## AIDH – Oracle Thought Leadership Roundtable 2025

# Reimagining Healthcare: The Digital Health Imperative

August 2025





### **Contents**

Background	3
At a glance	3
Recommendations	4
Introduction	7
Key messages to decision makers	10
Core focus issues	15
Artificial Intelligence (AI)	16
Workforce Capability	18
Infrastructure	22
Funding and Resourcing	24
• • • • • • • • • • • • • • • • • • •	

#### **Acknowledgment**

AIDH and Oracle Health acknowledge the valuable contributions and thank the Thought Leadership panel members Anja Nikolic, AIDH CEO, Julie Hoare, Oracle Health Asia Pacific, Sanka Amadoru, Geriatrician and Digital Health Adviser, and Chloe Shorten, Centre for Digital Wellbeing, expert facilitator Luli Adeyemo, and all the participants.

## **Background**

The Australasian Institute of Digital Health (AIDH) in collaboration with Oracle Health hosted a Thought Leadership roundtable in Melbourne to explore Australia's digital health future, particularly in the era of artificial intelligence (AI).

Previous Roundtable events were held in Brisbane, Sydney and Melbourne, with national leaders contributing their personal and professional expertise. Collectively, these experts in digital health and AI in healthcare discussed the rapidly evolving world in which health and patient care is being delivered today, and the mindsets and ways of working we need for tomorrow.

The output from the first Roundtable was published in 2024, Reflecting on the Future of Digital Health: Insights from <u>AIDH</u> and <u>Oracle Health's Thought</u> Leadership Roundtables.

## At a glance

# Five high-level themes and summary of recommendations

# 1. Enable Safe, Ethical and Responsible Use of Al in Healthcare



- Establish clear standards, legislation, and governance frameworks.
- Implementation of a public information and awareness campaign on the benefits and risks of Al in healthcare.
- Invest in AI research that addresses national healthcare needs.

## 2. Grow and Support a Digitally Skilled Workforce



- Invest in training, skills development, and career pathways.
- Embed digital health and AI skills into all health education.
- Amend award and pay structures to reflect the evolution of roles in healthcare.

## 3. Connect the System Through Modern Infrastructure



- Expand secure data sharing and interoperability.
- Continue funding critical digital health infrastructure initiatives such as Health Connect Australia.
- Standardise health information using national and international frameworks.

#### Reform Funding Models to Support Digital Health Adoption



- Implement funding mechanisms to ensure full adoption and participation by healthcare providers in digital health.
- Increase funding for education, research and innovation in digital health, including funding validation and testing of digital health tools.
- Prioritise funding of value-based care and integrated models of care.

#### Put People at the Centre of Digital Health Reform



- Involve patients and clinicians in designing digital health solutions.
- Drive consumers' adoption by promoting the benefits of digital health innovation.
- Validate digital tools in safe, test-and-learn environments.

### Recommendations

The purpose of the Oracle-AIDH Thought Leadership Roundtable was for digital health experts to discuss issues and present their views to Members of Parliament and decision makers to help inform and guide them. This paper captures the views of the attendees expressed at the meeting held in Melbourne on 28 May 2025. These discussions became the basis for this White Paper – a document on specific issues, providing background material, policy proposals, solutions to consider and recommendations to inform decision-making.

The Thought Leadership event was not designed to create specific, universally agreed-on recommendations. However, it is important to note that there are – rightly and justifiably – widespread, divergent and differing views on digital health policy, funding, and resourcing.

The sector is not homogenous.

The needs of industry, clinicians, allied health practitioners, consumers, vendors, academics, and researchers do not always align so neatly.

The current era is one of unprecedented change with technological advancements such as AI scribes, mental health chatbots, apps and wearables being developed and deployed at pace. This often means that policies and decisions lag behind what is happening in practice.

There are, however, recommendations that will help MPs and decision-makers.

## 1. Artificial Intelligence (AI) – opportunities, legislation and guardrails

- 1. Implement the recommendations of the AAAiH Policy Roadmap<sup>1</sup>, including public information and awareness campaigns.
- 2. Establish balanced guardrails, standards and regulations governing the responsible use of AI in healthcare, including data privacy and cybersecurity, and the broader application of clinical governance principles to ensure AI is safe, ethical, and aligned with the needs and values of the Australian population.
- 3. Support Al research and development to strengthen Australia's sovereign capability, ensuring research links directly to industry development and healthcare innovation, and to build a resilient, future-ready healthcare system that reflects local priorities and needs and promotes solutions that address national challenges—such as supporting rural and remote health services, managing chronic disease, and enhancing Indigenous health equity.

#### 2. Workforce capability

- 1. Maintain government investment and funding for the infrastructure builds, roadmaps and strategies underway. The Federal Government is on the right pathway to a digitally enabled health system if it continues to properly fund and resource current programs and policies, ensuring momentum is sustained and long-term benefits are realised for all Australians. Continued funding would enable critical infrastructure such as My Health Record, national interoperability frameworks, and secure data exchange platforms to mature and scale. For the Australian population, this would mean better care coordination, faster access to services, and improved health outcomes—particularly for people in rural and remote areas or those with complex health needs.
- 2. Fund and implement the actions outlined in the National Digital Health Capability Action Plan<sup>2</sup> and mandate minimum digital capabilities for all health professions to ensure a digitally competent workforce that can safely and effectively deliver care and adapt to future technology such as electronic medical records, telehealth, clinical decision support, and data analytics—enhancing patient outcomes and reducing administrative burden.
- 3. For the Digital Health workforce: a. Amend award and pay structures to reflect evolving roles in healthcare. This may require engagement with the Fair Work Commission to clarify the status, and recognition of health informaticians and other digital health and Al professionals (to update the Occupation Standard Classification for Australia and the National Skills Taxonomy); and b. Establish clear digital health career pathways with formally recognised structures to support long-term workforce development to attract, retain and grow a skilled workforce capable of supporting Australia's digital health transformation.
- 4. Increase the digital health capabilities of the entire health and care workforce through targeted investments in skills, training and career pathways to

ensure all professionals are equipped to deliver safe, efficient and connected care in a digitally enabled health system and support equitable care delivery across urban, rural, and remote communities.

- 1. Engage directly with clinical colleges and associations on workforce preparedness and digital health skills, including having digital health as a required component of all health (and health-related) undergraduate courses delivered through the University and Vocational Education and Training (VET) sectors.
- Include foundational digital health and Al micro credentialing in all professional development (PD) courses available to workers and practitioners in the health sector.
- 3. Increase digital health literacy amongst health professionals. This applies to clinical degrees including foundational digital health components, medical colleges and associations uplifting digital health knowledge, and greater uptake of appropriate training courses and professional development in digital health education. An ongoing hands-on learning approach is needed in clinical settings, so learnings are not just theoretical and able to be applied.

## 3. Standards-based infrastructure and Health information sharing

- 1. Expand provisions of Sharing by Default legislation and move towards a comprehensive 'sharing by default' regime to improve information flow between healthcare providers and enable timely, secure, and appropriate access to health information across the care continuum. This would lead to fewer duplicated tests, reduced medication errors, faster diagnoses, and smoother transitions between care providers.
- 2. Enact appropriate regulations and legislation that align Australia with international standards and developments where appropriate, especially around AI in healthcare and health apps to facilitate the integration of trusted global innovations while enabling Australian-developed technologies to compete and scale globally.
- 3. Commit to ongoing investment and support for existing digital health infrastructure programs, including an Australian HIE (Health Connect Australia) to provide a connected, interoperable, and patient-centred health system and enabling secure, real-time sharing of health information across providers, settings, and jurisdictions.

- 4. Build confidence in digital health and AI, sectorwide and with a specific public information and awareness campaign focusing on consumers and clinicians. This will help embed access and equity from design to implementation by improving digital health literacy, and, in particular, educate healthcare consumers, providers, and other stakeholders about the national HIE (Health Connect Australia) and its benefits, and on how health consumer data and health information is used, shared, and stored.
- 5. Continue funding for the accelerated development and maintenance of contemporary health informatics standards, including (but not limited to) the Sparked program, HL7, and the National Clinical Terminology Service (NCTS) to facilitate semantic consistency, reduce clinical errors, and enhance system integration across diverse care settings and software platforms and enable safe, consistent, and interoperable data exchange across Australia's health system.

#### 4. Funding and Resourcing

- 1. Deliver the recommendations in the *Strengthening Medicare Taskforce report*<sup>3</sup> as this will fast-track the myriad benefits from a more connected healthcare system that utilises the workforce and eliminates waste and duplication.
- 2. Continue investment in digital health policy initiatives, including the Digital Health Blueprint and Action Plan<sup>4</sup> and the National Healthcare Interoperability Plan<sup>5</sup> to provide strategic direction and sustained momentum for digital health reform, ensuring that infrastructure, workforce, and technology developments are aligned and integrated to drive coordinated, long-term transformation of Australia's health system.
- 3. Implement funding mechanisms under Medicare and introduce incentives to accelerate the uptake of digital health solutions—such as electronic prescribing, secure messaging, telehealth, shared care planning and embed digital tools as a standard part of care delivery.
- 4. Reshape funding models, including blended payments and other mechanisms, other than paying incentives to better align financial structures with value-based, team-oriented, and digitally enabled models of care. Blended payment models could include capitation, bundled payments, or outcome-based funding that rewards integrated, patient-centred care.

#### 5. Policies, Models and Approaches

- 1. Reassess risk mindset and culture in health policy that adapts to Al and digital technologies, and using data to enable more agile, evidence-informed decision-making in a rapidly evolving healthcare environment.
- 2. Engage directly with all health sector representative groups on considering new models of funding and collaboration, such as blended payments and remuneration for digital health devices, such as wearables and home monitoring. Support clinicians to engage with safe digital tools such as health apps so they know what is safe to recommend to patients, noting the AIDH is undertaking this through the Commonwealth funded mHealth project. We must ensure policies reflect the full spectrum of care and support more integrated, team-based approaches.
- 3. Engage with healthcare consumers in all stages of reforming and modernising health programs and services. Digital health can exacerbate digital divides and widen access gaps, hence the importance of working with consumers and their representatives to ensure changes are driven by real-world needs, lived experience, and what matters most to patients and families.

- 4. Provide mechanisms that help consumers navigate AI, particularly in clinical settings through education, training and ongoing support beyond initial implementation, encompassing a holistic approach to consumer empowerment.
- 5. Investment in health and scientific research that is useful and timely so research can provide a degree of assurance in this evolving space.
- 6. Invest in public promotion and awareness campaigns, to show the public the many examples of digital transformation initiatives improving outcomes, workforce benefits, clinician experience, and cost savings. This should also include explaining and educating the public about the role of AI in healthcare, data governance and the value of data sharing.
- 7. Fund ways of testing and validating digital health tools in a safe space such as University of Melbourne Centre for Digital Transformation of Health's Validitron.
- 8. Monitor roll-out and import solutions that work in other jurisdictions, such as the NHS Physiotherapy Al clinic launched in 2024.<sup>6</sup>



### Introduction

### Digital Health in a time of unprecedented activity

Following the May 2025 federal election a second Thought Leadership Roundtable was convened to provide specific guidance and advice to Members of Parliament (MPs) on the critical and timely issues in digital healthcare and AI over the next scheduled term of the federal Parliament (2025-2028).

Oracle Health and AIDH brought together digital health leaders and subject matter experts specifically curated to be representative of stakeholders across the health ecosystem, along with subject matter experts (SMEs) outside of health to advise on lessons and experiences from other industries. The attendees discussed collaboratively the priority issues, and the solutions needed to make Australia's health system accessible and equitable through digital health.

The leadership needed in advancing digital healthcare in Australia requires all Members of Parliament (MPs) to be across the issues so they can make informed, evidence-based decisions about digital health policies, legislative frameworks and resourcing.

The 2024 Oracle Health and AIDH Thought Leadership paper<sup>7</sup> acknowledged the progress and outlined the challenges in achieving the type of digitally enabled health system that is essential to meet current and future demands. These outcomes will only be realised through collaborations across federal, state and territory governments, industry, health service providers, clinical colleges and associations, peak bodies, policy experts, and health consumer groups.

The Thought Leadership Roundtables are occurring during a period of activity that will enhance patient outcomes and consumer health and well-being. As detailed in the paper, the Sparked/FHIR program, Health Connect Australia, modernisation of My Health Record, introduction of Sharing by Default legislation and investments in digital health are transforming healthcare.

A report by the Productivity Commission, Leveraging digital technology in healthcare, found that better integrating digital technology into everyday practice could save more than \$5 billion a year and ease pressures on our healthcare system.

The Productivity Commission identified improved use of data in electronic medical record systems (EMRs), better use of digital technology and artificial intelligence (AI), health consumer benefits for digital technologies (such as telehealth and remote monitoring); improving My Health Record (MHR), and better sharing of patient data as all leading to substantial improvements in healthcare and health system administration.

The Commission noted another key issue supported by Thought Leaders –that harnessing the power of AI is best achieved by building trust among healthcare consumers.

A cultural shift is required if we are to successfully transform into a digital health-enabled system. Australia's digital health system must be based on genuine collaboration, transparency, and a recast risk-based approach that does not hinder innovation. To achieve these outcomes, Digital Health Thought Leaders discussed the actions and outcomes only government can deliver — and only deliver by working with industry, vendors, researchers, academia, and independent health and consumer organisations. These broad actions include:

- Building confidence in digital health and Al, sector-wide and with a specific focus on consumers and clinicians.
- Increasing the digital capability of the entire health and care workforce.
- Rethinking funding models and investing constructively in digital health.
- Embedding access and equity in all aspects (from design to implementation) by improving digital health literacy.
- Enabling regulatory environments to keep up with technological pace, provide support to improve safety and support innovation.

There are commonalities in the key issues identified by Thought Leaders and other digital health experts. The widespread consensus on those issues was that much of the agreed necessary reforms have been articulated and restated over time, and acknowledgement that the Government has outlined well-described barriers to meeting these necessary reforms. That many attendees reported communicating similar themes to governments and decision makers indicates a collective advocacy position based on expertise, knowledge and experience on what should be invested in, enacted and/or commenced to progress digital healthcare

Of the many challenges Australian governments grapple with, none is more challenging than having multiple jurisdictions, agencies and organisations with overlapping and competing roles and responsibilities.

There is a degree of confusion and misunderstanding about responsibilities and decision making in health; understandably so as clinicians, practitioners, innovators and academics are not necessarily focusing on the mechanics of bureaucracies and ministerial administrative orders.

An example cited relates to the nursing workforce and nursing students. Multiple agencies and governments intersect with the nursing workforce; changing skills, training, culture and practice is therefore reliant on a complex set of relationships, jurisdictions and standards.

Australian Nursing and Midwifery Accreditation Council Australian Commision on Nursing and Midwifery Safety and Board - Ahpra Ouality in Health Care Workforce / Students Australian Government -Universities Education Department of AIDH Disability, and Health Departments of each State and **Territory** 

So much is happening in digital health and AI, and it's happening so quickly that most of us struggle to keep abreast of daily technological innovations.

The default position (not just in healthcare) is to call on government to act — be it through budget funding/appropriations, resourcing, policies, regulation and/or legislation. There is an ongoing challenge faced by MPs and Parliament to provide the best regulations, standards and funding priorities. This places additional pressures on MPs to be across a complex and rapidly evolving field.

This Thought Leadership report is intended to capture and distil high-quality, independent advice into a concise paper to assist MPs and decision makers who may be inundated with an abundance of advice, reports, recommendations, and lobbying from sector groups and health service providers.

This paper is not intended to be a comprehensive, detailed document capturing every aspect, policy or technology in digital health — such a paper would be an impossible undertaking, and would soon be out of date. Nor does it purport to represent the entire digital health sector. As noted previously, Oracle Health and AIDH curated a representative guest list across the ecosystem, and attendance was dependent upon those who accepted. We recognise that the Thought Leadership Roundtable did not fully represent Primary Care and Primary Health Networks (PHNs), and others who were not able to participate.

Instead, the paper provides an overview of the core focus areas and the views of participating experts that are primarily addressed to federal MPs and stakeholders, however, given the systems complexities mentioned above, will also be insightful to state and territories representatives.

Our message to MPs is that we welcome and support the many significant advancements that are transforming Australia's health sector, driven by the expansion of digital health solutions across both administrative and clinical domains. These innovations are already delivering measurable benefits across all dimensions of the quadruple aim of healthcare, including:

- 1. improved health outcomes through safe and enhanced information sharing amongst healthcare providers, and advanced diagnostic and therapeutic care;
- 2. a more streamlined and seamless experience for consumers navigating the healthcare system;
- 3. reduced administrative burden and increased efficiency for healthcare providers to prevent burnout and workforce attrition; and
- 4. greater efficiencies across the system delivering better value for money.

We also weclome the commitment of the current federal Labor Government to fund and resource existing plans, reforms and projects, which are delivering the type of health system needed to meet future demand. The federal initiatives underway include:

**National Digital Health Strategy and Strategy Delivery Roadmap:** directing delivery of national infrastructure policies on data and technology, focusing on health consumers, their carers and healthcare providers.

**Digital Health Blueprint and Action Plan 2023-2033:** setting out a 10-year vision and policy agenda for the role of digital health.

**National Healthcare Interoperability Plan 2023-2028:** outlining a national vision to share consumer health information in a safe, secure and seamless manner and identifying 44 actions across five priority areas relating to identity, standards, information sharing, innovation and measuring benefits.

**Intergovernmental Agreement on National Digital Health 2023-2027:** enabling interoperability and connected data across Australia's health and care settings to support high-quality patient care and improve the efficiency and sustainability of the health care system.

Ongoing modernisation of My Health Record: essential to making critical digital health information more easily accessible (via FHIR-based interoperability), including expansion of Sharing by Default legislation and faster access to health information.

**Health Connect Australia:** managed by ADHA, it will provide much safer, faster and more connected care through the real-time and interoperable data exchange between general practitioners, specialists, allied health professionals and the hospital system.

**Capability Action Plan:** setting out the initiatives including working towards standard capability frameworks, guidelines, resources and tools identified through previous work, planning, and ongoing engagement.

**Sparked:** Australia's first FHIR Accelerator will enhance digital health data interoperability. Through a collaborative, community-driven approach involving clinicians, software developers, and health organisations, Sparked is creating core data sets like the Australian Core Data for Interoperability (AUCDI) to standardise clinical information exchange. This initiative seeks to improve healthcare delivery by ensuring seamless, secure sharing of patient data across Australia's healthcare system.

Recommendations from the **Strengthening Medicare Taskforce** report (2023) and from the **Scope of Practice** review final report (2024): both reports recommend investing in digital health as a requirement to build a more efficient, connected and collaborative healthcare.

We also acknowledge the many plans and strategies implemented at the state and territory level as well as initiatives led by health services themselves.

## Key messages to decision makers

Australia's Thought Leaders are subject matter experts (SMEs) in digital health. Their expertise ranges across academia and research; clinical practice (GP, specialists, nursing, and allied health); technologists, policy makers; medical administration; vendors and innovators; chief information officers, chief clinical information officers and CEOs.

Before addressing the four specific focus areas discussed at the Thought Leadership roundtable, a panel discussion articulated major messages for politicians and decision makers to consider.

#### We need regulations and safeguards.

Implementing best practice, evidence-based legislation, standards and guidelines is a crucial task of the Australian Parliament.

The critical importance of regulation and safeguards cannot be emphasised enough. If the sharing of patient data and clinical information is not properly regulated and safeguarded, we may see growing fears and undermining of trust in the health system. This applies to patients/health consumers use of monitoring devices and apps. In the absence of regulation, we may see greater misuse and mistrust in 'best practice' safe, secure and trusted healthcare.

Al scribing is an example cited by Thought Leaders. Used properly, it is an efficient tool that can help make patients feel safer, ensure accurate documentation, improve efficiency and reduce costs, especially where Al scribes are integrated natively within electronic medical record systems. 10 In the UK (April 2025), the NHS issued guidance for adopting Al scribing technologies, mandating that all AVT (Ambient Voice Technology) solutions used must meet NHS standards, with non-compliant tools prohibited. 11

To provide certainty and surety in digital health, the government must continue sector engagement, including with healthcare consumers, as it enacts standards that safeguard patients and allows

vendors and industry to innovate. We already see this happening with the TGA (Therapeutic Goods Administration), DoHDA (Department of Health, Disability and Ageing), the Australian Commission on Safety and Quality in Health Care (ACSQHC) and DISR (Department of Industry, Science & Resources), and we urge continuation of broad consultations and a plan of outcomes that gives the community greater assurances about digital technologies. This approach also complements the work already undertaken with the national health professions regulator, the Australian Health Practitioner Regulation Agency (Ahpra)<sup>12</sup> and the Royal Australian College of General Practitioners (RACGP)<sup>13</sup>. It also accords with the views expressed by the CEO of the Consumers Health Forum of Australia (CHF) who recently called for clear safeguards for consumers.14

Broadly speaking, healthcare consumers understand what good healthcare looks like, based on their experience with the health system – even in the absence of digital health literacy. They know the benefits of ePrescribing and My Health Record when it provides more streamlined, accessible care, and saw this in sharp focus during COVID. Not everyone may be conversant with Value Based Care or Ambient Voice Technology, but they understand how the health system could be optimised to be more accessible, affordable, safe, standardised and above all, outcome focused.

## Public information campaigns are essential.

There is a vital role for governments in delivering public education and awareness campaigns on how digital health will benefit individuals (and sectors); this is also needed to overcome resistance to change and fears about data safety.

It was noted by attendees at the roundtable that Australian governments have a very solid track record in delivering public health information campaigns when transformative measures have been initiated, such as skin cancer prevention (Slip! Slop! Slap!); Health Prevention (Life Be In It and Measure Up); driving & accident prevention (Click Clack Front and Back and Drink Driving — Bloody Idiot); vaccinations (No Jab, No Play / No Jab, No Pay); drink driving campaigns, and more recently, COVID-19 public health (Arm Yourself; It's safe. It's effective. It's free and COVID-19 vaccines. Get the facts).

Mandatory sharing of patient data and the transformation to a digital health system must be supported by a similar public awareness and information campaign.

We support the efforts to promote My Health Record ("It's your health. It's your record."), and point to overseas examples, such as the UK "One login. One app. Your health." campaign and Canada Health Infoway "Better Health Together" that are aimed at broader awareness of digital health technologies.

## The barrier isn't technology – it's risk mindset and culture.

Technology alone won't transform the health system – we must have a properly skilled, and sustainable health workforce using digital health technology with confidence.

We have the technology available to transform Australia's health system; what we don't have fully developed (yet) are the policy settings and architecture that unifies the disparate and sometimes ad hoc advances; nor have we yet achieved comprehensive workforce capability in digital health. As noted later in this paper, disparities and inequities in the healthcare workforce capability and culture are creating uneven and inconsistent adoption of digital health initiatives, with downstream impacts on health service delivery.

Australia has made huge advancements in achieving what we want from a digitally enabled healthcare

system – by this we mean a health system that is adaptable and responsive to the way Al and digital technologies can drive efficiencies, savings and better patient outcomes – however, we must rethink the cultural and structural barriers that hinder reform.

Understandably, there's a culture of risk aversion in Australia's health system, but we acknowledge that risk is already prevalent in a system that involves a complex interplay between technology, human factors and the broader organisational context; indeed, it has always been prevalent. When things go wrong in healthcare, consequences can be catastrophic at an individual and population level, in ways that can be irreversible and cannot be compensated for. Nonetheless, health policies and practices are operating in an environment of risk management that could be improved. What is needed is a rethink about managing and understanding risk in healthcare as part of structural changes, including in funding, workforce capability and clinical practice.

There is a level of concern about innovation and what can go wrong; yet not all Australian governments have established a consistent innovation agenda to reshape and manage risk in healthcare. Clinical colleges and associations, industry, and regulators look at risk as it affects their members and craft group — risk should be seen through a much wider, intentional, cohesive and multidisciplinary lens that learns from other industries and that is agreed on and more intentional, reflecting the needs of the community.

There are potentially serious risks with using AI tools in healthcare, as there are acknowledged risks in not using technology that improves patient outcomes and administration, and can deliver myriad efficiencies and savings. We recognise that different parts of the health system have different challenges depending on their funding mechanisms, size, and workforce.

Accompanying a reassessment of risk is the need for increasing diversity in decision making. Digital health, if not implemented through an equity lens, risks exacerbating health divides.

While digital health is embedded in many areas of the health system, we still see some hospitals and primary care providers disconnected and using paper-based systems and lacking the requisite supports, advice and training to modernise.



#### **One London**

OneLondon was cited as an example that Australian policy makers should look at as it is an interoperable model successfully implemented that can guide and inform us.

OneLondon is dedicated to sharing information safely and securely to deliver better, more joined up care across London. Its initiatives include the London Care Record, the Universal Care Plan and eMental Health Act platforms.

Jocelyn Palmer, programme director for OneLondon, presented a keynote address at HIC2024,<sup>15</sup> explaining how information sharing at scale, across multiple organisations and spanning health and social care, delivers considerable benefits. OneLondon reaches across different integrated care systems across the city, focusing on information and sharing, supporting acute, primary and aged care settings, ambulance, mental health and palliative care and accessed by more than one million health and care professionals each month. It has the ambitious goal for London to be the healthiest city in the world with the best healthcare services.

To achieve their aim, OneLondon is trying to transform the way the health system functions. London, like Australia's major cities, is incredibly complex offering an enormous range of health services. And, like Australia, they provide services to people from regional areas and those disconnected or unable to access community health services.

Interoperability is a key challenge across health and care and the OneLondon experience is highly relevant to the goals and ambitions of Australia's National Interoperability Plan. Interoperability is also a strategic priority in Australia's National Digital Health Strategy which states "the interoperability of clinical information is essential to high-quality, sustainable healthcare in which clinical information is collected in a prescribed manner and can be shared in real time with patients and their providers."

Data shows that the London Care Record is a vital tool in supporting safe prescribing of medications, faster hospital discharges, and facilitating staff spending more time with patients. A recent update to this study found that, based on nearly 71 million uses of the London Care Record up to the end of March 2025, the value of time saved is estimated to be up to £135 million. Up to January 2025 the value of time saved equated to up to £4.6 million per month, and the amount of time saved was estimated to be around 109,166 hours each month (6.5 million minutes).

https://www.onelondon.online/wp-content/ uploads/2025/07/London-Care-Record-Independent-Economic-Evaluation-July-2025.pdf

#### Be wary of technology-driven urgency

MPs, decision makers and healthcare providers (both public and private) should stop and think about what is driving change. The rush to invest in technology for the sake of it, or to build EMRs and local networks that are not interoperable, is already a significant issue. We know that fragmented systems create data silos, hinder care coordination and add to clinician workload. Instead of improving outcomes, they often increase cost and complexity, highlighting the need for thoughtful, integrated solutions. The risk of falling behind, also called "technology-driven urgency" or "innovation pressure", is driving investment in health technologies, including AI, even if it is not fully understood what the value of the investment is.

Many factors drive this rush: fear of losing competitive advantage, of being behind other health services or hospitals, not reaping efficiency gains or savings, not complying with roadmaps and digital health strategies, not fully understanding or evaluating the return on investment (ROI), not leveraging existing investments, and reputational risks of not being a digital health innovator.

There have been sizeable investments from governments over many years to create better mechanisms for consumers to access their health information, for example My Health Record and these solutions have not always delivered against expectations.

We need ongoing Commonwealth leadership, with states and territories, to align their shared visions and strategies in integrating acute and primary care services and systems.

It may sound simplistic, but asking 'why', as in 'why are we doing this?' is a question that can be missed in policy and procurement deliberations. Is there a critical mass that needs this technology? Why are we undertaking change? Are we using technology to answer a problem that doesn't exist?

The pace of technological advancements can be daunting; so, our recommendation is that those responsible for digital health policies, funding and practices must first ask the question — is this the best way to improve outcomes for health consumers (patients) and healthcare providers?

Thought Leaders acknowledge the rush to invest in 'shiny new toys' (be they physical or digital), and that the haste to purchase the latest technologies and programs may not always be accompanied by robust clinical processes, best available evidence, and clinical governance to ensure safety, efficacy and value.

A consequence is technology change-induced burnout, a well-documented and significant workforce problem. Burnout is, paradoxically, intensified by the sheer pace of Al and digital technologies. Keeping up to date with training and skills needed to practice in a digitally enabled health system is proving a barrier to some practitioners. There is a hesitation to shift from the confidence of expert at local systems and handwriting to the unfamiliarity of digital tools and EMR's.

There is a perceived 'wariness' with Al. The evolving landscape is almost impossible to keep pace with. This places additional burdens on healthcare providers and clinical practitioners and front-line workers.

A lesson from the first Industrial Revolution (1760-1840) is that where progress is driven by the rapid rate of technological innovation, it can also lead to poor working conditions, displacement of traditional work and skills, environmental degradation and social inequality. This is not to equate Al and digital technologies with introduction of the steam engine, textile machinery and machine tools; however, history should guide decision makers that rapid and transformative changes led by technology must be accompanied by safeguards, standards and social supports.

#### Don't make dissimilar comparisons

Mirror, Mirror 2024: A Portrait of the Failing U.S. Health System<sup>16</sup> compared and ranked the healthcare performance of ten wealthy countries. The report found Australia, the Netherlands, and the United Kingdom ranked highest in overall performance, noting that the differences separating most countries was relatively small, except for the USA, where health system performance was found to be considerably lower.

Far from portraying a broken health system, Australia was ranked at the top of several important measures, including Health Care System Performance Compared to Spending and Equity, meaning we have among the smallest differences in healthcare access and care experiences between those on below-average and above-average incomes. Australia also ranked first in Health Outcomes, slightly ahead of Switzerland and New Zealand as the best performed of the 10 wealthy countries measured (the USA ranked last). Australia was lowly ranked in the Access to Care indicator – we sat with the USA at the bottom.

These comparisons do not reference geography or population density. Australia is the 6th largest country in the world by land area, a population of about 27 million people, and a population density of 3.5 people per square kilometre — one of the lowest in the world. The Netherlands, by contrast, is tiny, has a population of over 18 million people, and a population density of about 544 people per square kilometre, the 12th highest in the world. Germany is one of the most densely populated nations in Europe (approximately 241 people per square kilometre) with a total population of over 84 million.

The sheer size of Australia, and its low population density, presents unique challenges to healthcare provision, and can skew international comparisons and rankings. Comparing Australia with European nations or dissimilar countries is complicated because of our historical, geographic, cultural and political differences.

The Thought Leaders Roundtable recognised the exceptional circumstances Australian governments confront in providing healthcare and related services across highly variable population densities, with over 86 per cent living in urban areas.

No governments to date have found solutions to equitable access to healthcare for non-urban residents. In regions with low populations and in remote Australian locations we cannot easily replicate the GP after-hours services used in Germany or the Netherlands.

The Labor Government's Urgent Care Clinic model is designed to provide enhanced after-hour GP access; yet UCCs are mostly operating in large population areas, and this means Australians living in rural and remote areas may not have access to these novel models. There are also differing views on how and where this model should be applied. The recent implementation challenges of some UCCs in regional areas highlights just how challenging 'the tyranny of distance' is<sup>17</sup> to overcome.

Practical solutions to bridge these healthcare gaps are already in wide use, and continuing to leverage telehealth, remote monitoring, ePrescriptions, virtual consultations, and mobile health platforms, digital health can deliver timely, high-quality, and equitable care to people regardless of where people live. This approach not only enhances access but also supports better health outcomes for individuals in underserved communities across the country.

We do know however that some communities continue to experience barriers in accessing such solutions due to poor or absent telecommunications infrastructure. Reforms would benefit from cross-portfolio consultation and strategy to ensure outcomes are aligned and targeted for impact across all areas.

### Core focus issues

The challenges facing Australia's healthcare system are well known – we have an ageing population which increases demand for services; there's a rising prevalence of chronic diseases and complex health conditions; inequitable access to healthcare based on location and socioeconomic factors; rising costs of healthcare delivery that places increasing pressure on health services and system; and workforce shortages continue to hinder service delivery. There are also well-described challenges in obtaining agreement on priorities across different groups of stakeholders. What manifests as a priority for one group of stakeholders can be different for another, and alignment is needed to bring a bigger picture consensus on what is best for consumers as they traverse the health system.

Digital health and AI in healthcare offer solutions. As described below, the Thought Leadership Roundtable outlined measures and initiatives that should be undertaken or commenced over the next three years.

Four key themes were discussed at the Thought Leadership roundtable:

- Artificial Intelligence (AI)
- Workforce capability
- Funding and Resourcing
- Infrastructure

### **Key Themes**

#### **Artificial Intelligence**

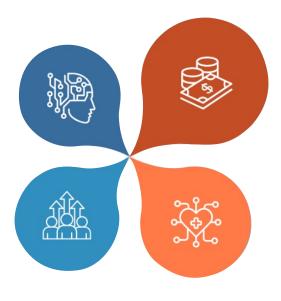
## The heathcare sector wants uniformity

- National frameworks, policies and roadmaps
- Al guardrails and standards

#### **Workforce Capability**

## The workforce needs to be better equipped

- Education on the health system, ethics, and digital health
- Clear digital health career pathways



#### **Funding and Resourcing**

#### Fund high-value care

- Preventative health with outcomes-based frameworks
- Establish digital health funding

#### Infrastructure

## The public wants safety and standards

- Robust, clear data governance
- Legislative frameworks with space for innovation

## **Artificial Intelligence (AI)**

Al is a tool that can help improve diagnostics by screening medical images, predict certain conditions by analysing patient data, identify targeted medical interventions, personalise medical care, support clinical decision making, underpin remote monitoring through wearables, and improve hospital logistics, staffing, patient flow, billing, scheduling and other reductions in health bureaucracy.

Al does not replace humans or health professionals. It is also not the only significant digital health technology used in healthcare. We support a balanced approach that doesn't relegate other, non-Al, technological innovations.

Although Al in healthcare is not new, what we are seeing is rapid embracing of large language models (LLMs), such as ChatGPT, which have captured public awareness of Al. Alongside the use of Al tools for general purposes, we are witnessing extraordinary advancements of Al technologies in healthcare.

As with most revolutionary technologies, Al also creates complex ethical and regulatory issues that only governments can address. Governments must do this through concerted investment in public awareness campaigns, educating the public about the use of Al, how health data and information is used and protected, and what it means for clinical decision making. Asking healthcare consumers/ patients what they want and what they will tolerate is a part of building public trust as people need to see the benefits and how Al can be tailored to improve their health experiences.

The most important message to policy makers is that the use of AI in healthcare requires their support to build public trust, and the legislative framework to enforce safe and ethical clinical use. Without public trust and confidence, it will be much more difficult to transform into a digitally enabled health system.

Despite this obvious need, there has not yet been any comprehensive public information or awareness campaign to raise digital health literacy and general knowledge about AI in healthcare. It's not that there hasn't been attempts by government and industry to do this, but they have been targeted consultations across industry (clinicians, vendors, peak bodies, government agencies), to inform a pathway to safeguarding. They have not been targeted broadly at consumers. It is also acknowledged that it's not just consumers who need this — healthcare practitioners and professionals also want better information, advice and regulations about using AI.

Safe and effective use of AI also requires robust clinical governance across all parts of health, underpinned by guidance and education – the policies and toolkits to support embedding proper clinical governance. This includes governance policies on procurement contracts as patient data will likely be a component of healthcare technologies.

Thought Leaders support and welcome initiatives underway, such as the Al in Healthcare National Policy Roadmap created by the Australian Alliance for Artificial Intelligence in Healthcare (AAAiH)<sup>18</sup>, which offers a wide-ranging and sensible national policy agenda for Al in healthcare.

Investing and promoting sovereign AI capabilities can be realised through directed investments in AI research and development; however, this needs to be bolstered by a national AI strategy that supports innovation and sustainability.



## Challenges and Opportunities

The most pressing issue for governments is to continue to provide national frameworks, roadmaps and policies that create a greater level of consistency and structure on the use of AI in healthcare.

The sector is repeatedly calling for specificity on Al guardrails and standards. The Department of Industry, Science, and Resources (DISR) published a proposals paper on the introduction of mandatory guardrails in high-risk settings (including healthcare)<sup>19</sup>, the outcome of which is pending. The TGA and DoHDA have also been undertaking consultation across the sector as to what is needed to support the safe use of Al in healthcare.<sup>20</sup>

As previously noted, AI scribing in the UK has now been classified as a medical device, while here in Australia the outcomes arising from the consultation are being considered by Government.

Individual States and Territories have published their own guidance, alongside the Ahpra and RACGP (as referred earlier).

The healthcare sector wants uniformity. There were several suggestions expressed by Thought Leaders about how this could be done — including a Federal digital health funding pool, similar to the Medical Research Future Fund (MRFF) dedicated to supporting the implementation of digital health solutions in healthcare. Whatever mechanism is adopted, it is clear that a national approach led by the Commonwealth is needed to safely progress Al.

A logical follow-on from this recommendation is some type of Al Maturity Assessments, ranging from

voluntary guardrails to mandatory standards and regulations. The sector has been repeatedly calling for this – and it could be done during the current term of Parliament.

There are risks in the use of AI in healthcare, and these need to be balanced alongside the opportunity that AI presents to patients, practitioners, clinics, hospitals, and researchers. The role of government is to take the lead in establishing the mechanisms and methods to assess AI risk and compliance to standards. In essence, we want policies and regulations for transparency on how AI will be used in healthcare, including enforced consent and privacy legislation, along with standards for data linking, unified research data, and scaling up data linking frameworks.

There are well-founded concerns about cybersecurity and health data harvesting. As stated earlier, public information campaigns are critical to the trusted uptake and use of Al. This is particularly essential in public understanding of the difference between personal identified data and deidentified data, between healthcare data and wellness data; and data collected from wearables.

Recent issues relating to US foreign jurisdictional control over infrastructure, cloud vendors and data require clarification by the Australian government and what their policy is on data sovereignty and storage.

The Federal Government should communicate its position in relation to these issues, to explain access, use and storage of data, and share with the public their vision of our Al future.

## **Workforce Capability**

Australia's health workforce digital capability must be considered a priority if we are to maintain a world-leading health system.

Australia is experiencing a shortage of specialist digital health workers, in particular the data scientists and IT experts needed to support the adoption of digital health. The public hospital and healthcare sector is not able to compete on salaries with the private sector for this specialist technical workforce. The discourse about how best to address workforce capability has been very much focused on the hospital and the tertiary sector, and we urge this be expanded to include Primary Health care, which is experiencing similar pressures with digital health workforce capabilities.

The consensus is for mandatory minimum digital capabilities for all healthcare professions, with defined digital health career pathways and formally recognised structures to support long-term health workforce development.

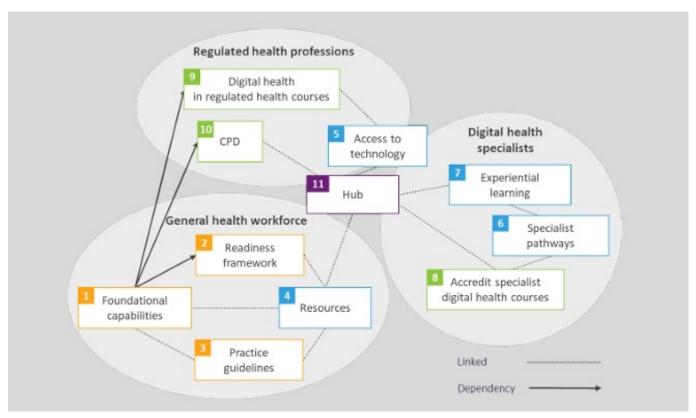
Currently, Australia's healthcare sector represents our largest workforce, employing over 2 million people, or about 15 per cent of the national workforce.<sup>21</sup> Yet, despite the large size, there are ongoing workforce shortages, skills shortages, and underdeveloped digital health capabilities. This is most acute in primary care, aged care, nursing, and allied health.

The need for a digitally capable workforce isn't a policy option, it is critical to support the rapid advancement of health technologies. Only in investing in a skilled, adaptable, and supported healthcare workforce through structured education, training, and career pathways will we see the true benefits of Al and digital technologies fully realised.

Thought Leaders proposed a range of comprehensive actions for governments and their agencies to pursue to achieve the workforce capability standards required.

To start with, we support mandated minimum digital health capabilities across all healthcare professions and funding initiatives. These have been outlined in the *National Digital Health Capability Action Plan*, and we support the continued progress and investment by the Labor Government in the CAP.

We also stress that a key element is having an 'authorising environment' that, to put it colloquially, makes things happen. There are, as mentioned previously, multiple agencies and peak bodies that have different but interrelated functions and powers.



Source: Australian Digital Health Agency (ADHA). (2021). The National Digital Health Action Plan.

### Challenges and Opportunities

The most difficult challenge for the Federal Government relates to how clinicians and healthcare practitioners use digital health technologies and systems. What's evolving in Australia is extemporary and expedient; healthcare professionals and other staff successfully using systems and technologies in one area or hospital may have to learn a different system when they move in and out of other hospital departments/areas.

This is why foundational learning or foundations of digital health education and training, in particular standards for accreditation and degrees, become critically important. CHIA (Certified Health Informatician Australasia), a professional certification that recognises expertise in health informatics across Australia and New Zealand offered by the Australasian Institute of Digital Health (AIDH) is perhaps the most recognised accreditation.

The Australian Digital Health Agency's National Digital Health Workforce and Education Roadmap, published in 2020, outlined a set of expectations required for use by all professionals working across the health sector, and is still relevant today. The purpose of the Digital Role Profiles Framework is to articulate the expectations of the health workforce as a result of the adoption of digital health. It is designed to provide clarity for key education and health partners who will develop curricula, training and resources to assist the workforce, and to empower health workers and consumers to recognise and grow their digital capability. The expectations identified in the digital profiles can serve as a reference point when planning workforce digital literacy education to promote the safe, ethical and efficient use of systems of record.<sup>23</sup>

Al is a challenge (see Artificial Intelligence section above), not just in how we use it, but in the training and skills needed for fast adoption across the disparate sections of the health system, and the differing degrees to which those in healthcare will use and understand Al. We cannot assume that the younger generation (often called 'digital natives') will automatically be better equipped to learn and use Al and digital health more easily. To ensure the next generation of healthcare workforce is competent and capable in using Al tools in their practice safely and responsibly, there is a need to invest in consistent training, education, and practical learning. At the moment, it remains dependent on each university's curriculum and approach to upskilling.

A major problem confronting governments and policy makers is that the pace of change in healthcare technologies is faster than the clinical evidence, and the ability of the workforce to learn, adapt and adopt.

Thought Leaders emphasised the urgent need to better fund undergraduate education institutions to ably support digital health preparedness of healthcare providers. This could involve funding continued education by recognising micro-credentials and formal training for existing workforce to upskill and meet the needs of digital health systems and solutions.

There is some activity in developing standardised frameworks for digital health educational competencies; however, there needs more collaboration on standardised education, certification, and regulatory frameworks to ensure the sector's sustainability.

Concerns were expressed about the lack of knowledge in the higher education sector, including education professionals, with students requiring more than education in technology; a greater understanding of the health system, including funding and policy, as well as in ethics and privacy matters, is needed. As funders of higher education, the federal government can play a role in guiding curriculum development so graduates are educated and better prepared for the workplace.

Relevant undergraduate courses must include competency frameworks in digital health — essential learning prerequisites for nursing and midwifery, allied health, and general medicine, and where existing topics such as ethics, governance, privacy and security can be contemporised to reflect digital health. We note the Labor Government is investing in an Allied Health Digital Health Uplift Plan, and the Digital Health Agency and Department of Health, Disability & Ageing are funding capacity building programs — but undergraduates should be taught the skills and competencies in Al and digital health so they are job ready.

Undergraduate students need early and ongoing exposure to digital health tools — particularly EMRs — supported by dedicated university funding to ensure accessibility throughout their studies.

We can provide more detailed evidence to government – especially if there is a Senate inquiry into healthcare workforce capability. Experts shared their experience of undergraduates not properly trained to use digital health tools, not sufficiently across EMRs (Electronic Medical Records) and not sufficiently au fait with the principles of using digital health.

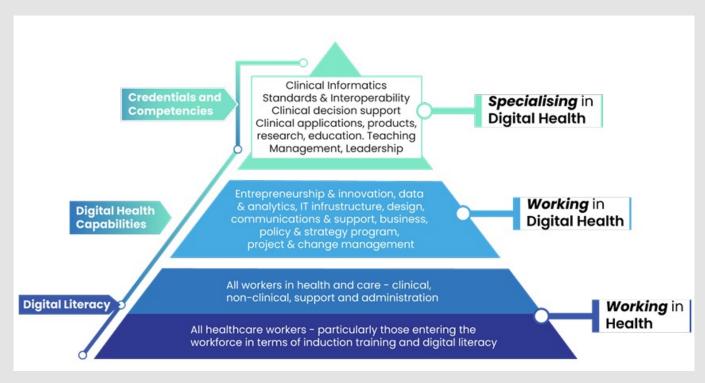
Experts also said that undergraduate students were not necessarily aware of nursing informatics and other roles in digital health – promoting educational opportunities and embedding digital health into undergraduate degrees was emphasised as vital measures in attracting students and building workforce capacity and capability.

Embedding a standardised evaluation of the efficacy of digital health tools would greatly benefit students by instilling the skills needed to be able to evaluate the efficacy of digital health tools.

Education and training need to equip the future workforce with the knowledge and confidence to understand innovation and how to use systems that are not just clinically led, they are also operationally led.

We recognise that capability frameworks exist

— the emphasis here is on government more
directly supporting the workforce in meeting these
frameworks. Academics in the digital health sector
have the subject matter expertise to guide government
decision making and bridge the Higher Education and
Health sectors to train the workforce we need. The
table (below) illustrates the pyramid of digital health
literacy and knowledge we're emphasising.



Source: ADHA and AIDH. (2024). Digital Health Career Pathways V1.2. <sup>24</sup>

It is commonly acknowledged that many experts in the digital health workforce 'fell into' their roles. There is important work being undertaken by AIDH and the Australian Digital Health Agency (ADHA) in providing information on careers in digital health.

The health sector needs transparent digital health career pathways with formally recognised structures to support long-term workforce development. We also need to revisit award and pay structures so they reflect the changing digital health skills needed by healthcare workers.

The Australian Government should engage with the Fair Work Commission and the Australian Bureau of Statistics (regarding the Occupation Standard Classification of Australia (OSCA)) in a review of the roles and awards for non-clinical digital health workforce (including but not limited to health informaticians, Al experts, technologists, data scientists, healthcare administrators and other relevant occupations). Such a review could lead to the establishment of a digital health roles classification framework that would facilitate structured digital health career pathways. Thought Leaders want remuneration and recognition disparities for health informaticians and digital health professionals addressed given the historical gaps in representation which impact progress and opportunity.

A lack of an established classification structure is impacting on workforce development and professionalisation. This highlights the importance of recognising professional classifications (and associated pay levels) in establishing clear career pathways for digital health professionals, and ensuring structured workforce development and professionalisation. The recent Specialist Digital Health Workforce Census<sup>25</sup> underscored the pressing need for a well-supported, professionalised digital health workforce.

In digital health and informatics, career pathways must progress from foundational skills, to intermediary and then proficiency to become a CNIO (Chief Nursing Informatics Officer - senior nursing leader responsible for aligning nursing practices with healthcare information technology and other clinical technologies to support nursing workflows and patient care); CMIO (Chief Medical Informatics Officer, physician executive who bridges clinical practice and information technology and ensures that EHRs and clinical systems support effective and safe medical care, acting as liaisons between IT departments and medical staff), CPIO (Chief Pharmacy Informatics Officer (also called Chief Public Information Officer) who focuses on integrating pharmacy practice with informatics systems such as electronic prescribing, medication safety tools, and automated dispensing technologies), and CAHIO (Chief Allied Health Informatics Officer) who play a vital role in bridging the gap between clinical practice and digital health within the allied health professions.

The best way to lead the digital health transformation is by ensuring there are people of proficient capability in executive roles across health organisations.

Governments can support these frameworks and pathways through cross-portfolio linkages and by prioritising healthcare workforce development, and in so doing, the Federal Government can ensure Australians receive the best possible care in an increasingly digital world.

Another aspect of career pathways is the way healthcare workers access and use career professional development and skills-based training. Typically, hospitals, health services, private practitioners and clinics will undertake their own CPD and upskilling. Training of staff cannot just be through LMS (Learning Management System, a software platform designed to create, deliver, manage, and track educational or training content) as this doesn't always work; LMS training doesn't necessarily provide the level of innovation in education that supports digital thinking. Developments in immersive professional training demonstrate the value of integrating cutting-edge technology such as virtual reality and AI in clinician training.

Alongside the clinical and health care executive workforce, non-clinical health workers need to be better supported to use and confidently implement and maintain digital health technologies. We emphasise that it is often these workers – pharmacy assistants, reception and administration staff and aged care and support workers – who are asked to help or explain digital health systems, such as My Health Record, ePrescriptions, data sharing and so on. The Digital Role Profiles framework referenced earlier also encompasses the expectations needed to consumers support the non-clinical health workforce to more confidently use digital health tools and technologies.

So, at the one end of the spectrum we have highly skilled and qualified informaticians, clinicians, practitioners and executives; but we also have an inexperienced workforce oftentimes operating in the same environment or setting.

Healthcare operates in very diverse settings, among very diverse craft groups and with very different roles within each craft groups. This is why we are calling for the establishment of a fit for purpose digital health capability framework/career pathway, with appropriate levels of accreditation (different for different craft groups) for healthcare practitioners.

As Thought Leaders reiterate, all aspects of healthcare services and delivery rely on a well-trained, competent and safe health workforce.

### Infrastructure

The use of digital health and health information sharing technologies, when it is based on agreed standards, modern infrastructure and cloud capability, judicious AI integration, and the right legislative and regulatory framework from governments, can provide the right setting to realise the ambition that digital health can deliver: reduced healthcare costs and efficiencies, improved clinical care and health administration, and – most importantly – improved health outcomes. Infrastructure is not just the 'roads and bridges' to get there but the foundation for equitable and resilient innovation and growth, building stronger systems for healthier lives.

Much has previously been said about infrastructure as capacity and capability building, and Thought Leaders took it a step further and considered it in the context of the social determinants of health, highlighting:

- Digital access and connectivity: ensuring connectivity everywhere, including rural and remote locations; device availability and affordability; reliable data and electricity, and mobile coverage.
- Digital literacy and education: supporting all users, regardless of age, sex, gender, race, ethnicity, disability, location.
- Economic security: job/financial security, leading to access affordability.
- Trust and cultural relevance: ensuring trust is foundational and decision-making transparent.
- Policy and governance: ensuring targeted investment linked to policy and reforms, interoperability and quality assurance.
- Community infrastructure and support: optimised integration and access, regardless of setting.

A critical element is data protection through cybersecurity. The Australian Government has a Cyber Security Strategy outlining a comprehensive plan to enhance national cyber resilience and position Australia as a global leader in cybersecurity by 2030.<sup>26</sup> We support Government funding, which includes developing a skilled cybersecurity workforce and establishing mandatory cybersecurity standards.

We fully support the implementation of the national Health Information Exchange (HIE) and the related initiatives included in Health Connect Australia as these are major programs and infrastructure projects that will fundamentally transform information sharing across Australia's healthcare system. The HIE is the piece that brings everything together, within

the broader Health Connect Australia program, by facilitating healthcare providers to seamlessly request and access patient's healthcare information from multiple sources. Information will be presented to them within their own clinical system using existing consent models, authorisation frameworks, and identification capabilities, it will integrate data from My Health Record (MHR), hospital electronic medical records (EMR), GP practice management systems, and ultimately consumer-held data from apps and wearables, providing a holistic view of patient information.

Health Connect Australia –if properly resourced and utilised – will overcome previous problems with interoperability, reforming health data integration and delivering massive savings in time and money. There are great examples of HIE's already in place, including Victoria and NSW, and internationally, and it is right for us to learn from these examples.

This type of infrastructure has overwhelming benefits for healthcare consumers; but, as emphasised previously, they must be informed and supported to trustfully use it and know how to track their data, where it is stored, and how they can access it.

We support Federal Government moves to expand provisions of 'sharing by default' legislation by enacting a comprehensive 'sharing by default' scheme. The Government's "sharing by default" legislation (Health Legislation Amendment (Modernising My Health Record—Sharing by Default) Act 2025), directs that crucial health information (starting with pathology and diagnostic imaging reports) is automatically uploaded to My Health Record unless users choose to opt out. The Government has, rightly, moved from a "sharing by exception" model to one that makes certain healthcare providers have timely access to comprehensive patient data.<sup>27</sup> HIE infrastructure is fundamental for sharing health data, supported

with a robust legislative framework incorporating mandatory data sharing. It's also time to progress a legislation covering secondary use of patient data to further research, public health initiatives and quality improvement opportunities more broadly.

The success of the Health Connect Australia initiative and other health data sharing programs will be dependent on how governments initiate and implement core data standards.

The Sparked Program<sup>28</sup> is equally critical to establishing and aligning core data standards. There is overwhelming support from Thought Leaders for the Sparked initiative, which is a strategic partnership

involving CSIRO, the Department of Health, the Australian Digital Health Agency, and HL7 Australia. Sparked has established a clinically led, collaborative approach to designing and building national data health standards. The program is actively engaging all governments, peak bodies, the vendor community, universities and academia, clinicians and consumers, to build a FHIR standard as a core foundation for health data interoperability in Australia. To ensure continued progress, it is essential that this whole-of-health sector collaboration continues to be supported and sustained until its objectives have been realised.

## Challenges and Opportunities

Infrastructure that manages healthcare data and/or information must be based on trust created through robust, transparent data governance. The template here is the financial sector. While hacking and data breaches are a worrying aspect of using digital technologies, Australians trust online banking – the Australian Banking Association (ABA) estimate more than 80 per cent of Australians use digital banking services, with usage over 90 per cent, and about 75 per cent of Australians use mobile banking apps.<sup>29</sup>

This confirms that despite concerns about breaches, there is sufficient knowledge about online banking, its risks, protections and supports to see the finance sector flourish in recent years. We also note that banks and financial institutions have engaged in customer awareness campaigns about their security measures, such as multi-factor authentication, biometric login, and Al-driven fraud detection.

For public health data, similar awareness and measures, such as authentication systems and standardisation of security measures, is essential. As one expert put it, we learnt how to innovate and build trust in secure environments during the Covid pandemic.

The public want safety and standards, industry want certainty on regulatory and legislative frameworks that allow for innovation, and healthcare policy specialists want a change to risk approaches to

drive innovation and governance models. All of these occurred during Covid – and this is a message government must recognise. We can transform the health system during times of crisis; but we cannot afford to retract to a passive status quo at the very time digital health needs government investment and direction.

Measuring success also requires a revised cultural approach. Not every success measure is related to infrastructure, success will be evident through uptake and transactions, as with banking and finance. If healthcare and data sharing infrastructure lead to reduced hospital presentations, better preventative health outcomes (fewer unnecessary GP consultations), enhanced data linkages, increased trust in privacy and consent standards – and mandated data sharing – then we can say the investments have been successful.

Australia was rightly recognised for its Covid response where data was available across jurisdictions, and standardised rules and legislation were enacted. We do not need to wait for a crisis for this to be implemented. The pandemic showed that Australian governments can invest in infrastructure, public information and enact legislation quickly and appropriately, and the public responded by using apps and digital data such as vaccine certificates successfully.

## **Funding and Resourcing**

Thought Leaders outlined a variety of different approaches to funding and resourcing, reflecting their various industry and sector needs. The funding and resourcing challenges and opportunities in research and academia are, understandably, not necessarily the same for vendors and industry.

There isn't a single funding or resourcing ask or measure governments need to adopt – all are equally important to different components of healthcare, and all warrant consideration.

One criticism voiced by Thought Leaders is that typically Australian policy makers have been less willing to specify standards or requirements for systems that are developed by private software vendors and used by private providers, even if they are working exclusively with government, or the government is funding those software vendors (for example, secure messaging and CDA vs HL7). The novel approach to the establishment of the Sparked Program aims to bring consensus across the broader healthcare community to the development of FHIR standards and is a model that should be reused for other policy initiatives.

Another important point raised is that oftentimes digital health tools create potentially unwelcome cultural change. For example, encouraging practitioners to see patient information as owned by patients and should be shared with patients, carers and third parties is a change that is met with some resistance. So too is sharing information that can be peer reviewed and considering external patient information as part of medical assessments. The processes and technological changes created by digital health (such as adopting conformant products, uploading information) need mandated participation and for governments to continue to be closely informed and across what software tools and infrastructure is funded. This falls under funding and resourcing, along with infrastructure.

A further issue is that, in the absence of government mandate or incentives, providers have not traditionally invested in integration with government digital health technologies like My Health Record. If the government mandated use of MHR as an example for all those receiving Medicare or other government funding, practitioners would look for products that allow them to meet government requirements. This quickly creates demand that would be met by the market without being as dependent on government funding (though

appropriate timelines and grants or supports for adoption should be considered). The 'Sharing by Default' legislation will see this variance narrow over time.

As exclusively Medicare/government funded entities, general practices could have been strong candidates for mandated use; instead, governments, in concert with advocacy bodies representing general practice, opted for incentivised limited use of digital health tools (the Practice Incentives Program eHealth Incentive 'ePIP'). This could potentially be more challenging with sectors like allied health where Medicare funding may be negligible, but could be considered for any government-funded compensation scheme, such as NDIS, aged care etc.

There are mixed views about government incentive programs such as the ePIP. In short, eligible GP practices receive a maximum of \$12,500 per quarter, based on \$6.50 per Standardised Whole Patient Equivalent (SWPE) per year to use compliant software to access My Health Record and upload shared health summaries and event summaries.

Some Thought Leaders want incentive payments widened, while others argue that it is not a sustainable model for modernisation, with governments unable to adequately fund the number of disciplines who could be eligible.

Another position shared is that government should provide the mandated requirement and leave vendors and industry to develop what the sector needs. In this proposition, healthcare practitioners, Medicare rebate is the funding 'incentive' level used to connect clinician-patient data. The Government would link Medicare rebates to the provision of digital data.

From the opposite end of the debate, some Thought Leaders said the Commonwealth has sole responsibility for uplifting digital health in primary care and the state/territory governments responsible for this activity in public hospitals. Other views combined the two, arguing for continuing our public-private model of health services but with the Commonwealth responsible for the digital health funding and resourcing.

There have been on-going discussions about shifting from the fee-for-service model to value-based care — a model that rewards healthcare providers for improving their patient's health outcomes, rather than be paid for each episode of care (i.e. volume of services delivered). Value-based care delivers high-quality, coordinated, and efficient care that does reduce unnecessary health treatments and hospital admissions. In this model, payments are

coupled to measurable outcomes, such as reduction in complications, recovery rates and better overall health improvement – the focus shifts to long-term wellness and accountability across the healthcare system. Governments will need to agree on a proportional model to fund value-based care, a complex but necessary shift in optimising health service delivery.

## Challenges and Opportunities

As digital health is an enabler of better health outcomes, funding and resourcing is crucial to both workforce capability (outlined above) and access to healthcare.

The Australian Digital Inclusion Alliance (ADIA)<sup>30</sup> makes a compelling case to establish cross-portfolio ministerial responsibility for digital inclusion and to develop a national digital inclusion action plan. ADIA point out that almost a quarter of the Australian population is currently effectively excluded from the digital world, despite numerous findings on the correlation between digital exclusion and other types of disadvantage, including access to healthcare, education and employment services.

ADIA sensibly point to the *UK Digital Inclusion*Action Plan<sup>31</sup> built on a 'shared endeavour' program joining together several government portfolio areas, including Science, Innovation and Technology, Health and Social Care, Education, Work and Pensions, and Housing, Communities and Local Government. A funded and resourced National Digital Inclusion Action Plan is most definitely needed in Australia as we cannot view digital health access as a siloed or stand-alone problem.

The UK **Digital Inclusion Action Plan**, released in February 2025, sets out key principles to address the complex problem of digital exclusion.

It is estimated that over 1.5 million people in the UK are 'living offline', with about a quarter of the UK population having low levels of digital capability. The UK government has set digital inclusion as a priority — with a plan to make sure everyone has access, expertise, support and confidence to participate in the digital society.

There are five actions in the UK Plan, which recognised not just the complexity of overcoming digital exclusion, but that the 'intersectional nature of digital exclusion requires government to be evidence-based and collaborative', and, critically to use models that work.

Key principles to addressing digital exclusion:

- 1. Identifying what works and designing evidence-based interventions.
- 2. A cross-government approach: breaking down silos.
- 3. Delivering in partnership with local authorities, national and devolved governments, and private and third sectors.
- 4. Supporting locally designed and delivered interventions.
- 5. Understanding international best practice and cooperating with international partners.

### Other proposals raised by Thought Leaders include:

- Establishing a digital health funding pool focused not just on preventing disease but in optimising individual health. Current funding models, in particular Medicare fee-for-service which largely rewards through-put and episodic care, is not suitable for the changes that digital health is delivering. The Australian Digital Health Agency could assist in administering a Funding Pool that supports providers to implement digital health initiatives.
- Forming better linkages with researchers, academics and vendors/industry to build local data sovereign capability utilising national databases.
- Linking payments (Medicare) to value-based healthcare. Some jurisdictions are already undertaking this approach through hospital funded virtual hospitals and linking patient outcomes to chronic disease payments. An example is the NSW Collaborative Commissioning Program that advances value-based healthcare in NSW through partnerships between Local Health Districts (LHDs), Primary Health Networks (PHNs), and other service providers through Patient Centred Co-commissioning Groups (PCCGs).<sup>32</sup>
- Preventative health must be funded and resourced. This demand is repeated – and yet remains deprioritised – at huge cost to the health system and healthcare consumers. It is, to quote a health expert, a 'no brainer' to fund upstream health prevention and fund wearables and digital tools to keep people out of expensive, downstream, health situations like hospitals.
- Funding health doesn't have to be transactional. Not every funded activity is a return on investment and this goes to the culture and risk mindset shifts mentioned previously. Simply put, funding and resources can be assessed holistically and not just on a dollar basis. Researchers at the University of Queensland have already proposed a framework to evaluate the economic value of electronic medical record systems in hospitals, ensuring scarce resources are prioritised to initiatives delivering highest returns in regard to patient care and operational efficiency<sup>33</sup>.

- Capitation and blended payment models whereby a general practice clinic is paid a fixed amount per patient for a defined period of time, irrespective of how many services the patient uses has been unfairly opposed by medical associations and must be on the funding table.
- Scope of Practice review offers important insights into better use of resources and health funding.
   Funding models shouldn't be creating more work for clinicians and hospital providers, investing in Al and technologies that reduce administration costs and allow greater workforce scope would see a massive transformation of the health system.

The most commonly voiced criticism or concern discussed was about duplication and waste.

The Roundtable discussion repeatedly returned to the inanity of funding low-value care, of duplicate services funded (e.g. re-ordering pathology tests), when Al and digital health tools can prevent this.

Again, we repeat that clinical governance can contribute to addressing funding waste and resource duplication; but only if it is applied across the health sector and not the current ad-hoc approach. The Choosing Wisely program, led by NPS MedicineWise (now part of the Australian Commission on Safety and Quality in Health Care), also has recommendations against low-value care that will reduce waste, support informed decision-making and improve patient outcomes.

There is clearly a central role for the government, through its agencies and departments, to engage with clinical colleges and the states/territories on reducing inefficiencies and stopping funding unnecessary and low-value care. By low-value care, we mean procedures, medical tests, or medical treatments that have little or no patient benefit; and where there may be more effective and less costly treatment.

### **Footnotes**

- 1 Australian Alliance for Artificial Intelligence in Healthcare (AAAiH). (2023). A National Policy Roadmap for Artificial Intelligence in Healthcare. Available at: https://aihealthalliance.org/wp-content/uploads/2023/11/AAAiH\_NationalPolicyRoadmap\_FINAL.pdf.
- 2 Australian Digital Health Agency (ADHA). (2021). *National Digital Health Capability Action Plan*. Available at: https://www.digitalhealth.gov.au/about-us/strategies-and-plans/national-digital-health-capability-action-plan.
- 3 Australian Government. (2023). Strengthening Medicare Taskforce Report. Available at: https://www.health.gov.au/resources/publications/strengthening-medicare-taskforce-report.
- 4 Australian Government. (2023). *Digital Health Blueprint 2023–2033*. Available at: https://www.health.gov.au/resources/publications/the-digital-health-blueprint-and-action-plan-2023-2033.
- 5 Australian Government. (2023). Connecting Australian Healthcare National Healthcare Interoperability Plan 2023-2028 https://www.digitalhealth.gov.au/about-us/strategies-and-plans/national-healthcare-interoperability-plan.
- 6 See media coverage at https://www.theguardian.com/society/article/2024/jun/09/first-nhs-physiotherapy-clinic-run-by-ai-to-start-this-year.
- 7 AIDH, Oracle. (2024). The future of digital health Progressing the drivers of change. Available at https://digitalhealth.org.au/wp-content/uploads/2024/11/Future-is-Digital-Paper\_FA.pdf.
- 8 Productivity Commission. (2024). Leveraging digital technology in healthcare. Available at: https://www.pc.gov.au/research/completed/digital-healthcare.
- 9 For further information on evidence-based measurable outcomes, see: Woods, L., Eden, R., Green, D., et. al. (2024). Impact of digital health on the quadruple aims of healthcare: A correlational and longitudinal study (Digimat Study). *International Journal of Medical Informatics*, 189. Available at: https://espace.library.uq.edu.au/view/UQ:3b7c710.
- 10 AIDH. (2025). Implementation of AI scribes in healthcare workflows. Available at: https://digitalhealth.org.au/new-resource-ai-scribes-in-australian-healthcare/.
- 11 In June 2025, media reported that the National Chief Clinical Information Officer NHS England issued a priority notification to specify that AVT that provide summarisation require at least MHRA Class 1 medical device status. See coverage at https://www.healthcare.digital/single-post/nhs-england-issues-guidance-on-ambient-voice-technology-ensuring-safe-and-assured-adoption-of-ai-scr.
- 12 Australian Health Practitioner Regulation Agency (Ahpra). (2024). *Meeting your professional obligations when using Artificial Intelligence in healthcare*. Available at: https://www.ahpra.gov.au/Resources/Artificial-Intelligence-in-healthcare.aspx.
- 13 RACGP resources on artificial intelligence are available at: https://www.racgp.org.au/running-a-practice/technology/artificial-intelligence-ai.
- 14 See media coverage at https://www.pulseit.news/pulseit-blog/opinion-chf-on-clear-safeguards-and-building-trust/.
- 15 See AIDH blogpost at https://digitalhealth.org.au/blog/onelondon-leader-to-share-a-joined-up-success-story/.
- 16 The Commonwealth Fund. (2024). Mirror, Mirror 2024 A Portrait of the Failing U.S. Health System: Comparing Performance in 10 Nations. Available at: https://www.commonwealthfund.org/publications/fund-reports/2024/sep/mirror-mirror-2024.
- 17 The expression "tyranny of distance" refers to Australia's physical remoteness and is a foundational idea in understanding our historical and cultural development.
- 18 Op. cit. Available at: https://aihealthalliance.org/wp-content/uploads/2023/11/AAAiH\_NationalPolicyRoadmap\_FINAL.pdf.
- 19 Australian Government. (2024). Introducing mandatory guardrails for AI in high-risk settings: proposals paper. Available at: https://consult.industry.gov.au/ai-mandatory-guardrails.
- 20 Reports from these consultation are available at https://www.tga.gov.au/news/news/tga-ai-review-outcomes-report-published and at https://www.health.gov.au/resources/publications/safe-and-responsible-artificial-intelligence-in-health-care-legislation-and-regulation-review-final-report.
- 21 Australian Government. (2024). New data reveals Australia's top industries and occupations. Available at: https://www.jobsandskills.gov.au/news/new-data-reveals-australias-top-industries-and-occupations.
- 22 Available at https://www.digitalhealth.gov.au/sites/default/files/documents/national-digital-health-capability-action-plan.pdf
- 23 https://www.digitalhealth.gov.au/healthcare-providers/initiatives-and-programs/workforce-capability.
- 24 Available at https://digitalhealth.org.au/wp-content/uploads/2024/01/Digital-Health-Career-Pathways-Model-v1.2.pdf.
- 25 Butler-Henderson, K., Gray, K., & Arabi, S. (2023). Specialist digital health workforce census: Summary report 2023. RMIT University. DOI: 10.25439/rmt.24438715. Available at: https://researchoutput.csu.edu.au/en/publications/specialist-digital-health-workforce-census-summary-report-2023.
- 26 For more information, see https://www.austlii.community/foswiki/CyberLaw/AustralianCyberLawMap/20232030AustralianCyberSecurityStrategy.
- 27 For more information, see https://www.aph.gov.au/Parliamentary\_Business/Bills\_Legislation/bd/bd2425/25bd042?utm\_source=chatgpt.com.
- 28 For more information about the Sparked program, see https://sparked.csiro.au/.
- 29 Australian Banking Association (ABA). (2021). Banking customers continue shift to digital. Available at https://www.ausbanking.org.au/banking-customers-continue-shift-to-digital/.
- 30 For more information about the Alliance, see www.digitalinclusion.org.au.
- United Kingdom Department for Science, Innovation, and Technology. (2025). *Policy paper Digital Inclusion Action Plan: First Steps.* Available at: https://www.gov.uk/government/publications/digital-inclusion-action-plan-first-steps/digital-inclusion-action-plan-first-steps.
- 32 New South Wales Government. (2021). Lumos monitoring and evaluation framework. Available at https://www.health.nsw.gov.au/lumos/Publications/lumos-monitoring-and-evaluation-framework.pdf.
- 33 University of Queensland. (2024). Framework will help decision-makers understand economic value of digital health systems. Available at: https://www.health.nsw.gov.au/lumos/Publications/lumos-monitoring-and-evaluation-framework.pdf.

