

*A Performing Public Sector:  
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*Workshop 5: Emerging and Other Strategies for  
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**Performance Indicators and E-Government Projects:**

**Evidence from Turkey**

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**Abstract**

This paper aims to establish the link between research on e-government and performance management. To this end, performance criteria used or planning to be used in e-government projects are examined. The paper concludes with a discussion of performance indicators and criteria of success (or failure) that can be employed in order to judge the overall effectiveness and efficiency of the e-government projects.

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## **1. Introduction**

Increasing use of information and communication technologies (ICTs) in providing government information and services, and for creating additional venues for political participation is called electronic government, or shortly, e-government. E-government can be seen as part of a broader effort for reforming government, part of which is, measuring and evaluating the performance of public servants and government agencies.

The concept of performance can be integrated into e-government research at two different levels. On the one hand, performance indicators and criteria of success (or failure) can be employed in order to judge the overall effectiveness and efficiency of the e-government projects at a macro level. On the other hand, planning and implementation of individual e-government projects may lead the way to the establishment of performance criteria for individual public servants, departments of government agencies or a government agency as a whole, at a micro level. This paper presents an empirical investigation of the second (micro), and a discussion of the first (macro) level.

The study uses data gathered for a doctoral dissertation (Yildiz, 2004), in which planning and decision-making processes of seven national government level e-government projects in Turkey are examined and explained by conducting in-depth interviews with fifty e-government experts from public, private and civil society sectors in Turkey, as well as with members of the ICT media. Interview findings are triangulated by archival analysis of reports and government documents about these projects. The analysis presented in the paper explores the presence, nature and functions of performance criteria introduced in government agencies by the implementation of e-government projects at micro level. In the final part of the paper, possible macro level performance indicators and criteria of success for evaluating e-government projects are discussed by reflecting on the findings presented in the previous section.

## **2. Literature Review<sup>1</sup>**

The focus of this section is to review the literature of “New Public Management” (NPM) -a literature of which performance management is a part- first, and then the literature of e-government. The last subsection explains the relationship between NPM and e-government.

### **2.1. New Public Management**

The “new public management” concept is an umbrella term for the similar administrative reform movements originating in several Anglo-Saxon countries, such as the United Kingdom, Australia, and New Zealand, and to a lesser extent in the United States, since the late 1970s (Kettl, 1997: 446). This movement later swept through many other countries in the world such as Brazil, Portugal, Sweden, Israel and Korea. The reforms varied in their primary focus, basic strategies, and pace of the change (Ingraham, 1997; Kettl, 1997) in different countries, depending on the role of political leadership, historical

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<sup>1</sup> This section is a revised version of Yildiz, 2004: 19-24.

legacies and institutional constraints. Nonetheless, the overarching core of the reforms was the same: managerialism.

The characteristics of NPM reforms as an ideal type can be summarized as follows: First, it is a business-oriented approach to government. Second, NPM is a quality and performance oriented approach to public management. Third, it provides an institutional separation of public demand, public provision, and public service production functions. Fourth, NPM practices create a linkage among public demand, provision, and supply units with transactional devices and quality management. Finally, NPM suggests the retreat of (bureaucratic) government institutions in favor of intelligent use of markets and commercial market enterprises, or virtual markets, wherever possible.

In essence, the core concept of the NPM movement, managerialism, can be defined as using private sector techniques and practices in the public sector (Hood, 1995; Boston et al, 1996; Ingraham, 1997). Proponents of the NPM movement employed such economic concepts like “principal agent theory” and “public choice” philosophy in the affairs of government. NPM advocates strongly emphasized transforming the culture of public organizations by underlining the importance of perceiving citizens as customers, concentrating on outputs and outcomes rather than on inputs, providing quality products and services in the public sector and increasing the performance of public servants and government organizations along with the satisfaction of service recipients. Greater efficiency was sought by decentralization, privatization or contracting out. Contracting out public services and performance contracts with public managers are widely used. The NPM movement is also closely tied to the total quality and performance management paradigms as it emphasizes continuous improvement (Kettl, 1997: 447-448).

As stated above, NPM looks at the public sector from an economic viewpoint. Within this context, monetary gain is seen as the primary motivator of the “rational, utility-maximizing” public manager; thus, performance contracts and monetary rewards for improved performance are offered.

## **2.2. E-government<sup>2</sup>**

E-government is defined as “utilizing the Internet and the world-wide-web for delivering government information and services to citizens” (UN and ASPA, 2002: 1). It may also include using other ICTs in addition to the Internet and the Web, such as “database, networking, discussion support, multimedia, automation, tracking and tracing, and personal identification technologies” (Jaeger, 2003: 323). Fountain (2001) prefers to call this phenomenon ‘digital government’ or ‘virtual state’ instead of e-government.

*Digital government ... is a government that is organized increasingly in terms of virtual agencies, cross-agency and public-private networks whose structure and capacity depend on the Internet and web. ... The virtual*

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<sup>2</sup> This section is a revised version of Yildiz, 2004: 10-13.

*agency, following the web portal model used in the economy, is organized by client (2001a: 4).*

Means and Schneider (2000: 121) define e-government as the relationships between governments, their customers (businesses, other governments and citizens) and their suppliers (again, businesses, other governments and citizens) by the use of electronic means.

Brown and Brudney (2001: 1) define e-government as the use of technology, especially web-based applications to enhance access to and efficiently deliver government information and services. They categorize e-government efforts into three broad categories of Government-to-Government (G2G), Government-to-Citizen (G2C), and Government-to-Business (G2B). One may include two additional categories in this list: Government-to-Civil Societal Organizations (G2CS), and Citizen-to-Citizen (C2C), if the interaction among citizens is related to the other three categories of e-government. These categories, along with their characteristics, definition, and examples are displayed in Table 1 below. This table suggests that it is possible to perceive the concept of e-government very differently depending on one's focus.

**Table 1: Sub-Categories of E-Government**

<b>PARTIES OF COMMUNICATION</b>	<b>CONTENT</b>	<b>DOMINANT CHARACTERISTICS</b>	<b>DEFINITION</b>	<b>EXAMPLE</b>
Government-to-Government (G2G)	Government Information and Services	Communication, coordination, standardization of information and services	E-Administration	Establishing and using a common data warehouse
Government-to-Citizen (G2C)		Communication, transparency, accountability, effectiveness, efficiency, standardization of information and services, productivity	E-Government	Government Organization Web Sites, E-mail Communication between the citizens and government officials
Government-to-Business (G2B)		Communication, collaboration, commerce	E-Government, E-Commerce, E-Collaboration	Posting Government Bids on the Web, E-Procurement, E-Partnerships
Government-to-Civil Society Organizations (G2SC)		Communication, coordination, transparency, accountability	E-Governance	Electronic communication and coordination efforts after a disaster
Citizen-to-Citizen (C2C)		Communication, coordination, transparency, accountability, grassroots organization	E-Governance	Electronic Discussion Groups on Civic Issues

Source: Yildiz, Mete (October 2003). "E-Government in the Turkish Central Government" (In Turkish), Book Chapter in Muhittin Acar and Huseyin Ozgur (Eds.) *Public Administration Reader*, Istanbul: Atlas-Nobel Publications.

E-government is also perceived differently among researchers. According to Garson (1999), there are four theoretical frameworks within which e-government is conceptualized. The first framework involves the potential of IT in decentralization and democratization. The second normative/ dystopian framework underlines the limitations and contradictions of technology. Third, the socio-technical systems approach emphasizes the continuous and two-way interaction of the technology and the organizational- institutional environment. The fourth framework places e-government within theories of global integration.

### **2.3. The Relationship between New Public Management and E-Government**

The reasons for the worldwide popularity and application of NPM and e-government ideas are quite similar. First, the perceived unresponsiveness and rigidity of the traditional bureaucratic structures and the resulting public dissatisfaction with the government (Kettl, 1997: 460) encouraged reformers to embrace managerialist ideas. The strong political support for the culture of “bureaucrat-bashing” strengthened the development of this trend. Making government more responsive is one of the most important reasons behind the initiation of e-government projects.

Second, the financial crisis that swept the world beginning from the oil crises of 1970s forced the welfare states of the West to overhaul their systems of government such that they were compatible with the changing structure of the world economy (Toonen, 2001: 187). Doing more with less is a vital reason behind the movements, and especially the automation projects of e-government. ICTs are mentioned as critical enablers of doing more with less in many NPM documents (for example, see Kettl, 1998).

Third, countries, like Great Britain, Australia and New Zealand, were forced to redesign their administrative systems due to increasing global competition, which was diminishing its competitiveness in global markets (Ingraham, 1997). Creating an ICT-enabled citizenry and workforce is a very important motivating factor for many e-government initiatives. For example, the E-Europe initiative of the European Union which reflects the priority objectives and targets of Europe regarding ICT policies, asserts that “investing in people and skills” is one of its top three objectives (The EU Commission, 2001: 2).

Fourth, Kettl (1998: vii) argues that reinventing government was a way to struggle with budget, performance, and confidence deficits in government. As a result of its implementation, he contends that there were modest improvements in budget and performance deficits, but that the confidence deficit is still a big problem. Similarly, some scholars see e-government as a big opportunity to deal with the governments’ performance and confidence deficits (Nye, 2002).

Fifth, administrative reform is sometimes symbolic action. Goodsell (1997) underlines the ritualistic aspects of administrative behavior as it includes repetition, role-playing, stylization, order, staging, and creation of meaning. Fox (1996) interprets reinvention and the NPR as forms of symbolic politics, as an attempt to manage perceptions. He uses this interpretation to explain why reinventing has achieved some popularity, despite its

inconsistencies and shortcomings. A similar argument could be made for e-government. Not all e-government initiatives make the government better. Sometimes, ICT reforms may be symbolic politics similar to other reform movements. Toonen (2001: 184) argues that the use of information and communication technologies in government is becoming the symbolic reform ideology of today, much like scientific management in 1930's and 1940's and PPBS and policy analysis in 1960's. As Bugler and Bretschneider (1993: 293) argue, organizational needs and the manager's area of responsibility (both of which are mostly politically determined factors) determine a public manager's interest in new ICTs. Therefore, the adoption of modern ICTs in government is as affected by politics as other administrative reforms. Similarly, Danziger, et al. (1982) reports the critical importance of politics in technology adoption in local governments.

Finally, it is important to understand where the pushes for NPM and e-government are coming from and what the relationship is between the two. That is, we need to know whether e-government is a part of the administrative reform movement, the continuation of it, or a totally different phenomenon (Heeks, 2003). On this question, Beniger's (1986) work sheds light on the use of ICTs as an administrative control mechanism. He argues that:

*Each new technological innovation extend the processes that sustain human life, thereby increasing the need for control and for improved control technology... innovations in matter and energy processing create the need for further innovation in information processing and communication ... Foremost among the technological solutions to the crisis of control ... was the rapid growth in the late nineteenth century of formal bureaucracy and rationalization (Beniger, 1986: 434- 435).*

From this perspective, e-government might be seen as the last step in a series of responses to the control crisis further alleviated by new technological innovations and increasing global mobility of the population.

The idea of control is not new to the field of public administration. Taylor's scientific management calls for greater management control on the workers of the organization. Gulick argued for greater powers for the federal government to control the businesses and the infrastructure of the country during the New Deal years (Fry, 1989: 80).

Beniger's 'control revolution' concept parallels Zuboff's use of the 'panopticon' concept (1988: 315-386), as she explains the use of technology as "a new [electronic] medium of administration" (1988: 361). Panopticon is a prison model first conceived by Jeremy Bentham. It is a round structure with glass cells inside the circle in the middle of which there is a watch tower. All the cells are observable at all times from the tower, but the inhabitants of the cells do not know if there is someone in the tower or not. Zuboff rightly argues that "[t]he panopticon represents a power that displays itself automatically and continuously" (1988: 321). The concept inspired Michael Foucault to develop his concept of a "discipline society, one in which bodily discipline, regulation and surveillance is taken for granted (Zuboff, 1988: 319). Zuboff uses the panopticon concept

to explain the organizational processes through which the legitimacy of managerial authority is defended and reproduced by managers (1988: 390). She also emphasizes the necessity of strategic commitment and organizational innovation, without which technological developments run the risk to be used just to reproduce the status-quo, and thus are used sub-optimally (Zuboff, 1988: 392). Her argument gives the students of public administration one more reason to link the technological developments such as e-government with broader developments like administrative reform. Such a link would provide the necessary strategic framework so that ICT developments can be used for reforming the administrative system, rather than reproducing it.

### **3. Methodology**

The findings presented in this paper partly come from a doctoral dissertation on e-government policy-making process in Turkey (Yildiz, 2004). Part of the data presented in this paper about performance management was collected for the purposes of this dissertation, but the topic of performance management *per se* was not examined and explained in the dissertation. These unused data were used as a beginning point for the writing of this paper. The remaining data necessary for this paper comes from the author's efforts to regularly update the e-government projects studied in the dissertation with an added emphasis on performance management.

The methodology section presented here is a summary of the methodology chapter of the dissertation<sup>3</sup>. The dissertation is a multiple-site, multiple-method case study that aims to produce grounded theory by using various qualitative methods. It does not compare cases *per se*, but rather evaluates variables across cases. Grounded theory is used as the ideal approach as it enables the researcher to analytically go beyond description and categorization, and can result in the production of the much-needed theory in the e-government area.

The research questions that guide this study were developed to fill the gaps in the existing literature and research. In particular, the lack of e-government research that examines the agenda-setting and policy-formulation stages of public policy in e-government projects encouraged the formulation of four research questions, only one of which is related to this paper:

How do e-government projects originate? Which problem(s) do they intend to solve?

The target population for the doctoral study was all the e-government projects being planned and implemented at ministerial (national) level in Turkey. A pool of e-government projects to serve as a starting point to the case selection process is identified by the help of several previous studies such as that of Ince (2001), who counted 60 e-government projects in various stages of development during early 2001 and Dener (2003: 5), who prepared a more comprehensive list of 170 Turkish e-government projects.

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<sup>3</sup> For a detailed overview of the methodology, see Yildiz, 2004: 50- 75.

The seven cases selected for closer examination for the study are determined by using theoretical sampling, which aims to “maximize opportunities to discover variations among concepts and to densify the categories in terms of their properties and dimensions” (Strauss and Corbin, 1998: 201). In order to perform theoretical sampling, the above-mentioned two e-government lists are used as a beginning point. The details about the seven cases selected for closer examination are presented in Table 2 below.

**Table 2: Selected E-Government Projects**

<b>Nickname</b>	<b>Project Title</b>	<b>Description</b>	<b>Importance</b>
Accountancy-Net	SAY2000i (National Public Accountancy Network)	Daily online control of public financial management	Control of public finance, fiscal discipline, less corruption, better use of government resources
Foreign-Net	Ministry of Foreign Affairs Network	Paperless transactions and information sharing throughout the ministry	Paperless Transactions, Network management
Justice-Net	UYAP (National Judicial Network Project)	Integrate all the courts and other organizations in the judicial system in Turkey and ease the transfer of judicial information among them.	Streamlined, more efficient and transparent judicial system, working better, faster and cheaper
Local-Net	YERELNET (Local Government Network)	Provide a data-sharing and discussion forum for Turkish local governments	Encourages better informed and coordinated local governments by disseminating information and encouraging transparency
Pension-Net	EMEKLİ SANDIĞI (Auditing of Health Benefits Project)	Centralizes online patient data for retired bureaucrats and controls the transactions at hospitals, pharmacies and opticians by running them through a database	Determines eligibility of individuals for health benefits and prescription, eliminates human error in the prescription process and prevents fraudulent use of the health benefit system
Population-Net	MERNİS (Ministry of Interior Centralized Population Management System)	Centralized Population Management System	Creates a central database of all population information, centralizes and automates all demographic information
Tax-Net	VEDOP (Automation Project of Turkish Tax Offices)	Improvement of tax collection and elimination of tax evasion	Better control of the tax system

**Source:** Yildiz, 2004: 3.

For each case, there are specific reasons for its selection for in-depth study<sup>4</sup>. First, Local-Net (YerelNet) project is a good example for the application of e-government at the local government level. It includes government to government (interaction among central government to local government, as well among local governments), government to citizen (providing information regarding local governments to citizens and academicians) and government to business (posting local government bids and tenders online) relationships. Local-Net also is unique for its use of a private information technology firm by absorbing that small firm temporarily into the organizational structure of the government agency that sponsors the project –The Institute of Public Administration for Turkey and the Middle East- as well as using open-source software in a local e-government project. Finally, Local-Net was recognized as a successful project by international actors such as the World Bank but interestingly it was largely ignored by the Turkish e-government community and the media.

Second, Foreign-Net (Ministry of Foreign Affairs Network) is important because of this ministry's unique status of much higher levels of interaction with the world and the project's emergence as the first total document automation (creation of a paperless office, online document management system) and extensive use of the Intranet (a communications network that is used within the organization as opposed to the Internet, which connects the organization with the outside world). Foreign-Net is also significant due to its pioneer status among and its introduction as an example to other Turkish e-government projects, and its evolution from an intranet-based to a successful internet-based project. Finally, Foreign-Net might be perceived as the prototype of a Turkish government portal, since it provides a point of access to Turkish citizens outside Turkey to many different government information and services that are provided by different government agencies in Turkey.

Third, Accountancy-Net (Say2000i, National Public Accountancy Network) is selected because of its mixed funding structure (a combination of domestic and foreign funds). Another reason for its importance is that its function of online control of government revenue and spending flows affect numerous other government agencies as they relate to issues of fiscal control, discipline, accountability and transparency. It is a major public fiscal support system.

Fourth, Tax-Net's (VEDOP, Automation Project of Turkish Tax Offices) significance comes from the potential that it has for the improvement of tax collection and elimination of tax evasion. Interestingly, the tax identification number that Tax-Net project creates duplicates the population identification number that Population-Net project generates for real persons. Thus, there are coordination issues between two projects to be investigated. Both numbers are assigned to real living persons separately. In addition, the tax ID number is useful for identifying non-real persons (organizations) and non-Turkish nationals that the population ID can not identify. The population ID number is valuable for identifying deceased Turkish citizens, that the tax ID number can not identify. The

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<sup>4</sup> The cases are represented with nicknames in the English language in order to make it easier for the reader to recognize them when they are mentioned repeatedly throughout the text.

overlapping of the two numbers and the confusion that they create adds theoretical value to both projects for two reasons.

Fifth, Judicial-Net (UYAP, National Judicial Network Project) deserves attention because it is the only Turkish e-government project in the judicial branch of government. The success of such a project and the efficient functioning of the judicial system also solve many problems in other parts of the government before they become a problem. For example, quick solution of the financial lawsuits would lighten the workload of the Ministry of Finance, and citizens whose complaints are judged rapidly and effectively by the courts would be less likely to contract organized crime for the timely and efficient solution of their legal cases. Thus, there would be less organized-crime related cases that Ministries of Justice and Interior need to deal with.

Sixth, Pension-Net (Emekli Sandigi Projesi, Automation system for the Pension Fund and Health Insurer for retired Turkish government officials) aims to increase the efficiency and transparency of the process of drug prescription by doctors to a subset of the population, retired government employees. The project enables electronic data sharing between the Pension Fund offices, pharmacies, optometrists' offices and hospitals. The data sharing capability helps the agency to detect illegal and excessive use of prescription drugs and enables it to cut costs as automation costs less and the system automatically assign cheaper drugs with the same active ingredient to the user. This project transforms government to business relationships in the health sector as it enables the pharmacies and optometrists to determine a person's eligibility for a certain treatment and drug, double-check doctors' prescriptions for the match between the diagnosis and prescription. Pharmacies and optometrists are also paid earlier by the government for the drugs and other medical supplies since this new system processes information much quicker. Pension-Net project is also significant as it lead the other two major agencies of the Turkish social security system -Bagkur and Sosyal Sigortalar Kurumu-<sup>5</sup> in government to initiate similar projects.

Finally, Population-Net (MERNIS, Central Population Management System), which centralizes and automates all census data and other demographic information, is regarded by many in the Turkish e-government community as a moderately successful project to say the least. It took the government three decades to complete the project. Population-Net exemplifies the best intentions of public decision-makers as they conceived such a project in early 1970s. It also shows the dangers of project misconception regarding the availability of the necessary technology, political support and managerial expertise. Population-Net can even be seen as a test bed for other Turkish e-government projects which learned from its mistakes.

All these projects share some important characteristics that further increase the theoretical richness of the project. In all these projects, project managers or management teams enabled the members of the organization that sponsored the project and the stakeholders to contribute to the design and the management of these projects. Another

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<sup>5</sup> These tripartite system of social security agencies is changed in May 2006, as the three social security organizations is merged into one.

common feature was that all these projects have tremendous potential for transforming the area that they function in. For example, Local-Net project has the power to transform the interaction between both citizens and local governments and local governments among themselves by providing local government information (and in the future, local government services) on its website. It also is a huge step towards transparency of local government operations that is long considered as hotbeds of corruption and inefficiency. Finally, all these projects serve a considerable size of the Turkish population. Almost everybody in Turkey does some business with the tax offices, deals with the judicial system, interact with local governments in their daily lives, and they get counted in census once in five years.

The data gathering effort for this study is not only comprised of examining e-government projects. In addition, numerous people in the environment within which these e-government projects operate were interviewed, including members of IT vendor firms, print and visual media covering the developments in ICTs, civil societal organizations focusing on ICT-related issues, and ICT experts from universities and research facilities . These people also provided documents for analysis, which complemented the documents collected from government agencies sponsoring the projects. This approach, called “peripheral sampling” (Miles and Huberman, 1994: 34), is critical for the success of this study, since data gathered from within the e-government projects could be biased as they might underline the accomplishments and overlook the shortcomings of e-government efforts. Data provided by these other sources in the institutional environment, on the other hand, is more likely to represent a more critical look at these e-government efforts. In other words, these two different sets of data can be used for triangulation purposes.

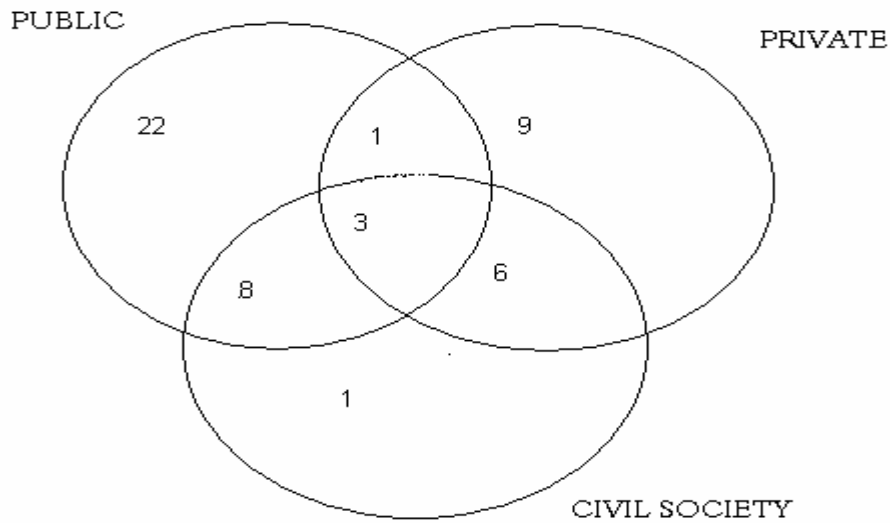
During the interviews, the snowball or chain sampling method (Patton, 1990: 182) is used. In other words, as people identified in the initial planning stage are interviewed, they are asked which other projects should be examined and who else should be interviewed. As a result of using this sampling method, it is possible to interview people working for e-government projects other than those initially selected for closer inspection. The referrals of the original group are also helpful in determining determine which policy network these people belong to.

The researcher conducted 50 in-depth interviews. Thirty-four of these interviewees are from the government sector, 19 from private sector, and 18 are members of the civil society organizations. These categories are not mutually exclusive, since many of the interviewees are active in more than one sector (see Figure 1 below).

Twenty-seven face-to-face interviews were conducted in person during the first field trip to Turkey in January 2003. Three additional interviews were conducted via e-mail between February and May 2003. One telephone interview was conducted in December 2003. Eighteen face-to-face interviews were conducted during the second research field trip on December 2003- January 2004. Finally, one last interview was conducted via e-mail in February 2004.

Thirty interviewees are linked directly to a specific e-government project. They bring their knowledge, experiences and reflections about these projects to the table. The other twenty interviewees are the academicians, ICT journalists, ICT consultants working for private firms. The members of this second group are not actively working for the e-government projects under investigation. Instead, they have experiences and knowledge about these and other e-government projects. These people are able to provide information about the development of the Internet and e-government in Turkey in general, and many different e-government projects in particular. Therefore, the information collection effort is not only limited to the seven projects initially selected for closer inspection, but other projects as well.

**Figure 1: Interviewees by Sector**



Together with the interview data, archival data are collected from the interviewees and other resources for analysis. In addition, e-government project websites as well as media coverage of the projects are subjected to content analysis.

The study is guided by a motivation to produce grounded theory (Corbin and Strauss, 1991; Martin and Turner, 1986; Strauss and Corbin, 1990), originally developed by Barney Glaser and Anselm Strauss (Glaser and Strauss, 1967; Strauss, 1987). According to this methodology, theory is built on systematically gathered and analyzed data, which lead to testable hypotheses. In such an effort, patterns and trends are found, data are linked to theory and a logical chain of evidence is presented to generate novel theory or confirm or oppose the existing theories. The research questions and constructs may be modified as the research develops, and the hypotheses can be generated during the study while linking data to theory. Thus, there is a continuous interplay between data collection, data analysis, and theory building. Therefore, while the above-mentioned

theoretical background in the literature review section is relevant to the data and theory produced by this study, other theoretical links may emerge as the study progresses.

In order to develop theory in congruence with the grounded theory approach, interview transcripts, field notes and documents collected from various project sites are analyzed by taking notes and writing memos during and after data collection. These efforts are the initial steps of discovering relationships and developing categories according to the dimensions and properties of data. Then data are rearranged into categories. One way of creating coding categories is to use the existing literature. Categories were also developed inductively throughout the study (Strauss and Corbin, 1998: 80). For example, the categories of e-government discourses are inductively derived from media coverage of e-government projects. This enabled the researcher to compare data within and among the categories with the ultimate objective of developing theoretical concepts.

#### **4. Findings: How Do E-government Projects Emerge in Turkey?<sup>6</sup>**

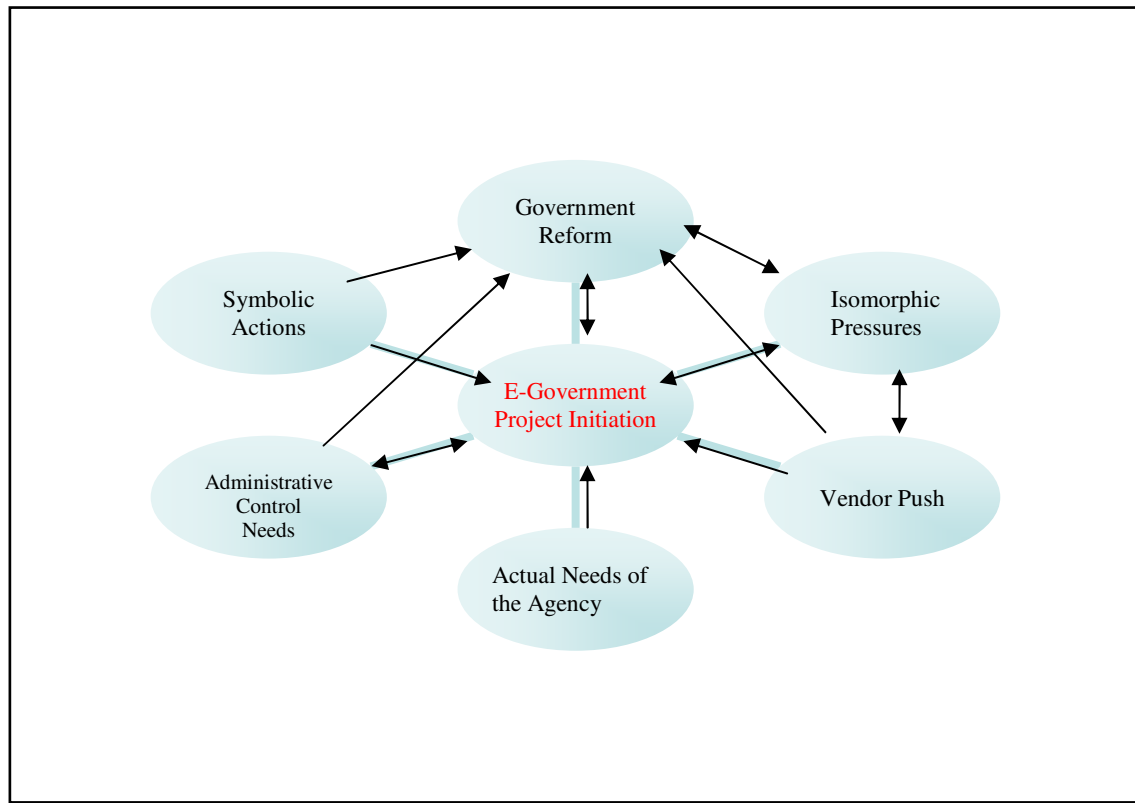
The variables that determine the emergence of e-government projects and the process of agenda-setting form a force field of competing forces. The concept of “force field of competing forces” is developed from Kurt Lewin’s “field theory” about organizational behavior, which describes a field as “the totality of coexisting facts which are conceived of as mutually interdependent” (Lewin, 1951: 240). One can observe a similar analysis in Graham Allison’s (1971) analysis of the Cuban Missile Crisis in his book *Essence of Decision*. Within the context of Turkish e-government projects, it is used for explaining the emergence of e-government projects and the way(s) these projects are placed on the government’s decision agenda. To do this, the study does not compare different decision-making models as Graham Allison does, but it rather emphasizes different model attributes found in the cases under examination.

The main argument is that in a given project, there are multiple and competing forces that initiate a project and help it to get on the decision agenda. Several forces identified during field research are actual needs, that is, problems for which an e-government projects are a genuine solution, government reform, administrative control, various kinds of isomorphic pressures (normative, mimetic, coercive), vendor push and symbolic actions (See Figure 2 below).

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<sup>6</sup> For a detailed overview of the doctoral dissertation’s findings, see Yildiz, 2004: 105-175. This section, however, is a slightly revised version of a much more brief discussion of the findings, which can be found Yildiz, 2004: 95-99.

**Figure 2: Force Field of Competing Forces in E-Government Project Emergence**



The combination and relative influence of the forces are determined by various environmental factors. The first factor is the urgency of the problem that needs to be solved by the e-government project. This dimension represents the actual need variable in Figure 2. The second factor is the project's compatibility with the global standards and rules and regulations of the European Union, the greatest source of isomorphic pressures. Third is the nature and level of political support the project manager gets from his/her direct supervisor (usually the head of the agency), and from the minister of the ministry which controls that agency. The outcome of the force-field of competing forces for each project is shown in Table 3 in Appendix above under the category of 'outcome'.

There are three important dimensions of the force field of competing forces concept. First dimension is the number of forces. It ranges from two to many. Second dimension is the outcome of the competition. It depicts the specific force (if any) that dominates the process by which an e-government project emerges and being placed on decision agenda. Finally, the actors involved affect the outcome of competition between forces. Policy actors, who influence the number and magnitude of competing forces, are project managers, supranational agencies, private IT vendor firm representatives, and politicians (ministers).

As Figure 2 shows, a unique combination of agency needs, government reform plans, administrative control orientation, symbolic actions, isomorphic pressures and vendor

push determine the emergence of e-government projects in Turkey. The relationships between these factors are complex. First, some government reform needs are fueled by isomorphic pressures. Implementation of the reform creates local best practices and therefore creates a wave of isomorphic pressures for projects to come. This two-way interaction is symbolized by a two-way arrow between these variables in Figure 2.

Second, the emergence of e-government projects trigger new needs of government reform as most e-government projects create an impact that goes beyond the agency that sponsors them. The majority of the projects, once implemented, force similar reform efforts in the agencies that are in their institutional environment. This impact, again, is symbolized by a two-way arrow between project initiation and government reform.

Third, the existence of isomorphic pressures is an important argument being used by vendors for persuasion. The vendor push concept and project emergence, in return, create mimetic pressures for implementing the same idea to other government agencies, in which the same vendor is used. This relationship is symbolized by a two-way arrow between vendor push and isomorphic pressures. A private IT firm representative explains this process very well:

*When I go to international conferences, sometimes I see a project implemented in a different country and say to myself “why cannot we implement such a project in Turkey”? So, I come back to Turkey and talk to the people I know in government about the benefits and feasibility of implementing a similar project.*

Fourth, administrative control aspirations support arguments for government reform. The need for controlling money, people, information and government transactions is justified by more acceptable objectives of greater efficiency and accountability in government operations. Two technical consultants express their concerns about the 'control function' as follows:

*Population/ Census information can easily be matched with other kinds of information. Such a development may cause violations of personal privacy and human rights. Still, no one seems to be worried [since this is perceived to be normal].*

*They (government officials) say that our e-government efforts are more advanced than those in many European countries”. Yes, [I admit that] we have a more advanced e-government development than some European countries because they are afraid of the misuse of governmental power. [Turkey lacks the checks-and-balances system]. Projects are implemented more [easily and] rapidly when there are no checks-and-balances [over the power of the government].*

It should be noted that not all the results of the control are worrisome. One civil society representative underlines the positive aspects of control as saying "E-government projects constitute an infrastructure that would prevent misuse of government resources and [eventually] curb corruption".

Fifth, using e-government as a symbol of being at the cutting edge, keeping up with the other agencies is a widespread phenomenon. One project manager explains the symbolic aspect of initiating e-government projects very vividly:

*Initiating an e-government project is like having a picture of Mustafa Kemal Ataturk [the founder of the Turkish Republic] hanging next to your desk. Why is it there? Because, everybody else has an Ataturk picture on their walls. It is politically incorrect not to have one. Similarly, why do all agencies have an e-government project? Because every other agency has its own e-government project, and not having a project of your own signals that you are left behind, you are missing out on something.*

Finally, actual needs of the agency initiate e-government projects. Once the project is implemented, new needs the satisfaction of which was not possible with the old technology begin to appear. This two-way relationship is symbolized by the two-way arrow in Figure 2 above.

## **5. Performance Management in E-Government Projects**

Performance management is a part of the government reform movement under the title of "new public management". And government reform is just one factor that affected the emergence of e-government projects in Turkey, as can be seen in detail in Table 3 in Appendix 1 and Figure 2 above. In other words, performance management idea and practices is only a small part of a bigger, more complicated picture of the transformation of public sector in Turkey and elsewhere.

Performance management in Turkish public administration can be examined from three different perspectives. The first perspective is a legal viewpoint that explains the legal framework within which public sector performance management can be exercised in Turkey. The second perspective is a "performance management as a cultural transformation" viewpoint. A third and final way to analyze the issue is to examine the practices of performance management in the e-government projects selected for close examination in this study.

## 5.1. Legal Status of Public Performance Management in Turkey

The legal framework of performance management in the Turkish public sector is drawn by Law Number 5018, which was accepted under the title of “Public Fiscal Management and Control Law”<sup>7</sup> in the Turkish Parliament on December 10, 2003. This piece of legislation closely ties performance management to strategic planning in Turkish government agencies, as it creates an explicit performance-based budgeting system in Turkish public administration for the first time. The year 2006 is determined as the first year of implementation for strategic planning and performance budgeting (Songur, 2005: 150).

In Article 9, public administration units are asked to state their visions and missions explicitly, to define strategic organizational objectives, to measure their performance towards these objectives via predetermined performance criteria, and to follow up and evaluate these processes by the help of strategic plans, which are prepared through participatory mechanisms. Performance indicators are determined by the government agency in association with the Ministry of Finance and State Planning Organization.

Articles 10 and 11 give the duty of informing the public about the process and outcomes of performance-based budgeting practices to high level public administrators and ultimately to the Minister in charge. Articles 63 through 67 define internal auditing procedures. According to Article 68, external auditing is done by the Turkish Court of Accounts (*Sayıstay*). The ultimate control mechanism of this court’s audits is the Parliament itself.

In addition to the “Public Fiscal Management and Control Law”, which is explained in detail above, several laws enacted in recent years provide a legal background to both strategic planning and performance management in Turkey. Metropolitan Municipality Law (Numbered 5216), Municipality Law (Numbered 5393), and Provincial Special Administration Law (Numbered 5302) all include articles that call for the use of strategic planning and performance management in Turkish government agencies. For example, these laws require municipalities that have a population more than 50,000 to prepare strategic planning. As of September 2005, there are 206 such municipalities in Turkey. Finally, the main public administration reform law proposal, “The Law about the Basic Principles and Reorganization of Public Administration” (Numbered 5227), which has not been enacted yet, emphasizes strategic planning and performance management (Songur, 2005: 151).

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<sup>7</sup> The law can be found at the Turkish Parliament Website, <http://www.tbmm.gov.tr/kanunlar/k5018.html>, (05.11.2006).

## 5.2. Performance Management as a Cultural Transformation<sup>8</sup>

Cultural factors both facilitate and inhibit e-government policy in Turkey. The cultural factors that shape e-government development are the value attributed to strong leadership, and secretive bureaucratic culture. Some environmental factors which interact with these cultural factors are the generation gap between old and young civil servants and the values that government reform movements introduce to the bureaucratic culture, which has a direct link to performance management. Table 4 in Appendix 2 presents these cultural and environmental factors and the following discussion explains them in detail.

The first cultural factor that has a significant impact on e-government policy-making is the value attributed to strong leadership. Strong leadership is perceived to be a crucial factor in the success of e-government projects. Such strong project leaders/ managers need to have internal and external organizational and political skills. The internal skills of organizing and motivating project teams, providing a shared vision for the project, and having knowledge and experience of technology are attributed to strong project leaders. The external skills of strong leaders are used for securing political support from organizational leaders and/or politicians (and thus securing funding), managing conflict with other departments and organizations, and persuading less technically competent stakeholders of the project that the outcome of the project will not threaten their status. Part of this threat is perceived to be coming from performance evaluation processes.

The second cultural factor that affects e-government policy-making in Turkey is the secretive bureaucratic culture. The secretive culture causes lack of information-sharing between projects, and thus poor project planning, coordination and integration, and turf wars between departments and agencies. Such a cultural trait has its roots in the Turkish-Ottoman history, but it also is fed by fears of modern-day public administrators that e-government projects will better monitor their work and assess their job performance, and thus make them more accountable and threaten their status. Many e-government projects state that replacing this traditional secretive government culture with a citizen-centered, performance-based, entrepreneurial culture as one of their most important objectives.

The environmental factors that shape the above-mentioned cultural factors are the generation gap between old and young civil servants and the values that government reform movements introduce to the bureaucratic culture. The generation gap between the 'type-writer' and personal computer" generations reflect itself with the clashes between technologically-oriented & manual-oriented people. In a way, these clashes are born from the struggle of changing the secretive bureaucratic culture of the past to a culture of more information-sharing, better coordination and planning, more transparency in government operations and a more citizen-centered, performance-based mentality.

The second environmental factor, the values that government reform movements introduce to the bureaucratic culture, embodies the cultural shift that constitute the integration of all the factors discussed above. These values can be listed as strategic

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<sup>8</sup> This section is a slight revised version of Yildiz, 2004: 161, 164-166.

planning, process reengineering, performance management, better decision-making via electronic decision-making tools such as management information systems, transparency, and accountability. Government reform, and all the values that it represents, aims to minimize the effect of the secretive culture, institutionalize e-government development rather than them being leader-driven, resolve generation gaps and resulting clashes and use the fascination of bureaucrats and citizens with technology for transforming the way that government does business with its citizens and other actors.

Songur (2005: 154-155) also identifies cultural problems that pose a threat to the implementation of strategic planning and performance management in Turkish public administration system. She argues that from the top-level administrator to the street-level bureaucrat, public personnel do not have enough faith in these ideas. On top of this disbelief and resulting lack of motivation, organizational culture does not support some crucial elements of the strategic planning idea such as participatory mechanisms.

### **5.3. Performance Management Practices in Selected E-government Projects**

The performance indicators, which are used in e-government projects, are mostly output measures at individual public employee level as shown in Table 5 below. Most of these performance indicators are not directly linked to a system of rewards or punishments, but in some e-government projects such as Justice-Net, there is an intention to do so in the near future. In general, performance indicators are used for measuring the internal efficiency of organizations, such as the measurement of the document processing speed and accuracy of a personnel in a given time period. External performance indicators, such as citizen satisfaction levels have not been integrated into the system of performance appraisal yet.

**Table 5: Performance Indicators in Selected E-Government Projects**

PROJECT	PERFORMANCE INDICATORS
Justice-Net	The performance of each public employee working in the Ministry of Justice can be measured by tracking: -How many files does a Ministry personnel works on (Output- Individual) -How many cases does a judge ruled on (Output- Individual) -The percentage of cases turned down by the superior court (Output- Individual) -A centrally-operated “document management system” tracks down documents within the system and assesses the document processing speed of the personnel (Process- Output- Individual)
Tax-Net	-The documents can be tracked throughout the process with the help of a barcode <sup>9</sup> (Process- Individual- Organizational) -How many files did a person work on (Output-Individual) - How many files did the organization (Provincial Finance Directorate <sup>10</sup> ) process in a given amount of time (Output-Department)
Accountancy-Net	-How many files did a person work on (Output-Individual) -The amount of errors one makes <sup>11</sup> (Output-Individual)
Foreign-Net	-A centrally-operated “document management system” tracks down documents within the system and assesses the document processing speed of the personnel (Process- Output)
Local-Net	No performance measurement practices found.
Pension-Net	-How many prescription is checked (Output-Individual) -Distribution of equal workload (Process- Individual) -Time spent in the online system (Process- Individual)
Population-Net	-Faster processing of new or renewed ID cards or ID information (Output-Individual) -Amount of human errors in processing ID cards or information (Output-Individual) is decreased - Consistencies between information being kept by different government agencies (Output-Organizational) decreased by centralized storage of ID information -Paperless applications- more convenience (Citizen Satisfaction- Individual) No need to bring a supporting document as an evidence of one’s ID -Number of identity theft and forgeries (Outcome-Individual/ Organizational) and all the related negative externalities decrease -Ease of planning with the exact and updated demographic information at hand (Outcome-Organizational) -Better tracking and arresting opportunities for criminals, military service deserters and terrorists (Outcome-Organizational) - Ease of updating voter registration lists (Outcome-Organizational)

There are some other government efforts, which are not examined in this study, that aim to establish the link between performance evaluation and e-government. One such effort is a project entitled BEPER<sup>12</sup> (Municipal Performance Measurement Project, *Belediye Performans Ölçümü Projesi*), initiated by the General Directorate for Local Authorities within the Ministry of Interior. The objective of this project is to develop a performance measurement system, to monitor the performance of the municipalities in a comparative

<sup>9</sup> <http://inet-tr.org.tr/inetconf8/bildiri/138.doc>, (09.05.2006).

<sup>10</sup> The functions of the Turkish Tax Administration are performed by the Ministry of Finance at the central level and the financial administration of the provinces (Provincial Finance Directorates, *Defterdar*) at the local level.

<sup>11</sup> <http://www.muhasabat.gov.tr/mevzuat/genelge/docs/gen14.doc>, (09.05.2006).

<sup>12</sup> <http://www.beper.gov.tr/eindex.php>, (16.05.2006).

fashion. By using the BEPER website, any interested individual may select a year and performance criteria to compare the municipalities with.

Performance evaluation is also a dominant theme in the National Strategy Document being prepared by the Information Society Department of the State Planning Organization, as an integral part of their duty to coordinate Turkish government agencies efforts for e-transformation. Early drafts of the strategy document, which is due in its final form by the end of May 2006, includes plans to measure the performance of organizations in their e-transformation efforts by the use of organizational report cards. The draft report also mentions about a possible revision of the existing public personnel law (Number 657) in a way to facilitate performance management practices in the public sector.

## **6. Discussion**

Performance management in the public sector is still in its infancy in Turkey. The actual practices are limited in scope and the legal framework is not totally ready, as explained above. The performance management practices so far are neither systematically applied nor are they linked to systems of rewards and punishments. The cultural transformation necessary to successfully implement a performance management system has not completely occurred.

As seen in Table 5 above, assessment of outcomes is the dominant model of performance measurement in e-government projects under investigation. Organizational outcomes and processes have not attained the attention that they deserve, and this limited the practice of multi-layered performance evaluation. One of the reasons that performance management within e-government projects is mostly output-oriented is the fact that e-government research itself is mostly output oriented so far. A new categorization of e-government research is needed for a more detailed analysis of performance in e-government studies and a better integration of the two areas of research, as argued in detail in Yildiz (forthcoming). Such a categorization is presented in Table 6 below.

**Table 6: A New Categorization of E-government Research**

DIMENSIONS	ORIENTATION		
	Output	Outcome	Process
<b>Focus</b>	Websites Online government services Front-office	How does an e-government application affect a certain variable such as trust, accountability, transparency, corruption, government effectiveness, users' perceptions of service quality	Processes of decision-making, planning, implementation Back-office
<b>Method</b>	Content analysis Determining best practices Benchmarking Surveys Case studies	Content analysis Determining best practices Benchmarking Surveys Case studies	Interviews Archival analysis Discourse analysis Case studies
<b>Data</b>	Primary and secondary	Primary and secondary	Primary
<b>Mode of Analysis</b>	Outside-in, deductive	Outside-in, deductive	Inside-out, inductive
<b>Outcome</b>	Descriptive, exploratory	Descriptive, exploratory	Theory generation, explanatory

**Source:** Yildiz (forthcoming).

Such an outcome and process-oriented approach to performance evaluation within e-government projects may facilitate the use of external performance indicators, such as citizen satisfaction levels.

Evaluation of e-government projects is critically important in theoretical and practical terms, as Internet technology has the potential to help government organizations become more responsive to citizens' needs and more transparent, efficient and accountable in the delivery of goods and services. Developing countries such as Turkey do not have large amounts of monetary or human resources to commit to ensuring the successful planning and implementation of individual e-government projects. Therefore, careful analysis of these projects is essential to make sure that resources are spent for projects with the highest priority, previous mistakes are not perpetuated, and to maximize gains while minimizing resources spent. The last section of this paper is used for the discussion of possible macro level performance indicators or criteria of success for evaluating e-government projects.

One such macro level performance indicator can be the interoperability of an e-government project with other such projects. The Population-Net project, for example, produced a nation-wide personal identification number that acts as a key and helps all e-government projects to communicate with each other through the use of shared databases. Therefore, from the viewpoint of interoperability, Population-Net may be found as a successful e-government project.

Another e-government project performance indicator is the cost of these projects. The use of open source software, for example, may lower project costs, since there is no need to

pay license fees for the software. On the other hand, if technical support is harder to find and more costly for open source software than proprietary software, such a decision may increase the overall project cost.

Information security is another criterion. In addition to being a financial decision, whether the software used in the project was proprietary or open source software might also determine factors such as flexibility (changeability) of software for future uses, ownership of software, and security of data processed by that software.

Finally, usability of e-government projects by its stakeholders such as citizens, businesses and government agencies other than the one that implements the project (the interoperability issue discussed above); and the ease and cost of technical support are other criteria of success for e-government projects. To sum up, measuring the overall success of e-government projects, and coming up with criteria of success or failure requires the understanding that this is a complex process and there are multiple criteria which affect each other.

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## APPENDIX 1

**TABLE 3: AXIAL AND SELECTIVE CODING DATA DISPLAY, FORCES FOR PROJECT INITIATION**

PROJECT	Government Reform	Agency needs	Integration with the EU	Isomorphic Pressures*	Control	Symbolic	Vendor Push
Accountancy -Net	<p>+++ Efficiency                      ++++Decision-support systems                      +++Better management of the economy                      ++++ Better interagency communication/ coordination                      +++++ Citizen-centered government                      +++ Making performance management possible                      +++ Transparency</p>	<p>+++ To be able to see the govt. revenues and expenditures in real time                      ++ Makes agency personnel's jobs easier                      +++++ Process reengineering                      + Failing systems</p>	<p>++ EU integration is a boost (funds)                      ++ EU demands standardization and transparency in public accounting</p>	<p>++ International agencies (IMF, WB, Coercive)                      + Citizen demand created by online services provided by private firms (M,N)                      ++++ Norm of this day and age (N), int'l standards                      + Other successful domestic projects (M)</p>	<p>+++International agencies demand reliable data about govt. revenues and expenditures (by providing funds in return)                      ++++ Central control of wage payments                      +++ Central control of govt. revenues and expenditures in real time</p>	<p>+++ Without integration of projects, govt. agencies will just satisfy their egos by creating projects-culture change is necessary</p>	<p>++Private IT firms trying to expand the IT market                      + IT elite pushing e-government to overcome technological backwardness                      + Persuade public managers by pilot projects</p>
Foreign-Net	<p>+++ Increasing efficiency                      +++ Better interagency communication/ coordination                      ++ E-governance                      ++ Citizen-centered government                      +Decision-support systems</p>	<p>++++ Too many documents                      ++ Not enough physical storage space                      ++++++ Need for rapid communication                      +Better management of personnel                      + Makes agency personnel's jobs easier                      ++ Process reengineering</p>	<p>(-)(-) Not a very important reason                      +++ EU integration is a boost                      ++ EU is part of a larger trend, globalization</p>	<p>+ Other successful domestic projects (M*)                      + The other project is a good prototype (M, N)                      ++ PM ** learned from other projects (M)                      ++++ Citizen demand created by online services provided by private firms (M,N)                      +++ Standard of this day and age (N)                      ++ Int'l agencies (UNDP, M)</p>	<p>++++ Providing services to Turkish citizens living abroad                      +++ Controlling the distribution of information                      ++ Controlling costs                      + Curbing corruption                      + Centralized fiscal control of government</p>	<p>+ As symbolic as having an Ataturk picture on the wall                      + Competing for coming up with presentable projects                      + No real change toward citizen-centered govt.                      + Everything with "e" is cool</p>	<p>++Private IT firms trying to expand the IT market                      + Vendor representatives offer projects that they have seen abroad to the public manager                      ++ IT elite pushing e-government to overcome technological backwardness</p>

<b>PROJECT</b>	<b>Government Reform</b>	<b>Agency needs</b>	<b>Integration with the EU</b>	<b>Isomorphic Pressures*</b>	<b>Control</b>	<b>Symbolic</b>	<b>Vendor Push</b>
Justice-Net	++ E-governance +++ Better interagency communication/ coordination +++ Citizen-centered government +Decision-support systems + Making performance management possible	+++ Minimizing delays in justice ++ Minimizing procedural/ human errors in the justice system ++ nNed for rapid inter-intra agency communication ++ Process reengineering	+ EU demands standardization in the justice system + EU is part of a larger trend, globalization + Integration with the European justice system	+ Other successful domestic projects (M*) + Standard of this day and age (N) + Successful projects in other countries (M*)	+ Central control of judicial information + Central control of the prison system		
Local-Net	+++Efficiency +++ E-governance ++++ Transparency + Equality in using government services + Process reengineering	++++++ Need for reliable information about local governments +++ Need for rapid inter-intra agency communication	+++ EU integration is a boost + EU is part of a larger trend, globalization	+++ Standard of this day and age (N) + Citizen demand created by online services provided by private firms (M,N)	+++ Collecting information about local governments and sharing it with other govt. agencies	++ Everything with "e" is cool + Rationalization/ westernization/ modernization	+++Private IT firms trying to expand the IT market + Vendor firms push proprietary software, while open source software use can save lots of money
Pension-Net	++ Efficiency ++ Citizen-centered government + E-governance	+++ Cost savings +Process reengineering	++ EU demands standardization in healthcare services ++ EU is part of a larger trend, globalization	+ Successful projects in other countries learned by vendors and public managers (M) + Other successful domestic projects (M) + Citizen demand created by online services provided by private firms (M,N)	++ Curbing fraud and corruption ++ Central control of health expenditures ++ Controlling people who use health services + Controlling money flows in the healthcare system	+++ Without integration of projects, govt. agencies will just satisfy their egos by creating projects- culture change is necessary	+Private IT firms trying to expand the IT market + IT elite pushing e-government to overcome technological backwardness + Vendor representatives offer projects that they have seen abroad to the public manager + Persuade public managers by pilot projects

PROJECT	Government Reform	Agency needs	Integration with the EU	Isomorphic Pressures*	Control	Symbolic	Vendor Push
Population-Net	+++ Efficiency ++ Citizen-centered government +++ Better interagency communication/coordination +++ Decision-support systems + Rationalization of government operations ++ E-governance	+++ Creating a unique ID number to track individuals	(-)(-) Not a very important reason, there is no similar project in the EU + EU is part of a larger trend, globalization + EU integration is a boost	+ Standard of this day and age (N) ++ International agencies (WB, UNDP, coercive) + Citizen demand created by online services provided by private firms (M,N)	++ Central control of population/ census information +Controlling inheritance info +++ International agencies (WB, UNDP) demand reliable census data (by providing funds in return) + Curbing corruption	+ Rationalization/westernization/modernization	+++ Private IT firms trying to expand the IT market ++ IT elite pushing e-government to rationalize government operations
Tax-Net	+++ Efficiency +++ Transparency ++++ Citizen-centered government ++ Better interagency communication/coordination +++ Decision-support systems + Making performance management possible + Justice in taxation	++ Track individual and organizational tax activity by using a tax ID number ++++ More efficient tax collection ++ Process reengineering + Failing systems + Makes agency personnel's jobs easier	(-) Not a very important reason + EU integration is a boost	++++ Citizen demand created by online services provided by private firms (M,N) + Standard of this day and age (N) ++ Successful projects in other countries learned by public managers and vendor firms (M)	++ Control of financial transactions between private parties ++ Centralized control of tax revenues + Controlling informal economy	(-) Not because e-government is a fad, but this project was really necessary + Rationalization/westernization/modernization + Big IT investments create political capital/prestige	+ Private IT firms trying to expand the IT market + IT elite pushing e-government to rationalize government operations

\* Mimetic (M), Coercive (C), Normative (N)

\* Project Manager

Aggregated from the Open Coding Data Displays 1-8.

Source: Yildiz, 2004: 110-112.

APPENDIX 2 Table 4: Axial and Selective Coding Data Display, Cultural Factors in E-Government Projects

PROJECT	Strong Leadership (Leader-Driven Projects)	The Need to Change Cultural Values (Reform)	Secretive Culture	Generation Gap	Fascination with technology
Accountancy-Net	+ Political will of the leader (minister and/or the project manager) +++ Leader coming up with a strong project team (-) Top mgmt does not know about modern mgmt concepts & latest tech. & does not want to delegate	+ Culture of planning +++ Transparency + Accountability ++ Performance measurement ++ Citizen-centered govt. culture + Better decision-making tools	++ Culture of secrecy; lack of information-sharing ++ Everyone is trying to protect their turf from others	+ Clashes between technologically-oriented & manual-oriented people (generation gap)	
Foreign-Net	+++++ Strong leadership and vision +++ Leader coming up with a strong project team	+ Sharing project info w/ other public agencies ++ Citizen-centered govt. culture + Better decision-making tools	+ Culture of secrecy; lack of information-sharing + Agency turfs clashing	+ Some civil servants feel threatened ++ Lack of cultural awareness about IT	
Justice-Net	+ Political will of the leader (minister)	++ Culture of planning ++ Better service for the citizens ++ Performance management	+++ National security concerns ++ Lack of information-sharing and coordination		+ Turkish people's enthusiasm and interest in new technologies
Local-Net	+++++ Strength of the leadership (project manager) (-) Lack of institutionalization, too much dependence on leaders + Motivation & empowerment of public managers are critical	+++++ Work-oriented, participatory, harmonious culture ++ Ease of usability + Managerial autonomy granted to the project team (-) +++ Culture of planning	+++ Culture of secrecy; lack of information-sharing and coordination	+ Political ineptitude and inertia	++ Technology as a 'novelty factor'
Pension-Net	(--) Bureaucrats lack IT knowledge & experience ++ Political will of the leader (general manager and/or the project manager)	+ Process reengineering + Part of the modernization project + Culture of planning	++ Lack of information-sharing		

<b>PROJECT</b>	<b>Strong Leadership (Leader-Driven Projects)</b>	<b>The Need to Change Cultural Values (Reform)</b>	<b>Secretive Culture</b>	<b>Generation Gap</b>	<b>Fascination with technology</b>
<b>Population-Net</b>	(- - -) institutional idea, leadership not important (- - -) Need for faith in e-government by public managers ++ Personal interest & support of the minister or manager in charge (-) Bureaucrats lack IT knowledge & experience (-) Lack of a shared vision	+ (-) Better service for the citizens (-) Culture of planning (-) Motivation for process reengineering is non-existent + Belief in the republican ideal of modernization, westernization, rationalization (of government processes), which are republican values (- -) Culture of planning	++ Lack of information-sharing and coordination + Secretive culture in government + Public servants who resist technology that will better monitor their work and assess their performance	+ Lack of managerial experience & competence in dealing with technology	+ Turkish people's enthusiasm and interest in new technologies
<b>Tax-Net</b>	(- - -) institutional idea	+++++ Better service for the citizens ++Transparency + Transformation process, not just automation + Performance measurement + User inclusion in system design + Seeing citizen as customer	+++++ Lack of information-sharing and coordination (-- )Systems 'taking to' other systems (Switching from closed to open systems)		+ Using the latest technologies, to be on the cutting edge
<b>General (Interviewees from the periphery)</b>	++ People & culture of Turkey necessitate hierarchical structures; if the leader is active & visionary, projects succeed	++ Transparency ++++ Citizen-centered govt. culture ++++ Culture of planning	+++ Culture of secrecy; lack of information-sharing +++ Traditional government culture should be replaced by a citizen-centered, entrepreneurial culture	+ Clashes between technologically-oriented & manual-oriented people (generation gap)	+ Turkish people's enthusiasm and interest in new technologies

Aggregated from the Open Coding Data Displays 1-8.

**Source:** Yildiz, 2004: 162-163.