

Pradhan Mantri Awas Yojana Housing for All (Urban)



Government of India
Ministry of Housing and Urban Affairs (MoHUA)

Steps



Creation of beneficiary database (PMAY MIS)

Authorizing and orienting supervisors (Create Logins on Bhuvan portal)

Authorizing and orienting surveyors (Create Logins on Bhuvan portal)

Authorized users generate reports in Bhuvan Geo-platform

Supervisor checks and approves uploaded images

Surveyors collect and upload house images in Bhuvan mobile app

- Each Surveyor is tagged to his mobile number and user ID.
- Multiple surveyors in a city and single surveyor for multiple cities is allowed
- Supervisors should be from their own staff to lead this at city level
- Surveyors can be from CLTC or outsourced by cities

Advisory on Geo-Tagging of 'BLC House Construction'



Advisory for all States/UT's on Geo-Tagging of 'Beneficiary led Individual House Construction' component of the Mission

The key objective of geo-tagging is to track progress of construction of individual houses through geo-tagged photographs, under the Beneficiary led Individual House Construction component of the PMAY (U) mission. In order to achieve optimum results, please find below an advisory for ensuring quality of the photos geo-tagged and actions points to be followed by the States/UT's

1. Quality of Photograph/Geotag (to be ensured by Surveyor's)

Quality of photograph is essential for correct assessment of the progress of BLC houses through different five construction stages. Following points should be considered while taking photographs of house constructed under PMAY (U):-

- 1.1 **Resolution and Size of the captured image:** It is suggested to use the camera resolution as **640 * 480 pixels or lowest possible for easy transfer of data from mobile to server**. The size of photo uploaded should be normally between **300k and 600k** depending on the composition of the image.
- 1.2 **Direction and Angle:** The direction and angle of the geotagged photograph should be such that entire construction stage or maximum portion of the construction stage of the house is visible in the photograph.
- 1.3 **Orientation of photograph:** The photos of all 5 construction stages should be captured by surveyor nearly from the same geo-coordinates location (latitude and longitude) of earlier construction stage geo-tagged.

- Quality of Photograph/Geo-tag (to be ensured by Surveyor's).
- Data and Images to be Collected from the Beneficiary Location.
- Roles and Responsibilities of Supervisors, Surveyors, SLTC/CLTC, States/UTs.
- Few sample images of quality photographs.
- The Ministry will do random check regularly to monitor the quality of photos geo-tagged, moderation gaps, working of surveyor's, supervisors and SLTC/CLTC.

Few sample images of quality photographs

Not Started/Grounding



Not Started

Few sample images of quality photographs

16.2 Foundation Stage



Foundation



Few sample images of quality photographs

Lintel



Few sample images of quality photographs

Roof



Few sample images of quality photographs

Completed



Advisory on Geo-Tagging of 'BLC House Construction'



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• **Deadlines**

☐ States/UTs should ensure that whatever construction stage is completed (Not Started, foundation, lintel, roof or completed) w.e.f. 25th August, 2018 must be **geotagged within 5 days from date of completion of that construction stage.**

☐ There should be no pendency of moderation of photographs at supervisor level. Each geotagged photo uploaded by the surveyor, should be **moderated maximum within 4 days by the supervisor.**

Daily Quality of Geo-tagged Photos of BLC Houses

- Daily monitoring of Geo-tagged photo quality at central level and issuing of letter to States/UTs highlighting status , moderation gap and **sample of Improperly Geo-Tagged Photographs of Completed Construction Stage of House.**



No: N-11011/3/2018-HFA-1 (PTS-9030937)

Government of India
Ministry of Housing & Urban Affairs
HFA-1 Division

Nirman Bhawan, New Delhi,
Dated 2nd November, 2018

To,

Shri B.N. Jha,
Deputy Director,
Nodal Officer, HFA
Urban Development & Housing Department,
Government of Bihar,
Bihar

Subject: Quality of Geo-Tagged Photos of BLC houses under PMAY (Urban) Mission-reg.

Dear Sir,

I am directed to refer the D.O. letter of even number dated 10th August, 2018 forwarding therewith an Advisory for Geo-Tagging of houses of BLC vertical of PMAY (Urban) Mission.

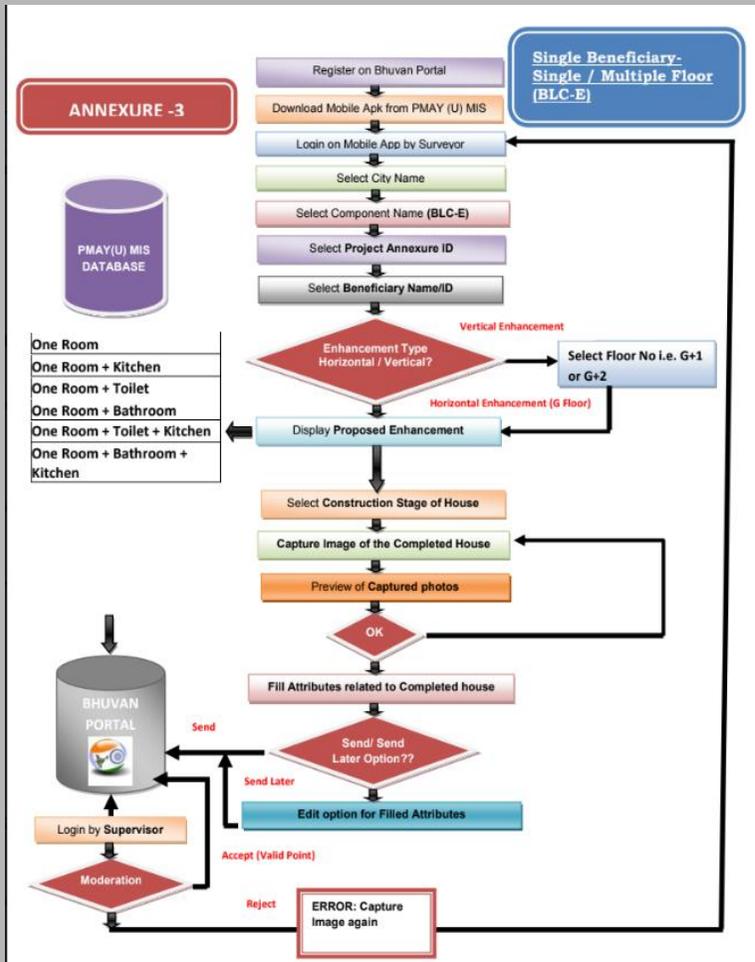
- In the context of geo-tagging of BLC houses the following has been observed:-
 - All five stages were not covered for houses already Geo-tagged. Mostly houses are Geo-tagged for completed stage only.
 - Some of the Geo-tagged photographs of completed houses are not acceptable at Central level because of improper geo-tagging. Sample of such Geo-tagged photos of the State of Bihar are attached herewith for reference. The supervisor may be advised to scrutinise the quality of photos during their moderation.
 - Current Geo-tagging Status:-

Geo-tagging Status of Moderation as per Nirman Portal as on 30.10.2018							
Total No. of Projects Approved	Total No. of Beneficiary Approved	Total No. of Beneficiary Attached	Total No. of Houses Geo-tagged	Geo-tagged or Completed Stage of Construction House	Accepted of Completed Stage of Construction House	Rejected of Completed Stage of Construction House	Completed Houses Pending for acceptance
1	2	3	4	5	6	7	8=(5-(6+7))
310	192305	110298	39585	2099	1192	239	668

- You are therefore, requested to ensure that all the stages of construction are Geo-tagged and the norms of advisory are strictly adhered to.

Anita
(Anita Sirohiwal)
Deputy Director

BLC+BLE Component : BhuvanHFA Mobile Application



✓ **Geo- Fencing Feature:-**To monitoring Accuracy within **<10 M.**

✓ **Provision in mobile application to geo-tag house at same geo-location for multiple beneficiaries living floor wise (i.e. Ground floor, First Floor and upto Third Floor)**

- ❑ **Single beneficiary with multiple floor**
- ❑ **Multiple beneficiaries multiple floor**

Capturing of photos all 5 stages of each floor.

BLC+BLE Component : BhuvanHFA Mobile Application



✓ **To capture photo and geo-tagged images w.r.t proposed enhancement type:-**

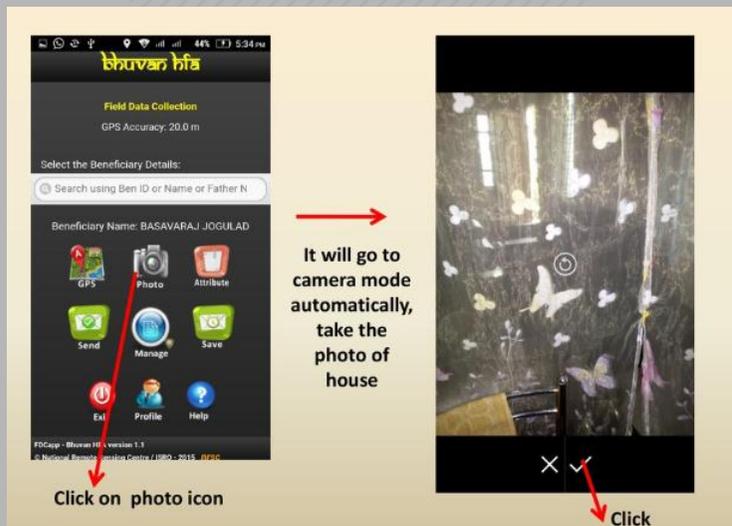
One Room

One Room + Kitchen

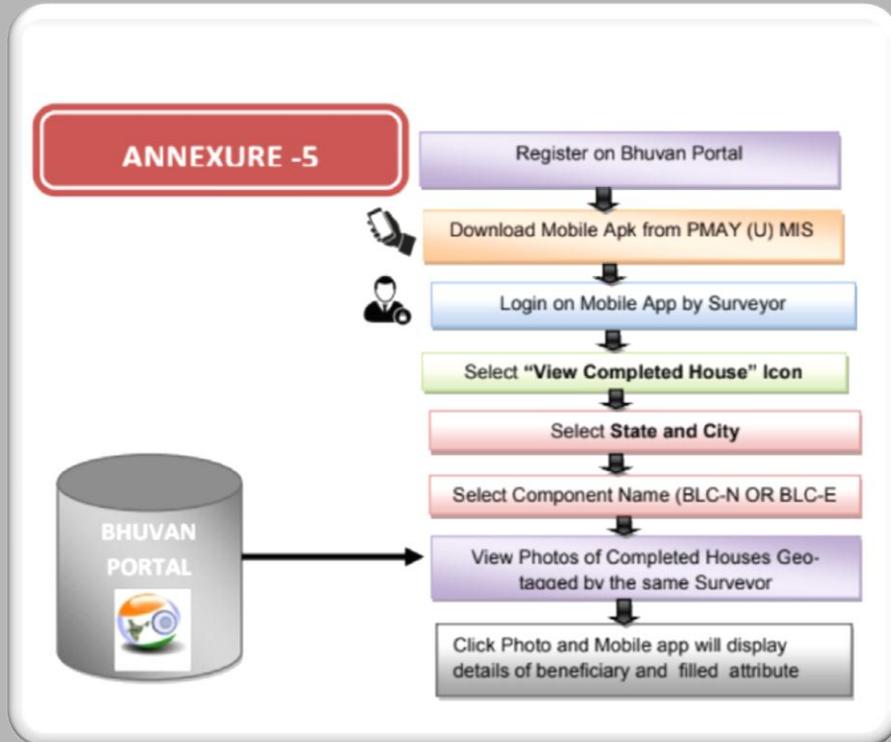
One Room + Toilet

One Room + Bathroom

One Room + Toilet + Kitchen

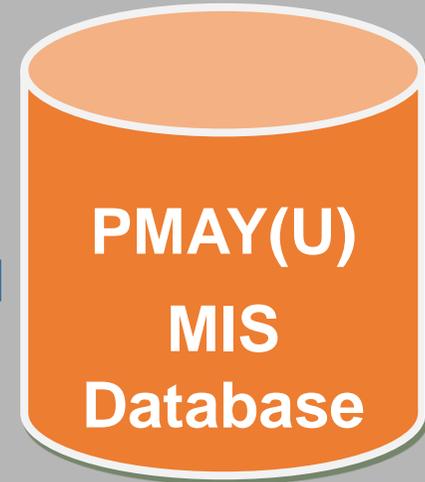


BLC+BLE Component : BhuvanHFA Mobile Application



- ✓ Facility in existing Mobile Application to View **geo-tagged images of completed Houses** (After Moderation) separately along with attributes.(for that surveyor only).
- ✓ **Disabling of construction stage** option for which house has been geo-tagged and moderated by the Supervisor.

To avoid duplicate points for same construction stage by different surveyors.



REPORTS



DASHBOARD

Dashboard : Bhuvan Web Portal

S.No	Requirements
1.	Facility to view No. of Visitors(Before Login)
2.	Tabular Moderation Facility
3.	National Summary of Accepted Geo-tags(Before Login)
4.	Provision to view State Wise/City Wise / Project Wise / Construction Stage wise all geo-tagged photos (Moderated) in one window for checking of quality at PMAY level.
5.	Two level of moderation for completed house i.e. one from supervisor level and one from SLNA level.

Dashboard : Bhuvan Web Portal

S.No	Requirements
6.	Facility on existing Web Portal to View Completed Houses (After two level of Moderation) separately along with attributes for all stakeholders including public (in Dashboard).
7.	Dashboard for all Stake-Holders
8.	Register New User- GIS Expert at State Level for All States/UTs

Dashboard : Bhuvan Web Portal

1. State/City/Project Wise/Beneficiary Wise/Construction Stage Moderation Pending Status Reports

BLC-N
 BLC-E

S.No	State Name	City Name	Project Name	Beneficiary Id/Name	Construction Stage	Total Number of photos Geo-Tagged by the Surveyor	Total Number of Geo-Tagged Photos Moderated	Total Number of Geo-Tagged Photos pending for Moderation			
								Total	less than 10 Days	more than 10 days	more than 30 days
1											

[Download Report in Excel/Pdf Format](#)

Dashboard : Bhuvan Web Portal

2. State wise/City Wise/Project Wise: Houses Geo-Tagged w.r.t to all Completed Construction Stages

BLC- N
 BLC-E

S. No	State Name	City Name	Project Name	Total No of Houses Geo-tagged with Completed Construction Stage	Total No of Houses Geo-tagged with Completed Status and geo-tagged					Major Construction Stage not geo-tagged for houses with completed status geo-tagged
					Covered all 5 construction Stage	Covered 4 Stages	Covered 3 Stages	Covered 2 Stages	Covered 1 Stages	
1										

Download Report in Excel/Pdf Format

Dashboard : Bhuvan Web Portal

3. State wise/City Wise/Project Wise/Beneficiary Wise/Construction Stage Wise: Accuracy of houses geo-tagged and moderated by the supervisor.

BLC-N BLC-E

State  City  Project  Beneficiary  Construction Stage 

S.No	State Name	City Name	Project Name	Beneficiary Id/Name	Construction Stage	Accuracy of Moderated Photos Geo-tagged(in meters)				
						0-5	6-10	11-15	More than 15	More than 1 km

[Download Report in Excel/Pdf Format](#)

Dashboard : Bhuvan Web Portal

4. State wise/City Wise/Project Wise/Beneficiary Wise/Construction Stage wise: Photo Gallery of Houses Geo-Tagged and Moderated(Tabular View)

BLC-N BLC-E

State  City  Project  Beneficiary  Construction Stage 

All Geo-Tagged Moderated

S.No	State Name	City Name	Project Name	Beneficiary Id/Name	Construction Stage	Geo-Tagged/ Moderated	Photo 1	Photo 2	Surveyor Name	Supervisor name
							hyperlink	hyperlink		

Download Report in Excel/Pdf Format

Dashboard : Bhuvan Web Portal

5. State wise/City Wise/Project Wise: Status of Geo-tagging as per MIS attachment of Beneficiaries

BLC-N BLC-E

State  City  Project 

<u>S.No</u>	State Name	City Name	Project Name	Total No. of Beneficiaries shared to NRSC from PMAY(U) MIS	Total No. of Beneficiaries houses started geo-tagging	Total No. of Beneficiaries houses completed geo-tagging	Total No. of Beneficiaries houses yet to be geo-tagged	Total No. Days pending to start geo-tag.

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Dashboard : Bhuvan Web Portal

6. State wise/City Wise/Project Wise/Beneficiary Wise: Geo-Tagged Photos of all Construction Stages

BLC-N
 BLC-E

State 
 City 
 Project 
 Beneficiary 

All
 Geo-Tagged
 Moderated

S.No	State Name	City Name	Project Name	Beneficiary Id/Name	Geo-Tagged/ Moderated	Construction Stages				
						Not Started	Foundation	Lintel	Roof	Completed
						Photo with hyperlink				

Download Report in Excel/Pdf Format

Dashboard : Bhuvan Web Portal

7. State wise/City Wise/Project Wise: Report to View BLC-New beneficiaries Geo-Tagged with multiple floors at Same location

Single Beneficiary
 Multiple Beneficiaries

All
 Geo-Tagged
 Moderated

All
 Ground Floor
 Ground Floor +1
 Ground Floor +2
 Ground Floor +3

S.No	State Name	City Name	Project Name	Beneficiary Id Name	Lat/Long	Address	Floor (G,G+1, G+2 or G+3)	Geo-Tagged/Moderated	Construction Stages				
									Not Started	Foundation	Lintel	Roof	Completed
									Photo with hyperlink				

Download Report in Excel/Pdf Format

Dashboard : Bhuvan Web Portal

8. State wise/City Wise/Project Wise: BLC-Enhancement Monitoring

↓
 ↓
 ↓

All
 Horizontal Enhancement
 Vertical Enhancement

Proposed enhancement Type ↓

- One Room
- One Room + Kitchen
- One Room + Toilet
- One Room + Bathroom
- One Room + Toilet + Kitchen
- One Room + Bathroom + Kitchen
- All Types

All
 Geo-Tagged
 Moderated

S.No	State Name	City Name	Project Name	Beneficiary Id Name	Proposed Enhancement (Horizontal/Vertical)	Proposed Enhancement Type	Proposed Enhancement Area (in Sq.Mtrs.)	Total Carpet Area i.e. (Existing + Proposed) (in Sq.Mtrs.)	Geo-Tagged/Moderated	Construction Stages				
										Existing Structure	Foundation	Lintel	Roof	Completed
										Photo with hyperlink	Photo with hyperlink	Photo with hype	Photo with hyperlink	Photo with hyperlink

Dashboard : Bhuvan Web Portal

9. State wise/City Wise/Project Wise: List of Surveyor's , Supervisors and GIS Expert

State City Project

All Surveyors Supervisors GIS Expert

S.No	State Name	City Name	Project Name	Surveyor/Supervisors/ GIS Expert	Name	Mobile No	Email ID	UUID	Total No. Photos Geo-tagged by the Surveyor till date	Total No. Photos Moderated/accepted by the Supervisor till date

[Download Report in Excel/Pdf Format](#)

Dashboard : Bhuvan Web Portal

10. State wise/City Wise/Project wise/Construction Stage wise: Day Wise Points Collection Report

ALL
 BLC-N
 BLC-E

State 
 City 
 Project 
 Construction Stage 

From Date

To Date

S.No.	State Name	City Name	Project Name	Construction Stage	Total Assets				Total of unique beneficiary house geo-tagged	Total of unique beneficiary house geo-tagged photos moderated and accepted
					Geotagged	Moderated	Accepted	Rejected		

Download Report in Excel/Pdf Format

Dashboard : Bhuvan Web Portal

11. State wise/City Wise/Project Wise: List of Multiple Surveyors at Same location

State	City	Project							
<u>S.No</u>	State Name	City Name	Project Name	Beneficiary Id/Name	Address	Surveyors Name	Mobile No	Email ID	UUID
Download Report in Excel/Pdf Format									

Dashboard : Bhuvan Web Portal

12. National/State wise/City Wise/Project wise: Summary of Accepted Geo-Tagged

BLC-N
 BLC-E

State 
 City 
 Project 

From Date
 To Date

S.No	State Name	City Name	Project Name	Last Updated On	Accepted Geo-Tagged					Accepted Geo-Tagged(with Unique Beneficiaries)				
					Not Started	Foundation	Lintel	Roof	Completed	Not Started	Foundation	Lintel	Roof	Completed

Download Report in Excel/Pdf Format

Dashboard : Bhuvan Web Portal

13. Web Services Status

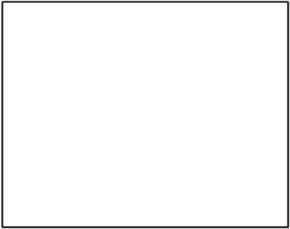
All NIC to NRSC NRSC to NIC

<u>S.No</u>	Web Service Name	Type of Web Services (NIC TO NRSC/ NRSC TO NIC)	Purpose of web service	Date and Time of Run Services	Remarks/ Status of Web Services	Total Number of New Record inserted	Total Number of Record updated	Remarks/Error Description

Download Report in Excel/Pdf Format

Dashboard : Bhuvan Web Portal

14. Surveyor Report Card

State	City	Project	Surveyor
Search Surveyor Name or Mobile/No			
<input type="text" value="Name/Mobile No"/>			
Report Card (for period)	From Date	To Date	
State Name			
Name of the Surveyor		Surveyor Photo	
Mobile No.		UUID	
Email Id.		Date of Joining	
No of Cities Covered	No with hyperlink	No. of Projects Covered	No with hyperlink
No of houses geo-tagged under BLC-N Projects		No of houses geo-tagged under BLC-E Projects	
Total beneficiaries house geo-tagged		Total points accepted by the supervisors	

Dashboard : Bhuvan Web Portal

No of houses geo-tagged under BLC-N Projects		No of houses geo-tagged under BLC-E Projects		
Total beneficiaries house geo-tagged		Total points accepted by the supervisors		
Total No. of houses geo-tagged with single beneficiary at same location		Total No. of houses geo-tagged with multiple beneficiary at same location		
Total BLC-N houses Geo-Tagged at Multiple Floors				
Ground	G+1	G+2	G+3	
Total Points rejected by the supervisor				
Total points accepted by the supervisor(BLC-N +BLC-E)				
Construction Stage	Total Points geo-tagged	Total Points accepted	Total points rejected	Accuracy of Photos-Geo-tagged
Not Started				
Foundation				

Dashboard : Bhuvan Web Portal

Lintel				
Roof				
Completed				
Download Report Card				

Dashboard : Bhuvan Web Portal

15. Supervisor Report Card

State 	City 	Project 	Supervisor 
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Search Surveyor Name or Mobile/No

Report Card (for period)	From Date		To Date	
State Name				
Name of the Supervisor		Supervisor Photo		
Mobile No.				
Email Id.		Date of Joining		
No of Cities Covered	with hyperlink	No. of Projects Covered	No with hyperlink	
No of houses moderated under BLC Projects		No of houses moderated under BLC-E Projects		
Total beneficiaries house Moderated		Total points accepted by the supervisors		
Total No. of houses Moderated with single beneficiary at same location		Total No. of houses Moderated with multiple		

Dashboard : Bhuvan Web Portal

Total No. of houses Moderated with single beneficiary at same location		Total No. of houses Moderated with multiple beneficiary at same location		
Total BLC photos Moderated at Multiple Floors				
Ground	G+1	G+2	G+3	
Total Points rejected by the supervisor				
Total points accepted by the supervisor(BLC-N + BLC-E)				
Not Started	Foundation	Lintel	Roof	Completed
Accuracy of Photos-				

Page 21 of 24

Moderation	
Download Report Card	

Dashboard : Bhuvan Web Portal

16. Status of Completed House& Map Generate

Search Statistics Map Generate

Search

State City Project Construction Sta

View

Show Map With Points Highlight or different colour of different Stages

SHOW MAP

Statistics

State-wise Statistics

District-wise Statistics

View

Show a Graphs basis on Attachment

SHOW MAP

Map Generate

State City Project

View

Show Map all Completed House Photos on Zoom Based

SHOW MAP

For any clarification/query kindly contact the below

S.No.	Name 	Designation 	Contact No. 	Email Id 
1.	Pooja Gupta	Lead MIS	9910832238	poojagupta.mohua@gmail.com
2.	Dipti Singh	MIS Expert	9582008121	diptis1902@gmail.com
3.	Radheyshyam Saini	GIS Expert	9829831511	rsainishyam@gmail.com



PMAY URBAN MIS
PMAY GEOTAGGING

Thank
you!

