

RAA Sinking Pit Cover Assessment

Road being assessed: **Richmond Road from Anzac Highway to airport**

Direction and number of lanes tested: Eastbound and westbound, all lanes.

Date of assessment: 24-7-2018

Total sites assessed: 65

Total sites exceeding comfort benchmark: 15



Raised plate opposite Hundon Ct

RAA visually inspected all covers that exceeded our calculated comfort benchmark and removed false readings and pit covers that we did not believe to be SA water assets from the list.

Below is the list of 15 sites we believe to be under the care of SA Water, and recorded a high G-Force reading with visual defects causing driver discomfort or danger.

Repair of the plates west of Marion Road will probably see little benefit to road users as the condition of the road is very poor already, and council should address this in the first instance. These locations have still been included in the list below for your information.

| Location Description | W/WW | Latitude | Longitude | Direction & Lane | Comment |
|-----------------------------------|------|--------------|-------------|------------------|----------------|
| <i>Just E of Eton Rd</i> | W | -34.94162563 | 138.5805591 | EB RH | |
| <i>Just E of Railway Tce</i> | W | -34.94173556 | 138.5780986 | EB RH | |
| <i>Just E of South Road</i> | W | -34.94215372 | 138.5713825 | WB RH | |
| <i>Intersection with Moss Ave</i> | W | -34.94233461 | 138.5672104 | WB LH | |
| <i>In front of Rex Hotel</i> | W | -34.94246649 | 138.564587 | WB LH | |
| <i>Opposite Ubet Driveway</i> | W | -34.94250766 | 138.5637342 | WB LH | |
| <i>Just W of Grove Ave</i> | W | -34.9425827 | 138.5621883 | WB LH | 2 Covers |
| <i>In front of #216</i> | W | -34.94262388 | 138.561311 | WB LH | |
| <i>Just E of Sanders St</i> | W | -34.9428881 | 138.5557627 | WB LH | |
| <i>W of Marion Rd</i> | W | -34.94297783 | 138.5527819 | EB LH | |
| <i>W of Marion Rd</i> | W | -34.94302385 | 138.5521124 | EB LH | |
| <i>W of Marion Rd</i> | W | -34.94313205 | 138.5498756 | EB LH | |
| <i>W of Marion Rd</i> | W | -34.9431899 | 138.548777 | EB LH | |
| <i>W of Marion Rd</i> | WW | -34.94324328 | 138.5475196 | EB LH | |
| <i>Opposite Hundon Ct.</i> | W | -34.94337454 | 138.5452353 | EB LH | W of Marion Rd |

Please see attached .csv file. Please contact us if a shape file is required for mapping purposes.

RAA have calculated a benchmark comfort G-Force of 0.045G in our test vehicle (2015 Subaru Forester) based on averaging the G-Force of multiple runs over a singular pit cover approximately 50mm deep that was perceived to be uncomfortable when crossed. A verification exercise has been conducted that suggests an error rate of approximately 18% due to road roughness in the vicinity of a pit cover.