

Following a recent meeting which hosted the two gentlemen from NBN Co., there have been many concerns voiced regarding the future of internet connectivity for Maleny, Montville, Flaxton, Mapleton and surrounding areas along the range.

Having been in the 'internet and telecommunications business' for a couple of decades and now running a local business, I have spent more than too many hours in calls and troubleshooting sessions trying to get to the bottom of what has happened to our once functional internet and what is on offer for the citizens and businesses going forward.

Below are my findings.

Existing ADSL connectivity which was once quite bullet proof is now less than functional due to congestion issues. This has been confirmed by Telstra technicians that have access to the DSLAM hardware at the exchange. ADSL will no longer be funded by Telstra as it is a dead prospect since NBN or 4G are the 'way of the future'. This means that the remaining hardware is under load and will not be expanded to meet demand, nor will it be maintained to any great extent in the future. What was once functional is now unusable at many stages throughout the day and night.

NBN FTTN, FTTH etc. (cabled connectivity) has been terminated at Flaxton, north of the Montville village and has been limited to certain patches on a map in Maleny. This means that the majority of the residents and businesses on the range are expected to use alternate technology - meaning Fixed Wireless.

NBN Fixed Wireless is accessed from towers along the range and due to topographical constraints, 75% or more of the residents and some businesses will not be able to access NBN via Fixed Wireless because they are not in sufficient line of sight. This has been confirmed on multiple occasions by the NBN tech teams that come out to survey and fit the required hardware for NBN. This leaves one more option for NBN ... Satellite.

NBN Satellite is the last technology suggested for everyone that cannot access the previous two methods for NBN connectivity. It is marketed as fast and stable, yet the latency is never discussed. Download speed

means nothing if the latency prevents certain applications and processes from communicating in a timely manner. The latency cannot be improved as it takes a physical minimum of at least 600ms for the data request to travel into space and back to Earth 4 times before the response is received (if at all).

Many applications, some critical, will time out or reject latent requests making the use of satellites extremely limiting. It is not suitable for many critical and business applications and is substandard in this technological era. In comparison, older ADSL has a latency average of 25 milliseconds and NBN cabled connections can have less than 20 ms. Your iPhone can get sub 20ms on most days. Minimum best experienced was 620ms with Satellite.

Perspectives on fairness and cost cutting.

Some of these residents can see the tower only hundreds of metres from their houses or businesses and/or are within 2 KM of the exchange and/or are within a short drive to business centres and large Sunshine Coast towns yet are faced with 'last century' outback bush radio prospects in internet usage.

The cost cutting of not rolling cable extra kilometres and assuming Fixed Wireless will pick up the slack is not good enough and is certainly not fair to the taxpayers. Where is the equity and fairness?

Those left to endure Satellite are not only being told they may not be able to use common applications, or that they can only use certain applications within certain time frames, they are being hit with higher access fees for a less useful technology AND are hit with usage restrictions that make them third rate internet citizens.

The NBN salespeople and some politicians seem to think that people only want to stream Netflix in High Definition or 4K quality however most of us want to be able to use the internet for more productive reasons, at least as efficiently as we could only 2 years ago on the old tech.

I have spoken to the providers, to the technicians and it is clear we are being left behind.

An alternative will be 4G, however capacity might soon be called into question if we aren't attentive. The other downside is that the customer must pay \$1500 for hardware to be installed to access the internet and then be required to pay good money for smaller quotas of data. NBN customers get their NBN hardware for free.

On a final note, some advice given to customers has been insulting. Some people have been told in some cases that they should set their video to the lowest possible quality to conserve data allocation or make the service seem usable. They have been told that their kids should play only certain games instead of more common or enjoyable online games with their luckier friends. An internet caste system?

After submitting a list of issues, NBN looked into our connection where they only looked for a fault. This is the wrong approach.

They won't find a 'fault' as it works as the technology is expected to do so on known topographical and physical aspects. What the problem is for the end user is that the satellite is deficient in the latency department (by physics and design) and for some services, it causes timeouts and unusable services. We have second rate internet because of that. Legacy ADSL has better latency, 4g has better latency, NBN FW has better latency, NBN cabled has better latency. Not satellite. The satellite, by design, is the downfall; not whether it works or not. These NBN people don't seem to get it. They are hell bent on selling it as fast but that isn't the problem.

I have NBN Satellite as a backup (which I will consider ditching) but aim to go completely away from NBN Co altogether. I use 4G as an alternative and so far, it has been pretty good however there are some factors to be aware of.

Firstly, I did have to pay for it where NBN was provided to everyone for free. Secondly, the congestion and signal strength issues around tower provided technology is still of concern. The benefit is that while I can mostly get a reasonable signal and the latency is better and more usable than NBN Satellite, we still have flat spots which are congestion and weather dependant.

Last note is that providers of NBN satellite do not allow the same data usage as other connection types and throttle or shape certain data sources and the connection in certain times of the day (peak periods) which is when most people need it to work the fastest. Satellite customers are also not too happy about being told they cannot use certain services or software that everyone else can use.

As an addition, I would like to highlight from my business perspective that the current ADSL connection in my shop is mostly congested and prevents me from utilizing my online order facility properly. If I then try to look at what NBN is available to my shop, it says none is available currently even though neighbouring shops have FW NBN. It's a mess.

Aside from internet technology, we also require better 4G phone service across the range where line of site and topology play an important role in how we can communicate. Phone calls are often dropping out or patchy.