FACT SHEET NOVEMBER 2021





Australian Government

**BUILDING OUR FUTURE** 

# **Tonkin Gap Project and Associated Works**



# **Vibration during construction**

## What causes vibration?

Heavy machinery may generate low levels of vibration at various stages of construction. Experiencing vibration does not mean structural damage to a property will occur.

The main sources of vibrations on the project are likely to be:

- Truck movements
- Earthmoving, piling and soil compaction activities
- Use of heavy machinery



Roller compacting a crane pad for the Guildford Road underpass

www.mainroads.wa.gov.au

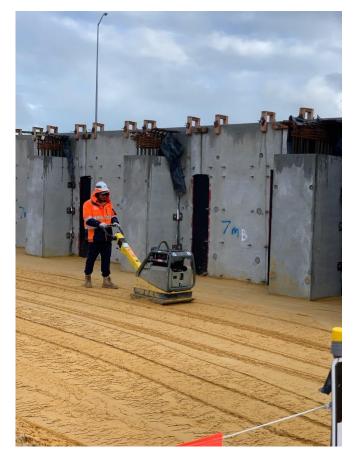




## **Managing vibration**

To minimise the impact of construction vibration, we implement a range of measures on the project including:

- Operating equipment on the lowest effective vibration setting
- Maintaining low speed limits for construction trucks and machinery
- Maintaining equipment to minimise vibration
- While the roller is stationary, vibration mode is switched off
- Monitoring vibration levels on site with monitors sending automatic real-time alerts to ensure activities do not exceed the required limits
- Adjusting construction methods to reduce impacts, if possible
- Operating vibrating rollers parallel to properties as the vibration levels are higher at the front of the roller, compared to the sides, where possible
- Using oscillating rollers which cause significantly less vibration to surrounding sensitive receivers, where possible



Compacting for the MSE panels at Railway Parade

## What is Tonkin Gap Project and Associated Works?

Jointed funded by the Federal Government (\$232 million) and State Government (\$58 million), the Tonkin Gap Project is part of a suite of improvements to transform the Tonkin Highway corridor, providing a high standard north-south transport link from Muchea down to Mundijong.

The Tonkin Gap Alliance has been appointed to undertake detailed design and construction for the Tonkin Gap Project and rail-enabling works for METRONET's Morley-Ellenbrook Line.

#### For more information on Tonkin Gap

W: <u>https://www.mainroads.wa.gov.au/tonkin-gap/</u>
E: <u>enquiries@mainroads.wa.gov.au</u>
T: 138 138 (24 hours)
FB: <u>https://www.facebook.com/groups/tonkingap/</u>

#### For more information on the Morley-Ellenbrook Line

W: <u>www.metronet.wa.gov.au</u>
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T: 08 9326 3666
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