Introduction

The Information Technology security context is affected by disruptive technology, rapid market changes and user preferences on social media. Threats to security are constant and growing in systems, applications, databases, web pages, and so on, of industries, SMEs (Small and Medium-sized Enterprises), start-ups, spin-offs, BAS (Business Angels Startup), R&D laboratories, financial entities, etc. Espionage, data theft, extortion, and others are some of the consequences through computer viruses, adware, and so forth.

Today, codes of ethics, statutes for the non-proliferation of hatred, violence, etc. online, are some of the masks used by cybercriminals and terrorists in science, technology, engineering, math, biology, along with others. This is because there is a great national and international legal vacuum to vigorously defend the rights of citizens against harassment, attack, persecution, and so forth, on the Internet and real life. There is not only great impunity, but also a kind of implicit reward from colleagues, against stalking, straining, mobbing, bossing, bullying and so on. It is easy to observe how, in the context of work, education, play, and so on, these executioners become victims and vice versa, through the strategy of victimization of the offender.

The complexity of the computer-legal-social situation leads to serious damage to human nature at the service of human needs, especially when there are mergers, convergences, etc. of the various areas of knowledge from the theoretical-practical perspective. In the new millennium, some of them turn out to be totally illogical or unbalanced, as has been seen in broad sectors of ICT (Information and Communications Technology), HCI (Human-Computer Interaction), LLM (Large Language Model), IR (Information Retrieval), RAG (Retrieval-Augmented Generation), RS (Recommender Systems), STEAM (Science, Technology, Engineering, Art, and Mathematics), Woman's Studies, and so forth, and which are related to children, education, research, etc.

In the immediate future and with the spread of artificial intelligence, one of the greatest challenges in the evolution of the Internet and interactive systems will be to find the right balance between safeguarding people's privacy rights, at the time of greatest vulnerability. That is, when they are using any interactive system or device connected to the network. The rise of cybercrime through dynamic persuaders, incarnate narcissists, radical bipolar, and so forth have a high cost for those affected. The consequences can be measured in significant economic, physical, moral losses, and so on by diminishing credibility and reputation.

In other words, given the current prevailing confusion due to the technological revolution and perennial criminal behaviors, and cyberattacks that are growing disproportionately, it is necessary to reorganize the studies. The epistemological bases of the various disciplines related to the security and privacy of information and communication must be reoriented and rebalanced, with a 360-degree vision.

This is clearly a typical view held by systems and software technicians who are in daily contact with cybersecurity problems. This is knowledge that charlatans who use social media to spread false information –ranging from artificial intelligence to commercial and/or political religion– lack. These charlatans, regardless of their qualifications, simply spread misinformation to prevent the proper functioning of security systems through what is traditionally known in software engineering as human factors, to which we must add social factors. The latter are easily recognizable by their frequent and excessive use of narcissistic photos. In short, they are individuals with personalities distorted by narcissism, Machiavellianism, and psychopathy who try by all means to impose their will on social sanity and to be above security systems.

A sense of social sanity is being silenced by those mentally ill individuals within academia who demand constant admiration because they are supposedly convinced of their personal superiority over the rest of society, the society in which they are embedded and which pays their salaries. At the beginning of the new millennium, graduates in psychology, anthropology, fine arts, business administration, and a few other fields joined this paranoia, creating the virtual companies bubble from Internet that burst in the first five years of the new millennium. This implosion temporarily caused serious damage to online commerce.

Now, with artificial intelligence, the new paranoia detected in human factors combined with cybersecurity involves resorting to corrupt lawyers to establish a kind of immunity and impunity for criminal acts.

In summary, the circle of the mentally ill has expanded, with the added problem of destroying the democratic structure of a community by attempting to muzzle scientific journalists. Once again, we will see how these psychopathic models will explode, since freedom of information and the right to the truth cannot be bought or suppressed by a small group of narcissistic, psychopathic, and Machiavellian zealots.

The problem with these new human and social factors is that they cannot be easily detected through cutting-edge hardware or state-of-the-art software, whether the latter is intelligent or not. Consequently, information architecture, security policy, authentication mechanisms, security recognition systems (e.g., voice, face, and signature), special algorithms, cryptology theories, vulnerability analysis, new antivirus programs, risk models, and other software and hardware tools cannot guarantee 100% security to overcome these human factors.

These human factors are laid bare in crisis situations such as natural or man-made disasters. The truth is that the origin of cyberattacks always stems from psychological, if not psychiatric, factors, and many of these are well-documented in the context of higher education [1–24].

Some of the chapters in the following handbook compilation have been presented at the following international events: ADNTIIC 2024 (13th International Conference on Advances in New Technologies, Interactive Interfaces and Communicability), CCGIDIS 2024 (13th International Symposium on Communicability, Computer Graphics and Innovative Design For Interactive Systems), ESIHISE 2024 (7th International Conference on Evolution of the Sciences, Informatics, Human Integration and Scientific Education), HCIHEART 2024 (7th International Conference on Human-Computer Interaction, High Education, Augmented Reality and Technologies), HCITISI 2024 (11th Argentine Conference on Human-Computer Interaction, Telecommunications, Informatics and Scientific Information), HCITOCH 2024 (13th International Workshop on Human-Computer Interaction, Tourism and Cultural Heritage), HIASCIT 2024 (9th International Conference on Horizons for Information Architecture, Security and Cloud Intelligent Technology), ITSIGUI 2024 (4th International Conference on Innovation in Tourism Systems, Intelligent Gamification and User Interaction), MSIVISM 2024 (10th International Conference on Multimedia, Scientific Information and Visualization for Information Systems and Metrics), QUITANS 2024 (6th International Conference on Quantum Information Technologies Applied to Nature and Society), RDINIDR 2024 (8th International Conference on Research and Development in Imaging, Nanotechnology, Industrial Design and Robotics), and SETECEC 2024 (12th International Conference on Software and Emerging Technologies for Education, Culture, Entertainment, and Commerce.

These are research works that stood out from the rest of the presentations and received awards such as best paper, best short paper, best demo, best poster, best research-in-progress, and so forth. Some of them have been improved based on the evaluators' comments, and the author(s) have been invited to expand upon them (free of cost) and present them as a full or short chapter, incorporating the suggestions and observations made.

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