

Feb 24, 2019 Version: 1.00 A Web-based, AI-enabled

# **ERP System**

(for end-to-end automation of election processes)

White Paper on

Use of Technology & Innovation in Future Election Processes

For

State Election Commission, Maharashtra





#### White Paper on

## Use of Technology and Innovation in Future Election Processes

for

# State Election Commission, Maharashtra (SECM)

Submitted by

## Infinite IT Solutions Pvt. Ltd (IITS)

**Vision:** To bring simplicity, consistency, accuracy and transparency across all stakeholders of election processes and events by implementing a Web-based AI-enabled ERP system.

**Mission:** To develop and implement a Web-based AI-enabled ERP system on Software-as-a-Service (SaaS) model in an efficient and a cost effective manner for Election Authorities and Commissions.

#### Contents:

1	Abo	ut the State Election Commission, Maharashtra (SECM)	1
	1.1	Responsibilities of Election Commission	
	1.2	Major Processes of Election Program	
2		atives taken in implementing technology & innovations in the election processes by SECN	
3		lenges Faced by SECM in implementing technology & innovations in the election process	
4	re Roadmap as Envisaged by IITS:	4	
	4.1	Election Data Lake	4
	4.2	ERP Applications / Modules	4
5	Sum	mary	10
Αı	nnexur	e "A" - Executive Summary of e-elect.in	11
Αı	nnexure	e "B" – List of Reports Provided in e-Elect.in Software Application	13
Δ,	neviir	a "C" - Company Profile	15



#### 1 About the State Election Commission, Maharashtra (SECM)

SECM conducts regular, free and fair elections of rural and urban local bodies in the state of Maharashtra.

Maharashtra has 388 urban local self governments (Municipal Corporations, Nagar Parishads and Nagar Panchayats) and 28,166 rural local self governments (Zilla Parishads, Panchayat Samitis and Gram Panchayats) with more than 250 thousand elected representatives.

#### 1.1 Responsibilities of Election Commission for Holding Election

- Manage and maintain database of all local bodies
- Maintain date of last election held of all local bodies
- Define and declare schedule of up-coming Election Programmes and conduct the elections
- Create voter registration awareness and campaign for high turnout
- Undertake Ward Formation and ward-wise bifurcation of assembly voter's list
- Collect data pertaining to nomination forms and affidavits; and make it available to:
  - the citizens for information about the candidates
  - the police department for checking criminal record of candidates
  - the knowledge partners and NGOs for research and analysis purpose
- Register/de-register political parties, and maintain symbol list.

#### 1.2 Major Processes Involved in the Election Program are:

- Phase 1: Delimitation of wards.
- Phase 2: Bifurcation of voter list.
- Phase 3: Conducting Elections with following events:
  - Nomination form acceptance
  - Scrutiny
  - Withdrawal
  - Symbol Allocation and Publishing List of Contesting Candidates
  - Polling
  - Counting



## 2 Initiatives Taken in Implementing Technology and Innovations in the Election Processes by SECM:

- Developed and implemented Online Nomination System from MahaOnline Ltd. (MOL) which is a joint venture between Government of Maharashtra and Tata Consultancy Services
- Implementation of Online Nomination System from Infinite IT Solutions Pvt. Ltd. on Software-as-a-Service model only once during high volume of elections, and pilot run for counting events of Gram Panchayats
- Software for Voter List and Electoral Roll
- Analysis of affidavits of contesting candidates through knowledge partner Association of Democratic Reforms (ADR)
- Publish Candidate affidavits and its vital information such as education, criminal record, and assets to public
- A mobile app called True Voter developed by SEC
- Attempted development of Counting Dashboard with the help of Bombay Stock Exchange
- Maintaining candidates' expenses using a mobile app.
- Implemented Citizen on Patrol application for mode of conduct
- SECM is also in the process of:
  - Developing EVM Tracking System
  - Developing software for ward formation is in process



## 3 Challenges Faced by SECM in Implementing Technology and Innovations in the Election Process

Before SECM embarks on use of technology and innovations in the future, it is necessary to build a valuable database of election record so that the future modern systems such as AI and decision support systems can be built on the same.

SECM developed Online Nomination System (ONS) from MOL in year 2015 and made first attempt to implement the same during the General Election program (2015) of Navi Mumbai Municipal Corporation.

Later on, SECM implemented MOL's election software at Vasai-Virar City Municipal Corporation, Kalyan-Dombivli Municipal Corporation, and so on till last General Election (2018) of Ahmednagar and Dhule Municipal Corporation. SECM also implemented the software for other local body-types such as Municipal Councils, Nagar Panchayats, Zilla Paishads and Gram Panchayats.

During the above mentioned period, SECM faced following issues:

- SECM could not implement automation at NMMC because of the delay in developing and implementing the software from MOL.
- The software is incomplete in many respects: All statutory reports like Namuna 2, Namuna 3, V. M. IV, various Counting Event reports including Round-wise Counting report, Counting dashboards, etc. are not yet incorporated.
- Functionality of the software is unsatisfactory: Candidate's registration process is not foolproof (email ids and mobile Nos. are not getting verified), no provision is provided to edit nomination form and affidavit data.
- Performance and failure of the system: During nomination form acceptance, the
  performance of the system degrades to a high level leading to inconvenience to
  candidates, returning officers and officers at all levels. During the recent elections,
  ROs had to accept offline nomination forms due system breakdown.
- Lack of User-friendly feature: Candidates find it difficult to enter their data, and therefore cyber cafes are taking advantages by demanding money from candidates just for filling online nominations and affidavit.
- Poor Help Desk Support and Documentation: It was observed that MOL did not
  provide effective helpdesk support to the satisfaction of the system users. Also,
  proper documentation / manual including Standard Operating Procedure (SOP) were
  not made available to the system users.

The experience of the implementation of the MOL election software was not satisfactory to all the stakeholders including Returning Officers due to the above reasons.



#### 4 Future Roadmap as Envisaged by IITS:

IITS proposes to develop A Web-based, Al-enabled ERP System for end-to-end automation of election processes using technology and future innovations as desired by SECM.

Objective of the proposed Web-based, Al-enabled ERP System is to expand reach, increase utilization and benefits of automation to all stakeholders of entire election process and also to resolve challenges being faced by SECM.

SECM has a very large domain of conducting elections for nearly 3 lakhs seats from about 28561 local bodies. It requires about 20,000 Returning Officers to conduct the elections. Training, co-ordination, communication, reporting among the stakeholders is challenging.

The ERP shall bring seamless collaboration across the various stakeholders viz: State Election Commission-Maharashtra (SECM), Local Bodies, Retuning Officers (ROs), Candidates, Media and Citizens.

The proposed ERP system will be developed on "Web Portal" concept, it will have a number of integrated software applications with:

- Single and easy to use interface for all end-users / stakeholders
- Role Based Content Delivery, Customized Content, features and functionalities based on user's role, accessibility rights and activities
- User Personalization

The User Interface (UI) of the ERP will be designed and developed using Responsive Web Design (RWD) architecture. RWD will make the proposed ERP Mobile Friendly i.e. it will look good on any device such as desktops, tablets, and phones. RWD will automatically resize and / or rearrange a website content / component (images, menu bar, buttons, web-links, etc.) to make it look good on all devices.

The two main components of ERP system shall be Election Data Lake (set of Databases) and Integrated Software Applications/Modules.

#### 4.1 Election Data Lake

IITS proposes to build a well-structured valuable centralized database of end-to-end election processes. When data is well organized, it can be used for generating a large number of reports/analytics. This comprehensive database will store all information regarding past elections, current elections and upcoming elections. The database will have open-ended architecture without compromising data security and integrity.

#### 4.2 ERP Applications / Modules

The ERP system will be robust, scalable and secured and will have following integrated applications / modules (or sub-systems) catering to all stakeholders of election programme.



#### 4.2.1 Local Body Data Repository

Local Body data management module will maintain repository of master information of various local body types viz.:

Category	Local Body Type	Numbers
Urban	Municipal Corporation	27
	Municipal Council	241
	Nagar Panchayat	127
Rural	Zilla Parishad	34
	Panchayat Samiti	351
	Village Panchayat	27781
Total:		28561

#### 4.2.2 Repository of Election Schedules

Maintain data of all past General elections and By-elections. Last date of election will be maintained for all General elections. A facility will be provided to local bodies to manage by-election schedule by entering details of vacant seats including reason for vacancy like due to death, resignation, disqualification etc. This will bring simplicity in data management of vacant seats and easier scheduling of by-election programmes.

#### 4.2.3 Election Schedule Management System (ESMS)

IITS has conceptualized and designed a sophisticated Graphical User Interface (GUI) to show timeline of voluminous expiry dates (or tenure) of elections, and also a GUI for defining (creating) new election schedule.

The ESMS will have <u>intelligent decision support system</u> which will provide most preferred polling dates on which maximum elections can be scheduled. This is particularly necessary for scheduling high volume Gram Panchayat elections.

(The GUI of ESMS was demonstrated to executives / staff of SECM during July 2017.)

#### 4.2.4 Ward Delimitation Support System (WDSS)

Challenges abound during the process of ward formation due to ever increasing population and the concept of seat reservation. However, using modern tech like AI/GIS based assistance and past and current data intelligently, delineation of boundaries and seat reservation will become easy, and the entire ward formation can be made a smooth process. With the help of the services of Google Map, ward formation can be made compact so that it becomes convenient to voters to approach their booths easily. In addition, past election data will be provided by the System to easily allocate seat reservation, rotation of seats, among other things.



#### 4.2.5 Intelligent Voter List Bifurcation System (IVLBS)

- All enabled data de-duplication algorithm with data dictionaries (created with Machine Learning techniques) for stop words, split and join words for unique and accurate addresses and individual names of the voters.
- Intuitive interface application to split assembly voter list into ward-wise and subsequently booth-wise preparation of voter's list.
- GIS and AI enabled preparation of control chart (paperless) for field officers with online and off-line options (centralised and decentralised data), using mobile devices and desktop computers. Facility will be provided for marking and removing of nonexisting & duplicate person's name, etc.
- All enabled option for voters and all other stakeholders of election to search voter names in the list giving full details of voters from assembly list, ward list and booth list to bring transparency in voter list preparation.
- Assured reduction in complaints received by SECM and / or local bodies regarding voter's list.

#### 4.2.6 Online Nomination System (ONS)

ONS (already developed and implemented by IITS) is a Web-based software to capture & print data of Affidavit and Nomination Forms from Candidates. Candidates can enter data from anywhere, anytime using Internet and print the same in the prescribed format as stipulated by SECM.

ONS has streamlined and foolproof Candidate Registration Process which validates candidate's mobile number and email-id before providing access to the system.

ONS has rich user interface to accept substantially large data in various small steps. It allows candidates to store information in three modes viz: 1. "Draft" Mode (Candidate can initially enter partial data consisting of their basic information), 2. "Verified" Mode (Candidate is required to enter all mandatory information) and 3. "Final" Mode (Locking of information which is verified by candidate so that the same cannot be modified further and can be submitted to RO). Candidate can view and / or print Affidavit and Nomination Forms in actual printable formats (PDF files) in all the mentioned three modes.

ONS has unique features and benefits for Candidates such as Electronic Briefcase to store documents like Affidavit and Nomination Forms in PDF formats.

ONS also allows candidates to download their affidavits and nominations forms in PDF formats.

Citizens can view actual Affidavits which are submitted to Returning Officers.

It generates and preserves electronic document database of candidate's affidavits and nomination forms as a record.



With the implementation of ONS, Returning Officers gets benefited since there is a reduction in Nomination Form data entry for RO Offices during RO inward process.

#### 4.2.7 Election Programme Automation System (EPAS)

EPAS is a Web-based software already developed and implemented by IITS. At present it automates 7 phases of election programme viz. Nomination Form Acceptance, Scrutiny, Withdrawal, Symbol Allocation and Publishing List of Candidates, Pre-polling, Polling and Counting. Executive summary of the developed system is enclosed as **Annexure "A"** for more information:

It generates all statutory reports required by SECM and it also provides MIS information to manage the election programme more effectively without any additional efforts to communicate between RO offices, local body, SECM, etc. List of reports which can be generated from this module are provided in **Annexure "B"** 

The scope of the proven system will be further enhanced and overall it will have the following modules:

#### a) Local body Module:

As per the role of the local body, the module will:

- Manage and maintain master information of wards, seats, Returning Officers (ROs), and wards allocated to ROs etc.
- Manage election staff, material and polling booth, etc.
- Facilitate the issuance of permissions for rallies and campaign to political parties/candidates, etc.
- Provide all consolidated statutory reports as stipulated by SECM and generate MIS reports on progress of election.
- Counting, Polling and various other specialised / customizable (with various selection & sequence criteria) Dashboards for Collectors / Commissioners, Election Department, Media, Candidates etc.
- Dynamic onscreen queries to view / print information
- Portal Interface for providing / publishing information

#### b) RO module (Returning Officer's Module):

- ROs can inward online nominations forms with ease (without duplicate data entry)
- Facility to enter offline nomination forms
- Provide all Ro-wise statutory reports as stipulated by SECM and generate MIS reports on progress of election.
- Dynamic onscreen gueries and Dashboards to view / print information



• Special Mobile application (iOS/Android) to gather data from polling booths regarding number of votes polled with statistics of male, female, others. Zonal Officer will act as authorizing officer to provide the data to their RO.

#### c) Media and Citizens Module:

- All statistical information of current and past elections such as number of nomination forms received, number of candidates (party-wise, etc.), number of valid and invalid nomination forms received, withdrawal information, candidates' affidavit and related other statistical information will be provided with dynamic selection and sequence option for reports and queries.
- High performance on-line real-time polling and counting dashboards will be provided

#### d) Election Expenses Management Module:

Access to contesting candidates and political parties will be provided with simple interface and appropriate security to enter details of expenses. Candidates can enter details of expenses from any device such as mobile (Android, iOS), Tablet, Desktop Computer etc. The module will facilitate analysis of expenses incurred by candidates and political parties. It will generate all reports required by SECM and Local Body in the prescribed formats.

#### e) Political Party Module:

- Party Registration and profile data management
- Capture financial audits details etc.
- Deregistration / disqualification of political parties for non-compliance of conditions

#### f) Complaint tracking and management system:

- Track and manage complaints received during model code of conduct
- Complaints pertaining to paid news, election expenditure, etc.
- Track and manage other complaints

#### 4.2.8 SEC Office Desk Automation:

Various below applications / modules can be implemented for automation of SECM Office itself:

- Financial Accounting System with budget management and travelling expense management modules
- Inventory management system for management of election material
- Court case tracking system
- Document inward-outward system
- Document Management System.



#### 4.2.9 EVM Tracking System

EVM Tracking system: Master data of EVMs / its components like Ballot Unit, Control Unit, Memory chips will be maintained. Opening balances of EVMs will be recorded, transactions pertaining issue and receipt of EVMs (its components) to and from local bodies / collector offices will be recorded.

EVM Tracking reports will be generated (e.g. Details of usage of EVM Machine in various elections, maintenance history of EVMs, EVM status history, fault tracking analysis).

#### 4.2.10 Websites

The existing Website of SECM can be re-developed using Portal Concept. Along with static pages it will also have dynamic webpages with the international standard layout practices. The website will be easy to access and navigate by the users from any device/s.

#### 4.2.11 Database Views / Snapshots

An appropriate database view/s and / or snapshots in desired format by knowledge partners like ADR and Vendors like TrueVoter etc., will be provided without any hassles. Web-service for data import, export facility can also be provided.

#### 4.2.12 e-Voting

Software systems are safe, convenient and flexible if designed and developed appropriately. Efforts needs to be taken on conceptualization of e-Voting or Internet voting. E-Voting will allow voters to cast their ballots from any internet-connected computer anywhere in the world. The e-Voting solution should be simple, elegant and secure which any layman can use and trust.

Usage of Aadhar Card number and / or other identity cards can be introduced making voter list more accurate and identifying voter as a true voter during the voting process.

Votes should be verifiable, Voters should be able to check that their votes are counted correctly. Concepts such as using computers on counting day for counting votes are required to be incorporated.

The demand for online voting is increasing, citizens are looking for alternative to EVMs.

IITS can conceptualize an e-Voting System making voting and counting processes completely transparent and verifiable while keeping the votes absolutely secret.

#### 4.2.13 AI / Voice based information analytics and retrieval

Various number of AI / Voice based applications (including Chatbots) can be developed once the quality database of elections is developed.



#### 5 Summary

Preparation of electoral roll and conducting voluminous elections of all local bodies in a free, fair & transparent manner is a challenging job for SECM.

Large volume of election data gets generated at various locations of stakeholders while implementing the election processes. SECM is responsible for collecting, managing and maintaining the voluminous data of elections.

Election processes such as delimitation of wards, bifurcation of voter list, and actual conducting elections with various events are complex and time consuming. The processes require tremendous amount of man-power and involvement of various stakeholders.

SECM has taken Initiatives in implementing technology and innovations (IT Systems) in the election processes to bring simplicity and efficiency in the election process. However, the IT Systems needs to be further enhanced in terms of functionality and technology which will improve image of SECM for all stakeholders. Data is most valuable asset for SECM and more proactive approach is required to build data and integrated applications to manage the same.

True innovation cannot be achieved until SECM has a strong grasp on all of its incoming data and makes every decision with data as its backbone. Further, the key to AI is a strong data foundation. If that data is not collected, organized, managed and analysed properly, it's not just useless — it can become a liability.

To "Use of Technology and Innovation in Future Election" as desired by SECM IITS recommends to develop and implement a Web-based AI-enabled ERP system in an efficient and a cost effective manner.

Finally, the SECM must have a very good suitable database architecture with quality data. A Data Lake architecture will help SECM to quickly offload structured, semi-structured and unstructured data to a lake for exploratory analytics and to derive meaningful insights from the election data.

All stakeholders can trust and use the Election Data Lake to achieve their goals wisely.

This White Paper is prepared based on the experience of Infinite IT Solution Pvt. Ltd. in the area of implementing Automation of Election Programme for various types Local Bodies in the state of Maharashtra.

#### © 2019 Infinite IT Solutions Pvt. Ltd.

5, Andheri Universal Estate, Opp. Andheri Sports Complex, Jay Prakash Road, Andheri (West), Mumbai 400 058.



#### **Executive Summary of e-elect.in**

**e-elect.in** is a Web-based software for **end-to-end automation of election programme**. It automates 7 phases of elections viz. Nomination Form Acceptance, Scrutiny, Withdrawal, Symbol Allocation and Publishing List of Candidates, Pre-polling, Polling and Counting.

During the election programme, Infinite IT Solution Pvt. Ltd. (IITS) implements e-elect.in on Software as a Service (SaaS) model eliminating need of IT set-up consisting of server computers, operating systems, database/s, etc. from client side which involves large financial investment, and most importantly human resources to manage the same. Technical Assistance is provided by IITS to ensure automation of the election programme is successfully implemented.

Since July 2012, e-elect.in is successfully implemented for **eighteen (18) general elections of fifteen (15) Municipal Corporations** in the state of Maharashtra. Services of IITS are well appreciated by Returning Officers, their operators, Commissioners, Corporation executives / staff. Credential from the Municipal Corporations and Feedbacks from the Returning Officers and their operators providing satisfaction level is available with IITS.

On behalf of **State Election Commission, Maharashtra** (SEC-MH), IITS has also implemented e-elect.in including Online Nomination Process module for 29 municipal councils and 3 Nagar Panchayats of 5 districts during Nov-Dec 2016. Live counting dashboards were also provided to Commissioners and executives of the districts and also for SEC-MH at their Head Office.

During Jul-Aug 2015, SEC-MH asked IITS to carry out pilot project for automation of Gram Panchayat elections. Accordingly, IITS customized and successfully implemented the elect.in software for 47 Gram Panchayats of Baramati Taluka.

White paper on e-elect.in providing an overview on automation of Election Programme and sharing the experience of its implementation on SaaS model at Nanded Waghala City Municipal Corporation is available.

The features and benefits of the e-elect.in are:

- 1. e-elect.in brings simplicity, consistency, efficiency and transparency in election process.
- It brings compliance i.e. it generates all statutory reports required by State Election Commission (SEC) and also provides MIS information to manage the election programme more effectively.
- 3. It provides instant and accurate consolidated reports / information without any additional efforts to communicate between RO offices, local body, SEC, media, etc.
- 4. Powerful Dashboards are available to view online real-time information of counting event with upcoming and leading parties, booth-by-booth candidate ranks, and ward-by-ward results. Dashboards are also available for other events including every two hour polling statistics.



- 5. Operating e-elect.in software is simple and as such minimal training is required to the operators, Returning Officers, Commissioners and their executives / staff.
- 6. Reports are generated in MS Excel format giving comfort level to the users, information is accessible 24/7 from anywhere.
- 7. It reduces paper work, eliminates duplication in data entry & verification of data at various levels (in case of change in data inputs, complete reworking is not required).
- 8. The technology platform of e-elect.in is robust, scalable, secure and virus-proof. It uses Unicode feature to accept data supporting different regional languages including Marathi, Gujarati and Hindi. (Installation of Fonts / Devnagri software etc. is NOT required on user computers/tablets/mobiles.)
- 9. Security is implemented at various levels (such as Network, Application and Database Servers) to secure access to e-elect.in application and its database.



#### Annexure "B"

### List of Reports Provided in e-Elect.in Software Application

Sr. No.	Report Code	Report Name			
नामनिर्देशनपत्रे स्वीकारण्याचा कालावधी					
1	Onscreen	नामनिर्देशनपत्रांची यादी			
2	नमुना २	नामनिर्देशनपत्राची सूचना (Date-wise and Progressive)			
3	प्रपत्र १	नामनिर्देशनपत्र / उमेदवाराची प्रगतशील माहिती (Nomination Form-wise)			
4	प्रपत्र २	उमेदवाराची प्रगतशील माहिती (candidate-wise)			
5	MIS	नामनिर्देशनपत्र / उमेदवाराची प्रगतशील माहिती (Summary)			
6	MIS	प्राप्त झालेल्या नामनिर्देशनपत्रांची संख्या (जागा निहाय)			
नामनिर्देशनपत्रांची छाननी					
7	नमुना ३	वैधरित्या नामनिर्देशित उमेदवारांची यादी			
8	बाब १९	उमेदवारी अर्ज छाननी मध्ये अवैध ठरलेल्या उमेदवारांची यादी			
9	प्रपत्र ३	नामनिर्देशनपत्र छाननीनंतर वैध ठरलेल्या उमेदवारांची संख्या			
10	प्रपत्र ४	नामनिर्देशनपत्र नामंजूर केलेल्या उमेदवारांची संख्या			
11	MIS	नामनिर्देशनपत्रांची व उमेदवारांची संख्या - जागा निहाय प्रगतशील			
		स्थिती			
12	MIS	Duplicate सूचकाचे नांव / अनुमोदकाचे नाव			
		उमेदवारी मागे घेण्याचा कालावधी			
13	नमुना ५	उमेदवारी मागे घेण्यासंबंधीची सूचना			
14	प्रपत्र ५	नामनिर्देशनपत्रे मागे घेतलेल्या उमेदवारांची संख्या			
15	MIS	माघार घेतल्यानंतर वैधरित्या नाम. उमेदवारांची यादी			
16	MIS	जागानिहाय पक्षनिहाय उमेदवारांची संख्या			
		निवडणुक लढ़विणारे उमेदवार व चिन्ह			
17	Onscreen	निवडणुक लढ़विणाऱ्या उमेदवारांची यादी			
18	बाब - २०	उमेदवारास मंजूर केलेल्या चिन्हाबाबतचा तक्ता			
19	नमुना - ६ (बाब	निवडणुक लढ़विणाऱ्या उमेदवारांची यादी			
	- २५)				
20	प्रपत्र - ७	निवडणुक लढ़विणाऱ्या उमेदवारांची संख्या			
21	MIS	मतपत्रिकेवर येणारे नाव व क्रमांक (यादी)			



## List of Reports Provided in e-Elect.in Software Application

Sr. No.	Report Code	Report Name				
	मतदान					
22	विवरणपत्र १	मतदानाची टक्केवारी (every 2 hrs, Ward-wise)				
23	विवरणपत्र १A	मतदानाची टक्केवारी (every 2 hrs, Booth-wise)				
24	विवरणपत्र २	झालेले मतदान व त्यातील वैध / अवैध मतांची माहिती				
	•	मतमोजणी व विजयी उमेदवारांची माहिती				
25	व्ही. एम. ४ /	मतमोजणी - (व्ही. एम. ४ / बाब ८७ / Input Data Sheet)				
	ৰাৰ ८७					
26	Onscreen	जागा व मतदान केंद्रासाठी मिळालेती मते				
27	MIS	फेरीनिहाय (Round-wise) मतमोजणी				
28	MIS	विजयी उमेदवाराचे प्रमाणपत्र				
29	प्रपत्र ८क	निर्वाचित उमेदवारांचा तपशील				
30	विवरणपत्र ४	विजयी उमेदवारांची माहिती				
31	विवरणपत्र ६	मतमोजणीचा अहवाल				
32	विवरणपत्र ७	पक्षांना पडलेली मते				
33	बाब ८९	मतमोजणी - जागा व मतदान केंद्रासाठी मिळालेली मते (Output Sheet)				
34	जोडपत्र ३	मतमोजणीची अंतिम स्थिती दर्शविणारे प्रपत्र				
35	जोडपत्र ४	निवडणूक निकाल				
36	MIS	सर्व उमेदवारांना मिळालेली मते				
37	MIS	अनामत रक्कम जप्प्त झालेल्या उमेदवारांची यादी				
38	MIS	विजयी उमेदवारांची राजपत्रात प्रसिध करावयाची यादी				
	•	मतमोजणी फलक (काउन्टींग डॅशबोर्ड)				
39	Onscreen	मतमोजणीची प्रगतशील माहिती (Live)				
40	Onscreen	अलीकडील आघाडीचे व विजयी उमेदवार (Live)				
41	Onscreen	जागानिहाय मतमोजणीची प्रगतशील माहिती (Live)				



#### **COMPANY PROFILE**

Infinite IT Solutions Pvt. Ltd. ("IITS") has over 28 years of standing in the field of Information Technology. IITS has provided Consultancy Services and successfully developed and implemented a number of IT projects for reputed banks and financial Institutions from public and private sector organizations. IITS has also embarked upon providing Software-as-a-Service (SaaS) in specialized domain such as Election.

Its clientele includes The Vaidyanath Urban Co-op. Bank Ltd., The Maharashtra State Cooperative Bank Ltd. and Corporations such as Maharashtra State Financial Corporation, SICOM, Western Maharashtra Development Corporation, Haffkin Bio-Pharmaceutical Corporation Ltd., MITCON, and MNCs like Dun & Bradstreet Information India Pvt. Ltd., Nishcorp Inc., and others.

IITS has pioneered the process of Digital Transformation of Elections by developing and implementing **Automation of Election Programme (AEP)** software in 2012. Since then, IITS has successfully implemented AEP on SaaS Model for a large number of Municipal Corporations, Municipal Councils, Nagar Panchayats, and Gram Panchayats (Village Councils). The Software (including live polling & counting dashboards) and Services have been greatly appreciated by the Returning Officers, Commissioners and various Officials of the Municipal Corporations and other local bodies.

On behalf of the **State Election Commission, Maharashtra**, IITS developed and successfully implemented **Online Nomination System (ONS)** for local body elections in year 2016.

IITS has proven expertise on the latest and best technologies being currently used in the industry. IITS has developed mission critical applications on both Open Source and proprietary technologies. Web application services being provided on SaaS Model are fast, scalable, robust and secured.

IITS has an effective blend of domain experts and software professionals in understanding complex business processes, and providing the best IT solutions without time / cost overruns.

The nature of other IT Consultancy services provided include assistance in implementation of Core Banking Solution, setting up of datacentre consisting of IT & non-IT Infrastructure, data analytics and insights, technical assistance, data validation, identifying revenue leakages, and training.