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SUMMARY

As Minister of Media and Communications you are responsible for the regulation of the telecommunications sector. The New Zealand Telecommunications Forum (TCF) is the industry body representing over 95 percent of the sector. In this briefing we introduce you to the work of the TCF (including our self-regulatory functions), explain how the sector is structured and regulated, discuss investment and innovation, and put forward key issues for the sector and for your portfolio. The Ministry of Business, Innovation and Employment (MBIE) will also be briefing you on these matters. We recommend you consider this TCF briefing alongside the MBIE material, so you have an industry perspective to hand as you are deciding on your priorities.

A regulatory regime for telecommunications has been in place since 2001, with a thorough review undertaken in 2018. The market has changed considerably since then, and the sector is performing well in terms of investment, asset quality, range of services, competition and pricing. Te Waihanga/the Infrastructure Commission notes (in its State of Play report) that the telecommunications sector is well placed in terms of the services that New Zealanders can access, compares favourably with other countries in the OECD, and performs strongly relative to other infrastructure sectors.

The TCF has identified five priority areas that need your attention as incoming Minister of Media and Communications. They concern resilience, the National Environmental Standards for Telecommunications Facilities (NESTF), rural connectivity, digital equity, and updates to telecommunications regulation. The telecommunications sector has partnered with successive governments to provide world class connectivity to the people of New Zealand. Further collaboration, in the areas we have identified, will ensure that New Zealand makes the most of the economic and other benefits this connectivity provides. The five areas are introduced below.

Resilience of critical infrastructure has been an area of significant focus following recent severe weather events. The sector is investing significantly in this area. The previous government had a number of overlapping policy, legislative and other resilience initiatives underway. We ask that you work with ministerial colleagues to develop an overarching strategy or plan for government work on resilience and rationalise the work programme to avoid the risk of duplication, inconsistent and inefficient standards, regulatory overburden and confusion.

In order to install, maintain and upgrade network infrastructure (such as fibre optic cables, cell towers, poles and antennas) our members need to engage with the resource management system. The **NESTF** (secondary legislation under the Resource Management Act) sets national standards for much of this activity, the intention being to avoid unnecessary regional variation and time-consuming resource management processes. The NESTF standards have not kept pace with changes in technology and the built environment

and are in urgent need of updating. We ask that you work with the Minister for the Environment to have the NESTF updates fast tracked.

We also have work to do together on **rural connectivity.** Through a combination of the Ultra Fast Broadband (UFB), Rural Broadband and Mobile Blackspot initiatives, 99.8 percent of the population will have access to connectivity by the end of 2023¹. The next challenge is to connect the most rural and remote parts of the country with a level of connectivity to participate in the digital world. The difficulty is these are parts of New Zealand where it is not commercially viable for telecommunications companies to invest on their own, due to complex geography and low user numbers. You can help by providing incentives to continue investing in rural connectivity, by setting clear targets for rural connectivity improvements, developing a strategy for meeting the targets, providing funding for connectivity improvements in non-economic areas, and allocating additional low-band spectrum for mobile use.

Digital equity (ensuring all New Zealanders can afford internet access and devices, have digital skills and wrap-around support to get online and stay safe) is an area where New Zealand needs a whole of government approach and sustainable solutions. The Department of Internal Affairs estimates that one in five New Zealanders are excluded from the digital world in some way. As a sector we want to work with government and the digital equity community to help address these issues.

Last, but not least, there are some **regulatory issues** to address. These concern, bringing satellite operators into the tent, minor changes to the way the Telecommunications Development Levy (TDL) is calculated, and amending the sunset clause for the land access regime. With the regulatory regime for telecommunications now well bedded in, and significant gains made, we suggest it is appropriate to consider the degree of Commerce Commission focus on telecommunications relative to other competition issues and sectors. We also think it would be reasonable to require the regulator to undertake cost benefit analysis before introducing new regulatory requirements and initiatives.

The TCF looks forward to working with you. We are available to assist with an industry wide view of what is happening in the sector, and to coordinate member feedback on government policy proposals. We suggest a quarterly meeting to keep you updated.

¹ MBIE Briefing for the Incoming Minister for the Digital Economy and Communications, February 2023. Para 29.



INTRODUCING THE NEW ZEALAND TELECOMMUNICATIONS FORUM

The TCF is the industry body representing over 95 percent of the telecommunications sector. Our members include the operators of fixed line (fibre and copper) and mobile networks, retail service providers, wireless ISPs (WISPs) and tower companies.

The TCF was established following the passage of the <u>Telecommunications Act 2001</u>². The Act gives the TCF a quasi-regulatory role, to work alongside the Commerce Commission to develop and implement codes that enable telecommunications networks to interoperate.

The policy issues we engage on

We engage with the Government on a range of policy and regulatory issues that affect the telecommunications sector, including telecommunications regulation, resilience, consumer protection, resource management, climate change and digital equity.

Operational collaboration with government

The TCF and its members also engage with government agencies on an operational level. This includes helping to tackle scams and fraud, supporting sustainability efforts through device recycling, and coordinating between network operators and government during a natural disaster through the Telecommunications Emergency Forum (TEF). A significant area of collaboration with government (for our members) has been the roll out of UFB, the Rural Black Spot Initiative (RBI), and other rural connectivity investments. Since the COVID-19 pandemic our members have been partnering with government (through the Ministry of Education) to provide home internet to low-income families with school age children.

The ministers and agencies we work with

As the minister responsible for the regulation of the telecommunications sector, you are the key minister we engage with. We are available to assist you with an industry wide view of what is happening in the sector, and to coordinate member feedback on government policy proposals.

The government agency we work with most is the Ministry of Business, Innovation and Employment (MBIE), because of its regulatory stewardship and oversight role for the telecommunications sector. We also engage with MBIE on consumer issues.

We also work with:

- The Commerce Commission, as the telecommunications regulator.
- The National Emergency Management Agency (NEMA), on emergency management issues and a consumer awareness campaign.

² Section 5 defines the functions of the Forum.



- The Department of Internal Affairs (DIA), on digital safety, digital equity and fraud/cyber-crime matters. This includes membership of the <u>Independent Reference</u> <u>Group</u> that is tasked with maintaining oversight of the operation of the Digital Child Exploitation Filtering System.
- The Ministry for the Environment (MfE) on resource management, sustainability and climate change matters.
- Te Waihanga, on infrastructure issues.
- The Ministry of Education, on digital equity.
- The Department of Prime Minister and Cabinet (DPMC) on its proposals for regulation and resilience of critical infrastructure.
- The Climate Change Commission, on climate change issues.
- CERT NZ and the National Cyber Security Centre on fraud education and cyber security matters.
- Police, concerning emergency calling matters. Members have relationships with Police under the Telecommunications (Interception Capability and Security) Act 2013.
- The Privacy Commission, on the Telecommunications Information Privacy Code.

Self-regulation

As noted above, the TCF has a self-regulatory function under the Telecommunications Act 2001, developing and updating industry codes of practice that deliver improved solutions and outcomes for consumers of telecommunications services. Telecommunications codes cover a range of issues including marketing, product disclosure, the transition from copper services, fibre installation, colocation of equipment, customer service and complaints, transfer of services, disconnections, emergency services calling, scam call prevention and international roaming.

Our website provides more information on TCF codes and working parties.

A consumer focus

An important area of the TCF's work is to enable consumers to get the best out of their telecommunications services. Our mahi in this area includes facilitating consumer choice, consumer protection, customer support and consumer education. Here are some examples of TCF initiatives:

- a number porting service that makes it easy for mobile consumers to change from one provider to another
- industry standards on how to market and present broadband plans to consumers

- country-wide recycling collection for mobile handsets through the RE:MOBILE phone recycling scheme
- an IMEI³ look-up service for consumers to check that a second-hand mobile phone is not block-listed, preventing criminals from profiting from mobile phone theft and fraud
- all TCF members are members of the Telecommunications Dispute Resolution
 Scheme (TDR), which offers consumers a free and independent dispute resolution
 process
- cross industry initiatives to combat scams and fraudulent activity
- consumer education and information. Examples include:
 - o a factsheet on copper withdrawal and PSTN⁴ switch off
 - a factsheet and awareness raising on 111 calling to support vulnerable consumers - partnering with the Commerce Commission
 - a consumer awareness campaign on what to do (and how to prepare) when telecommunications is not available during an emergency event - partnering with Civil Defence.

Further information is available in our industry report

Our recently released <u>Industry Report</u> provides more information about the TCF, the work we do, and key issues for the telecommunications industry in Aotearoa New Zealand. We have attached a copy for your reference.

³ IMEI - international mobile equipment identity (in effect, a serial number for a phone).

⁴ PSTN stands for public switched telephone network. Spark operates the PSTN, which is a network of switches that connect calls from one person to another over copper lines. The PSTN is being retired as customers move to landline calling over wireless and fibre internet.



AN OVERVIEW OF THE TELECOMMUNICATIONS SECTOR

INDUSTRY STRUCTURE

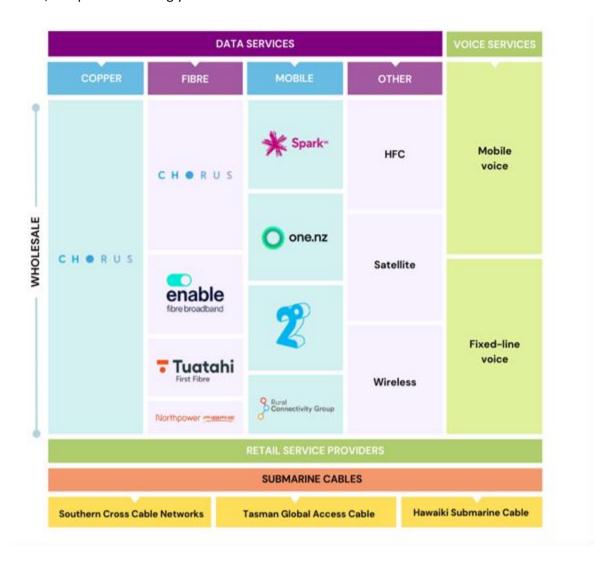
The structure of the New Zealand telecommunications industry is, to a large extent, the result of regulation under the Telecommunications Act 2001, which structurally separates the ownership of the new fibre network (and legacy copper network) from the ability to sell fixed line internet and phone services to consumers. The industry comprises the following:

- Network operators that operate fixed line networks, such as fibre, HFC⁵ and the legacy copper network. Fibre fixed line access services are regulated by the Commerce Commission and provided as a wholesale input by companies such as Chorus, Enable Networks, Northpower Fibre and Tuatahi First Fibre, for service providers to deliver fibre voice and broadband services to end users.
- Retail service providers (RSPs) that provide broadband, phone and other services to
 end users. The major RSPs include Spark, One NZ, 2degrees and Mercury. In addition
 to the major RSPs, there are approximately 150 smaller parties retailing services
 associated with fixed and wireless. This includes the wireless internet service
 providers (WISPs) that provide internet services through wireless technology that
 connects to fibre at a central point.
- Mobile network operators (MNOs) that provide mobile phone calling and wireless internet services. The mobile networks in New Zealand are operated by 2degrees, Spark and One NZ. There is also a range of mobile virtual network operators (MVNOs) that resell services purchased from one of the three MNOs.
- Tower companies that own and operate cellular tower infrastructure. Spark and 2degrees recently sold most of their cellular towers to Connexa. One NZ recently sold its tower infrastructure to Fortysouth.
- Satellite participants ranging from traditional geosynchronous satellite operators like Inmarsat through to new low-earth orbit (LEO) operators like Starlink and Lynk.

⁵ Hybrid fibre-coaxial. A broadband telecommunications network that combines optical fibre with coaxial cable.



Te Waihanga (in its <u>State of Play report</u>) notes that the sector is well placed in terms of the services that New Zealanders can access, compares favourably with other countries in the OECD, and performs strongly relative to other infrastructure sectors.



INVESTMENT AND INNOVATION

Data consumption and consumer expectations are growing rapidly, resulting in the need to continuously upgrade and invest in networks. The sector invests around \$1.62 billion per year⁶ in fibre access, mobile, core and backhaul networks, and the IT systems needed to make all this work.

 $^{^6}$ https://comcom.govt.nz/__data/assets/pdf_file/0019/279100/2021-Annual-Telecommunications-Monitoring-Report-17-March-2022.pdf

In addition to the investment needed to maintain networks and keep up with increased customer demand, our members are also investing in new technologies and innovation. Examples include:

- investments in 5G which will enhance and enable a number of new services, including applications in areas such as IOT (internet of things) and Agri-tech
- partnerships between mobile operators and satellite companies to provide greater mobile coverage.

Much of the investment the sector is making in networks and innovation cannot be recouped in price increases, because of consumer expectations and high levels of competition.

TELECOMMUNICATIONS REGULATION

The Telecommunications Act 2001 was introduced just over 20 years ago to address issues with the structure and behaviour in the telecommunications market, including barriers to entry and the absence of competition (e.g., Telecom had a monopoly). These issues have now been effectively addressed. The market structure has fundamentally changed, with four regulated fibre companies delivering wholesale services to a competitive retail market.

A new regulatory regime for retail service quality and the UFB fibre networks was finalised in 2018 following an extensive review of the Telecommunications Act and came into force in 2022. The Commerce Commission's regulatory focus is now on price quality (Chorus only) and information disclosure regulation for local fibre companies (Chorus plus others), retail service quality, rural services and the future of copper (where and how it can be withdrawn) regulation.

Appendix A includes a list of regulation, Commerce Commission activity, and proposed legislation that affects the sector. We make some suggestions for regulatory review or change in the key issues section below.

KEY ISSUES

The most important issues for the telecommunications sector in your Media and Communications portfolio are:

- resilience, including improved policy coherence across government
- the National Environmental Standards for Telecommunications Facilities (NESTF)
- rural connectivity
- digital equity
- regulatory matters.

RESILIENCE

The recent extreme weather events have resulted in a renewed focus on resilience across government and for critical infrastructure providers. In this section we talk about the resilience work being progressed by the sector, and how the Government can support resilience.

What we are doing

As an industry we have a comprehensive programme of work on the go. This includes resilience improvements by member companies as well as sector-wide collaboration.

Here is a snapshot of the resilience activities that various members are currently progressing:

- building more diversity into core networks (which connect cities and towns) to better serve communities. This is about building new routes and improving the resilience of existing ones
- investing in backhaul⁷ resilience
- investing in 'direct to cell' (mobile connectivity enabled by satellite) to add coverage and a layer of resilience not dependent on land-based cell sites
- improving network capacity through 5G and capacity upgrade programmes, in urban and rural areas
- exploring alternative pathways to bridges for fibre river crossings
- auditing and investing in backup power requirements. This includes upgrading
 batteries that need replacement with ones with greater capacity, trialling new
 battery technology, adding to the generator fleet, building in automatic transfer
 switches for generators in critical or hard to access sites, and distributing more cell
 sites on wheels (portable cell sites with backup power) around the country

⁷ Backhaul is the part of a telecommunications network that connects local networks with the main backbone of the network.

- risk assessment work to avoid single points of failure (SPOFs), including at key sites such as exchanges
- real-time monitoring of power outages, generator placements and site alarm status
- the NGCC/Hourua partnership on the new public safety network and improved communications for emergency services.

At the sector level we will shortly start work (with NEMA and MBIE) on a new sector-wide emergency response plan. While the TCF already runs the Telecommunications Emergency Forum (TEF), this plan will cement existing partnerships and enhance collaboration across the sector, with other sectors and with government agencies, in preparation for and during a natural disaster. Members are also working together to understand the impacts of climate change on their resilience and have established a Climate Change Working Group to do sector wide climate scenario analysis.

In the short term we are working with TEF members to improve operational processes and reporting and coordination with NEMA, regional civil defence emergency management and other critical infrastructure providers.

How government can support resilience

Government has an important role to play in supporting critical infrastructure providers, such as telecommunications, to take resilience efforts to the next level (if that is the direction the Government wants to go in). You can help in the following ways:

- By working with ministerial colleagues to bring greater coherence to government work on resilience of critical infrastructure. At the moment there are two separate regulatory initiatives - the Emergency Management Bill (introduced and referred to select committee) and the DPMC proposals to introduce a new regulatory regime for resilience of critical infrastructure. In addition, the Government Inquiry into the Response to the North Island Weather Events is considering whether the design of the emergency management system is fit for purpose. There is a proposed National Policy Statement for Natural Hazard Decision Making (which covers infrastructure). Resilience-related work is also being done by MBIE, Te Waihanga, Crown Infrastructure Partners, the Commerce Commission and the Treasury. Progressing this work separately brings risks of regulatory confusion, duplication and unnecessary and inefficient compliance costs for both industry and government. We suggest that the Government take stock of the existing initiatives and rationalise. It would also help to develop a strategy for resilience of critical infrastructure and provide a map of how various work streams fit together, and which agencies would be responsible for what.
- By clearly signalling, at an early stage, any questions, suggestions or expectations
 you may have on resilience matters. We would far rather have free and frank
 conversations early on, and try and find a meeting of minds, rather than go down a
 regulatory track that is costly for both government and industry to engage in.

- In line with the above, if the Government is considering minimum standards for telecommunications resilience, we need to be part of the conversation at an early stage. While our members are investing in resilience, early engagement with the sector about any government plans for minimum standards will provide greater certainty on where to invest.
- Through the resource management system. The National Environmental Standards for Telecommunications Facilities (NESTF) have not kept pace with changes in technology that support enhanced resilience. We discuss NESTF in more detail later in this briefing.
- Through procurement. Government is the largest customer of infrastructure
 networks and services (e.g. through Police, hospitals, and MSD). If the Government
 values resilience as a customer, and is prepared to pay for it, this will naturally lead
 to increased resilience investment.
- By co-investing with infrastructure providers, if the Government wishes to establish
 resilience levels for public benefit that exceed what customers are willing to pay.
 Government co-investment in critical infrastructure has so far not focused on
 resilience. Contrast this to Australia⁸, which has several co-investment initiatives for
 telecommunications resilience. Our initial thinking on possible areas for coinvestment are set out in this May 2023 report.

Additional regulation is not necessarily the answer to strengthening the resilience of critical infrastructure. Regulatory approaches are just some of the 22 options in the OECD resilience policy toolkit. The OECD recommends that governments take a staged approach starting with strategies, partnerships and voluntary approaches that encourage collaboration and mutual support. New Zealand does not yet have a strategy.

NATIONAL STANDARDS FOR TELECOMMUNICATIONS FACILITIES (NESTF)

Telecommunications network operators need to engage with the resource management system to be able to install, maintain and upgrade network infrastructure such as fibre optic cables, cell towers, poles and antennas. The National Environmental Standards for Telecommunications Facilities (NESTF - secondary legislation under the Resource Management Act (RMA)) sets national standards for much of this activity. The intention being to avoid unnecessary regional variation and time-consuming resource management processes.

The problem is that the standards in NESTF are out of date and in urgent need of amendment. It has failed to keep pace with changes to the built environment that encourage greater housing density and taller buildings - which are now taller than the

⁸ Examples of Australian initiatives include its <u>Mobile Hardening Programme</u>, the <u>Telecommunications</u> <u>Disaster Resilience Innovation Programme</u>, investment in <u>portable communications facilities</u>, the <u>Broadcasting Resilience Programme</u>, and its <u>Disaster Ready Fund</u>.

towers needed to service them. It has also failed to keep pace with changes in technology that improve resilience. Increases in battery sizes will require bigger cabinets, but the NESTF doesn't allow for that kind of upgrade. These issues were not addressed in the recent resource management reforms.

Appendix B provides some pictures that demonstrate the problem.

We are seeking urgent updates to the NESTF

Prior to the election the Ministry for the Environment (MfE) did not have time or resources to update the NESTF under the RMA, due to its workload with the passage of the Natural Built Environment and Spatial Planning Acts. It also decided not to bring NESTF updates into the first National Planning Framework. Despite considerable work by Te Waihanga, supported by MBIE, and an industry working party to prepare the amendments.

With the drafting of the NESTF amendments substantially complete, we ask that the Government now turn its mind to updating the NESTF. Without the NESTF updates, our members will need to undertake time consuming and costly engagements with individual councils to seek resource consents and designations, make submissions on plans and seek plan changes. This either slows down infrastructure build or stops it in its tracks. It can also lead to differing resilience outcomes across regions.

While the resource management system is the responsibility of the Minister for the Environment (and the Minister Responsible for RMA Reform), NESTF has historically been an area of joint responsibility, and MBIE is very much involved. We are conscious that there are a number of areas of national direction under the RMA that are in need of updating by MfE. Getting traction on the NESTF will therefore require you to engage with the Minister for the Environment and the Minister Responsible for RMA Reform at an early stage.

We also have views on elements of the recent resource management reforms that would be useful to keep, and those that are problematic for infrastructure, that we can share if you are interested. We are producing a briefing for the Minister Responsible for RMA Reform and the Minister for the Environment which will be copied to you.

RURAL CONNECTIVITY

Progress to date

Successive governments have partnered with the telecommunications industry to get quality connectivity around the motu. The Ultra Fast Broadband (UFB) project has delivered fibre to 87 percent of households and businesses. Together with the Rural Broadband Initiative and the Mobile Blackspot Fund, 99.8 percent of the population now has access to connectivity.

The <u>Rural Capacity Upgrade</u> initiative, a public/private partnership, is upgrading mobile coverage in rural areas, and increasing fibre to the home and the farm. The <u>Rural Connectivity Group</u> (a joint 2degrees, One NZ and Spark initiative investing in shared towers and other equipment) is expanding mobile coverage deeper into regions that remain without coverage.

The next challenge

The next challenge is how to connect the *most* rural and remote parts of the country, so that they too can have the *level of connectivity* that enables them to tap into all the benefits and opportunities of the modern digital environment. A recent <u>NZIER report</u> shows that the provision of high speed fibre broadband to rural areas could potentially add \$16.5 billion to the economy over a decade. There are now a range of technologies available (fibre, wireless and satellite). But there are also challenging industry economics at play, as well as outdated legacy copper regulations.

The difficulty is that these are the parts of Aotearoa New Zealand where it is not commercially viable for telecommunications companies to invest in infrastructure, due to complex geography and low-end user numbers. As population coverage grows through networks reaching more sparsely populated areas, a greater land area will need to be covered to achieve each incremental population coverage percentage. Every additional percentage of population coverage is more expensive than the proceeding percentage. Consumers are generally not prepared to pay for this but do generally expect continuous and high-quality connectivity no matter where they are.

With revenues staying static and increased costs to reach more remote areas, industry cannot fund this additional network investment alone. Addressing these challenges will require the Government and network operators to work together and co-invest. The Government can get the ball rolling by:

- setting clear targets for rural connectivity improvements
- developing a long-term strategy for meeting the targets (which acknowledges a mix of technologies and approaches will be needed to deliver it)
- providing funding for connectivity improvements in non-economic areas (following the Te Waihanga <u>funding and financing principles</u>)
- allocating additional low-band spectrum for mobile use.

Consideration also needs to be given to policy settings intended to provide backstop voice services for rural customers, as well as legacy copper regulations. The existing Telecommunications Service Obligation (TSO) requirements are no longer relevant for most customers, because most (if not all) consumers need more than the basic services covered by the TSO (i.e., analogue voice, dial up and fax).



IMPROVING ECONOMIC OUTCOMES THROUGH GOVERNMENT INVESTMENT IN DIGITAL EQUITY

Digital equity is about ensuring everyone has what they need to participate and flourish in the digital world - affordable internet, access to devices appropriate to needs, digital skills and wrap-around support to get online and stay safe. Current levels of income poverty, exacerbated by the cost-of-living crisis, mean that large numbers of families cannot afford these digital essentials.

The Department of Internal Affairs estimates that one in five New Zealanders may be digitally excluded in some way. Twelve percent of households do not have internet access at home, with the numbers higher for Māori (14 percent), Pacific peoples (24 percent), people with severe disability (25 percent), and people living alone (31 percent)⁹. Twenty percent of New Zealand adults lack the essential digital skills needed to use the internet safely¹⁰.

The benefits of digital inclusion are now well documented and quantified. Research undertaken by NERA Economic Consulting (commissioned by the Spark Foundation) shows that providing internet access to the approximately 130,000 households without it could benefit New Zealand's economy by up to \$700 million annually. The benefits include increased employment, better health outcomes, increased productivity, better access to government services, and reduced social exclusion and isolation. There are also savings to government in avoided social costs and being able to offer services at less cost online. Work commissioned by the Ministry of Education suggests the return on investment for every government dollar invested in digital equity is, conservatively, between \$3.10 and \$3.60. NZIER (in a report commissioned by the Digital Council) calculated the return at around \$3.00.

While recent governments have developed high level digital strategies, with digital inclusion pillars, none have yet come up with a concrete plan to close the digital divide. We hope that this Government will be the one to put a sustainable cross-government solution in place.

The telecommunications industry wants to work with the Government, and the digital equity community, to develop a whole of government approach and sustainable solutions to digital equity issues. On the government side we understand this will involve a number of portfolios, not just telecommunications.

In the meantime, our members continue to support digital equity efforts in various ways, including:

 The Skinny Jump subsidised wireless broadband service to over 27,000 households, established by the Spark Foundation. More than \$4 million worth of free data is

⁹ Source: 2018 Census, as reported in the NZIER report for the Digital Council.

¹⁰ Source: Digital Skills for Life in Aotearoa.

provided annually to households in need. Skinny Jump also supports refugees and students

- Free Wi-Fi in Christchurch, through a partnership between Enable and the Christchurch City Council. Enable is also providing hyper-fibre to three Christchurch high schools
- Providing laptops and tablets to schools and community programmes, through Recycle a Device (a collaborative initiative involving Spark Foundation), and a Te Rourou, One Aotearoa Foundation programme
- Supporting broadband connectivity to students with Variety, the Children's Charity
 2degrees free broadband
- Te Pae Hononga a partnership between Te Kei o Te Waka Tainui, Te Rourou: One Aotearoa Foundation, and One New Zealand, that provides participating whaanau a free broadband plan, devices suited to whaanau needs, digital skills and online safety training, and cultural learning opportunities
- Connecting Riding for the Disabled to the Tuatahi fibre network
- A 2degrees initiative to provide phones and SIM connections to charities and community groups such as Shine, Asthma NZ, Women's Refuge, Te Pua and NZ Police Family Harm
- Participation in the Ministry of Education's Equitable Digital Access (EDA)
 programme, which will provide free internet access to low-income families with
 school aged children until June 2024.

REGULATORY ISSUES

As noted above, a regulatory regime for telecommunications has been in place since 2001, with a thorough review undertaken in 2018. Industry and government have learnt a lot under the existing regime. The market has changed considerably, and the sector is performing well in terms of investment, asset quality, range of services, competition and pricing.

The Commerce Commission is now being asked to look more closely at other sectors, such as supermarkets, fuel and banking. It is appropriate that Commission time and resources go to these priority issues and sectors that have not been regulated to the same degree. This may require some reprioritisation of Commission activity in the telecommunications area to focus on those areas that will have significant competition and consumer gains.

With these developments in mind, there is now scope to consider changes to improve the focus and efficiency of telecommunications regulation. Suggestions for areas to consider include:

- New entrants to the telecommunications market, such as low orbit satellite (which are playing an increasing role in rural connectivity). Satellite is not subject to regulatory requirements concerning competition, consumer protection, and dispute resolution. These new entrants do not contribute to the Telecommunications Development Levy (TDL) and are not required to pay for spectrum in the same way as existing network operators. Everyone providing services should be subject to the rules, to ensure consumers are protected.
- Minor changes to the legislative settings on how the TDL is calculated, so service providers can be more transparent with customers on how the levy contributes to the price they pay for services.
- The degree of Commerce Commission focus on telecommunications relative to other competition issues.
- Requiring cost benefit analysis before the regulator introduces new requirements and initiatives.
- Updating the Telecommunications Act to amend the sunset clause for the land
 access regime (due to expire on 1 Jan 2025). There is benefit in ensuring these
 access rights continue beyond the current expiry date to give more consumers
 access to fibre (and maintain the fibre networks) after the fibre network build and
 connection activities are completed. The extension of these rights will also help
 consumers transition off copper, as the industry moves away from legacy
 technology.

More background on the existing regulatory environment is included in Appendix A.



OTHER KEY ISSUES OUTSIDE THE PORTFOLIO

There are other key issues facing the telecommunications sector that we are engaging with government on that are outside your portfolio, that it would be useful for you to know about because of the potential overlaps with the portfolio.

THE PROPOSED CONSUMER DATA RIGHT

The Ministry of Business Innovation and Employment has been working with former Ministers of Commerce and Consumer Affairs on the development of a consumer data right. The idea behind having a consumer data right is to make it easier for customers to share data that their bank or other business holds about them (such as account histories, transaction records or information on product usage) with another service provider or a price comparison service. The objective being to be able to compare service offerings and easily switch. Also, to inspire and enable new product offerings from competitors, using the customer data.

The work on a consumer data right was initially sparked by concerns that banks were not making customer data available for the purpose of open banking (making data available via APIs to non-bank financial institutions and third-party service providers, such as payment apps). While we understand the intention is to start with banking, the recently released exposure draft for a Consumer and Product Data Bill creates a framework that could be applied to banks, but also to other sectors that hold customer data.

We have concerns that if a consumer data right was to apply to telecommunications, it would overlap with existing telecommunications regulation that requires and facilitates competition, data sharing and switching between providers. The Commerce Commission already regulates this area for our sector, and regulatory confusion and overcrowding would result if a new regulator stepped into the telecommunications space. Further information is provided in our submission on the exposure draft.

SUSTAINABILITY AND CLIMATE CHANGE

Sustainability in the telecommunications sector is becoming an increasing focus as Aotearoa New Zealand strives to address environmental challenges. Our members are embracing innovative technologies and making infrastructure upgrades to enhance and support energy efficiency and reduce waste. Telecommunications is also an enabler that can help other sectors reduce their emissions, by enabling more people to work from home (reducing transport emissions) and providing the connectivity for smart technology that reduces household energy consumption, and smart cities technology that can help tackle climate change.



PRODUCT STEWARDSHIP AND RECYCLING

The TCF RE:MOBILE scheme is a not for profit product stewardship scheme that encourages New Zealanders to donate their unwanted mobile phones and accessories for re-use, refurbishment or recycling.

The scheme is currently working toward product stewardship accreditation under the Waste Minimisation Act in consultation with the Ministry of the Environment.

CLIMATE CHANGE AND RESILIENCE

We have established a TCF Climate Change Working Group. The purpose of the group is to help members better understand the impacts of climate change on the resilience of the telecommunications industry and engage with the Government on climate change policy.

We see strong linkages between government work on climate change and resilience of critical infrastructure such as telecommunications and electricity. Initiatives such as climate-related scenario planning will provide valuable insights for both industry and government investment in the resilience of critical infrastructure.



APPENDIX A: AN OVERVIEW OF TELECOMMUNICATIONS REGULATION

Telecommunications regulation

The telecommunications sector is highly regulated, through a mixture of legislation, Commerce Commission intervention, and self-regulation through the TCF.

Telecommunications legislation

Telecommunications Act 2001

This Act regulates the supply of telecommunications services, promotes competition and protects consumers. It gives powers to the Commerce Commission to regulate and monitor the sector, provide advice and consumer protection, and to set the allocation for the Telecommunications Development Levy (TDL). The Act had a major overhaul in 2018, bringing in a new regime for fibre regulation and retail service quality. It also provides for copper withdrawal and copper deregulation.

Radiocommunications Act 1989

This Act regulates the use of radio spectrum, sets rules for licencing radio transmitters and sets up the compliance framework. Our members rely on spectrum to provide mobile/wireless communications.

Telecommunications (Interception Capability and Security) Act 2013

This Act establishes obligations for network operators in terms of interception capability and network security.

Key non-telecommunications legislation that affects the sector

Commerce Act

The telecommunications sector is subject to the general requirements in the Commerce Act 1986, as well as the telco specific competition requirements in the Telecommunications Act. This includes rules about avoiding anti-competitive behaviour, cartels, and agreements to fix prices, allocate markets or restrict output.

Fair Trading Act

Our members need to comply with the rules in the Fair Trading Act that apply to promoting and selling goods and services.

Civil Defence and Emergency Management Act 2002

Telecommunications network providers have emergency response obligations under this Act and would have significant (and costly) new obligations under the Emergency Management Bill that was introduced to replace it.

Privacy Act

The Telecommunications Information Privacy Code 2020 applies specific rules to telecommunications agencies to better ensure the protection of individual privacy. It addresses the telecommunications information collected, held, used and disclosed by telecommunications agencies.

Resource management legislation

The Resource Management Act (and the recently passed Natural Built Environment and Spatial Planning Acts) ultimately dictates where critical telecommunications infrastructure can be located, which has a major impact on the reach and resiliency of telecommunications networks.

Commerce Commission initiatives on the go

Retail Service Quality Programme

- Mobile transparency: guidelines on how mobile operators should improve how information relating to mobile usage, plans and spend is provided to consumers.
- Broadband marketing: last year, at the request of the Commission the TCF developed two codes relating to broadband marketing based on the Commission's Guidelines. The Commission is reviewing these guidelines again this year.
- Product Disclosure: the Commission has issued draft guidelines for consultation relating to the way bundled services are marketed to consumers.
- Telecommunications Disputes Resolution (TDR) Scheme: the Commission set out requirements for providers to disclose membership of a disputes scheme to their customers. It will commence its second review of the scheme in 2024.
- Customer service: the Commission has developed a customer service dashboard that ranks providers in the areas of customer service. It has indicated it will do further work in this area.
- Mobile coverage maps: the Commission is planning to ask MNOs to undertake work on standardising how mobile coverage maps are presented to consumers.
- Billing and switching are other retail service quality areas that are earmarked for focus in 2024 by the Commission, as well as debt and affordability.

Rural Connectivity Study

The purpose of the Rural Connectivity Study is to develop a detailed picture of the rural telecommunications market – the options available to rural communities and businesses, beyond the national UFB fibre footprint, and how these are performing. The Commission has issued a significant information request to the sector in order to collate information relating to this study. The information requested extends beyond services offered in rural areas.

111 Contact Code

This Commission code is currently being reviewed. The Code supports vulnerable consumers who rely on their landline service for contacting emergency services and have no alternative to do so. Providers must provide an alternative means to contact emergency services in the event of a power outage to qualifying vulnerable consumers.

Copper Withdrawal Code review

Currently under review, this Code sets out the requirements that Chorus must follow when withdrawing copper services within a specified fibre area.

Fibre Regulation

Under the new regulatory regime for fibre, the Commission sets a 'Price Quality Path' (PQP) that limits the amount of revenue Chorus can earn from its customers, while setting minimum standards of service it must deliver to meet the needs of fibre end-users. This includes investing in service quality to ensure reliability and resilience. The Commerce Commission is currently consulting on the approach to resetting revenue limits and quality standards for Chorus for the next regulatory period. The current PQP expires on 31 December 2024, and the Commission must set the next PQP – known as PQP2 – by the end of 2024 to cover the period 1 January 2025 to 31 December 2028.

Each year Chorus and the other local fibre companies engage in the fibre information disclosure process. The Commerce Commission uses this information to help it monitor fibre companies.

Telecommunications Development Levy (TDL) Allocation

Under the Telecommunications Act, each TDL year (12-month period from 1 July to 30 June), the Commission is required to allocate the TDL proportionately between qualifying telecommunications providers, being companies, or groups of companies, earning more than \$10 million per year for supplying telecommunications services over a public telecommunications network (PTN).

Self-regulation through the TCF

The TCF has a self-regulatory function under the Telecommunications Act 2001, developing and updating industry codes of practice that deliver improved solutions and outcomes for consumers of telecommunications services.

A full list of our codes, industry standards and guidelines is available here.



New regulation proposed during the last term

There are a number of proposed regulatory initiatives from the last term that would, if progressed further, affect the telecommunications sector. These include:

- The Emergency Management Bill
- DPMC proposals on strengthening resilience of critical infrastructure through additional regulation
- The national policy statement on natural hazards
- Changes to the resource management system
- The proposed legislation to introduce a consumer data right (if a decision is made to apply it to telecommunications).



APPENDIX B: FURTHER INFORMATION ON THE NEED TO URGENTLY UPDATE NESTF

HOUSING INTENSIFICATION AND POLE HEIGHT

Medium density housing standards now allow buildings up to 12 metres, which is taller than the permitted height for a mobile connectivity site. Wireless signals are obstructed by buildings, so without changes to the standards concerning pole height, we expect to see coverage blackspots appearing and an impact on the quality of mobile connectivity in urban areas. The first picture below shows the status quo. The second picture shows where we need to get to in terms of pole versus building height.

Wireless signals do not travel easily through obstructions, and this can result in blackspots within the wider network coverage areas (where customers are in the shadow of a building) and can lead to radio emission safety concerns. Tight equipment envelopes limit our ability to deploy new antenna for new growth or sharing.



The ideal height for mobile antennas is 5m taller than surrounding buildings and obstructions, with space for additional antennas used for sharing the mast and growth.





CABINET SIZE

Network operators use roadside cabinets to store telecommunications equipment and keep it safe from the elements. This includes equipment such as batteries which provide backup when power fails. The size of the cabinet dictates the amount of equipment that can be stored and consequently the capacity to enhance performance and resilience.

Outdated provisions in the NESTF have not kept up with new technology and resilience requirements. Small increases to the allowed height and footprint of cabinets would address these.

OTHER NESTF ISSUES

Other key NESTF issues include:

- Clarifying provisions defining temporary facilities, such as those often used to replace damaged sections of a telecommunications network in an emergency, including the consenting rules that apply in emergency situations
- Clarifying how telecommunications lines may be deployed over lakes and rivers (to address council interpretation issues).







Paul Brislen
Chief Executive Officer
E: paul.brislen@tcf.org.nz

For general enquiries:

T: 09 475 0203

E: info@tcf.org.nz

www.tcf.org.nz

Auckland Office

Office B, Level 1, 368 Beach Road, Auckland 0630

Wellington Office

Level 4, 117 Lambton Quay Wellington 6011