**15_09 Dimensioning of Gutters and Islands**

Question:
In reference to plotting the 1'-6" curb and gutter lighter;
The 1'-6" (450mm) C&G should be copied 1.5' (0.450m) from EOP. The island should match up with the center of 1'-6" (450mm) C&G. This may not eliminate the problem, but this is the correct way to draw 1'-6" (450mm) C&G on Roadway plans.

Answer:
Base on production, the line (and offset) which represents curb and gutter on plans is heavily dependent on the dimension convention used. There are two main dimension conventions that are used in a set of Roadway plans. They are either dimensioned from face to face (F-F) of curb or back to back (B-B) of curb. These two conventions are detailed on the Typical Sections and on each plan sheet.

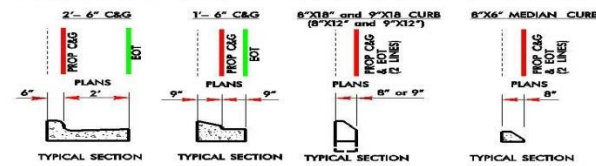Example of Curb and Gutter Dimension Convention - Face to Face

Typical Section
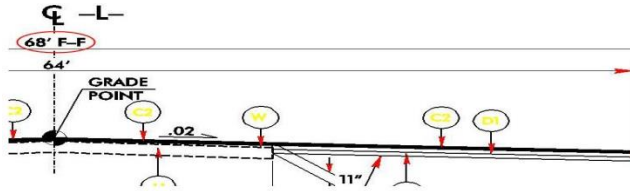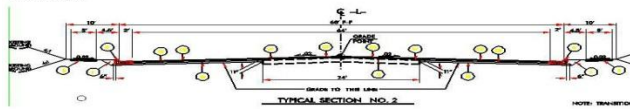


Per Plan Sheet (Dimension in DSN File)
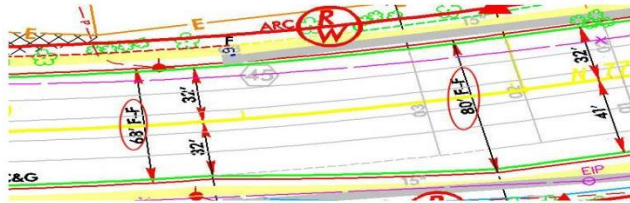
Below is a sketch of some curb and gutter types using the **Face to Face** curb dimension convention. The one red line represents the curb and gutter or just the curb line on the plans. Note the dashed black line is just used as reference and not drawn.

CURB DIMENSION CONVENTION: FACE TO FACE

Below is a sketch of some curb and gutter types using the **Back to Back** curb dimension convention. The one red line represents the curb and gutter or just the curb line on the plans. Note the dashed black line is just used as reference and not drawn.
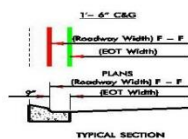
CURB DIMENSION CONVENTION: BACK TO BACK
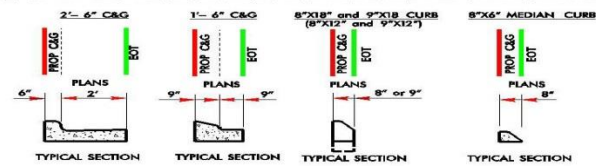
In addition, for proposed concrete gutters (without curbing), the one red line representing the proposed gutter is strictly located at the gutter water flow point as shown on the plans. Note the dashed black line is just used as reference and not drawn.

GUTTER DIMENSION CONVENTION (WITHOUT CU
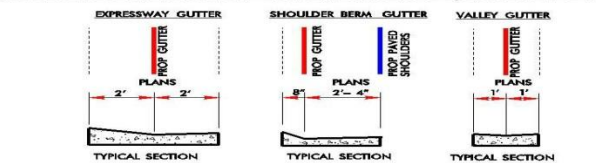
Roadway CADD Support does not recommend mixing the two conventions. For example, dimensioning the roadway width as "28.5' F - B". This can prove to be counterproductive and cause some confusion in plans interpretation. Regardless of which convention is used, the method chosen should match what is labeled on the plans and what is dimensioned on the Typical Sections. For the above example and what the Designer has chosen for his particular TIP project, if the 1'-6" curb and gutter is dimensioned from face to face of curb, then the EOT line is copied over 9" (0.75').

If the 1'-6" curb and gutter is dimensioned from back to back of curb, then the EOT line is copied over 18" (1.5').
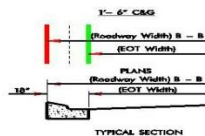
Note that three major design items are affected by which convention used. The three items are the three center curve layout, berm width (always from the face of curb to berm cut/fill hinge point), and the concrete driveways (drop and radius types) computations. Please be aware of these three design items and others like them, if one chooses to use the Back to Back convention.