BF 76995 Hwy 40 Over Malcolm Ck
Hydrotechnical Summary

Channel Capacity :

S = 0.05
B = 5 m, h = 1.0 m, T_h = 8 m
Use n = 0.06

At Bank Height : Y = 1.0 m, V = 3.1 m/s, Q = 20 cms
At Channel Capacity : Y = 1.5 m, V = 4.3 m/s, Q = 45 cms

Historical Highwater Data :

The 1987 design was based on Y = 1.3m and Q = 33cms. Icing was noted in 1969 and 1984.

There are no WSC Gauges on this stream. Gauges in the area suggest HW events in June 1972, June 1980, July 1982, June 1990, and July 1997. The largest storms in the storm database are 125mm in June 1972 and July 1997.

Basin Runoff Potential :

d = 70 mm, T_p = 20 hrs, q = 1.1 cms/km^2.
Gross DA = 30 km^2.
Q_p = 30 cms.

Conclusion :

Basin runoff potential governs for this site.

Recommended parameters : Y = 1.2 m, V = 3.9 m/s, Q = 30 cms.