


10. LOSS OF BASEFLOW IN THE UPPER KAPUTONE STREAM – POSSIBLE CAUSES



The Committee considered a report from Nina Nikora, Planning Engineer, Greenspace Unit, identifying possible causes of the loss of baseflow in the Upper Kaputone Stream.

The report was considered by the Shirley/Papanui Community Board at its meeting on 5 May 2004 and the recommendations from the Board were considered in tandem with the recommendations from staff.

The Committee **decided**:

1. That, to understand the effect of urbanisation on surface and groundwater flows, the Northwood site be monitored using the following parameters:
 - groundwater flow rates from the existing and proposed groundwater discharge points.
 - groundwater levels at the locations where historical groundwater level information is available.
 - monitoring of groundwater flows around road and trench systems used for sewer and other services.
2. That the simultaneous monitoring of M35_1205 and M_35-3739 wells be continued and the monitoring of M35_1347 restarted to better understand the dynamics of the underground flow into and out of the Upper Kaputone Stream catchment.
3. That the Styx Living Laboratory Trust and associated group of residents continue to monitor the streamflow in the upper reaches of the Kaputone Stream on a regular basis (weekly or fortnightly).
4. That the feasibility of developing a mathematical groundwater model of the Upper Kaputone Stream catchment be investigated.
5. That relevant meteorological data be collated for estimating the evaporation and evapotranspiration over the last few years, to allow a more reliable assessment of the water balance dynamics of the Upper Kaputone Stream catchment.
6. That for any new subdivision with the Upper Kaputone Stream catchment a preferred stormwater disposal option be by way of soakage.
7. That the estimate of funds (approximately \$30,000) for the 2005/2006 Annual Plan be available as a contingency item for this project.
8. That the above project be coordinated with the work of other agencies such as Environment Canterbury and the University of Canterbury.
9. That the Council be provided with a progress report on the project in six months time.