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Public Planning with Business Delivery of Excellent Urban Public Transport

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Introduction

This chapter highlights a trend for a set of 'public-private partnerships' or 'hybrid models' to increasingly be seen as best practice in public transport for a wide range of international contexts. In particular, most interest here is in the models in which a public agency takes responsibility for the excellence of an integrated system and delegates delivery of efficient services to business enterprises under service contracts, often with competitive tendering.

Rising interest in such approaches might not seem to be a case of 'reasserting' the role of the public sector. In fact, opposition in some countries has involved characterising such reforms as 'privatisation'. However, with a more global perspective, the emergence of public sector agencies taking the lead on detailed system planning can actually be seen to mark the defeat of a long-standing push for deregulation. It represents a triumph for public planning over more purely market-led arrangements. Furthermore, the starting point for such reforms outside the West has generally not been public monopoly but lightly-regulated private provision of public transport. It should thus be seen as very much an assertion of a vital role for the public sector. I term this approach, 'proactive planning with service contracting' rather than simply 'service contracting' (which is more familiar in the literature) in order to emphasise that well-focused and ambitious public sector planning is seen here as a vital aspect of the model, which should not be understood simply in terms of its approach to contracting out.

Also of interest here is the question of how widely applicable the more ambitious approaches to proactive planning with service contracting will prove to be in low-income cities. Case studies examined here provide cause for cautious optimism. A surprisingly diverse and international range of cities with a wide range of income levels have been adopting such approaches, although their starting points and

pathways for these reforms have varied enormously. Which reform trajectories are feasible is clearly also an important question for would be regulatory reformers.

In the section below I provide an overview of the regulatory trends over many decades, culminating in a push for deregulation followed by disappointment and a recent search for alternatives. Then, I highlight a number of illustrative cities which provide a picture of diverse starting points and trajectories towards an ambitious approach to public sector planning combined with private sector operation of public transport services. This is followed by a synthesis of lessons learned.

Before proceeding further it is important to define what is meant by the term, public transport. As used here, it refers to passenger transport services which are available to the general public and which are run regularly (or semi-regularly) on fixed (or semi-fixed) routes. It is equivalent in common usage to the North American term, transit. The word 'public' in public transport need not imply state ownership, nor even public sector management or planning. With this conception of public transport, taxis are excluded but 'jitney' style services by minivans are included. In some cities, shared taxis can straddle a grey area at the boundary between taxi service and fixed-route public transport.

The Push for Deregulation and its Historical Background

Great international diversity in actual regulatory arrangements and ownership structures, particularly in developing countries, can make it difficult to generalise about trends in this sector. Nevertheless, it is meaningful to discuss some major tendencies that have swept the industry. The most prominent example in this section is the push for deregulation starting in the 1970s. Along with privatisation, this was the most widely noted trend in public transport arrangements until quite recently (see for example, Gómez-Ibáñez and Meyer 1993). At its most ambitious, this agenda involved calling for deregulation of prices and services and the removal of barriers to entry in public transport markets. It was especially apparent in the high-income English speaking countries as well as through parts of the international development assistance bureaucracy, most notably the World Bank. However we will also see that this agenda was not purely the well-known neoliberal one.

Typology of regulatory and industry structure options

Before discussing the historical trends it would be useful to briefly explain the range of regulatory options as they are understood in this chapter. The following typology is adapted from those used by Bayliss (2000) and Meakin (2002) and is informed by Vasconcellos' (1999) insights on cycles of public transport regulation. Unconventionally, my key criteria in arranging the options is not the extent of competition, nor ownership arrangements, but the extent to which the state takes responsibility for service outcomes. This leads me to frame my categories differently, such as making an unusual distinction between 'passive franchises', 'proactively regulated franchises' and 'proactive planning with service contracts'. Glover (2007) suggests public sector responsibility as a definition of 'public transport'. I see this as an untenable definition but he is right in highlighting the importance of whether or not government takes responsibility for outcomes.

- *Public monopoly:* Services are owned, planned and operated by a publicly owned enterprise. An urban region may have several of these state-run operators. There may be some private involvement in the form of management contracts or contracting out of certain other very specific tasks. In theory at least, the state takes total responsibility for the outcomes here. However, state-owned operators vary widely in their organisation, management efficiency and performance.

- *Proactive planning with service contracts:* Services are planned by a state agency and procured from independent businesses (either private or state-owned) under service contracts. It is usually routes or bundles of routes that are the subject of contracts. The public sector agency takes primary responsibility for the planning of the network and for many of the service outcomes. A symbol of this is that system marketing and its public identity are created by the public sector coordinating agency, while the operators identities remain in the background. In the most ambitiously integrated systems the payment approach is often 'gross-cost', which means payment for bus kilometres run, sometimes in combination with other incentives payments, and the operators are limited in the tactical choices available to them. However, some variations use 'net cost' contracts, in which operators keep fare payments, and these usually involve the state taking somewhat less planning responsibility, less ambitious integration of the system, and require more tactical freedom to remain with the operators. Most focus in this chapter is on the more ambitious approaches above.

- *Franchises (well-regulated):* Operators are given the right to serve a route or a whole area but with some obligation to do so in a comprehensive way and to meet service standards in return for exclusivity and discretion over many tactical details of service. Competitive tendering or other direct competitive pressures may or may not be present but the obligations are enforced effectively. Responsibility for outcomes is shared, and this may be symbolised by both the public sector regulator and the private sector operators having prominent public identities. Hong Kong, Singapore (until 2009) and many Brazilian cities have such systems in practice. Franchising the right to serve logical areas may be somewhat more effective than route by route.

- *Passive franchises:* Operators are given the right to serve routes, usually with some simple service obligations and at least some exclusivity. Examples mentioned later include Kuala Lumpur and Seoul in the past. On paper, such systems can be similar to service contracts or well-regulated franchises above. However, the public sector fails to take active responsibility for planning of the route network as a whole. A related problem is that it often fails to adequately enforce obligations under the contracts. As a result, the network will often be a set of long-established routes, or merely be those proposed by operators. Incumbents often remain in place indefinitely with license renewals becoming routine and lacking any requirement for competitive tendering. Regulation tends to focus on fares and on protecting the incumbents from 'unfair' competition.

- *Deregulation:* As used here this term refers to a set of arrangements in which the state has little direct influence over service outcomes. Almost always, it is the vehicle rather than the route that is the subject of licensing. Most typologies distinguish several variations. The most extreme form involves vehicle licensing

with little or no barriers to entry or exit. Simple quantity limits may be added to this, but still with no obligation to provide service. Some basic features of quality may also be enforced. Effective deregulation may also exist if franchises for routes or areas lack exclusivity or allow for sub-contracting and do not impose any obligation for comprehensive service. Interestingly, deregulated services do not always have deregulated prices in practice.

A related but distinct dimension is the issue of how contracts to serve a route or area monopoly are awarded. This can be done in various ways, some involving more explicit competition than others. Options include competitive tendering, performance based contracts, negotiated renewable contracts, or some hybrid of these (Houghton and Hensher 2005).

Deregulatory push in Western Cities and its background

Debate over deregulated versus planned on-street public transport services extends as far back as the mid 19th century, when horse-drawn versions of what we would now call buses became common on the streets of London and Paris, initially in an unregulated (and chaotic) manner (Gómez-Lobo 2007). By the early 20th century, rail-based public transport (trams, urban rail and suburban rail) became the main motorised modes of transport in Western cities. These tended to settle into localised monopolies formalised as 'franchises'. However, from the 1920s they began to face competition from free-wheeling petrol or diesel-fuelled buses operating initially in a relatively unregulated environment (see for example the account of London's experience in Rimmer 1986). This led to increasingly successful calls to restrict on-road competition and for coordination across modes (Van de Velde 2005).

Then, as car ownership increased through the middle of the century, the financial position of public transport operators further eroded through direct competition especially for off-peak and non-radial trips, due to congestion impacts on service, and through the emergence of urban development patterns poorly suited to public transport (see for example, Hall 1977 for accounts of these trends in several major cities). Together with fare regulation, such trends led to deterioration of service and/or bankruptcy for many public transport companies, followed by municipal or state takeovers in most Western cities by the 1960s.

However, disappointment with the subsequent performance of state-run public transport was a factor behind a push for privatisation and deregulation from the 1970s. This dovetailed with the wider mood in policy-related professions. For example, many transport economists questioned earlier justifications of public monopoly. Mees (2000) provides a critical review of this intellectual push. In 1986, a dramatic reform privatised and deregulated bus services and fares in Britain with the exception of those in London and Northern Ireland. This much-studied reform created open entry in the bus industry but required operators to give advanced warning of changes in timetables or routes. Public transport professionals elsewhere watched with interest.

Paths to deregulated public transport in market economies of the South

Public transport industry arrangements in the developing world were, and continue to be, highly diverse. The focus of the review here will be countries with market

economies that are, or were until recently, developing countries (the 'South'). We can find almost every possible combination of public sector and private roles, often with more than one approach coexisting in a single city. Nevertheless, some widespread trends can be observed which have both commonalities with and differences from those of the West.

The early 20th century public transport story in the large cities of the market-oriented parts of the South was often similar to that of the West, although rail and tram investments were generally on a smaller scale. This and rapid urban growth resulted in a large role for buses in mixed traffic by the 1960s (Barter et al. 2003). Experiences diverged from those of the West from the middle of century. Formal sector or corporate public transport enterprises generally thrived only in the large cities where demand for their services was 'thick'. In smaller cities and towns, motorised travel played a smaller role and was often dominated by informal taxi-like modes and later by unregulated atomistic public transport operations (see below). Unlike the West, relatively few cities in the South had public monopolies my mid-century, although some post-independence governments did later follow that trend (Gwilliam 2000).

Others used franchises to grant some exclusivity to the operators of established routes in return for fare regulation. Although the literature promoting deregulation devoted more energy to highlighting the evils of public monopoly, in practice the route franchising approach also has a poor record of becoming moribund and inefficient (with regulatory capture often implicated). Operators under such route licenses often face crippling fare controls and their networks tend to become frozen in place with no effective mechanisms or incentives for the network to be improved (Gwilliam 2000).

Many, perhaps even most, cities in the South have at various times seen 'free-enterprise' public transport industries develop without effective regulation and with fragmented ownership. These often arose into a vacuum (as in small cities) or with the failure of incumbent franchised or route-licensed bus systems (or earlier tram systems) to expand or extend service rapidly enough (Cervero 2000). Deregulation in the South thus usually emerged by unplanned attrition, in the form of initially illegal bus or van services. In some cities, such as Delhi, a partial opening of entry occurred in response to the failings of the public monopoly operator (Mehta 2002). Another pathway to fragmented and unregulated service was often seen in Latin America, involving informal subcontracting by route licensees to atomistic small players (Vasconcellos 2001; Estache and Gómez-Lobo 2005). There were also examples of deliberate deregulation reforms, most famously in Santiago. Some of these predated Britain's, although their starting points were diverse, including regulated private franchises and public monopolies.

There was also a countertrend for some governments to seek to create or bolster large corporate public transport enterprises without necessarily nationalising. Singapore in the early 1970s was a prominent example with an enforced consolidation and the imposition of 'professional' management. This created a single operator (later two) under what amounted to an area franchise. Some Brazilian cities also consolidated their bus industries in the same period (Vasconcellos, 2001).

The policy agenda for deregulation in the South was promoted not just by neoliberal policy thinking but also by the 'discovery' and defence of the informal sector in

development studies and related fields. This school of thought displayed suspicion of central control and of the imposition of formal-sector corporate organisational models in the then conventional approach to public transport, with its allegedly modernising agenda, technological fixations and proneness to capital intensive projects (Rimmer 1986). Singapore's reforms, and similar 'modernising' policies elsewhere in Southeast Asia, were thus criticised by admirers of 'unincorporated' small operators in deregulated contexts such as Rimmer (1986). These sentiments resonated with neoliberal appeals for deregulation (see Roth and Wayne,1982, or for a critical review, Mees, 2000).

Many developing cities have faced regulatory instability. Some have come full circle more than once as they pass through one of the characteristic cycles of regulation in which each relatively easy option breaks down or is rejected in turn (Vasconcellos 2001; Gómez-Ibáñez and Meyer 1993). Deregulated systems also often prove unstable because their troubling outcomes provoke attempts at regulation.

Widespread disappointment with deregulation

By the end of the 1990s the push for deregulation had lost its momentum, both in the West and the South. Britain's deregulation experience was an important influence and has been much reviewed. The reform allowed greatly reduced public subsidy, lowered costs per bus kilometre, and led to increased bus kilometres. However, it also saw drops in passenger numbers faster than the earlier trend (and in contrast with London), increased real fares and loss of coordination (White 1995; Mackie et al. 1995). Importantly, criticism has been based not just on the expected 'pro-planning' concerns but also on disappointment with the robustness of competition itself (Mackie et al. 1995).

British-style deregulation was not taken up elsewhere in the West, except for New Zealand and certain deregulated niches such as airport shuttles in the United States (Cervero 1997; Transportation Research Board 2001). In automobile-dependent Australia and the USA one reason for this may be that public transport had withered so badly that there seemed little hope of it thriving as a business with open entry. For Europe the explanation lay more in the desire to preserve and strengthen integration, as we will see later.

Experiences in the South with deregulated (or never regulated) bus or van services have also been problematic, although it should be acknowledged that they have not always been decisively inferior to regulated alternatives, such as public monopoly systems or ossified route franchise systems. Such systems still deliver high levels of public transport service in many cities, despite their problems. Nevertheless deregulated competition in the market clearly has unfortunate (and now predictable) results. These include: oversupply with bus congestion on key routes; high fares (where there is fare deregulation); failure to serve low-demand locations and times; racing dangerously for passengers; waiting at terminals until full before departing; and many others (Estache and Gómez-Lobo 2005). It also aggravates the declining fortunes of any public monopoly or franchised services, which often labour under stricter regulation, fare control or service obligations. Moreover, vigorous competition in the market rarely seems to last long. Routes tend to become informally regulated by route associations or other business entities which, lacking state-backed enforcement

powers, often use intimidation and regulate in their own interests not the public interest (Vasconcellos 2001).

Disappointment with unregulated buses in both Britain and the South has eroded the promotion of deregulation by the policy establishment, at least for large cities (see for example, World Bank 2002). It has also prompted a theoretical reassessment (Gómez-Lobo, 2007; Estache and Gómez-Lobo, 2005). This reassessment is helping to clear up some long-running confusion. Bus systems are not natural monopolies in the sense that, if left to themselves, ownership does fragment. However, government-imposed barriers to entry are indeed useful and theoretical justifiable.

It should be noted that the end of the push for deregulation has not automatically meant the end of unregulated or ineffectually regulated public transport in the South. Reform of such systems is no simple matter. How then can cities in the South with deregulated public transport gain better control and better outcomes? State-run monopolies are unlikely to provide a lasting solution. Many route franchise systems are also in need of reform, having often become passive, without active planning and with moribund entrenched operators. Fortunately, various cities have been finding ways forward. These are discussed in the next section.

The Rise of Proactive Planning with Service Contracting

This section highlights a surprising range of cities that have been making transitions to strongly and ambitiously planned public transport with services procured under service contracts of some kind. Some may find it surprising that this trend extends to various countries of the global South, where both deregulated, fragmented systems and moribund route-license ('passive franchise') systems have been reformed. In the West it is public monopolies that have been transformed.

The regulatory approaches now most commonly recommended to low-income developing cities (large ones at least) are hybrid models. Some are in the 'proactive planning with service contracting' category while many fall into the 'franchises' category, often with a new determination to use effective contracting mechanisms avoid the problems of what this chapter calls the 'passive' approach to franchises. Best practice thus now usually calls on the state to take at least some significant responsibility for the system as a whole and calls for private provision via some kind of contracting out mechanism, usually with competition for the market or at least its threat (Meakin 2002; Gwilliam 2005; Bayliss 2000).

Can the 'proactive planning with service contracting' approach be used in low-income cities? There are concerns that it may require more institutional capacity than is realistic for most developing countries. In fact, there are such concerns even over the less ambitiously-planned systems and the less intensively-managed contracts of the franchise approach. In discussing options for cities in the South, Estache and Gómez-Lobo (2005) broadly endorse a range of hybrid options including service contracts, but they comment that, in the absence of strong institutions these options may not be possible, in which case deregulation may be superior to a public enterprise approach. Örn (2005) endorses more strongly a planned and coordinated service-contracting approach for developing cities but does not see any feasible pathway towards it from a starting point of unregulated public transport. On the basis of Jamaica's failure to

achieve a direct jump from deregulation to a what he calls a 'coordinated system with managed competition' he suggests that public monopoly probably needs to be an intermediate stage.

A brief review below of a series of cases will provide grounds for optimism that ambitious versions of proactive planning with service contracts may be more widely applicable than has been assumed. Surprisingly diverse cities have been converging on such options via a number of different pathways.

European cases

Public monopoly was the 1980s starting point for most European cities. Those that have so far responded ambitiously to the push for competition and private participation have adopted not Britain's deregulation option, but procurement approaches that retain strong public control. A key factor in this choice appears to have been a heightened commitment to public transport network integration that gathered momentum in the 1980s and 90s.

Systems that had come under public ownership during the middle of the 20th century nevertheless often remained quite fragmented under an array of public agencies or governments at several levels. Following the pioneering example of Hamburg, various cities across central and northern Europe formed regional public transport alliances in which a small but strong coordination agency takes responsibility for public transport planning in consultation with operators and political leadership (Glover 2007). Services operated by various state or municipality-owned enterprises, and sometimes some private companies, were now procured under contracts by the alliance agency. This allowed integration of ticketing, marketing, information, schedules, physical facilities and network layouts across whole urban regions (Mees 2000).

These new regional arrangements proved compatible with a service contracting model for privatisation and competition. London was a pioneer in Europe. Its buses had been exempted from the 1986 deregulation but had still been required to introduce private participation and competition. London did so through competitive tendering while retaining central control under a state-owned agency. The results are widely regarded as successful, with both efficiency gains and increases in patronage. It experimented with different approaches to tendering and service contracts and eventually settled on gross cost contracts (Hensher 2003). By the 1990s, Scandinavian cities were at the vanguard of regulatory reform in European public transport. An empowered public sector agency dedicated to the excellence and integration of the system as a whole procured service delivery from businesses using service contracts with competitive tendering (van de Velde 2003; Hidson and Müller 2003).

Curitiba

These shifts in Europe were predated by events in Brazil where Curitiba was a pioneer in the 1960s and 70s of a step-by-step shift towards proactive planning and coordination with service-contract procurement. The city has been widely praised for its pioneering use of bus rapid transit (BRT) and for integrating land use patterns with its busway-based development spines (Cervero 1998). Less well-known is its

sustained success in bringing its privately operated bus system under efficient public regulatory and planning control (see for example, Hook 2005; Vasconcellos 2001).

In stark contrast to the European examples, Curitiba's starting point was a fragmented and little regulated bus system. In the 1950s the city's bus industry had been regulated via route licenses without strong exclusivity or oversight. The result was essentially a deregulated situation because of informal sub-contracting to even smaller operators and fragmentation of ownership. In 1962, enforced consolidation of the industry reduced the number of companies from more than 300 to 10 and established a more robust franchise ('concession') contracting approach with stronger enforcement (Hook 2005). A shift from route licenses to area contracts was a further improvement (Poole et al. 1994).

Further steps went with the 1974 introduction of the first BRT lines. A closed BRT approach was adopted with only dedicated high-capacity buses running on the busways themselves. These were to be run by the incumbent operators. As Hook (2006) explains, with contracts due for renewal, the threat of competitive tendering was vital in order to prod operators into investing in higher capacity buses suited to the trunk routes. A dedicated public transport planning agency was created and took on powers for detailed tactical planning of an 'Integrated Transport Network' as a whole. This agency is somewhat insulated from short-term political influence (Cervero 1998). This was a big step towards the proactive planning with service contracting approach and was followed by a series of innovations over the next two decades that created a highly integrated system, with free transfers, efficient feeders, and payment for service kilometres (gross-cost contracts) with centralised fare collection by 1987 (Hook 2005). By then the system had many of the key features of the service contract approach, although so far without regular competitive tendering (Hidalgo et al. 2007).

Bogotá

Bogotá, capital of Colombia, has recently become famous for its dramatic urban transport and public space transformations in the late 1990s. Like many other Latin American cities, Bogotá's pre-reform bus system was effectively a deregulated one, since its route license arrangements allowed informal sub-contracting to a multitude of tiny firms competing on the road, with the usual problematic results (Estache and Gomez-Lobo 2005).

The centrepiece of the changes was the Transmilenio BRT system, which is widely regarded as the pinnacle to date of BRT planning. It deserves as much attention for its innovations in regulatory design and its industry restructuring in a challenging context (Hook 2005). Bogotá's public transport transformations have not involved a city-wide reform. Rather, each corridor was addressed in turn as the Transmilenio BRT system expanded. A lean public agency plans and manages the system and makes the service-related tactical decisions. Contracts with operators on the trunks are gross-cost. A sophisticated monitoring system, including the use of GPS, ensures buses run as required. Each trunk route also has integrated feeder buses. An innovative feature of contracts is that each trunk route was allocated to two concessionaires, which share the service kilometres on that route. This allows 'fines' for poor performance to be in the form of reducing the services allocated to the offending concessionaire (and

shifting them to its rival). This provides for ongoing competitive pressures in real time (Hook 2005). The planning agency also reserves the right to reduce service if overall patronage drops.

Just as crucial, was the approach to the transitions in each corridor. Incumbent players were assured of a share in the new system but under conditions. Large numbers of old buses were required to be scrapped. The new consortia were encouraged to form joint ventures with international companies. This process of engaging with the actors in the traditional bus industry has been a challenge at every expansion of the system. Large parts of the city remain outside the reformed Transmilenio arrangements and the power of incumbents continues to threaten the reforms (Gilbert, 2008).

Political deliberation issues were also made explicit in the design of Transmilenio. One key to success was that, as in Curitiba, the public transport changes were part of a larger package that included high-profile improvements to the city's public spaces. Contractual and market designs involve several protections against short sighted political interference (Hook 2005). In fact, a new administration in 2007 is seen as hostile to the busways and their expansion (Gilbert 2008).

Seoul

In 2004, Seoul implemented dramatic changes to gain better control of its bus system with a proactive planning and service contracting approach and, at the same time, to shift to a highly hierarchical, integrated route network design (Pucher et al. 2005). The approach appears to have been consciously inspired by both European and Latin American precedents (Kim Gyeng-chul, pers comm. 19 June 2007).

Government efforts on public transport during the 1970s to 1990s focused on rail and neglected buses, which were organised under passive route-franchise based regulation. Nevertheless, the bus system thrived until the mid-1980s in a context of very low car ownership (Kwon 1981). However, from the late 1980s the bus system suffered increasingly from traffic congestion and competition from cars, rail and taxis. By 1994 it was reported that most of the 97 companies within Seoul were marginal or running at a loss (Liu, 1994). The regulatory system was not capable of renovating the network of routes.

By the early 2000s a sense of crisis triggered a search for new lower-cost approaches to improving public transport (Pucher et al. 2005). After long preparation by a team at the Seoul Development Institute, Seoul embarked in 2004 on a rapid jump to its 'semi-public' approach with ambitious network integration. This involved metropolitan government control over a highly hierarchical network with service procured from the private operators under gross cost contracts (Pucher et al. 2005; Kim 2007).

Benefits claimed so far include impressive increases in bus speeds, reductions in accidents, and an upward trend in bus passenger numbers without a drop in subway use. Operating subsidies initially rose but comparisons are difficult because service levels were also dramatically increased and bus deficits should be set against avoided expenditure on metro/subway extensions (Pucher et al. 2005). The early public response was disastrous but soon turned positive. And, like Bogotá, Seoul's reforms

went hand in hand with dramatic improvements to much-loved public places (Kim 2007).

Kuala Lumpur

A large proportion of the public transport system, both rail and bus, in the Kuala Lumour region has recently come under state ownership, reversing a longstanding emphasis on privatisation in Malaysia. This may have set the scene for a shift towards a more proactively planned overall system combined with service contracting.

In the early 1970s, Kuala Lumpur had nine ‘stage bus’ companies, which operated under passive route franchise agreements hampered by tight fare controls (Rimmer 1986). In 1975 a partial deregulation, under a World Bank project, introduced individually-owned minibuses with a jitney-style of operation. Stage buses remained but without exclusivity on many routes. Problems from on-road competition quickly emerged. The minibuses were demonised for unruly on-road behaviour and then phased out in the mid-1990s (Barter 2004). Meanwhile, the moribund route-based vehicle licensing framework for stage buses remained in place, resistant to reform (Sabariah 2001). An attempt at consolidating several companies did little to improve matters. Meanwhile, transport in the metropolitan area became increasingly dominated by cars, motorcycles and expressways (Barter 2004)

Despite this, significant urban rail investment took place in the 1990s, creating five different systems (Barter 2004). However, the privatised model proved financially untenable. By 2004, two light rail systems had been brought under government ownership and privatisation of the suburban rail system had been cancelled. A large proportion of the bus industry was also brought under state ownership.

This created an opportunity. A steering committee based in the Ministry of Finance (which now owned much of the system) decided to ‘increase in the level of integration of different modes of public transport’ and ‘to significantly improve regulation and enforcement of public transport services’ (Ravindran 2007). In late 2004 a new public transport company, RapidKL, was created.

Although RapidKL is a state-owned operator it has apparently been framed with an eye to further reform. The government’s financial instrument, Syarikat Prasarana Nasional Berhad), not RapidKL, owns the public transport assets. Integration is central to the RapidKL’s performance indicators under an operating agreement with government (Westra 2007). RapidKL has also been granted an Operator License which gives it the flexibility to deploy its buses efficiently throughout its network (Ravindran 2007).

Some obvious short steps from the current arrangement could create a hybrid procurement model. Instead of being seen as an operator as it is now, RapidKL could become the lean state-owned agency that takes responsibility for proactive planning of an excellent, coordinated system while contracting out its services to private operators. It would need to be empowered to control all public transport services in the region, not just those it already runs. If these steps were taken then Kuala Lumpur’s trajectory would provide an interesting twist on Örn’s suggestion that public monopoly is a necessary intermediate step.

However, major challenges remain. Three rail systems and several bus operators remaining outside the integrated system. These bus operators compete directly in the market with RapidKL. Furthermore, little attention has been paid so far to situating the reforms within a package of other urban improvements. Kuala Lumpur's wider car-focused transport policy settings and urban context make this a hostile environment for public transport (Barter 2004).

Santiago de Chile

Santiago has in 2007 made the leap to a proactively planned system with service contracting for its enormous bus system under a single dedicated public-sector agency, Transantiago. This has also introduced an integrated, highly hierarchical network. Somewhat like Seoul, it did do so with a major shake-up implemented over the whole system at once. Unfortunately, the early 'teething problems' of Transantiago were extreme, to the point of severely harming the political standing of the government.

Santiago's public transport has been a testing ground for many of the regulatory fashions of the last 30 years. Estache and Goméz-Lobo (2005) use the city to illustrate key trends in bus regulation, as does Gwilliam (2005). In 1979, under the right-wing Pinochet government, deregulation occurred, then fare deregulation in 1983. This replaced the previous system in which a state-run operator coexisted with private operators running on route license monopolies. Unwise fare control and the moribund route-based franchising system had resulted in serious under-provision of services.

The results of deregulation included extreme bus industry fragmentation, fare increases of approximately 100%, oversupply with underutilised buses, safety problems and bus congestion with severe air pollution on the main corridors where services converged. Between 1979 and 1990 the number of buses (increasingly they were minibuses) rose from just over 5000 to almost 14,000. However, services did improve in some important ways with expansion to new areas, many new routes and much reduced waiting times (Estache and Goméz-Lobo 2005).

In 1991, there was a shift to route contracts with a competitive tendering process that also served to set fares. This applied to routes passing through the city centre, which were 77% of routes (Gwilliam 2005). These changes helped but problems re-emerged because of weak control that permitted creeping deregulation via sub-contracting to very small operators, and because of the incentives that operators and drivers faced under the net-cost fare arrangements (Gwilliam 2005).

In 2003 Chile's government embarked on an ambitious plan to revamp Santiago's bus network and fare system into an integrated and centrally-controlled system, along with the metro rail system, under an authority called Transantiago. The final phase of the reform took place in early 2007. Bus service is now procured under competitively tendered net-cost service contracts (Graftieaux 2006).

Initial results were disastrous (although they have reportedly been improving in 2008). Even before the early 2007 implementation, commentators warned of important risks in the design (for example, Gwilliam 2005 and Graftieaux 2006).

Some sources of difficulty relate to failings of the public sector implementation of the reform and these might bring comfort to sceptics of state planning (Hidalgo et al. 2007). However, other problems arise from an unwillingness to grasp the full extent of planning responsibility that needs to be taken on by the planning agency in order to pull off a highly integrated system. In seeking to exploit market processes, aspects of the regulatory design retained more discretion and risk in the hands of the operators than in most other planned service contracting approaches discussed in this section (Graftieaux 2006). Any further reforms to improve Transantiago seem more likely to increase the capacity to plan and control the system rather than revert towards more market-oriented options.

Others to watch

Several other cities are relevant to the arguments here and are worth mentioning briefly. For example, several Australian cities, most prominently Perth and Adelaide, have been successfully using service contracts (Hensher 2003). At the same time, they have also increased somewhat the emphasis on integration in their system planning. This has reportedly facilitated lower costs and rising patronage. These experiences should be of interest for other highly-car dependent cities, such as those in the United States. Arguably a model compatible with excellent integration is even more crucial for low-density areas than elsewhere (Mees 2000).

Singapore's earlier story has already been mentioned. It has announced as part of its Land Transport Master Plan 2008 that it will make a shift from its well-regulated area franchise approach for its bus system towards the service contract approach with greater public sector responsibility for planning of the route network. Tranches of routes will become contestable. These changes arose from a desire for service planning that is more customer-focused and well-integrated than is currently possible with only service standards as the main tool under the franchise approach. Singapore's decision may be of interest in Hong Kong and other places with well-regulated franchises but which wish to be more ambitious in striving for system integration and excellence.

Indore in northern India has since 2006 been gaining media attention for the 'Indore City Transport Service'. This was introduced into a city that had no formal-sector bus system, but has a wide array of taxi-type services and unregulated minivan services. According to its website, the new system seems to use a service contract approach and to have proactive planning by a public sector agency that has been empowered to focus on system excellence. The heart of the system is a 'special purpose vehicle' owned by both state and municipal governments. It plans the system but tenders out 70 percent of its services to operators. These retain their on-board ticket revenue but the City Transport Service handles sales of season-passes which have been emphasised heavily. These passes are customer friendly and provide revenue that can be disbursed to operators in ways that reward good service. Other cities in India are reported to be taking an interest in Indore's model.

A variety of pathways

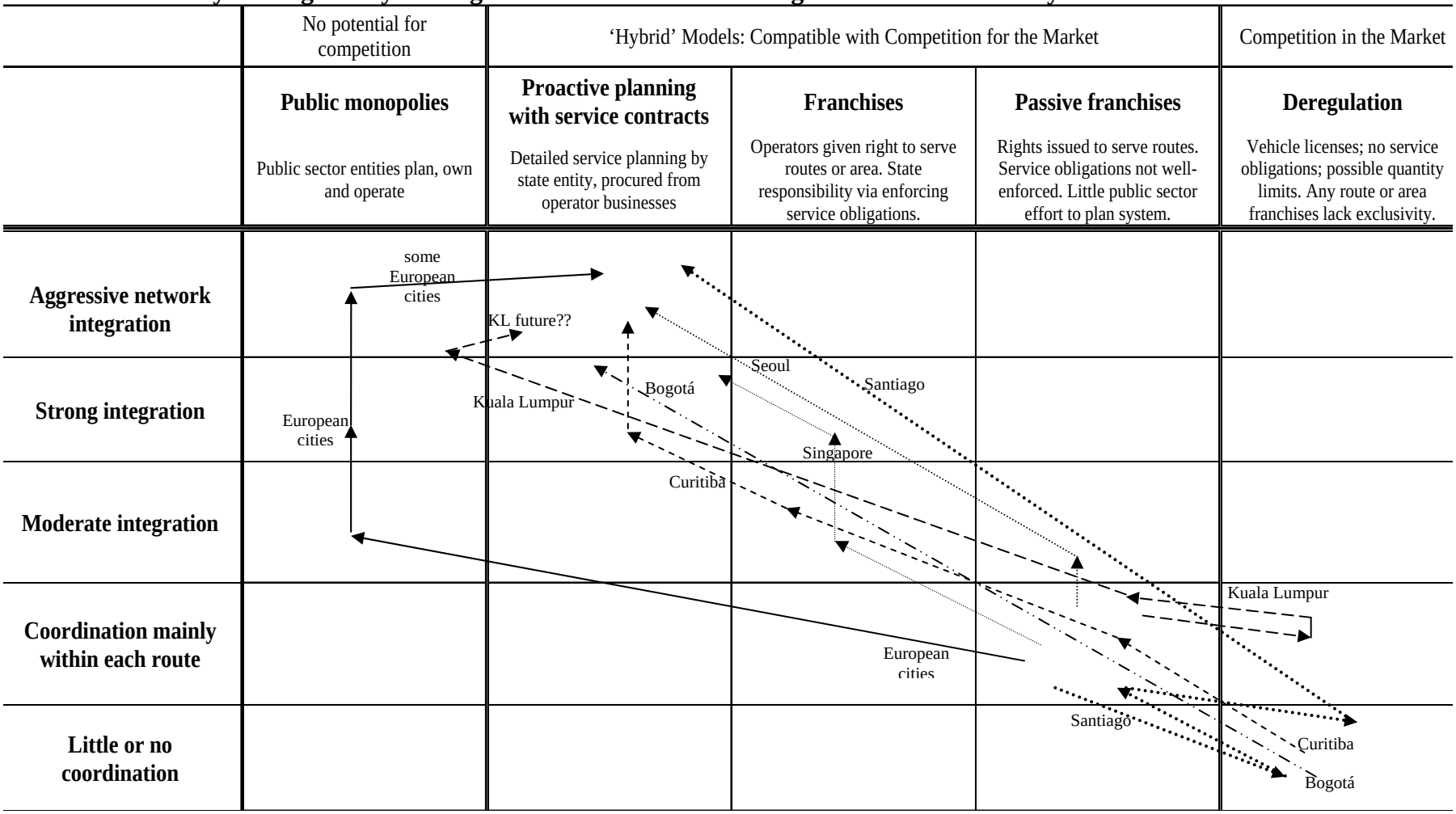
We have seen that cities in a variety of contexts have been adopting similar 'proactive planning with service contracting' approaches to the regulation and structuring of

their public transport services. They have been doing so from various starting points and via a number of different sets of reform trajectories.

Figure 1 displays regulatory reform pathways for cities mentioned in this chapter. It portrays these trajectories on a matrix of the regulatory options from earlier in this chapter versus the extent to which excellent integration is achieved. As mentioned earlier, these regulatory options are arranged according to the degree to which the public sector takes responsibility for outcomes.

The European paths contrast with those in most other cities, with the most common shift being from public monopoly to service contracting. Kuala Lumpur is creating a public monopoly but in a framework that suggests that this may be an intermediate step towards a service contracts model. However, none of the others have used public monopoly. Most had starting points as deregulated/unregulated systems or had passive franchise systems with little government planning. They have shifted to proactively planned service contracting via other intermediate steps or directly. Curitiba had several steps. Bogotá made a dramatic leap from a rather unregulated state to an ambitious hybrid model, but has been doing so corridor by corridor. Seoul and Santiago both made heroic metropolitan-wide reforms very rapidly. Singapore had a long period (more than 30 years) under the ‘intermediate step’ of a well-regulated franchise system but has recently announced a shift towards more proactive public-sector planning and coordination and a more service-contracting approach to procurement of the services.

FIGURE 1 Pathways of Regulatory Arrangements versus Network Integration in Urban Bus Systems



Synthesis and Conclusions

This story presented here seems to be one of an industry successfully discovering the appropriate role for the public sector. It would be misleading to imply that there are no more problems nor dilemmas. Nevertheless, I have drawn attention to the fact that many recent success stories in urban public transport have been associated with strong public sector planning and control, either ongoing or reasserted. For many, this has gone hand in hand with both competition (for the market) and a role for political deliberation and accountability mechanisms. This ambitious public sector planning has involved the creation of dedicated agencies that have been empowered to coordinate the system at a metropolitan scale. The most successful cases have devoted their ability to do proactive planning to seeking excellence via ambitious levels of network integration.

In the West, a shift towards this model is often seen as 'privatisation'. However the international and historical perspective provided in this chapter reveals that proactive planning with service contracts should be better understood as a retreat from deregulation. More generally it is a response to the poor results seen whenever the public sector fails to take responsibility for overall system outcomes, such as under passive approaches to franchising. Recent European Union directives will give the model of proactive planning with service contracts a further boost in Europe. It will be interesting to see if it can also succeed in North America where such reforms have so far been very limited.

Questions of pathways were also addressed. Although some had suggested that public monopoly may be a necessary intermediate step for developing cities, we have in fact seen a surprising range of cities taking more direct paths towards this effective combination of public and private roles.

The question remains of how widely proactive planning with service contracting can be applied, especially in the South. This review suggests that it may be possible in more developing country contexts than has previously been assumed. It will be important to watch those cities in the South that have adopted this model. Most of the cases discussed here were in middle-income or high-income contexts with reasonable prospects for mustering sufficient institutional capacity. However, we have also seen that this approach is now spreading to India where the case of Indore seems promising. However, it is not yet well documented. Indore's bus system, and other Indian cities that may emulate it, will need to be studied to see if this model will prove to be an enduring and successful one for such low-income contexts. This would have important implications for public transport across the South.

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