DEALING WITH MARKET POWER IN EMERGING TELECOMMUNICATIONS MARKETS

IS RADICAL SURGERY WORTH THE RISK?

NOTES FOR A PRESENTATION BY

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TO THE

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ACCESS ECONOMICS

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1. INTRODUCTION

ACCC report to Alston

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- Recommendations: Telstra be required (by legislation) to
  - divest its HFC network in full, and
  - divest its 50 per cent shareholding in Foxtel
  - unless it can be shown that the costs outweigh the benefits
- Comment on extent to which these are emerging markets
- Note but set aside alternatives (e.g. sale of 50 per cent of HFC)
- Background: discontent with adequacy of access regulation

This would be radical surgery

- Without precedent in Australia
  - Except at time of privatisation, with disaggregation in ESI
- But not elsewhere, e.g. USA in 1982 anti-trust decision breaking up AT&T
- Would involve massive interference with private property rights; and consequently extremely difficult not only politically but in implementation
- TPC does not provide for such actions; question whether they should be matters for government, requiring legislation, or for the courts

Already a dead letter: rejected by the Government

- Though not perhaps after careful consideration
- But certainly reflecting the major difficulties

In any case, such radical surgery needs careful justification and merits close analysis

- Something to be learned from the debate; a pity not to have it

Report is quite closely argued in its body

- Not surprisingly, much of the detail is lost where the arguments are summarised
- The reader of the headlines may be left wondering if there is more to the case than assertion and concerns about competition that, while they might arouse some sympathy, would hardly justify the wide-reaching nature of the recommendations

My objective is to examine the proposals and try to bring out some tensions that are not confronted head on in the report

- Drawing on two papers by Faulhaber
- Note they are described in the references section as 'forthcoming' but have been available for some time on Faulhaber's website.

One of my main points is that one's views on the magnitude of the problem being confronted, and of the merits of radical solutions, depend on perspective

- Attention to the legacy aspects of the market in Australia – what gave rise to the present structure – is important
- In fact, without that background, it would be hard to come to a view that the ACCC's proposals are justified
- With that background, they may be

2. WHAT IS THE PROBLEM HERE?

Answer: Telstra's market power

In summary, the ACCC's concerns are

- Limited or very limited competition in almost all telecommunications and some related markets
  - Telstra's control of inputs essential to providing downstream services
  - Strong first mover advantage in the supply of new services
  - Degree of control over rate of innovation
- Incentives
  - Not to provide fair, timely and non-discriminatory access to its upstream inputs because it also competes in downstream markets that rely on those inputs
  - That is, Telstra is an access provider that competes against access seekers
  - Note also that the integration of services within Telstra, with tight technical and commercial interfaces, tends to provide opportunities for discrimination. This is largely what access regulation seeks, somewhat forlornly, to overcome
  - Faulhaber identifies this incentive issue as the most important hindrance to the development of competition in local call markets at present and in LD markets in the past

Concerns are also expressed about the pay TV market, including possible foreclosure of entry

However, the proposal to divest the ownership of FOXTEL would, as I see it, probably not have been made purely to address pay TV concerns if it were not for their relevance to telecommunications concerns

- Consequently, most of my comments relate to telecommunications, although I recognise that an integrated treatment is desirable

Review market structure

- Telstra has the only ubiquitous network and provides a greater range of services over a wider area than any other provider
- It was put together by the merger of the two government-owned monopolies in national and international telecommunications
- In 1992 a single privately-owned competitor carrier, Optus, began operations
- In 1994 Optus started rolling out a cable network – in Sydney and Melbourne – for the provision of pay TV and telephony. It experienced major technical difficulties in getting the telephony to work at reasonable scale
- Telstra duplicated Optus's cable network purely to provide pay TV and prevent Optus becoming competitive in telephony. It was a spoiling tactic. Telstra was still 100 per

cent government-owned. Telstra and News Ltd jointly set up FOXTEL in 1994 to provide a retail cable TV service. Up to this time the federal government had not allowed pay TV in Australia

- Telstra, Optus and Vodafone developed separate mobile (cellular) networks
- In 1997, competition was opened up under an access regulation regime. Telstra was partially privatised, with the government retaining majority ownership
- Many new entrants came onto the scene (including some, eventually, in mobile) and despite capital markets losing their over-willingness to invest, some had developed reasonably successfully in niches and some more broadly, but none, including Optus, remotely threatened Telstra's dominance.

In a little more detail, ACCC concerns are

- Local call market
  - Telstra has 94 per cent of access lines (although this appears to relate mainly to residential and MSE customers)
  - Except in CBDs, the only access networks apart from Telstra's copper and Optus's cable, which are in parts of some but not all of the metropolitan areas, are somewhat idiosyncratic overbuilds in some regional centres. Telstra does not provide telephony over its cable network
  - No access to either cable network by competitors
  - Minor take-up of ULLS
  - The ACCC says that Telstra's customers have no real alternative but to seek access to, or interconnect with, Telstra's local access network, although this does not seem to me to get to the point. At their present sizes they are highly dependent on such access, but interconnection would be needed even if there were ten carriers of equal size. The real issue is barriers to entry
- Long distance
  - Telstra and Optus hold the largest shares
  - ACCC believes margins are still high
  - Lack of competing infrastructure except on a few major routes
- Data and Internet
  - The concerns here appear to be about slow roll-out of broadband internet capability, both ADSL and cable.
  - The actual competition concern is not made explicit, although it is noted that Telstra's ISP, BigPond, has 40per cent market share
  - And incidentally, Telstra does not allow BigPond to be accessed except by Telstra subscribers

It appears that the ACCC's concern comes down mainly to customer access and content

- That is, the first concern is about the paucity of competition in access infrastructure

- The sceptic might argue, however, that the expression of concern is driven by the available remedy – changing the ownership of the cable network so that it can become a competing access network; that, is that the logic flows in reverse
- In addition, the ACCC is concerned about leveraging between markets
  - Partly this is just another way of expressing the customer access concern
  - But it also relates to the FOXTEL relationship
  - Telstra is in a position to impede access to content inputs by its broadband network competitors, actual and potential
  - It also has an incentive to deny access to its pay TV delivery platform to other pay TV businesses

The ACCC notes the inadequacy of access regulation to deal with the problem

- Access regulation does not change the incentive for, or ability to practise, discrimination by an access provider between its own downstream activities and those of its access seeker competitors
- It involves a need for ongoing (indefinite) regulatory intervention, with attendant costs
- This includes time-consuming dispute resolution
- There is a hint also of access regimes creating a culture of dependence by access seekers

The ACCC argues that all these factors make access regulation no substitute for structural separation and infrastructure competition

There is a need to talk also about what's not mentioned in the Report to Alston

- Not much about sustainability of the current situation, although it is implicit that Telstra's dominance won't change any time soon
- Related to that, not much is said about barriers to entry
  - Some comments regarding pay TV but nothing directly about access networks
- And while Telstra's immediate responses are canvassed (the likelihood that it would get into pay TV delivery in another way through DSL over its copper; the likelihood that it would rebuild a pay TV cum media business, including developing new sources of content) there is nothing on the longer-term impacts on Telstra's and other players' incentives through a new level of regulatory (sovereign) risk, etc

Those things are vital in any competition policy/regulatory analysis

Seems to me that more needs to be said to justify divestiture beyond a concern that the level of competition is not as strong as might be wished

3. A LITTLE MORE MARKET ANALYSIS

Barriers to entry – access

- Is there a natural monopoly in access?
- No. Perhaps never was
- Why else was entry prohibited?
- Regional duplication appears to be economic, e.g. in Canberra
- Wireless, less clear

Barriers to entry – pay TV

- Content sharing agreement between FOXTEL and Optus would appear to make entry more difficult
- Note that the ACCC also proposes requirements for content sharing and non-exclusivity of premium content

Relevance of network effects

- Without going into network effects in any detail, the concern comes from the fact that, where they are strong, switching to the largest provider adds substantial value for customers
- If the costs of switching are low, then you might end up with a monopoly. This is called “tipping”
  - For example, in software, switching to a Microsoft operating system adds substantial value for both software developers and users, as the former have a larger market and the latter have access to more applications
- It is not network effects that give Telstra its dominance. We have any-to-any connectivity in telephony so that customers of even small competitors can reach and be reached by Telstra’s customers
  - Therefore in the market for access, Telstra’s size does not in itself give customers of its competitors an incentive to migrate to Telstra
  - It could be a different story if Telstra were able to refuse to interconnect with competitors, as it effectively has been able to do with some ISPs and with BigPond
- In pay TV there was a concern that a form of “tipping” would take place
- The dominant FOXTEL merged with Australis would have had such a high share of customers that content providers would be uninterested in supplying to other pay TV deliverers
- Consequently customers would switch towards FOXTEL’s better content and there would be a downward spiral for its competitors, with entry impossible

How sustained is Telstra's position?

- ACCC appears to believe very
- And indeed it is hard to see much change occurring in the market structure
  - Notwithstanding absence of natural monopoly and presence of actual overbuilds, albeit limited

Why such pessimism about the development of vigorous competition?

- Strategic as opposed to structural barriers to entry
  - Some suggestions Telstra makes entry difficult (TransACT – pay TV) but not very serious conduct
- Perhaps part of the problem is with the collapse of willingness by capital market to invest
- And perhaps regulation has been partly at fault
- One risk of heavy-handed regulation is that it may delay introduction of new technologies by competitors and hence delay bypass
- Of course, all regulators end up being heavy handed because light-handed regulation doesn't work, at least given community objectives and lack of patience, cf New Zealand

Whatever, it is impossible to deny Telstra's enormous dominance – more than most other countries – and hard to avoid conclusion that Telstra will retain it for the foreseeable future

4. WHAT WOULD BE THE EFFECTS OF THE PROPOSALS?

An infrastructure competitor would be added in the supply of broadband, pay TV and voice services

- This would create increased rivalry and pressure for innovation

Some important changes would be made to incentives

- Telstra would be more willing to allow other pay TV businesses or channels access to its network
- Telstra would be likely to want to upgrade its PSTN and introduce new services sooner than it has in the past
- FOXTEL would want to supply through as many delivery networks as it could, and not be prevented from doing so

New market structure

- Telstra and FOXTEL would become potential competitors "across the range of services that convergence may bring"

These objectives are valid and proposals would probably help in meeting them. Those are the benefits

The costs comprise

- Loss of economies
- Transactions costs
- A new level of regulatory risk

We will come back to the last of these three. In relation to the first two, it is informative to consider history

- It can tell us something about why market structure evolved as it did
- Was it to achieve economies or minimise transaction costs?

The answer in the case of Telstra's HFC roll-out seems clear. The decision to build the cable network was not made so as to reap new economies

- Of course, once it was decided to build an HFC network, issues such as sharing of trenches and optic fibre would naturally be worked on
- But the basic decision was made for strategic reasons: to frustrate Optus
- The ACCC believes that lost economies would be small. The HFC network was not designed and integrated into Telstra's existing networks. It was a stand-alone network. It has not been used for voice services.

Similarly with the Telstra's investment in pay TV

- It is hard to see what economies of scope arise
- Indeed, it would appear that if anything there are diseconomies for Telstra in its relationship with FOXTEL, not surprising given the tensions between Telstra's natural desire to make maximum use of the cable – opposed by FOXTEL – and FOXTEL'S natural desire to reach subscribers by any means it can – opposed by Telstra

As for transactions costs

- I am somewhat reluctant to assume there are few transactions involving the HFC network that are rich in information, and some interoperability that would be costly to undo.
  - This suggests divestiture would cause some loss of value
  - However, it does appear that the problems involved in inserting market boundaries to separate long distance and the ULL were much greater
- Moreover, Telstra and FOXTEL have presumably been working hard to maximise the joint value of the HFC and pay TV businesses
  - So even the divestiture of Telstra's half share of FOXTEL might also destroy some value

To summarise, the proposed divestitures could be justified in narrow cost/benefit terms if

- The costs are not too high; as the ACCC states, this requires more analysis
- The benefits are real – i.e. Telstra's dominance really is a more or less permanent problem, as implicitly assumed - and outweigh the costs
- There is no better way

However, if anything, that conclusion seems a little too easy and opportunistic

Is there an inherent problem in Telstra having a copper network and a cable network?

- No
- The real problem is with the overall access network, comprising both copper and cable, at least for broadband (the cable not being used for telephony)
- The existence of two fairly separate networks provides an opportunity for engineering more competition

Is there a problem with Telstra owning part of a pay TV content provider?

- Probably
- Certainly if the HFC divestiture is to work then the FOXTEL divestiture is also needed to fix the incentive problem
- Otherwise the new owner of the cable network would be doomed to failure if Telstra decided to remain in the pay TV delivery business

If the cost-benefit analysis shows a net benefit – and it seems at least possible that it would – the question whether there is any better regulatory solution raises the issue of vertical separation – discussed below

5. WHAT OTHER REGULATORY COURSE COULD BE TAKEN?

Applied to a vertically-integrated incumbent, access regulation faces a difficult battle; perhaps a losing battle

- Problem is one of incentives
  - Wholesale revenue gained does not offset retail revenue lost
- Contrast with an airport or a port
  - Incentive is to maximise use
- Not only Telstra faces these incentives as a wholesaler
  - Anecdotal evidence re Optus, Vodafone

Access regulation does not overcome the incentive problem

Should we (as a society) just rely on technological advance to break down Telstra's dominance?

- Is it possible that the best we can expect is for some different player to arise in Telstra's place once the nature of telecommunications has changed, but itself be dominant?
- That is, should we expect serial dominance or monopoly, with competition <u>for</u> the market rather than <u>in</u> the market?

Will a new technology or killer app emerge?

- Seems plausible in areas of software and hardware
- Hard to see in telecommunications
  - This may be a failure of imagination
  - But is there any evidence that it can happen?
- Trusting to technological change to deal with market power seems to be mainly a matter of faith
  - It might just as easily add to the incumbent's market power
- In fact the speed of change in telecommunications does not seem to have been all that great
  - Development of competition in the US has been equally as slow as here

Thus the community does not appear willing to trust to a hands-off attitude to regulation

- Attitude could be different if Telstra had built its position in a competitive environment
  - If that were the case, what had been gained could be lost
  - But it wasn't gained by innovation or efficiency or commercial nous; no exciting new product or service that captured consumers

  - Rather the opposite: slow and reactive (ADSL was trialled by Telstra in 1994 and introduced in 2000)

There are differences in apparent levels of patience in waiting for competition to develop

- Rather than different discount rates, perhaps this is due to different weightings being placed by different players/observers on the costs and benefits

Relevance of merger law

- Not symmetric in Australia between mergers and divestments
  - Divestiture only available to undo a merger, not to break up market dominance
- Cf Modified Final Judgement in USA creating RBOCs from AT&T

But the comparison with US is not close

- There a new market boundary had already been inserted into what was a monopoly, between the access / local call market and the LD market
- The incentive problem remained
- The incentive problem was overcome by the MFJ
- That is, the RBOCs had an incentive to provide equal access (or at least lacked the incentive not to)

But line-of-business restrictions were required to prevent incentives for discrimination to creep back in.

- And a lot of imposed technical change to achieve interoperability

The incentive problem remains between access and local calls

- Note lack of progress in local call market in US as well as here
- Note we got fair level of competition in LD without solving the incentive problem BUT perhaps large rents still there

Leads us to thinking about vertical separation in Australia.

- Separation of access from calls
- Would go to the heart of the incentive problems and make for a separation of markets, not particular lumps of infrastructure

But the costs could be substantial

- Markets don't stay the same, so separating them may be costly, or as was the case in US, you may later find you separated the wrong ones, i.e. that there is still a market boundary with incentive problems
- Telstra's business is certainly designed around being in the access business and the calls businesses and other businesses. If part of this is for strategic reasons, a lot of it must be to achieve economies of scope and to minimise transaction costs
- Separating would be very costly

If this had been foreseen, the businesses could probably have been designed to be interoperable without much difficulty

- The cost arises in undoing what is done

Separation doesn't necessarily mean less regulation

- Line-of-business regulation can be necessary but intrusive

6. CONCLUSIONS

To the extent Telstra is a monopoly it is an old-fashioned one

- Not through economies or network effects, though those things have helped it retain its power
- Rather Telstra's market power more closely resembles that of Standard Oil a century ago than it does Microsoft's
- It was largely granted its power deliberately by short-sighted governments

ACCC proposals represent a very substantial exercise in market intervention

- If the market had evolved into its present form through some reasonably unconstrained competitive processes, such market engineering would be hard to justify

Obvious answer to that is that the present market structure is the result of government engineering, and inept engineering at that

- Not only was Telstra created with market dominance, far more than necessary
- But it was allowed to undertake an essentially predatory strategy with its HFC roll-out, funded 100 per cent by the government

Why don't we go around ordering divestitures more often, even in countries where it can be done through the courts and has been done before?

- Answer: Because the chances of getting it wrong in terms of second-guessing the market are large
- And the costs in terms of creating disincentives to risk-taking are accordingly large
- But these arguments are quite weak in the case of Telstra

However, in addition, the proposals would now be a massive interference in private property rights, because half of Telstra is privately owned

- What could have been feasible with a government business enterprise is now far more difficult

Still worth debating the economic justification, even if the political will for change is absent

Mentioned before that the proposals had an element of opportunism about them

- Being opportunistic is sometimes the right thing to do (especially in difficult areas of government policy, where you are pretty sure what should be done, but the political opposition is strong)
- Cf CBA privatisation

But the opportunity hasn't arisen

- The government's rapid rejection of the ACCC proposals is proof of that
- What circumstances might arise to create a true opportunity?

REFERENCES

ACCC, Report to Senator Alston, Minister for Communications, Information Technology and the Arts, on Emerging Market Structures in the Communications Sector, June 2003

Gerald R. Faulhaber, Bottlenecks and Bandwagons: Access Policy in the New Telecommunications, *Forthcoming, Handbook of Telecommunications Economics*, Vogelsang and Cave, eds., 2004

Gerald R. Faulhaber, Policy-Induced Competition: The Telecommunications Experiments, *Forthcoming,* ***Information Economics and Policy****, 2003*

S. J. Liebowitz and Stephen E. Margolis, Are network Externalities a New Source of Market Failure? *Research in Law and Economics* 1995