BF 75700 Bad Heart River at Wanham
Hydrotechnical Summary

Channel Capacity :

S = 0.009
B = 8 m, h = 4 m, T_h = 20 m
Use n = 0.045

At Bank Height : Y = 4.0m, Q = 215 cms, V = 4 m/s
At Channel Capacity : Y = 5.0m, Q = 370 cms, V = 5 m/s

Historical Highwater Data :

HWM noted in 1990 of 1.7m below the top of pipes (elev 776.8m).

WSC Gauge 07GJ004 is located on this stream just upstream of this site. This gauge operated from 1968-69 reporting a Qmax in 1969 of 70 cms. Gauges in the area report the largest events occurring in 1979, 1986 and 1990.

Basin Runoff Potential :

d = 60mm, T_p = 20hrs, q = 0.83 cms/km^2.
Gross DA = 180 km^2.
Q_p = 150 cms.

Conclusion :

The channel capacity method is not within the basin runoff potential. This stream has a large slope and is located within a narrow, steep valley. The basin runoff potential will govern for this site.

Recommended parameters : Y = 3.3 m, V = 3.5 m/s, Q = 150 cms.