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Our Digitally Undying Memories

By Siva Vaidhyanathan

"I forgot to remember to forget," Elvis Presley sang in 1955. I know that it was 1955 because I just Googled the title and clicked on the link to the Wikipedia entry for the song.

How cool is that? Not long ago, I would have had to actually remember that Elvis recorded the song as part of his monumental Sun Records sessions that year. Then I would have had to flip through a set of histories of blues and country that sit on the shelf behind me. It might have taken five minutes to do what I did in five seconds. I almost don't need my own memory any more.

That strikes many of us as a good thing: the costs low, the benefits high. We can be much more efficient and comprehensive now that a teeming collection of documents sits just a few keystrokes away.

But as Viktor Mayer-Schönberger argues convincingly in his book *Delete: The Virtue of Forgetting in the Digital Age* (Princeton University Press, 2009), the costs of such powerful collective memory are often higher than we assume.

Consider the ordeal of the Vancouver psychotherapist Andrew Feldmar. He tried to pick up a friend at the Seattle-Tacoma airport in August of 2006. But at the U.S. border, an agent Googled his name and found a link to an academic article Feldmar had published in 2001, describing his experiences with LSD while studying with R.D. Laing in the 1960s. Despite having a no criminal record and no suspicious connections in government databases, Feldmar stayed in Canada, barred from entering the United States because he had admitted using a controlled substance illegally.

Before the Web, before Google, that border agent would have had only the standard tools of law enforcement with which to exclude people. But we live in an era of seemingly "perfect"—or at least busy, overwhelming—memory. In fact, Mayer-Schönberger argues, our condition is far from perfect. "Total recall" renders context, time, and distance irrelevant. Something that

happened 40 years ago—whether youthful or scholarly indiscretion—still matters and can come back to harm us as if it had happened yesterday.

Delete is one of a number of smart recent books that gently and eruditely warn us of the rising costs and risks of mindlessly diving into new digital environments—without, however, raising apocalyptic fears of the entire project. It stands with Daniel J. Solove's *The Future of Reputation: Gossip, Rumor, and Privacy on the Internet* (Yale University Press, 2007); Cass R. Sunstein's *Republic.com 2.0* (Princeton University Press, 2007); Elizabeth M. Losh's *Virtualpolitik: An Electronic History of Government Media-Making in a Time of War, Scandal, Disaster, Miscommunication, and Mistake* (MIT Press, 2009); and Jonathan L. Zittrain's essential work, *The Future of the Internet and How to Stop It* (Yale University Press, 2008). Unlike anti-Internet screeds like Mark Bauerlein's *The Dumbest Generation: How the Digital Age Stupefies Young Americans and Jeopardizes Our Future (Or, Don't Trust Anyone Under 30)* (Jeremy P. Tarcher/Penguin, 2008) or Lee Siegel's *Against the Machine: Being Human in the Age of the Electronic Mob* (Spiegel & Grau, 2008), these sophisticated and sober books engage sincerely with technologies that they appreciate and defend.

They constitute an important "third wave" of work about the digital environment. In the late 1990s and early 2000s, we saw books like Nicholas Negroponte's *Being Digital* (Knopf, 1995) and Howard Rhein-gold's *The Virtual Community: Homesteading on the Electronic Frontier* (Addison-Wesley, 1993) and *Smart Mobs: The Next Social Revolution* (Perseus, 2002), which idealistically described the transformative powers of digital networks. Then we saw shallow blowback, exemplified by Susan Jacoby's *The Age of American Unreason* (Pantheon, 2008).

Mayer-Schönberger, an associate professor at the National University of Singapore, is a digital enthusiast with a realistic sense of how we might go very wrong by embracing powerful tools before we understand them. For example, he places Feldmar's dilemma within its historical context. When we created textual footprints like Feldmar did, we expected people to behave according to the norms and limitations of the technological environment in which the information was born. For most of human history, forgetting was the default and remembering the challenge.

Chants, songs, monasteries, books, libraries, and even universities were established primarily to overcome our propensity to forget over time. The physical and economic limitations of all of those technologies and institutions served us well. Each acted not just as memory aids but also as filters or editors. They helped us remember much by helping us discard even more.

The technological proliferation of the last 40 years has given us remarkably cheap information-storage techniques. Our powers to remember have shifted the default (for digitized information and culture anyway) so that forgetting is the accident or exception, Mayer-Schönberger asserts. We have moved so quickly from forgetting most of our stuff (or at least rendering it hard to access) to remembering most of it (and making it easy to search) that we have neglected to measure the effects of the change. Just because we have the vessels, we fill them. Then we engage with networks of data communication that offer so many disparate elements of our lives to strangers and—more important—people we would like to know better.

But it is easy to abuse small bits of information and blow them up into character-degrading shrapnel. Who among us has not feared being misunderstood or mislabeled because of some indelicate phrase written years ago on some e-mail list or even in an academic paper, only to find that Google has since rendered it easily recoverable? Even 10 years ago, we did not consider that words written for a tiny audience could reach beyond, perhaps to someone unforgiving, uninitiated in a community, or just plain unkind.

Judge Sonia Sotomayor discovered the cost of warped perception fed by the permanent archive of trivia when her nomination to the U.S. Supreme Court was saddled by the exploitation of one small YouTube clip from a speech she had given at a conference at the University of California at Berkeley. That clip, which revealed what became known as her "wise Latina" comment, displaced thousands of pages of well-crafted legal opinions and a long, balanced professional record.

Consider the more mundane plight of one of my students, who so far has left a limited digital trail. A Google search of her name reveals only one element of public significance: a campaign contribution she made in 2008. She worries, not without cause, that the Google profile can't help but flatten and warp her reputation for prospective employers.

But personal harm is not the whole, or even most important, problem to be considered when we weigh the costs and benefits of a rapidly metastasizing public memory.

Remembering to forget, as Elvis argued, is also essential to getting over heartbreak. And, as Jorge Luis Borges wrote in his 1942 (yep, I Googled it to find the date) story *"Funes el memorioso,"* it is just as important to the act of thinking. Funes, the young man in the story afflicted with an inability to forget anything, can't make sense of it. He can't think abstractly. He can't judge facts by relative weight or seriousness. He is lost in the details. Painfully, Funes cannot rest.

Mayer-Schönberger writes that we are building a collective memory like Funes's own. Our use of the proliferating data and rudimentary filters in our lives renders us incapable of judging, discriminating, or engaging in deductive reasoning. And inductive reasoning, which one could argue is entering a golden age with the rise of huge databases and the processing power needed to detect patterns and anomalies, is beyond the reach of lay users of the grand collective database called the Internet.

How should we deal with this new set of powers? How can we remember to forget? Mayer-Schönberger has some suggestions, but none of them are satisfying or easy. If he fails to convince in any part of his book, it is in his prescriptions.

He considers and then rejects individual "digital abstinence," which today means resigning from public, political, and intellectual life and severely limiting one's commercial activities as well. Then he looks at the state of information-privacy laws and finds them too weak to protect people. He is more optimistic about creating technologies that could enforce digital privacy rights and produce a market in which we could sell those rights to personal data. But those solutions would have many of the same failings as technologies that limit copyright infringement: They would be

hackable and clumsy. Most likely, people will find ways to adapt to the new environment, and horror stories like Feldmar's will become so rare or so common they will become unremarkable, Mayer-Schönberger asserts.

Finally, he suggests creating laws and norms he calls "information ecology." The government might be required to expunge certain information after a certain date; or legislation could restrict the pace and amount of data collected by public or private entities. Mayer-Schönberger concedes that even that approach is unwieldy because we can't always judge beforehand what information is worth saving or expunging.

All those suggestions would demand significant re-engineering or reimagining of the default habits of our species: to record, retain, and release as much information as possible. They might prevent the next Feldmar or Sotomayor debacle, but that would not help us think better in the new environment. Because we have for centuries struggled against the inertia of forgetting, we can't easily comprehend the momentum of remembering. Mayer-Schönberger acknowledges that.

Fundamentally, he faces a dilemma. If we filter out what we now think is unimportant for the sake of avoiding friction and providing perspective, we might miss something important. Isn't it good that we can find important as well as trivial stuff?

Perhaps we just have to learn to manage wisely how we digest, discuss, and publicly assess the huge archive we are building. We must engender cultural habits that ensure perspective, calm deliberation, and wisdom. That's hard work. Lawyers, legislators, and engineers are no help to us. Philosophers, sociologists, and clergy members would be more appropriate. Ultimately, Mayer-Schönberger asks of us only what any responsible scholar can: that we think more critically about the ecosystem we are building.

Other third-wave authors also remind us that we choose the nature of technologies. They don't choose us. We just happen to choose unwisely with some frequency. Losh cites various forms of electronic government that we're enthusiastic about. More often than not, she says, they fail to empower people to interact with the state, but instead distract and dissolve the public, leaving surveillance as the chief function of electronic government.

For Solove, our grand digital archive and personal instruments of surveillance (like mobile-phone cameras) have made us all vulnerable to ridicule. For Sunstein, the power to filter what one learns about the world reinforces our prejudices and narrows our vision. And Zittrain's book demonstrates that the very openness and customizability of the Internet—what we value so much about it—could be its undoing, as bad actors exploit insecurity and connectivity to spread malicious viruses and spam, thus driving us to closed systems like Facebook and the iPhone that merely simulate the openness of the Internet.

All these works have opened up a realistic vein of critical information studies that outlines the risks and costs within a larger effort to maximize the benefits and boons of the new. We may have a long way to go as a society before we teach ourselves how to handle these powerful new technologies responsibly and civilly. But when we get there, we will look back and thank this

emerging group of thinkers who warned us to tread carefully, but to keep treading nonetheless. As Elvis also sang, "Fools Rush In."

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