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## **Editorial**

There are several factors to decide between use of Aerial or satellite imagery. Read the article about aerial alternative to satellite imagery.

Land records in India is still major issue. Read about high stamp Duty in Telangana on registration and no guarantee of title, even after highly publicised "Dharani" portal. Read article on this subject.

In GHMC elections GEMS provided booth-wise map analysis useful for developing campaign strategy. But no takers. The challenge before us is how to convince that use of map-based approach is more efficient.

Useful, interesting and informative references

**ISRO successfully launches PSLV C-49 carrying India's latest earth observing satellite and 9 other payloads**



**ISRO successfully launches India's latest earth observing satellite (opindia.com)**

The Indian Space Research Organisation (ISRO) launched the country's first space mission and 51st mission of Polar Satellite Launch Vehicle (PSLV) on Saturday 5 November 2020. The Polar Satellite Launch Vehicle named as PSLV-C49 was launched from Satish Dhawan Space Centre in Sriharikota. It was carrying the all-weather earth imaging satellite EOS-01 from the Indian Space Research Organisation (ISRO) along with nine international satellites. According to a tweet from the official ISRO handle, all the nine satellites and EOS-01 have successfully separated and injected into their intended orbit.

This mission is very special and unusual for ISRO. The space activity cannot be done from 'work from home'. Each engineer has to be present at the lab. When talking about missions like these, each

technician, employee has to work together," ISRO chief K. Sivan said.

**Ancient & historical maps**

<http://scroll.in/article/722369/the-changing-map-of-india-from-1-ad-to-the-20th-century>

**3Dsurvey Software**

<https://www.3dsurvey.si>

**Satellite Imagery: An Aerial**

**Alternative - 25/08/2020**

**Skye Boag**



Remote sensing projects often begin with the question: 'Should I use aerial imagery or satellite imagery?'. During long-term projects, this question may arise again, particularly when unforeseen circumstances change the ability to collect data, the reliability of the data or the scope of the work. Budgets, technology and government restrictions constantly change, making it critical to choose the right data inputs.

Details @ <https://www.gim-international.com/content/article/satellite-imagery-an...>

## Land Records and Titles in India

Prachee Mishra Roopal Suhag  
September 2017



Land titles are presumptive and don't guarantee ownership

Land records are maintained across multiple departments, and are in poor condition

Process of updating land records has been slow

[MergedFile \(prsindia.org\)](http://MergedFile.prsindia.org)

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**(Extracts )**

### **Moving to a system of state guaranteed titles will be challenging**

□□ To address issues with land records, a move towards conclusive titling has been proposed. In a conclusive titling system, the government provides guaranteed titles, and compensation in case of any ownership disputes. Achieving this will require shifting to a system of registered property titles (as opposed

to sale deeds) as the primary evidence of ownership, and having clear and updated land records.

□ However, adopting a conclusive system of titling will require undertaking several measures. All existing land records will have to be updated to ensure that they are free of any encumbrances. Information on land records, which is currently spread across multiple departments, will have to be consolidated. Further, several changes in existing laws that govern registration and transfer of land, and institutional changes in maintenance of land records will also have to be done

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The transfer of land or property between a buyer and seller is recorded through a sale deed, which needs to be registered according to the current legal framework. Therefore, such registration of land refers to the registration of the transaction, and not the land title.<sup>16</sup> Such registration does not guarantee the title by the government. This implies that even bonafide property transactions may not always guarantee ownership as an earlier transfer of the title could be challenged

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As per the Registration Act, 1908, when registering a property sale deed, the identity of the buyer and the seller needs to be checked, and whether the last sale deed was registered. While the identity of the buyer and the seller is verified through various identity proof documents, the physical location

and attributes of the land being sold may not always be cross-checked physically by the registrar (district official responsible for registration). Further, only checking the identity of the sellers may not necessarily mean that they are the rightful owners of such land or property.

Registration of a sale deed makes the document of transfer a permanent public record. From these records, any person interested in purchasing that property can verify in whose name the deed was last registered. If a deed of land transfer for which registration is compulsory under the Registration Act, 1908 is not registered, then it is not admissible as evidence of ownership in courts.

***The onus of checking the validity of the title (or rightful ownership of the property) is on the buyer, and not on the government.***

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Under the Jawaharlal Nehru National Urban Renewal Mission (JNNURM), one of the mandatory state level reforms was to rationalise stamp duty and bring it down to less than 5% by 2018.<sup>21</sup>

Following this, some states have reduced their stamp duties. For example, stamp duty in Delhi and Mumbai is 6% and 5%, respectively.<sup>22</sup> The Standing Committee on Commerce on Ease of Doing Business (2015) had recommended that stamp duty should be reduced to 2%.

## **Extracts**

### **Inclusive land reforms towards conclusive title**

Vanam Jwala Narasimha Rao; Hans India (13-09-2020)

Conclusive titles are state guaranteed titles, where the state guarantees the title for its correctness and provides for compensation in case of any disputes. A conclusive title is an unquestionable and convincing proof of ownership of property. Current provisions in central Registration Act (1908) do not confer clear property titles on the owners while providing for registration of property deeds and documents. The title remains merely presumptive.

## **3Dsurvey Software**

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3Dsurvey is a photogrammetry software solution for land surveying professionals. It takes 2D images of any terrain or object, captured by any drone and any camera, and generates a dense 3D metric point cloud. Furthermore, it offers 3D data manipulation and on-the-fly 3D measuring, Orthophoto generation, one-click Volume calculation, fully textured 3D digital terrain modelling, professional survey map calculation, integrated Reporting wizard, and export-ready results (any CAD or GIS program

<https://www.3dsurvey.si>

## **GIS Day**

Report

Webinar on “ GIS – A proven Technology” was held jointly by Institution of Engineers (India) Telangana State Centre and Geo Map Society (GEMS), Hyderabad on Wednesday 18 November 2020 as part of World GIS Day celebrations.

The programme started with welcome by Dr G RAMESHWAR RAO, FIE Chairman, IEI, TSC. He highlighted importance of GIS and the need to continue to celebrate GIS Day as in the past.

Mr. GS Kumar, president, GEMS explained how GIS Day provides an opportunity to create awareness about GIS and related growing applications.

Points from Key Note Address Brig J S AHUJA (Retd), Former Director Survey of India, Hyderabad

- After retirement from Sol in 1995, I established ORG GIS at Vikram Sarabhai Inst. Ahmedabad
- ESRI started GIS Day celebrations in 1999, on third Wednesday of November every year, world over. The term GIS was first coined by Tomlinson of Canada I am happy to make presentation on GIS when Instn. of Engineers is celebrating 100 years of its progress.
- British having appreciated the importance of maps, established Surveying & Mapping organisation in 1767 and carried out surveying and mapping of the whole country
- Considering the way GIS has grown, we can summarise GIS = Maps + Information
- Elements of good governance are : Responsible, Accountable and Transparency. GIS can be defined as Information linked to location based geo-spatial objects in a computer system
- Creating map data bases in layers is the main advantage of GIS, besides components like Activity, Training, Technology etc.
- GIS applications are many like – Telecom; Services; Locality management; Land Use Planning; Land Information System; Town/urban Planning Infrastructure; Civic Services ; Railways , Road Transport, Waterways; Forest ,Irrigation, Mining[ Power and Water Lines; Environment Monitoring, Business and so on
- He discussed about cross-disciplinary nature of GIS – Digital mapping; Photogrammetry; Surveying; Remote Sensing; Data bases; Computer Aided Design etc.
- Several countries have adopted GIS and proved its benefits
- Participants included Prof IVM, VS Rao, Maj Gen Siva Kumar; Ms Geetha Reddy (presently in USA)
- OUR MIND SET needs to be changed is the concluding statement.

Er T Anjaiah, FIE Hon. Secretary, IEI, TSC; proposed Vote of Thanks

The programme ended with NATIONAL ANTHEM.

## Response from Dr THC

Dr T Hanuman Chowdary has been supporter and Advisor for all our activities. Extracts from his mail (e-mail: [hanuman.chowdary@tcs.com](mailto:hanuman.chowdary@tcs.com))

:

*I once again congratulate and thank you for so dedicatedly and passionately editing and publishing "Maps Today". "Only the paranoid will succeed" wrote Intel's Chief , Andy Grove. May god and god's will and esteem of people like me for you to sustain you in your efforts.*

Based on his advice, we have made change in the telephone number which have become non-functional

We thank him for this.

## Overview



RACURS, Russia

The PHOTOMOD software family comprises a wide range of products for the remote sensing data

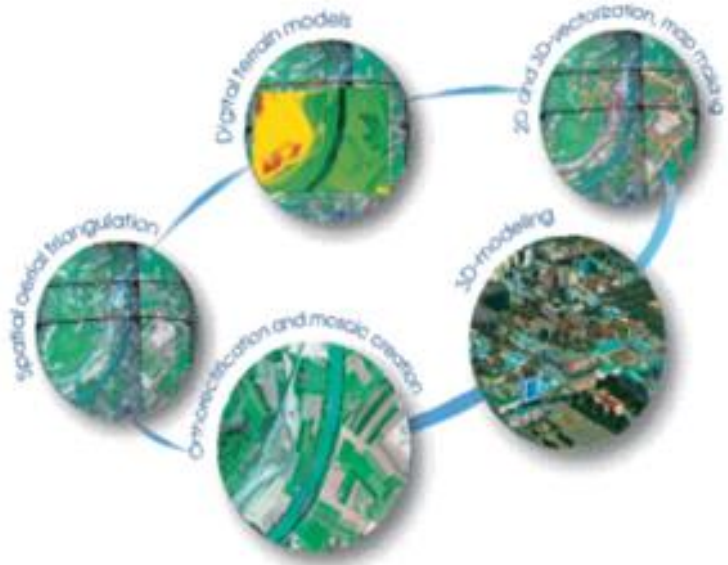
photogrammetric processing. This state-of-the-art software allows the extraction of geometrically accurate spatial information from almost all commercially available types of imagery, whether obtained by film or digital cameras, UAS, high resolution satellite scanners.

PHOTOMOD's flexible modular architecture and powerful import/export tools permit a variety of configurations: **Complete Digital Photogrammetric Workstation** (standalone configuration), high productivity distributed network environment for accomplishing large projects, complementary workplaces that can be used along with third-party systems to increase the overall productivity during the most time-consuming and labor-intensive operations like feature extraction and DTM creation.

Today PHOTOMOD is the most popular digital photogrammetric software in Russia and is also used in 70 countries all over the world. PHOTOMOD is the only digital photogrammetric system with the Russian Federation Ministry of Defense certificate and also the main digital photogrammetric software for the Federal Space agency of the Russian Federation (ROSCOSMOS) and Russian Federal Service for State Registration, Cadastre and Cartography (ROSREESTR)

General questions: [info@racurs.ru](mailto:info@racurs.ru)

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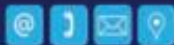
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- GIS/CADD Data Processing
- Geodetic, Topographic, Cadastral, Hydrological Surveys

### HONOURS & AWARDS

- Geospatial World Excellence Award 2018
- Best Professionally Managed Company 2014
- Geospatial Company of the year 2013
- National award for Excellence in Engineering Consultancy 2012
- Project of National Excellence - Urban Infrastructure 2011
- Export Excellence Award 2008 & 2010



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