

Sample Plan

CROSS SECTIONS ----- NARRATIVE

References:

- Design Scene: Chapter 17 - Cross Sections
- Road Design Manual: Chapter 4-2 to 4-8
- Technical Manual: 5-292.606
5-292.622
- Standard Plan: 5-297.404 - Permanent Erosion Control Along Roadways, Ditches, and Flumes

General Information:

Normal cross section spacing is 100'. Consider greater cross section spacing if quantities would not be significantly affected. Also consider shorter cross section spacing, if warranted, such as machine grading or where more detail is needed. Consult with Surveys and the 3-D Visual Imaging Specialist on the need for any additional cross sections.

Show and label special features (noise walls, trees, transformer towers, retaining walls, etc.), including structural features below the ground line.

Show and label special ditch grades (compute elevations to bottom of top soil).

Don't show the backslope slope rounding.

Show in-place surface and subsurface utilities such as gas, power, telephone, water, sewer, etc. The following depths may be used as a guide if actual depths are not known:

UTILITY	DEPTH OF COVER	SAMPLE SYMBOL
Water	7.5'	--" Water
Power	3.5'	P-Bur
Telecommunications	3'	T-Bur
Gas	2.5'	--" Gas
Signal Conduit	2'	--" Signal Conduit
San. Sewer Force Main	7.5'	--" D.I.P. San. Force Main
San. Sewer	Use actual depth	--" V.C.P.
Catch Basins or Manholes	Draw actual "simple" picture	T.C, F.L., etc.

Show and label the slope ratios, R/W, and T.E. on cross sections. Differentiate between State and Local Right of Way, if applicable.

Cross sections identified on the sheet should be labeled in the lower right hand corner.

Cross Section sheets may be numbered with a separate sequence from the plan sheets such as X1, X2, ... X200, with the total number of sheets showing on the Title Sheet. This separate sequencing may allow plotting the sheets earlier thus saving time at the end of the plan preparation process. The sheets need to be dated to make sure the latest versions are used.

Check profile elevations, subcuts, swamp depths, etc.

Match lines and their assigned numbers should be labeled on each cross section sheet.

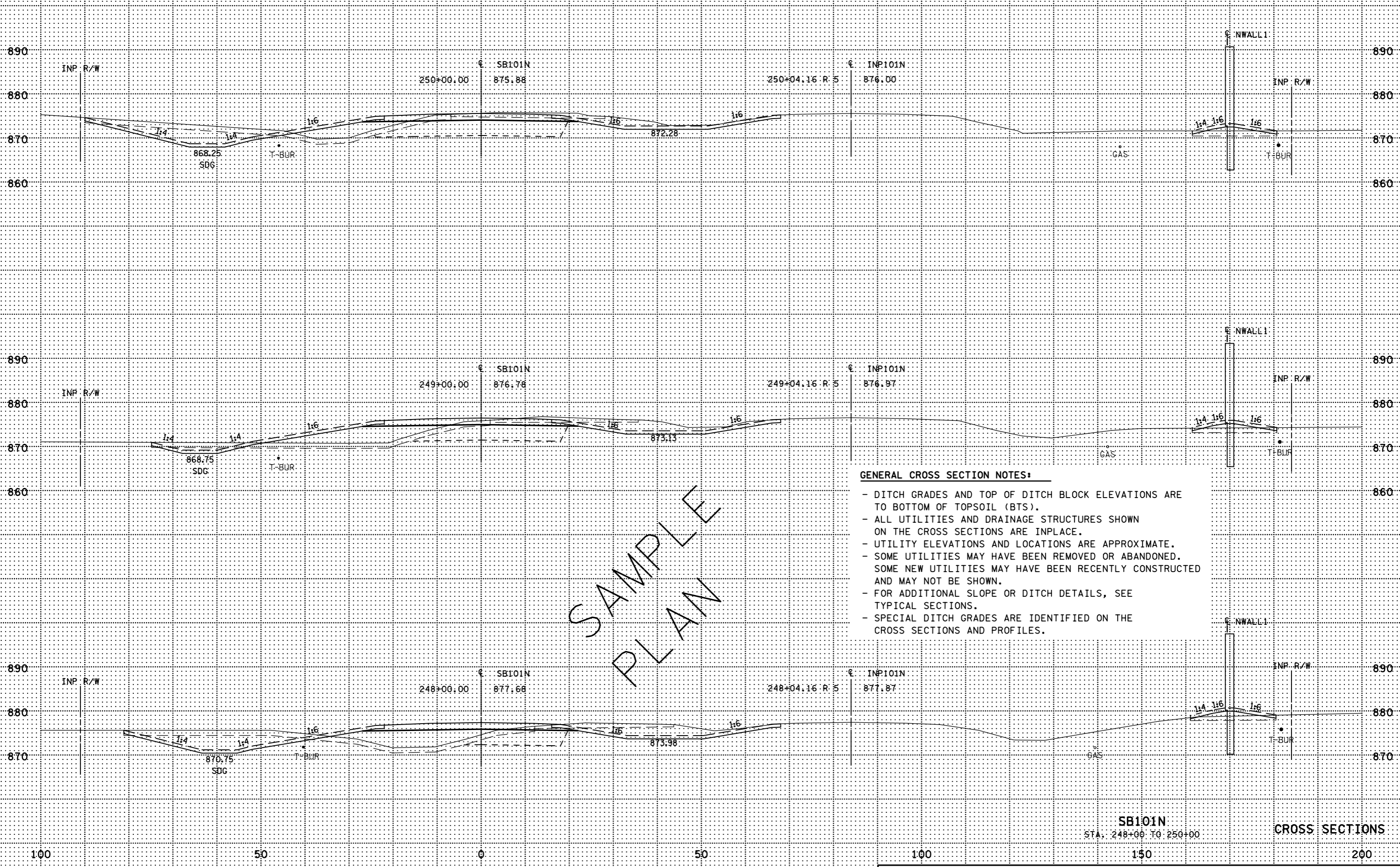
Designer should consider the need for staged cross sections to determine temporary earthwork quantities.

Cross Section sheets do not require the Engineer Signature.

Sample Plan

CROSS SECTIONS ----- CHECKLIST

- ___ 1. Inplace, Survey, or Construction Centerlines
- ___ 2. Begin/End Construction, Equations, Subcuts, Muck Excavation, Rock Excavation, Ditch Grades, etc.
- ___ 3. Cross Check Profile Elevations, Subcuts, Muck Depths, and Rock Elevations
- ___ 4. Grid Elevations and Distances
- ___ 5. General Notes (on first sheet only)
- ___ 6. Utilities
- ___ 7. Right of Way and Easements
- ___ 8. Match Lines
- ___ 9. Edge of Wetlands
- ___ 10. Cross references to other sheets (as applicable)



- GENERAL CROSS SECTION NOTES:**
- DITCH GRADES AND TOP OF DITCH BLOCK ELEVATIONS ARE TO BOTTOM OF TOPSOIL (BTS).
 - ALL UTILITIES AND DRAINAGE STRUCTURES SHOWN ON THE CROSS SECTIONS ARE INPLACE.
 - UTILITY ELEVATIONS AND LOCATIONS ARE APPROXIMATE.
 - SOME UTILITIES MAY HAVE BEEN REMOVED OR ABANDONED. SOME NEW UTILITIES MAY HAVE BEEN RECENTLY CONSTRUCTED AND MAY NOT BE SHOWN.
 - FOR ADDITIONAL SLOPE OR DITCH DETAILS, SEE TYPICAL SECTIONS.
 - SPECIAL DITCH GRADES ARE IDENTIFIED ON THE CROSS SECTIONS AND PROFILES.

SAMPLE
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SB101N
STA. 248+00 TO 250+00
CROSS SECTIONS