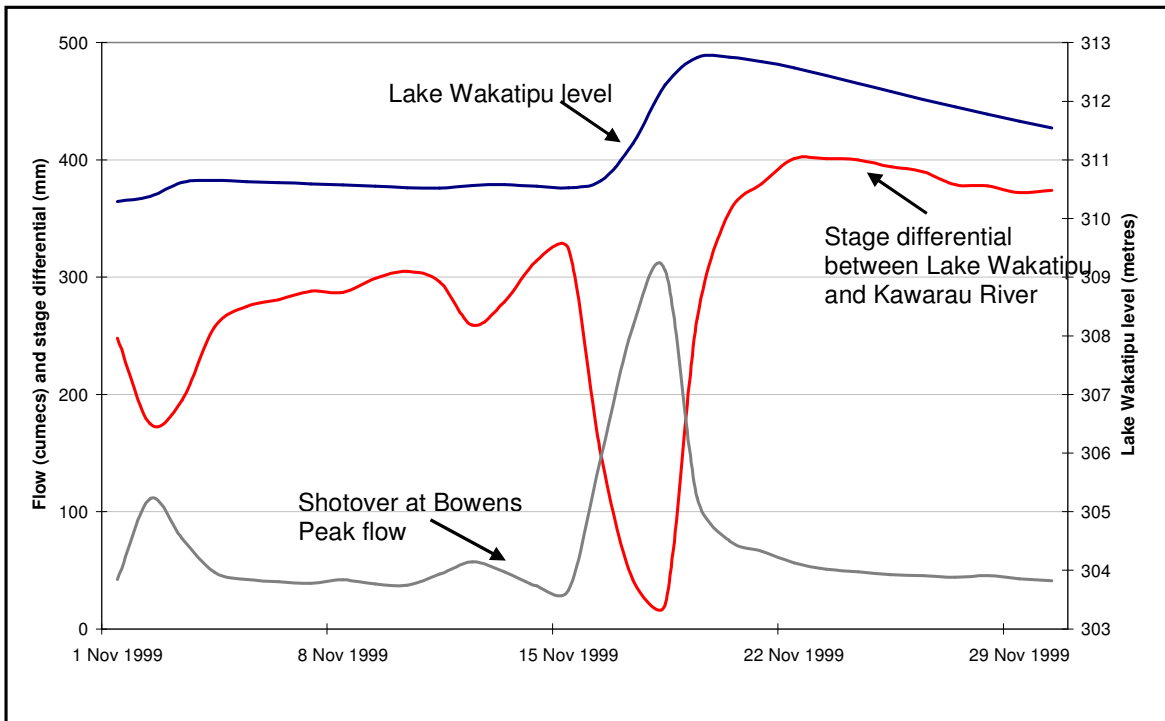


## Lake Wakatipu – Kawarau River at Frankton stage difference

The Water Info web page shows a derived site called Lake Wakatipu / Frankton Difference. This is the difference (in metres) between the level of Lake Wakatipu at Willow Place, and the level of the Kawarau River at Frankton. A high reading (greater than 0.1 metres) means that the level of the lake is higher than the level of the river downstream of the Kawarau Falls Bridge, and water can therefore drain easily from Lake Wakatipu into the Kawarau River. However, high flows entering the Kawarau River from the Shotover River can backflow towards Lake Wakatipu, and the stage difference can drop to zero, or even become negative. In this case, outflow from the lake slows considerably. This can compound already rapidly rising lake level during a heavy rainfall event.

The following graph shows an example of the stage difference declining quickly during the major flood event of November 1999 (note that the stage differential is shown in millimetres on this graph).



**Stage differential between Lake Wakatipu and Kawarau River during November 1999.**