BF 02043 Local Road Over Strawberry Ck
Hydrotechnical Summary

Channel Capacity :

S = 0.0005
B = 8 m, h = 2.5 m, T_h = 15 m
Use n = 0.04

At Bank Height : Y = 2.5 m, V = 0.8 m/s, Q = 25 cms
At Channel Capacity : Y = 3.5 m, V = 1.1 m/s, Q = 50 cms

Historical Highwater Data :

HW was noted in 1927 (Y = 3.5m, BW from lake), April 1965 (Y = 2.5m), and July 1988 (Y = 2.5m, over the grade). A 2000 BIM report notes a HWM with Y = 3m. with water over the grade and Y ~ 3.0m.

There are no WSC gauges on this stream. Nearby gauges suggest HW events in 1917, 1983, 1988, and 1996. The largest storm in the storm database for this area is July 1988 (140mm) with other large storms in 1961, 1979, 1983, 1993 and 1996.

Basin Runoff Potential :

d = 75 mm, T_p = 20 hrs, use q = 1.1 cms/km^2.
Gross DA = 168 km^2.
Q_p = 185 cms.

Conclusion :

The channel capacity estimate is consistent with historic highwater observations and is within the basin runoff potential.

Recommended parameters : Y = 3.5 m, V = 1.1 m/s, Q = 50 cms.