When the Digital Continues After Death

Ethical Perspectives on Death Tech and the Digital Afterlife. By Anna Puzio

Abstract Nothing seems as certain as death. However, what if life continues digitally after death? Companies and initiatives such as Amazon, Storyfile, Here After AI, Forever Identity and LifeNaut are dedicated to precisely this objective: using avatars, records, and other digital content of the deceased, they strive to enable a digital continuation of life. The deceased live on digitally, and at times, these can even appear very much alive - perhaps too alive? This article explores the ethical implications of these technologies, commonly known as Death Tech. With the advancement of artificial intelligence, Death Tech will inevitably transform mourning practices, our perception of death, and how we cope with its reality in the coming years. In this article, it is demonstrated that Death Tech can contribute to individual grief support, education, and a vibrant culture of remembrance. However, it is crucial to recognise that the Digital Afterlife is not a paradise but necessitates active designing and ethical deliberation.

etween 2022 and 2023, ChatGPT garnered significant attention in the media and public sphere, becoming a widely discussed topic. However, amidst the focus on ChatGPT-3 and speculations about its future capabilities, little notice was given to the existence of Samantha and William. Samantha and William are chatbots hosted on the Project December website, each possessing their own unique personalities. Created by Jason Rohrer in 2020 using the GPT-3 framework, these personalised chatbots allow users to engage in personal conversations tailored to their preferences. Project December has since transitioned away from GPT-3, now employing a different AI language model due to non-compliance with GPT-3 development team guidelines. However, things took a turn when a user named Joshua Barbeau, dissatisfied with chatbots like Samantha and William, developed

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his own chatbot based on the model of his deceased girlfriend. Through this customised chatbot, Joshua was able to have extensive conversations with his late girlfriend, Jessica, finding solace and support in the technology throughout his grieving process (cf. The Decoder 2021; Project December 2023).

Death Tech and the Idea of a Personalised ChatGPT

Such technology falls under the category of *Death Tech* – technologies that are related to the topics of death, dying, and coping with grief. These can include apps that assist with funeral organisation and bureaucratic matters. However, they can also encompass avatars that are uploaded to platforms in the likeness of the deceased, allowing communication to continue after death. These avatars can possess human-like qualities, re-

An example is Here After AI (2023), where individuals can share memories of their lives. After their passing, relatives can listen to these memories. sembling people and exhibiting movements, laughter, and even tears. The Digital Afterlife refers to the digital presence of an individual after their passing. To enable someone to live on digitally after death, various forms of information and data such as pictures, videos,

audio recordings, social media posts, and messages are uploaded by the individual. Through this process, avatars aim to closely resemble the deceased person in the digital realm.

One notable example is the company Storyfile (cf. Website 2023), which enables the recording of personalised stories. Individuals respond to a series of questions about their life while being filmed. Following their death, loved ones can engage in conversations with an AI-powered avatar based on these questions, encountering a lifelike representation of the deceased. This creates the impression of an actual conversation with the departed individual. This application not only finds relevance in the context of death but also has potential applications in storytelling and customer care within the business sector. Another example is Here After AI (2023), where individuals can share memories of their lives through audio and images. After their passing, relatives can listen to these memories in a highly realistic manner, fostering a sense of connection and remembrance. Additionally, Amazon (2022) announced at the re:MARS 2022 conference that Alexa would be able to speak in the voice of the deceased. Promotional materials from Amazon showcased a scenario in which a deceased grandmother reads a book to her grandchild before bedtime. Numerous other startups are emerging in this field,

and Microsoft also has similar endeavors within the Death Tech industry. Furthermore, in the metaverse, it is apparent that space will be created for the deceased (cf. Website VYVYT 2023).

Nothing New and Yet Uncanny?

In essence, preserving personal records of deceased individuals is not a novel concept. Letters, diaries, and notes are often left behind by those who have passed away. Films and novels have depicted scenarios where deceased individuals have prepared text messages or letters for their loved ones before their demise, providing a source of solace during the mourning process (e.g., the film "Text for You", German: "SMS für Dich" 2016). Nowadays, smartphones are filled with an abundance of videos, voice messages, and photos. The option of allowing the deceased to continue existing in the form of avatars is not new either, as it has long been possible to model avatars after real individuals in computer games. So, what sets the current scenario apart?

The avatars now appear much more lifelike, featuring the recorded voice of the deceased, human-like movements, and a wealth of data and recordings. They resemble real people and bear a strong resemblance to the deceased individual. Additionally, there is the element of interaction: these virtual representations of the deceased move, speak, address the users, and engage in conversations with them. They are not passive like old letters and chats; their recordings are not one-sided. Instead, they are responsive, actively answering and reacting to the user. Bell & Grey (2001) refer to this as an active "two-way immortality," while simple chats belong to the passive "one-way immortality". The platform Eterg, which has since been discontinued, aimed to enable the created avatar to interact, post, and evolve independently, even when the user is offline (cf. Savin-Baden, Maggi/Mason-Robbie 2020a, p. 17). When watching commercials from Amazon or Storyfile, an initial sense of unease may be evoked. However, even when the answering machine is still filled with the voice of a deceased person, a shiver quickly runs down our spine. So, what does ethics have to say about this?

Challenges of Death Tech: The Digital Afterlife is Not a Paradise

Death Tech is not the same across the board. These technologies and their functionalities are so diverse that they must always be evaluated based on their specific applications and functions. In the following, I will present ethical aspects related to Death Tech. Support with organisation. Less challenging are apps, for instance, that assist in organizing funerals and provide information and checklists. However, even in these cases, issues such as data privacy, reliability, and ethical design come into play. The

Digital legacies have already been discussed in the context of social media. Who is responsible for the data after someone's death? app Grievy (cf. Website 2023), for example, not only offers organizational assistance but also includes a grief support program developed by psychologists. Such programs always require education, the involvement of psychologists, and do not replace human contact.

However, they do provide individual support during the grieving process and offer easy access to assistance. The platform MyWishes (cf. Website 2023) (formerly known as DeadSocial) allows people to organise their digital legacies and prepare for death in social networks before they pass away.

Data, consent and legal questions. These platforms and applications collect a significant amount of data to make avatars resemble the deceased as closely as possible. Therefore, responsible data management and ethical considerations are crucial. The consent of the deceased remains central. The data is important and private to the individual, so it must be protected even after death. Digital legacies have already been discussed in the context of social media. Who is responsible for the data after someone's death, and who oversees their presence in the digital afterlife?

Manipulation, deception and education. In Death Tech, a distinction is made between avatars and personas. Avatars are enriched with a lot of material before a person's death, making them resemble the deceased but with limited conversational abilities and minimal personal growth. On the other hand, a virtual persona learns over time, develops further, and interacts more strongly with its environment. It can more easily be mistaken for a living person (cf. Savin-Baden/Mason-Robbie 2020a, p. 21). This strong resemblance to the deceased can be manipulative and deceptive. In this regard, vulnerable groups need to be protected, as well as those who may have difficulties distinguishing the virtual avatar/persona from the deceased person due to psychological dispositions. For example, Death Tech needs to be age-appropriate; children of certain ages would not understand that their virtual grandmother, who reads them a bedtime story every night, is not alive. There are different forms of deception, and not all of them are objectionable. Deception is fundamentally a normal part of social interaction (cf. Danaher 2020). We are less concerned when children are deceived by Disney characters and toys. How hidden is the deception, and is it recognizable as such? What purpose does it serve? Emotional avatars, for example, human-like avatars that make us cry and manipulate us into specific actions, can be problematic. It requires education and labeling requirements, as well as ethical design from the outset.

Abuse and instrumentalisation. Various forms of abuse are possible. Given the emotional significance of the deceased individual, companies can exploit this relationship and the associated emotions (e.g., guilt, longing, love) to increase prices. Therefore,

it is important to reflect on the interests and business strategies of the companies involved. It is also conceivable that Death Tech will not only be used for deceased individuals. Death Tech can be abused for cyberbullying by falsely declaring someone as deceased who is actually

alive. In cases of heartbreak, individuals can upload their former partners digitally and attempt to continue the failed romantic relationship. It is also possible to instrumentalise the avatars of deceased individuals for specific statements or goals, which necessitates protecting the rights of the deceased.

Truth and truthfulness. In addition to the question of manipulation and deception, there is also a new question about truth and truthfulness. Because a person, their actions, and their statements are inevitably tied to a specific time, they cannot be taken out of that context and activated in a different time. Opinions, beliefs, interests, and identity are always linked to a particular time, historical events, places, cultures, and contexts, and are dependent on them. The statements made by the avatar after the death of the deceased individual would likely not reflect their current views. They are not independent of the context.

Relationships. We have close relationships with our deceased loved ones; we miss them, feel guilt, and would do anything to spend more time with them. Therefore, it is highly plausible that we will develop close relationships with their avatars. When the avatar dies, there is even talk of a "second death" or "second loss," highlighting how devastating it can be when technical disruptions occur or when the company goes bankrupt. Protection against such phenomena is necessary. Furthermore, questions must be asked about how Death Tech will change the relationship with the deceased, as well as with the living and our interpersonal relationships.

We have close relationships with our deceased loved ones; we miss them, feel guilt, and would do anything to spend more time with them. *Psychological consequences.* The psychological consequences of using Death Tech must be thoroughly researched. Therefore, it is important for such applications to be developed in collaboration with psychologists. Under what conditions does the grieving process get disrupted, and which features promote it? Does the embodied representation of the deceased, similar to the corpse, facilitate the processing of death?

These reflections show that the digital afterlife is not a paradise. There will be conflicts, abuse, and violence in this realm. Therefore, ethical considerations are needed to responsibly shape this afterlife.

The New Digital Immortality

Transhumanism, posthumanism and mind uploading. Even the Epic of Gilgamesh, dating back to the 3rd millennium BC, bears witness to the pursuit of immortality. Likewise, our writing practices. We strive to be remembered and to live on, even if only in the memories of our loved ones. In the discourse of technology, visions of immortality are resurfacing.

Death Tech particularly resonates with the movements of transhumanism and posthumanism, which aim to transform or transcend human beings through new technologies. The vision of mind uploading, advocated by these movements, refers to

While transhumanism seek to upload the deceased individuals exactly as they were, Death Tech only creates their virtual representation as an avatar. the idea that the "mind" and thus the entire individual can be uploaded onto a hard drive through brain scanning, given a new body, and continue to exist there. The concept of uploading has been frequently portrayed in science fiction (e.g., the television series "Up-

load", since 2020). I have examined transhumanism, its visions, and its understanding of the human being elsewhere (Puzio 2022). However, at this point, the focus is on the distinction between transhumanism, posthumanism, and Death Tech.

While transhumanism and posthumanism seek to upload the deceased individuals exactly as they were, Death Tech only creates their virtual representation as an avatar. In Death Tech, the deceased person is not actually uploaded and does not possess consciousness or similar attributes. It primarily revolves around the notion of "weak artificial immortality." On the other hand, in the case of "strong artificial immortality," consciousness is transferred from the individual's biological body to a different substrate (e.g., in transhumanism and posthumanism) (Jandrić 2020, p. 175). Nevertheless, death tech sometimes approaches these trans- and posthumanist ideas. For example, the platform LifeNaut (Website 2023) states that users can "create a digital back-up of their mind and genetic code" and their goal is the "transfer of human consciousness to computers/robots and beyond."

Religious and intercultural perspectives. It is noteworthy that death is intertwined with religious and cultural beliefs, which is relevant to Death Tech. Especially in the case of death, people often resort to religious rituals (e.g., funerals). Cultures and religions have established diverse ways of dealing with

death and grief, exhibiting significant variations. On the one hand, there is a need to respect cultural and religious diversity. On the other hand, Death Tech offers an opportunity to represent and explore this diversity, providing new avenues for understanding (cf.

Puzio/Kunkel/Klinge 2023). From a Christian perspective, the afterlife is associated with salvation and characterised by divine closeness, whereas the digital world is shaped and controlled by ourselves, available and accessible in the present life. However, other religions have different notions of the presence of the deceased in the here and now. For example, in Shinto, objects can also be alive and have spirit, leading to completely different interpretations of Death Tech for these religions. If the grieving process takes place in the digital realm on such virtual platforms, it will also become important for religious bereavement support to reach these spaces where grief processing occurs.

Death Tech as an Opportunity for a Vibrant Culture of Remembrance

Grief Tech. Death Tech can also present an opportunity for our approach to death, dying, and grief, such as through Grief Tech. *Grief Tech refers to technologies that accompany the grieving* process. While Death Tech generally aims at digital presence after death, Grief Tech aims to provide support during the grieving process. Currently, mourning is already being digitally communicated, memories shared, and emotions expressed on websites and social media. How can we effectively utilise Death Tech to provide genuine support in the grieving process?

Vibrant culture of remembrance. The platform E-Memoria (cf. Website 2023) strives to transform cemeteries into vibrant places of remembrance. QR codes placed on graves grant access

From a Christian perspective, the afterlife is characterised by divine closeness, whereas the digital world is controlled by ourselves. to an online platform where information, photos, and memories of the deceased can be uploaded. Through technology, diverse possibilities for farewell rituals can be created. Compared to traditional cemeteries, which may feel distant with their cold, imposing gravestones, these digitally connected burial sites could become lively spaces for remembrance and mourning.

Education and cultural heritage. With Death Tech, recordings of famous thinkers, celebrities, and Holocaust survivors, who serve as the last witnesses of the Holocaust, can be made accessible. Through digital memorials and virtual journeys, Death Tech could make valuable contributions in the field of education. However, it is important to acknowledge and emphasize that the statements of the deceased are always bound to a specific time and context. Furthermore, Death Tech has the potential to contribute to the destigmatization of death.

Individual grief processing. The grieving process is highly individual, and technology can provide individualised sup-

Technology can provide individualised support. Platforms like Farvel enable the creation of virtual spaces for remembrance. port. For instance, platforms like Farvel (cf. Website 2023) enable the creation of virtual spaces for remembrance. These spaces can be customized and entered with an avatar. Typical belongings of the deceased person, such as their favorite sofa, can be

uploaded.¹ Technology allows for individual, personalised, and anonymous grief processes.

Psychological well-being. Rohrer, in the context of Project December, stated that one can express anything to technology, speak openly without shame (cf. The Decoder 2021). Not everything needs to be shared with others, and some thoughts or repetitions might burden them. However, this does not aim to replace interpersonal communication, which remains crucial for the grieving process. Instead, it is about harnessing the strengths of technology to ease grief and promote remembrance. Furthermore, Death Tech provides an opportunity for farewell in situations where it may have been otherwise impossible, such as during the COVID-19 pandemic when funeral attendance was restricted, in cases of sudden and unexpected deaths, or for other personal reasons preventing one from attending a funeral.

1 The Farvel project was completed in 2022. It gave rise to the companies VYVYT and ternaty. See: https://farvel.space. Accessed: 12.6.2023.

On the Path to a Digital Afterlife: What Lies Ahead?

Relationships hold great importance for individuals, and the emotions attached to departed loved ones are profound, indicating a substantial demand for Death Tech. Almost everyone has experienced the loss of a beloved person. The Death Tech industry is expected to undergo a boom, necessitating ethical reflection and active participation. Even now, one can utilize the plethora of free AI tools in the realm of Death Tech (e.g., mypipio), which were not originally developed for such purposes.

However, it is also worth delving into the future beyond

the present state of affairs. What lies ahead? What if we continue uploading deceased individuals as avatars or virtual replicas onto digital platforms? Will a Digital Afterlife emerge? If I were to upload my grandmother, I would undoubtedly desire to upload my

grandfather soon after, and perhaps even her beloved dog. On certain platforms, they would then be able to interact with one another.

Another intriguing aspect to consider is the concept of embodiment. As avatars and virtual personas, they are already embodied. But what if they were to have a physical form, such as robots? Would the deceased grandmother one day sit with us at the dining table? Alternatively, what if we accessed Death Technologies not through smartphones or computers but via Smart Home, integrating the departed into our living community?

Death Tech will transform the grieving process, rituals, and our understanding of death, immortality, and life. Already, terms like "digital death", "second life", "second death" and "second loss" have emerged to describe the digital realm (cf. Savin-Baden/Mason-Robbie 2020a, p. 13; 2020b). Mourning will undergo a profound transformation, giving rise to new practices. Alongside the inevitable certainty of death, digital immortality now takes its place.

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