A Comparison between E-Government Ranks in Jordan and Malaysian

Fawzi Altaany¹, Mohammad Issa Al-Zoubi²

Abstract

E-government transition is not akin to a simple introduction of information technology as it involves a significant change in the ways and methods of administrative operations which translate to major business process modification. Egovernment has a significant impact on the performance of public sector as a result continuous growth has been seen in the e-governments development around the world since last two decades. This paper investigates the e-government adoption scenario in Jordan and to compare it with the Malaysian. The study is based on the egovernment survey reports conducted by the United Nations between 2007 and 2010. From the experience of Malaysian e-government, this report gave us some critical remarks related to Jordan egovernment. This study also gave us suggestions and countermeasures to improve e-government in Jordan.

Keywords

E-government, International Comparison, Jordan government, Malaysian government, Definition of E-Government.

1. Introduction

E-government was defined by Tapscott (1996) "as an internet-worked government which links new technology with legal systems internally and in turn government information infrastructure links externally with everything digital and everybody". Another definition of e-government is presented by United Nation's website, for example, "e-government refers to the use of ICT such as wide area networks, the Internet, and mobile computing by government agencies". The Organization for Economic Co-operation and Development (OECD) noted that e-government refers to the use of information and communication technologies, and particularly the Internet, as a tool to achieve better

Fawzi Altaany, Irbid National University, Faculty of Administrative and Financial Sciences, Department of MIS.

Mohammad Issa Al-Zoubi, Irbid National University, Faculty of Administrative and Financial Sciences, Department of MIS.

government [7]. Sprecher (2000) considered e-government as technologies that simplify and automate transactions between governments and constituents, businesses, or other governments [9]. On the other hand, Hiller (2001), Davis (1989), and Howard (2001) defined e-government as electronic interactions between the government and the public which includes citizens, businesses and government employees [2, 4, 5]. Luling (2001) defined e-government as any interaction one might have with any government body or agency using the internet or the World Wide Web.

Raus et al. (2010) stated that ICT innovations in the B2G context are primarily reflected under egovernment subjects, which require intensive interactions between government and businesses [8]. Combining business and government perception, egovernment is defined as the application of information and communication technology to improve, transform and/or redefine any form of resource and information exchange (transacting and contracting) between involved actors like firms and governmental agencies and their customers, suppliers or other partners by developing and maintaining dedicated inter-organizational systems, organizational arrangements and (inter) national institutional arrangements [13].

Based on the above definitions, the general term of egovernment could be defined as the application of information and communications technology to improve government services delivery and promote transparency and accountability in dealing with citizens, government, employees and businesses. Since this research focuses its attention on the businesses adoption (demand-side) of the available eservices provided by the Jordanian government (supply-side), the term e-government is defined in the present study as any electronic interactions between any government body and businesses' using the internet or the World Wide Web. Researchers have suggested various definitions of e-government depending on their research purposes. Due to the fact that different people have different definition of egovernment, there is no unanimous agreement of its definition (see Table 1).

2. E-Government Initiative in Jordan

E-government initiative in Jordan is a national program initiated by His Majesty King Abdullah II in 2000 and the e-government portal was launched in the last quarter of 2006. The initiative is aimed at improving government performance in terms of service delivery, improve efficiency, accuracy, reduce time and cost required to complete a transaction. In addition, e-government in Jordan aims to help integrate and coordinate various functions provided by different government agencies. The ultimate objective is to achieve an effective, efficient, transparent and better integration among government departments [6, 12, 23].

According to the Ministry of Information and Communications Technology (MoICT) of Jordon, to share their knowledge and experience in implementing e-government infrastructure and expertise as well as to learn from others about the best practice of e-government program, the Jordanian government works with several other governments, namely Italy, Singapore and Malaysia. As a result, a broad guideline has been developed which helps to deliver e-services to the citizens at various public access points. There is also a continuing regional cooperation for the exchange of experience and information between other Muslim countries such as Oman, Qatar, Dubai, Egypt, Algeria etc. that share similar religion and cultural values with Jordan. Officials are enthusiastic that the e-government projects and e-government may change the negative image of the current government delivery systems [6].

3. E-Government in Jordan

Some believed that the great enthusiasm shown by the officials of the e-government projects stem from their feelings that they may change the negative image of the current government delivery systems. However, the spread of ICTs have contributed to the awareness of citizens and businesses who demand better services and access to information [3, 6].

According to Tadros and Assem (2006), Jordan needs to apply e-government to take advantage of the opportunities offered by all trade agreements. Jordan would need more efficient, market-oriented customs regime in compliance with World Trade Organization (WTO) requirements, capable of handling increased trade at the borders [11].

According to LMcClure (2000), e-government refers to government's use of information technology to enhance the access and delivery of government information and service to citizens, business partners, employees, agencies and government entities. It encompasses the intranet that allows data to be gathered, processed and shared in more efficient ways, extranet that links government to business suppliers, and public web sites that give citizens and businesses self-service channel for transactions and information [10].

4. Malaysian Government's Initiatives

The electronic government (E-Government) initiative in Malaysia had its genesis during the launch of the Multimedia Super Corridor (MSC) in 1996. The main objective is to propel the country into the Information Age (Ahmad, 2007) and be a major part of the strategy to "reinvent" the government. E-government is one of the seven "flagship applications" under the MSC. These flagship applications aim to jump-start and accelerate the growth of MSC, enhance national competitiveness, create high value jobs and export growth, help narrow the digital divide and position MSC a regional hub and test bed [1].

Seven main projects have been identified under the e-government flagship application. Projects under this flagship include Electronic Procurement (EP), Project Monitoring System (PMS), Electronic Services Delivery (eServices), Human Resource Management Information System (HRMIS), Generic Office Environment (GOE), E-Syariah (ES) and Electronic Labor Exchange (ELX) [1].

Several other public sector agencies have also embarked upon initiatives to introduce online services, with the goal of enhancing the ease and efficiency of public services provided for the people. Notable among these are the Public Services Portal (myGovernment), e-Tanah, e-Consent, e-Filing, e-Local Government (e-PBT), e-Kehakiman, Custom Information System (SMK), Pensions Online Workflow Environment (POWER), and Training Information System (e-SILA) [1].

5. A Comparison between E-Government Ranks in Jordan and Malaysian

The over time comparison of the top 10 Organization of Islamic Cooperation (OIC) member countries by their Evolutionarily Distinct and Globally Endangered (EGDI) ranks in 2007 and 2009. The global EGDI ranks of the top 10 OIC member countries ranged between 13 (Bahrain) and 68 (Brunei) in 2009. Except UAE, Jordan and Qatar, the OIC member countries including Bahrain, Malaysia, Kazakhstan, Kuwait, Saudi Arabia, Tunisia and Brunei in the top 10 list improved their global EGDI ranks from 2007 to 2009 [14, 15, 16, 17, 18].

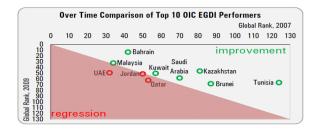


Figure 1: Top 10 OIC Member Countries, by Over Time Comparison of E-Government Development Index Scores, 2007 vs. 2009. Source: [14, 15, 16, 17, 18].

Based on UNPAN's report 2010, the rank of Malaysia in 2007 and 2009 were 34 and 32 respectively. Additionally, the EGDI index of OIC member shows that Malaysia improved its policy and strategies in adoption the e-government in the proper place which it is notable were the reason to raise its rank in two years. Unlike Jordan which decreased its rank from 50 to 51 for exercise and practice of the e-government in improper way 9 (see Table 2) [14, 15, 16, 17, 18].

Table 1: E-Government Development Index Values and Ranks of the Jordan and Malaysia, 2007 vs. 2009

Source: UNPAN (2010) [14, 15, 16, 17, 18]

E-government Development Index	Country			
(EGI)	Jordan	Malaysia		
EGDI, 2009	0.5278	0.6101		
Rank, 2009	51	32		
EGDI, 2007	0.5480	0.6063		
Rank, 2007	50	34		
Rank Change	-1	+2		

According to UNPAN's report 2010, it encouraged the OIC's governments to concentrate on their policies which interrelated to the human capital to

enhance the capable of the public agency and to make it easy for the public administrations to convey the e-government services efficiently and faster, such as Malaysia as stated above. apparently, Jordan still lake of experience in implementing the e-government which requires it to get conduct more study in the said field and also look at other countries trial which implement the e-government properly[14, 15, 16, 17, 18].

The findings identified some weaknesses that need improvement. For example, only a minority of the e-government sites provided other types of e-services, such as business opportunities, business owner's guide to state government, employment and workforce information, and how to start a new business. Among these less available e-services, just a few had advanced transactional and intelligent service. These weaknesses seemed to have a causal relationship to the negative online experience because the lack of online transaction capacity and the lack of other important e-services were often mentioned by online users as reasons for their negative online experience.

6. Managerial Implications

In terms of extent of usage, the parallel usage of most of the e-government applications provided by the Jordanian government highlighted that significant recommendations need to be taken into consideration. Particularly, when business firms have a positive feedback from using experience and applications, this would set the stage for subsequent usage of the application, and application from other levels by reinforcing their usability. In addition, errors in IT implementation might be much more costly for businesses to absorb due to their limited resources. As such, besides promoting e-government applications, Jordanian government is required to ensure a positive experience, error free, and positive feedback for their businesses firms when they use their e-government websites and applications. Such approach would increase the trust as well as the reliability from the consumer point of view which in turns helps in moving the extent of usage from the parallel to full range usage.

7. Conclusions

E-government is a relatively new branch of study in Information System which makes public sector efficient, effective and provide quality services to

citizen, businesses and other organizations. As the e-government developed, United Nations, in 2003 started survey for its member nations for its e-government. The findings of this study could provide important information for policy makers and those responsible for devising initiatives to encourage e-government adoption among businesses. For Jordanian businesses, the findings could provide a useful benchmark against which each business can assess its level of e-government adoption and usage against other businesses in Jordan.

References

- [1] Ahmad, M. B. H. (2007). Implementation of Electronic Government in Malaysia: The Status and Potential for Better Service to The Public. OCTOBER, 1(1), 1-9.
- [2] Davis, F. D. (1989). Perceived Usefulness, Perceived Ease of Use, and User Acceptance of Information Technology. MIS Quarterly, 13(3), 318-340.
- [3] Elsheikh, Y., Cullen, A., & Hobbs, D. (2007). E-Government in Jordan: Challenges and Opportunities. eGovernment Workshop '07 (eGOV07), 1-13.
- [4] Hiller, J, & Be langer. (2001). Privacy Strategies for Electronic Government, E Government Series. PricewaterhouseCoopers Endowment for the Business of Government, Arlington, VA.
- [5] Howard. (2001). E-Government Across The Globe: How Wills 'E' Change Government? Government Finance Review, 17, 4.
- [6] MoICT. (2005). E-Government Program in Jordan. Ministry of information and communications technology, Amman, Jordan, 1-14
- [7] OECD. (2003). The E-Government Imperative. OECDE-Government Studies: OECD, Paris.
- [8] Raus, M., Liu, J., & Kipp, A. (2010). Evaluating IT Innovations in A Business-to-Government Context: A Framework and its Applications. Government Information Quarterly, 27, 122–133.
- [9] Sprecher, M. H. (2000). Racing to E-Government: Using the Internet for Citizen Service Delivery. Government Finance Review, 16(5), 21-22.
- [10] Symonds, M. (2001). A Survey of Government and the Internet. The Economist, 355(8176), S3-S5.
- [11] Tadros, I., & assem, A.-s. (2006). Success Factors In Jordan E-Government. IMB, Australia, 1(1), 388-398.
- [12] Tadros, I., Hammam, S., & Al-Zoubi, K. (2008). Government Resources Planning and User Satisfaction for Jordan E-Government. IEEE Explore.

- [13] Wassenaar, A. (2000). E-Governmental Value Chain Models- E-Government from a Business (Modelling) Perspective. Paper presented at the International Workshop on Database and Expert Systems Applications London, Springer.
- [14] United Nations (2003). "UN global E-Government Survey 2003," [Online], United Nations Division for Public Administration and Development Management, [Retrieved November 10, 2011], http://unpan1.un.org/intradoc/groups/public/documents/un/unpan016066.pdf.
- [15] United Nations (2004). "Global EGovernment Readiness Report 2004: towards Access for Opportunity,"[Online], United Nations Division for Public Administration and Development Management, [Retrieved November 10, 2011], http://unpan1.un.org/intradoc/groups/public/docu ments/un/unpan019207.pdf.
- [16] United Nations (2005). Global EGovernment Readiness Report 2005 from E-Government to EInclusion. [Online], United Nations Division for Public Administration and Development Management, [Retrieved November 10, 2011], http://unpan1.un.org/intradoc/groups/public/documents/un/unpan021888.pdf.
- [17] United Nations (2008). Global EGovernment Readiness Report 2008 from E-Government to EInclusion.[Online], United Nations Division for Public Administration and Development Management, [Retrieved November 10, 2011], http://unpan1.un.org/intradoc/groups/public/documents/un/unpan028607.pdf.
- [18] United Nations (2010). UN EGovernment Survey 2010, [Online], [Retrieved November 10, 2011] http://unpan1.un.org/intradoc/groups/public/documents/un/unpan038851.pdf.
- [19] Layne, K, & Lee. (2001). Developing a Fully Functional E-Government: A Four Stage Model. Government Information Quarterly, 18(2), 122-136.
- [20] Bonham, G., Seifert, J., & Thorson, S. (2001). The Transformational Potential of E-Government: The Role of Political Leadership. Paper Presented at 4th Pan European International Relations Conference, University of Kent.
- [21] DeBenedictis, A., Howell, W., Figueroa, R., & Boggs, R. (2002). E-Government Defined: An Overview of the Next Big Information Technology Challenge. Issues in Information Systems, 3(1), 130-136.
- [22] Basu, S. (2004). E-Government and Developing Countries: An Overview. International Review of Low Computer and Technology, 18(1), 109-132.
- [23] Chen, Y. N., Chen, H. M., Huang, W., & Ching, R. K. H. (2006). E-Government Strategies in Developed and Developing Countries: An Implementation Framework and Case Study.

- Journal of Global Information Management, 14(1), 46.
- [24] Stoltzfus, K. (2004). Motivations for implementing e-government: An investigation of the global phenomenon. Paper presented at the National Conference on Digital Government Research.



Dr. Mohammad Issa AL-Zoubi Assistant Professor of Management Information System (MIS) specifically Electronic Government (E-G), Department of Management Information Systems, College of of Administrative and Financial Sciences, Irbid National University.



Fawzi hasan Altaany, Head of Management Information Systems Department, Irbid National University/ Irbid, Jordan.

Appendix

Table 1: Selected Definitions of E-Government

Authors	E-government Definition	Perspective/ Focus
Layne and Lee	A government's use of technology, such as the internet, to aid the	Relationships with partners
(2001)	delivery of information and services to citizens, employees,	Relationships with partiers
(2001)	business partners, other agencies and other government entities [19]	
Bonham et al.	E-government involves using information technology, specifically	Internet
(2001)	the internet, to deliver government information, and in some cases,	Information and
(2001)	services, to citizens, businesses, and other government agencies	service delivery
	[20].	service derivery
Dunleavy	E-government offers an opportunity for governments to re-organize	Political
(2002) and	themselves, get closer to the citizens and businesses and co-operate	Tontical
Caldow (1999)	with a variety of societies [21].	
Deloite and	The use of technology to enhance the access to and delivery of	Access
Touche	government services to benefit citizens, business partners, and	Service delivery
(2002)	employees.	Service delivery
Heeks (2002)	The use of information and communications technologies (ICTs) to	Improvement
11eeks (2002)	improve the activities of public sector organizations.	mprovement
United Nations	Utilizing the internet and the World-Wide Web for delivering	Technology
(2003)	government information and services to citizens and businesses.	reciniology
OECD (2003)	The use of ICTs, and particularly the internet, as a tool to achieve	Internet
OECD (2003)	better government.	Internet
Basu (2004)	E-government involves the automation or computerization of	Transformation
Dasu (2004)		
	existing paper-based procedures in order to prompt new styles of leadership, new ways of debating and deciding strategies, new ways	Access
	of transacting business, new ways of listening to citizens and	
	communities and new ways of organizing and delivering	
	information. Ultimately, e-government aims to enhance access to	
World Bank	and delivery of government services to benefit citizens [22].	Defermine multiple and
	The use of ICTs to improve the efficiency, effectiveness,	Reforming public sector
Group (2004)	transparency and accountability of government	Tr. C:
Ndou (2004)	The use of ICT tools to reinvent the public sector by transforming	Transformation
	its internal and external way of doing things and its	
D: (2004)	interrelationships with customers and the business community.	Chanas Managana
Berri (2004)	The use of ICT in public administrations combined with	Change Management
	organizational change and new skills in order to improve public	
	services, democratic processes and strengthen support to the public	
C+-1+-C	policies.	To to me of
Stoltzfus	A program that utilizes internet communication technology (ICT) to	Internet
(2004)	improve communication, service, and transactional processes with	Communication
Chara	stakeholders [24].	and service delivery
Chen et al	E-government is a permanent commitment by government to	Service delivery
(2006)	improve the nature of the relationship between the private citizens	Public sector
	and the public sector through enhanced, cost-effective, and efficient	efficiency
	delivery of services, information, and knowledge [23].	

Appendix I E-Government Development Index Values and Ranks of the OIC Member Countries, 2007 vs. 2009

			E-Government Development Index (EGDI)				
Country	Region	EGDI, 2009	Rank, 2009	EGDI, 2007	Rank, 2007	Rank Change	
Afghanistan	South Asia	0.2098	168	0.2048	167	▼1	
Albania	Europe & Central Asia	0.4519	85	0.4670	86	▲ 1	
Algeria	Middle East & North Africa	0.3181	131	0.3515	121	▼10	
Azerbaijan	Europe & Central Asia	0.4571	83	0.4609	89	▲ 6	
Bahrain	Middle East & North Africa	0.7363	13	0.5723	42	▲29	
Bangladesh	South Asia	0.3028	134	0.2936	142	▲ 8	
Benin	Sub-Saharan Africa	0.2017	173	0.1860	171	▼ 2	
Brunei	East Asia & Pacific	0.4796	68	0.4667	87	▲ 19	
Burkina Faso	Sub-Saharan Africa	0.1587	178	0.1542	176	▼ 2	
Cameroon	Sub-Saharan Africa	0.2722	149	0.2734	149	<u>#</u> 10	
Chad	Sub-Saharan Africa	0.1235	182	0.1047	182	<u>#</u> 0	
Comoros	Sub-Saharan Africa	0.2327	160	0.1896	170	▲ 10	
Côte d'Ivoire	Sub-Saharan Africa	0.2805	144	0.1853	173	▲29	
Djibouti	Middle East & North Africa	0.2059	170	0.2279	157	▼ 13	
Egypt	Middle East & North Africa	0.4518	86	0.4767	79	▼ 7	
Gabon	Sub-Saharan Africa	0.3420	123	0.3228	129	▲ 6	
Gambia	Sub-Saharan Africa	0.2117	167	0.2253	159	▼ 8	
Guinea	Sub-Saharan Africa	0.1426	180	0.1402	180	410	
Guinea-Bissau	Sub-Saharan Africa	0.1561	179	0.1521	177	▼ 2	
Guyana	Latin America & Caribbean	0.4140	106	0.4375	97	▼ 9	
Indonesia	East Asia & Pacific	0.4026	109	0.4107	106	▼ 3	
Iran	Middle East & North Africa	0.4234	102	0.4067	108	▲ 6	
Iraq	Middle East & North Africa	0.2996	136	0.2690	151	▲ 15	
Jordan	Middle East & North Africa	0.5278	51	0.5480	50	▼ 1	
Kazakhstan	Europe & Central Asia	0.5578	46	0.4743	81	▲ 35	
Kuwait	Middle East & North Africa	0.5290	50	0.5202	57	▲ 7	
Kyrgyzstan	Europe & Central Asia	0.4417	91	0.4195	102	▲ 11	
Lebanon	Middle East & North Africa	0.4388	93	0.4840	74	▼ 19	
Libya	Middle East & North Africa	0.3799	114	0.3546	120	▲ 6	
Malaysia	East Asia & Pacific	0.6101	32	0.6063	34	▲ 2	

Source: UNPAN (2010) [14, 15, 16, 17, 18].