Ministry of Natural Resource Operations
BC River Forecast Centre

UPDATE: South Coast 7Dec2010 11:30PM
Flood Warning: Tsolum River
Flood Watch: Browns River and Cruikshank River

High Streamflow Advisory:

- **West Vancouver Island**
- **East Vancouver Island**
- **Howe Sound**
- **Lower Mainland**

The BC River Forecast Centre is **upgrading**:

- the Flood Watch to a **Flood Warning for the Tsolum River;**
- the High Streamflow Advisory to a **Flood Watch for the Cruikshank River,** and maintaining the Flood Watch for the Browns River;
- and **maintaining** the High Streamflow Advisory for the South Coast, including west and east Vancouver Island, Howe Sound and the Lower Mainland.

Environment Canada has continued the Rainfall Warning for the areas listed above. A slow moving frontal system is forecast to deliver another 20 to 60 mm of rain for East Vancouver Island, Metro Vancouver and Howe Sound overnight. Western and Inland Vancouver Island are forecast to receive another 50 to 70 mm of rain overnight and into Wednesday morning.

The Tsolum River near Courtenay (WSC-08HB011) is currently at 217 m^3/s, just below a 5 year return period discharge of 219 m^3/s, with a rate of rise of 15 cm/hour.

The Browns River near Courtenay (08HB025) is currently at 73 m^3/s, and is approaching a 2 year return period discharge of 112 m^3/s, with a rate of rise of 5 cm/hour.

The Cruikshank River (08HB074) is currently at 168 m^3/s and is approaching a 2 year return period of 252 m^3/s, with a rate of rise of 18 cm/hour.

24 hour rainfall totals range from 46 mm at the North Courtenay MoT station, to 234 mm at Tofino Creek (08HB086), with most areas receiving accumulations of 60-80 mm. Current precipitation rates are steady at 3-7 mm/hour.

Rivers elsewhere on the South Coast remain well below levels of concern, and aren't expected to reach flood stages overnight.

A ***High Streamflow Advisory*** means that river levels are rising or expected to rise rapidly, but that no major flooding is expected. Minor flooding in low-lying areas is possible.

A ***Flood Watch*** means that river levels are rising and will approach or may exceed bankfull. Flooding of areas adjacent to affected rivers may occur.

A ***Flood Warning*** means that river levels have exceeded bankfull or will exceed bankfull imminently, and that flooding of areas adjacent to the rivers affected will result.

Freezing elevations remain near treeline, at approximately 1400 m over most of the South Coast, and are expected to remain stationary overnight, and beginning to lower by Wednesday morning. Any remaining low elevation snow remaining on the ground is expected to melt, contributing to runoff.

Given the current weather forecast, river levels are expected to continue to rise overnight, peaking early Wednesday morning, before beginning to recede. Localized flooding in low-lying areas may occur.

The River Forecast Centre will continue to monitor conditions and will provide an update Wednesday morning, or earlier if conditions warrant.

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