

**ENQUIRIES:****PHONE:****EMAIL:**11 March 2011¹

Andrew McGowan
Inquiry Secretary
Standing Committee on Infrastructure & Communications
PO Box 6021
Parliament House
Canberra
ACT 2600

Dear Mr McGowan

NEW INQUIRY INTO THE NATIONAL BROADBAND NETWORK
– SUBMISSION BY CAIRNS REGIONAL COUNCIL

I am writing to submit comment to the New Inquiry into the National Broadband Network on behalf of Cairns Regional Council. I refer to and support the submissions made to the Inquiry by Far North Queensland & Torres Strait Regional Development Australia and by the Far North Queensland Regional Organisation of Councils which also represent the interests of the Cairns Region.

Council recognises the importance of open and equitable access to high-speed, business grade and metro-comparable broadband as essential infrastructure for the current and future economic development, prosperity and competitiveness of the region, both at a national and international level. The community and economic disadvantage the region faces without this infrastructure is significant.

Cairns Regional Council has formally endorsed engagement with NBNCo to support and facilitate the NBN in the Cairns region as a priority economic development program both within Council's own Economic Development and Innovation delivery programs and as a priority within the Road Map of FNQ&TS RDA. This commitment to support and facilitate NBN in the region will include Council's infrastructure, information services, information on planned capital works, support with community engagement and planning processes.

Delivery of Government Services and Programs

Cairns Regional Council serves a very broad ranging community and environment, in geographic, demographic and cultural terms. The NBN has significant potential to enable major cost and service delivery efficiencies for Councils, in addition to enhanced and new services. Like all Local Governments, the NBN will afford significant opportunities for enhanced and interactive services right across Council's delivery areas, from community, to infrastructure, mapping, information transfer, libraries and cultural services and regional partnerships. Improved telecommunications allowing remote access to services presents particular benefits to citizens, removing/ reducing the need to visit the Council building. Arguably this benefit is greater for Regional Councils where travel of considerable distance is involved. There are reciprocal benefits to Council in lower processing costs and sustainability benefits in lowering transport emissions.

In the area of emergency and disaster management in particular, the environment in northern Cairns region is unique in terms of violent weather, rugged terrain and easy access by sea. The issues of communication in this environment are currently a significant limiting factor in rapid response to emergency situations.

Some areas of the region present particular concerns. In high maintenance areas such as the Daintree, there is expectation that current Telstra services will lack investment and decay in the interval until NBN deployment. Earlier NBN deployment will prevent damage to the economy in these areas in addition to positively supporting it.

To support Council's full and effective planning to utilise the high quality and high speed broadband services that NBN would support, Council is seeking early information on the timing of infrastructure roll out and on the access regime.

Achieving Health Outcomes

NBN will essentially mean that our health service providers will be able to broaden the delivery of systems and services to provide better and more efficient health care. High speed, reliable broadband is essential to supporting e-Health programs and the ability of our health providers, in the public, private, general and specialist sectors, to fully service the broad ranging communities within the region and the broader Tropical North Queensland. Limited Wide Area Networks are specifically identified as a limiting factor to the capacity of the Cairns Base Hospital to deliver applications and services from Cairns to satellite facilities. Current limitations on opportunities to deliver Telehealth, linking patients with clinicians within the main referral hospitals illustrates this need.

Education

The NBN will significantly enhance opportunities for better and more equitable access to a broader range of more reliable and interactive on-line education services at all levels of education. This opportunity is especially pertinent in a region such as Cairns, with many small and remote communities. High speed, open access broadband with competitive pricing models is essential if our communities are to be afforded equal opportunity, at both a national and international level, both now and in the future. The benefits of such infrastructure and the services it supports apply right across the education arena for this region: from equal access to computers and computer-based education within our schools; to the support NBN will provide for the growth and development of relevant and competitive services and programs through

James Cook University, the Tropical North Queensland Institute of TAFE and on-line within industry.

Management of Built and Natural Resources and Environmental Sustainability

The Cairns region is renowned for its sensitive and pristine environment, national park and World Heritage Areas. From marine to tropical rainforest, environments it demands sensitive environmental management, stewardship, appropriate development, monitoring and research. The region presents the opportunities and challenges of the tropical zone, managing, monitoring and protecting the built and natural environment in a climate prone to cyclones. The 2011 Cyclone Yasi illustrates the severe threat and impact this climate can have for built and natural resources and environmental sustainability. High speed, reliable and competitively priced broadband will enhance management capability within this environment, whether that be from computer based tracking and information gathering, scenario planning, dissemination of information throughout the region, disaster management, environmental research, remote monitoring and data collection. Within this environment and climate, Council is seeking the provision of fibre and associated infrastructure below ground.

Regional Economic Growth and Employment Opportunities, Business Efficiencies and Revenues

Cairns Region and the broader Tropical North Queensland is currently disadvantaged without open and equal access to competitively priced and reliable, high-speed broadband.

The Cairns economy is heavily reliant on tourism, construction and retail. During the global economic downturn, unemployment in Cairns was the highest in Australia at over 13%. With this vulnerability to external shock and to the dynamics of the tourism market, diversification of the economy and of the tourism industry itself is identified as a priority by Cairns Regional Council. Bringing the NBN to the Far North opens up new and wider industry opportunities and will significantly increase the region's competitive position at a national and international level for business growth and investment. The NBN would strengthen significantly the regions ability to support and attract business activity in a wide range of industry sectors, in research capability, health, education, innovation and remote business operations and employment opportunities, as well as supporting opportunities for northern headquarter offices, call centres, data centres, wholesale distribution centres for example, promoting population growth and injecting revenue into regional centres.

The following examples illustrate current limitations of broadband services to business in Cairns²:

- ***Security of Data and Ability to Quickly Perform Off-Site Backups***
Existing on-line back-up services to new companies moving to Cairns often currently requires the posting of new company files on hard disk. NBN speeds would overcome this necessity. One local company refers to one case where the day before Cyclone Yasi hit, they were called by an existing client needing to start using the Online Backup Service, as they had no off-site backups for their company's data, and they were in the path of the cyclone. In this case the company had to be advised that it was not possible, because the 100GB of data they needed to back up would take at least 2 weeks as a best-case scenario to upload over their ADSL2+ connection, assuming they weren't using their internet connection for much else at the

same time. The NBN would allow that same data to be backed up in 5 hours, and the company could have been helped.

- ***Disaster Recovery***

Larger companies have disaster recovery procedures for their IT infrastructure that generally involves having copies of all of their physical servers, data, etc. housed in a separate data centre, so that if their primary infrastructure is destroyed, they can - after a period of time - resume operations using a different data centre.

This type of setup is out of the reach of small to medium businesses, yet such a disaster is arguably *more* crippling to a small-to-medium business as they are unlikely to afford the capital or the time involved in setting up their business again.

With the NBN, there will be less reliance on having IT infrastructure in-house, and data can be backed-up offsite more easily. Importantly, when recovering from a disaster, data can be *restored* quickly, allowing the business to resume operations much quicker than they could otherwise.

When an environmental disaster such as a cyclone or a flood damages entire towns or cities, the economic damage in businesses *not trading* is immense.

- ***Provision of Services to Remote Areas***

The global economy needs to work both ways. This means our regional areas need to operate and communicate with as much ease as the capital cities, and the only way this can be achieved is with a fast, reliable communications network.

It is expensive to provide support and services to businesses in regional areas, and, with the NBN, the ability to provide that support through internet-driven platforms (such as videoconferencing, access to data, and Software-as-a-Service) will dramatically reduce the costs associated with that delivery.

One Cairns-based company frequently provides consultation to regional businesses on e-commerce and internet-based communications. The company currently does this by flying or driving vast distances, at great expense, to provide that consultation face-to-face. The NBN would not only allow us this type of consultation to be provided without the need for physical travel, but it would also provide the platform on which those businesses would actually take advantage of the advice given.

- ***Ability to Work Remotely – Employers of Choice; Attraction and Retention of Key Staff***

The ability to support working remotely is a real and commercial issue for the Cairns Region. One Cairns-based company cited the example where two of the company's staff members, as new parents, either frequently or permanently, work from their homes. With current broadband infrastructure, this is a barely viable proposition, as the efficiency of this type of work is greatly diminished due to the general slowness of interactions with the office, coupled with the delays in waiting for large files to transfer. The ability to better support staff working from home that would be afforded through NBN would also significantly increase the ability of many companies to attract and retain key staff.

A case example provided by a Cairns-based company presented their situation where the volume of work the company could take on in the region would easily support 20 staff. However because the company is currently unable to access the staff it needs, it is forced to turn away work and has staffing levels at only 12. The inadvertent result of this is prospective work being referred instead to capital city or overseas firms and business being directly lost from the region. On the basis that this example will not be an isolated case, it highlights once again the opportunity for the NBN to create new job opportunities for people currently unable to work in their preferred industry due to location limitations.

- **General Business Limitations**

The restriction to remote access is not only an issue for rural areas but is an issue for the whole region. With pockets of the city and suburbs that have inadequate service, local ICT companies refer to remote access within these areas of the city itself as almost impossible to do. The NBN will mean that small jobs that might not necessarily require a callout can be resolved with a quick remote support call. One local ICT service provider referred to the frequent situation where waiting for a connection to buffer correctly over a slow dial-up, with inadequate ADSL1 or poor 3G, means that the company might as well have driven to the premises to sort out the problem for the client. Essentially, NBN means business can be more efficient, spending more time and devoting resources where they're needed, rather than running around on support calls for low level problems.

Interaction with Research and Development and Related Innovation Investment

Cairns, as part of Tropical North Queensland is positioning itself a leading region for Tropical Innovation. 2010 saw the launch of the regions first annual Tropical Innovation Awards, with success now taking the Awards to include an international tropical innovation category in 2011. Computer based research, development and design and the ability to store, send and receive information at competitive speeds and rates is essential to the regions ability to nurture and support innovation and research.

A key part of the region's positioning for tropical research is James Cook University. NBN will support JCU not only with the development and delivery of their research, but with connectivity throughout Australia and internationally A world class university in one of Australia's most pristine and diverse environments with access to reliable, high speed communications offers a major draw card to students, researchers and research investment.

Facilitating Social and Community Benefit

Cairns Regional Council recognises that NBN will provide infrastructure and opportunity for high speed, reliable and equitable broadband but that the benefits of NBN will only come through application. Council is committed to facilitating growth in the capacity and capability of the community to benefit from the NBN. In partnership with FNQROC, Council is currently undertaking work to assess capacity and uptake and to develop strategies to increase the uptake and applications by the business community of high speed broadband.

Optimal Capacity and Technological Requirements of a Network to Deliver these outcomes

From the NBN, Council is seeking:

- Reliability and robustness, with particular reference not only to service provision but to physical aspects of the network given this region's vulnerability to cyclone damage;
- Clarification and consistency around all matters relating to planning, legislation, building and infrastructure requirements;
- Clarification of implementation timelines and the access regime, to enable effective planning to build services to maximise opportunity and application through NBN;
- Potential for wireless and satellite services to be upgraded to fibre; and
- Competitive pricing arrangements for regional and rural areas.

Thank you for the opportunity to submit to the Inquiry

Yours Sincerely

FIONA WILSON
Economic Development Manager

Foot Notes:

- 1 *Extension to submission date as approved by Inquiry Secretary to 11 March 2011*
- 2 *Cairns Regional Council acknowledges the contribution and input of the following companies in providing practical cases to illustrate current limitations and challenges: Carlos Computers, Rutten Technology and Precedence.*