

Rounding up Digital Health Advancements across APAC in 2022

09 December 2022 | Opinion | By Dr Dario Heymann, Chief Research Officer, Galen Growth

Over the past two years, Digital Health has been propelled into a realm of new care to create better efficiency, patient experience, while improving patient outcomes. Globally, priorities in healthcare are shifting towards modernised patient care by streamlining processes and task automation.

Telehealth and telemedicine as we know it is becoming a common inclusion for both healthcare providers and insurance programmes with increased attention to the quality and outcomes of virtual care and the data-driven clinical decision-making. As per HealthTech Alpha in 2022, more than 130 partnerships were closed globally between telemedicine Digital Health ventures and corporations, doubling the number of disclosed telemedicine partnerships in 2021.

Being home to more than 3,300 Digital Health ventures, Asia Pacific (APAC) represented historically the second largest Digital Health ecosystem globally, with the two world's most populous countries, namely China and India, accountable for approximately 50 per cent of those ventures. Against the backdrop of growing inequities in access to quality and affordable healthcare, especially for marginalised populations, the growing cost pressure on healthcare systems and global advancements in technologies, Digital Health businesses remain bullish to adapt to address health challenges on a local scale.

While China has stuck to its 'zero-COVID' policy, advancements of Digital Health technologies in 2022 were more apparent in

North-East Asia, South-East Asia, and South Asia as measured by partnerships, regulatory approvals and the amount of funding invested.

Tools to support clinical trials

Over the past decades, the pharmaceutical industry experienced major drawbacks during the process of running traditional randomised clinical trials, including elevated costs, long completion times, lapses in the patient recruitment process, lack of relevant and diverse patients, and complex process management. This situation has created an unmet need for innovative models for business to venture into providing virtual and decentralised patient-centric trials as a valuable strategy in this pursuit.

Asia Pacific counts more than 50 ventures with primary focus on supporting clinical trials. After hitting record funding in 2021 with more than \$700 million invested, investor activity decreased significantly in 2022, deploying less than \$100 million in 2022.

Notably, Singapore headquartered venture OncoShot, a startup that helps patients, caregivers and oncologists find cancer clinical trials globally has raised an undisclosed amount of pre-Series A funding in March and July of this year and announced partnerships with Omico, the Australian Genomic Cancer Medicine Centre, in July, and Roche and the Icon Cancer Centre in Singapore in November.

Solutions for Mental Health

The pandemic has put a spotlight on mental health with depression, anxiety and the rate of suicides rising and business seeking to raise awareness and the adoption of best practices. In 2022, Digital Health solutions addressing Mental Health continued their momentum created in 2021. By the end of the third quarter, startups in APAC raised more than \$240 million, more than 80 per cent of the total amount raised within the whole year of 2021. In a year of economic downturn, high inflation and decreased investor activity, mental health ventures continue to be on the rise.

In April, South Korea-headquartered startup Silvia Health, a startup that develops cognitive assessments using voice data analysis to screen for dementia at home and provides brain-specific management for each patient, signed an agreement with Shinhan Bank to develop educational and preventive programmes against dementia for the National Pension Service.

Omics-based solutions

Genomics, transcriptomics, metabolomics and proteomics and other emerging laboratory technologies newly referred to as ‘-omics’ have begun to amass large reservoirs of health data. This new collective of technologies has the potential to unravel entire sets of genes, RNA or proteins in biological samples, and to improve the understanding of underlying mechanisms of diseases, provide support in biomarker discovery or to develop responses to disease interventions. Artificial Intelligence-based, data-driven clinical decision tools have enabled businesses to faster and more accurately understand the underlying biology and increase productivity – ultimately to provide a more precise outcome to patients.

AI-enhanced Omics ventures have demonstrated strong growth across Asia Pacific over the past decade. By the end of 2021, more than 200 ventures that offered solutions ranging from antibody and biomarker discovery to precision medicine solutions. Counting more than 90 ventures, China represents the largest market for omics followed by India, South Korea and Japan.

Listed in mid 2020 on NASDAQ, Chinese-born Burning Rock Biotech is amongst the most promising genomics companies from Asia Pacific. In 2022, the company featured 15 times in peer-reviewed scientific publications and launched its PREVENT Study, a validation study on multi-cancer (lung, liver, colorectal, oesophageal, pancreatic and ovarian cancers) early detection. The test is believed to compete with the Galleri – panel by GRAIL.

In October, Singapore-based NalaGenetics announced a partnership with Raffles Medical Group to offer pre-emptive pharmacogenomics testing at its hospital. With the technology costs dropping, pharmacogenomics is becoming an increasingly popular test to help in lowering the costs by avoiding the use of inappropriate treatments.

Tackling chronic diseases earlier

Till today, healthcare remains a reactive industry. Medicine adherence solutions, including Remote Patient Monitoring and Digital Therapeutics, were highly popular areas of interest in 2020 and 2021 creating an environment for companies like Indonesia's Halodoc to include disease management services to their existing product portfolio.

But despite the continual need to enhance service solutions to existing patients, the constant increase in the cost for healthcare services is shifting the focus to pro-actively fight disease occurrence.

According to data extracted from HealthTech Alpha by the end of October 2022, preventive search terms such as weight loss and preventive health were featured more than 600 times in notable news outlets featuring the Digital Health ecosystems across Asia Pacific, up 23 per cent as compared to the same timeframe in 2021. To date in 2022, funding for ventures targeting weight management in APAC totalled at \$620 million, short 15 per cent of the total funding raised in 2022.

In early November, the two Japanese ventures Life Log Technology and Oishi Kenko announced a partnership to help consumers to visualise their eating habits, by implementing functions to personalise healthy food options and to encourage behavioural changes that lead to a healthier lifestyle.

For 2023, we are expecting further advancements within the clinical trial space, notably by using patient data more effectively. Another growing area of interest in 2023 will be the use of digital biomarkers which are already deployed across a number of therapeutic areas, including mental health and cardiovascular diseases but increasingly explored to be used for critical illnesses.

Dr Dario Heymann, Chief Research Officer, Galen Growth