

Citizen Relationship Management: A Decisive Parameter of G2C e-Governance Web Portals of Maharashtra, India

Rizwan Shaikh
Assistant Professor
JSPM Narhe Technical Campus,
Pune, India
rizwanfshaikh@yahoo.com
+919890457500

Dr. M. Razaullah Khan
Associate Professor
Maulana Azad College of Arts, Science
and Commerce, Aurangabad, India.
drrazakhan@rediffmail.com
+919404485477

Abstract: G2C e-Governance models are designed to facilitate the process of citizen interaction with government. Citizen Relationship Management has become thrust area for design and development of e-Governance systems. The facilities which governments provide through their e-Governance systems needs to evaluated. The parameters like reduced cost to citizens, reduced number of trips, alert (SMS, email, phone etc), citizen charter, response time, etc. are vital. Out of 80 e-Governance portals from the State of Maharashtra, India under G2C category, taken for evaluation, the web portal of Maharashtra State Road Transport Company (www.msrtc.gov.in) evaluated for 'Citizen Relation Management' parameter has scored maximum points.

Keywords: e-Governance, Maharashtra, G2C, Citizen Relationship Management

1.0 Introduction: In recent years there has been an enormous development of Information and Communication Technology (ICT) systems towards e-Governance applications. Governments use ICTs for the communication of information with citizens and businesses on topics like schemes and services, taxes, public utility services, vehicle and voting registrations, land and property records, legal assistance etc. It is expected from e-Governance system that, the introduction of e-services goes along with a change towards a more citizen friendly culture. While e-governance, per se, is technology neutral, the Internet, security and huge data became important infrastructure for government services. Online government followed the path of business services and private transactions, which had discovered first the usefulness of the Internet as information asset. Beyond the Internet, other technologies and applications can be used for e-Governance services, such as telephones, messaging, biometric identification, smart cards, RFID chips, as well as television or radio-based government services used to provide disaster warnings, electronic newsletters, education management systems and traffic control systems. "e-Governance is often associated with government web portals because most governments, national or local, have created web sites and umbrella

portals, operating as gateways and guidance to information and services."¹ Some government sectors have moved forward by introducing personalized e-Governance services that go beyond the provision of general information to allow case sensitive interaction with the user. The introduction of e-Governance applications has been beneficial to governments in several ways.

2. 0 Citizen Relationship Management (CzRM):

Citizen Relationship Management is a growing effort at all levels of government to respond quickly, succinctly and accurately to citizen requests or inquiries for answers to questions and general information about policies, practices, and procedures. This term takes CzRM as its abbreviation, and is a deliberate play on the more common expansion of that abbreviation, customer relationship management. Ultimately, the goal of both is to foster closer, more effective and efficient working relationships, to better anticipate and meet customer/citizen needs and to develop a more detailed working understanding of what customers/citizens want, expect, and need from those who serve them. Government organizations at all levels are looking for technology that can help their employees more fully engage with their constituents. Meeting citizen needs

even exceeding their expectations in a cost-effective manner is something e-Governance web portals are suppose to do.

3.0 Objectives of Present Study:

The objectives of the present study are:

- i. To identify G2C web portals from Maharashtra covering major Citizen Domains, Government Departments and Ministries.
- ii. To identify and analyze the Citizen Relationship Management parameters.
- iii. To evaluate the performance of selected e-Governance web portals from Maharashtra for CzRM parameter.

3.1 Hypothesis:

The Hypothesis formulated for the present study is:

Null Hypothesis: H_0 : e-Governance web portals in Maharashtra are 'Citizen Centric'.

Alternative Hypothesis: H_1 : e-Governance web portals in Maharashtra are not 'Citizen Centric'.

3.2 Research Methodology:

The research work is conducted on web portals of Maharashtra and based on the data obtained from the selected web portals. As suggested in NeGP guidelines², study of various e-Governance web portals in the State of Maharashtra and the literature survey³⁻¹⁰ we have identified 125 parameters, which all should be an integral part of any e-Governance web portal. These 125 parameters are grouped into 10 major parameters. CzRM is one of the major parameter. One of the outcomes of our research study is that, Government can provide quality services to its citizens if CzRM parameters are complied successfully. Following 15 sub parameters are itemized under this group. These sub parameters are:

- 3.2.1 CzRM Policy: Each Government Department is supposed to maintain relationship with the citizen similar to a business organization is doing through CRM. The concept CzRM is extracted, designed, mined and suggested out of our research work.
- 3.2.2 User Registration and Password Policy: As it is expected that the e-Governance web portals are dynamic the user registration facility and password policy taking into consideration all the security aspects must be implemented in the system.

- 3.2.3 Reduced Number of Trips: In an ideal situation citizens owing for the work to be done the concern government department should get benefits of the system by doing entire work from home, if not number of trips should be reduced if compared with the manual system.
- 3.2.4 Last Login Details: For security reasons and for the personal records the web system should provide last login details to each legal user.
- 3.2.5 User Friendliness: The e-Governance web portals are supposed to be user friendly; as the complex, bulky, over written, incomplete systems leads to confusion and lack of interest of the users. Content is the most critical factor convincing users to stick around website. Delivering content that is fresh, easy to read and interactive, is the stepping stone to making website more user-friendly
- 3.2.6 Workflow and Dataflow: Every citizen should able to locate the exact link, page, department, officer, and work. Also the hierarchy of the work and flow must be displayed and maintained in the system.
- 3.2.7 Alert (SMS, Email, Phone etc) Management System: Full hand shake communication with the citizens with the help of SMS, Email, Alerts, and Citizen Care Call Centres are the need of the time and a crucial aspect of the Citizen Relationship Management Policy.
- 3.2.8 Regional Language Support: The framework of the e-Governance web portals must be designed to support multilingual use. In country like India Regional Language Support is important; as Marathi language in Maharashtra.
- 3.2.9 Response Time: Technically web response time on internet and mobile is as important as the response time by the system to the citizens for his/her application. Both time are crucial and should be incorporated by the system.
- 3.2.10 Citizen Charter: The Government of India has passed a bill of RTI and Citizen Charter which gives the details about the time required to complete a particular task in a Government Department along

with the requisite fees. These all features should be displayed on web portal.

3.2.11 Public Awareness: In Maharashtra almost all the Departments and Ministries have their individual and dedicated web portal. But the awareness is negligible in rural and semi urban areas. Public awareness should be increased with the help of other media like news paper and TV.

3.2.12 e-Governance Model Used: As discussed in chapter 2; from the known e-Governance three, four or five stage models suitable model can be chosen for design of the system; depending upon the requirement and analysis of the domain.

3.2.13 Reduced Cost to Citizens: The e-Governance portal should reduce the cost to citizen to perform a task if compared with the manual systems.

3.2.14 Time and Process Log: Availability of the information like time log and process log for each citizen; to know the exact status of time and the process for which the citizen has logged in the system.

3.2.15 Domain Specific Citizen Database: With the help of modern data warehousing and data mining techniques the citizen, services, schemes and other domain specific database must be designed and implemented for the system.

3.3 Data Analysis and Discussions:

For evaluation of G2C web portals from the State of Maharashtra; 80 e-Governance portals are selected from different domains and functionality with the help of convenient and strategic sampling methods. All these 80 web portals are analyzed and evaluated for the above 15 sub parameters of the major parameter 'Citizen Relationship management'. The scores for each sub parameter and every selected G2C web portal are evaluated by assigning values 1, 0.5 and 0. For example for 'Regional Language Support' sub parameter if the support available then the score is 1, if not then score is 0 and if partial (e.g. downloadable forms)

system the score would be 0.5. Likewise scores are evaluated for all the selected 80 G2C web portals and 15 sub parameters. The matrix is formulated to calculate the cumulative score.

For the present study the set hypothesis is tested by applying Chi Square (X^2) test. The cumulative evaluated scores and performance of all 80 G2C e-Governance web Portals for 'CzRM' parameter is plotted in the Chart. Frequency Distribution, Performances of top 10 web portals out of 80 and its analysis is discussed in the subsequent paragraphs. The mean, standard deviation, top and last performer, maximum and minimum score for this parameter are given in the following table.

3.4 Hypothesis Validation:

For the set hypothesis Chi Square Test value for 3 Degrees of Freedom and 5% Level of Significance, is Chi Square ($X^2_{\text{calculated}}$) = 18.237. Since the Chi Square calculated value is greater than the table value the null hypothesis is rejected. It means the e-Governance web portals selected for study from Maharashtra are not Citizen Centric.

3.5 Analysis and Interpretation:

The frequency distribution for Citizen Relationship Management is highest for class interval 5-9 and minimum for last interval; as shown in chart 1. As there are total 15 sub-parameters; the maximum score that can be obtained for this major parameter is 15. 35 G2C e-Governance web portals out of 80 are in the interval 5-9. It is observed that 66.25% of the web portals are scoring in between 0 to 9. In G2C category, for Citizen Relationship Management parameter, the mean value is 7.65 out of 15 and standard deviation is 3.9924. Only 34% of the web portals are good at providing Citizen Relation Management aspects through respective web portals. The information like Alerts, Regional Language Support, Reduced Number of Trips, Reduced Cost to Citizens, Domain Specific Citizen Database etc are not provided by almost 2/3 of the e-Governance web portals.

Chart 1: Frequency Distribution of Parameter: Citizen Relationship Management, G2C Category

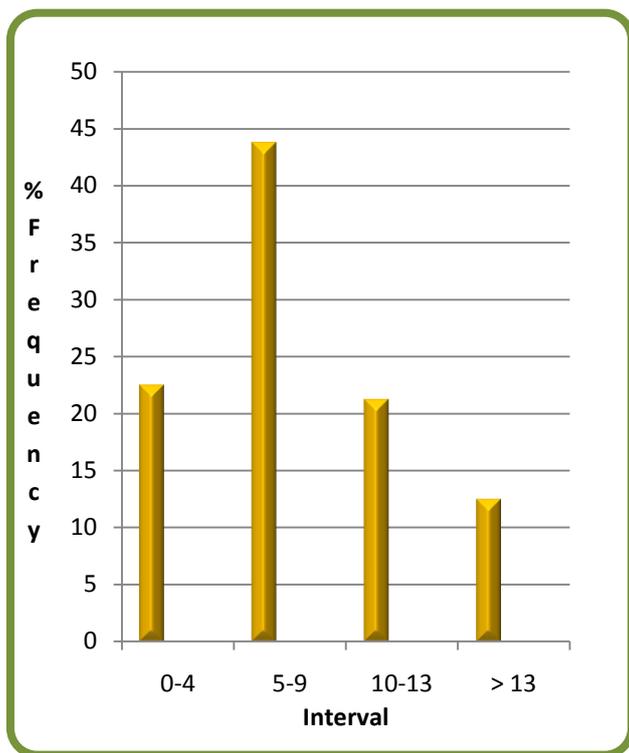


Table 1: Frequency Distribution of G2C web portals for respective performance in ‘Citizen Relationship Management’ parameter

Interval	Frequency	Percentage
0-4	18	22.50
5-9	35	43.75
10-13	17	21.25
> 13	10	12.50
Total	80	100
Mean	7.65	
SD	3.9924	

Table 2: Performance of top 10 e-Governance Web Portals, Parameter: ‘Citizen Relationship Management’, Category: G2C

Sr. No.	Department Name	Score (Out of 15)	Percentage	Overall Score
1	Maharashtra Road Transport Company	14	93.33	478.07
2	Department of Registration and Stamp	14	93.33	509.39
3	SETU Sangali	14	93.33	430.12
4	BARTI	14	93.33	366.79
5	Directorate of Employment and Self Employment	14	93.33	475.78
6	Directorate of Technical Education	14	93.33	554.39
7	MPSC Online	14	93.33	470.25
8	Maharashtra Online	14	93.33	538.07
9	Department of Social Welfare	13.5	90.00	420.91
10	Social Justice Department	13.5	90.00	311.51

Chart 2: Performance of top 10 e-Governance Web Portals,
 Parameter: ‘Citizen Relationship Management’, Category: G2C

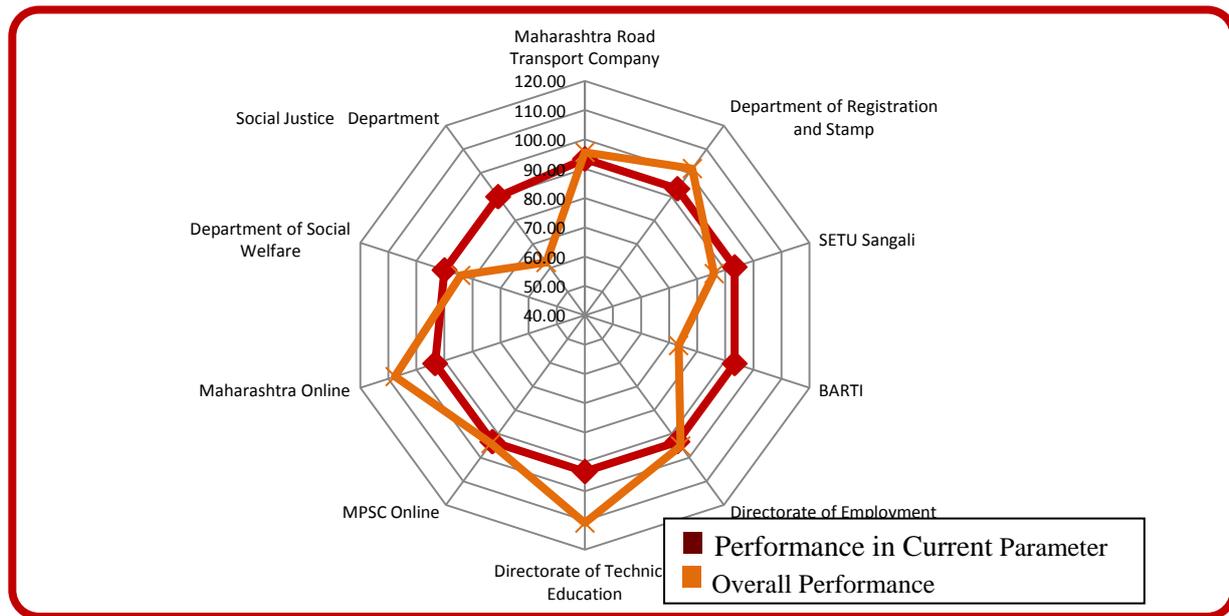


Table 2 shows top 10 G2C e-Governance web portals for ‘Citizen Relationship Management’ parameter. The web portal of ‘Maharashtra Road Transportation Company (MSRTC)’ has performed comparatively well in providing Citizen Relationship aspects. Chart 2 interprets that most of the top 10 performer are missing from the list; because of the web portals which are engaged specifically in providing online services like ticket booking, exam registration, online admissions has performed comparatively better.

4.0 Conclusions:

The research paper evaluates and analyzes the findings from all the elected 80 e-Governance web portals under G2C category. In the course of this process, the following outcomes and conclusions are worth mentioning.

- With the initiatives taken by Department of Information Technology, Government of India, through the implementation of nationwide NeGP plan, Indian and Maharashtra e-Governance systems have taken a leap.
- For CzRM parameter, out of 80 G2C e-Governance web portals, 35 are in the interval 5-9. It is observed that 66.25% of the web portals are scoring in between 0 to 9.

- The average score is 7.65 out of 15, comparatively a low score. Around 65% of the web portals are performing below average for this parameter.
- The Hypothesis set for testing is rejected and concludes that the e-Governance web portals of Maharashtra lack Citizen Centricity.
- It is also observed that, the web portal of Maharashtra Road Transportation Company (www.msrtc.gov.in) has scored maximum points 93.33% for the Citizen Relationship Management Parameter.
- The other e-Governance web portals ranked 2 to 5 are Department of Registration and Stamp, SETU Sangali, Babasaheb Ambedkar Research and training Institute (BARTI), Directorate of Employment and Self Employment.
- The overall performance taken for all 10 major parameters and the performance in current CzRM parameter of Maharashtra Road Transportation Company are same.
- All the top ten performers in CzRM parameter are scoring more than 90%

Reverences:

[1] Central Informatics Bureau, Ministry of Information and Communication Technology, “e-

- Government Strategy 2013 – 2017 (draft)”, Republic of Mauritius, May 2013, pp 5 [http://mict.gov.mu/English/Documents/Mauritius%20eGov%20Strategy%2017%20June%202013.pdf]
- [2] White paper, “MSWAN- Maharashtra State Wide Area Network”, pp 1
- [3] Department of Information Technology, Government of India, “Saaransh a compendium of Mission Mode Projects Under NeGP”, 2010, pp 119
- [4] www.egovstandards.gov.in
- [5] Department of Electronics and Information Technology, Government of India, “Implementation Guidelines for the World Bank assisted India e-Delivery of Public Services Projects” Office Memorandum 2(1)/05 EGD Volume 4, point IV, 14147, 31 October 2012, pp 2
- [6] Monga, A., “E-government in India: Opportunities and challenges” JOAAG, Volume 3, Number 2, 2008, pp 55
- [7] Monga, A., “E-government in India: Opportunities and challenges” JOAAG, Volume 3, Number 2, 2008, pp 56
- [8] http://www.degs.org.in/UIDAI.aspx
- [9] Kuldeep Singh, “e- governance Initiatives in India: A Case Study of Union Territory, Chandigarh”, Gian Jyoti E-Journal, Volume 1, Number 2, Jan – Mar 2012, ISSN 2250-348X, pp 7
- [10] http://www.infokerala.org/janasevanakendrams