SECTION 13

REMOVAL ITEMS

13.1 DESCRIPTION

A. General: This work shall include, but is not be limited to: the removal and disposal of buildings, fences, structures, pavements; and removal and disposal or salvage of abandoned pipe lines, pipe culverts, and other obstructions which are not designated or permitted to remain, except for obstructions to be removed and disposed of under other items in the contract. It shall also include the salvaging of designated materials and backfilling the resulting trenches, holes, and pits. When the proposal does not include pay items for removal items as set out in this section, such work shall be performed under various other contract items.

B. Related Work:

Section 11 Utility Excavation and Backfill
Section 12 Roadway and Drainage Excavation and Embankment
Section 19 Incidental Work
Section 90 Roadway Signs and Delineators

13.2 MATERIALS (not specified)

13.3 CONSTRUCTION REQUIREMENTS

A. General: The location of waste disposal shall be properly certified for the type of waste being disposed.

Detailed plans and specifications shall state if beneficial use materials are to be delivered to the City Landfill.

Cavities left by structure removal shall be filled to the level of the surrounding ground and shall be compacted to the satisfaction of the Engineer under the same specifications as embankment. Concrete floors and similar structures shall be broken up to prevent entrapment of water. The substructures of existing bridges and similar structures shall be removed down to 1 foot below the finished ground elevation. Those structure parts in a stream shall be removed down to the natural stream bottom.

Subsurface drains or under drain which will remain and are damaged during construction shall be repaired in kind at no expense to the City unless otherwise indicated in the Contract Documents. Repair of under-drains shall be per Section 11.

Streets that utilize an engineering geotextile or geogrid underlayment which will remain and is damaged by construction shall be repaired in kind at no expense to the City
unless otherwise indicated in the Contract Documents. Repair of engineering geotextile or geogrid shall be per Section 11.

Established drainage in the street, alley, or drainage ditch must be maintained by the Contractor during his construction operations. Contractor shall take necessary precautions to prevent drainage from running into the excavation.

Street and traffic signs within the excavation area shall be removed by the Contractor and delivered to the Rapid City Traffic Operations Division. Care shall be taken to prevent damage to the signs, posts or hardware. New signs not specifically called out in the plans to be installed by the Contractor shall be erected by Traffic Operations Personnel upon notification by the Contractor that construction is sufficiently completed to enable sign installation. The Contractor shall give no less than twenty-four (24) hours’ notice to the Traffic Operations Engineer.

Monuments, property pins, survey referenced points, and benchmarks shall not be disturbed without specific written permission from the Engineer. Unless otherwise called for in plans, any such markers disturbed without permission shall be replaced at the Contractor’s expense by a licensed Professional Land Surveyor. Plans will indicate known, existing monuments that are scheduled to be disturbed, demolished or removed.

Damage to the property of others, such as fences, trees, shrubs, lawns, sidewalks, etc. shall be repaired or replaced at the Contractor’s expense, unless removal of such is shown on the plans or written permission was first obtained from the Engineer.

B. **Remove and Salvage**: Designated salvageable material shall be carefully removed in sections or pieces, which may be readily transported and shall be stored at places specified.

C. **Remove and Reset**: Materials to be removed and reset shall be removed, transported to a location approved by the Engineer and stored, when necessary, so that there will be no damage before resetting. The Contractor will be required to replace materials damaged by his negligence.

D. **Remove and Dispose**: Unusable material shall be destroyed or disposed of off the project.

E. **Paving Surface Removal**: In removing pavement, curb, gutter, sidewalk, and similar structures where portions of the existing structures are to be left in the finished work, the old structure shall be removed to an existing joint or saw cut to provide a true line with a vertical face. Openings in the existing pavement shall be made, by sawing to full depth of the pavement.

Protection of Existing Surface use of steel faced or shod equipment without adequate padding to prevent damage to the existing pavement shall be at the Contractor’s risk. Extra care shall be taken to prevent damage from excavator, loader bucket, or other equipment edges/teeth when placing or removing trench spoil or materials piles.
Damaged pavement because of the Contractor’s equipment shall be repaired or replaced at no additional cost to the City.

**F. Saw Cutting:** Saw cutting of pavement ahead of trenching or excavation operations shall be required to confine pavement damage to the limits of the trench or excavation. The first pavement saw cut shall be, at a minimum, the same width as the minimum trench width centered over the utility. Asphalt or portland concrete pavement shall be cut to full depth. Pavement removal limits shall be approved by the Engineer prior to sawing. A second full depth saw cut shall be made one (1) foot outside the disturbed limits of the trench excavation on both sides. Final saw cuts shall provide a smooth vertical face, against which to resurface. Care shall be taken to prevent damage to the newly cut edge.

Final removal area limits for portland cement concrete excavation shall be as approved by the Engineer. Removal of half panels shall be in accordance with standard details.

If the asphalt concrete pavement edge is undermined at any time during construction, the pavement must be saw cut back to the undermined location and removed to form a square edge. Removals for portland cement concrete that has become undermined shall be as directed by the Engineer.

### 13.4 METHOD OF MEASUREMENT

When the contract stipulates that payment will be made for removal of obstructions on a lump sum basis, no separate measurement will be made.

When the contract stipulates that payment will be made for the removal of specific items on a unit basis, measurement will be made by the unit stipulated in the contract.

If detailed plans and specifications require beneficial use material to be delivered to the City landfill, no additional measurement or payment for hauling or disposal shall be made.

When removal of pipe is to be made on a unit basis, the quantity will be measured in linear feet to the nearest whole (1) foot. Quantities will be determined by measuring in place prior to removal.

When removal of AC or PCC pavement or sidewalk is to be made on a unit basis, the quantity will be measured in square feet or square yards to the nearest square foot or nearest tenth (0.1) square yard. Quantities will be determined by measuring in place prior to removal.

Curb and gutter removal shall be paid for by the nearest half (0.5) linear foot. All types of curb and gutter shall be measured the same for removal. Where curb and/or gutter is monolithic or tied to adjacent portland cement concrete pavement to be removed, it will be considered as pavement and will be measured as such.
When a portion of pavement, curb and gutter, sidewalk, or other similar structures will remain, saw cutting to the lines described in the plans or as directed by the Engineer, shall be incidental to the removal item and will not be measured.

13.5 BASIS OF PAYMENT

Obstruction removal, will be considered as Incidental Work unless a bid item for the removal is provided. Payment for removal of obstructions by lump sum or unit price basis will be full compensation for removal and disposal of such items, excavation and subsequent backfill incidental to their removal.

Pipe removal, will be considered as Incidental Work unless a bid item for the removal is provided. Variance from pipe removal quantities, locations, or dimensions shown on the plans or specified herein will not be cause for adjustments in payment for Incidental Work.

AC or PCC pavement or sidewalk shall be paid for at the contract unit price bid, and shall be full payment for removal and disposal.

Removal of curb and gutter shall be paid for at the contract unit price per linear foot. Payment shall be full compensations for removal and disposal of any type of curb and gutter.

If detailed plans and specifications require beneficial use material to be delivered to the City landfill, no additional measurement or payment for hauling or disposal shall be made.

END OF SECTION