9	Air Quality	15
4.10	Environmental Justice.....	16
4.11	Public Services and Utilities	16
4.12	Public Health and Safety	17
5.0	CUMULATIVE IMPACTS.....	18
6.0	PUBLIC INVOLVEMENT	18
7.0	AGENCY COORDINATION AND PERMITS.....	18
8.0	CONCLUSIONS	19
9.0	REFERENCES	20
10.0	LIST OF PREPARERS	22

APPENDICES

APPENDIX A - Figures

APPENDIX B - Photographs

APPENDIX C – Agency Coordination

ACRONYMS AND ABBREVIATIONS

ARRA	American Recovery and Reinvestment Act
BMPs	Best Management Practices
CAA	Clean Air Act
CEQ	Council on Environmental Quality
CFR	Code of Federal Regulations
CWA	Clean Water Act
dB	Decibels
DNL	Day-Night Average Sound Levels
EA	Environmental Assessment
EO	Executive Order
EPA	Environmental Protection Agency
FEMA	Federal Emergency Management Agency
FIRM	Flood Insurance Rate Map
FPPA	Farmland Protection Policy Act
FSC Grant	Fire Station Construction Grant
NAAQS	National Ambient Air Quality Standards
NEPA	National Environmental Policy Act
NFPA	National Fire Protection Association
NHPA	National Historic Preservation Act
NPDES	National Pollutant Discharge Elimination System
NRCS	National Resource Conservation Service
NRHP	National Register of Historic Places
OSHA	Occupational Safety and Health Administration
SCS	Soil Conservation Service
SHPO	State Historic Preservation Office
TDEC	Tennessee Department of Environment and Conservation
THC	Tennessee Historical Commission
THPO	Tribal Historical Preservation Officer
USACE	United States Army Corps of Engineers
USDA	United States Department of Agriculture
USFWS	United States Fish and Wildlife Service
USGS	United States Geological Survey

1.0 INTRODUCTION

The City of Munford Fire Department has submitted an application for Federal Emergency Management Agency (FEMA) funding under FEMA's Fire Station Construction Grants Program (FSC Grant), CFDA 97-115. This program provides funding on a competitive basis for qualifying Fire Departments with funding provided to the Department of Homeland Security by the American Recovery and Reinvestment Act (ARRA) of 2009 (Public Law 111-5). The program will be administered by the Assistance to Firefighters Program Office under FEMA's Grant Programs Directorate.

The City of Munford Fire Station project consists of the construction of a new fire station on a plot of land consisting of approximately 0.95 acres currently owned by the City of Munford. The preferred project site is located immediately east and adjacent to the property occupied by the City of Munford municipal building and the existing fire station. Approximately one-third of the preferred location site for the new fire station is occupied by a parking lot for city employee parking. The remainder of the site is at this time unused grassy areas and drainage swales along the northern property boundary and in the southern portion of the property.

In 1905 the property (which was farmland at the time) was purchased by the Trobaugh family from W.H. Wooten. A house was constructed on the property by the Trobaughs (an exact date of construction is not known) and the home remained on the property until 1977 when the property was purchased by Doug Walker who used the property to store cotton trailers and tractors until the lot was purchased by the City of Munford in 2000.

Photos of the proposed site for the new fire station and surrounding area are included in Appendix B. The new fire station is required in part to existing Occupational Safety and Health Administration (OSHA) violations at the current firehouse facility as well as structural concerns with building itself. This Environmental Assessment (EA) has been prepared in accordance with FEMA's National Environmental Policy Act (NEPA) regulations found in 44 CFR, Part 10.

2.0 PURPOSE AND NEED

The purpose of this project is to replace the current fire station with a new facility that meets all Occupational Safety and Health Administration (OSHA), building and fire code requirements and allows for future expansion. The current fire station is a part of the City Hall building that was reconfigured for use as a volunteer fire station. The existing station has been cited several times during the past few years during OSHA inspections for violations in electrical safety as well as carbon monoxide alarming and prevention. There is also no rated separation between the fire apparatus bay and the existing City Hall which exposes city employees outside the fire department as well as public citizens.

The current station added an upstairs bedroom facility that will only sleep three (3) firefighters and has no alternate escape route in case of emergency for those firefighters. In responding to

an alarm, firefighters must move to a separate building to access the ladder truck for response to structural alarms which provides hazards to employees during inclement winter weather, as cited by OSHA (CFR1910.104(b)) during one inspection. The current station houses five (5) firefighting apparatus. National Fire Protection Association (NFPA) 1710 Standards indicate that each apparatus should be outfitted with a minimum of four (4) personnel each. This would require staffing/housing at the station for 20 firefighters.

The City of Munford is situated over the New Madrid Fault line and is susceptible to large scale earthquakes. Tornadoes are also prevalent in this area. The current fire station was not built and was never intended to withstand these types of natural disaster hazards due to its age and original purpose. It is highly susceptible to complete catastrophic failure should either disaster occur. This compromises not only the lives of the firefighters within, but also the response capability of the fire department to other citizens in need during the same disaster.

The response area for the Munford Fire Department includes the City of Munford and the Town of Atoka for a combined population of approximately 13,000 people. In addition, the area serviced by this fire station extends outside the corporate limits of these municipalities to include the surrounding rural areas adding an additional 16,000 people. The total area served exceeds 60 square miles.

The need to provide a safe working environment, proper seismic construction, as well as an increased housing area for additional personnel drives the need for this project.

3.0 ALTERNATIVES

Three alternatives were considered to address the purpose and needs discussed in Section 2.0 above. These include: the No Action Alternative, the Preferred Action Alternative, and the Demolition and Rebuilding Alternative.

3.1 No Action Alternative

Under the No Action Alternative, no new Fire Station would be constructed in the City of Munford. The current Fire Station will continue to receive OSHA violations which could eventually lead to fines, and the lack of training and billeting space will continue to inhibit the growth of the Fire Department and its ability to provide services. The lack of seismic construction for the existing fire house could inhibit the ability to respond to a natural disaster such as an earthquake or tornado if the firehouse experiences damage during the same incident. This alternative would result in the Munford Fire Department providing continued services at the present level of limited service at best with the inability to provide additional services as the south Tipton County area continues to expand.

3.2 Construction of a New Fire House (Preferred Action Alternative)

Under the Preferred Action Alternative, The City of Munford will construct a new fire house on

a 0.95 acre plot of land immediately to the east and adjacent to the City of Munford Municipal building (Appendix A, Figures 1 & 2). The proposed site was purchased by the City in 2000. The present fire house is located on the south side and attached to the municipal building, approximately 200 feet to the southwest of the proposed site for the new Fire Station and on the same city block. The proposed property is already zoned for the proposed activity and the blueprints for the project as it would be constructed on the proposed site have been approved.

The new facility will meet OSHA and NFPA requirements and allow for the expansion of the fire department to meet the needs of the growing community it serves. Placement of the new facility on property already owned by the City of Munford is essential to the viability of the project. The fact that the proposed site lies within the same proximity to the municipal offices as the current fire station is an added bonus for communication and coordination with the city government.

The growth of the Munford, Atoka and surrounding areas in the past several years has been significant; however the tax base is inadequate to keep up with the needs for fire services. Additionally, the State of Tennessee is experiencing major funding cutbacks for local communities. The City relies on State funding streams for nearly 30% of its general funds. These funds from the State have been cut almost 10% which will result in a required increase in the City's property tax rate from the current \$0.92 to \$1.60 just to keep services at the same level.

While some grant money has been obtained from various sources for the purchase of additional equipment and a FEMA grant has been applied for to obtain funds for construction of the new fire house, funding for the purchase of land (other than City owned) for a new facility is not available.

3.3 Demolition and Rebuilding Alternative

The only additional alternative to building a new fire house on the Preferred site, or remaining in a facility that does not meet NFPA and OSHA requirements, would be to tear down the existing fire station and rebuild in the same location.

This alternative is not feasible as the existing fire station is housed within the City of Munford Municipal building and would therefore require disruption of city government activities during demolition and rebuilding. It has also already been established that the existing location is not large enough to provide for construction of a facility adequate to house up to 20 firefighters or to store the equipment and provide the meeting space needed to meet the growing needs of the community.

4.0 AFFECTED ENVIRONMENT AND POTENTIAL IMPACTS

The following table summarizes the potential impacts of the Preferred Action Alternative and the No Action Alternative. Following the summary table, any resource areas for which potential impacts were identified, as well as high priority resources including floodplains,

waters of the United States, environmental justice, biological resources, and cultural resources, will be discussed in further detail.

Affected Environment	Preferred Action Alternative	No Action Alternative	Section
Geology and Soils	No impacts to underlying geology or soils are anticipated. Shallow soils on the proposed fire station site will be disturbed during construction.	No impacts to underlying geology or soils would occur because no construction or demolition would take place.	4.1
Surface Water	Temporary short-term impacts to surface water runoff are possible due to disturbance of the surface soils during construction.	No impacts to surface waters would occur because no construction or demolition would take place.	4.2.1
Ground Water	No impacts to groundwater are anticipated.	No impacts to groundwater would occur because no construction or demolition would take place.	4.2.3
Floodplains	The proposed project site is not located in the 100-year or 500 year floodplain and is therefore not expected to impact the floodplain.	No impacts to floodplains would occur because no construction or demolition would take place.	4.2.4
Farmlands	The proposed site has been previously developed and is presently covered by a parking lot and unused grassy areas. Construction of the new fire station on this site will not impact prime farmlands.	No impacts to farmland would occur because no construction or demolition would take place.	4.3
Wetlands	No wetlands are located on or adjacent to the proposed site. No impact to wetlands is anticipated.	No impacts to wetlands would occur because no construction or demolition would take place.	4.2.2
Biological Resources	The project site has been previously developed. No impact to biological resources, wildlife, or federally listed species is anticipated.	No impacts to biological resources would occur because no construction or demolition would take place.	4.4

Affected Environment	Preferred Action Alternative	No Action Alternative	Section
Cultural Resources – Historic Buildings	<p>No buildings listed on the National Historic Register are present on or near the proposed project area. No impacts to historic buildings in anticipated.</p> <p>In a response to the request for project review from the State Historic Preservation Office dated April 23, 2010, Mr. Patrick McIntyre stated that there are no National Register of Historic Places listed or eligible properties affected by the preferred action alternative.</p>	No impacts to underlying cultural resources or historic buildings would occur because no construction or demolition would take place.	4.5
Cultural Resources – American Native/Indian Resources	No known American Native/Indian historic, religious, or archeological sites are known to be present on the proposed site. A response from the Tribal Archeological and Historical official has not been received to date.	No impacts to cultural resources or American or Native resources would occur because no construction or demolition would take place.	4.6
Transportation	A minor temporary increase in the volume of construction traffic on roads in the immediate vicinity of the construction site is anticipated.	No impacts to transportation patterns would.	4.7
Noise	Short-term noise impacts would occur at the proposed project site during the construction period.	No changes in noise levels would occur.	4.8
Air Quality	Short-term impacts to air quality would occur during the construction period.	No changes in air quality would occur.	4.9

Affected Environment	Preferred Action Alternative	No Action Alternative	Section
Environmental Justice	No disproportionately high or adverse effect on minority or low-income populations would occur.	Not applicable	4.10
Socio-economic Resources	No impacts to socioeconomic resources would occur.	Not applicable	4.10
Traffic	Short-term impacts to traffic flow on Munford Avenue would occur during the construction period.	No changes in traffic patterns would occur.	4.7
Safety	Safety for the fire fighters and the community they serve would be improved.	The safety of the firefighters working in the existing station could be at risk as indicated by OSHA and NFPA citations. The safety of the community served by the fire department would remain at risk due to inadequate resources and the potential for impacted response in the event of a large scale seismic	4.12

4.1 Geology and Soils

According to the Groundwater Resources of Western Tennessee and the State of Tennessee, Division of Geology generalized geologic map of Tennessee (Appendix A, Figure 3), the proposed project site is underlain by Tertiary loess consisting of sand, silt, clays, and gravels (Appendix A, Figure 4). The loess is underlain by the sandy and gravelly Jackson formation and the Wilcox Group (Appendix A, Figure 5).

Surface soils at the proposed project location are classified as Memphis silt loam, 1 to 5 percent slopes, eroded (USDA-SCS, 1993). The Memphis silt loam has a moderate permeability and is considered of good suitability for most urban uses. Characteristics of this soil type include low strength which can be overcome by good building design and moderate potential for erosion which can be moderated by well maintained erosion control practices during construction.

No Action Alternative

Under the No Action Alternative, no impacts to geology or soils would occur and the site would remain a parking lot.

Preferred Action Alternative

Under the Preferred Action Alternative, soils at the proposed site would be disturbed to remove the parking lot, install the utility infrastructure, and construct the new fire station and driveways. This disturbance would be mitigated by Best Management Practices as outlined in the construction storm water pollution prevention plan for the project. The proposed fire station building would have a slab foundation and would therefore not significantly impact subsurface geology.

4.2 Water Resources

4.2.1 Surface Water

The Clean Water Act (CWA), as amended in 1977, established the basic framework for regulating discharges of pollutants into the waters of the United States.

Surface water runoff from the proposed fire station site flows north to a small drainage ditch located along Munford Avenue. Drainage from this area then flows toward the south through a series of swales and ditches to the Big Branch stream, continuing to the south where it joins Big Creek followed by the Loosahatchie River and ultimately to the Mississippi River just north of the City of Memphis, Tennessee. There are no wild and scenic rivers as designated under the Wild and Scenic Rivers Act, in the project area.

No Action Alternative

Under the No Action Alternative, no construction will occur and there will be no impacts to surface water.

Preferred Action Alternative

Under the Preferred Action Alternative temporary, impacts to surface water runoff from the site are possible during the construction period due to disturbance of the soils. The proposed site is slightly less than one (1) acre in area and therefore would not require an National Pollutant Discharge Pollutant Elimination System (NPDES) Construction Storm Water Permit to be obtained or a Storm Water Pollution Prevention Plan to be developed for the project, however; the City has applied for and has received approval for a construction storm water permit. The Construction storm water pollution prevention plan that was submitted as part of the Construction storm water permitting process includes implementation of appropriate Best Management Practices (BMPs) including the installation of silt fencing and re-vegetation of soils to minimize the potential for soil erosion. Subsurface geology at the site would remain unaffected by the proposed project at this location.

4.2.2 Waters of the United States Including Wetlands

The U.S. Army Corps of Engineers (USACE) regulates the discharge of dredged or fill materials into waters of the U.S., including wetlands, pursuant to Section 404 of the CWA.

Additionally, Executive Order (EO) 11990 (Protection of Wetlands) requires federal agencies to avoid, to the extent possible, adverse impact to wetlands. According to the U.S. Fish and Wildlife Service (Appendix A, Figure 6) there are no wetlands located in the proposed project area.

No Action Alternative

Under the No Action Alternative, no impacts to waters of the U.S. including wetlands would occur.

Preferred Action Alternative

Under the Preferred Action Alternative, no impacts to waters of the U.S. including wetlands would occur.

On April 16, 2010 a letter requesting project review was sent to the United States Fish and Wildlife Service (USFWS) field office in Cookeville, Tennessee. In a response dated April 28, 2010 (see letter in Appendix C) the agency office Field Supervisor indicated that no significant impacts to wetlands are anticipated from this proposed action. Per the USFWS Wetlands Map (Appendix A, Figure 6), the project site is not in or near wetlands.

4.2.3 Groundwater

According to the U.S. Geological Survey Office in Nashville, Tennessee, the City of Munford Water Department maintains four (4) groundwater wells for municipal water supply purposes. These wells draw an average of 1.05 million gallons per day annual average from the tertiary Memphis Sands Aquifer (USGS, 2010a).

No Action Alternative

Under the No Action Alternative, no impacts to ground water would occur.

Preferred Action Alternative

Under the Preferred Action Alternative, shallow excavation and grading are not expected to impact ground water resources in the area. No existing or closed wells are known to be located on the property. The presence of a new fire station on the site is not likely to pose a threat to ground water quality.

4.2.4 Floodplains

Executive Order (EO) 11988 (Floodplain Management) requires federal agencies to avoid direct or indirect support of development within the 100-year floodplain whenever there is a practicable alternative. FEMA uses Flood Insurance Rate Maps (FIRMs) to identify the regulatory 100-year floodplain for the National Flood Insurance Program. Consistent with EO 11988, the FIRM (FEMA Map No. 47167C0305F, December 19, 2006) was examined during

the preparation of this EA.

No Action Alternative

Under the No Action Alternative, no construction would occur; therefore no impact to the floodplain would be expected.

Preferred Action Alternative

The proposed project site is situated in the unshaded area of Zone X and is not located within the 100-year or the 500-year floodplain. See Figure 7, Appendix A for the floodplain map (FEMA Map No. 47167C0305F, December 19, 2006). No impacts to the floodplain are anticipated from the proposed construction of the fire station building.

4.3 Farmland Conversion Impact Rating

The Farmland Protection Policy Act (FPPA) states that Federal agencies must “minimize the extent to which Federal Programs contribute to the unnecessary conversion of the farmland to non-agricultural uses”. The National Resource Conservation Service (NRCS) is responsible for protecting significant agricultural lands from irreversible conversion that result in the loss of essential food and chemical characteristics for the production of food, feed, forage, fiber, and oilseed crops. Prime farmland is either used for food or fiber crops or is available for those crops, but is not urban, build-up land or water areas. Unique farmland is land other than prime farmland that is used for production of specific high-value food and fiber crops. Unique farmland has the special combination of soil quality, location, growing season and moisture supply needed to economically produce sustained high quality, high yields or specific crops when treated and managed according to acceptable farming methods.

No Action Alternative

The No Action Alternative would not impact Prime Farmland since no disturbance of soils would take place.

Preferred Action Alternative

The soil type at the proposed project site is classified as Memphis silt loam, 1 to 5 percent slopes, eroded (USDA-SCS, 1993). While the Memphis silt loam meets the soil requirements for Prime Farmland, the proposed project site has been used for decades for residential, business, and municipal purposes and not as farmland therefore disturbance of farmland would not occur. Under the Preferred Action Alternative, no impact to Prime Farmland would take place since the proposed site is centrally located within the urban area of the town. No farming activities take place within a half-mile of the site and no farming activities are anticipated to be inclusive to the site area in the future.

4.4 Biological Resources

Part of the proposed project area is presently covered with a parking lot for the City of Munford

City Hall and is bordered by grassy lawn areas providing limited habitat for wildlife. Species present likely to use the proposed project site would be those common to city/suburban areas and are unlikely to include any endangered or threatened species. The U.S. Fish and Wildlife Service (USFWS) lists the following federally endangered animal species for Tipton County, Tennessee (USFWS, 2009):

<u>Name</u>	<u>Status</u>
Least tern (<i>Sterna antillarum</i>)	Endangered
Yellow blossom (pearly mussel) (<i>Epioblasma florentina florentina</i>)	Endangered
Upland combshell (<i>Epioblasma metastriata</i>)	Endangered
Cumberland pigtoe (<i>Pleurobema gibberum</i>)	Endangered
Pygmy madtom (<i>Noturus stanauli</i>)	Endangered
Royal marstonia (snail) (<i>Pyrgulopsis ogmorhapha</i>)	Endangered

The Endangered Species found in Tipton County are primarily aquatic. The proposed site does not contain any aquatic habitat nor is it directly adjacent to the any aquatic habitat. The least tern is not known to nest in the subject area.

No Action Alternative

Under the No Action Alternative, no wildlife habitat would be disturbed as the fire station would remain at the present location.

Preferred Action Alternative

Under the Preferred Action Alternative temporary disturbance of the approximately 0.95 acre project site would occur during construction but is unlikely to affect any wildlife habitat since the site has been previously developed. No threatened or endangered species are known to inhabit the proposed site. A consultation letter requesting project review was sent to the USFWS regional office in Cookeville, Tennessee on April 16, 2010 (Appendix C). In a response dated April 28, 2010, USFWS stated that no federally listed endangered species, or habitat suitable for such species, are known to exist in the project area.

4.5 Cultural Resources – Historic Properties

Section 106 of the National Historic Preservation Act (NHPA), as amended, and implemented by 36 CFR Part 800, requires federal agencies to consider the effects of their actions on historic properties and provide the State Historic Preservation Office (SHPO) an opportunity to comment on federal projects that could have an effect on historic properties prior to implementation. Historic properties are defined as archeological sites, standing structures, or other historic resources listed in or eligible for listing in the National Register of Historic Places (NRHP).

No Action Alternative

Under the No Action Alternative, no construction will take place and therefore no historic

properties would be impacted.

Preferred Action Alternative

A review of known cultural resources in proximity to the proposed project site was conducted during the research phase of this Environmental Assessment. The online records of the NRHP for Tipton County and the City of Munford Website were used for records review. Neither website indicated the presence of cultural resources of concern in the proposed project area. A site reconnaissance conducted on April 2, 2010 identified the Munford United Methodist Church, built in 1911 within a block of the proposed fire station site. The church has a plaque outlining the history of the church that was erected by the Memphis Conference Commission on Archives and History but is not listed on the National Registry of Historic Places.

On April 15, 2010 a letter was sent to the Tennessee Historical Commission (THC) requesting review and comment on the proposed project in regard to cultural and historic resources that may be impacted by the fire station relocation. In a response from the THC dated April 23, 2010 the agency determined that there are no listed or eligible properties affected by the proposed project. THC had no objections to proceeding with the project at the proposed site. Copies of the letter requesting the project review from the THC as well as a copy of the letter of response are included in Appendix C.

If any modifications to the current project plans are made or any archeological remains are uncovered during ground disturbance, the THC will be will need to be consulted again before the project can continue.

4.6 Cultural Resources – American Native/Indian Sites

During the research phase of this environmental assessment, a letter dated April 15, 2010 (Appendix C) addressed to the Tribal Historical Preservation Officer (THPO) was prepared and submitted to FEMA to be forwarded to the tribal officer for project review and approval as requested. The letter requested a review of the proposed project for known native cultural, historical, religious, or archeological resources that may be affected by the project. FEMA will complete the consultation with the THPO.

No Action Alternative

Under the No Action Alternative, no construction will take place and no native cultural, historical, religious, or archeological resources would be impacted.

Preferred Action Alternative

Under the Preferred Action Alternative, no impacts to known native cultural, historical, religious, or archeological resources would be impacted.

4.7 Transportation and Traffic

The current fire station location is attached to the south end of the Munford City Hall building facing College Street in downtown Munford. The proposed project site is located on the parcel of property east and adjacent to the City Hall building where the city employee parking lot is presently located. The new fire station building will be a stand alone building with a driveway for the fire trucks that enters onto Munford Avenue. The new location is on the same city block as the current fire house.

No Action Alternative

Under the No Action Alternative no impact on transportation or traffic will occur.

Preferred Action Alternative

Under the Preferred Action Alternative, short-term impacts to transportation and site access are anticipated during the grading and construction phase of the project. A minor, temporary increase in the volume of construction traffic on Munford Avenue could potentially result in a slower traffic flow for the duration of the construction phase. To mitigate potential delays, construction vehicles may be stored onsite and appropriate signage would be posted on affected roadways.

Post-construction traffic volumes would not be affected overall on Munford Street with minor impacts on traffic flow as the fire trucks leave the new fire station in response to a call. This impact would be minimal and limited to the area immediately in front of the fire station. Larger scale impacts on traffic flow beyond one city block would not occur since the routes to fires used by the fire trucks after they leave the fire station would be the same routes being used from the existing station.

4.8 Noise

Noise is generally defined as unwanted sound. Sound is most commonly measured in decibels (dB) on the A-weighted scale, which is the scale most similar to the range of sounds that the human ear can hear. The Day-Night Average Sound Level (DNL) is an average measure of the sound. The DNL descriptor is accepted by federal agencies as a standard for estimating sound impacts and establishing guidelines for compatible land uses. EPA guidelines, and those of many other federal agencies, state that outdoor sound levels in excess of 55 dB DNL are “normally unacceptable” for noise sensitive land uses including residences, schools, or hospitals (EPA, 1974).

No Action Alternative

Under the No Action Alternative, there would be no impact to noise levels as the fire station would continue to operate at the present location.

Preferred Action Alternative

Under the Preferred Action Alternative, short-term increases in noise levels are anticipated during the construction period. To reduce noise level impacts, construction will take place during normal business hours. Equipment and machinery utilized at the project site would meet all local, state, and federal noise regulations. Long-term noise level impacts from the proposed project will be limited to increased noise levels for residential houses located immediately across Munford Avenue when the fire trucks leave to answer a call. Noise level impacts beyond one block from the new fire station will not occur as the present fire station is located around the corner on the same city block as the proposed site; therefore noise levels from the fire trucks beyond the driveway area for the new fire station should not change.

4.9 Air Quality

The Clean Air Act (CAA) requires that states adopt ambient air quality standards. The standards have been established to protect the public from potentially harmful amounts of pollutants. Under the CAA, the EPA established primary and secondary air quality standards. Primary air quality standards protect the public health, including the health of the “sensitive populations, such as people with asthma, children, and older adults.” Secondary air quality standards protect public welfare by promoting ecosystem health, and preventing decreased visibility and damage to crops and buildings. EPA has set National Ambient Air Quality Standards (NAAQS) for the following six (6) criteria pollutants: ozone (O₃), particulate matter (PM_{2.5}, PM₁₀), nitrogen dioxide (NO₂), carbon monoxide (CO), sulfur dioxide (SO₂), and lead (Pb). According to the Tennessee Department of Environment and Conservation (TDEC), Division of Air Pollution Control, Tipton County is classified as in attainment, meaning that criteria air pollutants do not exceed the NAAQS standards (TDEC, 2009).

No Action Alternative

Under the No Action Alternative, no impacts to air quality will occur because no construction will take place, a new fire station will not be built, and the present fire station would operate as it does currently.

Preferred Action Alternative

Under the Preferred Action Alternative, short-term impacts to air quality, primarily particulate matter, in the immediate area of the proposed site may occur due to construction activities. To reduce temporary impacts to air quality, construction contractors would be required to water down construction areas when necessary to suppress the spread of airborne particulates in to the air. Emissions from fuel-burning internal combustion engines (e.g. heavy equipment and earthmoving machinery) could temporarily increase levels of some of the criteria pollutants, including CO, NO₂, O₃, PM, and non-criteria pollutants such as volatile organic compounds. To reduce the emission of criteria pollutants, fuel-burning equipment running times would be kept to a minimum and engines would be properly maintained.

The location of the new fire station would not significantly impact air quality in the area

because the new station is located on the same city block as the existing fire house. No long-term impacts to air quality from the new fire station are anticipated.

4.10 Environmental Justice

EO 12898 (Federal Actions to Address Environmental Justice in Minority Populations and Lower-Income Populations) mandates that federal agencies identify and address, as appropriate, disproportionately high and adverse human health or environmental effects of their programs, policies, and activities on minority and low-income populations. Socioeconomic and demographic data for this project area were reviewed to determine if a disproportionate number of minority or low-income persons have the potential to be adversely affected by the proposed project.

According to the year 2008 City-Data.com information, the City of Munford, Tennessee has a population of 6,634 people. The median household income reported in the 2008 for the City of Munford was \$52,230 with 12.5% living below the poverty level. The median household income reported for all of Tipton County was \$50,206 in 2008 with 12.1% living below the poverty level. Minorities in Munford represent 10% of the population in Munford as compared to 21.1% and 19.6% for Tipton County and the State of Tennessee respectively.

No Action Alternative

Under the No Action Alternative, there would be no disproportionately high or adverse effect on minority or low-income populations. All populations would be equally impacted by the current capacity and efficiency of the fire department under the current conditions.

Preferred Action Alternative

Under the Preferred Action Alternative, there would be no disproportionately high or adverse effect on minority or low-income populations. Implementation of the Proposed Action would benefit all populations with the City of Munford and the surrounding areas served by the Munford Fire Department by providing capacity for growth of the fire department services as the population of the area grows as well as providing for the safety of the fire department employees in carrying out their daily operations efficiently and effectively. Upgrading of the facility to include a building that is built to withstand seismic activities will improve the ability of the fire department to be able to provide services to all populations in the event of an earthquake.

4.11 Public Services and Utilities

Having an up-to-date, fully functional fire station serving a small city and the surrounding area is in itself a necessary public service. Construction of a new fire station for the reasons outlined in Section 3.2 of this EA will assist the City of Munford in providing an acceptable level of public service to the community.

No Action Alternative

Under the No Action Alternative no impacts to public services or utilities will occur as the fire station would continue to function using the existing city services and utilities.

Preferred Action Alternative

Under the Preferred Action Alternative, only minor impacts to public services or utilities would occur. The new fire station would require the installation of new water, sewer, and electrical connections to service the new building, however these impacts are considered to be minor and within the existing capabilities of the City of Munford public services and utilities capabilities.

4.12 Public Health and Safety

Safety and security issues considered in this EA include the health and safety of City of Munford residents and the residents of the surrounding areas served by the Munford Fire Department as well as the safety of the Fire Department personnel as they conduct their day-to-day activities.

No Action Alternative

The No Action Alternative could have a negative impact on the safety of the residents of the City of Munford and the surrounding areas served by the Munford Fire Department. The present fire station does not provide adequate sleeping accommodations for firefighters and does not provide any margin for growth of the fire department in response to populations changes in the area it serves. OSHA violations that cannot be adequately addressed at the present facility due to structural issues will result in continued fines as well as pose a threat to the safety of the working environment for the firefighters.

Preferred Action Alternative

Under the Preferred Action Alternative, the construction of a new fire station will allow the City of Munford to be in compliance with OSHA regulations. The new fire station should result in faster response times by offering expanded overnight accommodations for firefighters when on duty.

In the event of a catastrophic earthquake, having the fire department in a new building built to include seismic construction code requirements will provide a better opportunity for the fire department to be able to respond to community needs in the event of an earthquake.

The proposed new fire station will also provide adequate storage capacity for existing and future rescue equipment and enhance fire department and other emergency management services by providing space for training of personnel and volunteers. In the long term, the Preferred Action Alternative is believed to be an enhancement to public safety services for the area.

5.0 CUMULATIVE IMPACTS

According to the Council on Environmental Quality (CEQ) regulations, cumulative impacts represent the “impact on the environment which results from the incremental impact of the action when added to other past, present, and reasonably foreseeable future actions, regardless of what agency (federal or non-federal) or person undertakes such other actions. Cumulative impacts can result from individually minor but collectively significant actions taking place over a period of time (40 CFR 1508.7).” In accordance with NEPA and to the extent reasonable and practical, this EA considered the combined effect of the Preferred Action Alternative and other actions occurring or proposed in the vicinity of the project site.

Given the fact that the proposed new fire station is located on the same city block and within approximately 200 feet of the existing fire station, no detrimental cumulative effects are anticipated for the proposed project. The employee parking lot in front of the municipal building will be expanded to accommodate the vehicles that were previously parked in the parking lot that now occupies the Preferred Alternative location.

The No Action Alternative of keeping the existing fire station in operation and the present location could have the cumulative impact of heightened safety concerns for fire station personnel, fines to the City for OSHA violations that cannot be corrected at the existing facility, and inhibited response capabilities for the fire department in the event of a seismic event that could cause damage to the existing fire station that does not meet current building codes.

6.0 PUBLIC INVOLVEMENT

The public has been made aware of the proposed new fire station through newspaper articles, announcements on the City website, etc. Public involvement opportunities were presented at every step of the City approval process where the public was invited to comment during board meetings, Planning Commission meetings, and City Council meetings. There have been no public objections to the project.

7.0 AGENCY COORDINATION AND PERMITS

The following agencies and organizations were contacted by letter requesting project review during the preparation of this EA. Responses received to date are included in Appendix C.

- U.S. Fish and Wildlife Service - Cookeville, Tennessee Regional Office;
- Tennessee Historical Commission; and,
- Tribal Historic Preservation Officer/Archeologist – Letter prepared and sent to FEMA coordinator for contact with the tribe.

In accordance with applicable local, State, and Federal regulations, the applicant (City of Munford fire department) would be responsible for acquiring any necessary permits prior to

commencing construction at the proposed project site.

8.0 CONCLUSIONS

No detrimental impacts to geology, groundwater, floodplains, public health and safety, socioeconomic resources, environmental justice, or cultural resources are anticipated under the Preferred Action Alternative.

During the construction period, short-term impacts to soils, surface water, transportation, air quality, and noise are anticipated. All short-term impacts will be mitigated using BMPs, such as silt fences, proper equipment maintenance, work scheduling, and appropriate signage. No long-term impacts are anticipated as a result of the proposed project.

Beneficial impacts to public services, the day-to-day safety of the firefighters, and ability of the fire department to provide improved or expanded services both on a daily basis as well as in the event of a natural disaster such as an earthquake are anticipated.

9.0 REFERENCES

City Data website, 2010. Accessed June 18, 2010. <http://www.city-data.com/city/Munford-Tennessee.html>

City of Munford Website, 2010. Accessed March 30, 2010. http://www.munford.com/files/Maps%20PDF/map_munford_city_map.pdf

FEMA, 2006. *Flood Insurance Rate Map, Tipton County, Tennessee. Map Number 47167C0305F. December 19, 2006.* Accessed April 9, 2010. www.msc.fema.gov.

National Register of Historic Places website; Tipton County; Accessed March 30, 2010. www.nationalregisterofhistoricplaces.com/tn/Tipton/state.html

Rivers.gov. 2010. National Wild and Scenic Rivers website. Accessed March 30, 2010. <http://www.rivers.gov/wildriverslist.html>

Scorecard.org – *Environmental Justice data compilation website.* Accessed March 30, 2010. <http://www.scorecard.org/community>

State of Tennessee, Division of Geology Website. Accessed April 12, 2010. www.tn.gov/environment/tdg/images/geolog_1.jpg

United States Census Bureau (USCB). 2000. *Profile of General Demographic Characteristics – Munford Town, Tennessee.*

United States Census Bureau (USCB). 2010. *Tipton County Quickfacts from the US Census Bureau website.* Accessed April 12, 2010. www.quickfacts.census.gov/qfd/states/47/47167.html.

United States Department of Agriculture, Natural Resource Conservation Service (USDA/NRCS). Accessed April 9, 2010. <http://websoilsurvey.nrcs.usda.gov/app/WebSoilSurvey.aspx>.

United States Department of Agriculture – Soil Conservation Service (USDA-SCS). 1993, *Soil Survey of Tipton County.*

United States Geological Survey, 2010a. Tennessee Water Science Center website. Accessed April 12, 2010. <http://tn.water.usgs.gov/infodata/groundwater.html>

United States Geological Survey. 2010b. Topographic Map – Blytheville Quad. Accessed April 9, 2010. www.msrmaps.com.

United States Government Printing Office Washington D.C. . 1933. *Ground-Water Resources of Western Tennessee- Water Supply Paper 656*. Francis G. Wells; Tennessee Division of Geology.

United States Fish and Wildlife Service (USFWS) website: Accessed March 30, 2010.
<http://www.fws.gov/Endangered>

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10.0 LIST OF PREPARERS

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Atlanta, GA 30341
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APPENDIX A – FIGURES

DRAFT

USGS 39 km NE of Memphis, Tennessee, United States 01 Jul 1983

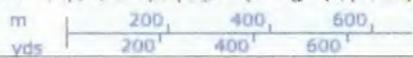
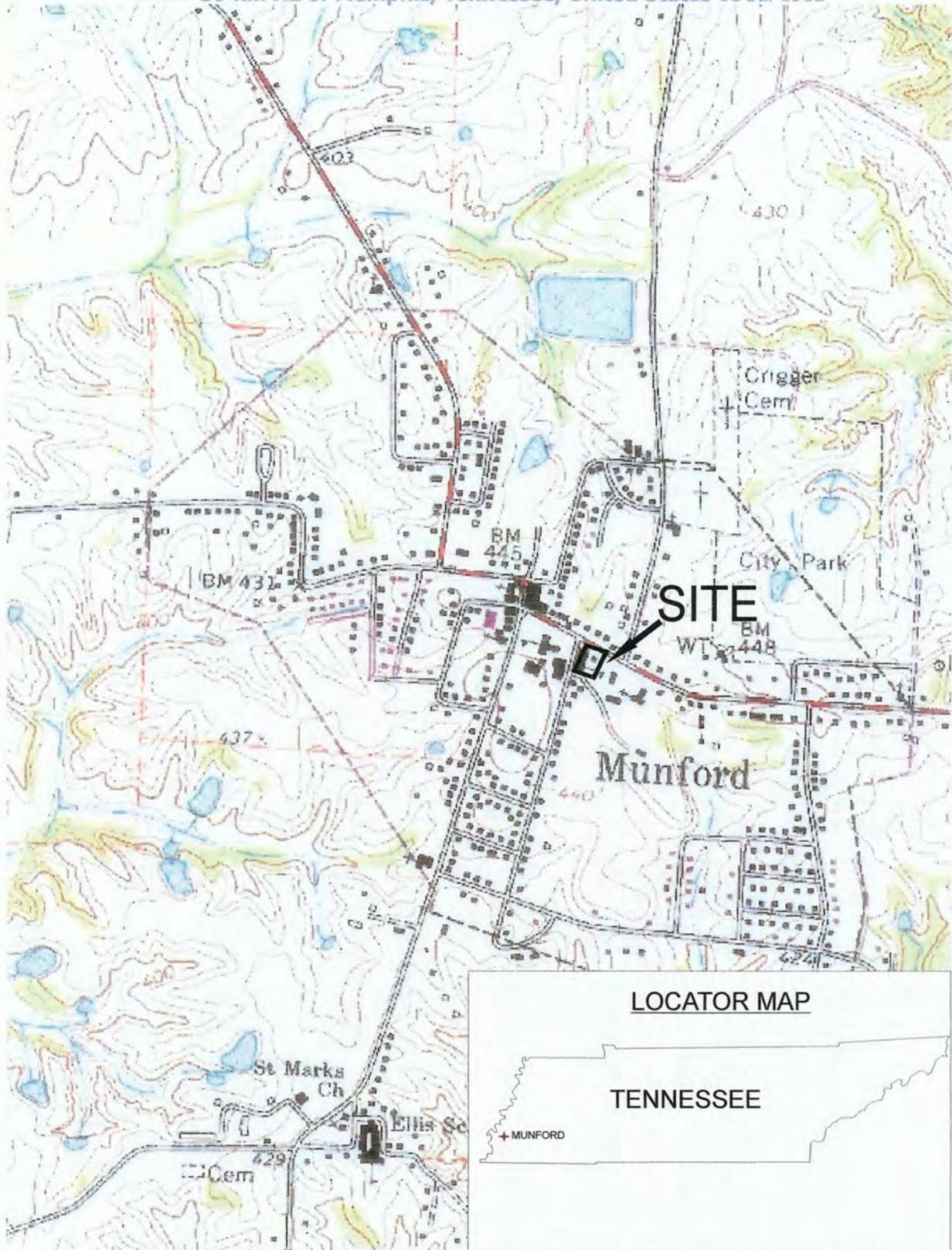
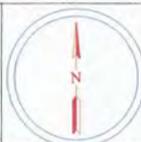


Image courtesy of the U.S. Geological Survey

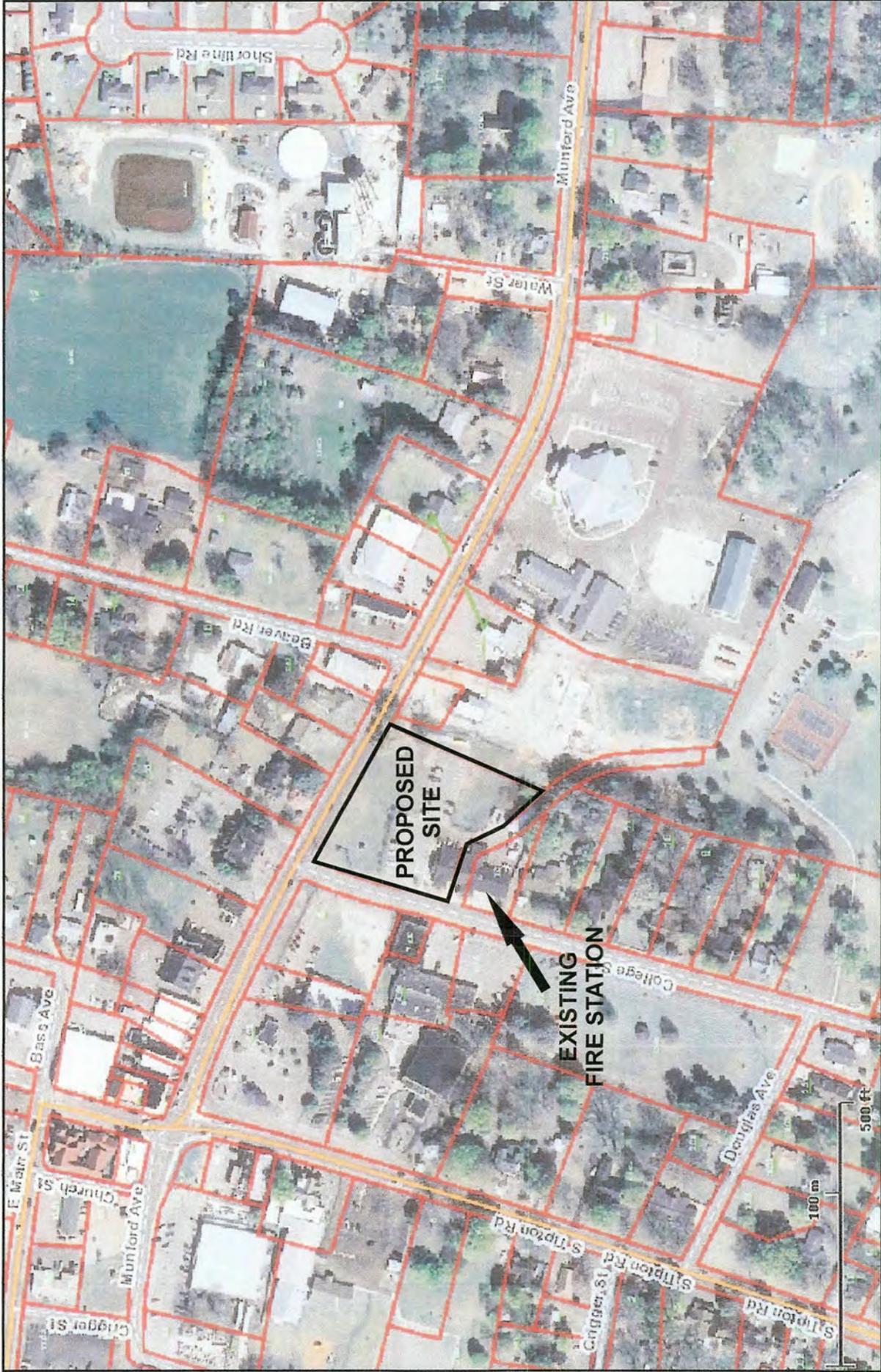


HESS ENVIRONMENTAL SERVICES, INC.
 6057 EXECUTIVE CENTRE DRIVE, SUITE 6
 MEMPHIS, TENNESSEE 38134
 PHONE 901-377-9139 / FAX 901-377-9150



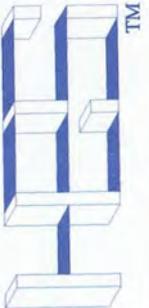
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CHECKED BY:	

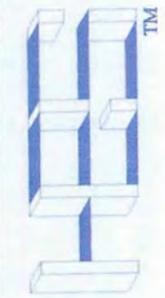
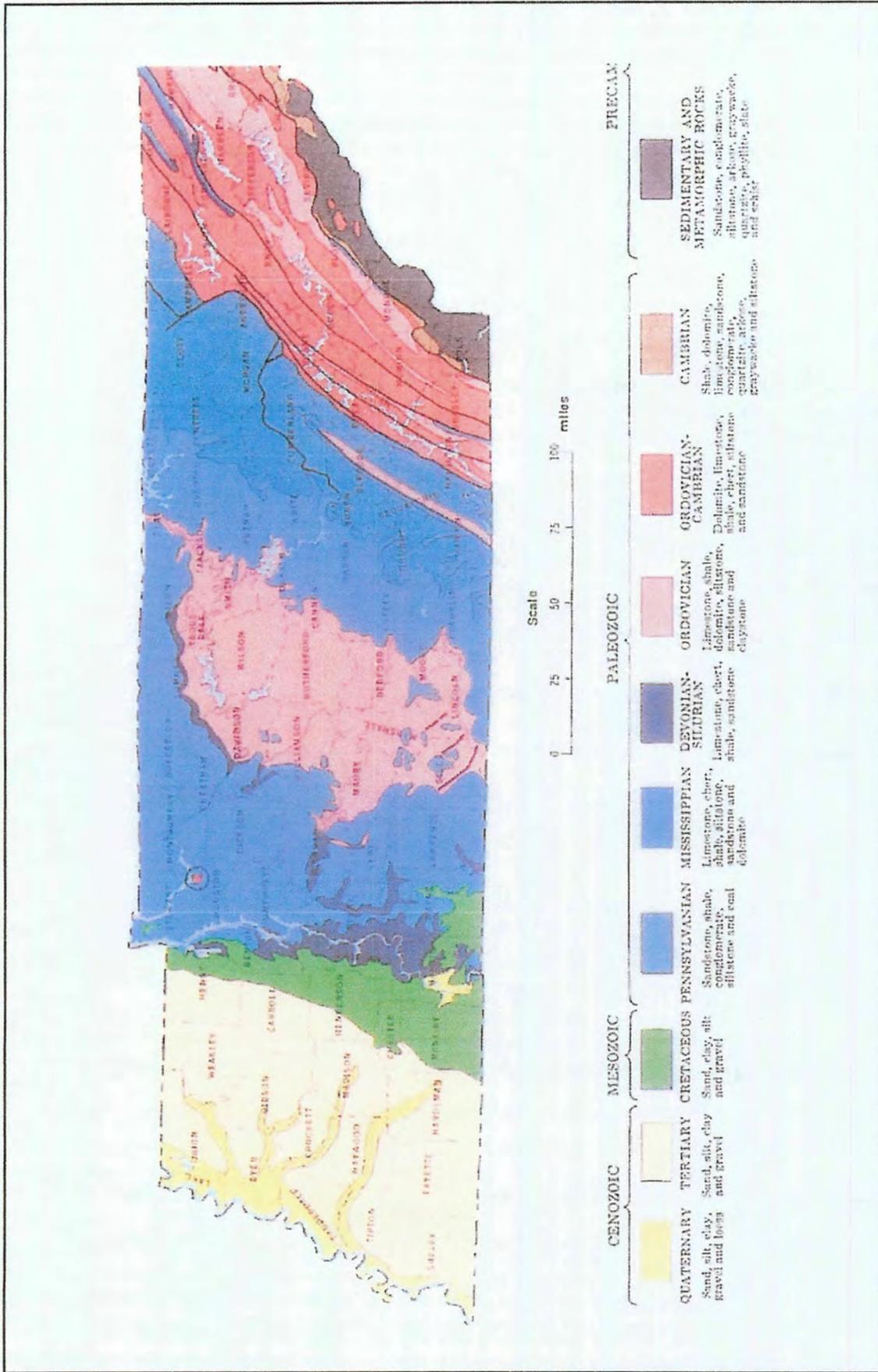
FIGURE 1
 SITE LOCATION ON
 USGS TOPOGRAPHIC MAP
 PROPOSED FIRE DEPARTMENT SITE
 MUNFORD, TENNESSEE
 (35°26'50.77" N 89°48'45.99" W)



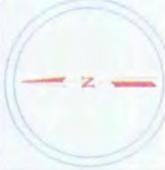
DATE: 10-04-2010	PROJECT: 9080.T1	FIGURE 2	
SCALE: AS SHOWN	DWG NO.: 9080-002	SITE LOCATION ON GIS PARCEL MAP	
DRAWN BY: ED	LOG NO.: 6127-10	(35°26'50.77" N 89°48'45.99"W)	
CHECKED BY:		PROPOSED FIRE DEPARTMENT SITE MUNFORD, TENNESSEE	

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 MEMPHIS, TENNESSEE 38134
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DATE: 06-21-2010	PROJECT: 9080.T1
SCALE: AS SHOWN	DWG NO.: 9080-006
DRAWN BY: ED	LOG NO.: 6272-10
CHECKED BY: <i>JA</i>	

FIGURE 3
 GENERALIZED GEOLOGIC MAP
 OF TENNESSEE
 PROPOSED FIRE DEPARTMENT SITE
 MUNFORD, TENNESSEE



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DATE: 10-4-2010	PROJECT: 9080.T1
SCALE: AS SHOWN	DWG NO.: 9080-004
DRAWN BY: ED	LOG NO.: 6129-10
CHECKED BY:	

FIGURE 4
 SITE LOCATION ON
 NRCS WEB SOIL SURVEY MAP
 PROPOSED FIRE DEPARTMENT SITE
 MUNFORD, TENNESSEE

Tipton County, Tennessee

MeB2—Memphis silt loam, 1 to 5 percent slopes, eroded

Map Unit Setting

Mean annual precipitation: 46 to 60 inches

Mean annual air temperature: 49 to 70 degrees F

Frost-free period: 209 to 223 days

Map Unit Composition

Memphis and similar soils: 100 percent

Description of Memphis

Setting

Landform: Loess hills

Landform position (three-dimensional): Interfluvial

Parent material: Loess

Properties and qualities

Slope: 1 to 5 percent

Depth to restrictive feature: More than 80 inches

Drainage class: Well drained

Capacity of the most limiting layer to transmit water (Ksat): Moderately high to high
(0.57 to 1.98 in/hr)

Depth to water table: More than 80 inches

Frequency of flooding: None

Frequency of ponding: None

Available water capacity: Very high (about 13.2 inches)

Interpretive groups

Land capability (nonirrigated): 2e

Typical profile

0 to 5 inches: Silt loam

5 to 60 inches: Silt loam

Map Unit Legend

Tipton County, Tennessee (TN167)			
Map Unit Symbol	Map Unit Name	Acres in AOI	Percent of AOI
MeB2	Memphis silt loam, 1 to 5 percent slopes, eroded	2.5	100.0%
Totals for Area of Interest		2.5	100.0%

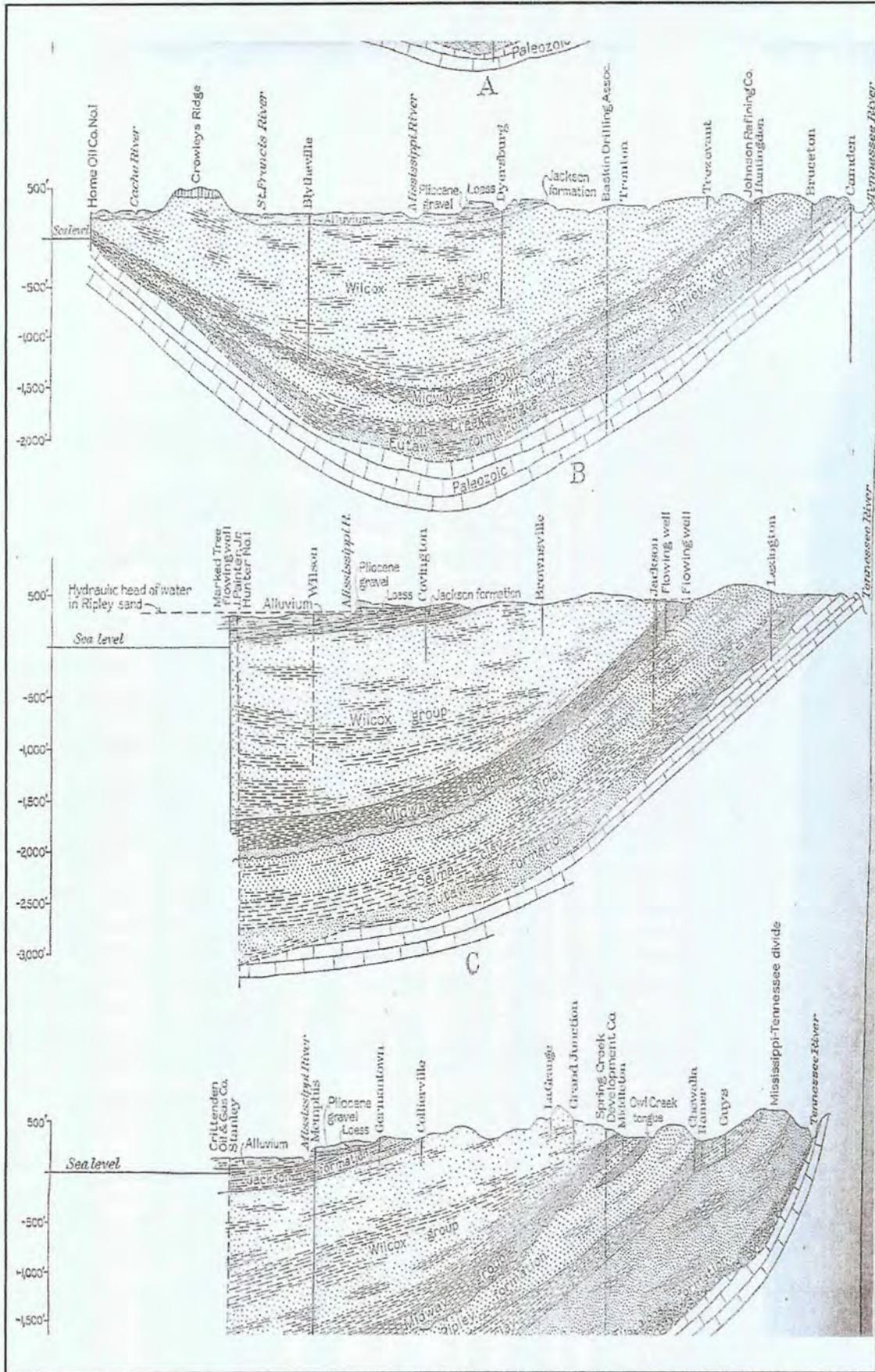


FIGURE 5
 SUBSURFACE GEOLOGY
 TIPTON COUNTY
 PROPOSED FIRE DEPARTMENT SITE
 MUNFORD, TENNESSEE

PROJECT: 9080.T1	DATE: 06-21-2010
DWG NO.: 9080-007	SCALE: NTS
LOG NO.: 6273-10	DRAWN BY: ED
	CHECKED BY: <i>ED</i>



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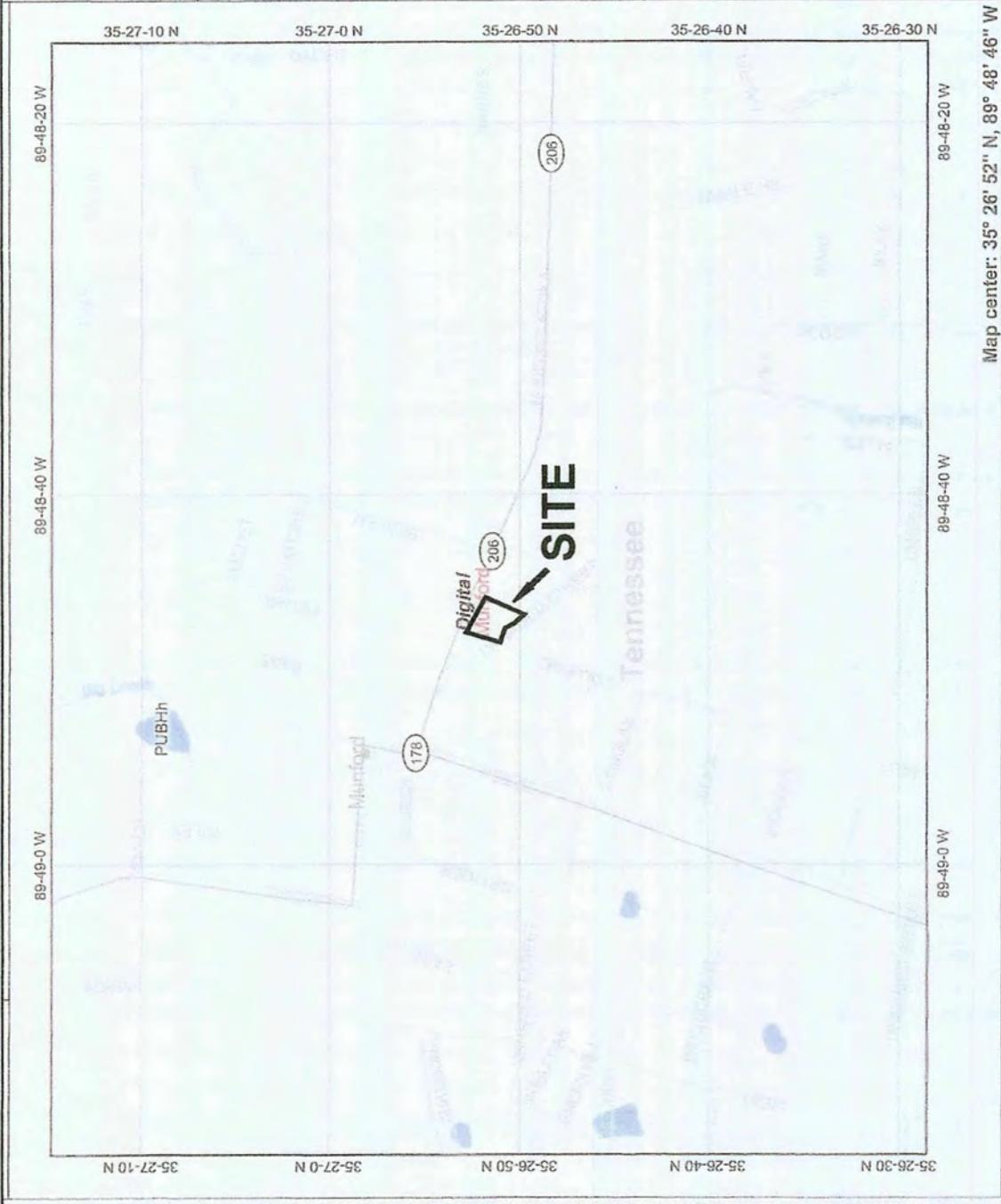




Legend

- Ohio_wet_scan
- 0
- 1
- Out of range
- Interstate
- Major Roads
- Other Road
- Interstate
- State highway
- US highway
- Roads
- Cities
- USGS Quad Index 24K
- Lower 48 Wetland Polygons
- Estuarine and Marine Deepwater
- Estuarine and Marine Wetland
- Freshwater Emergent Wetland
- Freshwater Forested/Shrub Wetland
- Freshwater Pond
- Lake
- Other
- Riverine
- Lower 48 Available Wetland Data
- Non-Digital
- Digital
- No Data
- Scan
- NHD Streams
- Counties 100K
- States 100K
- South America
- North America

Scale: 1:10,000



Map center: 35° 26' 52" N, 89° 48' 46" W

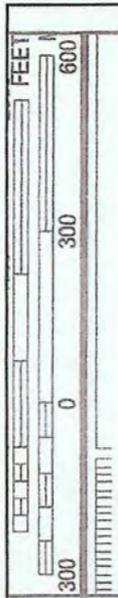


DATE: 06-21-2010	PROJECT: 9080 TT
SCALE: 1 : 10,000	DWG NO.: 9080-003
DRAWN BY: ED	LOG NO.: 6128-10
CHECKED BY: <i>ED</i>	

HESS ENVIRONMENTAL SERVICES, INC.
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 MEMPHIS, TENNESSEE 38134
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FIGURE 6
 SITE LOCATION ON
 WETLANDS MAP
 PROPOSED FIRE DEPARTMENT SITE
 MUNFORD, TENNESSEE



**FIRM
FLOOD INSURANCE RATE MAP
TIPTON COUNTY,
TENNESSEE
AND INCORPORATED AREAS**

PANEL 305 OF 475
(SEE MAP INDEX FOR FIRM PANEL LAYOUT)
CONTAINS:

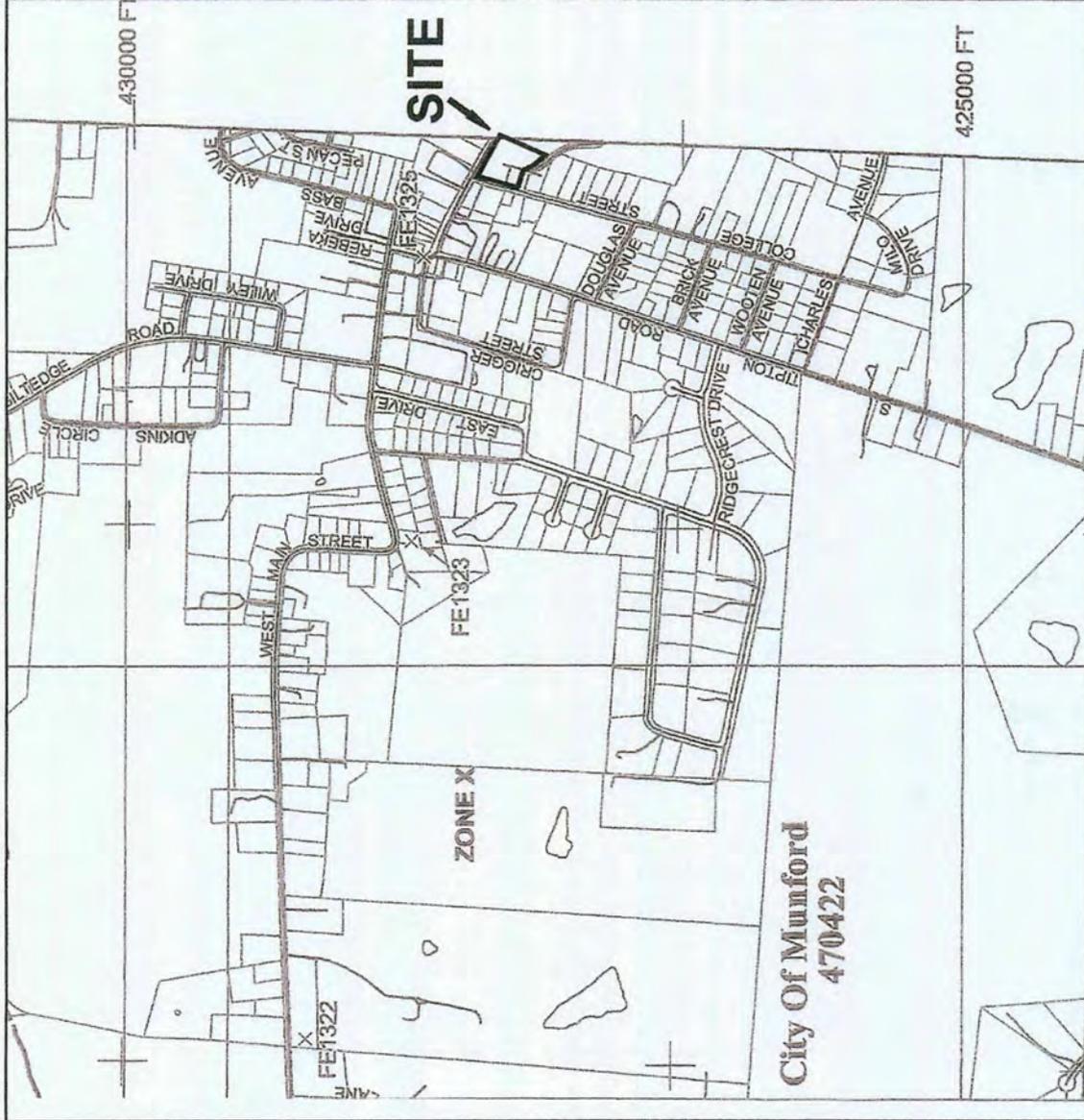
COMMUNITY	NUMBER	PANEL SUFFIX
TIPTON COUNTY	470340	0305
UNINCORPORATED AREAS	470422	0305
MUNFORD, CITY OF		F



Notice to User: The Map Number shown below should be used when placing map orders; the Community Number shown above should be used on insurance applications for the subject community.

**MAP NUMBER
47167C0305F
MAP REVISED
DECEMBER 19, 2006**

Federal Emergency Management Agency



DATE: 06-21-2010
SCALE: AS SHOWN
DRAWN BY: ED
CHECKED BY: *[Signature]*

HESS ENVIRONMENTAL SERVICES, INC.
6057 EXECUTIVE CENTRE DRIVE, SUITE 6
MEMPHIS, TENNESSEE 38134
PHONE 901-377-9139 / FAX 901-377-9150

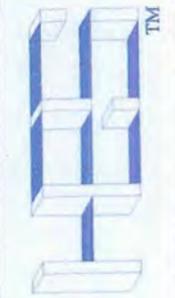


FIGURE 7
SITE LOCATION ON
FLOOD INSURANCE RATE MAP
PROPOSED FIRE DEPARTMENT SITE
MUNFORD, TENNESSEE

PROJECT: 9080.T1
DWG NO.: 9080-005
LOG NO.: 6130-10

APPENDIX B – SITE PHOTOGRAPHS

DRAFT



Date of Photo:	04-02-2010	Photo Taken By:	Cyndi Bothwell, Env. Specialist	
Client:	Munford Fire Department	Photo No:	1	
Address:	S.E. Intersection of Munford Avenue & College St, Munford, TN			
Remarks:	Looking east down Munford Ave from proposed site			



Date of Photo:	04-02-2010	Photo Taken By:	Cyndi Bothwell, Env. Specialist	
Client:	Munford Fire Department	Photo No:	2	
Address:	S.E. Intersection of Munford Avenue & College St, Munford, TN			
Remarks:	Looking southwest from Munford Ave. City Hall building.			



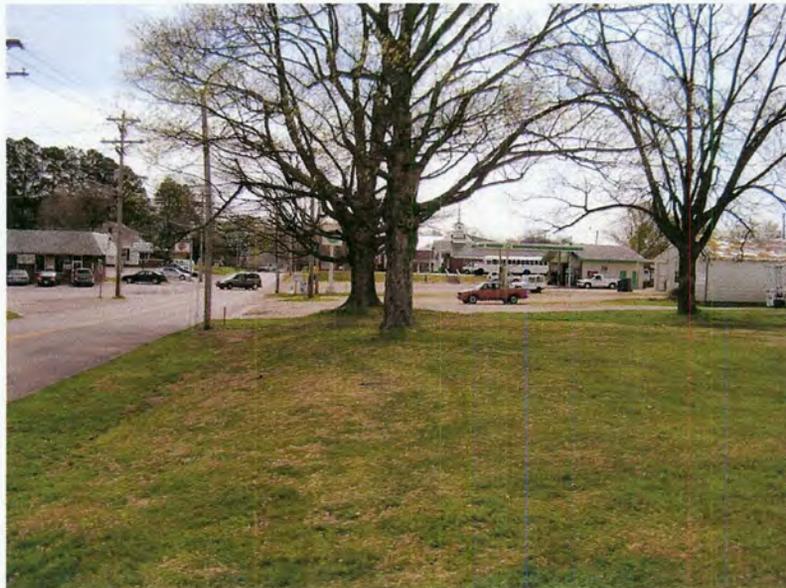
Date of Photo:	04-02-2010	Photo Taken By:	Cyndi Bothwell, Env. Specialist	
Client:	Munford Fire Department	Photo No:	3	
Address:	S.E. Intersection of Munford Avenue & College St, Munford, TN			
Remarks:	Looking southeast from center of proposed site.			



Date of Photo:	04-02-2010	Photo Taken By:	Cyndi Bothwell, Env. Specialist	
Client:	Munford Fire Department	Photo No:	4	
Address:	S.E. Intersection of Munford Avenue & College St, Munford, TN			
Remarks:	Looking southwest.			



Date of Photo:	04-02-2010	Photo Taken By:	Cyndi Bothwell, Env. Specialist	
Client:	Munford Fire Department	Photo No:	5	
Address:	S.E. Intersection of Munford Avenue & College St, Munford, TN			
Remarks:	Looking south across the proposed site from Munford Ave.			



Date of Photo:	04-02-2010	Photo Taken By:	Cyndi Bothwell, Env. Specialist	
Client:	Munford Fire Department	Photo No:	6	
Address:	S.E. Intersection of Munford Avenue & College St, Munford, TN			
Remarks:	Looking east down Munford Ave.			



Date of Photo:	04-02-2010	Photo Taken By:	Cyndi Bothwell, Env. Specialist	
Client:	Munford Fire Department	Photo No:	5	
Address:	S.E. Intersection of Munford Avenue & College St, Munford, TN			
Remarks:	Looking south across the proposed site from Munford Ave.			



Date of Photo:	04-02-2010	Photo Taken By:	Cyndi Bothwell, Env. Specialist	
Client:	Munford Fire Department	Photo No:	6	
Address:	S.E. Intersection of Munford Avenue & College St, Munford, TN			
Remarks:	Looking east down Munford Ave.			



Date of Photo:	04-02-2010	Photo Taken By:	Cyndi Bothwell, Env. Specialist	
Client:	Munford Fire Department	Photo No:	7	
Address:	S.E. Intersection of Munford Avenue & College St, Munford, TN			
Remarks:	Looking southwest across the site at City Hall.			



Date of Photo:	04-02-2010	Photo Taken By:	Cyndi Bothwell, Env. Specialist	
Client:	Munford Fire Department	Photo No:	8	
Address:	S.E. Intersection of Munford Avenue & College St, Munford, TN			
Remarks:	Looking southeast at neighboring property.			



Date of Photo:	04-02-2010	Photo Taken By:	Cyndi Bothwell, Env. Specialist	
Client:	Munford Fire Department	Photo No:	9	
Address:	S.E. Intersection of Munford Avenue & College St, Munford, TN			
Remarks:	Looking northeast across Munford Ave.			



Date of Photo:	04-02-2010	Photo Taken By:	Cyndi Bothwell, Env. Specialist	
Client:	Munford Fire Department	Photo No:	10	
Address:	S.E. Intersection of Munford Avenue & College St, Munford, TN			
Remarks:	Looking north across Munford Ave.			



Date of Photo:	04-02-2010	Photo Taken By:	Cyndi Bothwell, Env. Specialist	
Client:	Munford Fire Department	Photo No:	11	
Address:	S.E. Intersection of Munford Avenue & College St, Munford, TN			
Remarks:	Looking east down Munford Ave.			



Date of Photo:	04-02-2010	Photo Taken By:	Cyndi Bothwell, Env. Specialist	
Client:	Munford Fire Department	Photo No:	12	
Address:	S.E. Intersection of Munford Avenue & College St, Munford, TN			
Remarks:	Looking north across Munford Ave.			



Date of Photo:	04-02-2010	Photo Taken By:	Cyndi Bothwell, Env. Specialist	
Client:	Munford Fire Department	Photo No:	13	
Address:	S.E. Intersection of Munford Avenue & College St, Munford, TN			
Remarks:	Looking west down Munford Ave.			



Date of Photo:	04-02-2010	Photo Taken By:	Cyndi Bothwell, Env. Specialist	
Client:	Munford Fire Department	Photo No:	14	
Address:	S.E. Intersection of Munford Avenue & College St, Munford, TN			
Remarks:	Looking west down Munford Ave.			



Date of Photo:	04-02-2010	Photo Taken By:	Cyndi Bothwell, Env. Specialist	
Client:	Munford Fire Department	Photo No:	15	
Address:	S.E. Intersection of Munford Avenue & College St, Munford, TN			
Remarks:	Drainage along eastern boundary of proposed site.			



Date of Photo:	04-02-2010	Photo Taken By:	Cyndi Bothwell, Env. Specialist	
Client:	Munford Fire Department	Photo No:	16	
Address:	S.E. Intersection of Munford Avenue & College St, Munford, TN			
Remarks:	Looking northwest across site from southeast corner of property.			



Date of Photo:	04-02-2010	Photo Taken By:	Cyndi Bothwell, Env. Specialist	
Client:	Munford Fire Department	Photo No:	17	
Address:	S.E. Intersection of Munford Avenue & College St, Munford, TN			
Remarks:	Existing fire station as seen looking southwest from proposed site.			



Date of Photo:	04-02-2010	Photo Taken By:	Cyndi Bothwell, Env. Specialist	
Client:	Munford Fire Department	Photo No:	18	
Address:	S.E. Intersection of Munford Avenue & College St, Munford, TN			
Remarks:	Looking north from southeast corner of property.			



Date of Photo:	04-02-2010	Photo Taken By:	Cyndi Bothwell, Env. Specialist	
Client:	Munford Fire Department	Photo No:	19	
Address:	S.E. Intersection of Munford Avenue & College St, Munford, TN			
Remarks:	Looking north from southeast corner of proposed site.			



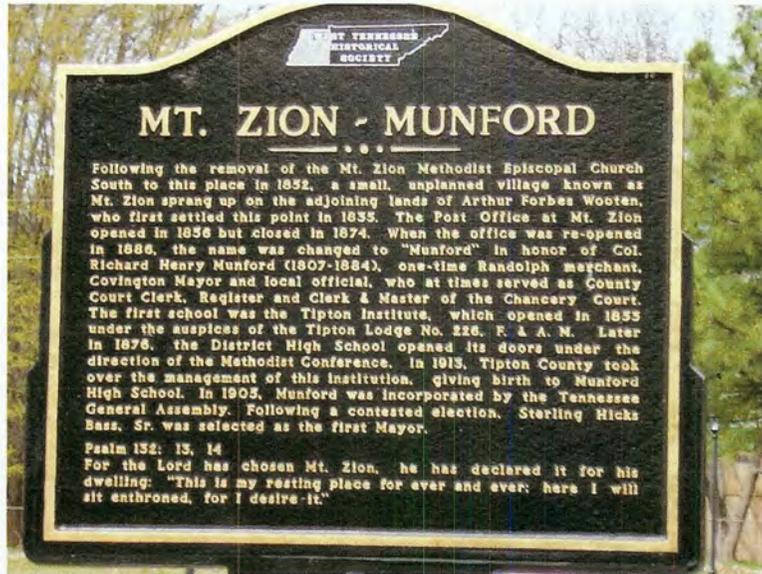
Date of Photo:	04-02-2010	Photo Taken By:	Cyndi Bothwell, Env. Specialist	
Client:	Munford Fire Department	Photo No:	20	
Address:	S.E. Intersection of Munford Avenue & College St, Munford, TN			
Remarks:	Looking north across the property towards Munford Ave.			



Date of Photo:	04-02-2010	Photo Taken By:	Cyndi Bothwell, Env. Specialist	
Client:	Munford Fire Department	Photo No:	21	
Address:	S.E. Intersection of Munford Avenue & College St, Munford, TN			
Remarks:	Looking northeast from southeast corner of proposed site.			



Date of Photo:	04-02-2010	Photo Taken By:	Cyndi Bothwell, Env. Specialist	
Client:	Munford Fire Department	Photo No:	22	
Address:	S.E. Intersection of Munford Avenue & College St, Munford, TN			
Remarks:	Looking northwest across the site from the southeast corner of property			



Date of Photo:	04-02-2010	Photo Taken By:	Cyndi Bothwell, Env. Specialist	
Client:	Munford Fire Department	Photo No:	23	
Address:	S.E. Intersection of Munford Avenue & College St, Munford, TN			
Remarks:	City park on Tipton Rd.			



Date of Photo:	04-02-2010	Photo Taken By:	Cyndi Bothwell, Env. Specialist	
Client:	Munford Fire Department	Photo No:	24	
Address:	S.E. Intersection of Munford Avenue & College St, Munford, TN			
Remarks:	Looking northwest across the site from the southeast corner of property			



Date of Photo:	04-02-2010	Photo Taken By:	Cyndi Bothwell, Env. Specialist	
Client:	Munford Fire Department	Photo No:	25	
Address:	S.E. Intersection of Munford Avenue & College St, Munford, TN			
Remarks:	Looking west from the southeast corner of the property.			



Date of Photo:	04-02-2010	Photo Taken By:	Cyndi Bothwell, Env. Specialist	
Client:	Munford Fire Department	Photo No:	26	
Address:	S.E. Intersection of Munford Avenue & College St, Munford, TN			
Remarks:	Fire Department training area south of proposed site.			



Date of Photo:	04-02-2010	Photo Taken By:	Cyndi Bothwell, Env. Specialist	
Client:	Munford Fire Department	Photo No:	27	
Address:	S.E. Intersection of Munford Avenue & College St, Munford, TN			
Remarks:	City park south of proposed site.			



Date of Photo:	04-02-2010	Photo Taken By:	Cyndi Bothwell, Env. Specialist	
Client:	Munford Fire Department	Photo No:	28	
Address:	S.E. Intersection of Munford Avenue & College St, Munford, TN			
Remarks:	City park on Tipton Ave.			



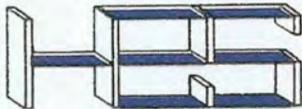
Date of Photo:	04-02-2010	Photo Taken By:	Cyndi Bothwell, Env. Specialist	
Client:	Munford Fire Department	Photo No:	29	
Address:	S.E. Intersection of Munford Avenue & College St, Munford, TN			
Remarks:	Old 'downtown' area one block northwest of proposed site.			



Date of Photo:	04-02-2010	Photo Taken By:	Cyndi Bothwell, Env. Specialist	
Client:	Munford Fire Department	Photo No:	30	
Address:	S.E. Intersection of Munford Avenue & College St, Munford, TN			
Remarks:	Cemetery near proposed site.			

APPENDIX C – AGENCY COORDINATION

DRAFT



HESS ENVIRONMENTAL SERVICES, INC.
6057 EXECUTIVE CENTRE DRIVE, SUITE 6
MEMPHIS, TENNESSEE 38134

April 16, 2010

APR 22 2010
 #0343

Ms. Mary Jennings
 Field Supervisor
 United State Fish and Wildlife Service
 446 Neal Street
 Cookeville, TN 38503

**RE: REQUEST FOR PROJECT REVIEW
 FOR WETLANDS AND ENDANGERED SPECIES
 CITY OF MUNFORD FIRE STATION PROJECT
 FEMA GRANT APPLICATION NUMBER: EMW-2009-FC-10275R
 MUNFORD, TENNESSEE**

Dear Ms. Jennings:

The City of Munford, Tennessee has applied for federal funding from the Federal Emergency Management Agency (FEMA) for the proposed relocation of the City of Munford Fire Station. The City of Munford is located in southwest Tipton County in southwestern Tennessee and can be found on the USGS Blytheville quadrangle (Figure 1). Under the proposed action, Munford would construct a new facility for the fire department to house the fire trucks and on-duty fire department personnel, storage of fire department equipment, and provide space for training programs for the fire department and the Citizens Emergency Response Team (CERT). Hess Environmental Services, Inc. (HES) has been tasked with preparing the Environmental Assessment report for FEMA on behalf of the Munford Fire Department. The purpose of the letter is to request a review of the proposed project for that report.

The proposed 20,000 square foot one-story fire station would occupy the 0.95 acre site currently serving as the overflow parking lot just east and adjacent to the City of Munford Municipal Building located at 1397 Munford Avenue (Figure 2). The proposed site is owned by the City of Munford who purchased it from a private owner in June of 2000. The existing fire station is located on the south side of the Municipal Building on the same property owned by the City of Munford just a few hundred feet from the proposed site. The new facility would tie into existing municipal utilities for water, sewer, and electrical service and require the construction of new driveways and parking lots for the new facility.

HES requests that your agency review the project and provide comments and any available information or resources under your agency's jurisdiction with the project area. HES also requests a letter of concurrence from your agency that no wetlands, endangered species, or any other critical habitat or wildlife resources under your jurisdiction would be affected by Munford Fire Department Firehouse relocation project.

If you have any questions or need additional information, please call me at (901) 266-4778 or contact me by electronic mail at cyndib@hessenv.com.

Sincerely,

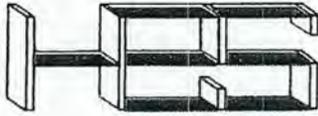
Cyndi Bothwell ⊕

Cynthia "Cyndi" Bothwell, P.G.
 Environmental Specialist

No significant impacts to wetlands are anticipated from this proposal. No federally listed endangered or threatened species, or habitat suitable for such species, are known to exist in the project area.

Enclosures: Figures
 Photos

Kym. Swan 4/29/10
 for Field Supervisor Date
 U.S. Fish and Wildlife Service
 Cookeville, TN 38501



HESS ENVIRONMENTAL SERVICES, INC.
6057 EXECUTIVE CENTRE DRIVE, SUITE 6
MEMPHIS, TENNESSEE 38134

April 15, 2010

Mr. E. Patrick McIntyre, Jr.
Executive Director
Tennessee Historical Commission
2941 Lebanon Road
Nashville, Tennessee 37243-0442

RE: REQUEST FOR PROJECT REVIEW
CITY OF MUNFORD FIRE STATION RELOCATION PROJECT
FEMA GRANT APPLICATION NUMBER: EMW-2009-FC-10275R
MUNFORD, TENNESSEE

Dear Mr. McIntyre:

The City of Munford, Tennessee has applied for federal funding from the Federal Emergency Management Agency (FEMA) for the proposed relocation of the City of Munford Fire Station. The City of Munford is located in southwest Tipton County in southwestern Tennessee (Figure 1). Under the proposed action, Munford would construct a new facility for the fire department to house the fire trucks and on-duty fire department personnel, storage of fire department equipment, and provide space for training programs for the fire department and the Citizens Emergency Response Team (CERT). Hess Environmental Services, Inc. (HES) has been tasked with preparing the Environmental Assessment report for FEMA on behalf of the Munford Fire Department. The purpose of the letter is to request a review of the proposed project for that report.

The proposed 20,000 square foot one-story fire station would occupy the 0.95 acre site currently serving as the overflow parking lot just east and adjacent to the City of Munford Municipal Building located at 1397 Munford Avenue (Figure 2). The proposed site is owned by the City of Munford who purchased it from a private owner in June of 2000. The existing fire station is located on the south side of the Municipal Building on the same property owned by the City of Munford just a few hundred feet from the proposed site. The new facility would tie into existing municipal utilities for water, sewer, and electrical service and require the construction of new driveways and parking lots for the new facility.

The proposed fire station site is located on the USGS Blytheville quadrangle map. It is located on an upland landform at an elevation of 423 feet above mean sea level within the Gulf Coastal Physiographic Region. The terrain is level and is presently paved with asphalt for a parking lot. (Photo 1 and Photo 2). The soils are recorded as Memphis silt loam, 1 to 5 percent slopes, eroded.

The site is not located within the boundaries of a National Register Historic District. The Munford United Methodist Church located on College Street approximately one-half block to

USGS 39 km NE of Memphis, Tennessee, United States 01 Jul 1983

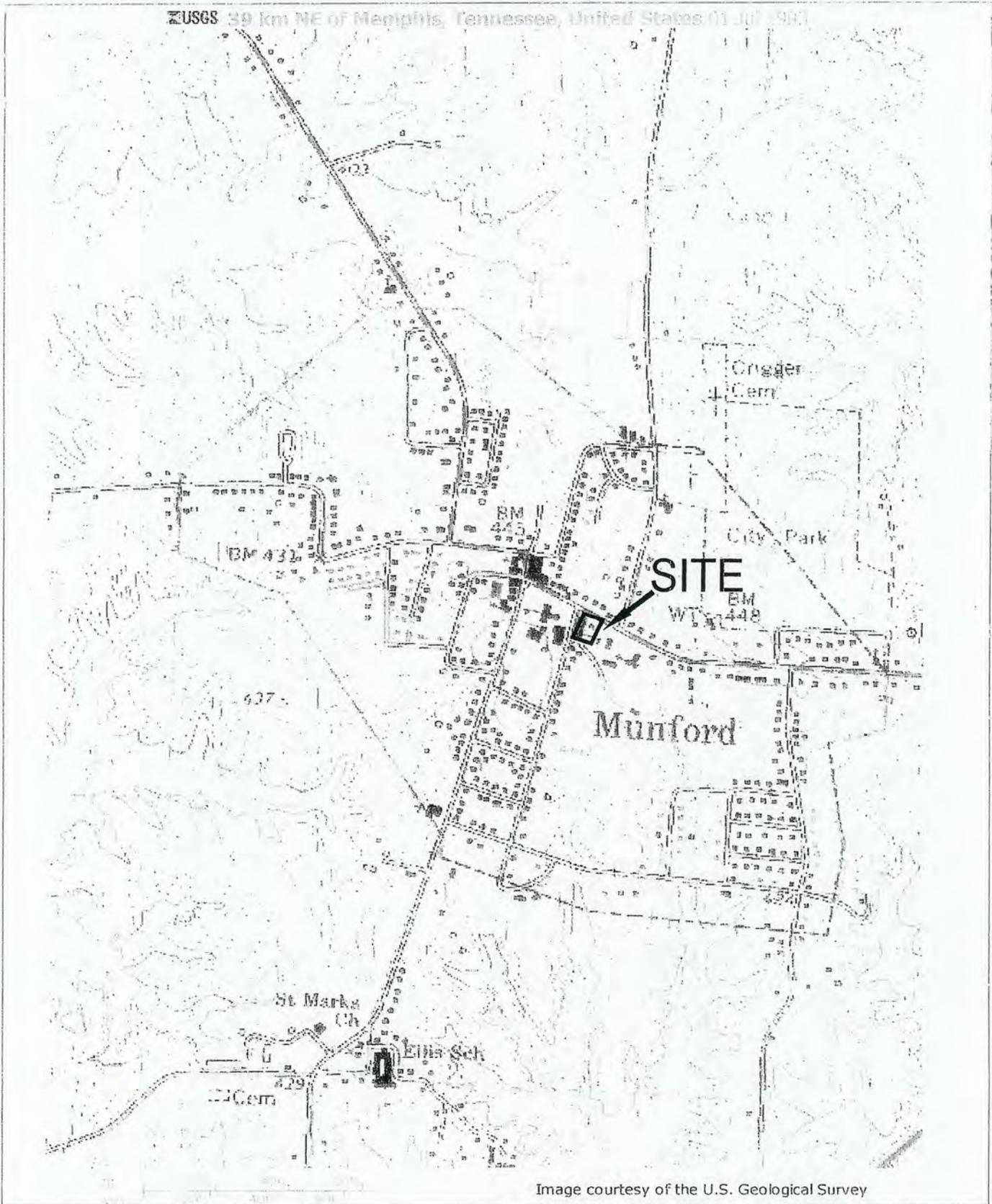


Image courtesy of the U.S. Geological Survey



HESS ENVIRONMENTAL SERVICES, INC.
 6057 EXECUTIVE CENTRE DRIVE, SUITE 6
 MEMPHIS, TENNESSEE 38134
 PHONE 901-377-9139 / FAX 901-377-9150



DATE: 04-09-2010	PROJECT: 9080.T1
SCALE: AS SHOWN	DWG NO.: 9080-001
DRAWN BY: ED	LOG NO.: 6216-10
CHECKED BY:	

SITE LOCATION ON
 USGS TOPOGRAPHIC MAP
 PROPOSED FIRE DEPARTMENT SITE
 MUNFORD, TENNESSEE

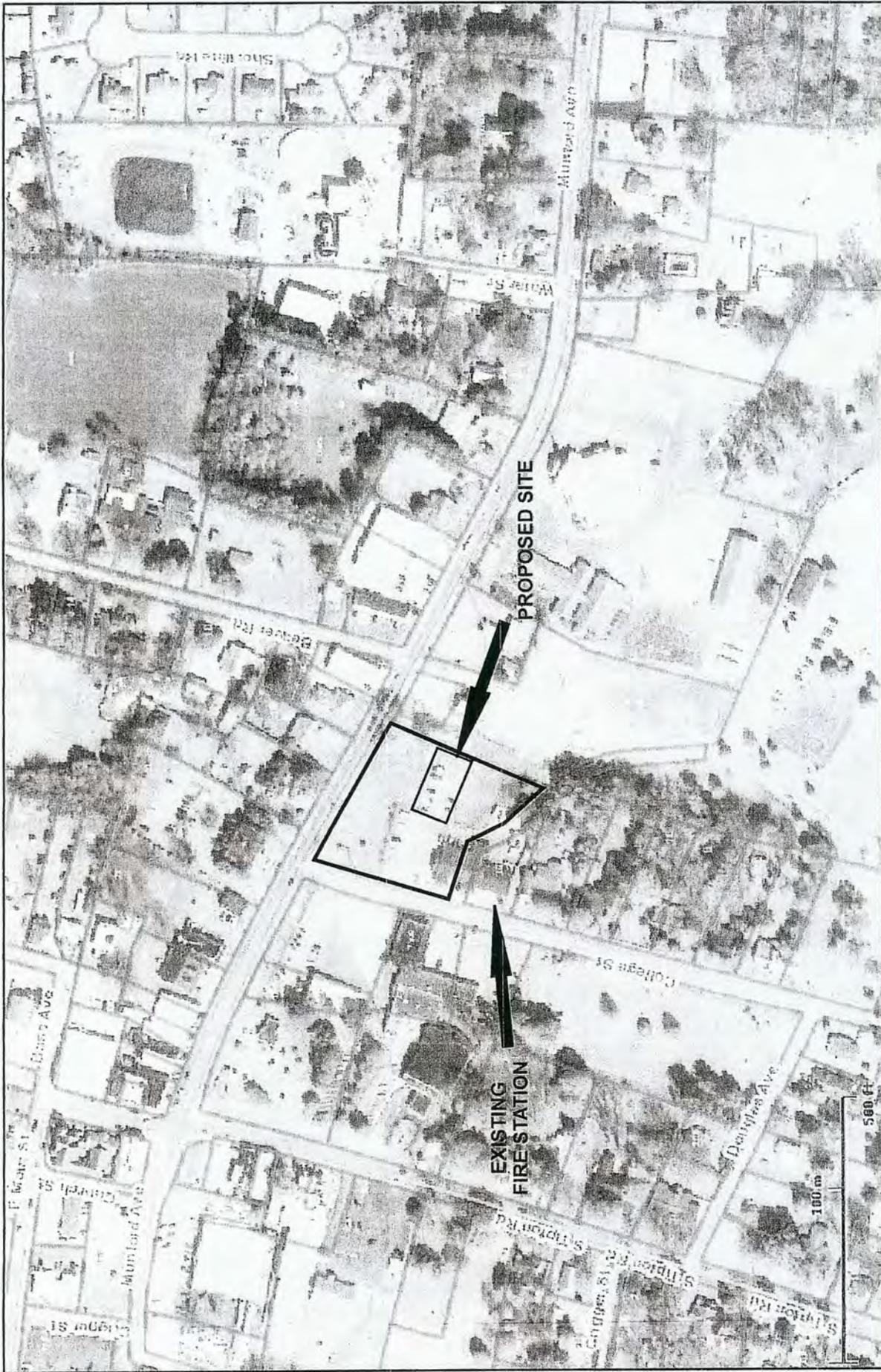


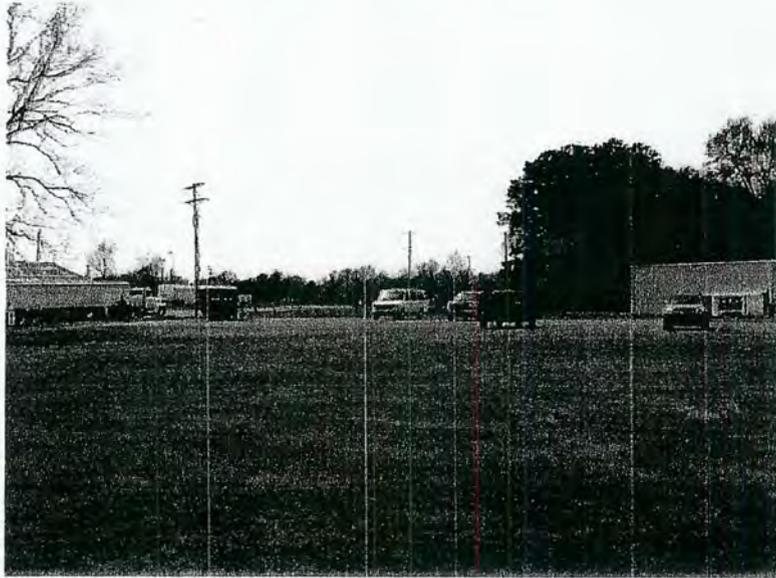
FIGURE 2
 SITE LOCATION ON
 GIS PARCEL MAP
 PROPOSED FIRE DEPARTMENT SITE
 MUNFORD, TENNESSEE

DATE: 04-09-2010	PROJECT: 9080.T1
SCALE: AS SHOWN	DWG NO.: 9080-002
DRAWN BY: ED	LOC NO.: 6127-10
CHECKED BY:	

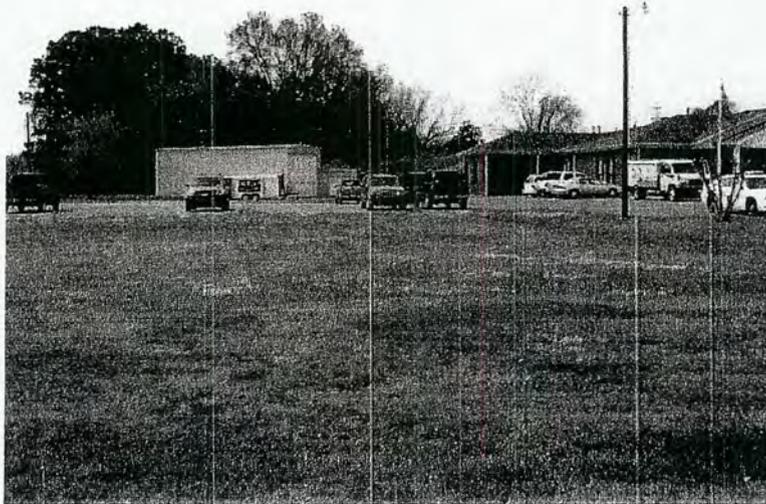


HESS ENVIRONMENTAL SERVICES, INC.
 6057 EXECUTIVE CENTRE DRIVE, SUITE 6
 MEMPHIS, TENNESSEE 38134
 PHONE 901-377-9139 / FAX 901-377-9150





Date of Photo:	04-02-2010	Photo Taken By:	Cyndi Bothwell, Env. Specialist	
Client:	Munford Fire Department	Photo No:	1	
Address:	S.E. Intersection of Munford Avenue & College St, Munford, TN			
Remarks:	Looking south across the proposed site from Munford Ave.			



Date of Photo:	04-02-2010	Photo Taken By:	Cyndi Bothwell, Env. Specialist	
Client:	Munford Fire Department	Photo No:	2	
Address:	S.E. Intersection of Munford Avenue & College St, Munford, TN			
Remarks:	Looking southwest across the site at City Hall.			



April 23, 2010

TENNESSEE HISTORICAL COMMISSION
DEPARTMENT OF ENVIRONMENT AND CONSERVATION
2941 LEBANON ROAD
NASHVILLE, TN 37243-0442
(615) 532-1550

Ms. Cynthia Bothwell
Hess Environmental Services
6057 Exec. Circle Dr./6
Memphis, Tennessee, 38134

RE: FEMA, FIRE STATION RELOCATION, MUNFORD, TIPTON COUNTY

Dear Ms. Bothwell:

In response to your request, received on Tuesday, April 20, 2010, we have reviewed the documents you submitted regarding your proposed undertaking. Our review of and comment on your proposed undertaking are among the requirements of Section 106 of the National Historic Preservation Act. This Act requires federal agencies or applicant for federal assistance to consult with the appropriate State Historic Preservation Office before they carry out their proposed undertakings. The Advisory Council on Historic Preservation has codified procedures for carrying out Section 106 review in 36 CFR 800. You may wish to familiarize yourself with these procedures (Federal Register, December 12, 2000, pages 77698-77739) if you are unsure about the Section 106 process.

After considering the documents you submitted, we determine that THERE ARE NO NATIONAL REGISTER OF HISTORIC PLACES LISTED OR ELIGIBLE PROPERTIES AFFECTED BY THIS UNDERTAKING. We have made this determination either because: the undertaking will not alter any characteristics of an identified eligible or listed Historic Property that qualify the property for listing in the National Register, the undertaking will not alter an eligible Historic Property's location, setting or use, the specific location, scope and/or nature of the undertaking precluded affect to Historic Properties, the size and nature of the undertaking's area of potential effects precluded affect to Historic Properties, or, no National Register listed or eligible Historic Properties exist within the undertaking's area of potential effects. Therefore, we have no objections to your proceeding with your undertaking.

If your agency proposes any modifications in current project plans or discovers any archaeological remains during the ground disturbance or construction phase, please contact this office to determine what further action, if any, will be necessary to comply with Section 106 of the National Historic Preservation Act. If you are applying for federal funds, license or permit, you should submit this letter as evidence of consultation under Section 106 to the appropriate federal agency, which, in turn, should contact us as required by 36 CFR 800. If you represent a federal agency, you should submit a formal determination of eligibility and effect to us for comment. You may find additional information concerning the Section 106 process and the Tennessee SHPO's documentation requirements at <http://www.tennessee.gov/environment/hist/federal/sect106.shtm>. You may direct questions or comments to Joe Garrison (615) 532-1550-103. This office appreciates your cooperation.

Sincerely,

E. Patrick McIntyre, Jr.
Executive Director and
State Historic Preservation Officer

EPM/jyg

April 15, 2010

Name

Tribal Historic Preservation Officer/Archeologist

Name of Tribe

Address

City, State Zip

**RE: REQUEST FOR PROJECT REVIEW
CITY OF MUNFORD FIRE STATION RELOCATION PROJECT
FEMA GRANT APPLICATION NUMBER: EMW-2009-FC-10275R
MUNFORD, TENNESSEE**

To Whom It May Concern:

The City of Munford, Tennessee has applied for federal funding from the Federal Emergency Management Agency (FEMA) for the proposed relocation of the City of Munford Fire Station. The City of Munford is located in southwest Tipton County in southwestern Tennessee (Figure 1). Under the proposed action, Munford would construct a new facility for the fire department to house the fire trucks and on-duty fire department personnel, storage of fire department equipment, and provide space for training programs for the fire department and the Citizens Emergency Response Team (CERT).

The proposed 20,000 square foot one-story fire station would occupy the 0.95 acre site currently serving as the overflow parking lot just east and adjacent to the City of Munford Municipal Building located at 1397 Munford Avenue (Figure 2). The proposed site is owned by the City of Munford who purchased it from a private owner in June of 2000. The existing fire station is located on the south side of the Municipal Building on the same property owned by the City of Munford just a few hundred feet from the proposed site. The new facility would tie into existing municipal utilities for water, sewer, and electrical service and require the construction of new driveways and parking lots for the new facility.

The proposed fire station site is located on the USGS Blytheville quadrangle map. It is located on an upland landform at an elevation of 423 feet above mean sea level within the Gulf Coastal Physiographic Region. The terrain is level and is presently paved with asphalt for a parking lot. (Photo 1 and Photo 2). The soils are recorded as Memphis silt loam, 1 to 5 percent slopes, eroded.

The site is not located within the boundaries of a National Register Historic District. The Munford United Methodist Church located on College Street approximately one-half block to the west of the proposed site is listed as a historic site with the by the Memphis Conference of the Commission on Archives and History. This site is not listed in the National Registry of Historic Places or on the State of Tennessee list of historic places. A review of the State of Tennessee list of established archeological sites indicates that no known sites are present in the proposed project area.

FEMA requests that your agency review the project and provide comments and any available information or resources under your agency's jurisdiction with the project area. FEMA also requests concurrence from the Tribal Historic Preservation Officer/Archeologist that no tribal or archeological resources would be affected by Munford Fire Department Firehouse relocation project. Your response can be copied to the project consultant at the following address:

Ms. Cyndi Bothwell
Environmental Specialist
Hess Environmental Services, Inc.
6057 Executive Centre Drive, Suite 6
Memphis Tennessee 38134
Fax No.: (901) 377-9150

If you have any questions or need additional information, please contact Cyndi Bothwell of Hess Environmental Services, Inc. by telephone at (901) 266-4778 or by electronic mail at cyndib@hessenv.com.

Sincerely,

Stephanie Madson
Region IV, Deputy Regional Environmental Coordinator



April 23, 2010

TENNESSEE HISTORICAL COMMISSION
DEPARTMENT OF ENVIRONMENT AND CONSERVATION
2941 LEBANON ROAD
NASHVILLE, TN 37243-0442
(615) 532-1550

Ms. Cynthia Bothwell
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6057 Exec. Circle Dr./6
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E. Patrick McIntyre, Jr.
Executive Director and
State Historic Preservation Officer

EPM/jyg

April 15, 2010

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CITY OF MUNFORD FIRE STATION RELOCATION PROJECT
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