

# Virtual Parliament – An immediate need of Digitally Ready India

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**ABSTRACT:** Today the Information & Communication Technology (ICT) have transformed the life of human being completely. New innovations in ICT continuously gripping and transforming the business, education, society & health Sector. Politics is not immune from ICT. Recent election in 2014-15 witnessed the extensive use of ICT as Mass Media. Even our MPs & MLAs was extensively using Facebook, Twitter, Blogs, UTubes, Whatsapp etc for reaching their followers. During the electoral campaign, some MP and MLAs was also taking the assistance from their back-end computer team to get caste related statistics of an area and make their strategy hourly based. Even the Pre-election prediction was severely affected by ICT campaign & Electronic Media Aids. In a nut-shell, it is an appropriate time to ICTified the Politics by adopting Virtual Parliament Session. This will be beneficial for our country and make it true Green in all aspects globally. This exploratory paper gives a perception of Roadmap for Virtual Parliament concept. It may be a reality for Digitally Ready India so that the wash-out sessions of parliament can be avoided in future.

**Keywords :** ICT, Digital ready India, Green Technology, Social Tools, e-Parliament, Virtual Parliament, Deadlock free democracy, Virtual Asian Parliament, Digital Divide, NeGP, SWAN, SDC, CSC, DEITY, DOS, Cyber law, MOOC, Cyber Law, Soft Skill, Communication Skill, Problem Solving Skill.



## 1. Introduction:

Everyday development in Information & Communication Technology (ICT) have totally gripped & transformed Social, Health, Education & Business sectors. Even Politics is not immune from ICT. Recent election in 2014-15 witnessed the extensive use of ICT as Mass Media. Even our MPs & MLAs was extensively using Facebook, Twitter, Blogs, UTubes, and Whatsapp etc for reaching their followers. New paradigms like e-Voting, e-participation etc are technically feasible. The researcher are a step ahead by imagine the concept of e-Parliament [1] or Virtual Parliament using latest innovations of ICT. The government driven Public Institutions having extensive expectations, they are trying to fuse ICT for “transparent post-reform intermediate results” and “final implications of ICTification on politics”.

Now a day, ICT have profound effect on the functioning of Parliament (including Lok-Sabha & Rajya-Sabha). People start to faith on this reform because it is transparent and also fair for deciding the indirect participation [13] of people in legislation processes and giving better democratic feeling. India is nowhere near the nothing-needs-to-change stage. We haven't had a strong round of fundamental economic reforms since 1991. In such a situation, the growth graph is saturating. To come out from this eclipse, it is good to reform the “Deadlocked Political System” without making any change in legislation system. The ICTification is the only ray of hope for Deadlock free democracy [2] forever.

## 2. Driving factors for Virtual Parliament:

### 2.1 Miss fitting participation:

All most all political parties in India have failed in their responsibilities to ensure full participation of the members and their befitting mannerism [5] while they are in the temples of democracy. Current systems, methods and practices related to functions of parliament that cause huge dent in Government exchequer are in no way near to it and therefore, become totally ineffective in yielding required results. As the precast mindset of

most people is hard to change as being demonstrated that the members are unable to behave in a civil manner, it is time to think to look for other ways and means to get over the problem in the interest of the nation; and hence the suggestion for moving into a system of IT enabled Virtual Parliament.

### 2.2 Evolving Role of Simple LMS to Cloud based LMS:

ICT continue to influence the way we find, create, share, and negotiate information, knowledge and ideas. Since education continue to extend the reach of classrooms with a service quality motto – available “anytime, anywhere for anybody” [3]. Perceptions of expertise have expanded, today we balance demonstrating personal mastery of knowledge and skills on criterion-referenced tests with assessing how well someone can leverage their inter-connected networks of connections to resources, information, and subject matter specialists. Work styles are shifting from individual accomplishment to teams, communities of practice, and collaboration. In the midst of all these changes, here stands the Learning Management System (LMS). This innovation LMS, seen by many as the foundation for building today's enterprise e-Learning practice. Today's LMS sits squarely in the evolutionary cross-fire as e-Learning matures from its 1.0, “publishing Web”[4] antecedents to accommodate the demands of the 2.0, “participative Web”[4] possibilities. With the emergence of browser-based tools and Cloud platforms, the expectations of and for learning itself is in a state of transformation, it continuously gripping the Business, Health and even Politics Sectors. The enterprises are giving their services to all sectors.

The government driven Public Institutions are also equipping with all such service providing capabilities with 24X7 feature. Thus people having more and more expectations from government driven Public Institutions for “Transparent Post-reform intermediate results” and “final implications of ICTification on Politics”. Researchers experimenting the pedagogically proved finding of Virtual Learning with Virtual Parliament system and the results are positive. M Z Sobaci [1] illustrated in his book about Prerequisites, Frame-work, Services and Tools necessary for Virtual Parliament. Here in the following sections we will try to explore such issues in a nutshell and providing a roadmap for Virtual Parliament System with technical feasibility. Few experts suggested the idea to conduct the parliament sessions with Video

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conferencing technology, so that each member can be in their IT enabled office at their respective constituency where video conference facilities with required connectivity are made available. The speakers and their parliamentary staff only need to be there in the parliament house equipped with necessary video conference facility. As the technology advances it is also possible to provide holographic projections [5] of the persons in discussion at any point of time. All most all functions of both houses including voting etc., could be done with such virtual set ups. Moreover, all interactions according to routine procedures could be done strictly according to rules in an orderly way more efficiently. It can ensure that Hon. Speaker can have full control in procedures of the house. There can be provisions to have in-camera video discussions between members of the party or members within the coalition without causing interference to house proceedings. This form of virtual parliament would ensure more meaningful and orderly participation of members or parliaments during the sessions while giving them more time to work for the people in the constituency.

### 2.3 Competitive Moves in Sub-continent

If we keep eye on our sub-continent then we found that the Standing Committee [6] on Social and Cultural Affairs held its meeting on 14-16 March 2010 in Palau. APA Delegations from Bahrain, Indonesia, Iran, Palau, Russia, Saudi Arabia and Sri Lanka participated in this meeting. The Sub-Committee on the Challenges and Opportunities of Globalization in Asia supported the proposal for establishing the "Virtual Asian Parliament" to enhance deliberation and strengthen cooperation among Member Parliaments. It also decided to establish an ICT (information and communication technology) Group to cover both ideas of Virtual Asian Parliament and Bridging the Digital Divide in Asia. Other South Asian Countries & China also having better Parliamentary e-Services than us.

### 2.4 Get Rid from Washed out Session of Parliament

Recently in Aug 2015, the entire monsoon session of Parliament was washed out [2], or that we weren't as bothered by this fact as we should have been. What can we do about it anyway? We didn't like the previous government, under which Parliament had ceased to work. So we elected a new majority government. Now even this government can't seem to make Parliament work. What are we to do? Even Hon APJ Kalam had expressed their sorrow for it during his last few days. We citizens are also to blame. We are easily fooled into the 'XYZ Party did it' or 'ABC Party did it' narrative. We often forget we are one country. There are no XYZ bills or ABC bills — only good-for-India bills or bad-for-India bills. If we gone through the financial implications then it is alarming, in fact, all this would've been amusing, if it wasn't for the fact that the taxpayer's money is being burnt with every minute wasted in Parliament. Every minute of Parliament Session costs around Rs 29,000 [7] and the 18 days wasted equals a gigantic National Loss of Rs 35 crores.

## 3. Road Map for Virtual Parliament

### 3.1 Prerequisites:

#### 3.1.1 Replace Governance with E-Governance [8]

In India, the National e-Governance Plan (NeGP) has been formulated by the Department of Electronics and Information Technology (DEITY) and Department of Administrative Reforms and Public Grievances (DARPG). The Union Government approved the NeGP, comprising of 27 Mission Mode Projects (MMPs) and 10 components on May 18, 2006. The NeGP aims at improving delivery of Government services to citizens and businesses with the vision - "Make all Government services accessible to the common man in his locality, through common service delivery outlets and ensure efficiency, transparency & reliability of such services at affordable costs to realize the basic

needs of the common man". Implementation of e-Governance is a highly complex process requiring provisioning of hardware & software, networking, process re-engineering and change management. NeGP implementation involves setting up of common and support IT infrastructure such as: State Wide Area Networks (SWANs), State Data Centres (SDCs), Common Services Centres (CSCs) and Electronic Service Delivery Gateways. Suitable arrangements for monitoring and coordinating the implementation of NeGP under the direction of the competent authorities have also been substantially put in place. The programme also involves evolving/ laying down standards and policy guidelines, providing technical support, undertaking capacity building, R&D etc. DEITY is required to adequately strengthen itself and various institutions like NIC, STQC, CDAC, NISG, etc. to play these roles effectively. e-Governance is being promoted through a centralised initiative. PPP model is to be adopted wherever feasible to enlarge the resource pool without compromising on the security aspects.

### 3.1.2 Constitutionally Approved Cyber Law [9]

In Simple way we can say that cyber crime is unlawful acts wherein the computer is either a tool or a target or both. Cyber crimes can involve criminal activities that are traditional in nature, such as theft, fraud, forgery, defamation and mischief, all of which are subject to the Indian Penal Code. The abuse of computers has also given birth to a gamut of new age crimes that are addressed by the Information Technology Act, 2000. We can categorize Cyber crimes in two ways. The "Computer as a Target" – means using a computer to attack other computers. e.g. Hacking, Virus/Worm attacks, DOS attack etc. Other is "Computer as a Weapon" – means using a computer to commit real world crimes. e.g. Cyber Terrorism, IPR violations, Credit card frauds, EFT frauds, Pornography etc. are Cyber Crimes and regulated by Cyber Laws or Internet Laws.

### 3.1.3 Etiquette training of Stakeholders

ICT has become unavoidable, making its role Sustainable, ICT consultants pivotal to the success of green and sustainable initiatives by ensuring that the technology being used is "green" and power efficient, and by providing the IT tools and services needed to support organization's overall green investments. Most of the Sustainable ICT professionals received training from different fields (mainly IT courses) and developed their Knowledge, Skills and Competences through specific courses, working experiences or personal studies. These are jobs areas where people are hired specifically for their knowledge about sustainability, the environment or climate change. They are likely to have a qualification in one of these areas and may have the job title of "Sustainable ICT infrastructure and operation experts". This is a small and specialist job role, but due to current and upcoming legislation, it is likely to expand quickly. Today, even European innovation and sustainability are often identified as suffering from skills shortages. Cedefop [10] has recently highlighted that some 'green occupations' are facing skill gaps in practical and technical skills. Thus the purpose of "Vocational Education & Training" (VET) starts from here. The VET may be Government owned or can be a collaborated activity with industry players. Now there is a need of good tool. We have to follow the European Qualification Framework (EQF), which is acts as a translation device to make national qualifications more acceptable across globe. The core of the EQF concerns eight reference-levels describing what a learner knows, understands and is able to do 'learning outcomes'. Levels of national qualifications will be placed at one of the central reference levels, ranging from basic (Level 1) to advanced (Level 8).

As the Parliamentary teams are becoming increasingly geographically dispersed, they have to rely heavily on virtual meetings to communicate and collaborate. Having everyone follow a common set of rules will ensure that the virtual meetings

are beneficial and productive for nation. Below are just a few things we can ensure that we are following the proper etiquette for Video conference and virtual meetings.

**For Parliament Members** [18]: Stay engaged throughout the entire meeting, avoid the urge to try to multitask and stay focused on the topic at hand.

- Join the meeting on time or a few minutes early.
- Make sure you are in a quiet area. Limit the background noise. Make every effort to get to a location where others can hear you clearly.
- If joining after the meeting has started, wait for the Speaker to ask who joined. This will prevent you from possibly interrupting the presenter and further disrupting the meeting.
- Mute your phone when you are not speaking.
- When speaking, keep your points clear and concise.
- Never place the meeting on hold, simply drop and rejoin when you can.
- Make sure you are clear on any action items assigned to you.

**For Speaker or Co-ordinator** [18]: Since everyone is remote and in many cases cannot see each other, it is the Speaker's responsibility to facilitate the meeting as effectively as possible.

- Send out the meeting agenda prior to the meeting. Be sure to include the expected outcome of the meeting.
- Conduct a roll-call at the beginning of the call. If a new person joins the call after the meeting has started, ask for their name at a good stopping point.
- If sharing your screen, make sure you are only sharing the desired document and log off from FB and e-mail account or set it Do-not Disturb mode.
- Keep your attendees engaged.
- Review action items and assigned POCs at the end of each call.
- Provide opportunity for Q&A session so everyone is on the same page.
- Be mindful of everyone's time, start and end on time. Hold another virtual meeting if you are unable to go through the agenda items in one call.
- As the coordinator you also need to be cognizant of a few more items to help ensure the meeting stays on track.
- If you are using an online collaboration tool, conduct a practice run to make sure the technology launches properly. Confirm if you are able to mute all participants and allow meeting attendees to "Raise their hand" to ask questions or offer comments.
- If you are using a conference call only option, be sure to confirm the conference dial in number is available. It will be quite embarrassing if another is using the same number for their meeting at the same time. With an Operator's assistance, you should be able to mute all lines or have the ability to drop any offending member.

By training each Parliament Member we can ensure that the Virtual Parliament Meeting will go smoothly with limited or no interruptions. Some additional skill trainings are also essentials for stake-holders like Soft Skills, Communication Skill, and Problem Solving Skill etc. These are briefed here –

**3.2 Soft skills** [10]: It is most often cited as needed for success as a Sustainable ICT professional can be summarized in the following main categories:

- Communication
- Problem-solving
- Persuading, handling conflicts and influencing change
- Collaboration and teamwork.

Often, people assume that the softer skills are inherited rather than developed. But a proper training can help Sustainable ICT professionals to grow in confidence, expand their comfort

zones, gain increased motivation and improve their presenting skills.

**3.3 Communication skills** [10]: are also needed in all areas of Sustainable ICT. In many cases, the adoption of sustainable practices across the organization cannot happen without the help of facilitators that can relate to all organizational functions and levels and carry on a share.

**3.4 Problem Solving Skill** [10]: The growth of the Sustainable ICT economy is in part driven by need to find commonly accepted solutions to a new set of complex problems. Today's apparent solutions could be tomorrow's problem if they do not take into consideration long - term and system -wide impacts. Problem - solving also requires flexibility and the ability to pull information together that hasn't been pulled together before. Sustainable ICT activities requiring high degrees of problem solving skill, remediation work, and R&D activities.

**3.5 How to teach Persuading, Conflicts Handling and Influencing Change Skills** [10]: This ability shows the type of leadership skills that are needed to affect change within an organization or among a group of stakeholders. Leadership, in and of itself, is not one skill but the blending and integration of a variety of skills needed to identify and achieve Sustainable ICT goals. These capabilities include the ability to assess risk and take initiative, the willingness to make decisions in the face of uncertainty, a sense of urgency and the will to deliver on time in the face of constraints or obstacles, resourcefulness and flexibility, trust and loyalty in a team setting, and the ability to relate to others. Another important message is not to expect overnight results. Opinions may take a long time to change. Influencing people to change their actions can take even long

**3.6 Teach Collaboration and Teamwork Skills** [10]: The ability to work well in group settings and demonstrating cooperation and compromise. The days of single - inventor innovations have been replaced with team research across nearly all fields. Whether you call it cooperation, collaboration, or teamwork, a Sustainable ICT professional's ability to work with other people from different backgrounds is essential. A teaching approach called "Think, Pair, Share", developed by Frank Lyman[10] at the University of Maryland, is an effective way to enable students to practice individual teamwork skills and get immediate peer feedback.

## 4. Framework

### 4.1 Internationally - Use of cloud-based services in Parliament

Joan Miller introduced her paper [11]. She noted that the principles for use of cloud services in that paper were still under consideration and would be refined in due course. The Board was asked to agree to the assessment of data security, the procurement approach and the explanation of technical readiness set out in the paper and, on the basis of principles that cloud - based services would be used to meet new ICT demand where appropriate from April 2013. UK Parliament case study & Australian Parliament ICT Strategic Plan [19] are inspirational initiatives for "Futuristic Indian Parliament System" planning.

### 4.2 Nationally - Available Cloud MeghRaj

In order to utilise and harness the benefits of Cloud Computing, Government of India has embarked upon an ambitious initiative - "GI Cloud" which has been named as 'MeghRaj' [12]. The focus of this initiative is to accelerate delivery of e-services in the country while optimizing ICT spending of the Government. This will ensure optimum utilization of the infrastructure and speed up the development and deployment of eGov applications.

The architectural vision of GI Cloud encompasses a set of discrete cloud computing environments spread across multiple locations, built on existing or new (augmented) infrastructure, following a set of common protocols, guidelines and standards issued by the Government of India. Two Policy reports viz., "GI



Cloud Strategic Direction Paper" and "GI Cloud Adoption and Implementation Roadmap" have been prepared by DeitY. The focus of this initiative is to evolve a Strategy and implement various components including governance mechanism to ensure proliferation of Cloud in government. Formulation of the Cloud Policy is one of the primary steps that will facilitate large scale adoption of cloud by government. In order to drive this initiative a Task Force was constituted by Department of Electronics and Information Technology (DeiTY) under the Chairmanship of Additional Secretary (eGov) with a focus to bring out the strategic direction and implementation roadmap of GI Cloud leveraging the existing or new infrastructure. A separate Working Group at DeitY is also working on enabling cloud services in India covering aspects like jurisdiction, cross-border data flow, data security, data location etc

#### 4.3 Why Cloud based Technology:

Cloud computing is a model [20] for enabling ubiquitous, convenient, on-demand network access to a shared pool of configurable computing resources (e.g. networks, servers, storage, applications and services) that can be rapidly provisioned and released with minimal management effort or service provider interaction, according to a widely accepted definition of the US National Institute for Standards and Technology (NIST).

The most substantial economic impact of cloud technology could come in the cost savings and increased competitiveness of IT services available to public and private organizations, as well as opportunities leading to new services. Because of demand aggregation, bulk purchasing of power & hardware, and reduced per-unit labour costs are beneficial for cloud providers so they can make substantial savings on their running costs, and pass these on to their customers. Businesses can use cloud technologies for IT provision, thereby using equipment better, being more flexible, being faster, and having less capital expenditure. For consumers, cloud technologies are making information and online content more accessible and more interactive.

The main types of cloud are public clouds, private clouds, and hybrid clouds; the main types of services offered by such clouds are Software as a Service (SaaS), Platform as a Service (PaaS) and Infrastructure as a Service (IaaS). Such cloud services can be provided from data centers located anywhere in the world, which has significant policy implications.

The cloud has emerged as global computing infrastructure built by major companies such as Google, Amazon, and Microsoft etc. Having built massive data centers in multiple countries with very high-speed connections into the global Internet. Each of these companies having computing servers run operating system software that can present multiple 'virtualized' environments to customers, who can run their own software applications without them interfering with other concurrently-running programs on the same server. These centers can also store customer data on request. Customers can request the computing and storage resources they need at any given moment on a pay-per-use basis.

The cloud servers can be located geographically anywhere in the world. Global cloud providers wish to be able to seamlessly move and replicate data between their servers, in order to take advantage of lightly-loaded servers in different time zones, the availability of cheap power (especially renewable resources, thus named as Green Technology), and to improve performance and resilience, which results in Cost-benefit. By increasing the innovation within e-governance services, government could reduce citizens' and businesses' administrative burdens.

#### 4.4 Cloud Based Virtual Parliament Model for Developing Countries

As per the Case Study report [19] about Australian Parliament, the vision behind the ICT Strategic Plan is to connect parliamentarians, the public and the Parliamentary Service to the

information and services they need from anywhere, at any time, through a range of devices, and provide new opportunities for greater efficiency and effectiveness for the Parliament. There are three most important improvements [22] in the work of Virtual parliaments, these are:

- More information and documentation on the website
- Increased capacity to disseminate information and documents
- More timely delivery of information and documents to Parliament members

Parliamentarians are mobile and are expected to be accessible at all times, whether at Parliament House, in the electorate offices or 'on the road' and therefore need flexibility in how they access information and communicate. Parliamentary ICT systems and policies need to better reflect this requirement and provide improved levels of support to parliamentarians to carry out their duties anywhere, at any time and on a range of devices. New mobile devices from Smartphone to tablet are becoming increasingly available, affordable and popular, and parliamentarians require a choice of mobile devices that are secure, seamlessly synchronized and link readily to a range of parliamentary services. Collaborative service based technology enables teams and communities of interest to work together. This is further strengthened by integrating interactive social media tools.

A technically feasible Virtual Parliament Model is shown in Fig 1.1[19]. It depicts the phase wise development of ICTfication along with integrated Parliamentary services with the theme slogan "Anytime Anywhere through Any-device". This layered architecture is very much flexible & adoptive and giving in-depth participation of stake-holders in parliamentary works.

Some measures to be taken during implementation, these are –

- a. The technology should be continuously upgraded as per feedbacks & available day-by-day innovations.
- b. The funding should not interrupt in any circumstances.
- c. The Technology Architecture should be Enterprise level Architecture.
- d. ICT Resource & Risk Management should be well planned forever.

## 5. Pros & Cons Analysis

### 5.1 Pros

- a. Transparency, accessibility and accountability as well as people's participation [21] in the democratic process largely depend on the quality of information available to members of Parliaments, parliamentary administrations, the media, the society at large and citizens' access to parliamentary proceedings and documents. Both can be improved through ICT applications which in turn could effectively strengthen the policy-making process.
- b. The efficiency of the internal business practices of services to members and staff and the performance as a whole may affect Parliament's effectiveness in carrying out the legislative process, its scrutiny, functions and members' duties. Both the efficiency and effectiveness can be increased by adoption of new and sound technology coupled, if necessary, with organizational re-engineering.
- c. Full participation in the emerging global information network is crucial for an institution that wants to avoid marginalization. Parliaments today are confronted with a new reality of information integration and knowledge exchange as well as an increasing demand for inter-parliamentary cooperation. That requires changing the way Parliaments act internally and the way they interact with the outside world, including through the use of ICT.

- d. Effective use of ICT can result only from a clear vision of how they are to be used to support the work of Parliament and from, a strategic plan that sets realistic goals and applies strong management to ensure that objectives are achieved. Without political involvement in these efforts, not only would Parliaments waste resources and set up systems that fail to serve their many functions and higher goals, but they would also fail to keep pace with the evolution of society around them, thus broadening the gap between citizens and their representatives.
- e. Cloud based ICTification facilities and support to enable individual parliamentarians to carry out their duties. Thus People can easily take decision on their selected member capability, hence in-appropriate member cannot be re-elected in successive elections.

### 5.2 Cons

- a. It is tedious task for old politicians who are not so computer savvy but experts claimed that with the help of assistant they can cope up.
- b. Sometimes opposition cannot believe on government machinery because of possibility of misuses by ruling side.
- c. Cyber crimes are main challenges or hurdle for Secure Digital Services.

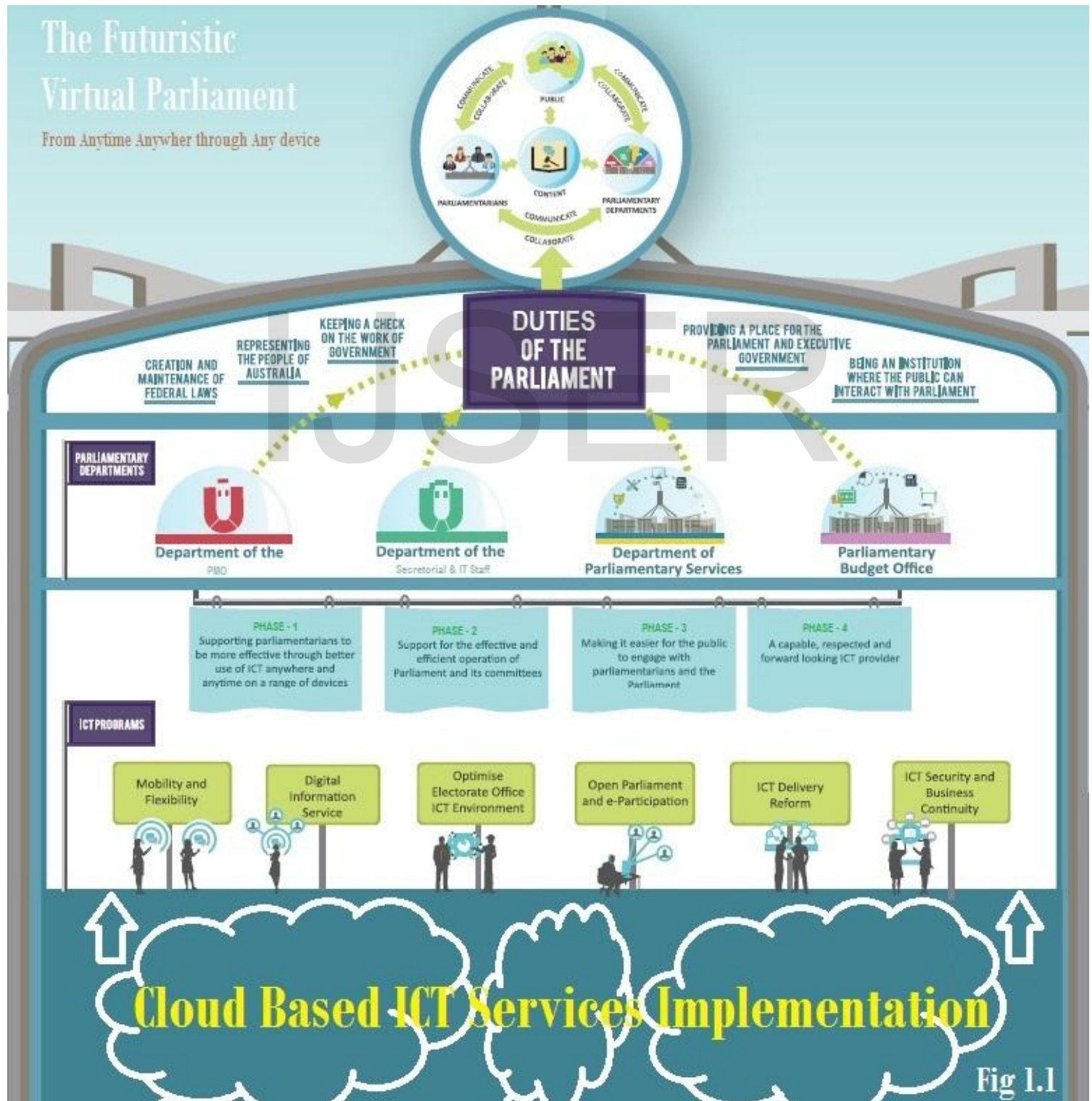


Fig 1.1

## 6. Conclusion

As per Digital India concept define by Indian Government, their documentation illustrate the 9 pillars of Digital India, these are - Broadband Highways, Mobile Connectivity, Public Internet Access, e-Governance, e-Kranti, Information for all, Electronics Manufacturing, IT for Jobs and Early Harvest Programme.

Hon President recently said in his speech [16] during Aug 2015 that "Information and Communication Technology (ICT) is another area where teachers have to keep pace with rapidly changing technologies. It is essential for teachers to be comfortable in using ICT themselves first" & then Politicians. He further added in other speech during the addressing of the Joint session of Parliament that "The Government will setup Massive Open Online Courses (MOOCs) & Virtual Classrooms".

The government is also planning for Virtual Parliament System because It can save on huge expenditure that is currently incurred for the travels accommodation in Delhi and other expenditures on members. And more importantly people of the country can be saved from the pains seeing that democracy being misused by the very same persons whom they chose to uphold and safe guard it. In the post Digital India, it is time to improve Digital Literacy [23] which is a complex and contested term. It refers to the more subtle and situated practices associated with being able to create, understand and communicate meaning and knowledge in a world in which these processes are increasingly mediated via digital technologies.

The success of Virtual Parliament System is solely depends on Digital Literacy Rate, the government should include it in National agenda with prime importance then only the dream of "Virtual Parliament System" will get success in Digitally Ready India.

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