Digital Transformation Model for the Society through Integrated On-line Citizen Services Portal

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Abstract: Citizen Centric Services are top priority for the Government to provide various services to the citizens with transparent, affordable and time bound passion. These citizen centric services like Caste, Domicile Khatouni/ Record of Rights (ROR), Death and Birth Certificates etc are very important for all the stakeholders. The citizens are empowered to claim for related benefits/ schemes on the basis of these services/ certificates. Also, the Government may filter the valid claims by verifying these documentary proofs. Various reports/ surveys may be done which give idea to form new policies and schemes. These services are also the source of income to the Government. This project crossed all the social barriers and provided the benefits to the last mile.

Due to the various benefits and requirements of the citizen services, concerned Department/ Government is required to simplify the overall process to ensure the delivery of the services in transparent, affordable and time bound manner to the doorstep.

In view of the above, National Informatics Centre (NIC) developed and implemented an Online Citizen Services Portal for Uttar Pradesh Government to deliver the various services by simplifying the cumbersome process life cycle. The portal is integrated with 08 departments to provide a single window interface for public. This e-Services Portal of Uttar Pradesh has been developed with an objective to enable a single window access to information and services being provided by the various state Government departments at last mile citizens' doorstep.

Keywords: Citizen Centric Services, Digital Signature, eDistrict, FIFO, NIC.

I. INTRODUCTION

The citizens are in the priority of the Government. It is the Government duty to provide all the necessary services and facilities to the citizens in an efficient and an effective manner. Government works 24x7 to create the friendly environment for their citizens.

Initially, the citizen centric services (Caste, Domicile Khatouni, Death and Birth) [1] delivery was not an easy task for Revenue Department/ Office. It was due to the various reasons and limitations like lack of will power, infrastructure, technology, manpower, supportive environment. The overall process was time consuming, hectic and the technology was an alien.

The citizen had to visit tehsil office for various services like certificate of Caste, Domicile, Income, Birth and Death etc. He had to stand in a long queue and come to office again and again from remote villages. Sometimes, he had to bribe for required services to mediators. At all the levels, he had to interact with govt officials and had to wait for his turn and unnecessarily time killing involves. They were exploited at many places. Sometimes,

it was heard that whoever gave bribe, got the priority other waited. Also Officers were overloaded to deal huge number of applications of various types of certificates/ services with limited manpower and within the time frame.

To ensure the overall process easy and friendly, a strong step was taken by Uttar Pradesh State Government with the help of India's Premier IT Organization, National Informatics Centre (NIC) [2]. So, e-District Project [3] was developed and implemented in 6 pilot districts of the state- GautamBuddh Nagar, Ghaziabad, Gorakhpur, Sitapur, Raebareilly and Sultanpur. After successful rolled out of eDistrict Project, It was replicated in all the remaining 69 districts of the state to deliver the services in efficient and effective way. The District Informatics Officers (DIO- NIC) technically supervised all the implementation activities and ensured the overall training process to the concerned officials. They extend their support to train all the stakeholders on eDistrict Portal and Digital Signature. Common Service Centers (CSC) [4] and LokwaniCenters were opened in rural areas and urban areas respectively to deliver the citizen centric services through web portal of eDistrict. CSCs are the milestone in the direction of efficient and effective delivery of services. CSCs also provide the services of UIDAI, PAN, National Digital Literacy Mission (NDLM), Passport, Jan Dhan, Banking, Election, Insurance etc.The largest CSCs network is setup in Uttar Pradesh comprising of 44,999 CSCs in Gram Panchayats, second being Maharashtra (34,873) and Gujarat (15,877) in the year 2015-16, to ease the service delivery process. These CSCs are the milestone in the direction of efficient and effective delivery of services. In other words, they are mini tehsil office at Village Panchayats for various e-Governance services.

The CSC used to collect all the supporting documents from the citizens and fill the online application and sent all the received documents and application print out to the tehsil/ concerned office for verification, it required time. Also, complaints against CSCs were received by the concerned authorities that some CSC Operators are charging more than specified fees for the services but the necessary actions also were taken by the concerned authorities to curb such practices.

Citizens were still dependent on middle stakeholders/ CSCs. It delayed the process cycle due to the abovementioned process. There was some better could have been awaited to resolve existing issues and to provide citizen services at their doorstep. To avoid such issues and make more efficient and transparent system of service delivery, Government of Uttar Pradesh implemented Online Citizen Services Portal. Online Citizen Services Portal has completely transformed the existing service delivery life cycle by adopting Process Reengineering Model to interact, interface and transact with all the concerned stakeholders in a integrated and interoperable manner for the delivery of

citizen services in transparent, time bound, effective and efficient manner.

The main objective of this project is to transform the existing process pervasive in our society by enabling a single point of access to the citizen services and associated information being provided by the various state Government departments at citizens' doorstep with total transparency, and with grass root level participation.

II. IMPLEMENTED PROCESS RE-ENGINEERING MODEL OF ONLINE CITIZEN SERVICES PORTAL

The purpose of Online Citizen Services Portal is to minimize the interaction of citizens to Government Officials, to ensure transparency, to serve citizens in FIFO manner, to minimize the paper usage and movement, to ease the work for govt officials and to include all other citizen centric services. This happened by adopting the process re-engineering model to transform the manual culture into the ICT enabled mechanism comprises of digital signature technology [5] and First in First out method to entertain the application.

The Process Re-engineering was executed against the existing delivery life cycle to simplify the existing procedures and make them easier for general public. The model has been adopted to eliminate the manual culture of issuing such services, and the Government Order was also issued to stop such practices of manual issuance of these citizen centric services. The concerned stakeholders were strictly instructed to follow the re-engineered model of the existing culture.
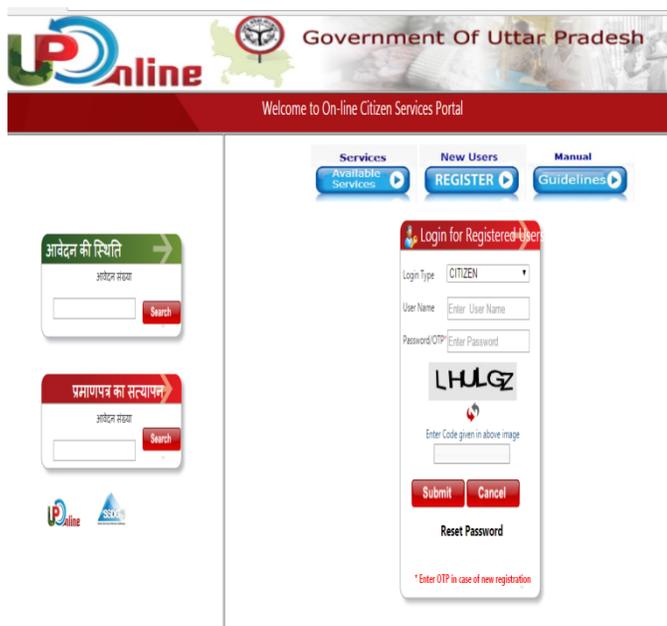

Figure 1: View of online citizen services portal,

Now a citizen can login to the portal and fill the required certificate/ service [6] (Example- Caste Certificate) form from anywhere at any time. Then this application automatically shows in the account of concerned Tehsildar/ Revenue Department Officer. Tehsildar sends application to the concerned Lekhpal/ Field Level Official to verify it physically. Tehsildar is bound to entertain application only in FIFO manner, he can't jump the sequence of application. FIFO simply means that whichever application received first must be entertained first. Now Lekhpal

is also bound to entertain received application from Tehsildar in FIFO manner. He has to physically verify the submitted documents and relevant aspects. He sends back the online report to Tehsildar. Now Tehsildar digitally sign the certificate and as soon as certificate digitally signed, it is automatically available in Citizen's account to print it out. This process is time bound so nobody can unnecessarily stop the process. No official can jump the sequence and before entertaining the current/first application, he can't go further. Citizen can check the status of his requested service online at any time. By these restrictions the process is completely transparent. In this way, the Tehsil office is free from crowd and official can do their work easily and peacefully. By adopting the same model, other services/ pension/ aids included under Online Citizen Services Portal may be provided to citizens by the concerned departments.

Figure II shows the workflow diagram of Integrated On-line Citizen Services Portal. 08 departments are integrated with this portal and make their services available to the public in easier way. The applicant does not need to interact with individual department for services. He has a single point of interface to interact with 08 departments for concerned services. This trustworthy portal is hosted in State Data Center for providing the secure, authentic,reliable and seamless deliverables to the society.
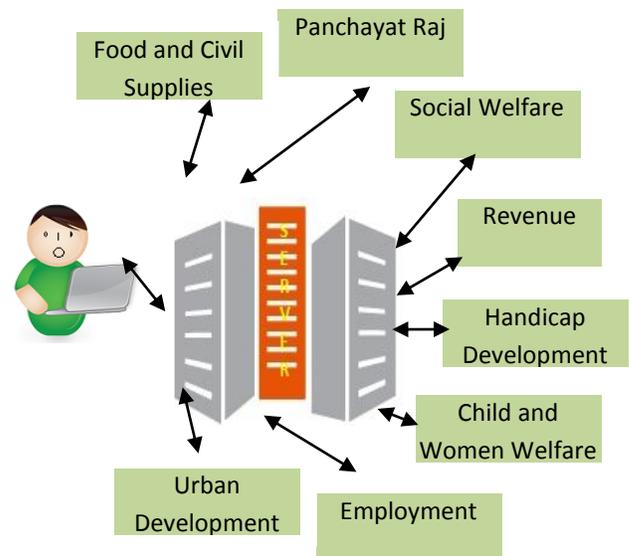

Figure 2: Workflow of on-line citizen services, Portal

Online Citizen Services Portal has been implemented in all the districts of Uttar Pradesh to provide the uninterruptible services. It incorporates eDistrict services and this portal is part of uponline.up.nic.in.

Its mission is to provide the citizen centric services online and to ensure transparency in the complete cycle of the process. Currently, the services of 08 departments have been included under this project. All the stages of getting these services have been computerized and automated. Online Citizen Services Portal includes the services of various Certificates, Pensions, Khatouni, Family Register Copy and Employment Registration etc. The services are provided to the citizens with total transparency and within the time frame at their doorstep.

Benefits of Online Citizen Services Portal

- All the applications are entertained in First in First out manner. No sequence jumping is allowed. Whoever applied first would get the service first. Others automatically go in waiting stage. Now bribe and acquaintanceship factors do not work to entertain any application on priority basis.
- Applicants do not need to approach Government offices for these services from remote and backward villages/ towns. It saves their time and hard earned money.
- The status of application may be tracked anytime.
- Transparent, Time Bound, Affordable, Effective and Efficient services are being delivered at citizens' doorstep.
- The services are available online and Government offices are free from rush to do other works.
- The online verification of issued certificates is available. The authenticity of any certificate is verified in a jiffy. It controls the counterfeit certificates.
- The application fee is paid online so it is required to have a bank account of the applicant. It gives thrust to the Financial Inclusion which is the delivery of financial services at affordable costs to sections of disadvantaged and low-income segments of society.
- It minimizes the paper usage and the state leads towards the green governance.

III. DESCRIPTION OF SERVICES

Currently, the services of 08 departments of the state of Uttar Pradesh are being provided to the citizens. The details of these online services are tabled as below:

Table 1: Description of various services of 08 departments

Sl. No.	Department Name	Service Name [6]
1	Revenue	Income Certificate
		Domicile Certificate
		Caste Certificate
		Khatouni/ROR
2	Panchayat Raj	Birth Certificate
		Death Certificate
		Family Register Copy
3	Social Welfare	Family Benefit Scheme
		Old Age Pension
		Scholarship
		Marriage and Medical Aid
		Complaint against Victimisation
4	Food and Civil Supplies	Ration Card Registration
		Renewal of Ration Card
		Updation of Ration Card
		Surrender the Ration Card
5	Handicap Development	Financial grant for Rehabilitation of Loan/Handicapped
		Financial grant to marriage handicapped person
		Financial aid for Artificial Limbs to handicapped
6	Child and Women	Widow Pension
	Welfare	Financial aid to Dowry victim Woman
		Law support to Dowry victim Woman
		Financial grant for Widow's Daughter Marriage
		Couple Award Scheme
7	Employment	Employment Registration
		Employment Registration Renewal
8	Urban Development	Birth Certificate
		Death Certificate

IV. IMPORTANT ASPECTS

There are various important aspects associated with this project.

A. Sustainability

Program Sustainability of Online Citizen Services Portal relates to the creation of supportive environment for citizens and community members. The software is well planned to make all the stakeholders to be interested in it and all the issues of the govt officials/ service providers have been resolved programmatically so that they could be willing to work together. Project focuses on realization of project objectives. Program sustainability of this project is to enlarge their target population, transfer their best practices to other program, build new relationships with other agencies, or promote broader policy initiatives.

Human sustainability of this project involves specific goals, ideas and methods implemented to preserve and improve the quality of human life. Resource based factors and sociological environment contribute to the human sustainability of this project. This project ease the process of getting various certificates/ services with quality, it achieve the goal of human sustainability.

Financial sustainability is the ability of this project to keep up its operation successfully after the funding period is over. The numbers of functional and non-functional attributes like usage, security, scalability, usability, performance etc also are identified as relevant to notion of financial sustainability. It is clear dependency of financial sustainability on such attributes. Financial sustainability may be achieved by estimating the complete life cycle budget. It may also be achieved by the user charges share. The service fee is charged from user and which is distributed among stakeholders to keep the system up its operation.

B. The Impact:

This project created an environment in which a citizen can get various services/certificates with total transparency, in limited time frame, without any extra bucks, without going concerned office. Now unnecessarily, nobody comes to Tehsil office for such services. Tehsil officials can work peacefully because earlier the tehsil was full of applicants and their applications.

C. Uniqueness:

Total Transparency because services are issued in FIFO manner and all the stages of the process are online. The portal is open for 24x7, all the stakeholders may work anytime, not only 10 AM to 5 PM. Earlier it was used to say that if you want these services,

go to Government office, Now we can say that if you want these services, go home and login to Online Citizen Services Portal.

D. Cost Effectiveness, affordability by other State:

The implementation cost is not a major issue. The main investment of the total cost of this project is required at Server Side. The server may be hosted in data center. If this software is hosted in Cloud [8], then it would be better. This project is cost effective and affordable; it removes the unnecessary paper wastage and creates an approach of go green. The minimum ICT infrastructure is required to achieve the goal at client side, the ICT infrastructure available in almost all the offices. One Computer with minimum configuration is required for concerned govt official.

Nowadays, everybody has smartphones so these phones with data connectivity may be used by Field Officials/Lekhpals for verification. One PC is required for concerned Officer/ Tehsildarto digitally sign the certificates. Now all tehsil offices have sufficient number of computers, it may be required to little update/ upgrade only, if necessary. So the computing cost is very low at client side. The software may be developed in Open Source Technology like Java or PHP to curtail the cost of development environment. But due to .NET Technology support, it was developed in it. This software is required little customization as per state's requirements. Some cost is involved to arrange few ICT/ Project trainings for stakeholders to achieve the goal.

E. Scalability and Replicability:

The project is easily replicable by customizing as per the need of the state. The Project may be hosted in State Data Center but it may be better if it is hosted in Cloud. Cloud [9] is the virtual pool of the resources which provides on demand services to the user. It makes the project more scalable because such sites are busier during admission or recruitment time so they may use the resources of cloud. The Cloud provides all the things as service.

CONCLUSION

Not always, new idea is welcomed. The same happened during the implementation of this project. It was a negative approach towards new idea and another challenge to stop the monopoly of the stakeholders who were involved to capture the stages of process life cycle. The life cycle of the project is full of ICT usage. The concerned Officers/ Tehsildars/ Lekhpals were not IT savvy. They were trained properly and finally they adopted the technology with full of enthusiasm.

The ICT infrastructure was also a challenge but it was managed easily by engaging the labs established at district and tehsil levels. Initially, officials started work in newly established district/ tehsil computer labs. It was revolutionary change so a hesitation was also there. To fill the form in Hindi Language was also the challenge because many citizens and officials were friendly with English keyboard but not in Hindi Typing. But the practice made them perfect and gradually all the negative approaches were turned off and the system works fine. The user manual [10] is very friendly so that citizens do not have any difficulty to apply online for required services. It was team effort to make it success. It integrates various departments to provide the affordable services in effective and efficient manner within the time frame at the citizens' doorstep.

It connects the last mile citizen of the society using ICT mechanism, and by challenging the socio economics barriers. Now, all the stakeholders accepted this new idea because of its fruitfulness and the digital transformation of the society for their empowerment and betterment.

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