The digitalisation of radio

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at the forefront of international media, quickly leaving the analogue evolution of television in New Zealand moving into the digital age, the introduction of Freeview, the switching of radio from analogue to follow dosely behind.

with a digital service provider and some of the nation § major broadcasters, have been trialling a digital service. But, for New Zealand there are still uncertainties over which digital option to choose, how best to introduce it and control growth, what impact it will have on existing stations and what will happen to the current market when new stations are established?

New Zealand broadcasting and telecommunications company Kordia has already trialled a digital service, Digital Audio Broadcasting (DAB), but the Government is yet to commit to a long-term rollout of the technology. With FM analogue frequencies set to expire in 2011

giving up onthe service.7

These mixed developments have made researching the rollout and subsequent experiences in the UK hugely important for New Zealand.

In the UK, the growth of DAB technology, how new stations have developed, the impact on larger existing stations and the positives and pitfalls of the technology all offer valuable information to New Zealand.

Kordia DAB trial in Auckland and the CBD of Wellington was a good start in testing the service. The operation started in October 2006 and had audio and data services running on the network. The services included static and scrolling text on the VDU (Visual Display Unit), an EPG (Electronic Programme Guide) and slideshows.

The following eight stations were part of the DAB pilot:8

- RNZ National
- RNZ Concert
- George FM
- Base FM
- BBC World
- Radio Tarana
- Tarana Unplugged
- Mai FM

However, as yet, Kordia imited results cannot offer the same knowledge available from 13 years of going Ove in the UK.

This research calls upon digital radio experts and those with first-hand practical knowledge of the medium, companies using digital radio, digital radio critics, articles and practical research. They include the British Broadcasting Corporation, GCap Media and the UK media watchdog Ofcom. This is by no means highly technical research, more a case study into how UK broadcasters have approached and developed the medium.

While digital technology is at the forefront of international media, will moving radio onto the digital platform work in New Zealand? Practical knowledge from years of the service in the United Kingdomwill offer great insight into whether it is even a feasible idea.

only in the United States and HD radios made for the US market would not work in New Zealand.

PART TWO – DAB in the UK

DAB terminology:

Key terms when it comes to DAB:

ÒEnders Analysis added that the high cost o

crystallise the problems: too much spectrum, not enough consumer hardware take-up, and not enough α thus asm for DAB from listeners or advertisers." ²⁵

He said the issue of DAB overcapacity had to be "urgently resolved" by Ofcom, Digital One, Channel 4 and transmission business Arqiva. He added: "Put bluntly,

"...this suggests that reports of DAB's death may be premature." Paul Smith

Smith said: OAII stations in the BBC's digital portfolio, with the exception of the Asian Network, posted increase in audience and listening hours. Taken together with the success of their commercial counterparts, this suggests that reports of DAB's death may be premature. O

Other critics were more blatant, with Paul Donovan's Sunday Times article, Why DAB is here to stav.³¹

Donovan writes: ODAB, RIP? Channel 4's decision to get out of digital radio comes only months after our biggest commercial radio group also abandoned it (GCap). In addition, four national digital-only stations D Oneword, Core, Life and the lazz D were killed off earlier this year. There is now just one national commercial station, Planet Rock, available only on digital. So, on the face of it, the harbingers of DAB doomare right to give it the black spot. Ó

Establishing DAB in the UK: the benefits

The DAB format was created in the 1980sand became popular the following decade in several countries, including the UK and many parts of Europe

The medium is aimed at all consumers, and especially because the public broadcaster, BBC (British Broadcasting Corporation), is heavily involved, it has to be B

Launching DAB

When DAB was introduced into Europe there was an expectation that all broadcasters would support

something males, you'd listen to the main Virgin Radio and then the Virgin Radio Classic Rock when you got tired of the new stuff, essentially. And quite a lot of radio stations have done that.Ó

It may not necessarily be in exactly the same way but it is launching additional formats and ways of doing things that commercial radio was not able to do in the past.

The other thing that drove DAB for the commercial market in the UK was the promise of an analogue ra

Cost of DAB

The cost of DAB is a highly se

million (NZ\$463m) in DAB with very little return. That's a lot of money. Ó 4 Although,a

Pr

Consumer uptake of DAB sets

Establishing a new format in any technology is a challe

He said: Qunlike other consumer electronic devices where there's some sort of subsidy model or some sort of incentive to go and buy that device D people are buying digital radio just because they want to listen to a digital radio station, they understand the benefit of having more radio to listen to. Ó

Of com has been tracking the DAB household penetration, and while listening to DAB and owning a DAB set was once very niche, in the past two or three years, they have started to see workable numbers when it comes to people who are listening.

Heasman said the main reason for this is simply because the DAB sets are getting cheaper. Ò/ou can actually now get a DAB set, it won Dbe a great quality one, but you can get one, as law as £20 (NZ\$51) now from the supermarkets. And only three or fou\$51)

Downfalls of DAB

If there are any problems with DAB then the public surely already knows about, as, on a whole, the UK has a culture of blame and negativity which does not take long to hit the headlines. Whether the content is wholly true can only be confirmed by the broadcasters. While much of the bad press is speculation, the radio bodies agree there are a few areas in DAB that could be worked on.

For both commercial and public broadcasters, the biggest problem they are currently facing is the dual distribution charges for analogueand DAB with no immediate gain. Currently, this will only cease when analogueis switched off. (This idea

Piggott said: ÒWhen people say to me, 'Oh, it's dreadful that digital

everyone thinking, 'Oh my gosh, DAB is now the Betamax of everything. ÓAnd DAB still has its critics, but the digitalisation of radio had to start somewhere.

Heasman said that when DAB was being developed, in terms of digital radio, it was the only choice. Only what's happened since is, I suppose the UK is paying a little bit of a penalt

The infamous pulling-out of GCap

DAB received its worst dragging through the papers and uproar about its future when GCap's Fru Hazlitt famously said she was pulling the plug on the medium at the beginning on 2008.

Ofcom's Heas

standard commercial radio and their margin could be 35 per cent to 40 per cent. All of a sudden it's profn

Int

internet radio.

For the UK to realistically consider internet radio, as the main way to offer radio services, Heasman sees it as being completely premature at this point. OAnd I'm not saying it will never happen, but if you compare internet radio with digital radio - you can get it in cars, it's easy to use, you don't ne

PART THREE - Current state of DAB in the UK

Introduction

At the time of this research, the three main factors surrounding the current state of DAB are how the recession is affecting it, when Channel 4 is going to launch its intended DAB programme and what the DRWG's 2008 yearly report is going to suggest.

Although DAB has been running in the UK for 13 years, Ofcom's Heasman said that it is Oprobably at all light crossroads at the moment O Hersaid that the out

How the recession has affected DAB

While thousands of people lost their jobs in the UK in 2008/2009 and hundreds of businesses have had to close their doors, the recession has hit the media industry hard. Not only has it had to endure hugecuts to staff numbers but the advertising spend has dropped significantly.

As a commercial broadcaster, Piggott knows first hand about how the credit crunch has affected his business: OWe've significantly hit an issue, as the radio industry a

Channel 4

While hundreds of thousands of people across the UK have felt the effect of the economic downturn, whether throughjob loss and/or increased cost of living, Channel 4 has felt the credit punch too Dby deciding they had to pull out of DAB, before they even launched it.

Initially, Ofcom awarded the licence for the second national commercial mul

news for radio in the

reportingÓand commentary, it is easy to lose track of the fact that DAB is a pretty good consumer story. On the four years since 2004 weOre moved household penetration from 3 per cent to 27 per cent, and receiver costs have dropped to sub £20. Admittedly, the five years before that were pretty dud. DAB accounts for 11 per cent of radio li

pleased that the Working Group has been able to achieve

motion video, additional data services... You could actually get a copy of the biggest-selling newspaper in everybody's

DAB+ for the future?

When broadcasters are given the choice between DAB and DAB+, the latter wins every time. The UK has, perhaps unluckily for them but fortunately for the rest of the radio world, been at the forefront of triall

do to all those poor people, then it wouldn't be a very good move for us to make. But over time, you just don $\tilde{\mathbb{O}}$ know. And we certainly will not be doing anything until they're in the market and they are everywhere. But I think that's a little bit away really. $\acute{\mathbb{O}}$

PART FOUR DWould DAB+ work in NZ?

When considering the benefits of DAB £D sound quality, more services, better reception £D the question arises whether this would even give added benefit to New Zealand's established analogue

That includes bringing down the pri

Conclusions and recommendations

While the acquisition of radio from analogue to digital in the United Kingdomhas been more of a challenge than what the broadcasters would like, slowly, but surely, DAB is taking over.

Around eight million Britons have boughta DAB radio set, so not only are they being rewarded with more station choice, improved reception and in some cases a better quality of sound, but it also means they are ready to be part of the proposed digital switchover in around 2017.

Like most things in the UK, DAB has had a trial by media. It has spent a lot of time filling space in newspapers, with some critics questioning its lifeline. The somewhat ubiquitous pessimistic attitude towards digital radio in the UK comes from media commentators, opinion columns and, in some cases, heads of media organisations

However, since the analogue switch-off date was proposed by DRWG in December 2008 the

Another obstacle that the UK has not been able to solve is how to sell DAB to under 24-year-olds, a generation broughtup on CDs, music downloads and iPods. The withdrawal of

Works cited

Of Com Statement on Channel 4 and DAB, Oct 10, 2008 http://www.ofcom.org.uk/media/news/2008/10/nr_20081010

Piggott, Nick No more Channel 4 DAB, Oct 11, 2008 http://nick.Piggott.name/blog/2008/10/11/no-more-channel-4-dab/

Plunkett, John Bid to cut local radio content rejected, Feb 07, 2008 http://www.guardian.co.uk/media/2008/feb/07/commercialradio.ofcom

Plunkett, John Bumper Christmas for digital radios, Jan 23, 2088 http://www.guardian.co.uk/media/2008/an/23/digitaltvradio.radio

Plunkett, John Double blow for DAB radio, Feb 11, 2008 http://www.guardian.co.uk/media/organgrinder/2008/feb/11/doubleblowfordabradio

Plunkett, John Is DAB radio the next Betamax, Jan 29, 2008 http://www.guardian.co.uk/media/2008/jan/29/radio.digitaltvradio?gusrc=rss&feed=media

Robinson, James 'It's been naval-gazing for too long', March 30, 2009 www.guardian.co.uk/media/2009/mar/30/interview-stephen-miron/

Schwarz, Natalie Why we must stick with digital radio, Feb 1, 2008 http://www.guardian.co.uk/media/2008/feb/01/digitaltvradio.radio?gusrc=rss&feed=media

Websites

BBC

www.bbcco.uk/rad