TOWARDS OF SMART CITIES BASED ON THE SUSTAINABILITY OF DIGITAL SERVICES

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Abstract:

Nowadays, the Digital Services (DS) has become an important component of Information Communication Technology (ICT) provided by governments to sustain and facilitate all the transactions.

Simultaneously, digital services has gained popularity in developed and developing countries alike. Due to the importance of the sustainability of Information System (IS), this paper identifies the emergence of a clear gape to measure the sustainability of DS development for transforming to smart cites.

Table: Failure and Success Rates for eG Services

Classification	% for developing countries	% for developed countries
Partial failure	50	33-60
Success	15	15-47
Total failure	35	20-50

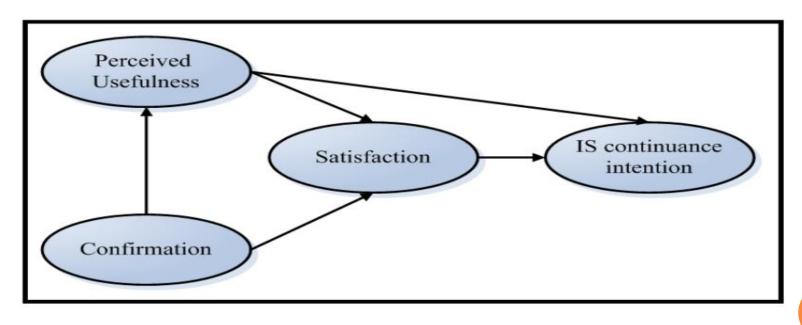


Figure: A post – Acceptance Model of IS continuance

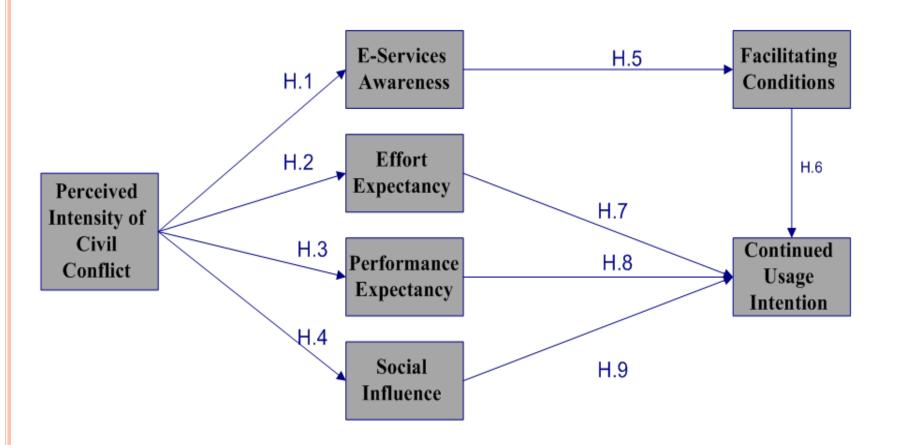


Figure: Research Model

The current research hypotheses are shown below:

- **H1.** Perceived Intensity of Civil Conflict has positive effect Electronic Services Awareness.
- **H2.** Perceived Intensity of Civil Conflict has positive effect Effort expectancy.
- **H3.** Perceived Intensity of Civil Conflict has positive effect on Performance expectancy.
- **H4.** Perceived Intensity of Civil Conflict has positive effect on Social influence
- **H5.** Electronic Services Awareness has positive effect on Facilitating conditions
- **H6.** Facilitating conditions has positive effect on Continued Usage Intention of eG services
- **H7.** Effort expectancy has a positive effect on Continued Usage Intention of eG services.
- **H8.** Facilitating conditions have a positive influence on Continued Usage Intention of eG services.
- **H9.** Social influence has a positive effect on Continued Usage Intention of eG services.

The study focusing on the (G2C) services mainly, covering the range of all government services, such as social, economic, and the rest in the specific context of dangerous zone.

Iraq citizenry from different levels of demographical features would therefore be surveyed for the purpose of this study. Additionally, this study included 350 valid questionnaires from responds from three regions in Iraq.

Table: Participant's Demographic Information

Demographic Variable	Category	(N = 350)	Percentage
		Frequency	%
Gender	Male	187	53.4
	Female	163	46.6
Age	≤ 22	10	2.9
	23 -35	145	33.3
	36- 45	129	29.7
	46-55	54	12.4
	56 or above	12	2.8
Marital status	Single	114	26.1
	Married	297	68.1
	Divorced	15	3.4
	Widowed	10	2.3
Current Occupa- tion	Lecturer	125	35.7
	Manager	44	12.6
	Officer	148	42.3
	Clerks	14	4.0
	Others	19	5.4

Education level	PhD	62	17.7
	Master	80	22.9
	Bachelor	140	40.0
	Diploma	46	13.1
	Secondary School	17	4.9
	Read and Write	4	1.1
	Other	1	.3
Monthly Income in ID (Iraqi Dinars)	≤ 250 (Thousand)	13	3.0
	251 -500 (Thousand)	37	10.6
	501- 750 (Thousand)	102	29.1
	≥751 (Thousand)	198	56.6
Duration of Internet usage	Less than a year	82	23.4
	1-3 years	109	31.1
	More than 3 to 5 years	71	20.3
	More than 5 years	88	25.1

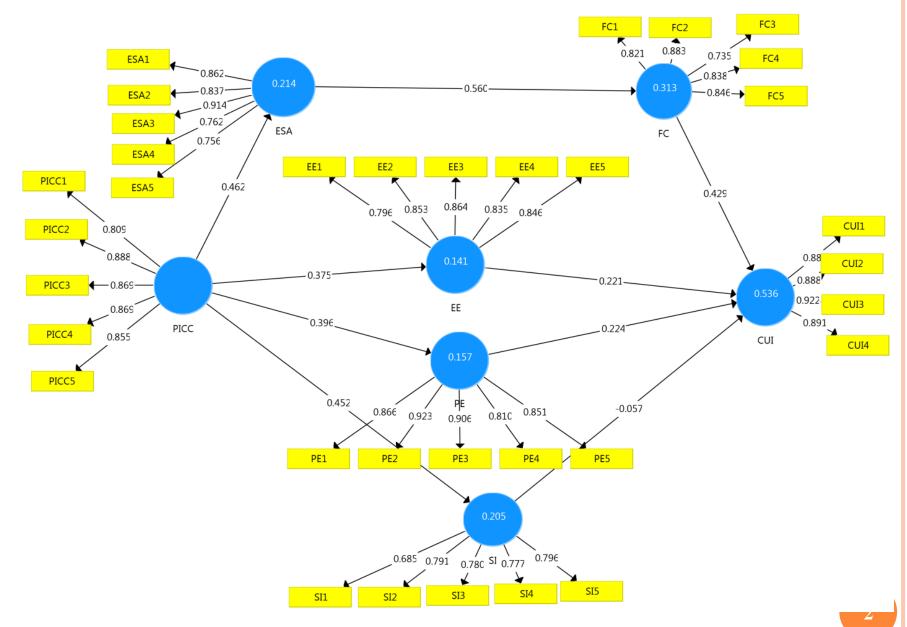


Figure: Path analysis result after deleting the items bellow 0.7

Contributions of the Study

This study has many valuable theoretical and practical contributions. This study attempted to examine the influence of EE, SI, FC, PE, ESA and PICC on the sustainability (CUI) of eG usage.

The uniqueness of this study comes from the examination of different variables and testing of its effect on the sustainability and Continued Usage Intention in the unstable environment.

Thus, this study contributed by proposing a new model to test and examine the sustainability of electronic services in general and electronic public services in specific, via eG services. Also, this study has many contributions to the body of knowledge in the area of eG services in an unstable environment.

Findings

The findings of the study would practically and encouragingly contribute to the government decisions in Iraq especially over the course of sustainable EG services.

H1, H2, H3 and H4. Perceived Intensity of Civil Conflict have Positive Effect on Electronic Services Awareness, Effort Expectancy, Performance Expectancy and Social Influence.

- H5. Electronic Services Awareness has Positive Effect on Facilitating Conditions.
- H6. Facilitating Conditions has a Positive Influence on Sustainable (CUI) of eG Services.

- H7. Effort Expectancy (EE) has a Positive influence on sustainable (CUI) of eG services.
- H8. Performance Expectancy (PE) has a Positive Influence on Sustainable (CUI) of eG Services.
- H9. Social influence has a Positive effect on sustainable and Continued Usage Intention of eG services.

Conclusion

The findings of the study confirm that same theories and same variables have different results in different countries among different culture, sample size, nations, economic, environment and political circumstances.

In specific there is a contribution by investigating a theory in new environment such as wars area, disaster region, risky environment, and so on. Additionally, there is a lack in testing UTAUT2 and usage issues in dangerous and unstable environment.