

## SECTION 1200 - INCIDENTAL CONSTRUCTION

### PART 1 - GENERAL

**1.01 SCOPE:** This Section covers construction incidental to the main work. Topics include Engineer's field office, the protection of existing improvements, survey monuments, trees and shrubs, removal and replacement of existing fences, temporary fencing, adjustment of utility valve and manholes, resetting utility valve and manholes, and temporary surfacing.

**1.02 RELATED WORK:** Refer to the following sections for related work:

Photographic Record	Section 1000-General Requirements
Utility Pavement Patch	Section 3300-Asphalt Repairs
Permanent Chain Link Fence	Section 6300-Chain Link Fence

**1.03 PROTECTION OF EXISTING IMPROVEMENTS:** Contractor shall provide photographic record of existing improvements scheduled to remain as referenced in Part 1. Existing improvements, shrubs, and trees to remain shall be clearly marked, and appropriate instructions shall be given to all workers on the site.

Existing improvements influenced by excavations shall be protected by underpinning or bracing of the improvement or shoring of the excavation. No parking or storage of equipment or materials shall be permitted within the drip line of existing trees. If verbal instructions to workers do not suffice to control parking or storage, Contractor shall install temporary construction fence or 4-foot high chain link fence.

**1.04 REESTABLISHMENT OF SURVEY MONUMENTS:** Survey monuments for real property shall be treated in the following manner:

- A. Government Corners: This paragraph applies to section corners, quarter section corners, and other government land corners within the limits of construction whether or not the corner is near excavation and demolition. Contractor shall retain a registered land surveyor licensed in the State of Kansas to identify, justify, and provide ties to the corner before any work and to reestablish it within a monument box after pavement construction is substantially complete.
- B. Other Platted Corners: This paragraph applies to platted survey monuments (both subdivision boundaries and lot corners) that may be affected by excavation, demolition, or construction traffic. Contractor shall identify, mark, and protect corner monuments. Minimum corner marking shall be two 1" x 2" posts wrapped with high visibility surveyors' tape. Survey monuments that are disturbed shall be reestablished by a registered land surveyor licensed in the State of Kansas.

### PART 2 - PRODUCTS

**2.01 FENCE MATERIALS:** Fence materials shall match the application.

- A. Replacement materials for existing fence shall be the same type, the same or superior grade, and have the same original finish as the material removed.
- B. Temporary security or chain link fence shall be 9-gage, 2-inch mesh, galvanized, with knuckled selvedge, and shall meet the requirements of KDOT Standard Specifications Section 1619, except "U" channel posts may be used. Top wires may be used instead of bars. Height shall be six feet unless otherwise indicated in the drawings or specifications.
- C. Temporary construction fence shall be high visibility fencing, orange or yellow in color, minimum 42 inches high.
- D. Temporary stock fence shall be woven wire fabric a minimum of 42 inches high with graduated mesh pattern and shall meet the requirements of KDOT Standard Specifications sections 1619 and 2304. Pull posts shall be nominal 6-inch diameter wood posts. Every fourth line post shall be nominal 4-inch diameter wood post. Other line posts may be wood or "U" or "T" section steel posts.

**2.02 TEMPORARY SURFACE MATERIAL:** Type as directed by Engineer conforming to KDOT Standard Specifications Subsection 1102, CA-5; Subsection 1105, AB-3; or Subsection 1113, SS-3, crushed stone or gravel, meeting the following gradation:

CA-5		AB-3		SS-3	
Sieve Size	Percent Retained	Sieve Size	Percent Retained	Sieve Size	Percent Retained
1-inch	0	1-1/2-inch	0 - 5	1-1/2-inch	0
3/4-inch	0 - 5	3/4-inch	5 - 30	1-inch	0 - 15
3/8-inch	40 - 60	No. 4	35 - 60	3/8-inch	45 - 85
No. 8	95 - 100	No. 40	60 - 84	No. 30	90 - 100
		No. 200	80 - 92		

**2.03 FIELD OFFICE:** Field office shall be provided only when so indicated in the drawings or Special Conditions. Field office shall be for exclusive use of Engineer and his field representative. Field office shall conform to the requirements of KDOT Standard Specifications Section 805, Field Office and Laboratory, Type C (120 SF minimum); except a second 30"x 60" office desk may be substituted for the workbench. In addition, the office shall be supplied with electrical power and heating/cooling equipment. At Contractor's option, office space in a permanent structure within 300 feet of the project limits may be provided as field office.

**2.04 MANHOLE EXTENSION RINGS:** Extension rings for manhole adjustments shall be manufactured in accordance with ASTM A48, Class 35B for gray iron, shall have continuously machined horizontal and vertical bearing surfaces, and shall be rigidly attached to existing frames by set screws in the bearing leg of the ring.

Acceptable manufacturers and products are:

- A. Deeter Foundry, Inc.; Lincoln, Nebraska: 1848 to 1855 B series.

- B. Neenah Foundry Company; Neenah, Wisconsin: R-1979 Series.
- C. Clay & Bailey Manufacturing Company; Kansas City, Missouri: No. 3100 and 3101.
- D. American Highway Products, Ltd; Bolivar, Ohio: Manhole Riser (riser held in place by adjustable compression ring).

### **PART 3 - EXECUTION**

**3.01 REMOVE AND REPLACE EXISTING FENCE AND TEMPORARY FENCING:** Existing fence shall be removed where indicated on the drawings and stored for reinstallation. Material broken or damaged by removal and existing material too weathered for reinstallation shall be replaced. Unless specifically directed otherwise, temporary security fencing shall be placed to separate formerly secured areas from construction easements. Where indicated on the drawings, gates shall be included in the temporary fencing. Construction of temporary security and stock fence shall conform to KDOT Standard Specifications Section 806. No formerly secured area shall be left exposed unless Contractor's personnel are on guard duty.

Temporary construction fence and appropriate signs shall be installed where necessary to isolate open excavations, heavy equipment operations, uneven walking surfaces, and other potential hazards from access by the public.

**3.02 ADJUSTMENT OF UTILITY VALVE AND MANHOLE COVERS:** Adjustments to utility valve or manhole covers shall be made where necessary to preserve the surface alignment on resurfacing or patch projects, as determined by Engineer. Adjustments shall be accomplished by raising the cover with metal extension rings. The rings shall be of an approved type and shall be rigidly secured to the existing frame. Adjustments shall be completed before the final asphalt lift is placed.

**3.03 RESETTING UTILITY VALVE AND MANHOLE COVERS:** Where Engineer determines that adjustments may not produce an acceptable final product, utility valve boxes and manhole covers shall be reset. Resetting valve boxes shall include removal and replacement of fixed height valve boxes, or physical adjustment of frame section of adjustable height valve box. Resetting manhole covers shall include the removal and resetting of concrete collar, grade rings, frame, and cover. If adjustment would cause total stack height of grade rings to exceed 18 inches, the cone shall be removed and a barrel section added.

Full courses of brick set in mortar shall be used for resetting of brick manhole covers. Completely fill brick joints and provide a 1/2-inch mortar coating to outside face of brick grade courses. Brick for resetting shall conform to ASTM C32, Grade SS or SM, and shall be nominal 2-1/4" x 4" x 8".

Pavement removed for resetting operations shall be patched according to the utility patch requirements listed in Part 1. Valve boxes and manhole frames and covers may be reused only if they meet current standards and are in sound condition; otherwise, they shall be replaced. Resetting shall be completed before the final asphalt lift is placed.

- 3.04 TEMPORARY SURFACING:** Temporary surface material shall be promptly placed, bladed, and rolled in areas designated by Engineer such as temporary crossings and temporary routes of ingress and egress to adjacent residences and businesses. Performance standard shall be a stable, mud free pedestrian and vehicle route relatively free of ruts, drop-offs, and bumps.
- 3.05 SITE RESTORATION:** In the case that damage occurs to any property or improvement, public or private, on or off the site, as a result of Contractor's use of the site, Contractor shall repair or replace damaged property or improvement to a condition equal to or better than the undamaged condition.
- 3.06 CLEAN UP:** Contractor shall keep the work site free of trash and mud and in orderly appearance at all times. Debris and unsuitable material shall be promptly removed. Adjacent streets and lanes open to traffic through the work site shall be kept free of mud, trash, and material stockpiles. Final clean up shall be completed immediately after completion of work within an area. All equipment, trash, and unused material shall be removed, and the entire limits of construction left in a neat and finished condition.

**STANDARD DETAILS RELATED TO THE WORK OF THIS SECTION:**

UG 1200-A REPLACEMENT OF GOVERNMENT CORNER MONUMENT IN PAVED AREA

END OF SECTION 1200