Ethics in Digital Mental Health

A Comprehensive Guide to Responsible Practice for Professionals in Training

By

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This book first published 2024

Ethics International Press Ltd, UK

British Library Cataloguing in Publication Data

A catalogue record for this book is available from the British Library

Print Book ISBN: 978-1-80441-863-5

eBook ISBN: 978-1-80441-864-2

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Sometimes, the most effective therapy is found in the simplicity of a look, a posture, or non-verbal communication that gently says, "Don't worry, we're in this together; stay calm." As individualization and the relentless competition for resources dominate our lives and shape our behaviors, humanity is turning to non-human solutions—humanizing them to fill the void left by this growing isolation. After all, life began with care.

Prologue: Inequality, mental health, and the role of AI

Mental health is deeply intertwined with the social, economic, and technological environments we live in. As inequalities within these systems grow, they exacerbate the burden on individuals, leading to rising rates of depression, anxiety, and stress. These mental health challenges are not merely personal struggles; they reflect systemic issues rooted in social and economic disparities. The question we face today is how to address these challenges in a world where technology—particularly artificial intelligence (AI)—is rapidly changing the landscape of mental health care.

The challenge we face is clear: mental health is shaped not only by systemic inequalities but also by deeper human tendencies—our need for agency and the ways in which our moral understanding develops alongside the tools we create, including AI. AI has the potential to transform mental health care by predicting crises, personalizing interventions, and improving access to care. However, it also raises significant ethical concerns. AI can either empower individuals, giving them tools to take control of their mental health, or it can become a tool of control and inequality, deepening the divides between those with access to care and those without.

A critical issue is how the current focus in digital mental health often emphasizes individual well-being—centered on my anxiety, my insomnia, or my stress—while neglecting the collective dimension of mental health. This individualistic approach, shaped by broader socioeconomic models, risks fragmenting our sense of community and dissolving shared responsibility. AI, if designed solely for individual empowerment, may further reinforce this divide, leaving collective health and societal well-being as secondary concerns. As AI systems develop, it is crucial to ask: Are we losing the "us" in favor of the "me"?

The individual vs. collective approach is not just an academic issue—it is an ethical one. As inequalities grow, and as AI continues to reflect

and amplify existing social structures, there is a danger that technology will prioritize personal solutions over the collective good. Mental health should not be treated in isolation from the broader social, economic, and environmental contexts that shape it. The socioeconomic model that drives much of AI development is rooted in market-driven individualism, which can exacerbate disparities if not carefully managed. This means we must critically assess how AI can be used to address both individual and collective mental health needs, ensuring that it doesn't further entrench existing inequalities.

Historically, human agency—the ability to feel in control of our lives and decisions—has been central to mental health. As Albert Bandura (1986) emphasized, people thrive when they have a sense of agency. AI, depending on how it is developed and deployed, can either support this agency by enhancing individual control over mental health decisions, or it can undermine it, leading to a sense of passivity and helplessness by making decisions on behalf of the individual.

This tension between human control and external guidance has deep intellectual roots. Since the beginnings of technological and intellectual advancement, scholars like Ramon Llull in the 14th century sought to influence human thought and behavior through structured reasoning. Llull's Ars Magna aimed to create systems for resolving complex questions and promoting ethical understanding, much like modern AI systems seek to do today. Although Llull's work was grounded in philosophical logic, it laid a foundation for the structured, computational reasoning that drives today's AI, which now holds the potential to shape human agency either positively or negatively.

Although modern AI, particularly Large Language Models (LLMs), operates on principles far removed from Llull's combinatorial method, the ambition to systematize knowledge and influence thought through structured reasoning remains a common thread. Today, LLMs have the power to shape worldviews and reinforce particular narratives based on the data they are trained on.

In the context of mental health, the implications of this are profound. AI can either serve as a tool for empowerment, providing individuals with resources and insights, or it can reinforce harmful patterns, limiting agency and deepening inequality. The development of LLMs—like all technological advances—carries with it the responsibility to ensure alignment with ethical principles. Just as Llull sought to guide thought toward ethical ends, modern AI must be designed and governed with care to ensure it enhances human well-being rather than distorting it.

As AI continues to transform mental health care, the focus must go beyond individual well-being and address the larger ethical responsibilities that AI carries. Developers, clinicians, policymakers, and other professionals are called upon not only to meet personal mental health needs but to guide AI systems towards sustainable development goals (SDGs). This means creating technologies that promote collective well-being, reduce inequalities, and contribute to the long-term mental health of both individuals and societies.

Overview: The evolution of mental health care and the digital transition

Mental health care has historically evolved in response to changing societal structures. During the 20th century, mental health professions such as psychiatry and psychology primarily focused on addressing individual concerns—such as anxiety, stress, and depression—often in isolation from broader societal influences. This individual-centric approach, deeply embedded in healthcare models across various countries, has led to a fragmented system, with accessibility and quality of care largely dependent on geography, economic structures, and available resources.

As a result, the profession of mental health has been largely focused on treating individuals rather than addressing the systemic and collective aspects of well-being. Current mental health job profiles reflect this individualized approach, concentrating on direct treatment interventions rather than broader, more integrated models of care that consider community and societal dynamics. This book, however, proposes a para-

digm shift, advocating for the development of new professional roles that align with the emerging needs of a more connected, digital world.

Challenges of the traditional model

As urbanization accelerated, mental health services became concentrated in urban centers, leaving rural and underserved areas with limited resources. Furthermore, mental health care has increasingly relied on medical interventions, often at the expense of more integrated, holistic approaches. The growing demand for mental health services, coupled with uneven access, has exposed the limitations of a model focused primarily on individual treatment.

This book addresses these systemic gaps by introducing a forward-thinking proposal to redefine mental health job profile. In this new framework, mental health professionals will need to integrate technology into their practice, navigate ethical challenges posed by AI, and adopt a collective approach to mental health care that prioritizes community and societal well-being alongside individual treatment.

The promise and perils of digital solutions

The digital revolution of the 21st century has introduced new tools—such as telehealth platforms and AI-driven interventions—that have the potential to address gaps in mental health care. However, without a shift in how we view mental health itself, these technologies may only perpetuate the same inequalities. The reliance on digital tools risks reinforcing an individualized approach that overlooks the collective and societal factors contributing to mental health disparities.

A new paradigm for mental health care

This book seeks to address these challenges by proposing a new paradigm—one that integrates technological advancements with a broader, more inclusive view of mental health. The initial chapters explore how AI and digital tools can reshape mental health care, while subsequent sections advocate for an ethical framework that prioritizes both individual and collective well-being. It also proposes the creation of new

professional roles that blend clinical expertise with digital competencies, ensuring that mental health professionals are equipped to navigate this evolving landscape. This approach ensures that AI is not just a tool for personal empowerment but also a force for the common good, aligning with broader ethical imperatives such as justice, inclusivity, and community care.

Central to this vision is the necessity for interdisciplinary collaboration. As technology continues to shape mental health care, it is critical to integrate perspectives beyond the clinical. In this book, the philosophy of law, represented by PhD Antoni Abat-Ninet, and Distinguished Researcher, Banco Santander Talent – Institut d'Estudis Europeus (Universitat Autònoma Barcelona, Spain) ensures that legal and ethical dimensions are rigorously considered, while the economic perspective, provided by PhD Claudia Tello, from Conahcyt-CentroGeo, México, highlights the importance of addressing inequality in this new digital landscape. Together, these voices underscore the importance of grounding digital mental health in justice, ethics, and equitable access for all.

Part 1

Introduction to ethics in digital mental health

Chapter 1

The digital transition: Ethical considerations in a digital world

Exploring the shift towards digital existence and its ethical implications

The accelerating rise of digital technologies in mental health care requires more than just technical innovation – it demands a rigorous ethical foundation. This book begins by laying out a clear ethical and conceptual framework because, before addressing the specifics of digital mental health, we must ensure that the guiding principles are in place to manage the risks and opportunities that come with these tools. Ethics is often understood as a set of ideals—a narrative, a guideline for behavior meant to be upheld by society. However, ethics can remain mere words unless they are translated into action. In a world where inequality is on the rise, it is crucial that ethics not only inform principles but also drive real, tangible change. At the turn of the 20th century, there was hope for a future shaped by knowledge and progress, yet the reality decades later has revealed a disconnect. Global society, despite its progress in education, has shifted its focus toward work skills, sidelining the ethical concert needed for genuine social evolution.

The ethical landscape of mental health

Mental health has long been intertwined with ethical concerns. As a society, we recognize the moral imperative to care for those with neurodevelopmental diseases, and we often mediate mental health as a service to assist individuals with a wide range of mental disorders. However, much of this assistance is framed within a narrative that emphasizes productivity—focusing on helping individuals return to work or resume their roles within the economic system. While the intentions may be benevolent, this productivity-driven narrative often overlooks

the broader ethical obligation to ensure well-being and human dignity beyond the lens of economic contribution.

Ethical challenges and opportunities of AI and big data in mental health

As we move toward the age of AI, the ethical challenges become more nuanced. AI reflects the shades of grey between the black-and-white choices that previously defined human decision-making. The potential of AI is vast, but we are still learning how to harness it. Humanity races toward technological infinity, yet inequality remains entrenched in many parts of the world—people live without access to basic needs like water and food in a world where technology could, theoretically, solve these issues. Innovation, rather than perpetuating inequality, has the potential to bridge gaps in access to resources and services, provided we develop the ethical frameworks to ensure these benefits are shared equitably.

AI reflects societal values and can go beyond being just an assistant—it can learn from human behavior and guide decisions in subtle ways, encouraging people toward certain actions without them even realizing it. In the context of ethics and mental health, this brings both opportunities and risks. While AI can enhance human potential by automating routine tasks and offering gentle guidance, there is also a significant danger of cognitive downskilling. Routine tasks are essential for maintaining brain health, and when AI takes over these activities, people may drift into passive consumption, such as endlessly scrolling through social media, which harms cognitive development. The key challenge isn't whether AI will replace human thinking, but how we can use it to improve human abilities while safeguarding our dignity, autonomy, and mental engagement.

Moreover, as big data management grows in importance, it offers an unprecedented opportunity to capture the complete picture of the world around us. Through comprehensive data collection and analysis, we can identify the needs of individuals and communities more accurately

than ever before. Yet, the equation of progress does not rely solely on technology. It requires education on emotional intelligence and ethical reasoning to guide our approach, ensuring that data serves the common good. While cognitive skills are crucial, education on emotional intelligence helps balance technological advancements with moral concerns, ensuring we prioritize both human needs and ethical integrity.

Placing mental health in a broader context and objectives of this book

Mental health, as part of this evolving landscape, is not simply a matter of individual pathology; it is deeply influenced by social conditions, economic inequalities, and environmental factors. Before we can evaluate the role of AI and digital tools in mental health, we need to situate mental health within its broader social context. This includes recognizing that while some mental health issues have genetic origins, many are driven by social stressors, lack of access to care, and systemic inequality.

By starting with a conceptual foundation, this book aims to:

1. Clarify the ethical challenges posed by integrating AI and digital tools into mental health care.

2. Address how social structures, inequality, and the current healthcare system shape mental health outcomes, and how these factors intersect with digital solutions.

3. Equip readers with the necessary ethical framework to critically engage with the technology, ensuring it benefits individuals and communities equitably.

This approach ensures that when we discuss digital mental health, we do so with a full understanding of its ethical implications, the potential cognitive and emotional risks, and the social impact of these innovations.

The social movement from villages to cities: Ethics of care, cultural continuity and the role of the community in urban life

Understanding mental health in the digital age requires a deep reflection on the social transformations of the 20th century. The industrialization of the 18th and 19th centuries initiated a significant social shift, moving populations from rural areas to urban centers in search of economic opportunities. As agricultural jobs declined and industries rose, traditional social structures—rooted in family and community—began to dissolve. Communities, once tightly knit and supportive, became fragmented as people relocated to cities and became absorbed in an emerging industrial economy. This migration was not only geographical but also a fundamental transformation in the ways people lived, worked, and maintained social bonds (Elliot & Urry, 2010).

Technology, urbanization, and the impact on biological rhythms

As technology advanced, urban life became increasingly detached from the natural environment. In rural settings, life and work were historically tied to natural cycles such as seasons, daylight, and weather patterns. The production of food, the central activity in these settings, required collaboration and a deep connection to the environment. However, urbanization and technological improvements have led to the decline of this connection.

In cities, artificial environments such as artificial light, extended work hours, and the predominance of sedentary jobs have disrupted natural biological rhythms. Modern cities, with their emphasis on productivity, enable night shifts, artificial day-night cycles, and remote working—often at the cost of mental well-being. Studies show that prolonged exposure to artificial light and disrupted sleep patterns can contribute to mental health disorders such as insomnia, anxiety, and depression (Tancredi et al., 2022). Furthermore, reduced physical activity due to sedentary work has increased chronic mental health conditions (World Health Organization, 2018).

The shift from rural to urban life: Commodification of mental healthcare

While we do not idealize rural life, it is crucial to understand the fundamental shift in how mental health care is perceived and delivered as populations moved from rural to urban settings. In rural communities, mental health care was often a community responsibility, embedded in informal networks of care such as family, neighbors, and religious institutions. This care was not transactional but based on mutual support, an essential part of maintaining the group's well-being.

However, with the rise of industrialization and urbanization, these close-knit social structures fragmented. In cities, mental health care has increasingly become a commodified service, driven by the demands of an industrial economy that prioritized productivity and individual success. As people adapted to the pressures of city life, care for mental health shifted from being a communal need to a paid service—accessible only to those with the resources to afford it.

This commodification reflects a deeper issue: urban environments often lack the time and space for community-based support systems to flourish. The result is a system in which mental health care is viewed as a consumer good, rather than a fundamental social need. People in cities, consumed by long work hours and individual pursuits, may not have the time or proximity to sustain the community care networks that were vital in rural life.

The COVID-19 pandemic: A temporary return to community care

The COVID-19 pandemic highlighted this dynamic when traditional, paid mental health services became less accessible. During the crisis, urban communities saw the re-emergence of community-based care systems. Faced with lockdowns, job losses, and isolation, people organized networks of mutual aid, offering emotional support, food, and resources to those in need. This moment mirrored the community care

systems once prevalent in rural settings, where the collective well-being took precedence over individual gain.

However, this return to community-driven care was temporary. As the pandemic subsided, the pressures of urban life resumed, and many of these informal care systems dissolved. People returned to the commodified model of mental health care, driven by the realities of city living—where time is scarce and mental health care is once again something to be bought, not shared.

Post-COVID: Back to paid services and the commodification of mental health

Post-COVID dynamics illustrate the challenge of sustaining community-based care in urban environments. While the pandemic offered a glimpse of alternative, more humane approaches to mental health care, the economic and social structures of cities make it difficult for such systems to endure. People often lack the time to engage in community care, and paid services once again become the default.

This shift reveals a broader critique of how industrialization and urbanization have contributed to the commodification of mental health care, transforming it into a market-driven service rather than addressing it as a collective, community-based need. The reversion to paid services highlights the limitations of city life in fostering long-term, sustainable mental health support systems that are built on mutual care.

Urban-rural contrast: Environment, technology, and mental health

The shift from rural agricultural societies to urban service economies represents more than a change in location; it's a fundamental shift in how humans relate to the environment and their communities. Rural communities historically relied on shared responsibilities, fostering social bonds and mutual support. Mental health care, when needed, was often provided informally by family, religious institutions, or community leaders. In contrast, urban environments prioritize individ-

ual productivity, often leading to social isolation, especially in jobs that involve long hours of solitary or repetitive tasks (Sennett, 1998).

The rise of mental health disorders in urban areas highlights this contrast. According to UN-Habitat (2022), nearly one in four people in cities experiences mental health conditions, and these rates are expected to rise as urbanization accelerates. The World Health Organization projects that by 2030, mental health disorders will be the leading cause of disability worldwide, with urban environments disproportionately affected. Depression, anxiety, and stress-related conditions are now prevalent, with urban living contributing significantly (WHO, 2017).

The digitalization of mental health services: Bridging the gap and raising ethical challenges

The digital transformation of mental health care has become a necessary response to the gaping void left by the sheer inadequacy of traditional mental health services. Overcrowded cities, strained healthcare systems, and an overwhelming demand for mental health support have created an urgent need for innovation. Enter digital mental health services: a lifeline in urban landscapes where the ratio of specialists to those in need is embarrassingly insufficient. But the problem doesn't stop there—rural areas are left in an even more desperate state, cut off from both in-person care and many of the digital tools urban populations now take for granted.

To bridge this gap, tools like teletherapy, mental health apps, and online support networks have surged forward, offering convenience, accessibility, and hope. AI advancements have supercharged these platforms, enabling personalized care, automated assessments, and rapid feedback through AI-powered chatbots and recommendation algorithms. In theory, it sounds like a breakthrough—but in practice, it's not that simple. Significant investments are being funneled into the development of task-autonomous AI for mental health care, driven by the potential for these systems to provide scalable, accessible solutions. However, recent research by Grabb, Lamparth, and Vasan (2024) high-

lights critical ethical concerns. Their evaluation of current language models in mental health contexts revealed that many AI systems could cause harm, particularly in emergencies, due to their inability to navigate the nuances of mental health conditions or provide adequate safeguards. This underscores the need for stringent ethical frameworks before fully deploying AI in autonomous mental health care.

An example of digital mental health service implementation is Sweden's long-standing use of Internet-Based Cognitive Behavioral Therapy (ICBT), which has been effectively integrated into routine care for over 25 years (Vernmark et al., 2024). Sweden's national platform for ICBT demonstrates the potential for wide-scale digital interventions, but also highlights ongoing challenges such as ensuring equitable access and maintaining ethical standards. Similarly, the UK has made strides with platforms like SilverCloud, which offers therapist-supported digital CBT and has been widely adopted across the NHS (Duffy et al., 2023). Both cases underscore the need for robust ethical frameworks to guide the implementation and ensure that digital tools complement rather than replace crucial human elements in mental health care.

However, while these digital tools offer potential solutions, they also raise significant ethical challenges. AI-powered mental health platforms often operate with limited human oversight, leaving many individuals to navigate their mental health alone, without the empathy and connection traditionally provided by community-based or in-person care.

Moreover, the current shift towards digital self-care has sparked a new narrative that risks amplifying the very isolation these tools claim to address. While apps for guided meditations and AI-assisted therapy promise convenience, they foster a "self-everything" culture, pushing individuals towards managing their mental health in isolation. The rise of these platforms excludes one crucial element—meeting others. What used to be communal experiences, such as religious rituals or group therapies, are being transformed into solitary activities. This shift is concerning, as these communal practices once played a vital role in helping individuals cope with suffering by fostering social cohesion.

As societies become more secular and increasingly reliant on digital services, the relational and communal aspects of mental health care risk being lost. Previously, religious rituals or even modern yoga sessions, which still retain a communal aspect—where participants once said "amen" and now say "namaste"—helped to connect people through shared experiences. In contrast, the rise of individualistic self-care apps distances people from these shared rituals, increasing the risk of alienation. Just as pornography, which never involves another person in genuine connection, can be damaging to mental health, virtual communities or self-guided apps that substitute real-world interaction can have similar detrimental effects. Digital tools need to move beyond merely enhancing "self-everything" and instead find ways to support or replicate these communal practices, which are essential for mental well-being.

This growing reliance on digital self-care, while potentially helpful for some, may lead to a greater sense of disconnection for many. Without the relational and social interactions that are fundamental to well-being, mental health risks becoming another commodified service, devoid of the community care and mutual support that are essential for true healing.

Furthermore, the widespread use of AI introduces concerns around data privacy, algorithmic bias, and accountability. AI technologies hold promise for personalizing mental health care and enabling early detection, but they often rely on datasets that may perpetuate biases, particularly against vulnerable populations. Transparency is often lacking, and the algorithms that drive these tools can lead to inequitable outcomes (UNESCO, 2021). Additionally, the collection and use of personal mental health data for training AI systems raise critical questions about data ownership and informed consent. Who controls this data, and how can individuals be assured that their mental health information isn't being commodified for profit?

International organizations such as UNESCO and the European Union are working to develop frameworks to ensure that AI in mental health

care is governed by ethical standards that prioritize human rights, transparency, and accountability (European Commission, 2021).

The ethics of mental health care: Balancing relationships and care

As digital mental health services evolve, care must remain relational. Carol Gilligan's work on the ethics of care emphasizes the importance of relationships, context, and responsibility in ethical decision-making. Developed originally as a feminist critique of traditional moral theories, Gilligan's framework underlines the need for interpersonal connections and mutual support in mental health care, contrasting with the individualistic, productivity-driven ethics that often prevail in urban environments (Gilligan, 1982). Relational care highlights the vulnerabilities and emotional complexities of individuals, which must be considered in any mental health model. In cities, where the pressures of individualism and competition are intense, maintaining a focus on relationships within mental health care is critical to counteracting alienation and stress.

At the same time, Tronto's expansion of the ethics of care adds another dimension that is highly relevant to digital mental health services. Tronto emphasizes the political and societal implications of care, framing it as an ongoing activity that requires attentiveness, responsibility, and responsiveness to the vulnerabilities of others (Tronto, 1993). In the context of mental health, Tronto's framework reminds us that care is not only about the interaction between individuals but also about the systems and structures that shape the provision of that care.

Tronto's critique applies directly to the commercialization of mental health services. The commodification of care in urban areas, where services are often individualized and monetized, contrasts sharply with the communal and relational aspects of mental health care that both Gilligan and Tronto advocate. Mental health services, when treated as consumer goods, often become inaccessible to those most in need, further entrenching social inequalities. Moreover, digital tools, while innovative, can exacerbate this disconnect by offering automated solutions that lack the depth of human relationships central to the ethics of care.

Integrating relational care into digital platforms

To create an ethical framework for digital mental health, we must balance technological advancements with the relational principles emphasized by Gilligan and Tronto. Digital platforms should not solely prioritize efficiency and accessibility but also embed relational care into their design. While AI can support diagnosis and treatment recommendations, professionals must remain central to the process, ensuring that empathy and human connection are preserved in the delivery of care.

Rituals of care, which have traditionally helped individuals cope with suffering through communal practices, need to find their place in digital spaces as well. As societies become more secular and reliant on digital services, the relational and communal aspects of mental health care risk being lost. These rituals, whether religious or cultural, foster social cohesion and reduce the isolation common in urban settings. Digital tools must find ways to replicate or at least support these communal practices to prevent further alienation. The ethics of care offers a crucial lens through which to evaluate the digitalization of mental health services. While digital tools offer the promise of expanded access and improved care, they also risk exacerbating existing inequities and stripping away the relational aspects of mental health care that are critical for holistic well-being.

It is crucial to strike a balance between technological innovation and the preservation of human connection, ensuring that the tools designed to help do not inadvertently harm. Public policies must ensure that ethical concerns surrounding AI in mental health services, such as data privacy, algorithmic bias, and accountability, are addressed to protect individuals and promote human rights.

Mental health in public policies

International organizations such as the World Health Organization (WHO), the World Bank, and the United Nations (UN) have issued comprehensive guidelines urging countries to incorporate mental

health into national health policies. The WHO Mental Health Action Plan 2013–2030 advocates for universal mental health care, emphasizing community-based services and human rights-based approaches to mental health (WHO, 2013). The World Bank, in its World Development Report, highlights that mental health is not just a health issue but also an economic imperative, with mental illness costing the global economy approximately US$1 trillion per year in lost productivity (Batada & León Solano, 2019).

In the European Union, mental health is an integral part of the Digital Health and Care Strategy. The EU Mental Health Compass demonstrates how digital technologies, such as telemedicine and mental health apps, can provide equitable access to care for both urban and rural populations. This framework fosters collaboration between health systems, digital service providers, and policymakers to ensure that ethical considerations are integrated into the deployment of digital mental health services (European Commission, 2021).

In the United States, mental health is increasingly considered a public health priority. Agencies such as the Substance Abuse and Mental Health Services Administration (SAMHSA) and the Centers for Disease Control (CDC) are expanding digital mental health services. Initiatives such as the National Suicide Prevention Strategy and the Behavioral Health Integration Framework underscore the role of teletherapy and digital platforms in expanding access to underserved populations, particularly in rural areas. The United States Agency for International Development (USAID) also recognizes mental health as a key component in post-conflict recovery, incorporating mental health support into its global health programs (USAID, 2020).

Latin American countries, such as Chile, Brazil, Colombia, and Peru, are also adopting digital mental health policies. Chile has launched telepsychiatry programs in rural and underserved areas, while Brazil has pioneered mobile mental health platforms to support urban communities in favelas. Colombia and Peru are expanding their telemedicine initiatives to address mental health challenges arising from conflict

and socioeconomic disparities. The Pan American Health Organization (PAHO) supports these efforts, advocating for culturally sensitive and rights-based digital mental health services (PAHO, 2021).

Australia and New Zealand have also incorporated digital mental health services into their national strategies. Australia's National Mental Health Strategy includes e-mental health tools to meet the growing demand for mental health services across vast geographic regions. In New Zealand, the Mental Health and Wellbeing Commission emphasizes the role of telehealth in reaching remote and Indigenous populations (Australian Department of Health, 2021; New Zealand Mental Health Foundation, 2020).

Countries such as Australia and the United States are also closely monitoring the use of AI in mental health to ensure compliance with ethical standards and protect individuals from harm (Australian Department of Health, 2021). Public policies not only play a vital role in addressing these ethical concerns in AI but also in safeguarding the core principles of mental health care. They provide a necessary foundation to ensure that digital tools, while innovative, do not compromise ethical values in the pursuit of technological efficiency.

The importance of public policies cannot be overstated, as they guide the integration of ethical standards in digital mental health services, particularly in the use of AI. By ensuring transparency, protecting data privacy, and addressing potential algorithmic biases, policymakers help safeguard the well-being of individuals while promoting access to high-quality care. These frameworks are essential for ensuring that digital mental health platforms foster equitable care, reduce disparities, and maintain human-centered approaches to mental health care in an increasingly digitized world.

Conclusion

The industrialization and urbanization of the past century have fundamentally altered social connections that once supported mental health.

As cities expanded, mental health care shifted from being a community-driven necessity to a commodified service. This transformation created a fragmented system where profit often takes precedence over care, leaving many people without access to the relational and supportive frameworks that were once central to rural life.

While technology and digital platforms present new ways to address gaps in mental health care, they also introduce significant ethical challenges. The increasing use of AI—through teletherapy, automated assessments, and mental health apps—offers personalized and accessible services. However, these advancements raise concerns around data privacy, algorithmic bias, and the commodification of personal mental health data. Without proper ethical oversight, these technologies can exacerbate inequalities and compromise individual dignity.

In this context, the ethics of care provides a vital framework for rethinking mental health care in the digital age. It emphasizes that mental health cannot be fully addressed through isolated, individualized interventions. Instead, care must be grounded in relationships, mutual support, and community. Carol Gilligan's ethics of care challenges the impersonal, transaction-based model that dominates mental health services today, advocating for a more humane approach that integrates empathy, responsibility, and context into treatment.

As governments, mental health professionals, and technology developers continue to advance digital solutions, it is crucial that they align technological innovation with ethical standards. The ethics of care must guide the integration of AI and digital tools, ensuring that technology enhances—not replaces—the human connections that are critical to mental well-being. Public policy should prioritize community-based care, protect individual dignity, and promote equitable access to mental health services.

By embedding ethical frameworks into the development of AI-driven mental health care, we can move beyond a commodified, fragmented system and toward a future where technology supports human dignity and relational care. This new paradigm balances innovation with empa-

thy, ensuring that mental health care remains rooted in the shared well-being of communities.

Looking ahead

As we move forward in this book, the following chapters will explore how these ethical frameworks can be practically applied within the evolving landscape of digital mental health. We will delve deeper into the practical challenges of integrating AI and digital platforms into everyday clinical practices, addressing both their potential and their limitations. The upcoming sections will also focus on defining the competencies required for mental health professionals to navigate this digital transformation, ensuring that they are equipped to maintain human-centered care in a technology-driven environment.

Furthermore, we will examine the role of public policy in shaping the future of mental health care, with a particular focus on how regulatory frameworks can ensure that innovation does not come at the cost of ethical integrity. By fostering collaborations between technologists, policymakers, and mental health experts, we can create a system that leverages the best of both worlds—technological advancement and human compassion.

In essence, the journey ahead will guide us through the intricate balance between digital progress and ethical responsibility, showing how we can build a mental health ecosystem that is both innovative and deeply human-centered. The principles outlined here will serve as the foundation as we explore the pathways to a more equitable, ethical, and effective future in mental health care.

Chapter 2

From DNA to digital human assets: The ethical transformation

Understanding the transition from biological data to digital identities and assets.

This chapter was written in collaboration with Dr. Antoni Abat-Ninet

Introduction: Digital human assets as the new DNA

In the 21st century, personal data has become one of the most valuable assets, transforming how we view identity, health, and privacy. The analogy of Digital Human Assets (DHAs) as the new DNA captures this shift. While DNA forms the biological blueprint of human beings, DHAs represent the digital information traces individuals leave behind through interactions with technology (Tello de la Torre, Perez & Martí-Noguera, 2021). Much like DNA, these assets are vital to understanding human behavior, emotions, and health. DHAs allow the creation of digital representations of individuals, akin to creating artificial life, through their personal data (Abat Ninet, 2019).

As technology advances, digital phenotyping, the process of using digital data to assess behavior and health, has become crucial, particularly in psychiatry. Tools like smartphones capture vast amounts of data, which can be analyzed to predict mental health conditions, such as depression or bipolar disorder, by tracking behavior patterns (Shen et al., 2024). This revolution in data collection moves us from a biologically focused paradigm to one centered around digital information, which is often owned and controlled by tech companies rather than the individuals generating the data.

However, this shift involves much more than passive data collection. As De La Fabián, Jiménez-Molina, and Pizarro Obaid (2023) critically

analyze, the "neuro-digital complex" represents an intricate web where data ownership, control, and the merging of biological and digital information create unprecedented ethical challenges. The boundaries between therapeutic interventions and invasive digital technologies are becoming increasingly difficult to delineate, highlighting the need for a comprehensive ethical framework.

This chapter explores the ethical transformation that accompanies this shift from DNA to DHAs. As DHAs become more valuable, questions about data ownership, privacy, and consent arise. Who truly owns these digital traces, and how should they be used ethically in mental health and beyond?

The rise of digital phenotyping and DHAs

Digital phenotyping refers to the collection of data from digital devices, such as smartphones and wearables, to create profiles of an individual's mental and physical health. It allows for continuous monitoring of mental states based on behaviors like phone usage, mobility, and communication patterns. This data can offer real-time insights into conditions such as anxiety, depression, and bipolar disorder (Leaning et al., 2024).

In mental health, digital phenotyping offers an unprecedented opportunity for early intervention. For example, reduced phone usage or social withdrawal might signal the onset of depression, while increased mobility could suggest a manic episode in individuals with bipolar disorder (Saccaro et al., 2021). These predictive capabilities promise more personalized care and better outcomes, as clinicians can intervene before conditions worsen.

However, digital phenotyping raises significant ethical dilemmas. Traditional health data collection occurs in controlled environments, but digital phenotyping collects data from users' everyday lives without their active participation or full awareness (Shen et al., 2024). This passive collection of behavioral data introduces risks related to consent, autonomy, and privacy, as individuals might not fully understand or consent to the scope of data being collected or how it is used.