Training Program for

Integration of Survey and Land Records – Gujarat Model.

Presentation By:

Mr. Himanshu. D. Mehta.

Vice President, ICT infracon
Integration of Survey and Land Records.

Presentation of Document

Registered Document

Registrant

State Data Centre, Gandhinagar Gujarat

Tehsildar Office
Major Components of NLRMP.

A. Computerization of Land Records.
   - Software development
   - Data entry, Updation, Mutation and work flow.
   - Cadastral Map Digitization
   - Integration of textual and spatial data.
   - Data Centers, connectivity and Modern Record Rooms.

B. Computerization of Registration.
   - Property Register work flow based software application.
   - Document scanning, storage and search system for it's Retrieval.

C. Survey / Resurvey.

D. Integration of Land Record and Property Registration.

E. Development of Core Geospatial Information system (GIS).

F. Capacity Development.

G. Service Delivery....to the users.
A. Computerization of Land Records.- (Rural and Urban, i.e. v.f. no.- 7+12, and Property card.)

B. Integration of Land Records and Property Registration.

C. Integration of Bhu-naksha (map) with Records of Rights.

D. As a service to public on website....etc.
Objectives

- Updation of land records and transparency in land records management.
- To usher in a system of real-time land records.
- Automatic mutation.
- Integration between textual and spatial records.
- Inter-connectivity between land records and registration systems.
- Presumptive title system to conclusive titling system.
- Making dynamic data for revenue administration.
I. Computerization of land records:

- Data Entry/Re-entry/Data Conversion for Records of Right (RoR) and other land attributes data,
- Digitization of Cadastral Maps,
- Integration of spatial and textual data,
- Tehsil, Sub-division & Districts Data Centres,
- State Level Data Centres (SLDC),
- Inter-connectivity among Revenue Offices.
II. Computerization of Registration:

- Computerization of Sub-Registrar’s Offices (SROs),
- Data entry of valuation details,
- Data entry of legacy encumbrance data,
- Scanning and preservation of old documents,
- Connectivity to SROs with Revenue Offices.
Overview of the transformation potential

- Land revenue management has multiple components
- There is a tri-directional input/output relation between
  - IGRS (Registration Services)
  - Land Revenue Department (owns land records)
  - Commissioner of Land Records (conducts physical survey and maintains land parcel wise map with dimensions, boundaries and area)
- Integration of these 3 systems only can complete the seamless services to the citizen
- Legacy data updation is key to success of this project
Encumbrance certificate obtained manually from IGR based on Last registered documents.

- EC Submitted to IGR
- Stamp Duty calculated manually
- Valuation is recorded as the last highest price registered for the particular category in the village (18 categories of land)

Photo by webcam and finger print rolled in ink of buyer and seller taken by SR

Sub Registrar registers document manually

By system, registration number generation

Registration fee collection calculated manually by Sub Registrar

Sub Registrar gives token

Registration receipts copy given to buyers.

Valuation stamp duty

Document writing by advocate/approved writer

Purchase from stamp vendor

Village officer

Tehsildar Office
Missing Link in IGR, CLR and LR

1. Documents registered at IGR are not updated in Land records by Thasildar unless applicant makes separate application to VO and continuously chases him for the updation.
2. There are cases where more than five or six transfers of the same property have not been entered in Record of Rights.
3. In such cases, the last buyer brings all past registered docs of the property duly verified by SR (IGR) and submits the same to Thasildar through VO and Dy. Thasildar.
4. Even if the registries are updated in Land records, this information is not updated in A-Register, that is the basic document given by Survey office about the status of the land holding.
5. Hence the EC issuance is of futile exercise and of no use
6. Land valuation for stamp duty – Manual and high possibility of revenue loss
Proposed Registration Process

1. Sub Registrar enters survey Number
   All data of the Survey number pops up.
   Photo and fingerprint also pops up (if data base exist else collect the photo and fingerprint of the seller)

2. Capture data of the Buyer
   On sellers validation, auto generation of stamp duty and registration fee.

3. Pay stamp duty and registration fee in stamping counter
   Multiple channels of payment

4. E-stamping color printed ink national embossed comes out. Seller writes the document.

5. Sub Registrar take finger and photo for storage in data Base

6. SR validates and Documents gets registered on standardized document with seller and buyer details with boundary marks etc. The same is also available on Website secured by user id PW. User id Password given in sealed envelop to buyer

7. Auto updating of sale detail to revenue department, Survey Department and SR office.

   Where more persons are owner of the land, tag the updated data for a law specified period. On expiry of such period, the buyers need automatically updated at all land.
Proposed Process Changes in existing SRS

1. Documents registered at IGR are automatically uploaded into Survey and LR database- through a work flow.
2. The need for EC is thus eliminated- or if required Thasildar can issue the same.
3. IGR thus pulls up the same data base for validation of the seller details.
4. Direct clearance for further documentation.
5. Or refer back to Revenue officials.
6. Auto land valuation – Continuous updation of A- Register basis value
7. e-Stamping – Error free and Saves time for all stakeholders
Issues and proposal related to Additional / New value Proposal

• Previous status of SR office, Stamp duty, Encumbrance certificate, Village officer and Taluka Revenue officials - disconnect

• Establish Bridge link between:
  – SR office
  – Survey / Commissioner of Land Records office
  – Revenue department office (Thasildar, Deputy Collector, Collector)
1. EC issued only on the basis of earlier registrations. No correlation between land revenue records and EC.
2. SR re registers the same land for further sale depending on his own office EC.
3. Revenue officials or Village officer has no role to play in EC issuance. Hence EC is irrelevant.
4. Land value for stamp duty is calculated manually from the register that contains last highest sale price.
5. Stamp duty revenue is accounted through the stamp sold by the vendors and recorded by them.
6. Registration Index sent by SR is never entered in land revenue records unless the buyer chases the VO and other Revenue department officials.
7. In normal course registered land transfers are not mutated in land records for number of years. Hence EC issuance is irrelevant.
8. Further land transfer registrations are carried out without land records mutation.
9. Hence it gives room for scandals.
10. On the whole the land transfer records do not have validity in any given point of the time.
Application is made with the survey number for valuation

Manual verification of the value of the land in the Register.
(Last highest sale value applied to all lands of same category - about 18 categories)

Manual Register is internally stored in data format in the system (currently). Hence both the register and the system verified value is given to the applicant

Applicant goes to Stamp Vendor and buys stamp papers

Then Go to the document writer to write the sale deed
Stamp Duty Payment - Previous process

Problems:

• Everything is manual and after purchase of stamp paper if the value is found less the whole valuation procedure has to be followed once again
• Manual calculations are not error free
• Vendors some time do not sell more than Rs.25,000 stamp paper to single
• Delay in getting stamp papers and delay in writing documents
1. EC is irrelevant
2. Government.- loses valuable revenue
3. Citizens run pillar to post to get their record of rights data
4. Land scandals are common
5. Numerable court cases and most of the officials busy with court cases than regular works.
6. Mortgage records etc., are always in Subregistrar's record but not all in Revenue dept records.
Value Proposed – SR Bridge

1. All digitized rural records are put in the data base and used for system process for further sale or change of use etc. (Gujarat model).

2. 80% of survey officials retire by 2015. Hence private surveyors need to be authorized. In this situation the digitized records are authenticated and secured right now prior to applying these data for e-governance applications.

3. Future authentications by village, taluka, district levels by local land revenue staff and survey staff.

4. All offices like SR, Dy Thasildar, Thasildar, DRO, Collector, Registrars, IG of Registrar, Settlement Commissioner offices, Secretary, Revenue Department all are inter linked with authentication to view the instant changes taking place.
Value Proposed:
1. Value the land closer to market value- Prepare Jantri
2. Total state is divided by one square kilometer grid and all survey numbers under each grid is surveyed by market survey methodology by a research group.
3. This annual survey by a third party is cross surveyed or checked at random by different levels of Government officials in every village, taluka and district at a prescribed percentage.
4. All these values are displayed at different forums for public awareness by district officials (Change management) and receive comments from them to carry out minor correction, to make the stakeholders to accept the survey valuation.
5. Orders issued by Government and
6. Put online digital data of survey number wise land valuation for auto calculation of stamp duty and registration fees.
PROCESS FLOWCHART of REGISTRATION

1. Parties come to SRO with original Document
2. Check under Regn. Rule-45 by SR
3. Presentation & Admission
4. SR verifies the Input Sheet (put SR sign) and transfer to Operator
5. Data entry as per Input Sheet by Operator
   1. General Details
   2. Party Details
   3. Property Details (for MV)
   4. Other if any.
6. Document No. allotted by system and noted in input sheet by operator
7. Generate & Print Fee Receipt (2 copies in LaserJet).
   Verify, Sign and Collect Cash by SR
8. Identification of executants, photo capturing & digital thumb impression (by Operator in presence of SR)
A

Print Party List with Photograph, Thumb Impression, Signature & attach to original document

Scrubtny for Market value and valuation by SR. Ganatri Patra Generate & Print by Operator

Under valuation

No

Yes

Give Intimation as per Market value Rule-3(2) by SR. Print notice 3(2) by Operator (2 copies in LaserJet)

Person agree to pay deficit stamp-duty

No

Yes

Generate Receipts for deficit amount and collect cash

Document send to Dy. Collector

Document Returns from Dy. Collector

Document REGISTERED (ORDERED)

B
Endorsement and Paging, Round-sealing on the document by SR officials

SCANNING & Copying on CD by Operator

Registered Document Returned to the party

Registration OVER

Process of Archival, Data Backup, CD Copying, etc... by Operator as per frequency fixed.
OTHER PROCESS FLOWCHART

Parties come to SRO for required information

Submit the application

Admission

Data entry by Operator

Application No. allotted by system and noted by Operator / SR official

Generate & Print Fee Receipt (2 copies in LaserJet). Cash collection

Allots the serving date

Application Process through searching, retrieval, etc., and Generate Outputs (eg. Index-2, True Copy, etc.)

Serve the Party
Registration From SRO

Presentation of Document

Registered Document

Registrant

Sub Registrar Office

State Data Centre,
Gandhinagar Gujarat

GSWAN

Computer

Printer

Computer

Server

Switch

Ethernet
Current Status

• The system has been successfully running in 267 sub registrar offices.
• All offices are connected with State wide network (GSWAN)
• Daily around 3000 documents are registered and data are stored at Central Server.
• Software
  – Smart Client application (Garvi)
  – .net framework 3.5 and Cyrstal reports
• Hardware
  - Main DATA Server at State Data Centre, Gandhinagar
  - Windows XP / Windows 7 Computer installed at all SROs with GSWAN connectivity
The way of Implementation

- Data conversion: Registration and Land Records
  - 2 days no activity with prior announcement through administration.
  - Conversion of GIST data to Unicode.
  - Conversion time: 2 hours to 24 hours
  - Importing into New Database on Central DB Server
  - Migration took place from July-2010 to Feb-2011 for all talukas in GUJARAT
- Data entry Completed Talukas shifted to central server
- Authorized User Creation
- Training given to Sub Registrar officials
GARVI - Central solution for Property Registration

• Pre-valuation
  • Ownership verification by photo and finger print authentication for Agriculture Land
  • Market value/ Stamp Duty Calculation based in Ready Recknor (Jantri)

• e-stamping counters at every taluka office
• Receipt generation for Registration fees and numbering the document
• Capture Photo and Thumb impressions of the parties
• Scanning of the registered document
• Auto Mutation Generation (“entry” in VF 6) on registration of agriculture property
Processes form the backbone of any system e-Jamin

- Integrated system named e-Jamin implemented in all talukas having SRO and Mamlatdar offices working as single window.
- Centralized Solution for Property Registration
- Centralized computerized land records data
- Integration of textual and spatial data in new VF 7
- RoR available at taluka, district and village level
- RoR data ready to be placed in web world
- Inclusion of Photo and finger prints of land owners
- SMS intimation at each stage of mutation process
Logical Data center for GARVI
E-Jamin Demonstration to Revenue Secretary
Some Screen Shots of Property Registration (Garvi software)
Photo Thumb Verification of Land Owner (Pre valuation Process before registration of Agriculture property)

<table>
<thead>
<tr>
<th>Survey No. [Area]</th>
<th>Survey No. / Paikki</th>
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<tbody>
<tr>
<td>358 [(0.6679)]</td>
<td>358</td>
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<td>420</td>
<td>420</td>
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<tr>
<td>0603073</td>
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</table>

- Confirm the Survey No.
- Confirm the selected Khatedar Names
- Save Details
- Thumb Verify

Total Confirmed Area
Total Confirmed Party:

Show Survey No. Map

eDham Nayab Namekatar Authentication for Khatedar

IGR - GUJARAT

20/06/2011 17:20:06
Photo Thumb Verification of Land Owner (Pre-valuation Process before registration of Agriculture property)
Capturing of Photo and Finger Print
Photo Thumb Verification of Land Owner (Pre valuation Process before registration of Agriculture property)
Photo Thumb Verification of Land Owner (Pre valuation Process before registration of Agriculture property) ...
Generation of Endorsement Pages

Print All Endorsement

Main Report

GDR
6818
2011

पत्रवार नंबर: 2011444815392
हेडफोर्म व तेल: 3 प्रति
राजस्व व वाणिज्य: 3000
नकल किराया नाम: वार / छलू (15): 150
अन्य: 0
कुल नकल: 3

मानसिक

(पत्रवार की स्वीकृति)
विवेक शेरादाद

(चेक की स्वीकृति)
विवेक शेराडाद
Generation of Endorsement Pages
Auto Mutation Process after final order the registered document
Auto Mutation – Registered document entries are transferred to Land Records

<table>
<thead>
<tr>
<th>Land Record Details</th>
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<tbody>
<tr>
<td>Name/Date: 036 - 01/06/2011</td>
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<tr>
<td>Kham 4592/11/2011</td>
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<tr>
<td>Kham 250000</td>
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<tr>
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<td>Mutation Date: 18/06/2011</td>
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<td>Mutation Details: 232700</td>
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:: Nopani Mivatavar Mahiti ::

| Nopani Number: 2437 | Nopani Date: 18/06/2011 | Mutation Date: 18/06/2011 | Nopani Method: Kav 

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Auto Mutation – Registered document entries are transferred to Land Records

### Web-Bhulekh

**Welcome, A R SUNILKUMAR (Operator) || .Telephone : આંધીનગર ||  તાલ્ક : આંધીનગર**

#### MENU

<table>
<thead>
<tr>
<th>નોંધની વિગતદાર માહિતી ..</th>
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- **નામ/ખોસ્થી:**
  - 036 - પુત્રીયા (1)
- **િડમ દસાસ્વેજ નંબર:**
  - 4592/2011
- **િડમ દસાસ્વેજ ક્રમી રંગ:**
  - 250000
- **િડમ દસાસ્વેજ તારીખ:**
  - 18/06/2011
- **અનેજ ની રંગ (3):**
  - 232700

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<tr>
<th>નોંધની નંબર : 2437</th>
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#### Designed & Developed by National Informatics Centre, Gujarat State
Auto Mutation – Registered document entries are transferred to Land Records
Auto Mutation – Registered document entries are transferred to Land Records

<table>
<thead>
<tr>
<th>गाम नमुना नंबर 7 अने 12</th>
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Auto Mutation – Registered document entries are transferred to Land Records

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<th>विचार</th>
<th>जानकार</th>
<th>तारीख</th>
<th>मोजे: उपाल</th>
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| | | | 1194/1 0.1785 |
| | | | 1183/2 0.1665 |
| | | | किलो माप: 2 संख्या नाम: 0.3448 के - 009 - व. सी. |
| | | | मोजे: वेधाक ता. पालिकाकर वा. आंधेनार |
| | | | अन्य: ता. कार्यालय (पता न. ) पहेला व. विवेद (लिखित) |
| | | | का श्रेणी (लिखित) |
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| | | | 6502/2011 ता. आंधेनार वेधाक 1.182252/2 - वेधाक वर्तमान संख्या 5 \(\text{वेधाक का पता विवेद:} 02/06/2011\) ता. वेधाक 28.9. |
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Original Registered document is given to the buyer.