

# The next transformative project: fast rail to Newcastle

Much of the Committee's public transport advocacy to date has focused on the expanding Metro network – adding lines across Greater Sydney to create a comprehensive network that allows people to get anywhere they want. West Metro marks the next phase on that journey.

But we have also been making the case for another type of project, one with the potential to transform in a different way: connecting Sydney and its surrounding "megaregion" with fast rail.

## **Understanding megaregions**

Over the past 20 years, planners have increasingly taken notice of the geographic scale one level up from traditional metropolitan areas.

Where metropolitan areas are defined essentially as the outer limits of a feasible daily commute – in other words, a single labour market – <u>megaregions</u> encompass a larger area, generally about a two to three hour driving or public transport distance — too far for daily commuting, but still close enough to be economically and culturally connected.

Examples of megaregions include:

- Southeast England the extended area surrounding London
- The <u>Randstad</u> encompassing the Dutch cities of Amsterdam, Rotterdam, The Hague and Utrecht
- The <u>Boston New York Washington corridor</u> the original subject of Jean Gottman's 1961 book *Megalopolis*, which was the pioneering exploration of megaregions. (For a more recent map of US megaregions, click here.)

Planners and economists had begun to take notice of important economic connections – business supplier relationships, and employment relationships that did not require daily commuting. Megaregions emerged as a subject of analysis in order to understand how economic geography was changing.

At the same time, civic leaders began to understand there was potential to boost competitiveness if they could facilitate greater interaction across this larger area. And everywhere the answer became clear: investing in public transport connections to strengthen ties within megaregions — by enabling workers to have more choice of jobs and housing location, and by enabling greater interaction between key economic assets.

## **The Sandstone Megaregion**

In 2018, the Committee for Sydney made the case for planning at the scale of Newcastle, the Central Coast, Sydney and Wollongong in our report, The Sandstone Megaregion.

Over the next 40 years, the population between Sydney and Newcastle is predicted to grow from a bit over 5 million to perhaps 10 million. This geography encompasses seven major universities, three ports, and some of the fastest-growing parts of Australia's economy.



We argued then that the single most important thing we can do to help this emerging megaregion to get the benefits of scale and accessibility is to improve rail connections. Newcastle, Sydney, and Wollongong are all strong, growing, dynamic cities, with their own economic strengths and ambitions. Better rail connections super-charges all of this by facilitating greater interaction, and greater choice of where people live and work. Rail connections provide nodes where jobs concentrate. Places with good rail infrastructure have a different economic structure and density.

For both the Illawarra and the Hunter, as regions that have traditionally relied on carbon intensive industries, upgraded rail connections can be thought of as an element of an <u>economic</u> <u>diversification strategy</u>. We here repeat our belief that denial about the impending change to global energy markets is not doing anyone a favour; proactive efforts to diversify regional economies is the only answer that respects people's long-term needs.

#### Faster, fast and high-speed rail

To understand the real potential to cut trip times between the cities of the Sandstone Megaregion, we brought High Speed Rail expert Andrew McNaughton to Sydney in 2018. Following this, the <a href="NSW Government engaged Prof. McNaughton">NSW Government engaged Prof. McNaughton</a> to examine potential fast rail routes. In 2019, Transport for NSW completed a \$10 million <a href="strategic business case">strategic business case</a> for "faster rail" between Sydney and Newcastle as part of the Federal Government's <a href="Faster Rail Plan">Faster Rail Plan</a>.

In the jargon of transport planners "High Speed Rail" refers to infrastructure that can support speeds above 250 km/hour, and often up to 350km/hour. Think the Shinkansen in Japan or the TGV in France. This level of speed requires new an extremely straight alignment. Some countries achieved official High Speed Rail through incremental improvements over time; others built new systems from scratch.

By contrast "fast rail" refers to services operating at speeds of between 200km/hour and 250km/hour. These services often have their own tracks, but they might be adjacent to existing corridors in many parts, and they can handle more curves than High Speed Rail.

"Faster rail" simply refers to upgrading existing rail infrastructure to support speeds below 200 km / hour.

Modern transport planning is less fixated on the specifics of the technology, and focuses instead on whatever speeds are necessary to achieve the desired trip time between places. Our research shows creating a link of an hour or less is the magic number — short enough that there is a significant amount of interaction and travel between places.

Rail upgrades to the north of our megaregion could deliver the following <u>major trip time</u> <u>improvements</u>:

Fast Rail would be able to link Sydney to Gosford in around half an hour, and Sydney to Newcastle in about an hour.

The travel times the Premier recently hinted at in her <u>speech</u> on this topic make it clear the Government is planning for Fast Rail, and this is welcome. While Faster Rail may make sense on some alignments, we urge the Government to be ambitious in the megaregion and focus on achieving the one-hour trip time.



## A note on Sydney to Canberra

True High Speed Rail is required if you're trying to link Sydney and Melbourne, an idea whose time may come in the future. We would note the logical first step for Sydney to Melbourne would be Sydney to Canberra.

While the Committee did not include Canberra within its definition of the Sandstone Megaregion, an argument could certainly be made that we should have, and a High Speed Rail connection that brought the journey to an hour would be hugely significant, both economically and in terms of carbon reduction.

We think it makes most sense to prioritise the Sydney to Newcastle link first, but there are strong arguments for upgrading the connection to Wollongong and, in the long run, Canberra as well.

### The timing is right

Metro Sydney strategies dating back to the 1968 <u>Sydney Region Outline Plan</u> have raised the benefit of connections to Newcastle and Wollongong. The Greater Sydney Commission's 2017 Region Plan — A Metropolis of Three Cities — included <u>objectives around regional</u> <u>connectivity</u> between Newcastle, Sydney and Wollongong, although it was not a major focus of the plan.

The forced experiment of Covid-19 has gotten knowledge workers and the firms that employ them a lot more comfortable with hybrid working arrangements, and we are going to see continued movement of people to places like Newcastle, the Central Coast, and Wollongong.

Discussing this year's NSW Intergenerational Report, Treasurer Perrottet <u>expanded the idea of a megaregion to four cities</u> – Wollongong, Newcastle, Sydney, and Canberra.

Our friends at the <u>Committee for the Hunter</u> believe Newcastle has the capacity to grow much more than official projections have shown.

It's time to take action on these insights. The Sandstone Megaregion has the potential be a global economic powerhouse linked together by fast rail, with world-class industries and major trade access points.

The NSW Government's current construction pipeline shows its much-lauded tunnel boring machine (TBM) expertise will leave Sydney in about 2026 as all the rain tunnel projects finish. While of course Sydney certainly needs to keep building out its metro network, Fast Rail to Newcastle should slot in as a project, with a tunnel to Gosford being an obvious first stage.

To move this concept forward, there are two significant opportunities this year:

1. First, we hope to see Government move forward with a final business case, phased delivery program and budget for Fast Rail between Sydney and Newcastle, with the logical first section being Sydney to the Central Coast. The goal should be half an hour to Gosford and one hour to Newcastle, with a plan for delivering the whole line incrementally.



2. Second, we hope the Greater Sydney Commission's update to the metropolitan strategy will engage deeply with the relationship between Sydney and the broader megaregion – certainly encompassing Newcastle and Wollongong, possibly extending to Canberra in the long run.