Australian College of Rural
and Remote Medicine

ACRRM

Guidelines for using Practice Standard

for Digitally Connected Rural and Remote Communities

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Introduction

These ACRRM guidelines provide guidance and recommendations for the use of the Practice Standard for Digitally Connected Rural and Remote Communities. These guidelines provide generic guidance that can be adapted as needed for application across different organisations and services.

These guidelines are a "how to" toolkit for developing healthy, digitally connected remote and regional communities. They acknowledge the importance of:

- Providing high quality person-centred healthcare.
- Adopting new technologies to improve healthcare.
- Using evidence-based healthcare processes and procedures.
- Applying formal change management processes.
- Managing technical infrastructure.

These guidelines recognise that rural communities may be closely connected socially but may not be applying digital technologies to connect health and social care services. It is intended that these guidelines will inform community development of effective, digitally connected services, illustrate how healthcare organisations should engage with communities and set a vision for health services within communities.

The design and implementation of digitally enabled healthcare services should take into account the varying needs of a specific organisation, its particular objectives, context, structure, operations, processes, functions, projects, products, services, or assets and specific practices employed.

The ACRRM Practice Standard for Digitally Connected Rural and Remote Communities can be used to justify local initiatives, e.g. residential aged care facility should have suitable facilities for providing telehealth consultations (Thomas EE et al. 2019).

It is expected that these guidelines will be revised as experiences are gained in implementing connected health services using digital technologies in rural and remote communities.

Terms and definitions

For the purposes of this document the following terms and definitions apply.

community
group of people with an arrangement of responsibilities, activities and relationships (ISO/ 37101:2016, 3.3)

digital technologies
technologies that generate, store, process and communicate information represented in an electronic form as two or more distinct physical values. NOTE: The vast majority of information and communications systems (including the telephone system) use digital technologies

digital literacy
Digital literacy is the ability to access, manage, understand, integrate, communicate, evaluate and create information safely and appropriately through digital technologies. It includes competences that are variously referred to as computer literacy, ICT literacy, information literacy and media literacy. (UNESCO Institute for Statistics, 2018)

digital health
The field of knowledge and practice associated with the development and use of digital technologies to improve health. (World Health Organization, 2020)
NOTE: In a review of definitions of digital health Fatehi et al (2020) found that "that digital health is about the proper use of technology for improving the health and wellbeing of people at individual and population levels, as well as enhancing the care of patients through intelligent processing of clinical and genetic data".

healthcare organisation
healthcare provider having an organisation role. (ISO 13940:2015, 5.2.3.1)
EXAMPLE A care team, a group practice, a hospital department, a hospital care unit, a self-employed healthcare professional, a service providing healthcare advice.

healthcare professional
person having a healthcare professional entitlement recognised in a given jurisdiction. (ISO 13940:2015, 5.2.3.3.1)

organisation
persons or groups of people that has its own functions with responsibilities, authorities and relationships to achieve its objectives. (ISO 9000:2015, 3.2.1 modified)
NOTE: An organisation may in some cases be a single healthcare professional.

healthcare
care activities, services, or supplies related to the health of an individual. (ISO 13940:2015, 3.1.1 modified)

telehealth service
healthcare activity supported at a distance by information and communication technology service(s). (ISO 13131:2021)

Guidelines to the Standards

1. Responsibilities of healthcare professionals

1.1 Informing communities about digital technologies

The standards state that: *"When using digital technologies to support healthcare, effective personal communication practices should be developed to give clear messages and information about the way in which these technologies may support a person's diagnosis and ongoing treatment"*.

Effective communication practices can help people understand their privacy rights and how their information is being stored and exchanged using digital technologies. For example, the processes for organising and follow-up of diagnostic tests needs to be clearly communicated. People should understand how information is being shared digitally between one healthcare professional and another and across different organisations.

Plain language information about the technologies being used to manage a person's care is essential. Information about the availability and use of electronic prescriptions, viewing personal health information in My Health Record (MHR), and telehealth services needs to be available. Detailed information and resources for community members on how to access and understand how the MHR works can be found here.

1.2 Seeking consent for use of digital technologies

The standards state that: *"Healthcare professionals should ensure people are aware of their treatment options; fully understand the use of digital technologies in their treatment, follow up and condition management; and have the option to remove their consent at any point"*.

When using digital technologies, healthcare professionals should ensure people have been fully informed about their use, and the individual consents where required to their ongoing care being delivered and captured in this manner. The Australian Commission on Safety and Quality in Health Care provides a useful outline of Informed Consent in Healthcare here. Consent needs to be recorded as part of a medical record and community members should have the option to remove their consent at any point.

Consistent processes should be used to confirm that patients have a continuing understanding of how health information systems such as My Health Record interact with practice management systems. Information on the use of digital technologies can be made available to community members through various means and does not have to be communicated at the time of the consultation. For instance, information can be available in a paper form in the waiting room, during an online booking, on the clinic website or as an information poster inside the waiting room.

1.3 Verification of identity when using digital technologies

The standards state that: *"Healthcare organisations should have processes in place to validate peoples' identity prior to in-person, phone and video-based consultations"*.

While the verification of the identity of patients and healthcare professionals is an established process for in-person consultations, when using digital technologies an additional layer of complexity is added because patient registration and booking processes will be different and visual cues may be absent. However, simple introductory procedures and questions can still be used to confirm the identity of a patient to the healthcare professional and the identity of the healthcare professional to the patient.

1.4 Knowledge of local health services and digital technologies

The standards state that: *"Healthcare professionals should have sufficient knowledge of the local community characteristics, organisational capabilities, available digital technologies and understand any risks in the use of technologies on the safety or quality of health services"*.

Essentially this standard is stating that healthcare professionals should be able to identify the appropriate digital technologies that match the community needs and incorporate them into their clinical practice. Examples of these technologies include electronic prescriptions or referrals, messaging services, advisory services such as the ACRRM Tele-Derm online dermatology advice service, telephone and video consultations. All of these technologies can be used in conjunction with in-person consultations. Direct to Consumer digital and telehealth services need to understand the local health services available to the community and how consumers can access services which only exist outside of the community.

Healthcare professionals should make an assessment on the suitability for a consumer to have electronic versions of their prescriptions and the ease of managing their prescriptions using an app, who should use apps to monitor their chronic diseases, when to use a telephone or video consultation, and the consumer preferences and digital health capabilities. When using digital technologies, different or additional risks to healthcare safety and quality may arise. For instance when using video conferencing software for clinical video consultations technical, quality, security and privacy risks may arise. Further information on how to mitigate these risks is available here.

1.5 Relationship between in-person and technology supported care

The standards state that: *"Healthcare professionals should ensure that those in rural and remote areas are receiving the appropriate combination of technology supported care and in-person care, needed to maintain continuity of care, safety and quality"*.

This standard simply extends the well-established principle of triaging patients so that they receive the most appropriate care in a timely fashion to include the use of digital technologies in their care plans. As part of this triaging process consideration should be given to whether an in-person physical examination would supply information critical to safely providing remote care (using telehealth services).

The use of vital signs monitoring services, video or phone consultations and in-person consultations can be managed to ensure effective and safe treatment and self-care. Transitions between modes of care (i.e. In-person, over the phone and videoconference-based consultation) all require risk-based approaches to ensure people have the best possible health outcomes for ongoing personal wellness, new health condition diagnosis and emergency care. The ACRRM position statement on defining safe and quality procedural and advanced care in rural and remote locations can be found here.

1.6 Ensuring culturally safe and appropriate care

The standards state that: *"Healthcare professionals should ensure people in rural and remote areas receive digitally enabled healthcare that is appropriate to their needs, preferences and cultural expectations"*.

The needs and expectations of care for anyone living or working in different community contexts (e.g. a person who lives in town, outstation worker or a person from a different cultural background) may differ. Care plans and services that are most effective for people from each community are required. Culturally appropriate choices should be available to allow community members to understand and engage with healthcare services.

Healthcare professionals need to take time to understand local communities especially those who have religious or cultural practices that differ from the healthcare professional's own experience. Some cultural norms and practices may be unfamiliar to professionals new to the local area. Information and analysis of local community diversity should be made part of workplace induction programs and processes for new staff. There are several good books and resources on these issues including: Why Warriors Lie Down and Die and the Centre for Cultural Competence Australia.

1.7 Maintaining professional healthcare records

The standards state that: *"Healthcare professionals should ensure medical record software is able to provide and record structured healthcare information"*.

Maintaining and sharing health records is fundamental to the healthcare professionals' mandate for providing quality team-based care and improving the healthcare journey. Practice management systems provide a place where patient information can be stored in a structured form. Clinically coded records allow the health information software to process information, which assists in managing care, decision support and event reporting. Clinical coding is an essential feature of the Australian Government Practice Incentives Program.

When rural or remote communities decide to improve their digital healthcare environments, the primary focus may be on individual and separate healthcare records and management systems. Interoperability between healthcare systems has been shown to result in improvements in overall health and wellness. Healthcare professionals have a responsibility to reduce the duplication in the collection and sharing of information using systems already in existence. For example, by uploading patient shared health summaries to My Health Record or listing services in the National Health Service Directory. The sharing of information with other professionals involved in team care can be facilitated through the My Health Record system. ACRRM provides a course which can be accessed here on the sharing of health records for referral, discharge and shared care arrangements.

1.8 Managing Adverse Clinical and Technical Events

The standards state that: *"Healthcare professionals should record and notify the occurrence of technical and clinical events that may jeopardise the provision of safe, quality or continuity of the health service using digital technologies"*.

The use of clinical and technical governance frameworks is essential for the management of quality and safety issues that may arise when using digital technologies in healthcare.

Governance frameworks enable systems to be put in place to manage, record and monitor incidents which have affected care, people's safety, clinical and personal information. Occasions when electronic health records, telehealth services or other systems are unavailable should be notified to a designated service manager and recorded in an appropriate incident management system.

Incidents involving digital technologies can be managed according to a pre-defined policy which can be used to develop a customised incident reporting form. Evaluation of the recorded incidents can lead to improvements in service quality and creation of business continuity plans, so if technology fails there is no disruption to service provision.

2. Assessment of community context for provision of health services

2.1. Management of the physical environment

The standards state that: *"Healthcare professionals and healthcare organisations should consider the impact of the local physical environment on the community when developing, implementing and maintaining healthcare services supported by digital technologies"*.

When using digital technologies including telephone, video, messaging, clinical software and hardware, careful consideration of the physical environment for a community is needed. When working in a clinic, working from home, travelling on the road and using telephone and video consultation systems, internet connectivity, heat, humidity, severe weather events, for example cyclones, fires, floods, dust and other environmental factors must be assessed and managed.

For example, a health service in central Australia suffered a system wide phone and land-based internet connection failure. However they were able to maintain audio and internet connectivity through their satellite internet service, allowing access to patient records across the region as well as audio from each clinic to the central office in the local town.

2.2. Management of the business environment

The standards state that: *"Healthcare organisations in rural and remote Australia should consider the specific challenges to the viability of a healthcare business in areas of low population densities when implementing healthcare services supported by digital technologies"*.

There are several aspects to consider when running a healthcare practice in rural and remote Australia. Funding sources for health services operating in rural and remote Australia may be different to those available in metropolitan areas. The number of community members and their ability to pay out-of-pocket expenses may limit business revenue.

It may be difficult for practices to retain qualified healthcare professionals who are willing to work and live in rural communities for an extended period of time. However communities may be able to develop plans to encourage the greater retention of professionals. Training and professional development should be considered and planned for isolated medical professionals.

When community members seek specialist or other services from healthcare professionals located in metropolitan areas, continuity of care with local services may be difficult to maintain without pro-active follow-up and engagement strategies.

2.3. Management of logistical environment

The standards state that: *"Healthcare organisations in rural and remote Australia should take account of delivery times, available technical support and costs associated with provision of services, transport of people and equipment"*.

In isolated areas, technical support, installation and configuration services may take additional time to arrange. Power outages may impact the equipment and reduce product life, requiring surge protection and power backup systems to be considered.

Work and home environments should be considered when offering healthcare services supported by digital technologies.

For example, a healthcare service in remote Australia maintains internet services to their permanent staff quarters. Through feedback from exit interviews an issue was identified that internet connections were taking several months to be turned on by the Internet Service Provider. Subsequent improvements in connection times have led to greater staff retention.

2.4. Assessing the use of digital technology in the community

The standards state that *"Healthcare professionals should assess the use of digital technologies within communities, the extent to which a particular sector of the community may be excluded from accessing digital health services and the reasons for this, including their location, identity, culture, language, age, income, housing or disability"*.

Assessing digital maturity and inclusion of the healthcare participants and community members is a useful way to understand what technologies could be valuable and used by community members. Measuring and assessing Digital Health Inclusion (DHI) is an essential component of improving health services to rural and remote Australia. There are links between digital inclusion, social inclusion and the wellbeing of individuals and communities. This is particularly relevant in rural and remote communities. Rural doctors play a leadership and teaching role in their communities. Improving rural doctors' digital inclusion will have a flow on effect for their communities.

The Australian Digital Inclusion Index 2023 found substantial gaps in digital literacy in Australia. There is a considerable digital gap between First Nations and non-First Nations people, a persistent divide between capital cities and other parts of the country and people aged over 65 maintain lower scores than the national average. These findings have implications for the way education and training considers the needs of disadvantaged community members and highlights the need for community education and training. In adopting new digital technologies, we need to be cognisant of the community digital divide and ensure that digital capability (or the lack thereof) does not create further health inequalities.

For example, some community members may only own smart phones that have small screens so too much text and complicated graphics may be difficult to read and comprehend in this format.

3. Responsibilities of healthcare organisations

3.1 Improving the knowledge and skills of healthcare professionals

The standards state that: *"Healthcare organisations should ensure that regular capability and capacity assessments, training and quality improvement programs support healthcare professionals to gain sufficient knowledge to deliver effective healthcare services using digital technologies and mentor the community in their use".*

Healthcare professionals' knowledge and skills underpin the use of any technology and should be recognised in planning and ongoing management of human resources. Continuous professional development in the use of digital technologies should be encouraged and supported through regular capability and capacity assessments, training and quality improvement programs. For example, the Australian Digital Health Workforce hub outlines the capabilities required to support individuals and organisations in extending their digital health development.

Because healthcare professionals should work as part of teams it is important that they have sufficient knowledge of the local community characteristics, organisational capabilities, available digital technologies and the health services available in the community and take advantage of skills and community connections when servicing large geographic areas.

3.2 Confirming clinical performance and effectiveness

The standards state that: *"Healthcare organisations should analyse population health information and health records to enable rural and remote health services to be targeted at appropriate sections of the community".*

Measures of performance for management of a specific condition within a community may enable a quality improvement strategy to be devised that can be supported using digital technologies. However people do have rights relating to their health information and healthcare organisations should understand their responsibilities when using healthcare data for secondary purposes, such as the analysis of a communities' health.

3.3 Evaluating the use of digital technologies

The standards state that: *"Healthcare organisations should develop or adopt contextually sensitive evaluation frameworks, data collection and analytical methods for evaluating health interventions using digital technologies in services, clinical workflows and clinical practice".*

There are several evaluation frameworks that can be applied when evaluating the impact of health interventions using digital technologies. The Model for Assessment of Telemedicine applications (MAST) recommends evaluation of the health problem and characteristics of the intervention, safety, clinical effectiveness, patient perspectives, economic aspects, organisational aspects, socio-cultural, ethical and legal aspects (Kidholm et al. 2012).

The Consolidated Framework For Implementation Research (CFIR) provides a contextual sensitive evaluation framework for what works where and why across multiple contexts. The CFIR is composed of five major evaluation domains: intervention characteristics, outer contexts for organisations, inner settings of organisations, characteristics of the individuals involved, and the process of implementation. The evaluation framework includes, evidence strength and quality, community needs and resources, culture, leadership engagement, individual characteristics, planning, and operation (Damschroder et al. 2009).

There are many other tools and guides that give structured assessment advice including:

- Healthcare worker digital capability assessments.
- Cyber Security Risk Assessment.
- Referral pathway mapping (see PHN links for your local service).

Whichever framework is used it is important that the evaluation questions are understood by and are appropriate to the community culture. For instance surveys may not adequately record the experiences of patients who speak Australian First Nations languages (Lowell et al. 2024).

3.4 Maintenance of health information

The standards state that: *"Healthcare organisations should conduct regular audits of the quality of the information held in medical software".*

Underpinning any evaluation is the need to review demographic information; the quality of clinical notes; pathology and other diagnostic reports that may reflect undiagnosed conditions; outstanding recalls; reminders and immunisations; and confirmation that diagnosis and treatment plans have been coded.

3.5 Security of health information

The standards state that: *"Healthcare organisations should reduce the risk of cybersecurity events by having a thorough understanding of potential threats and risks within the technology environment and developing relevant policies and procedures to assist staff in the management of these risks"*.

Cybersecurity risks and mitigations involve secure transfer of data; standards-based encryption; virus and other cyber security risk management tools; authorisation and identity management; regular scheduled software updates; technical testing; system validation and ongoing education for users and patients. National and state-based privacy laws mandate open disclosure of data breaches especially with regard to peoples' health information. The Australian Government provides information and training on cybersecurity for people who work in healthcare to help prepare for any cyber threats that target digital health assets.

3.6 Service management of digital technologies

The standards state: "Healthcare organisations should have processes and agreements for maintenance of digital technologies that ensure their quality and safety, service continuity, timely delivery deployment, management and support".

Agreements for maintenance of digital technologies are important because in rural and remote locations the availability of technology support may be limited and pre-emptive maintenance plans may avoid unexpected system failures. Additionally, computer-based systems require regular upgrades and replacement and communications networks require regular performance monitoring.

Placing responsibility for interpreting and managing cybersecurity on providers of IT systems through service level agreements can assist healthcare organisations manage complex privacy and security measures.

4. Healthcare governance and leadership

4.1 Organisational strategies

The standards state: "*Healthcare organisations should have documented strategies that outline how they will develop, use and evaluate the use of digital technologies in healthcare in cooperation with local government and community representatives*".

Strategies should focus on engagement with the community in co-designing programs and healthcare interventions. They should have high level sponsorship from management, government and community leadership. A steering committee for promoting the use of digital technologies within healthcare communities can bring together representatives from all stakeholders and the community. The committee could include government staff, healthcare providers, local council members, community members and have senior leadership from one of the major stakeholder groups.

Community-based projects need strategic support from community leaders to overcome organisational inertia. Local priorities may not be valued by large organisations without this support (Marx, E. Padmanabhan, P. (2020). The Australian Digital Health Agency Communities of Excellence website and State or Territory resources are a good place to start for information and advice on improving health and wellbeing through connected digital health communities in rural and remote areas across Australia.

4.2 Providing clinical leadership

The standards state: *"Healthcare organisations should encourage local healthcare professionals to take on leadership roles within the community to encourage the safe use of digital technologies by healthcare services"*.

ACRRM believes rural doctors have the influence and skills to encourage the use of new technologies to help improve their communities' digital inclusion. Community projects need to be guided by clinical evidence based on peer reviewed research and should be guided by senior healthcare professionals who have skills and visions to improve the quality of peoples' lives in rural and remote communities. The following questions can be asked by leaders intending to establish connected rural and remote healthcare communities:

- What is the problem or problems that we are trying to solve or improve?
- Why change what we are doing?
- What is in it for me?
- How can our healthcare systems be more effective?
- What are we trying to achieve?
- What solutions work and improve quality of care?

4.3 Support for the use of digital technologies

The standards state: *"Healthcare organisations should ensure that the use of digital technologies in healthcare is fully supported by the organisation's service level agreements".*

Contracts and service level agreements for digital technologies should be established and monitored on a regular basis and key performance indicators should be included in ongoing evaluation of these services. Larger healthcare services can create an ICT Governance committee to lead the provision of ICT services based on the principles outlined in the ISO 38500 ICT Governance Standard.

4.4 Designing digital health services

The standards state: *"Healthcare organisations should consult with local communities to identify their particular needs to improve their health, well-being and continuity of care when planning and designing healthcare services using digital technologies and include communities in their design, implementation, and evaluation".*

Important considerations for rural and remote communities when accessing health services may be the geographic location and demographics of the community; the ability of people and their carers to travel; family, work and cultural needs. Continuity of care for health for community members may depend on the availability of specialists, local healthcare professionals and the facilities required to provide digital healthcare services.

4.5 Usability of digital health services

The standards state: *"Healthcare organisations should ensure that digital health services are usable and effective for all community members and provide members with a choice of alternative in-person services".*

The extent to which people can or will use an online service depends on how it is designed (appearance, layout, logical flow) and the training they may or may not have received. Technical standards exist for designing applications (e.g. W3C Accessibility Standards (2023) and for persons with disabilities (WHO-ITU global standard for accessibility of telehealth services). Such standards should be interpreted by experienced 'user experience' designers working in a co-design partnership with community organisations and members.

4.6 Providing sustainable services

The standards state: *"Healthcare organisations should consult within rural or remote communities to confirm adequate, sustainable resources and funding is available for healthcare services supported by digital technologies".*

Consideration of costs, benefits, and affordability of services can inform assessment of the sustainability of health services within communities. If your initiative is funded through government or large organisations, there will be a need to follow proven project management methods (e.g. Prince 2, Waterfall or Agile). Structured project management requires current state, conformance and future requirements to be fully understood prior to any injection of resources. These methods assume the list of tasks for your project is well understood and agreed which may not initially be the case.

5. Healthcare service planning for safety and quality

5.1. Management of service quality

The standards state: *"Healthcare organisations should have a quality management system in place to define and monitor the required quality characteristics, objectives and procedures for services using digital health technologies".*

Quality plans can define responsibilities for implementing, monitoring and reviewing the use of digital technologies. The required quality characteristics for a healthcare service (e.g. safety) without the use of digital technology also apply when digital technology is used. A formal method of confirming service performance is being improved as the result of a local initiative is the process of Benefits Realisation. This process helps teams identify realistic goals, plan ways to realise these goals and sustain and embed the intended benefit into business as usual processes.

Measures of performance can go hand in hand with quality improvement strategies. Detailed data analysis of population health information and clinical system activities allows managers to make incremental changes targeted at appropriate use, identified bottlenecks and system failures. When monitoring and evaluating projects, it is important to:

- Define and set achievable goals.
- Set measurable key performance Indicators (e.g. the percentage of people with a diabetes diagnosis as well as a diabetes health care plan)
- Maintain regular checks and milestones to ensure the intended direction is still able to be achieved.
- Ensure the scope of the individual projects are not being expanded beyond the capacity of the active participants.

5.2 Management of service risks

The standards state: *"Healthcare organisations should establish clinical governance frameworks to identify, assess and manage risks in the context of services available to rural and remote communities during the planning, implementation, operation, monitoring and evaluation of health services using digital technologies".*

Understanding and documenting the current state of healthcare within a community is a vital starting point for any project. This gives a clear description of what is working and what risks to health services exist. Understanding these gaps will provide the requirements for future initiatives. It may be of great value to conduct a survey of both healthcare professionals and other community members to analyse and compile suggested improvements to the local healthcare system. The survey could be followed by detailed case studies to more deeply understand the pain points within particular parts of the healthcare system. (e.g. a documented patient journey of a diabetic with circulation problems in the lower legs could reveal both issues with transfer of patient information through existing referral pathways and possible solutions to make the process more streamlined).

Healthcare organisations can apply the Australian College of Rural and Remote Medicine position statement on defining safe and quality procedural and advanced care in rural and remote locations. (Australian College of Rural and Remote Medicine, 2018 - 2021)

5.3 Providing services based on evidence

The standards state: *"Healthcare organisations should design health services using digital technologies based on the best available evidence for their effectiveness and efficacy in rural and remote contexts".*

Healthcare organisations need to develop the capacity to collect the best available evidence for interventions using digital technologies, and where that is not available undertake monitoring and evaluation of services to provide that evidence. Healthcare professionals have an obligation to review and interpret evidence that can lead to improved clinical practice. Community members should be encouraged to be involved in research by providing their personal experiences and points of view.

5.4 Integrating care using digital health services

The standards state: *"Healthcare organisations should consult with local health providers and communities to determine how digital health services can support the provision of integrated care between different health disciplines whether provided as an in-person or virtual service".*

Many people need to consult with one or more healthcare providers when managing their condition. Additionally continuity of care for health for community members may depend on the availability of specialists, local healthcare professionals and the facilities required to provide digital healthcare services. Appointments with a GP, allied health worker, specialist and a hospital may be needed.

In principle a digital health application, accessible to the patient can keep track of appointments, treatment, medications and referrals across multiple providers some of whom may be located far away from the patient's home. Even within a community coordination between a GP and a physiotherapist could be facilitated by a simple digital health application.

For instance, in 2022-2023, Gippsland PHN co-designed a Community Led Integrated Health Care Program (CLIHC) enabling people in Gippsland to access primary healthcare that meets local need. A CLIHC is defined as: An integrated and collaborative approach to Multi-Disciplinary Models of Health Care whereby the identification of needs, priorities and agenda for change is led by the community experiencing a health need. The health care model is patient-centred and includes professionals from a range of health disciplines working together to deliver comprehensive care that addresses as many of the patient's needs as possible.

5.5 Ensuring continuity of care

The standards state: *"When providing healthcare using digital technologies, healthcare organisations should support the maintenance of strong team relationships between healthcare professionals and community members grounded in the principle of ensuring continuity of care".*

Digital technologies can facilitate coordination of person-centred care and advice to community members by multiple care providers working as part of a team. Primary healthcare professionals need to be informed using digital technologies of any ongoing care prescribed by third parties, such as specialists, allied health professionals or nurses, so they are able to coordinate care and provide advice about ongoing care needs. Gulliford et al (2006) describes continuity of care from the perspectives of the healthcare professionals and the people they care for, and the need for keeping the individual at the centre of the process. This approach is underpinned by connectedness of health information and an efficient transition of care arrangement between professionals.

Maintaining continuity of care is important for community members who move from one healthcare service to another (e.g. a person visits the doctor for an annual check-up and may then be referred to a physiotherapist for a minor knee problem with other referrals for ultrasounds and x-rays). In this scenario, the diagnostic reports are sent back to the GP and possibly onto the physiotherapist if the digital systems are able to communicate between each other. If not, there is likely a number of phone, email or fax messages with health data being transferred manually from paper to digital and back again several times. These processes can be time consuming, error prone and vary from one organisation to another.

6. Engaging with communities

6.1 Engaging the community

The standards state: *"Healthcare organisations should collaborate with community members, and community organisations when developing, operating and evaluating services using digital technologies"*.

The benefits of community engagement have been observed and are distinguished by:

- Increased trust within the community.
- Greater acceptance of new services.
- Better level of satisfaction with services.
- Improved decision making for the use of resources.

Community engagement may commence through a group of collaborative individuals, motivated by shared goals representing key healthcare, community and government (local, state and federal) organisations and interested members of the public. Often volunteer organisations (e.g. Rotary, Lions, and sporting clubs) underpin social cohesion, social capital and general wellness in the community. Making connections with these local organisations and informing them of activities and formative goals, brings benefits and a better understanding of community needs

When establishing services using digital technologies for rural and remote healthcare communities a systematic process should be used to identify the community expectations and benefits of those services. Communication and marketing strategies can help to establish these expectations. Marketing the aims of the project to the broader community can be done through several media and social media outlets. Events can be advertised locally. Targeted campaigns through Facebook, LinkedIn, X and other social media can be a cost effective to deliver messages to people who have interests in digital health, and healthcare more generally.

Community members should be able to collaborate with healthcare organisations in designing how they access services and which digital technology platforms (e.g. mobile phone apps, browser-based websites, wearables) are used. Community members should be able to provide feedback through various methods and have confidence to engage with healthcare professionals using digital technologies such as by phone, video, email, SMS, apps or healthcare portals.

6.2 Partnering to encourage use of digital health services

The standards state: *"Healthcare organisations should pro-actively partner with national, state and local initiatives that aim to encourage and support use of digital technologies in communities"*.

There are national, state and local programs for improving the digital inclusion of First Nations people (see the First Nations Digital Inclusion Plan – July 2023), older people and other groups who may be marginalised from participation in digital services. Some examples of these programs include the Be Connected Australian government initiative, the Northern Territory inDigiMOB for Aboriginal and Torres Strait Islander people and NSW Tech Savvy Seniors program. Healthcare organisations should seek to establish relationships with these programs. Additionally, they should ensure patients are aware of patient support services provided by the healthcare organisation and national programs such as the Australian Patients Association support line.

At the local level, when local communities host festivals, or libraries advertise computer help sessions, then healthcare organisations should organise a physical presence and healthcare workers to provide information on and help with using digital health applications.

6.3 Consider digital health literacy across the community

The standards state: *"Healthcare organisations should collaborate with community organisations to develop actions that will improve the digital health literacy of community members when they engage with health services for appointments, giving consent, understanding care procedures, transitions in care and medication management"*.

For example, drop-in sessions in community hubs or libraries should include advice and training on how to use digital health applications such as appointment systems and My Health Record. Healthcare and community organisations can collaborate to ensure that digital health literacy is part of these sessions. At the national and state levels a number of community programs are supported which provide training for community members in the use of digital technologies. For instance, Be Connected is an Australian government initiative committed to building the confidence, digital skills and online safety of older Australians. Be Connected offers free learning resources online or via community organisations running free computer classes across Australia.

In the Northern Territory inDigiMOB is about improving digital inclusion for Aboriginal and Torres Strait Islander people in remote communities. It does this by forming partnerships with communities and local organisations and making available a suite of resources that communities can take advantage of according to their needs. The NSW government provides low cost or free training sessions – at beginner, intermediate and advanced levels – on the use of computers, tablets, smartphones and online applications such as email, social media and cyber safety through its Tech Savvy Seniors program. Training is available across a network of public libraries, community colleges, and also in a range of languages.

Healthcare organisation can take advantage of these programs to refer community members for training in how to use digital health applications if they provide staff to work within these programs with the necessary knowledge and skills

6.4 Community infrastructure for access to digital health services

The standards state: *"Healthcare and community organisations should provide and support access to digital health services in clinics, hospitals, community health centres and hubs, public spaces and libraries through partnerships and agreements with network providers and councils".*

Technically it is easy for healthcare organisations to provide publicly accessible Wi-Fi services which patients can use easily in clinics, hospitals, clinics. It is also important that community members who do not have internet access at home can access the internet through local council libraries. Internet access in public spaces and other places where people gather which may have poor internet connectivity is more difficult to achieve and requires negotiations between community organisations and internet service providers. Health care organisations can support these efforts by using their knowledge of community needs.

6.5 Extending access to digital health services

The standards state: *"Healthcare organisations should extend community access to digital health services for community members who do not have their own internet access, computer or portable device through mobile clinics or by taking a computer or portable device to the location where the community member resides".*

Not everyone resides in housing that has access to the internet. Mobile clinics can deliver healthcare to remote areas in Australia, but they face several challenges including maintenance and operating costs, recruiting and retaining healthcare professionals willing to work remotely, and gaining the trust of local communities, particularly First Nations communities, which requires a deep understanding of cultural sensitivities. Some examples of mobile clinics are the Central Australian Aboriginal Congress mobile clinic, the Queensland **CheckUP** service which visits regional, rural and remote towns and the **Rural Doctors Foundation** free health checks.

However for communities and places where people congregate to socialise or sleep the only way they can receive regular access to healthcare is if the local health service worker takes a portable device to that location to check on people's health needs and provide access to relevant digital health services.

6.6 Mentoring community use of digital health services

The standards state: *"Healthcare organisations should encourage staff to act as mentors for community members wishing to use digital health service".*

For example, a nurse or receptionist should be trained not just in the use of a patient admission system or My Health Record, but also equipped with the skills to help community members use these applications. Reception staff can assist patients enter their information into a patient admission system. Outreach nurses can help people access health information in their home and search their My Health Record. National initiatives exist to develop mentoring skills. For instance, through the **Be Connected** program, Charlestown Community Centre has supported 130 high school students and 46 community members so far to become digital mentors. Also, in NSW healthcare professionals can join the **Digital Literacy Foundation** as a Tech Mate or mentor who provides one-on-one support to help people learn about technology and use it confidently and safely.

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