

Design Standards Letter

Letter Number: **P-1990-04**

Letter Date: **12/28/1990**

Effective Date: **03/01/1991**

Section/Plan No.: **P606.00, P606.30**

Subject: **Revised Guard Rail Plan**

Body

Enclosed are copies of revised Standard Plan 606.00V and Standard Plan Index form D-2. These plans replace the previous 2 sheets of 606.00U and delete 606.30E.

THE REVISED PLANS ARE EFFECTIVE WITH THE MARCH, 1991 LETTING.

Revisions require a breakaway cable terminal (BCT) on the approach end of guard rail unless the end is anchored to a bridge, embedded, or bolted to a rock face. The BCT is approximately 37 feet long with the approach end offset 4 feet from the edge of the shoulder to the face of the first post. The first two posts of the BCT are wooden and do not have blockouts.

The downstream end of guardrail has another BCT if located on a two-way roadway. The end of the guard rail can also be terminated with an end anchor, bridge anchor, embedded anchor, or rock face anchor. The end anchor is 12'-6" in length and has a breakaway cable. The last two posts are wooden with wooden blockouts. An end section is used at the end of the guard rail on one-way roadways.

The shoulder slope is continued 2 feet behind the guard rail posts. The shoulder slope is continued behind the BCT and is tapered from 2 feet to 5 feet beyond the 4 feet BCT offset. The shoulder slope is tapered from 9 feet to 0 feet ahead of the BCT. This shoulder slope extension will alter the slope line and possibly cause encroachment outside the right of way. Please review design plans for this condition.

Standard Plan 606.30 is deleted as turned down terminal sections will no longer be used.