

10 OF 10

# SITE, GRADING, AND EROSION & SEDIMENT CONTROL PLAN

## FOR APPALACHIAN POWER COMPANY

# 7th. STREET STATION EXPANSION

## CITY OF ROANOKE , VIRGINIA

ON  
DMS

### GENERAL CONSTRUCTION NOTES:

- CONTRACTOR SHALL INSTALL & MAINTAIN ADDITIONAL EROSION & SEDIMENT CONTROL DEVICES PER THE LATEST EDITION OF THE VIRGINIA EROSION AND SEDIMENT CONTROL HANDBOOK, AS DIRECTED BY CITY INSPECTOR, TO CONTROL EROSION ON SITE FOR THE DURATION OF THE PROJECT.
- CONTRACTOR SHALL FIELD VERIFY ALL INVERTS AND CONNECTION POINTS PRIOR TO COMMENCEMENT OF ANY CONSTRUCTION ACTIVITIES. IF POTENTIAL CONFLICTS ARE DETECTED, CONTRACTOR SHALL NOTIFY SITE ENGINEER IMMEDIATELY.
- CURRENT OWNER: APPALACHIAN POWER COMPANY
- NO SITE WORK, GRUBBING, LOGGING, OR GRADING IS PERMITTED PRIOR TO INSTALLATION OF EROSION & SEDIMENT CONTROL MEASURES AND ISSUANCE OF A LAND DISTURBANCE PERMIT BY CITY OF ROANOKE.
- CONTRACTOR SHALL NOTIFY CITY OF ROANOKE 48 HOURS BEFORE BEGINNING CONSTRUCTION AT (540) 853-1090.
- DISTURBED AREA: 1.45 ACRES.
- CONTRACTOR TO COORDINATE WITH APPALACHIAN POWER COMPANY PROJECT MANAGER TO DETERMINE ANY PERMITTING OR BONDING RESPONSIBILITIES.
- TOPOGRAPHIC SURVEY CONDUCTED ON MARCH 6, 2008 BY HURT & PROFFITT, INC., C/O BRADLEY TATE, L.S. PHONE NO. 1-434-847-7798.
- CONTRACTOR SHALL ENSURE THAT ANY OFFSITE WORK SUCH AS LANDFILLING OPERATIONS SHALL BE PRE-APPROVED BY THE OFFSITE PROPERTY OWNER ACCEPTING THE MATERIAL AND THE APPROPRIATE PERMITTING AUTHORITY.
- ALL WORK SHALL CONFORM TO THE LATEST EDITIONS OF AMERICAN ELECTRIC POWER COMPANY SPECIFICATION SS-160102, "TECHNICAL SPECIFICATION FOR SUBSTATION AND SWITCHING STATION CONSTRUCTION", VIRGINIA DEPARTMENT OF TRANSPORTATION "ROAD AND BRIDGE STANDARDS", AND CITY OF ROANOKE ZONING AND CONSTRUCTION ORDINANCES, REGULATIONS, AND STANDARDS. IN CASE OF CONFLICT BETWEEN REGULATIONS, THE MOST STRINGENT SHALL BE USED, AS DETERMINED BY APPALACHIAN POWER COMPANY.
- THE MINIMUM REQUIRED DENSITY FOR ALL COMPACTION SHALL BE 95% OF MAXIMUM DRY DENSITY WITH A MOISTURE CONTENT WITHIN ± 2% OF THE OPTIMUM. CONTRACTOR IS RESPONSIBLE FOR COORDINATING WITH TESTING LABORATORY ENGAGED BY APPALACHIAN POWER CO. TO MEET AEP SPECIFICATION SS-160102 TESTING REQUIREMENTS.
- CONTRACTOR SHALL CALL MISS UTILITY AT 811 TO LOCATE EXISTING UTILITIES AT LEAST 48 HOURS PRIOR TO ANY EARTHWORK OPERATIONS.
- A PRE-CONSTRUCTION MEETING WITH CITY OF ROANOKE WILL BE HELD PRIOR TO CONSTRUCTION.
- IT IS THE CONTRACTOR'S RESPONSIBILITY TO MEET COMPLIANCE REQUIREMENTS WITH SECTION 59.1-406, ET SEQ. OF THE CODE OF VIRGINIA (OVERHEAD HIGH VOLTAGE LINES SAFETY ACT).
- THE CONTRACTOR SHALL BE RESPONSIBLE FOR OBTAINING ALL NECESSARY CONSTRUCTION PERMITS BEFORE BEGINNING CONSTRUCTION.
- CONTRACTOR SHALL BE RESPONSIBLE FOR REPAIR OF ANY UTILITIES DAMAGED AS A RESULT OF CONSTRUCTION ACTIVITIES. VERIFY LOCATION OF ALL EXISTING UTILITIES PRIOR TO BEGINNING WORK.
- APPALACHIAN POWER COMPANY SHALL BE RESPONSIBLE FOR OBTAINING EROSION AND SEDIMENT CONTROL PERMIT, WATER QUALITY PROTECTION PERMIT, AND ENTRANCE PERMIT.
- DISTANCES AND RADII REFERRED TO ARE TO THE EDGE OF GRAVEL, UNLESS OTHERWISE NOTED.
- RIGHT-OF-WAYS, LOT LINES, AND EASEMENTS ARE DEDICATED ON PLATS SEPARATE FROM THESE PLANS.
- THE AREA SHOWN HEREON IS LOCATED IN FLOOD HAZARD ZONE 'X' AND IS NOT LOCATED WITHIN FLOOD HAZARD ZONE 'A' FOR A 100 YEAR FLOOD AS DETERMINED BY THE FEDERAL EMERGENCY MANAGEMENT AGENCY AS SHOWN ON COMMUNITY-PANEL MAP #51161C0164G DATED REVISED SEPTEMBER 28, 2007.
- UTILITIES SHOWN HEREON ARE BASED ON AVAILABLE ABOVEGROUND STRUCTURES.
- A FIELD REVIEW SHALL BE MADE BY CITY OF ROANOKE DURING CONSTRUCTION TO DETERMINE THE ADEQUACY OF CHANNELS AND DITCHES AS CONSTRUCTED IN ACCORDANCE WITH THE APPROVED PLAN. IN THE EVENT OF SCOUR AND EROSION, THE CONTRACTOR SHALL INSTALL ADDITIONAL MEASURES AS DETERMINED AND REQUIRED BY CITY OF ROANOKE.
- EXISTING STATION PERIMETER FENCE WILL REMAIN IN PLACE DURING CONSTRUCTION.
- LANDSCAPING TO BE INSTALLED AFTER PLACEMENT OF NEW FENCE (BY OTHERS) AND REMOVAL OF EXISTING STATION EQUIPMENT AND MATERIALS.

### CITY OF ROANOKE CONSTRUCTION NOTES:

- LAND DISTURBANCE PERMIT: AN APPROVED EROSION AND SEDIMENT CONTROL PLAN FOR ANY BORROW/FILL SITES ASSOCIATED WITH THE PROJECT MUST BE SUBMITTED PRIOR TO THE ISSUANCE OF A LAND DISTURBANCE PERMIT.
- PLANS AND PERMITS: A COPY OF THE PLANS AS APPROVED BY THE CITY (SIGNED BY THE PROPER CITY OFFICIALS) AND ALL PERMITS ISSUED BY THE CITY SHALL BE AVAILABLE AT THE CONSTRUCTION SITE AT ALL TIMES OF ONGOING CONSTRUCTION.
- LOCATION OF UTILITIES: THE CONTRACTOR SHALL VERIFY THE LOCATION OF ALL EXISTING UTILITIES PRIOR TO THE COMMENCEMENT OF ANY CONSTRUCTION.
- CONSTRUCTION ENTRANCE: THE CONTRACTOR SHALL INSTALL AN ADEQUATE CONSTRUCTION ENTRANCE FOR ALL CONSTRUCTION RELATED EGRESS FROM THE SITE. SIZE AND COMPOSITION OF CONSTRUCTION ENTRANCE IS SHOWN ON THE PLANS.
- STREETS TO REMAIN CLEAN: IT SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR TO INSURE THAT THE PUBLIC STREET ADJACENT TO THE CONSTRUCTION ENTRANCE REMAINS FREE OF MUD, DIRT, DUST, AND/OR ANY TYPE OF CONSTRUCTION MATERIALS OR LITTER AT ALL TIMES.
- BARRICADES/DITCHES: THE CONTRACTOR SHALL MAINTAIN THE INTEGRITY OF ALL EXCAVATED DITCHES AND SHALL FURNISH AND ENSURE THAT ALL BARRICADES PROPER AND NECESSARY FOR THE SAFETY OF THE PUBLIC ARE IN PLACE.
- APPROVED PLANS/CONSTRUCTION CHANGES: ANY CHANGE OR VARIATION FROM CONSTRUCTION DESIGN AS SHOWN ON THE OFFICIALLY APPROVED PLANS SHALL BE APPROVED BY THE EROSION AND SEDIMENT CONTROL AGENT PRIOR TO SAID CHANGES OR VARIATION IN CONSTRUCTION BEING MADE.
- FINAL ACCEPTANCE/CITY: THE OWNER OR DEVELOPER SHALL FURNISH THE CITY OF ROANOKE'S PLANNING BUILDING AND DEVELOPMENT DEPARTMENT WITH A FINAL CORRECT SET OF AS-BUILT PLANS PRIOR TO FINAL ACCEPTANCE BY THE CITY.

THE ENGINEER AND/OR SURVEYOR TAKES NO RESPONSIBILITY FOR THE LOCATION OR ACCURACY OF THE UTILITIES AS SHOWN HEREON OR ANY UTILITIES WITHIN THE PROJECT THAT MAY NOT BE SHOWN HEREON. THE CONTRACTOR SHALL BE RESPONSIBLE FOR CONTACTING THE UTILITY COMPANIES TO SEE IF ANY UTILITIES EXIST WITHIN THE AREA OF THE PROJECT BEFORE ANY CONSTRUCTION BEGINS. ANY COST INCURRED BY DAMAGING ANY UTILITY WITHIN THE PROJECT SHALL BE AT THE EXPENSE OF THE CONTRACTOR.

48 WORKING HOURS PRIOR TO STARTING THE WORK, THE CONTRACTOR SHALL CALL MISS UTILITY AT 811 AND ADVISE THE NATURE AND LOCATION OF THE WORK.

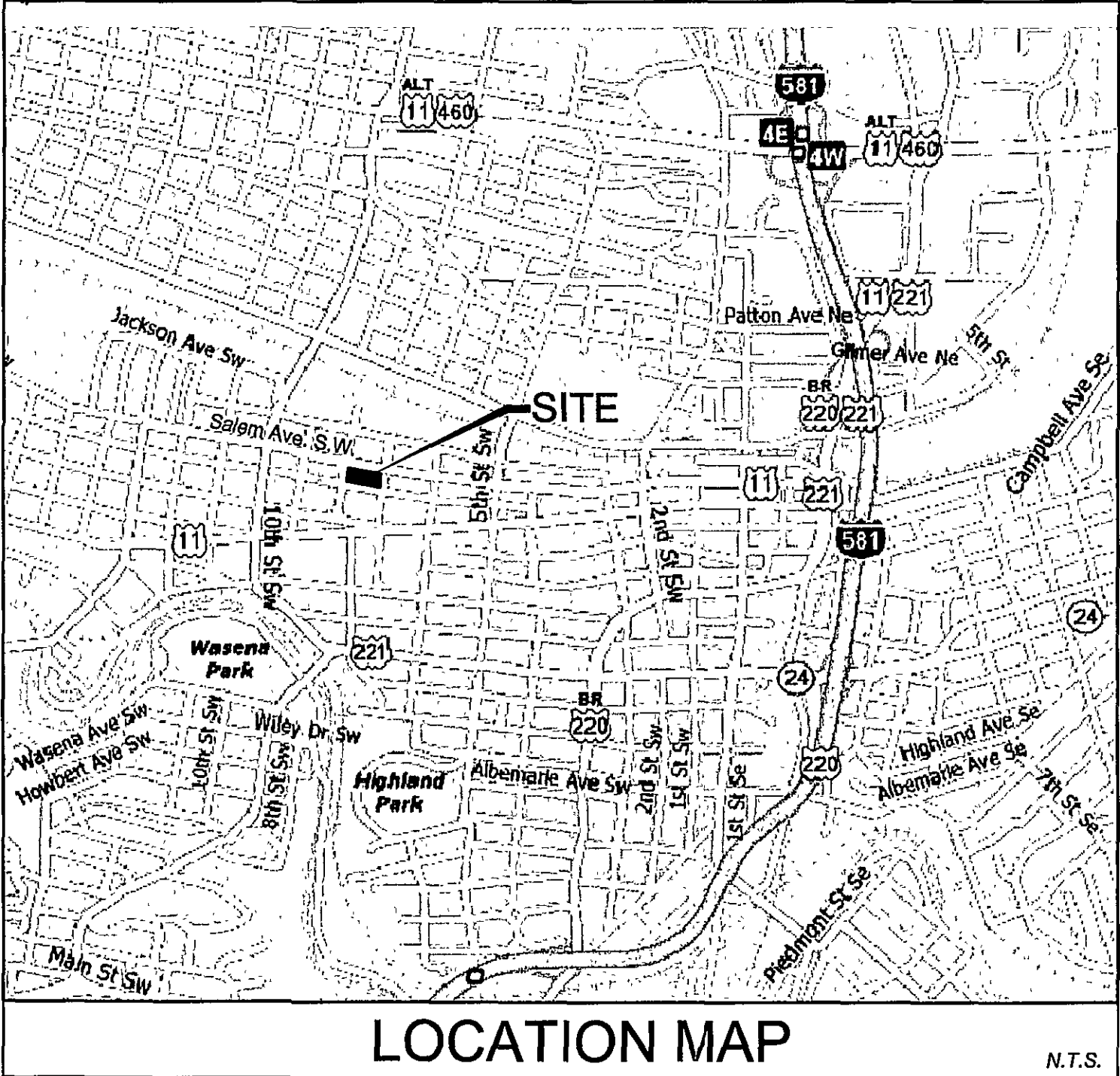


IMAGE SOURCE: MAPQUEST - 03/10/08



IMAGE SOURCE: MAPQUEST - 07/10/08

CITY OF ROANOKE  
BUILDING INSPECTIONS OFFICE  
215 CHURCH AVE. SW.  
CITY OF ROANOKE, VA 24011  
(540) 853-1090

### SHEETS

- COVER SHEET
- EXISTING CONDITIONS AND DEMOLITION PLAN
- SITE LAYOUT PLAN
- GRADING AND EROSION AND SEDIMENT CONTROL PLAN
- EROSION AND SEDIMENT CONTROL DETAILS
- SECTIONS & SITE DETAILS
- BMP DETAILS
- RETAINING WALL PLAN AND DETAILS
- LANDSCAPING PLAN AND DETAILS
- LANDSCAPING SPECIFICATIONS

THIS SET OF PLANS HAS BEEN REVIEWED ACCORDING TO HURT & PROFFITT QA/QC POLICIES.

Michael D. Wilson 7/13/08 DATE  
Michael D. Wilson 7/13/08 DATE  
3/11/08 DATE  
QA/QC REVIEWER

### CITY OF ROANOKE

#### SITE STATISTICS

- PROPERTY OWNER: APPALACHIAN POWER CO., CONTACT: DAVE WRIGHT, P.O. BOX 2021, ROANOKE, VA 24022. TEL. # (540) 562-7066.  
TAX MAP NUMBER(S): TM.# 1111701 THRU #1111711 & #1111713
- ADDRESS: SALEM AVE, SW AND 8TH ST.
- TOTAL PARCEL AREA: 1.682 ACRES
- THE AREA SHOWN HEREON IS LOCATED IN FLOOD HAZARD ZONE 'X' AND IS NOT LOCATED WITHIN FLOOD HAZARD ZONE 'A' FOR A 100 YEAR FLOOD AS DETERMINED BY THE FEDERAL EMERGENCY MANAGEMENT AGENCY AS SHOWN ON COMMUNITY-PANEL MAP #51161C0164G DATED REVISED SEPTEMBER 28, 2007.
- ZONING DISTRICT OF PARCEL: I-1 - LIGHT INDUSTRIAL
- BUILDING SET BACKS: FRONT - NONE, BACK - NONE, SIDE - NONE.
- HEIGHT OF ALL STRUCTURES: VARIES. MAX. = 65' - 85' TO MATCH EXISTING
- NUMBER OF FLOORS OF ALL BUILDINGS: 1 FLOOR.
- NUMBER OF BUILDING UNITS AND TYPE OF CONSTRUCTION: 1 UNIT INDUSTRIAL.
- TOTAL DWELLING UNITS PER ACRE: N/A

ESTIMATED MATERIALS QUANTITIES LIST			
SILT FENCE		694 LF	
TOPSOIL STRIPPING AND STOCKPILING (ASSUMED 6" DEEP)		0.93 ACRES	(750 CY)*
TOPSOIL SPREADING (6" DEEP)		0.19 ACRES	(127 CY)
TOPSOIL SPOIL		623 CY	
CLEARING AND GRUBBING		1.16 ACRES	
EXCAVATION (CUT)		7360 CY	
EMBANKMENT (FILL)		259 CY*	
EARTHWORK SPOIL		1101 CY	
CONCRETE WALL		3481 VSF*	
CONSTRUCTION ENTRANCE FILTER FABRIC		1610 SF*	
CONSTRUCTION ENTRANCE AGGREGATE (6" THICK VDOT#1 STONE)		29 CY	(79 TONS)*
DRIVEWAY FILTER FABRIC		715 SF*	
DRIVEWAY AGGREGATE (6" THICK VDOT#1 STONE)		13 CY	(26 TONS)*
DRIVEWAY AGGREGATE (4" THICK CRUSHER RUN STONE)		9 CY	(18 TONS)*
CONC. ENTRANCES		96 SY	
DEMOLITION SIDEWALK		2928 SF	
REPLACEMENT SIDEWALK		2656 SF	
DEMOLITION CURB & GUTTER		66 LF	
REPLACEMENT CURB & GUTTER (NOT INCLUDING NEW ENTRANCES)		10 LF	
SUBSTATION STONE REMOVED (5" DEPTH)		58 CY	(117 TONS)*
RAINTANKS		5670 CF	
GRAVEL FILL FOR BMP (18" THICK MIN. VDOT #57 AGGREGATE)		317 CF*	(642 TONS)*
GEOGRID OVER RAIN TANKS		5704 SF*	
12" RCP BMP PIPE		80 LF	
3" PVC BMP DRAIN PIPE		32 LF	
BLANKET MATTING		3523 SF*	
TEMPORARY SEEDING		0.12 ACRES	
PERMANENT SEEDING		0.09 ACRES	
MULCH		0.05 ACRES	
FERTILIZER		100 LBS	
LANDSCAPING (SEE SHEET 8 OF 8)		0.2 ACRES	
SUBSTATION STONE (5" AASHTO #57 WASHED LIMESTONE) (BY OTHERS)		700 CY	(1418 TONS)*
CHAINLINK FENCE REMOVAL (BY OTHERS)		700 LF	
CHAINLINK FENCE W/ (4) 24" DOUBLE SWING GATES (BY OTHERS)		1093 LF	
UNDERDRAIN FOR WALL		460 LF*	

\*INCLUDES 15% WASTE AND OVERLAPS (BLANKET MATTING, FILTER FABRIC, AGGREGATE)  
\*\*QUANTITY BASED ON ASSUMED 6" TOPSOIL DEPTH & MAY VARY, DEPENDING ON THE TOPSOIL

UTILITIES AS - BUILT 11/19/2008

SEE SHEET 2a



HURT AND PROFFITT, INC. PROJECT NO. 20080140  
G.L. NO. 260-07-A5.3  
FILE NO. G-12176

**HURT & PROFFITT**  
INCORPORATED  
2524 LANGHORNE ROAD  
LYNCHBURG VA 24501  
800.242.4906 TOLL FREE  
434.847.7796 MAIN  
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BY: DWG: ..... STD DWG: .....  
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APPALACHIAN POWER COMPANY  
7th STREET STATION EXPANSION  
CITY OF ROANOKE VIRGINIA

COVER SHEET

SCALE: AS NOTED  
DR: NRH/JWG  
WCH:  
ENG: MDW  
APPD: MDW  
CH: FHJ/RAH  
DATE: 07/10/08  
DWG. NO. 1 OF 10  
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