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*Ultra-Fast Broadband –  
A Solution in Search of a Problem?*

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## Those advocating ultrafast are ... generous ... in their claims for it

Source	Claim	Reality
Cisco	Video, audio and maps need fiber	All work very well on DSL, HFC
UK Government Department of Business	Australian trial demonstrates value of superfast for education	Trial used 64 Kbps connections
OECD	Fiber will enable smart meters, reducing power consumption	Italy has 30m smart meters using copper and wireless
FTTH Council	FTTH will enable remote surgery	Only for very brave patients

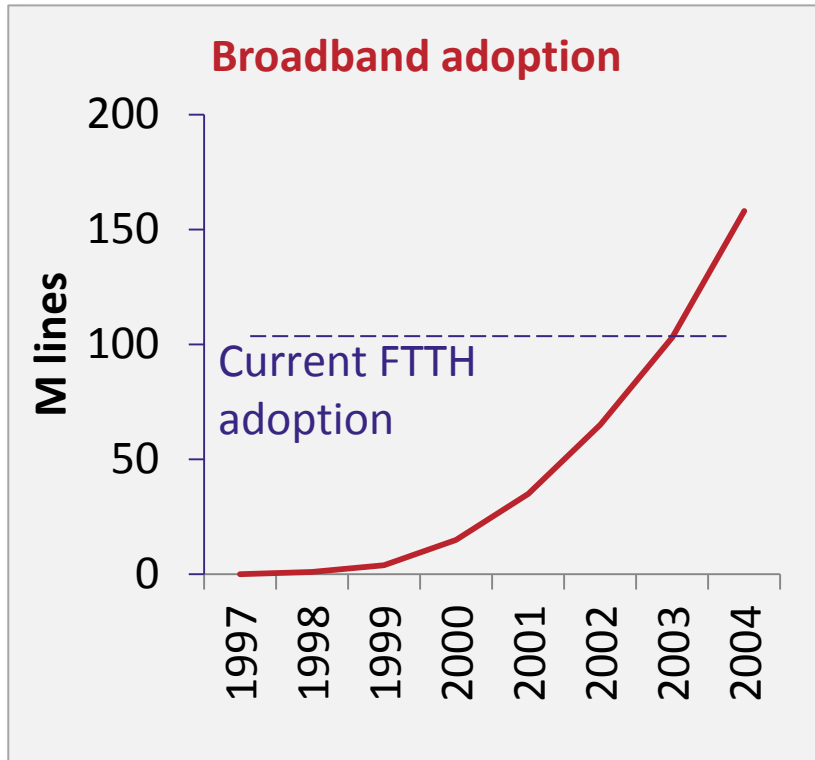
## Consumers are generally unimpressed

- In markets with material penetration of ultrafast, such as Japan, South Korea and Hong Kong, it has been priced at or below normal broadband (and material adoption has still taken many years)
- Consumer research shows limited willingness to pay any premium

<i>Ofcom</i> (Mar 2011)	“Consumers [are] generally unwilling to pay a significant premium [for FTTH]”
<i>JP Morgan</i> (Nov 2011)	“Only 5-25% of customers seem willing to pay [a] ~€10/month premium [for fibre]”
<i>Analysys Mason</i> (April 2012)	“users [fail]to see the benefit of NGA compared with standard broadband”
<i>DotEcon</i> (Summer 2012)	“[I]t is unclear whether there is a significant fibre premium”

- Much apparent ultrafast penetration is as a result of ‘forced’ upgrades, and does not provide evidence of WTP

Ultrafast has no inherent value – only applications do.  
But we've built it – and they haven't come














- There are 107m FTTH lines globally (plus many HFC, FTTC lines that might qualify as ultrafast)
- This matches basic broadband penetration in 2003
- By 2003 we had numerous BB applications:
  - iTunes store
  - Skype
  - Streaming video
  - Movie downloads

***And yet, according to the FTTH Council of Europe, there are:  
"No really compelling application yet" for fiber***

## 'Concurrent use' also does not justify ultrafast

### NBN Co's view on how residential demand "quickly reaches 100 Mbps"

	Adv internet	20 Mbps		Telephony	0.2 Mbps
	Gaming	2 Mbps		Peer to peer	20 Mbps
	Two SD TV	4 Mbps		3D HDTV	30 Mbps
	Two HDTV	20 Mbps		Video calling	2 Mbps
	Hosted apps	2 Mbps		Smartphones	14 Mbps
				Video Conf	6 Mbps

- Totals 120 Mbps, but from *at least 8* people (and that assumes serious multitasking)
- Compares to average Australian household size of **2.5** people

# Ultrafast is an big investment to make on the basis of hope

- The value of ultrafast *cannot* be extrapolated from the (significant) value of basic broadband
  - Makes no more sense than saying the success of the 747 proves that there's bound to be a good return from Concorde
- Applications to make use of ultrafast are way overdue
- 'Application stacks' that justify ultrafast are literally incredible
- Government intervention to support superfast is highly regressive
  - Likely beneficiaries are sophisticated, gadget heavy, rich households
  - Far better areas for support are not-spots (where there is poor quality basic broadband) and uptake, to get everyone online