BF 73957 Local Road Over Lasthill Ck
Hydrotechnical Summary

Channel Capacity :

S = 0.0015
B = 2 m, h = 1.4 m, T_h = 5 m
Use n = 0.05

At Bank Height : Y = 1.4 m, V = 0.7 m/s, Q = 3 cms
At Channel Capacity : Y = 2.1 m, V = 1.0 m/s, Q = 8 cms

Historical Highwater Data :

HW was noted in May 1952 to the top of bank. A 2000 BIM report notes a HWM with Y = 1.9m. The 2001 design was based on Q = 5cms.

There are no WSC gauges on this stream. Gauges in the area suggest HW events in June 1972, July 1982, July 1986, July 1990 and July 1999. The largest storms in the storm database are August 1925, June 1972, and July 1986 with about 110mm of rainfall.

Basin Runoff Potential :

d = 50mm, T_p = 20hrs, q = 0.7 cms/km^2.
Gross DA = 17 km^2.
Q_p = 12 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 = 1.0 m/s, Q = 8 cms.