

# **The Right to Forget/Be Forgotten: A Nearly Fundamental Human Right in the Age of Total Recall Technology**

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## **Extended Abstract**

Following the research made by Murata and Orito [1], this study attempts to conceptualise the right to forget/be forgotten along with building a theoretical foundation of this individual's right and validating the social importance of establishing the right, which is characterised as a nearly fundamental human right to protect intellectual freedom and to ensure a spiritually affluent human life and human dignity. Here, forgetting is defined as an intellectual/mental state of a person where he/she doesn't recall a fact that (has) happened in the past or information that he/she knew in the past and/or images, feelings and sensation related to the fact or the knowledge, or as cognitive function which causes such an intellectual state. Glorifying a past event or having erroneous human memory is a kind of forgetting. There is variety in the degree of forgetting; anyone experiences a momentary lapse of memory, short-term or mild forgetting and complete forgetting. Although the intellectual state or cognitive function of forgetting as well as remembrance is observed in organisations, communities, societies and states, the study focuses on forgetting as individual human intellectual state or cognitive function. Genetic memory and meme are pushed aside in this study.

Behind the research objectives is the authors' concern about negative impacts of the externalisation of human memory, and of the consequent malfunction of forgetting, on intellectual activities and growth, personal identity development, happiness and dignity of each and every human being and on society. Forgetting is a quite natural intellectual state or cognitive function for human beings and, in a certain sense, the source of humanity. Whereas many people suffer morbid forgetting due to aging or disease, anyone experiences and enjoys the benefits of wholesome functioning of forgetting more or less. This relates to maintenance of peace of mind and creation of spiritually affluent life through surmounting fault, shame and PTSD, for example; sound mental growth including self-transcendence; positive human relationship-building based on, for example, forgiveness; and establishment of personal identity.

The current socio-economic and technological circumstances surrounding revelation, collection, storage, processing, distribution, share and use of personal information have enhanced the externalisation of human memory beyond the phenomenon of disappearing bodies (Lyon [2]) or inforgisation of human beings (Floridi [3]). In fact, owing to the rapid progress and spread of information and communication technology (ICT), along with the global spread of market-economy principles, human memory has substantially been composed of biological memory and e-memory.

Organisational databases and the Web are considered to substitute a large part of human memory in a very precise, rapid and efficient fashion, over which memory subjects can hardly exert control. Dataveillance systems organisations have developed and deployed collect their existing and potential customers' personal information including on purchasing activities and spatial location in a (nearly) real-time fashion, store it in databases without discarding anything and automatically process the accumulated information to enhance the satisfaction of their customers through providing (pseudo-)personalised products and/or services. Ubiquitous devices such as IC cards, mobile phones with GPS locators, RFIDs and CCTV cameras with pattern recognition functions are very useful for tracking of personal behaviour or real-time personal data collection and thus for strengthening of the functions of dataveillance systems. Web 2.0 applications like weblogs, electronic bulletin boards, social networking services, YouTube and Twitter enhance individual users' revelation of their own and others' personal information and such openly accessible online information can easily be retrieved, copied, stored, used and circulated by organisations as well as by individuals. The proliferation of smartphones reinforces these personal data revelation and use.

There are those who intentionally externalise their memory. Personalisation features of websites such as iGoogle and My Yahoo! facilitate individual users' proactive recording of their life events on the sites. Bell and Gemmel [4] who have undertaken the MyLifeBits project (<http://research.microsoft.com/en-us/projects/mylifebits/>) at Microsoft advocate the advantages and benefits of recording one's entire life digitally. They point out that thanks to the "total recall revolution" or the "e-memory revolution" we will soon be able to be released from the fate of forgetting and thereby live an affluent and happy life in a human manner. With the revolutionary technology, they insist, people could acquire the capacity to relive their precise detailed life story and even to be immortalised (or e-mmortalised (Floridi [3])) by being cyberised or creating their virtual self or cyber twins.

The total recall in computing or unlimited capacity of computer data storage and retrieval had been a long-cherished dream or the indisputable good for ICT engineers as well as users. In fact, ICT engineers in the early days of computerisation had to be careful not to waste valuable data storage capacity. Floppy disks, which were widely used from the early 1970s to the end of 1990s, were well-received as a handy removable storage that could store data (semi)permanently. When the concept of data warehousing systems was proposed in the early 1990s, an attractive aspect of that system concept was that data collected and stored were never erased and would be used permanently.

Even today when the ICT environment in which engineers don't ordinarily need to care about a shortage of data storage capacity and can enjoy ultrahigh-speed

arithmetic processing and light speed communication has been developed, many people seem to remain to believe that the virtue of the total recall in computing should be pursued. In fact, a variety of ICT-based systems public as well as private organisations operate to provide (pseudo-)personalised services to their individual customers presume permanent storage, continual or real-time update and automated ultrafast processing and retrieval of detailed personal data of a huge number of people using proper techniques like collaborative filtering and behavioural targeting. Dataveillance systems, ubiquitous computing systems and lifelogging-based business systems are cases in point, which are believed to enhance customer satisfaction and thus the competitiveness of organisations which run the systems.

However, every time people access some online data related to them involuntarily or by chance or receive unexpected personalised services based on their personal information stored in organisational databases, they may be coerced into refreshing their memory which may contains what they wish to forget. If this is the case, the wholesome functioning of forgetting is seriously disrupted, and those who experience the disruption would suffer reduced intellectual power (Carr [5]) and the distortion of their personal life stories and identity (Klein et al. [6]). The externalisation of human memory carries the risk associated with intellectual freedom and human identity and dignity. Is this the inevitable fate of them or a price they have to pay in return for enjoying the benefit provided by ICT-based information systems? Why can't they require others (including both organisations and individuals) not to remind them of what they forget on its own or wish to forget? Isn't it reasonable for them to expect that they can forget something about themselves and be forgotten by others appropriately?

In the circumstances where, amongst the four modalities of regulation of human behaviour (Lessig [7]), markets and technological architecture function so that people are not allowed to, even appropriately, forget the past of them and the existing social norms don't hinder such function, the right to forget/be forgotten may have to be established as a new social norm or a legal right, although forgetting is a quite natural intellectual state or cognitive function for human beings.

The right to be forgotten has recently been argued by privacy advocates in Europe as the right to control and possibly erase the information they leave behind themselves on the Web (Werro [8]) and European Commission [9] mentioned that people should be able to exercise this right when their data is no longer needed or they want their data to be deleted. These arguments presume that the right to be forgotten can be defined and protected within the framework of the traditional conceptualisation of the right to information privacy focused on individual's controllability over the circulation of his/her personal information (Westin [10]).

However, as a consequence of the rapid advancement of ICT centred on database and network technology and the spread of it throughout society and the economy, people, as individuals, have already lost the power to control the circulation of their personal information and it is extremely difficult for them to regain that power (Murata and Orito [11]). In fact, we are now in the situation in which little brothers (Whitaker [8]) pamper themselves. Any individual or organisation can become a surveillant or surveillants' aide consciously or unconsciously. Therefore, in order to make a definition of the right to forget/be forgotten which can lead to effective measures to prevent harmful impacts of the externalisation of human memory on

individuals' freedom, dignity and happiness and on a realisation of a truly affluent society in the age of total recall technology, it is necessary to depart from the Westinian notion and to assume that any individual cannot control the circulation of his/her personal information at all.

Based on the discussion conducted thus far, this study provides a provisional definition of the right to forget/be forgotten as follows.

*The right to forget:* An individual has the right to be free from being forced to recall what otherwise he/she never recall against his/her will.

*The right to be forgotten:* An individual has the right to be free from any use of information concerning him/her which causes harmful effects on him/her.

Of course, the right to forget/be forgotten should not be an absolute right. This right never accepts the abuse of forgetting and would sometimes conflict with other rights such as freedom of speech on the Net and the public right to know. In this regard, the definition of the right has to be carefully elaborated hereafter not to make it harmful to society. Taking an appropriate balance between the newly proposed right and existing legal framework and social norms is absolutely necessary.

## References

1. Murata, K., Orito, Y.: The Right to Forget/Be Forgotten. In: Proceedings of CEPE 2011, pp. 192--201 (2011)
2. Lyon, D.: Surveillance Society: Monitoring Everyday Life. Open University Press, Buckingham (2001)
3. Floridi, L.: Artificial Intelligence's New Frontier: Artificial Companions and the Fourth Revolution. *Metaphilosophy*, 39 (4-5), 651--655 (2008)
4. Bell, G., Gemmel, D. J.: Total Recall: How the E-memory Revolution Will Change Everything. Dutton, New York (2009)
5. Carr, N. G.: The Shallows: What the Internet Is Doing to Our Brains. W. W. Norton, London (2010)
6. Klein, S. B., German, T. P., Cosmides, L., Gabriel, R.: A Theory of Autobiographical Memory: Necessary Components and Disorders Resulting from Their Loss. *Social Cognition*, 22 (5), 460--490 (2004)
7. Lessig, L.: Code and Other Laws of Cyberspace. Basic Books, New York (1999)
8. Werro, F.: The Right to Inform v. the Right to Be Forgotten: A Transatlantic Clash. Georgetown University Law Center, Public Law and Legal Theory Research Paper Series, Paper No. 2. Available at <http://ssrn.com/abstract=1401357> (2009) (accessed 25 December 2010)
9. European Commission: European Commission sets out strategy to strengthen EU data protection rules. Available at <http://europa.eu/rapid/pressReleasesAction.do?reference=IP/10/1462&format=HTML&aged=0&language=EN&guiLanguage=fr> (2010) (accessed 25 December 2010)
10. Westin, A.F.: Privacy and Freedom. Atheneum, New York (1967)
11. Murata, K., Orito, Y.: Rethinking the Concept of the Right to Information Privacy: A Japanese Perspective. *J. Information, Communication and Ethics in Society*, 6 (3), 233--245 (2008)
12. Whitaker, R.: The End of Privacy: How Total Surveillance Is Becoming a Reality. The New Press, New York (1999)