

Legacy Way in-tunnel air quality

Monthly trend report – May 2019

The table below sets out the in-tunnel air quality criteria for the Legacy Way tunnel as set out in the Environmental Authority (EPPR02587314).

For the month of May 2019, a peak reading was recorded for sensor AQVx007 of 0.0054K/m at 0615-0629hrs 30/5/19 against the criteria of 0.005K/m. After review of ventilation records, CCTV footage and air quality data, it was suspected the source of minor haze (near the tunnel portal area) was external to the tunnel operations. Additional ventilation was used and the event was confirmed cleared at 0722hrs. Brisbane City Council was notified on 30th May 2019. No other notable trends were identified.

Table 1: In-tunnel air quality criteria

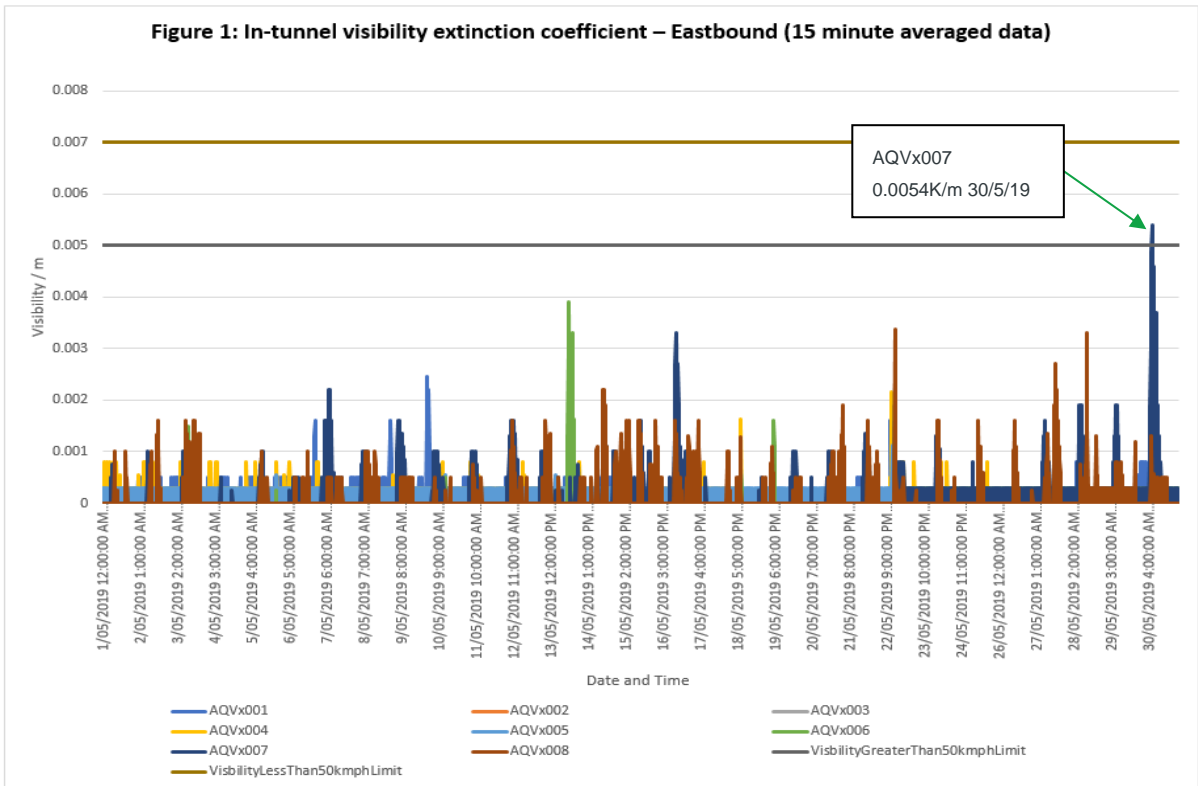
Parameter	Criteria
Carbon monoxide (CO)	70 ppm generally 90 ppm in peak traffic congestion
Nitrogen dioxide (NO ₂)	1 ppm (average)
Visibility coefficient (K)	0.005 m ⁻¹ for free flowing traffic (greater than 50km/hr) 0.007 m ⁻¹ otherwise

Notes:

1. Monitoring and measuring protocols for each criteria as set out in the PIARC guidelines, as current December 2012.
2. Tunnel sensor average concentrations reported for Carbon Monoxide and Nitrogen Dioxide.
3. Peak traffic congestion occurs when traffic flows are less than 10 km/h.
4. Visibility coefficient (K-value) may fluctuate with peak conditions.

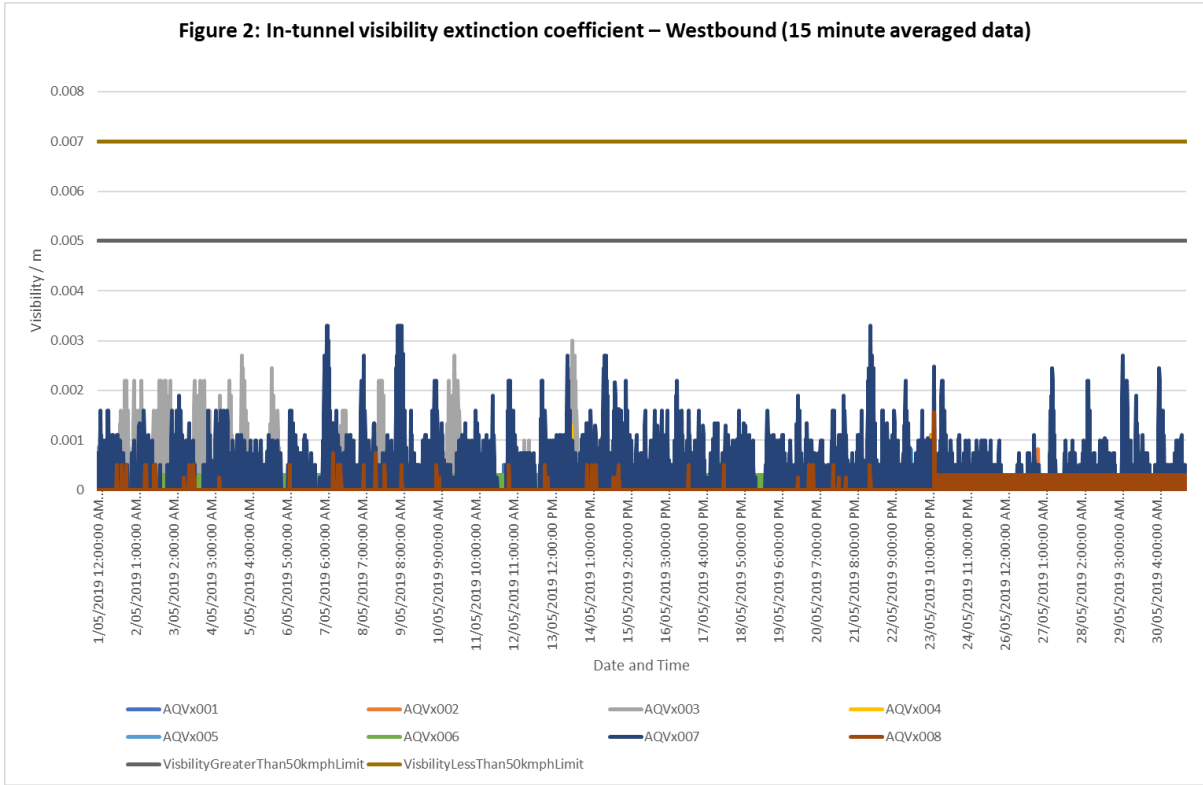
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Visibility



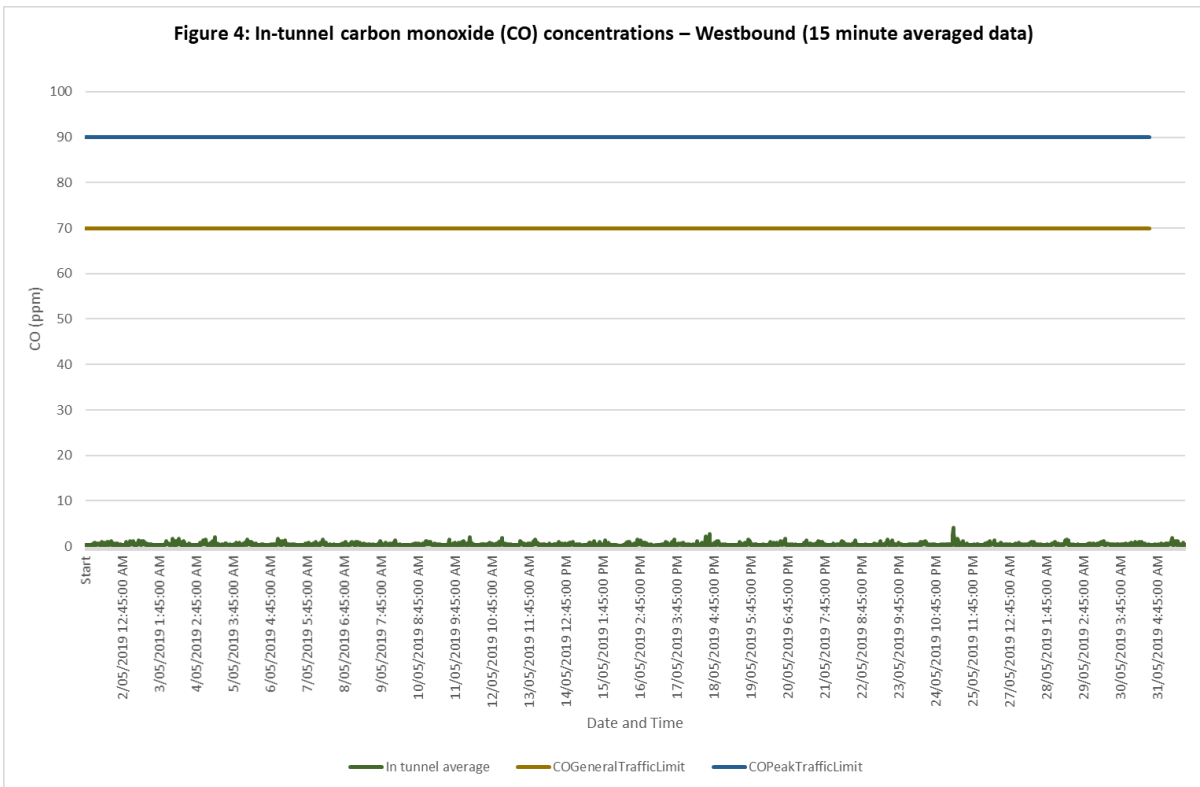
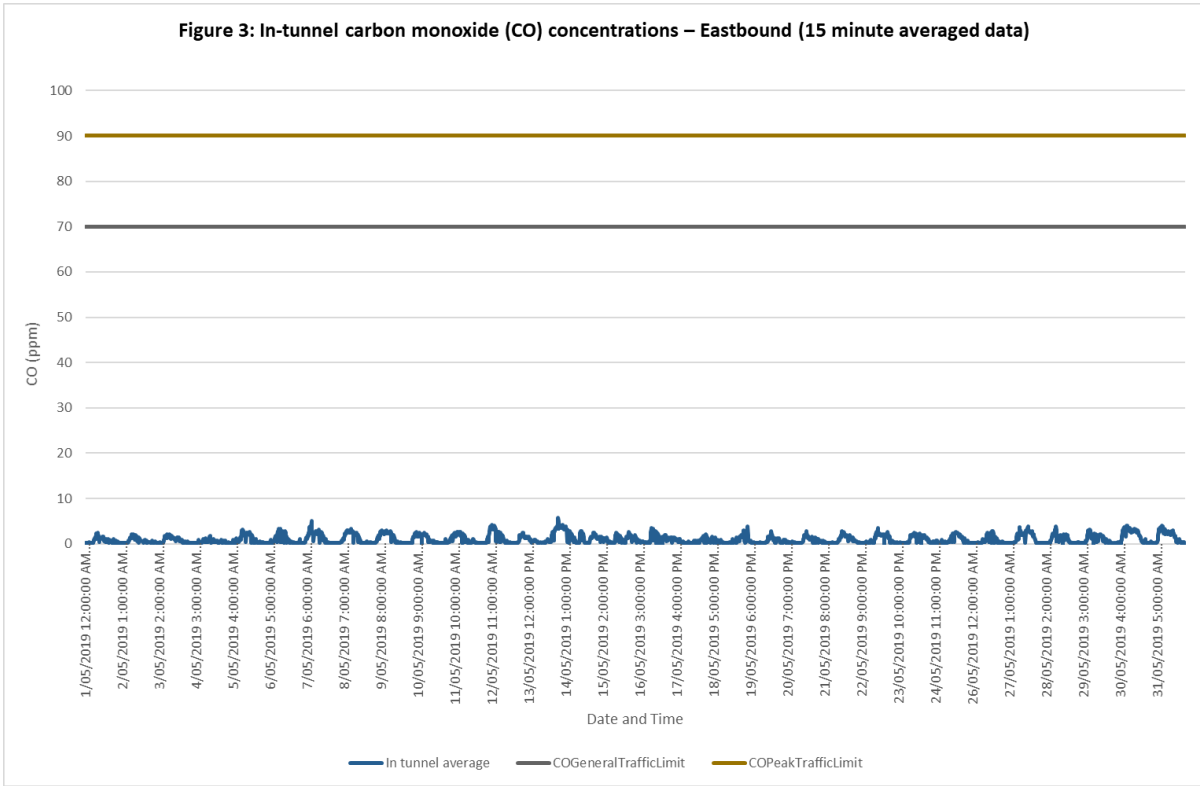
Note: A peak reading was recorded for sensor AQVx007 of 0.0054K/m at 0615-0629hrs 30/5/19 against the criteria of 0.005K/m. After review of ventilation records, CCTV footage and air quality data, it was suspected the source of minor haze (near the tunnel portal area) was external to the tunnel operations. Additional ventilation was used and the event was confirmed cleared at 0722hrs. Brisbane City Council was notified on 30th May 2019.

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Carbon monoxide



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Nitrogen dioxide

