Rail finance meets smart contracting

New technologies can determine what property value increment should be reasonably attributed to the provision of train service, and so provide radical new opportunities in metropolitan railway finance, says Joseph Potvin, Executive Director, Xalgorithms Foundation

It is common knowledge that commercial and residential properties within an easy walk of metropolitan train stations are in relatively greater demand, which tends to be reflected in their significantly higher lease and sale values. This mobility premium has long been the basis for so-called Transit-Oriented Development (TOD) initiatives.

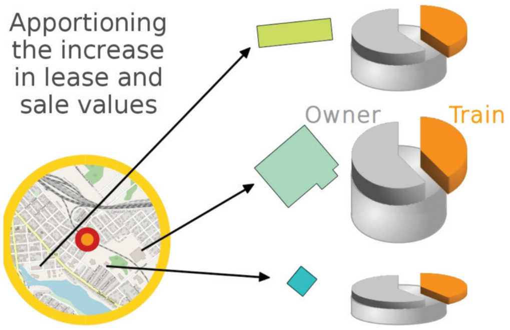
However, property value capture for metropolitan railway systems has had to rely upon the very blunt instruments available to governments, such as property taxes and special developer charges. All of these depend upon broad assumptions about what part of the property value increment should be reasonably attributed to the provision of train service.

Rail-Powered Property Property-Powered Rail

With the emerging capabilities in algorithmic contracting, ongoing data from property lease and sale transactions can be assembled into online reference tables, from which analytics software can detect statistical correlations between property value increments and the provision of regional rail connectivity. Such a system would also automatically adjust to changes to the overall strength and weakness of property markets in a given region. The result can be brought into each individual transaction through any e-commerce or e-payments platform. On this basis, the value increase attributable to train service can be split by a negotiated proportion amongst the property owners, and the providers of train and stations services.

The 'Rail-Powered Property - Property-Powered Rail' (RPP-PPR) Open Market Development Model introduces this sort of value management precision to railway finance, and it promises to be large enough in scale to liberate rail finance from dependence upon subsidies, public debt, taxes and exclusivity charters.

The not-for-profit Xalgorithms Foundation has designed the essential data specifications and free/libre/open software components required to implement RPP-PPR, although the approach has not yet been implemented. The project-level business rationale has been provided by a group of Canadian companies called MOOSE Consortium (Mobility Ottawa-Outaouais: Systems & Enterprises) which is working to employ this novel scheme to finance a 400 km passenger railway service throughout Canada's National Capital Region. Its creators are attempting to use it to resolve the institutional divergence which has prevented Canada's National Capital Region from obtaining a metropolitan-scale railway on existing tracks, even though it is sorely needed. But this new approach may be useful to railway development projects elsewhere that would benefit from improved access to the property value they generate.



The project-level business rationale for RPP-PPR is currently being pioneered to finance a 400 km passenger railway service throughout Canada's National Capital Region. And the model is relevant to many other contexts. RPP-PPR appears to enable a new approach for the DfT's Category 1 Market Led Proposals, for example, by re-framing the problem. Rather than describing a transit network management organisation with a financial interests in properties, RPP-PPR foresees a property network management organisation with a financial interest in train services.

Market-led proposals

A year ago, the UK Department of Transport (DfT) launched an initiative to invite "market-led proposals" for the country's railways. Its guidance document describes a 'Category 1 Market-Led Proposal' (Cat 1 MLP) as one that does not require government funding, nor any changes to government agreements, and that does not seek government-issued exclusivity. Such a project would only need to pass the relevant safety tests, obtain the necessary licences, and engage effectively with Network Rail and the Office of Rail and Road (ORR).

The DfT guidance document refers to 'property development models where the delivery body develops and enhances the land around a transport scheme and the profits are used to pay for that scheme' (such as the Euston 'over station' development arrangements). It also mentions 'direct contributions where benefiting businesses contribute directly to the cost of transport infrastructure' (such as where the Canary Wharf Group contributes to the Crossrail project).

The RPP-PPR appears to enable a new approach for Cat 1 MLPs, by re-framing the problem. Rather than describing a transit network management organisation with a financial interests in properties, RPP-PPR foresees a property network management organisation with a financial interest in train services. The reason is simple: the big money is in the property…

Joseph Potvin, Executive Director, Xalgorithms Foundation, will be outlining this approach at the Rail Stations & Property Summit on February 27 in London. The full article, with details of how the availability and quality of rail service drives property value, and property value drives the return on investment, can be found on Transport Xtra at https://bit.ly/2UWBqBb

500,000 more people within walking distance of a train station?

Campaign for Better Transport has called on the Government to invest £4.8 billion in expanding the railways to reach the most disadvantaged communities. In a new report, *The case for expanding the rail network*, it outlines how a national reopening programme would initially create 33 new rail lines with 72 new stations, allowing an additional 20 million rail passenger journeys a year by bringing over 500,000 people within walking distance of a train station. It would also create or safeguard up to 6,500 jobs in construction and engineering and 1,650 new railway jobs.

Campaign for Better Transport is not alone in wanting to see changes in rail. Councils also wish to see a successful rail industry that supports local growth and is properly connected with the fabric of local economies, says the Local Government Association (LGA). Many councils feel that the relationship between rail and local government should be stronger, says the LGA.

With the changing local government landscape, it notes, councils continue to be very good at organising themselves to engage with national agencies, such as Network Rail and Highways England. The Williams Rail Review, which closes in May 2019, provides an opportunity for improvements in the way local government and the rail industry work together for benefit of all, notes the LGA. Transport expert Stephen Joseph, a speaker at the **Rail Stations & Property Summit**, agrees, and is to investigate the benefits that flow from devolved authorities' involvement in railway stations for a new report on behalf of the Urban Transport Group. This report will form part of Urban Transport Group's growing evidence base on the benefits of rail devolution, including its recent reports *Rail devolution works* and *Rail cities UK*. It will also be used as part of the organisation's input into the Williams Rail Review which, amongst other issues, will evaluate the potential for further devolution of responsibilities over the rail network.