Australian Outlook on Initiatives for Sustainable Digital Health

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I acknowledge the traditional custodians of Australia, and recognize their continued connections to land, waters, and community. I pay my respects to them and their cultures, and to elders both past and present.

Digital Health Landscape in Australia

- In 2016, The Australian Digital Health Agency (ADHA) was established as a corporate Commonwealth entity by the Public Governance, Performance and Accountability (Establishing the Australian Digital Health Agency) Rule 2016.

- The agency envisioned a healthier future through connected healthcare and has created a collaborative environment to accelerate adoption of innovative digital services and technologies.

- A key component of the digital health strategy is harnessing digital information to make informed decisions by providers and consumers.

- Infrastructure that can be safely accessed, easily used and responsibly shared enables the best outcomes in digital health.

- **Space derived technologies and health data provision** in secure manner underpin digital health services.

National Digital Health – Current status
Safe, Seamless, Secure

- **Health information** is available wherever and whenever needed for health providers and consumers via the Australian national digital health record system or "My Health Record" with the provision of connecting digital apps. Health information is also available **securely** to support the development of new methods of diagnosis and specialist referrals.

- The **interoperability of clinical data** is essential to high-quality, sustainable healthcare. Patient data need to be collected in standard ways and shared in real time with them and their providers. This method has been showcased by the first regions in Australia across health service provision.

- **Safe and convenient digital management of medicines**. Comprehensive views of their prescribed and dispensed medications are available in "My Health Record" system reducing incidence of medication errors and adverse drug events. Electronic prescribing and dispensing is available to improve the safety of health systems.

Strategic Frameworks and Operationalisation

- Healthcare providers had raised the difficulty they have using existing national foundations, including registration, renewal of Public Key Infrastructure (PKI) certificates, and identifier match rates. Existing national authentication and identification services needed to be enhanced, and existing specifications developed to support secure messaging and future usage patterns.

- The ADHA's Cyber Security Strategy (2022-2025) has operationalised the Co-production of an integrated digital identity framework, using the Digital Transformation Agency identity and authentication framework and services, for health and care provider individuals and organisations that can be used to access a variety of private sector and government sector digital services. This include clinical services, Medicare services, secure messaging services and the My Health Record system.

Operationalising Strategies – From the States

- **ACT Provider Index** by Australian Capital Territory (ACT) Health aims to be a single source of health provider information for the ACT.

- The Department of Health in **Western Australia** is establishing a contract panel of vendors able to provide secure messaging services across the health system to support the exchange of patient information in a secure manner within the WA health system and enable comprehensive coverage of health providers with which the WA health system wishes to interact.

- **eHealth NSW** operates HealtheNet, which is a central clinical repository providing a statewide view of clinical history and seamless information sharing between hospitals, community health, GPs, patients and private clinicians. HealtheNet information includes patient demographics and identifiers, e-discharge summaries from local health districts (including alerts, allergies and adverse reactions), inpatient and outpatient encounter listings and more.

- **Queensland Health** is implementing the initiatives outlined in the Specialist Outpatient Strategy, including a statewide service directory to provide GPs access to an online statewide directory of public hospital services to better inform and direct their referrals, and online booking to provide patients the ability to manage their specialist appointments online through the establishment of a patient portal.

- **Healthdirect**'s service finder provides consumer access to the health service providers listed in the National Health Services Directory (NHSD) and provides detailed information about the services provided.

Operationalising Strategies – From the States

- Queensland Health have established an e-referrals program to enable electronic health information exchange to support the transfer of patients from one service to another.

- MedConnect Clinical Contextual Display provides current patient information. including real time data into a whole-of-patient context in a single expandable screen. The system allows all healthcare participants, including all nurses, doctors, patients to contribute to the clinical data and context and the handing over of all aspects of patient care in a concise manner.

- Royal Australian and New Zealand College of Radiologists has a roadmap towards developing and deploying the architecture and platform to support image sharing by clinicians across different health providers.

Secure messaging in real world

- To provide secure messaging in real time, the ADHA is working with two major industry consortia.

- **The Telstra Health consortium** includes clinical software providers CorePlus, Genie Solutions and Zedmed, along with secure messaging vendors Global Health and HealthLink who are testing the delivery of discharge summaries from Royal Melbourne Hospital to a number of GPs in Victoria

- **The HealthLink** consortium includes MedicalDirector, Best Practice and Genie, supported by Global Health and Telstra Health who are testing the delivery of referrals from GPs to specialists. In addition, the consortia have developed a federated search capability that will enable transparent searching of provider directories and care provider electronic addresses on different underlying networks. As a result, clinicians are now able to look up and contact other clinicians across Australia from a single search, greatly improving convenience and efficiency.

Standards based secure messaging capabilities

- The **Australian Digital Health Agency** has continued the secure messaging project, which is being run in collaboration with industry and overseen by a steering committee with wide representation, including clinical leadership. A range of clinical professions are represented on the steering committee, including the Australian Dental Association.

- The **Victorian Department of Health and Human Services** and the Australian Digital Health Agency have jointly funded the Victorian eReferral Program to implement a solution that enables the exchange of electronic referrals between different healthcare service providers within the Eastern Melbourne region, regardless of the primary clinical information system currently in use. This project helps general practice and health services streamline their referral processes.

- **The Hunter, New England and Central Coast PHN** has implemented e-referrals underpinned by agreed care pathways that support community practice. This solution supports e-referrals from hospitals to GPs and across regional care providers.

Standards based secure messaging – guidelines and tests

- The Health Informatics Society of Australia (HISA) tackles socio-technical aspects and drives communication and exchange of information using secure digital channels through the release of an update to HISA's publication- Australian Guidelines for the Protection of Health Information.

- The Australian Government is investing in key platforms and technology to improve people's experiences of government services online. The Digital Transformation Agency has oversight of Govpass, a digital identity system that will provide a simple, safe and secure choice for people to verify who they are and to access government services online.

  - *Prior to pandemic, over 2018 and 2019, 8 high-volume government services were piloted using a digital identity, giving more than 500,000 people the opportunity to test the system.*

The Next Mile – Blockchain Enabled Solutions

- The Australian Government is investigating opportunities where blockchain technologies could add value and make the access and exchange of information across service providers more transparent, trusted, reliable, and easy to use.

- A beneficial digital identifications solution, underpinned by common standards, for both public and private healthcare providers is being developed.

- **R&D** and rapid prototyping is in progress where ***blockchain enabled solutions*** could secure health data in transit to accelerate the reach of telehealth/ tele-mental services / senior support and where mobile apps are being used to pull 'data at rest' to make informed health decisions.

Q&A

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