Sydney Metro Possibilities

Introduction

Sydney Metro has explicitly invited feedback on the proposed route and stations for Sydney Metro City & South West to run from Chatswood to Bankstown via the Sydney CBD.

Other aspects of the proposal also merit some comment, including future use of the stated full 30 (8-car presumably) trains per hour capability of the Sydney CBD section and the Minister's observation that it is an iconic project, with city-shaping implications.

Operational Observations

It is clear that Sydney Metro will achieve a large increase in capacity for the predominately Sydney CBD centric urban rail system through providing an additional route through the CBD and enabling other existing services to be reconfigured to operate more efficiently. The high capacity of the Sydney CBD section also indicates that other branches are to be considered. A less obvious benefit will come from Sydney Metro relieving much of the interchange burden from existing CBD stations, and thus allowing the commute-focused double deck trains to better serve these stations and so helping these lines to accommodate more frequent services.

City and South

A new station for Barangaroo has already been announced, leaving the Waterloo/Sydney University station location to be addressed. Sydney University cites the benefits of a new station near the Seymour Centre, however a location along Parramatta Road may better serve other users and would reduce the catchment overlap with Redfern. A second station would also be needed, for example at Newtown, to act as an interchange point if the University's claimed benefit to students from Western Sydney is to be more fully realised. If the Airport Line to Revesby is made the other branch of Sydney Metro, rather than the initially envisaged Illawarra Local Line, then this new connection could include a station at Waterloo.

An interchange station at Newtown leads to further possibilities. Additional platforms for the Suburban Line trains would add to the interchange benefit but probably could not be provided on the surface, so building new underground platforms for the Local Line to free up the existing surface platforms for use by the Suburban Line may then be necessary. The Local Line could then continue underground to join the existing Eastern Suburbs Line tunnel near Erskineville to form a new sector, with the Cronulla/Waterfall suburban services being redirected to the City Circle. Freight and (in future more differentiated) Intercity services would still be able to continue sharing the Illawarra Line and Illawarra Local Line with these suburban services.

North

The combination of a branch from Victoria Cross towards Warringah Shire and a station at Crows Nest would enable consideration of a St Leonards to Parramatta via Epping service to be revived. This would utilise the spare platforms at St Leonards and that part of the inherent 30 trains per hour metro capacity, from there to a branching point just past Epping, not used for the NWRL. This metro link would improve access from the west to Macquarie and beyond to other Lower North Shore business areas, and would provide more city-shaping access to Parramatta with an effective reach. A new station serving the Artarmon industrial area should still be possible under this arrangement.

City-Shaping

A history of radial finger development from the Sydney Region Outline Plan, a decline in manufacturing, and an increase in knowledge based employment in and around the increasingly off-centre Sydney CBD, has combined to shape Sydney into a somewhat inefficient structure. This shows up in metrics such as low fare box recovery for public transport and commute distances being double that of the average for all other trip purposes. A connection with housing affordability is also likely, with wealthy households being able to pay a premium for shorter commutes.

The impact of commute distances can be addressed by a combination of faster transport services, more inner-area housing to improve affordability and the creation of more knowledge based jobs closer to where people live. While Sydney Metro will be helping with the first two, and also with fare box recovery, better access to other centres can also help facilitate job creation through agglomeration. Achieving shorter commutes will also relieve the so called infrastructure funding backlog and ease the task of providing transport capacity for another one million people.

Cross-town metro services to/through centres outside the Sydney CBD that eventually lead to a fully interconnected web network may be part of the transport mix to achieve this outcome, such as the St Leonards to Parramatta via Epping service mentioned earlier. Rail webs are rapidly being implemented in many Asian cities, with a major role in managing the impact of road congestion. While the currently expanding light rail mode has an essential "assemblage" role to serve near/within city areas, it can lack the required reach for agglomeration to take effect. This reach problem can be illustrated by the historic need for early pruning of Sydney's long tram routes, and is addressed in some cities by the adoption of many heavy rail features in their light rail system configurations.

WestConnex appears to be much at odds with improving urban efficiency as it will tend to reinforce the existing city structure. Further, the interim business case seems to be founded on a continuing rise in single occupancy light vehicle use. It is widely recognised nowadays that road congestion in cities tends to be endemic, irrespective of infrastructure build, and that best practice puts the emphasis on carrying people and goods more effectively to meet their access needs. The recent Infrastructure Australia Audit takes a similar view with its focus on Direct Economic Contribution.

This writer's view is that improving the function of an M4-A3-M5 East route to serve the Port/Airport instead of the whole of WestConnex, with the balance of resources being redirected more towards public transport and shaping a polycentric Sydney, could be more productive overall. Such an outcome would need the short term political momentum that is backing WestConnex, in apparent contradiction with longer term strategic planning for a better structure, to be opened up for public scrutiny.