BF 72220 Local Road Over Eureka River Tributary
Hydrotechnical Summary

Channel Capacity :

S = 0.004
B = 4 m, h = 1.4 m, T_h = 7 m
Use n = 0.05

At Bank Height : Y = 1.4 m, V = 1.0 m/s, Q = 7 cms
At Channel Capacity : Y = 2.1 m, V = 1.4 m/s, Q = 17 cms

Historical Highwater Data :

A 1960 report notes a HWM with Y = 1.8m and estimates Q = 10cms.

There are no gauges on this stream. Gauges in the area suggest HW events in April 1974 and April 1997. The largest event in the storm database for this area is July 1987 with 110mm of rainfall.

Basin Runoff Potential :

d = 60 mm, T_p = 20 hrs, q = 0.83 cms/km^2.
Gross DA = 73 km^2.
Q_p = 61 cms.

Conclusion :

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

Recommended parameters : Y = 2.1 m, V = 1.4 m/s, Q = 17 cms.