Deloitte. Insights



Mental health goes mobile: The mental health app market will keep on growing

Mental health care needs are pressing around the world. Apps can deliver support on demand and on the go

Brooke Auxier, Ariane Bucaille, and Kevin Westcott

HERE SEEMS TO be an app for everything these days, and mental health is no exception. Deloitte Global predicts that global spending on mobile mental health applications will reach close to US\$500 million in 2022. That's assuming an annual growth rate of 20%—a conservative figure, considering the 32% growth these apps enjoyed, from US\$203 million to US\$269 million, from the first 10 months of 2019 to the same period in 2020.

A growing market with a big impact

Though US\$500 million may not seem like much compared to the estimated US\$1.6 billion 2021 global market for health and wellness apps overall,³ it's impressive given that many emotional and mental well-being apps are free or low cost. Typically, they are also easy to access and integrate into daily habits, require little effort to use, provide

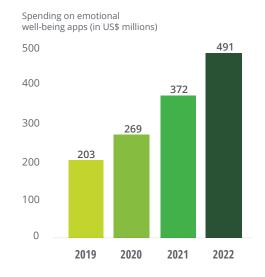
an enjoyable experience, and—best of all—they can work.⁴ They are also more resistant to disruption than traditional therapies, though they are not a replacement for professional mental health treatment. All of these factors likely contribute to their growing popularity.

App developers are taking notice. As many as 20,000 mental health apps may exist today,⁵ with two of the most popular being Calm⁶ and Headspace.⁷ Both of these focus on mindfulness and meditation, and are meant to help individuals get support other than from connection to a therapist or other traditional mental health services. Additionally, many mental health app developers are launching collaborations with other online services and apps, such as Snapchat⁸ and Bumble,⁹ which will likely make them more accessible to a larger share of consumers.

FIGURE 1

Mental health and well-being apps will see strong growth through 2022

Global spending on mental health and well-being mobile apps, 2019–2022, US\$ millions



Note: Spend estimates for 2021 and 2022 are predictions. Source: SensorTower, Mobile Wellness Market Trends 2021.

Apps can be used to manage mental health conditions such as anxiety or depression either on their own—enabling individuals to learn about and self-manage their mental health—or in conjunction with more traditional talking therapies, by providing a channel to access asynchronous or synchronous support from a mental health professional through means such as live chat, video, and telephone. Beyond supporting individuals with mental health diagnoses, apps can also be used to improve general well-being by encouraging behavior change, including practicing mindfulness and meditation.

Beyond supporting individuals with mental health diagnoses, apps can also be used to improve general wellbeing by encouraging behavior change, including practicing mindfulness and meditation.

The potential market for these apps is considerable. Nearly 800 million people worldwide, or 11% of the global population, live with a mental health condition.10 Moreover, data shows that the COVID-19 pandemic has exacerbated mental health concerns and triggered declines in well-being, with a dramatic rise in the prevalence of problems such as depression, anxiety, post-traumatic stress symptoms, and stress.11 About four in 10 adults in the United States, for example, reported symptoms of anxiety and depression from June 2020 to March 2021, compared to a much smaller share reporting these symptoms from January to June 2019.12 While this may not reflect an actual increase—some medical professionals and researchers suggest that the pandemic has helped

people open up about their mental health and made accessing treatment more socially acceptable¹³—it points to the prevalence of the issues that mental health apps address.

Apps can not only help address the volume of need for mental health support, but also make that support more accessible. Professional mental health resources such as talking therapies are hard to access or are stigmatized in many countries and communities, and in some of these cases, people are using mobile applications to replace or supplement traditional methods of treatment. In China, for instance, where human resources for professional mental health treatment are often low and stigma around mental health conditions is high,14 consumer spending on wellness apps grew by more than 60% in the first 30 days of the COVID-19 pandemic (March 7–April 5, 2020) versus the 30 days prior (February 6-March 6, 2020).15 We believe that this dynamic will drive strong mental health app growth in China and many other Asian countries. It is worth noting, however, that there is very little regulation around mental health or medical apps, which is cause for growing concern internationally.16

Again, the pandemic exacerbated the access problem by disrupting access to traditional mental health support in most countries and communities. 17 Sixty percent of respondents in 130 countries participating in a summer 2020 World Health Organization survey reported disruptions to mental health services for vulnerable populations, including children, adolescents, older adults, and women requiring prenatal or postnatal services. 18 In some cases, digitally enabled services helped to fill the gaps, but adoption of these interventions shows wide disparities, with the divides generally negatively impacting those in low-income countries.

Digitally enabled health services, including mental health services, can also expand access to care to a more diverse population. US-based research shows that for individuals who identify as Black, Hispanic, Asian, or Native American, having a provider who is empathetic, culturally competent, or who looks like them is a top priority. About half of participants in this study said they would be willing to use a virtual visit instead of seeing someone in person if it meant they would get access to a provider who looks like them, talks like them, or has a shared life experience.

Research shows that mental health apps have clear clinical advantages for their users.20 Meta-analyses of trials covering more than 20 mobile apps found that using them to alleviate symptoms and selfmanage depression significantly reduced depressive symptoms.21 A similar analysis of anxiety treatment apps found that users experienced a reduction in anxiety symptoms after use, with the greatest reduction occurring when the apps were paired with face-to-face or internetbased therapies.²² Apps that focus on mindfulness and meditation have also been shown to deliver benefits. A study of one of these apps found that users experienced decreased depression and increased positive emotions after just 10 days of use.²³ Other research tied the use of another app to reductions in stress and sleep disturbances and improvements in mindfulness and compassion.²⁴

Improved well-being has economic as well as personal benefits. Poor mental health puts a strain on the global economy. Prepandemic estimates suggest that poor mental health costs the world economy US\$2.5 trillion per year, a cost that was projected to increase to US\$6 trillion by 2030.25 Lost productivity as a result of anxiety and depression accounts for US\$1 trillion of this yearly sunk cost. Without action, these impacts will continue to be felt across economic sectors in terms of both lost consumer spending and lower workforce productivity. While most countries allocate only a modest share of their government health budgets to mental health care and support,26 opportunities exist for app creators and corporations alike to step in.

The financial implications of poor mental health are not lost on businesses. In part, we expect mental health app adoption to continue to grow due to the many corporations that are recognizing

the importance of supporting employee well-being and partnering with mental health apps to make them accessible to their workforce.²⁷

THE BOTTOM LINE

To meet growing demand and capture interested audiences, mental health app creators and developers can pursue novel methods for monetization, such as subscription tiers or tailored paid programs and offerings. They could also explore personalizing these services for users and customizing apps to encourage regular use and check-ins. And finding ways to integrate socialization and network support into the user experience may increase app stickiness and integrate desirable community and connection interventions into the oft-isolating state of poor mental health.

On their side, mental health care providers might leverage apps to improve care quality and accessibility. They could make treatment available to broader populations, making mental health care and well-being easier to manage for millions of consumers. Research partnerships between app developers and health care providers should help improve the quality of these services.

Transparency is also key. Developers and care providers should work to help ensure that the methods used to design mental health apps are clearly communicated to consumers. They should also provide transparency around privacy practices and data collection, especially given the potentially sensitive nature of these apps and the user data collected.

Mental health apps can be a boon for those who cannot access—or would not seek—traditional care, as well as for people using them to supplement other therapeutic methods. The market's strong growth points to a significant unmet need that these apps can fill. Going forward, mental health apps can offer opportunities not only for app developers to monetize new and existing products and services, but also for organizations worldwide to engage in corporate social responsibility efforts to increase well-being and improve access to care.

Endnotes

- 1. The current figures and the Deloitte projection for 2022 do not include revenue from third-party Android marketplaces, and hence do not capture a large portion of app revenues from China.
- 2. Sensor Tower, Mobile wellness market trends: Key trends in the global mobile wellness space and projections for 2021, 2021.
- 3. Ibid.
- 4. Pooja Chandrashekar, "Do mental health mobile apps work: Evidence and recommendations for designing high-efficacy mental health mobile apps," *mHealth* 4, no. 6 (2018).
- 5. Rebecca A. Clay, "Mental health apps are gaining traction," *American Psychological Association* 52, no. 1 (2021).
- 6. David Curry, "Calm revenue and usage statistics (2021)," Business of Apps, April 6, 2021.
- 7. David Curry, "Headspace revenue and usage statistics (2021)," Business of Apps, May 6, 2021.
- 8. Alexandra Garrett, "Snapchat adds a meditation feature with the Headspace mini app," CNET, July 20, 2020.
- 9. Bumble.com, "Want to try mindful dating? Here's what you need to know," accessed October 31, 2021.
- 10. Saloni Dattani, Hannah Ritchie, and Max Roser, "Mental health," Our World in Data, April 2018.
- 11. Surapon Nochaiwong et al., "Global prevalence of mental health issues among the general population during the coronavirus disease-2019 pandemic: A systematic review and meta-analysis," *Scientific Reports* 11, no. 1 (2021).
- 12. Nirmita Panchal et al., "The implications of COVID-19 for mental health and substance abuse," Kaiser Family Foundation, February 10, 2021.
- 13. Matthew Kelly, "Breaking the stigma: How the pandemic has helped people open up about mental health struggles," NPR for Wichita, KMUW, April 19, 2021.
- 14. Jie Shang et al., "Mental health apps in China: Analysis and quality assessment," *Journal of Medical Internet Research* 7, no. 11 (2019).
- 15. Sensor Tower. Mobile wellness market trends.
- 16. Farah Magrabi et al., "Why is it so difficult to govern mobile apps in healthcare?," *BMJ Health & Care Informatics* 26, no. 1 (2019).
- 17. World Health Organization (WHO), "COVID-19 disrupting mental health services in most countries, WHO survey," press release, October 5, 2020.
- 18. Ibid.
- 19. Leslie Read, Leslie Korenda, and Heather Nelson, *Rebuilding trust in health care: What do consumers want and need organizations to do?*, Deloitte Insights, August 5, 2021.
- 20. Tania Lecomte et al., "Mobile apps for mental health issues: Meta-review of meta-analyses," *Journal of Medical Internet Research* 8, no. 5 (2020).
- 21. Chandrashekar, "Do mental health mobile apps work."
- 22. Ibid.

- 23. James Cartreine, "Mindfulness apps: How well do they work?," Harvard Health Blog, November 6, 2018.
- 24. Annie Lowrey, "The app that monetized doing nothing," *Atlantic*, June 4, 2021.
- 25. The Lancet, "Mental health matters," Lancet Global Health 8, no. 11 (2020).
- 26. WHO, "COVID-19 disrupting mental health services in most countries, WHO survey."
- 27. Ari Levy, "Companies are offering benefits like virtual therapy and meditation apps as Covid-19 stress grows," CNBC, October 11, 2020.

About the authors

Brooke Auxier | United States | bauxier@deloitte.com

Brooke Auxier is a research manager with Deloitte's Center for Technology, Media, and Telecommunications. Her research focuses on media, entertainment, and consumer technology. She has a Ph.D. in journalism from the University of Maryland.

Ariane Bucaille | France | abucaille@deloitte.fr

Ariane Bucaille is Deloitte's global Technology, Media & Telecommunications (TMT) industry leader and also leads the TMT practice and the TMT Audit practice in France. She has more than 20 years of experience and is a chartered and certified public accountant.

Kevin Westcott | United States | kewestcott@deloitte.com

Kevin Westcott, vice chairman, is the leader of Deloitte's US Technology, Media & Telecommunications (TMT) practice and the global Telecommunications, Media & Entertainment (TME) practice. His industry experience spans film, television, home entertainment, broadcasting, over-the top, publishing, licensing, and games.

Acknowledgments

The authors would like to thank the following individuals for their contributions to this chapter: Krissie Ferris, Wendy Gerhardt, Leslie Korenda, Suhas Raviprakash, Duncan Stewart, and Cornelia Calugar-Pop.

Deloitte's Technology, Media, and Telecommunications (TMT) group brings together one of the world's largest pools of industry experts—respected for helping companies of all shapes and sizes thrive in a digital world. Deloitte's TMT specialists can help companies take advantage of the ever-changing industry through a broad array of services designed to meet companies wherever they are, across the value chain and around the globe. Contact the authors for more information or read more on www.deloitte.com.



Sign up for Deloitte Insights updates at www.deloitte.com/insights.



Deloitte Insights contributors

Editorial: Junko Kaji, Preetha Devan, Prodyut Ranjan Borah, Rupesh Bhat, Arpan Kumar Saha, Ribhu Ranjan, Emma Downey, Nairita Gangopadhyay, Blythe Hurley, and Aparna Prusty **Creative:** Jaime Austin, Sylvia Yoon Chang, Govindh Raj, Sanaa Saifi, and Rishwa Amarnath

Audience development: Maria Martin Cirujano

Cover artwork: Jaime Austin

About Deloitte

Deloitte refers to one or more of Deloitte Touche Tohmatsu Limited ("DTTL"), its global network of member firms, and their related entities (collectively, the "Deloitte organization"). DTTL (also referred to as "Deloitte Global") and each of its member firms and related entities are legally separate and independent entities, which cannot obligate or bind each other in respect of third parties. DTTL and each DTTL member firm and related entity is liable only for its own acts and omissions, and not those of each other. DTTL does not provide services to clients. Please see www.deloitte.com/about to learn more.

About this publication

This communication contains general information only, and none of Deloitte Touche Tohmatsu Limited ("DTTL"), its global network of member firms or their related entities (collectively, the "Deloitte organization") is, by means of this communication, rendering professional advice or services. Before making any decision or taking any action that may affect your finances or your business, you should consult a qualified professional adviser.

No representations, warranties or undertakings (express or implied) are given as to the accuracy or completeness of the information in this communication, and none of DTTL, its member firms, related entities, employees or agents shall be liable or responsible for any loss or damage whatsoever arising directly or indirectly in connection with any person relying on this communication. DTTL and each of its member firms, and their related entities, are legally separate and independent entities.

© 2021. For information, contact Deloitte Global.