Chapter I
Electronic Government Interoperability

1. ELECTRONIC GOVERNMENT INTEROPERABILITY

Digital government, E-Government, and E-governance: all are terms that have become synonymous with the use of information and communications technologies in government agencies. Regardless of the label, digital government has become a prominent strategy for government administrative reform. E-Government projects can potentially increase the quality of government services, generate financial savings, and improve the effectiveness of government policies and programs (Pardo & Tayi, 2007).

First in this chapter, the concept of E-Government is introduced followed by a description of the global assessment of E-Government readiness. The chapter continues discussing interoperability in electronic government. A list of nine constraining influences electronic government interoperability is presented. Benefits of interoperability are identified, and an introduction to transaction cost theory is given as a means to understand benefits of interoperability. Then a distinction is made between interoperability and integration, and the difference between technical, Semantic and organizational interoperability is discussed. At the end of the chapter a case of Geographic Information Systems is presented.

1.1 The Concept of E-Government

The term "electronic government" or "E-Government" or "digital government" appeared about a decade ago, and there is no commonly accepted definition. Some see E-Government as the migration of government information and services to an on-line delivery mode, where the scope of E-Government covers the interaction between government and citizens (G2C), government and business enterprises (G2B), and inter-agency dealing (G2G). Others see E-Government as the provision of routine government information and transactions using electronic means, most notably those using Internet technology, whether delivery at home, at work, or through public kiosks.

It is an underlying assumption in this book that Internet technologies and specifically E-Government should have as their main purpose the improvement of the ways in which government serves its citizens and the ways in which citizens interact with public institutions. This philosophy of E-Government implies that for E-Government to be anything more than automated service provision, it needs to reach far beyond the conduct of routine government business to embrace social, economic and political change.

Some stress that successful E-Government programs should not only be based on the perceived efficiency gains for government itself, but rather on the satisfaction of consumers. For example, the UK's "techno-centric model" has been criticized for failing to engage citizens as anticipated, underplaying the importance of knowledge management and clashing with traditional values of public service.

Some factors which seem important from the perspective of the suppliers of E-Government include: the capacity for significant organizational change, the development of leadership skills, a grasp of the distinction between "hard" (technological factors) versus "soft" (human factors), and understanding of the differences in catering for the private and public sectors, and for citizens in developed and developing nations.

From the perspective of citizens' needs (the "demand side" in economic terms), it might be stressed the vital role of factors such as the impact on citizens of transaction costs, an understanding of cultural barriers, for example social exclusion caused by the problem of unequal access to the Internet, citizens' expectations of government services and their degrees of acceptance of technological innovations, and possible mismatches between governmental and social uses of the Internet.

For example, Vietnam is transforming into a networked society where more people are becoming connected, and more advanced applications, such as E-Government, are becoming available. From 2000, the Government of Vietnam determined that, with Vietnam integrating more comprehensively into the global economy, the building of an effective E-Government would help to facilitate its capacity to man-