

**Distribution of Houses by Predominant Materials of Roof and Wall
and Level of Damage Risk**

Table No. : UP 56

State : UTTAR PRADESH

MAHRAJGANJ

Wall / Roof		Census Houses		Level of Risk under									
		No. of Houses	%	EQ Zone				Wind Velocity m/s				Flood Prone Area in %	
				V	IV	III	II	55 & 50	47	44 & 39	33		
				Area in %				Area in %					
				100				89.5	10.5			49.8	
WALL													
A1 - Mud & Unburnt Brick Wall	Rural	65,632	11.2										
	Urban	1,790	0.3										
	Total	67,422	11.5		H			VH	H			VH	
A2 - Stone Wall not packed with mortar	Rural	5,125	0.9										
	Urban	260	-										
	Total	5,385	0.9		H			H	M			VH	
Total - Category - A		72,807	12.5										
B - Burnt Bricks Wall & Stone wall packed with mortar	Rural	373,459	63.9										
	Urban	24,904	4.3										
	Total	398,363	68.2		M			H	M			H/M	
Total - Category - B		398,363	68.2										
C1 - Concrete Wall	Rural	2,699	0.5										
	Urban	242	-										
	Total	2,941	0.5		L			L	VL			L/ VL	
C2 - Wood wall	Rural	1,859	0.3										
	Urban	136	-										
	Total	1,995	0.3		L			VH	H			H	
Total - Category - C		4,936	0.8										
X - Other Materials	Rural	104,791	17.9										
	Urban	3,211	0.5										
	Total	108,002	18.4		VL			VH	H			VH	
Total - Category - X		108,002	18.5										
TOTAL HOUSES*		584,108											

ROOF												
R1 - Light Weight Sloping Roof	Rural	161,399	27.6									
	Urban	4,247	0.7									
	Total	165,646	28.3		M			VH	VH			VH
R2 - Heavy Weight Sloping Roof	Rural	82,570	14.1									
	Urban	2,303	0.4									
	Total	84,873	14.5		M			H	M			H
R3 - Flat Roof	Rural	309,596	53.0									
	Urban	23,993	4.1									
	Total	333,589	57.1	Damage Risk as per that for the Wall supporting it								
TOTAL HOUSES*		584,108										

Probable Maximum Precipitation at a Station of the district in one day for arial extent of 1000 sqm. 527 mm

Housing Category : Wall Types

Category - A : Buildings in field-stone, rural structures,
unburnt brick houses, clay houses

Category - B : Ordinary brick building; buildings of the large block & prefabricated
type, half-timbered structures, building in natural hewn stone

Category - C : Reinforced building, well built wooden structures

Category - X : Other materials not covered in A,B,C. These are generally light.

Notes : 1. Flood prone area includes that protected area which may have more severe
damage under failure of protection works. In some other areas the local
damage may be severe under heavy rains and choked drainage.

2. Damage Risk for wall types is indicated assuming heavy flat roof
in categories A, B and C (Reinforced Concrete) building

3. Source of Housing Data : Census of Housing, GOI, 2011

Housing Category : Roof Type

Category - R1 - Light Weight (Grass, Thatch,
Bamboo, Wood, Mud, Plastic, Polythene,
GI Metal, Asbestos Sheets, Other Materials)

Category - R2 - Heavy Weight (Tiles, Stone/Slate)

Category - R3 - Flat Roof (Brick, Concrete)

EQ Zone V : Very High Damage Risk Zone (MSK > IX)

EQ Zone IV : High Damage Risk Zone (MSK VIII)

EQ Zone III : Moderate Damage Risk Zone (MSK VII)

EQ Zone II : Low Damage Risk Zone (MSK < VI)

Level of Risk : VH = Very High; H = High;

M = Moderate; L = Low; VL = Very Low

* Total No.of Houses excluding Vacant/Locked Houses