

## **Super Bloom** **How Technologies of Connection Tear Us Apart: Nicholas Carr**

**Reviewed by Prof. C.P. Ravindranathan**



“When the mode of the music changes”, Plato is supposed to have said, “the walls of the city shake”. What the statement signifies is that change in music reflects and can also lead to social upheaval. According to Nicholas Carr, the author of the book “Superbloom”, the primordial cause for change in the human condition could be found in technologies of communication. These technologies are dominant in our day through the cell phone, PCs, the Internet, social media and AI. Their transformative effects are manifest in all realms of life as none else; they will continue to be so for the future, for good or ill.

This is by no means Carr’s own proposition. The core argument of his book he owes to Charles Horton Cooley who in 1897 not only coined the word “social media” in a seminal article he wrote for Political Science Quarterly, but maintained that the faster the mechanisms of communication changed, the faster did the society itself. Mind you he spoke not of the content, but of the mechanisms of communication, thereby anticipating such future oracular pronouncements in the domain as McLuhan’s dictum, “medium is the message”. But while McLuhan saw communication technologies as moulding individual consciousness, for Cooley communication went beyond information and was an instrument to regulate group behaviour and belief as well as to establish hierarchies and other structures of power in society. The outcomes would be positive, in Cooley’s view, assuring social and cultural progress in the wake of technological advance in communication. He was wrong there; so also, years later, was Mark Zuckerberg whose vision of “mediating groups bringing us together and reinforcing our values” through communication was a fantasy, but it makes him part of a tradition of western humanistic belief in the inherent goodness of communication.

Carr’s narrative so framed, makes a survey in short order of the development of technologies of human connection during various stages, beginning with the watershed of invention of writing and through telegraph, telephone, radio and television. As for the electronic media, the step change in communication that is under way at the present moment, its expansion has proceeded through three stages, according to this narrative. In the first stage, machines took on the transport or carriage role that defined traditional communication systems, replacing human couriers with over-the-wire and through-the-air mechanisms for transmission of messages and other content. In the second stage, with the incorporation of feed algorithms into social media platforms, machines came to add an editorial function, wresting from the media and publishing professionals the business of selecting which content to communicate to which audience. In the third stage, commencing

at the present moment, the machines are engaging in content production itself, taking on the roles traditionally played by writers, photographers, musicians and filmmakers. With generative AI, the digital computer's takeover of media, whereby the language of computer networks has become the language of media networks, the erasure of the boundaries between different media markets and services through digitisation is complete. For another, the combination of deregulation and digitization in the US has led not only to the government giving a wide berth to media businesses like Google and Facebook in regard to civic responsibility, but guaranteeing Internet's hegemony over all aspects of communication. So much so, with the advent of generative AI, "machines create the content, choose who will see it, and deliver it", points out Carr.

Interestingly, Carr sets out this broad narrative in juxtaposition with the various theories on technology and media that have, in parallel, both reflected and anticipated developments and trends in the three phases. Figuring notably among the theorists is Claude Shannon whose mathematical theory of communication was a pace setter in multiple respects: in its premise that information, with spoken words as starters, always travels through a medium in coded form thereby offering immense possibilities of transmission; in its argument that combination with the digital computer led to the discovery that all information should be transmitted through computer networks as the universal medium, and above all, in its point of departure that the meaning component of communication is irrelevant to its engineering problem. To the extent that Facebook's News Feed is being regarded as the logical conclusion of the theory.

Tony Schwartz of the resonance theory of communication fame, circa 1970s, is another thought leader cited by Carr for having anticipated Facebook's introduction of News Feed. It was Schwartz's proposition that, with people having more information that they can handle in an age of mass media, what would be needed was to activate the information and attendant emotions already present in their memory. Carr sums up Schwartz's maxim: a successful message doesn't deliver meaning; it calls forth meaning.

Featuring in the book are two other significant exponents of the dynamics of media communication in democracy: Walter Lippmann and John Dewey. Both had lived long before the advent of today's digital information order, but their views have profound resonance with the interface of democracy and mass media. Walter Lippmann invoked democracy's founding ideal of a well-informed citizenry, but to his mind, that was bound up with a simpler world. Today, however, the real environment was much too complex, and the public's understanding of social and political issues was fated to be incomplete and distorted; the common tendency, therefore, was for individuals to create a mental pseudo-environment out of stereotypes so that they remained open to confusion, bias and manipulation by messages and images. Lippmann thus foresaw with an acuity of vision the perils of social media and the disutility of excess generation of information for the health of democracy. John Dewey, on his part, believed in the beneficent phenomenon of more information leading to greater popular enlightenment and genuine democracy. Carr's judgment on their divergent views that represent two opposing schools of thought on the public's role in sustaining democracy under the new technologies of mass communication today is unequivocal: "Dewey told us what we want to hear. Lippmann told us what we need to hear".

Carr makes the point that with digitisation, communication has lost its human scale. He locates the onset of this historic shift in Facebook's introduction in 2006 of its News Feed, which provided members, on the basis of a statistical analysis of their past behaviour as well as of people like them, a continuous, customised stream of posts and updates. News, entertainment, conversation and all other forms of human expression were now all levelled off into "content", automatically chosen by an algorithmic code which performed the editorial function. As well as efficiency in the processing of information for consumption of its mass membership, the feed algorithm performed another function that would now characterise the digital media, namely, matching messages to individuals' emotional preferences and traits, even as the proclaimed mission of the media was that of mere information processing. With that went human deliberation and judgment in evaluating, selecting

and sharing information and in came replacement of “personal agency with machine agency”, maximising the grabbing and holding of members’ engagement being the single objective. Carr goes on to describe how News Feed, by rapidly becoming the template for not only other social media platforms but traditional media companies with online product offerings, culminated the industrialisation of communication with its extensive consequences, particularly the emergence of social media as a machine with unrivalled productivity for harvesting attention. It’s mode of dissemination of content with ramifications like content moderation and fact checking is critically dealt with at great length in the book, underlining its bias for what grabs attention and its potential for promotion of divisiveness and unwholesome trends in public opinion making.

Carr compares the distancing that social media companies like Facebook, My Space and YouTube do from the problems arising from their kind of information engineering to what snack food and tobacco companies do about the social and medical consequences of their own product engineering. So much so that when at a Congressional hearing in 2018 Zuckerberg was asked whether Facebook was a media company, he responded with a straight face that he considered it as a technology company. A touch of insouciance one might say, given the fact that his company’s algorithms decided for the millions of its members what content it provided, the form it takes and how it is interpreted.

The Internet is indeed viewed by Carr as marking the advent of a new era in communication. Parallel with the phenomenal change that it made to dissemination of information has been the Internet’s effect on the language of communication itself. This language, while assuming forms and styles in email different from conventional letter writing, was developed mainly by the younger generation rather than by technology or industry, particularly in mobile phone communication by texts. Texting itself has been a revolution of sorts in language, enabling people to exchange written messages in real time with spillovers into youth socialising, culture and self-expression. Media companies stand to benefit because accelerated consumption of messages gives them more space for advertisements and sponsored

posts. Carr, however, points out the grim and indeed long-term downside of textspeak. Its hallmark of compressed style - the “cult of concision” - has not only come to characterise much of the expression on social media platforms, but the thought processes behind text-speak are such as to work out to the detriment of reasoned analysis or capacity for contemplative enquiry, hardly auguring well for humankind’s future.

Bonding through social media, central as it is to the digital world, features in Carr’s exegesis on technologies of connection. His critique is mostly on familiar lines, that the severance of the link between social proximity and physical proximity has been positive in that socialising through a computer or phone screen is as easy and there is room for love and care. But he argues, with support from findings of several surveys, that human psyche is hardwired for physical interaction and is at odds with the disembodied social scene that the Internet has confected. With the advent of social media, he feels that it is inevitable that we end up knowing more about people, which is social media’s way of sharing and caring, and also more likely, that we end up disliking them because of it.

In the final analysis, however, the Internet, as “the first true multimedia system able to handle sound, pictures and video images as well as text”, in the words of Carr, holds the centre stage today in global connectedness and conversation and hence what it means for the democratisation of societies must be the paramount concern. Evocations of the transformative role of the Internet seldom fail to hark back to its original acknowledgement as a new kind of democratic community embodying promise of a renewed spirit of a meaningful social engagement. Such lofty expectations of the Internet had much to do with the optimistic view of communication technology, which in the case of the net prompted the erroneous belief that a more open and efficient media would necessarily promote democracy. But more significant is Carr’s diagnostic that such a belief also precluded society from a clear assessment of the risks posed by the net and thereafter by social media, thus ruling out public discussion of legal and regulatory options that could have mitigated some of the technology’s adverse effects.

So, in Carr's telling, social media has today matured as a mechanism of communication and business. It is leveraged by news feeds, sharing buttons, filtering algorithms, dispensing personalised content and users shifting from websites to mobile apps. On the supply end of the network, users work as content producers, churning out endless streams of posts and comments that provide the platforms with enormous quantities of engaging content for free. On the network's demand end, they play the more traditional role of audience members, though the content they receive is tightly geared to their individual tastes and biases. Carr cites research finding that false or otherwise misleading stories are more likely to be retweeted on the social media than factual ones. But polarisation and extremism that we see online are not manufactured out of nothing by algorithms. They are rather expressions of deep-seated tendencies in human nature that have always strained social relations and political debates. In placing the blame for the Internet's failings on social media companies, we let the net itself off the hook while absolving ourselves of complicity and ignoring the responsibility of commercial interests, technology and human nature for the situation.

Examining at length how the new communication technology reshapes social relations in general, Carr cites data to show that as of 2012, half of American teenagers said that they would rather socialise with friends through screens than in person, the percentage reaching two-thirds by 2018. Americans are seeing more and more of their youth in "social isolation", with patterns of social engagement thus established likely to continue. In-person social interaction being essential for health and longevity, such isolation exacts a heavy toll on individuals and society. Benefits of online interaction are offset much by absence of aspects of in-person interpersonal interaction, such as touch, simultaneous expressions and mutually experienced environment. There is now substantial evidence that social media is a substantial cause, not just a tiny correlate, of depression and anxiety, but confirmed by longitudinal studies of young people's attitudes and behaviour.

Turning to the current moment where, going beyond editing content, the computers are about to enter the even more important line of work of generating

the content themselves and humans extending the blessing of speech to machines, Carr portrays Large Language Models (LLMs) like ChatGPT and Google's Gemini as clairvoyants. These mediums bring the words of the past into the present and the power the chatbots, not by creating text out of nothing but drawing on a vast corpus composed of billions of documents, a digitized *Spiritus Mundi*, through a complex, quasi-mystical statistical procedure blending all those old words into something intelligible to and requiring interpretation by a human interlocutor. AI may be the monster that puts an end to us. With generative AI, the technological takeover of media is complete as machines create vast new and low-cost content, choose who will see it and deliver it. While we would continue to have plenty of journalists and novelists, what the AI is churning out is already intelligible and pleasing to us, and that is what counts. On the other hand, it is going to be difficult to figure out whether the content will not be handled by AI solely or in association with AI or whether people will come to prefer the AI productions. By combining LLMs with feed algorithms, Meta and other social media companies would not only be able to automatically produce content tailored to the tastes and desires of individuals but also enter into new and deeper kinds of relationships with users. To have a flighty oligarch, or any individual control a large language model connected to a major social media platform, raises unsettling questions about the future of the public square and of democracy itself. Moreover, social media platforms could provide powerful tools for the enforcement of cultural and political orthodoxy.

As to metaverse, the range of its possibilities as a technology of connection is enormous: in Carr's words, building online worlds that make life and work and love wonderful; to escape the physical world and the earthly fictions of production and exchange; to liberate materialism from material; to offer virtual surfing, virtual fencing and virtual games, so that people could fly over cities and through buildings, and celebrities might be brought in living rooms for the odd chat.

All of which provide humans, as cognitively gifted mammals who are forever seekers craving for mental stimulation and as socially obsessed mammals

who crave connection and status, the power to reach out to new frontiers in experiences and sensations. The media business has always sought to indulge and capitalize on such human quest for that power. In the new media-centred world, therefore, existence has dissolved into information and communication. Humans become, whether they realise or not, simulated beings governed by the principle of simulation rather than the outdated reality principle. But it was the net that brought us inside the simulation, as earlier we couldn't actually enter simulation; with social media we became active participants in media productions rather than mere observers of them. And then the smartphone told us that we never had to leave the simulation. The overriding goal of social platforms has from the start been to find new and more efficient ways to feed us novelty, thanks to the major design innovations that shaped the social media interface - the pull-to refresh function the infinite scroll, the multidirectional swiping, the auto play routines, all intended to make seeking easier and more efficient. The compulsion to discover new stuff once required us to go out and walk around. It is now gratified with a flick of a finger and the algorithms make sure that our seeking is always productive. Even if we are not looking for anything in particular, we are always finding what we want. And in the universe of the metaverse and the net, the real world can't compete with the virtual; compared with the programmed delights of the virtual, it feels dull and lifeless. Let us face it - reality wasn't designed from the bottom up to make us happy, which becomes possible under virtual existence.

According to Carr, however, it remains to be seen whether virtual-reality and augmented-reality eyewear such as Meta's Quest, Apple's Vision and Ray-Ban's smart glasses eventually catch on with the masses; consumers so far have been wary of ceding control over their field of vision to corporate coders, but in the development and promotion of such hardware we see yet more signs of society's retreat from the real.

In the part of the book discussing the possibility of restraining social media platforms, Carr dwells on the EU rules of control, but observes that they have not really changed the way social media

operates for the simple reason that they haven't changed the behaviour of most users; consumers have grown used to trading personal information for tailored products and services, particularly in the case of TikTok. As for antitrust actions, they are also unlikely to change social media's workings by pushing media off the technology path it is already on. The next wave of innovations - the LLMs, more efficient content generation and censorship systems, more precise eye trackers and body centres, more immersive virtual worlds, faster everything - will only drive humankind further into the emptiness of hyper reality. There is also the idea of dismantling of the existing technological system and rebuilding it in a more humanistic form, as being attempted by social media's would-be reformers, but these would still raise free speech and free press concerns and prompt rebellion against what many people would consider as patriarchal overreach or nanny - state meddling.

According to Carr, the biggest obstacle to regulation and control is likely to be the habits of social media users themselves. Once people adapt to greater efficiency in any practice or process, a reduction in efficiency, whatever the rationale, feels intolerable. As technology becomes entwined in society's workings, it resists alteration. Society shapes itself to the system rather than the other way round. In the 1990s, when the Internet was just beginning its transition to a commercial network, laws could have been passed and regulations imposed that would have shaped the course of its development and, years later, influenced how social media works, applying public interest, making companies legally responsible for the information they transmit.

Other proposals of restraining social media platforms Carr puts under the title of "desirable inefficiencies" that would need to be inducted into the technologies of communication. These include setting of limits on the number of times or the number of people a message could be forwarded to, a delay of a few minutes or addition of a few clicks before appearance of a post on a platform, requirement of a variable fee for broadcast of a post or message to more than a thousand recipients, outright ban of infinite scrolls, auto play functions and personalised feeds and advertisements and the like. Beyond these,

according to Carr, it is too late to rethink the system created by the Internet.

Carr's work has as its chief merit the fact that it is a meta-narrative of the role of technologies of connection in the modern world. Its sweep is impressive, even if for the most part the generalisations it makes rather apply to the history of the US as well as to the future of communication media in that country. The US experience is indeed important, even crucial, but neglect of the impact of the technologies on the rest of the world does detract from the book's value as a comprehensive source of reference on its theme. In fact, the Internet today shows every sign of becoming a multinet, with national legislation and regulatory practices increasing the diversified nature of its operations. The cluster of narratives of the book on different aspects of the communication media, particularly social media, provides much information and insights on their evolution. Even if media studies already add up to an extensive academic discipline and Carr's analysis of the various theories may not yield to the readers much that is new on them. But Carr, for his part, does a commendable job on the future outlook for the technologies of connection and the momentous issues they pose to humankind.