A Call for a Statement of Expectations for the Global Information Infrastructure

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ABSTRACT: This paper considers the relationship between ethics, technology and law, and the roles and limitations each has in this relationship. It argues that ethics has the key role in establishing a resilient, comprehensive and sensitive information infrastructure. It puts forward a Bill of Rights and Responsibilities for the electronic community.

. . . the most important use of the internet, and indeed the NII, will be to allow individuals to communicate with each other and to rapidly access the information they require or desire. . . A combination of ethics, technology and law are needed to insure the effective development of this important aspect of the network of the future.

Robert E. Kahn

". . . [E]thics, technology and law", the pillars supporting not only the United States’ National Information Infrastructure (NII), but also the prospective Global Information Infrastructure (GII). Individual nations will play an important role in building and supporting a collection of national information infrastructures, but in each instance the resulting system will rest on the same pillars.

This paper addresses the role and limitations of the three pillars, proposing that ethics plays a far more important role in the development of an effective GII than many think. It will then discuss the Bill of Rights and Responsibilities for Electronic Learners and propose that a similar model needs to be developed with a global perspective.

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Technology, Law, and Ethics

Technology. Without technology there are no NII s. It is technology that brings the concept to fruition. Technology is dynamic, constantly pushing the envelope of the possible — in two decades it has propelled the concept of computer network from the drawing boards of researchers to the desktops of millions of researchers and scholars around the globe with estimates of over 70 million personal computers in North America alone and over 20 million users worldwide on the Internet. In our culture, the march of technology seems relentless, ever extending its reach with innovative tools enabling new applications of the technology as well as expanding the audience of those who can use it. Technology is the \textit{sine qua non} of the Internet, NII s, and a GII. But technology does not stand on its own; it creates possibilities:

\[\ldots\text{no matter how it is technically defined, what a network ultimately networks are human beings with minds. Therefore a network cannot simply be defined electronically or in terms of information and communication without a knowing subject. Rather, it must also be understood as a set of social and cognitive relations among persons.}\]  

It is these social and cognitive relations that tie technology to law and ethics.

Law. Law is minimal, reactive and geo-political, all of which combine to limit its effectiveness in the global electronic community. This is not to say that laws are to be ignored or forgotten. Rather it is to indicate that the limitations of law need to be recognized. Laws reflect community values — even if unenforced and unenforceable they clearly define the preferred state of affairs. Laws are necessary and important, but not well attuned to encouraging the full potential of a GII as laws are a minimal standard for behavior. In some circles it may be acceptable for an individual to consider him or herself an exemplary citizen because he or she has not been indicted or arrested; for most of us such a minimal threshold for excellence would be suspect. Think of students who work to avoid failing rather than to gain knowledge. We would not accept a parent whose level of care for children was intended to avoid charges of abuse or neglect. In a similar vein, why would we accept a world in which those who work, research, play and learn on a GII restrain their behavior only to avoid arrest or liability. Laws are there to enable a community to discipline miscreants, but law does not prescribe the expected level of behavior.

Law is reactive, evolving in response to conditions or situations which a society deems in need of formal control. Technology will always outstrip law because of the inherent nature of each. Clearly it would inhibit the development of technology and a GII if, before new creations or systems could be used, it was necessary to have an appropriate set of laws in place to channel use. History includes numerous illustrations of creators of inventions or developers of systems who did not realize the potential of their own creations. Those who would draft legal constraints are even less likely to prognosticate accurately.

Law is tied to geo-political entities, the very antithesis of a GII. It is as easy and quick to share information, files, graphics, and ideas with someone in Moscow as with someone in Milan or Milwaukee. The electrons of the GII flow faster than political entities can track or control. But laws can and do limit the potential uses of the U.S.