Internet: weapon of mass destruction?

In the **last few years everything has accelerated. The informational wave has turned into a gigantic Tsunami, making our society the new Atlantis of the digital oceans. Existential question: how to avoid sinking and disappearing body and soul like the legendary continent?**

The increasing speed of exchanges, the overabundance of data and their fluidity, gives us the insidious impression that time is now slipping away. In the past, if you wanted to be able to reach a person, he or she had to be close to the phone at the time of the call. The communication platform was then dissociated from the final recipient. This situation predisposed to a latency between the moment the message was sent and the moment it was received. The appearance of mobile telephony and email [1] has multiplied the possibilities of contact. This has created a new stress caused by an implicit perception of the "immediacy" of exchanges.

Standardized packages

In spite of these changes, we have remained on a dynamic of reflection based on empirical beliefs of society to apprehend the new technologies of information and communication (NTIC). The era of the digital everything gave birth to this "society of the information" whose virtual borders are difficult to define. A notion whose subjectivity is reinforced by the intangible aspect of the material that composes it: each piece of information is digitized, the physical supports are dematerialized, the image rubs shoulders with the sound and the text. These heterogeneous data, segmented in the form of packets, circulate on a single standardized platform: the TCP/IP protocol [2].

The perception of this new environment implies a philosophical questioning. As a mirror of truth, the Internet formalizes the tacit currents present within society. It reflects an uncompromising image of the world as we have created it, with its angels and demons. The fundamental values of good and evil are expressed in all their dimensions and sometimes reflect the realities of our daily lives that we prefer to hide from. In the past, the secular evolution of society gave humanity the necessary time to adapt its perception and values to the changes taking place. These times are over, now the mutations are fast and multiple, their comprehension is made all the more difficult by a decrease of the margin of reflection.

Anticipating opinion

Taking these sociological aspects into account allows us to better understand the gap that exists in the perception of the new challenges of the digital society. Information has become an entity, the ultimate weapon of rich countries. The time elapsed since the events of September 11, 2001, has demonstrated, both politically and economically, that the mastery of information represents a strategic aspect today. For some governments, it has become essential to anticipate the reactions of public opinion. The ultimate goal is to provide in an anticipatory manner the "appropriate" elements on which the public will base its convictions and decisions.

The "information operation units" and "psychological operation units [3]" of the army represent well this new era where wars are won primarily on the terrain of opinions. In this new theater of operations, the various information providers and actors in the world of communication are the instruments - conscious or unconscious - of influence and manipulation. Given the speed of exchanges, the reduction in the time needed to process information and the professionalization of sources, it is becoming increasingly difficult to have the necessary reference points to maintain one's free will.

Digital storms

Until recently, the heterogeneous nature of the information concerned, its delocalization, as well as its smaller volume, represented a certain difficulty in its grouping and processing. Currently, the ability to "merge" these data is made possible by profiling tools such as data mining [4] and text mining [5]; the Internet solves the problems of delocalization. In addition, in recent years we have seen the creation of an incalculable number of new data sources, voluntarily fed by a public that is little aware of the stakes involved in the exploitation of their personal information (the customer databases of the large online booksellers, various loyalty cards, etc.). From creation to exploitation, the step was quickly taken...

The very consistency of information has changed, its digitization in the form of bits has made it an unstable and extremely volatile element. The speed of exchanges, the instability of data transport media, the increase in the volume of data itself, have led to a kind of digital storm whose margin of prediction has diminished accordingly. The ability to anticipate, as well as the traceability of the origin of the information, has been reduced. Add to this unfavorable situation the notion of "deconstruction" of the information and the difficulty to control the integrity of what is digitized. Once the information has been transformed into bits, how can we guarantee that the content will be identical upon arrival?

From the aspect of reactivity to information can come the ability to disinform thanks to the simultaneous management of time, space and volume factors. The multiplicity of information fronts, the difficulty of identifying the actors or the very origin of the attacks, have increased the problem of the capacity to respond to an offensive use of information.

Can we still simply refer to the "fact" (the information transmitted)? It is likely that at present, we need to increase the number of information control parameters. The detection of these so-called "weak signals [6]" requires the monitoring of the environment of the transmitted information or fact: we will not only focus on the quality of the source, but also on the different elements present in its context. Incidences, coincidences and consequences due to the appearance of an informational element, are also to be taken into account in a global analysis. A gap has appeared between politics and public opinion. The expectations of the voters towards their representatives are sometimes in contraction with the actions of the latter. The recent events related to the Iraqi crisis are a flagrant demonstration of this: the Spanish and British governments are going exactly against the will of their electorate.

80% of information goes through the United States

The current context does not help to face this type of situation. It can be noted that 80 to 90% of the

information packets that transit the Internet go through the United States. Domain names and the servers that manage them are the only resources that are entirely centralized. There are fourteen root servers spread around the world, but only three that are not in the United States (the other four are located in Spain, England, Sweden and Japan). This problem of the strategic distribution of the resources necessary for the functioning of the Net is accentuated by the current control of the American Department of Commerce over domain names through ICANN [7]. Faced with this situation, we must be vigilant if we do not want to witness the emergence of a "soft dictatorship" whose ability to anticipate our reactions would give us the impression that we still have free will. Although the information society currently affects less than three percent of the planet, the news of the last few months shows us that we must already feel all concerned by the problems it raises.

---

1) although email appeared before the cell phone, its use remained elitist for some years after the birth of the World Wide Web in 1992).

2) Transfer Carrier Protocol/Internet Protocol, a protocol that governs the exchange of information by packet on the Internet. This standard is defined by a non-governmental regulatory body called the IETF

3) military unit specialized in information processing and the use of NICTs in order to obtain a strategic advantage

4) A decision support process where users look for interpretive patterns in the data. A DataMining allows to analyze data from a datawarehouse in order to extract original information and relevant correlations from a large volume of raw data. We even talk about "Knowledge Discovery in Data" (Xavier Polanco).

5) Text mining is also distinguished from data mining by the specific technical means that must be used to process textual and unstructured data. A general definition of text mining is the following: the extraction of information from non-obvious forms or patterns (in the sense of hidden patterns) in large text corpora. In other words, the objective is the processing of large amounts of information that are available in a textual and unstructured form. (Feldman et al., 1998a; Landau et al., 1998).

6) In a context of information overload, the challenge is to be able to distinguish among the "noise" the information that will be useful to the company. It is therefore a question of detecting weak occurrences, i.e. "weak signals" (I. Ansoff)

7) "Internet Corporation for Assigned Names and Numbers" www.icann.org