

MHERCHYA KUMA (Traditional Hyolmo House)

Helambu Housing Reconstruction Programme

Prepared by:
**Aashraya Nepal in Association
with HEAL Nepal and Hyolmo
Foundation**

Submitted to:
**National Reconstruction
Authority, Kathmandu, Singha
Durbar**

Aashraya
नेपाल

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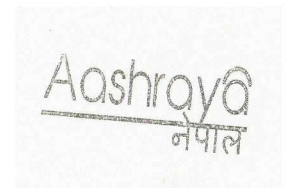
MHERCHYA KUMA, ONE-STOREY

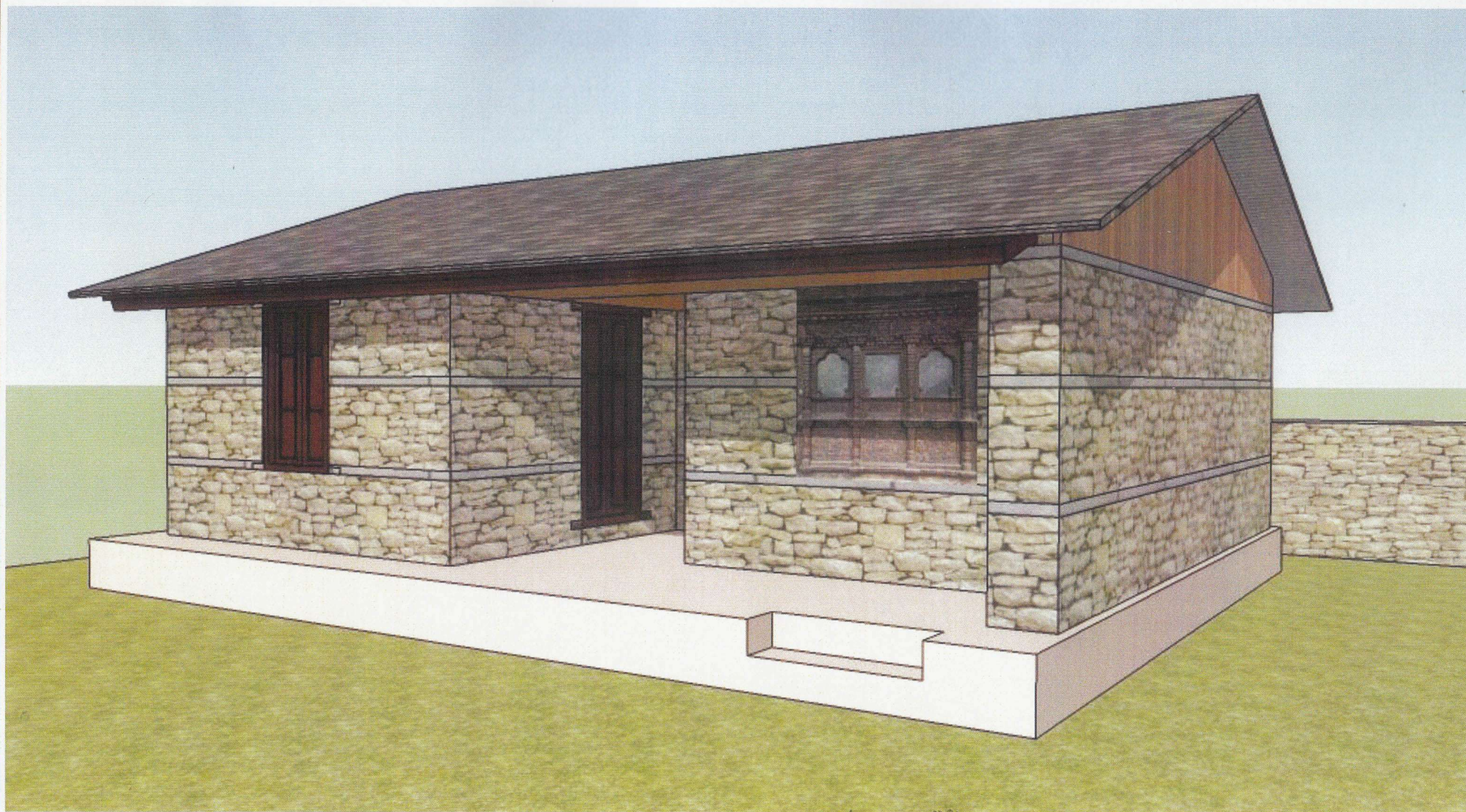
SMC-1

Model SMC-1 is a one storey building called “Mherchya Kuma” which consists of two bedrooms of dimensions 3000x2750, a living room/kitchen of dimension 4650x2700 + 2700x1950.

The design depicts vernacular architecture and traditional lifestyle of Helambhu region and focuses on earthquake resistant construction using locally available construction materials. Similarly, stonemasonry in cement mortar has been used for structural type (as cement can be transported with good road access and residents can afford it with income from tourism), CGI sheet is used for covering the roof along with Metal Truss and purlins. The model has been based on the revised National Building Code of Nepal(NBC) in order to ensure that earthquake resistant construction measures are included. This includes the provision of horizontal bands, vertical reinforcements, corner reinforcement and T-junctions as earthquake resistance elements. Climatic conditions and socio-cultural aspects have also been factored into the design of the house. The design concept and the objective of the design is to vernacular architecture and traditional lifestyle contributing towards resilient models to improve safety in future earthquakes.

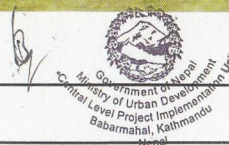
SMC-1





Nepal Housing
Reconstruction Programme

TYPE OF HOUSE: MODEL SMC-1
DRAWING TITLE: PERSPECTIVE VIEW



SCALE: NONE

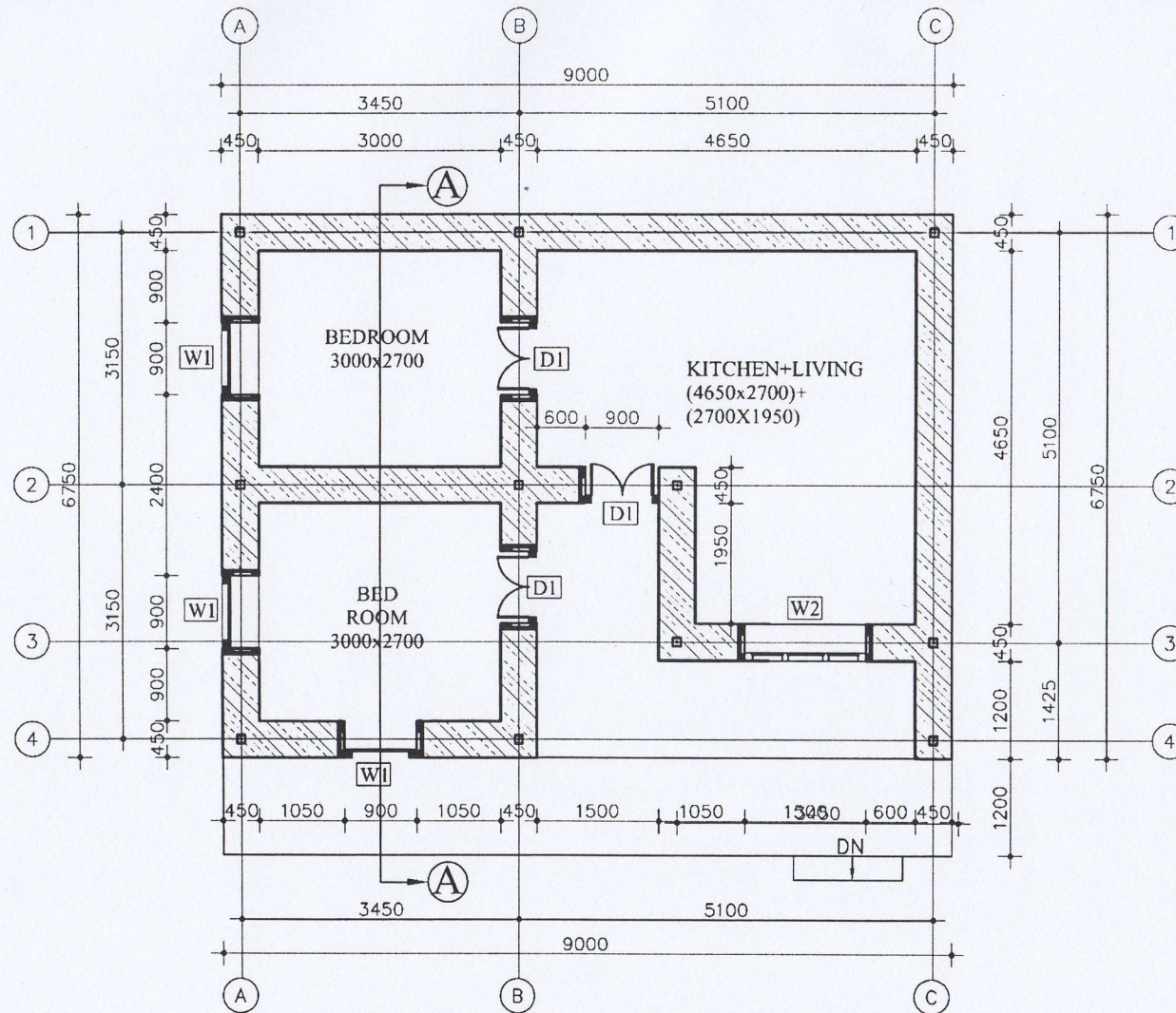
DATE:

Aashraya

नेपा SMC-1

DESIGNED BY: Aashraya Nepal

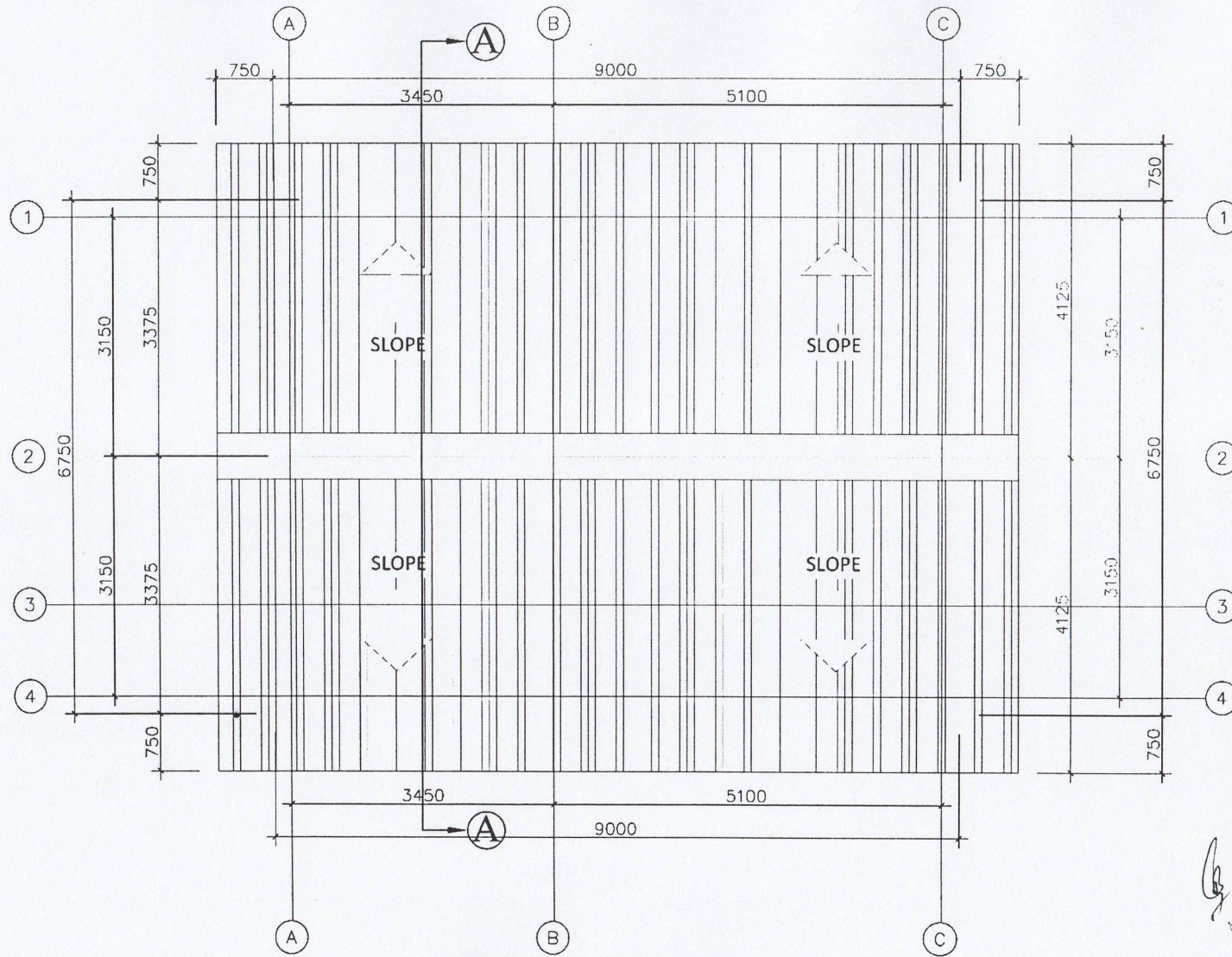
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GROUND FLOOR PLAN

60.75 SQ M





ROOF PLAN



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Reconstruction Programme

TYPE OF HOUSE: MODEL SMC-1

DRAWING TITLE: PLAN

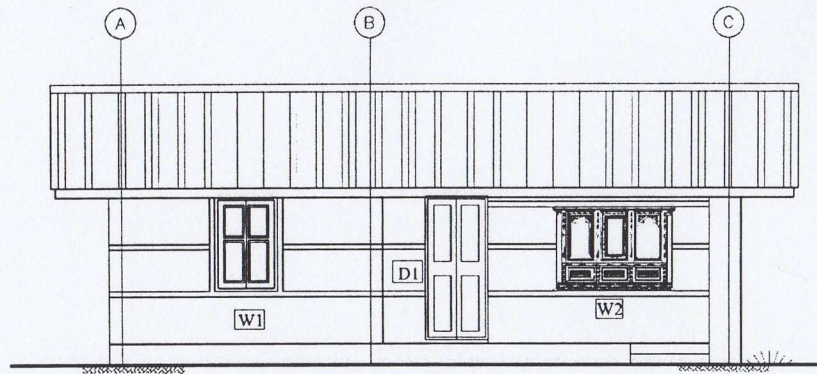
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DATE: Aashraya

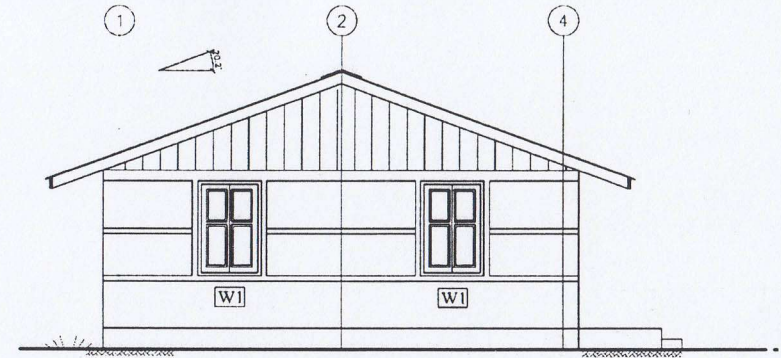
DESIGNED BY: Aashraya Nepal *[Signature]*

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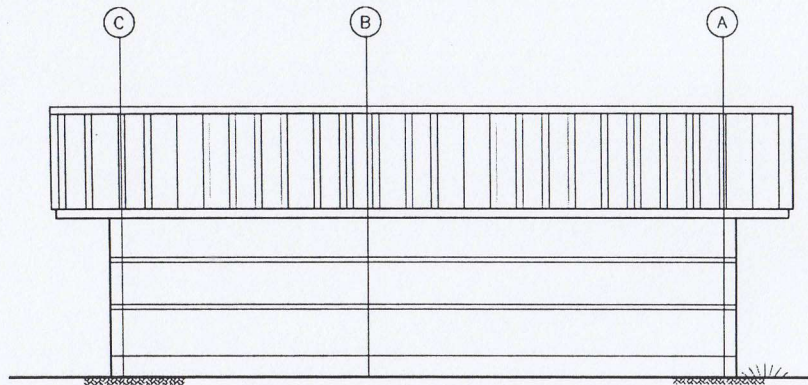
3/13



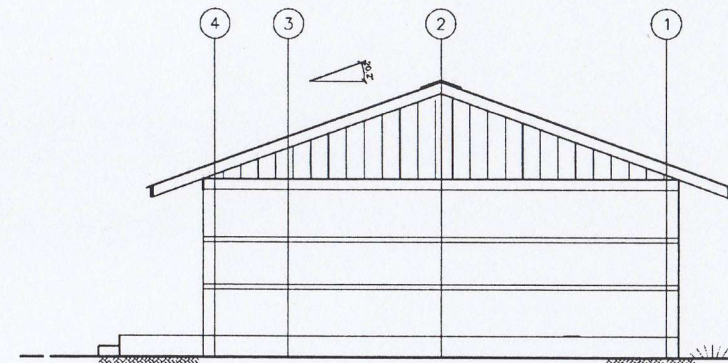
FRONT ELEVATION



RIGHT ELEVATION



BACK ELEVATION



LEFT ELEVATION

Government of Nepal
Ministry of Urban Development
Central Level Project Implementation
Babarmahal, Kathmandu
Nepal



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Reconstruction Programme

TYPE OF HOUSE: MODEL SMC-1
DRAWING TITLE: ELEVATIONS

SCALE: 1/100

DATE:

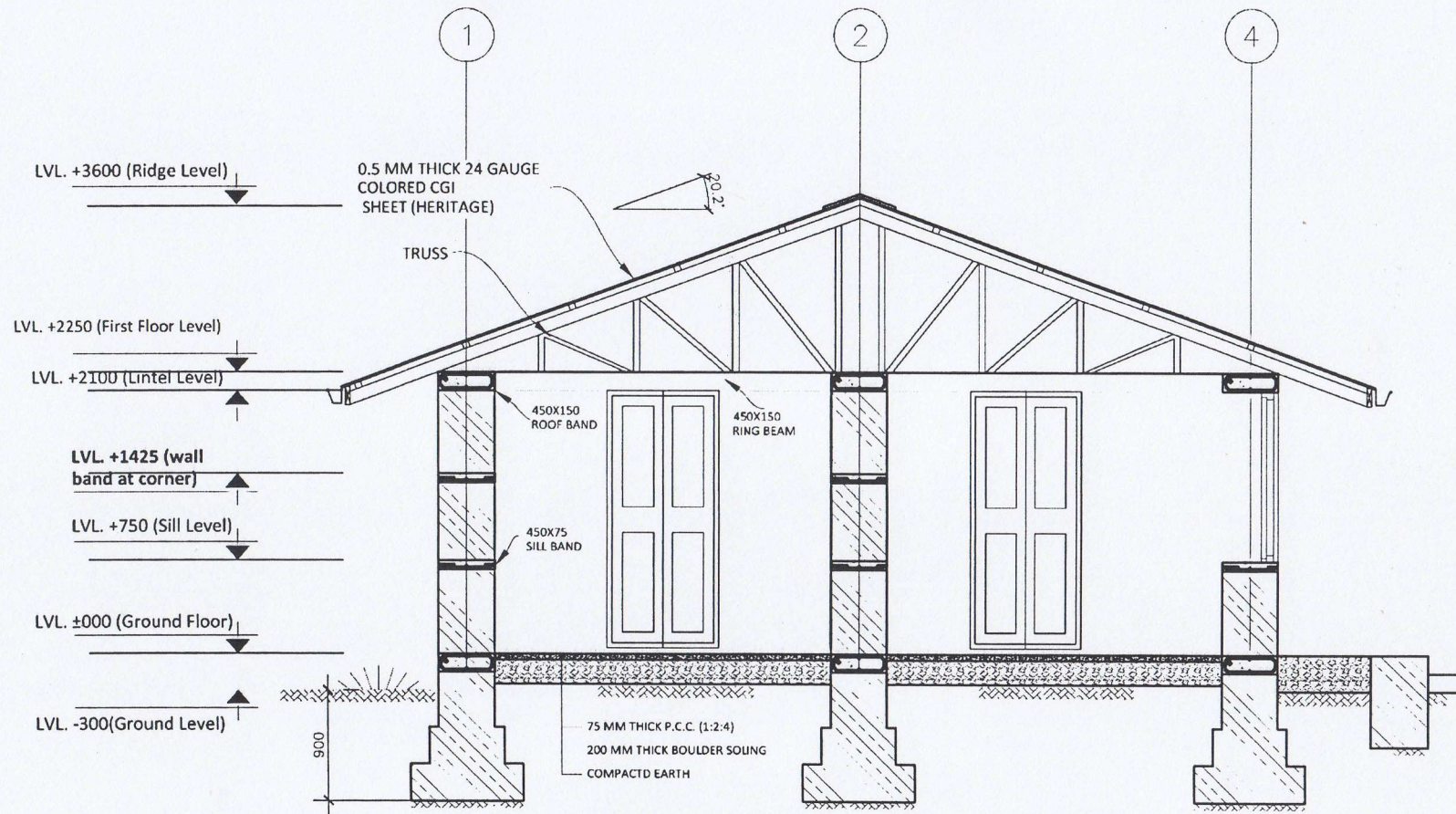
DESIGNED BY:

Aashraya Nepal

Aashraya

SMC-1

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SECTION AT A-A



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Reconstruction Programme

TYPE OF HOUSE: MODEL SMC-1
DRAWING TITLE: SECTION

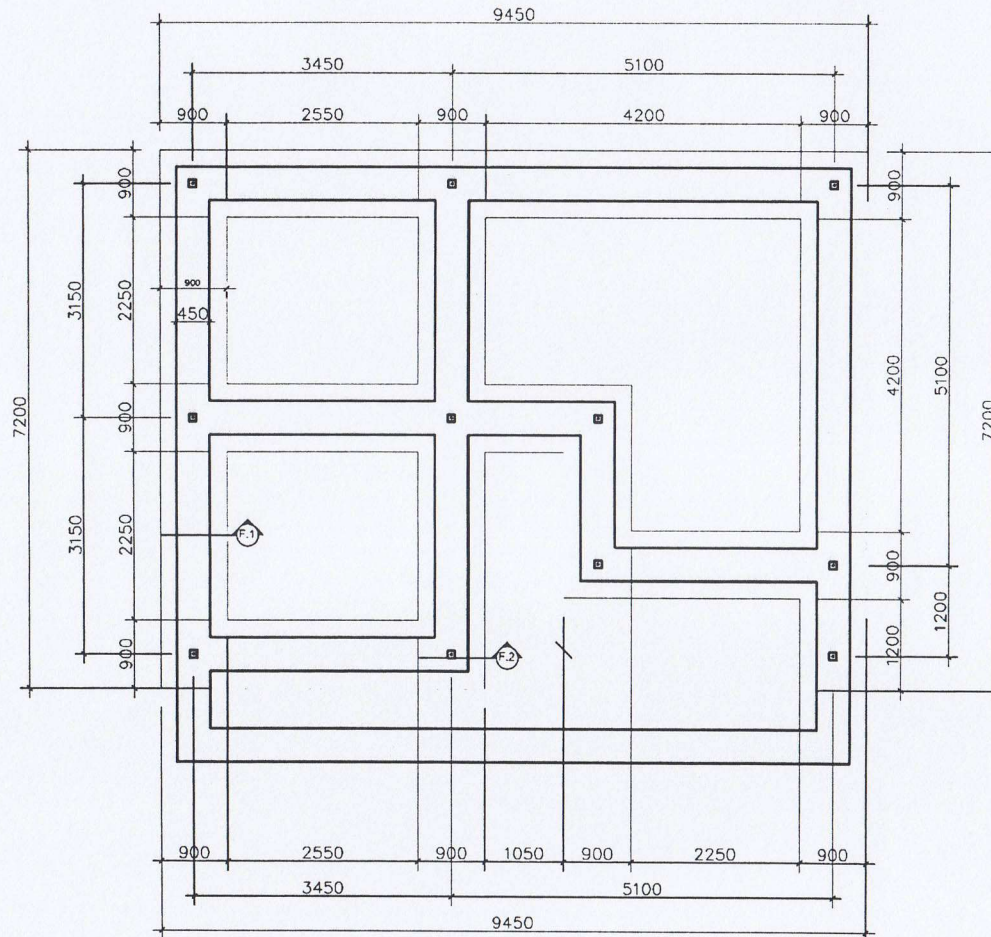
SCALE: 1/50

DATE: 2073/07/05

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TRENCH/FOUNDATION PLAN



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Reconstruction Programme

TYPE OF HOUSE: MODEL SMC-1

DRAWING TITLE: FOUNDATION DETAIL

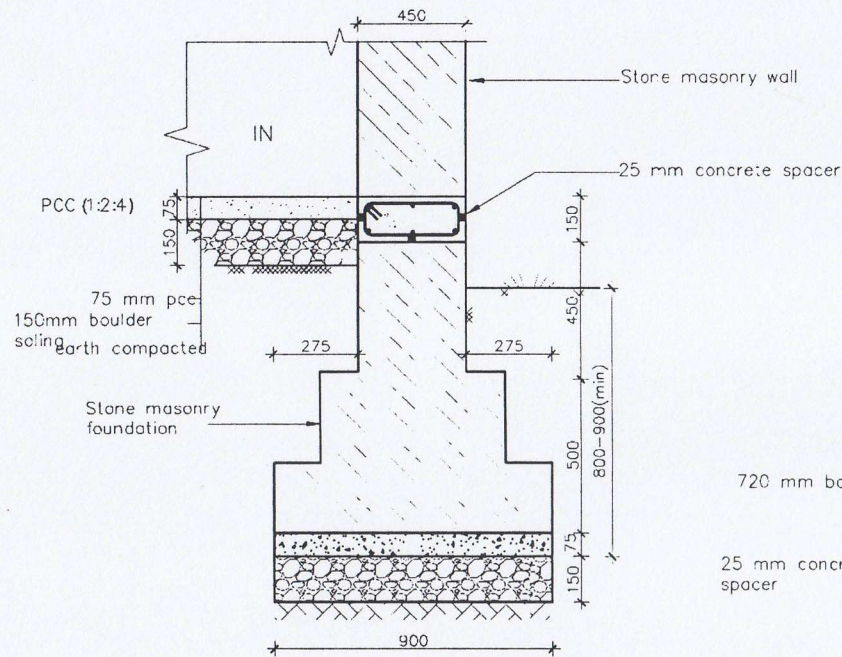
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DATE: AUGUST 2010

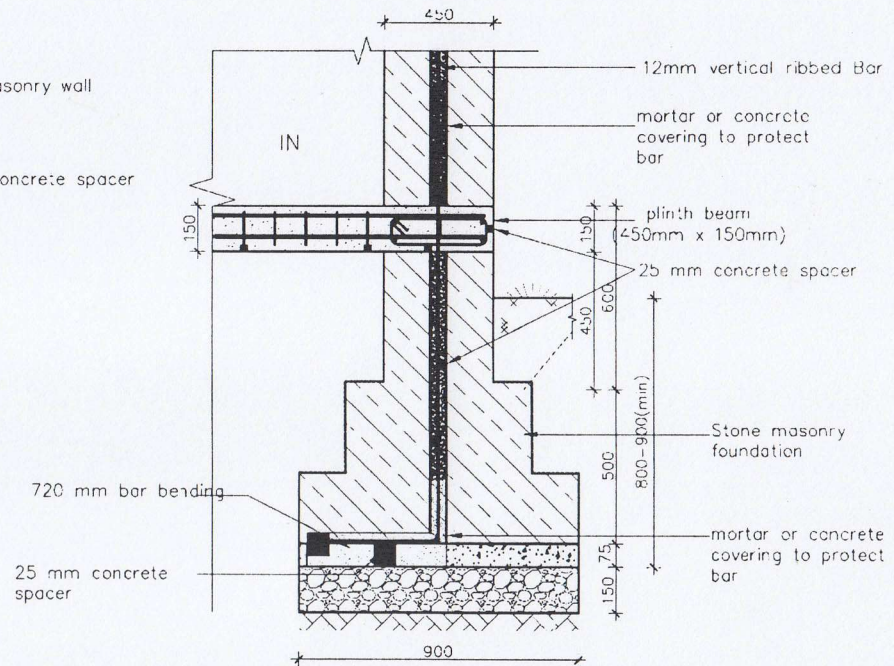
DESIGNED BY: Aashraya Nepal *[Signature]*

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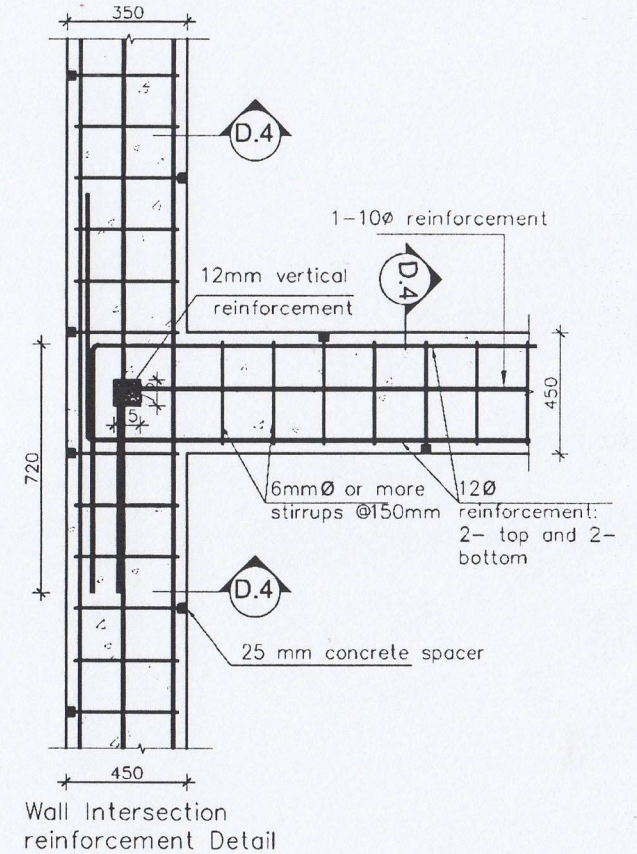
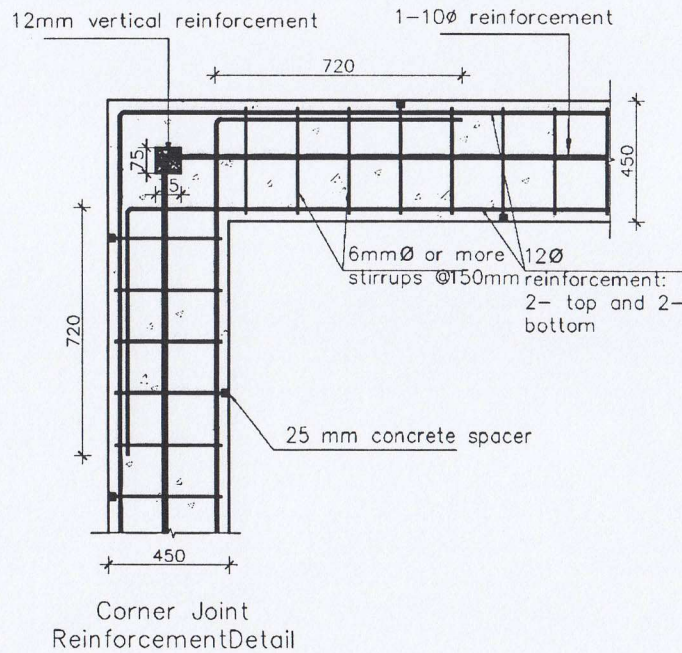
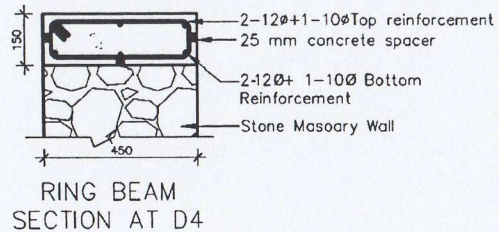
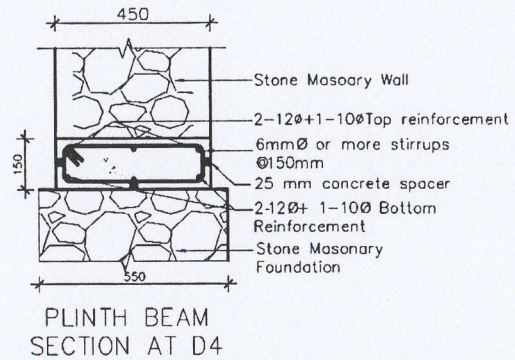


FOUNDATION DETAIL SECTION AT F-1

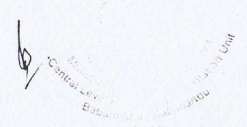


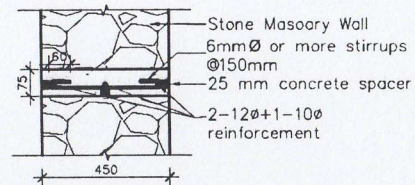
FOUNDATION DETAIL SECTION AT F-2 VERTICAL BAR DETAIL



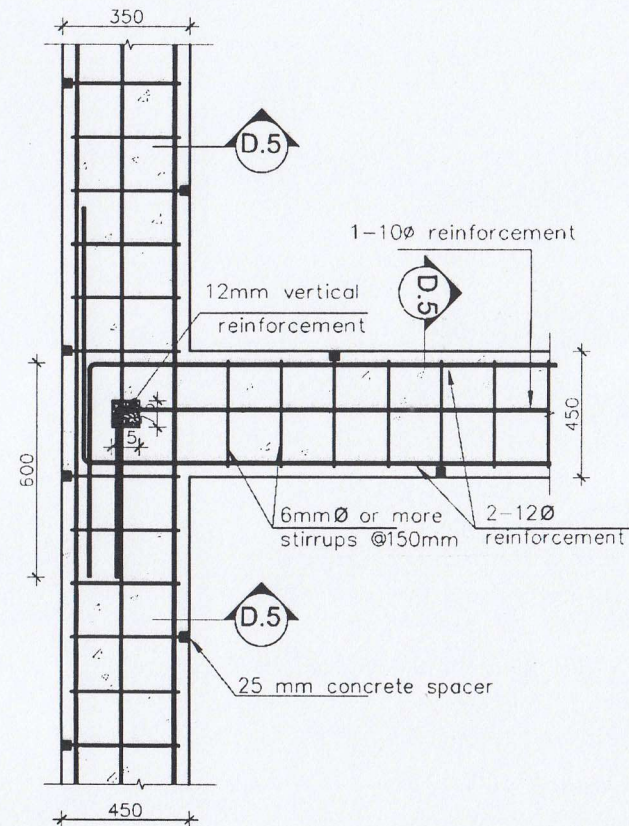
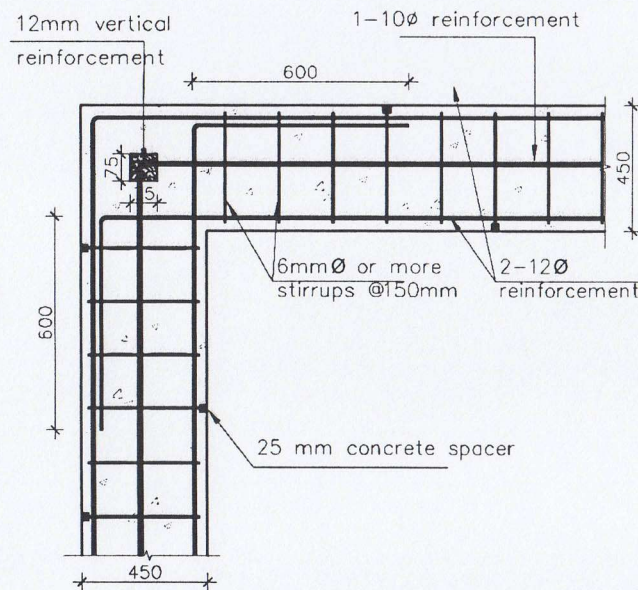


PLINTH BEAM AND RING BEAM DETAILS





SILL BEAM SECTION AT D5



SILL BAND AND WALL BAND DETAILS

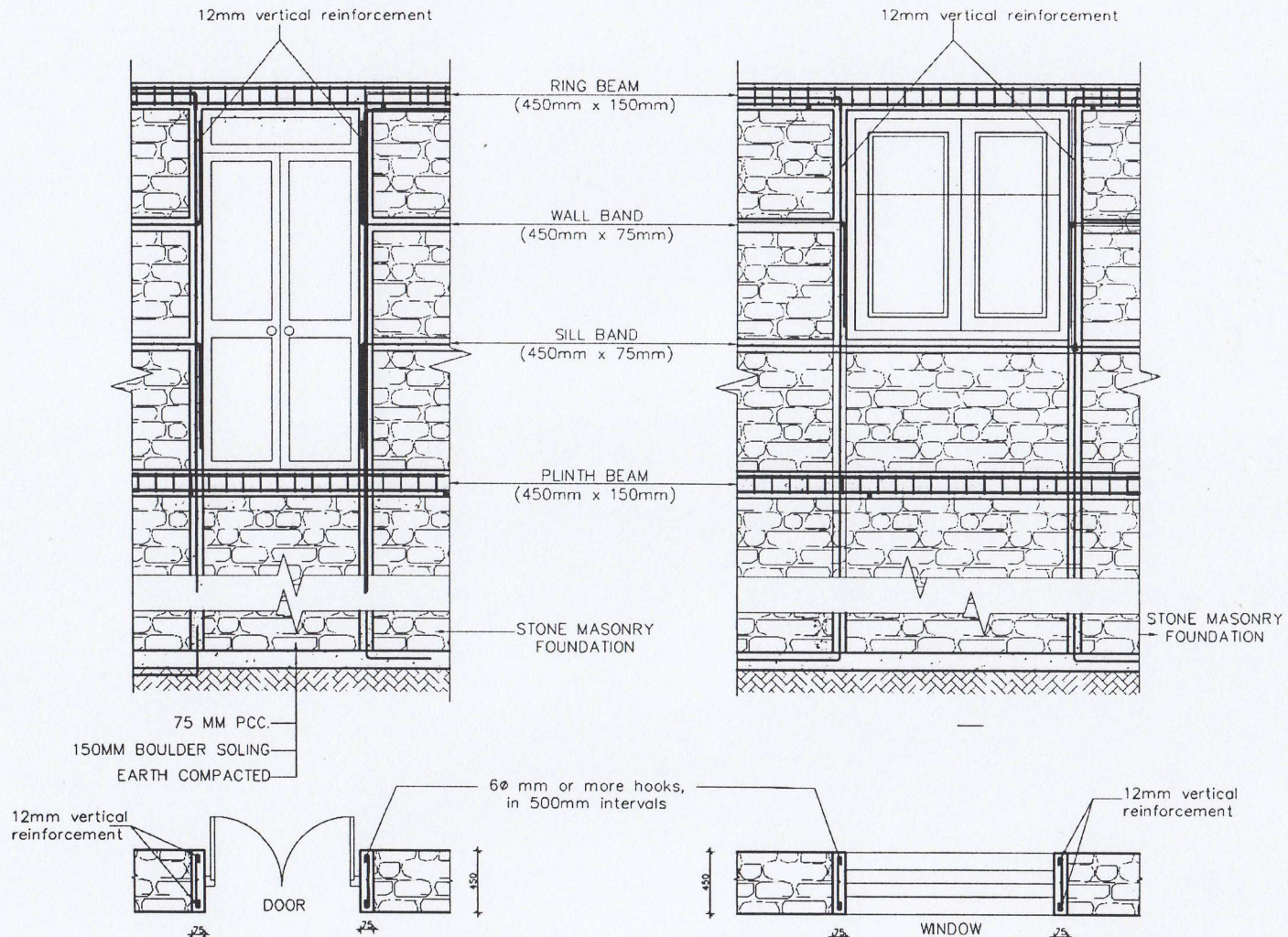


Nepal Housing Reconstruction Programme

TYPE OF HOUSE:	MODEL SMC-1
DRAWING TITLE:	SILL AND WALL INTERSECTION

SCALE:	1/10	DATE:	
DESIGNED BY:	Aashraya Nepal <i>[Signature]</i>		

SMC-1
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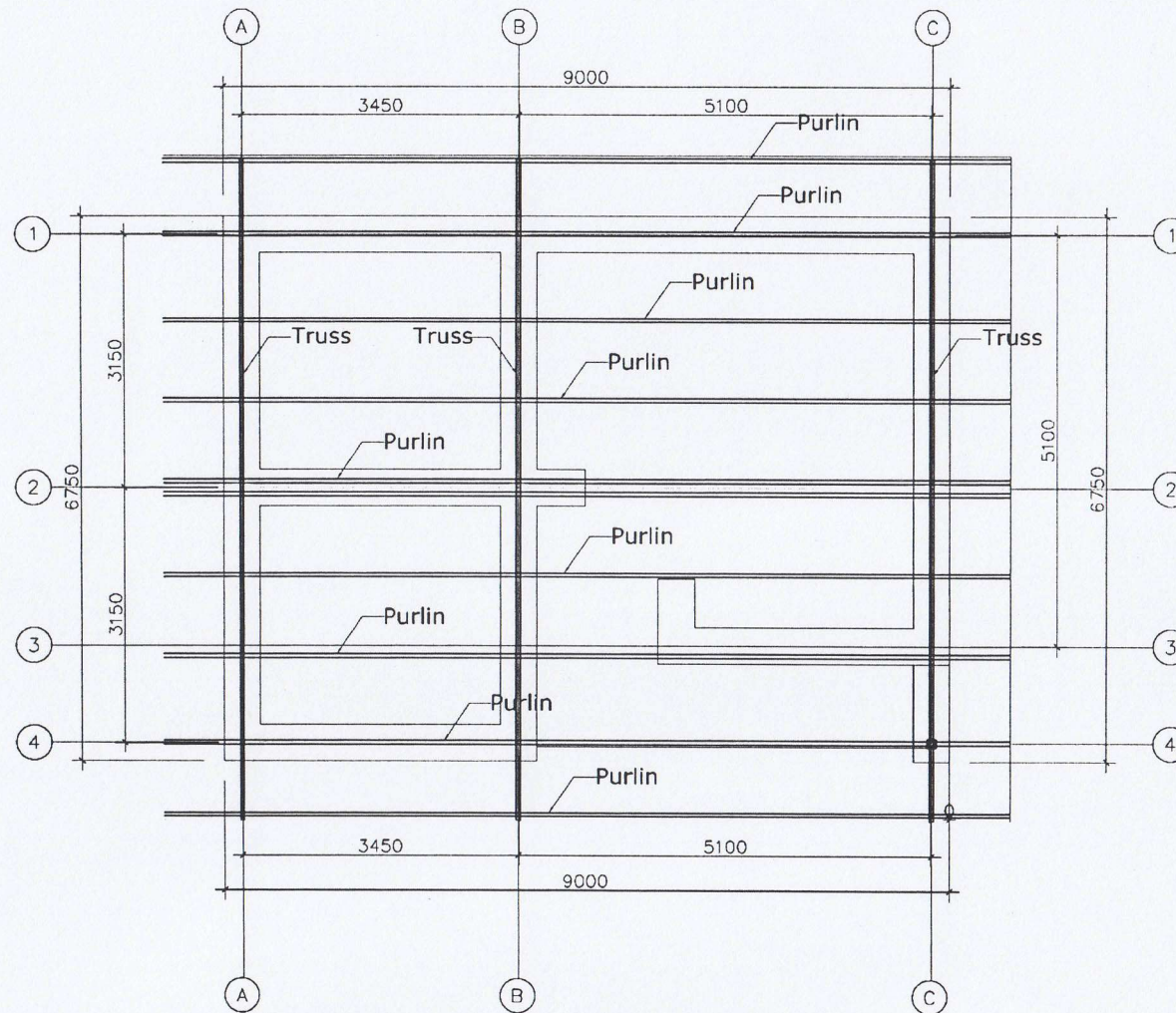
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Reconstruction Programme

TYPE OF HOUSE:	MODEL SMC-1
DRAWING TITLE:	DOOR AND WINDOW BEAM TIE

SCALE:	1/10
DESIGNED BY:	Aashraya Nepal <i>[Signature]</i>

DATE:	2078/01/10
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SMC-1
10/13



TRUSS PLACEMENT DETAIL

SCALE 1:100

Handwritten signature
 Babarimal, Kathmandu
 Nepal



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TYPE OF HOUSE: MODEL SMC-1

DRAWING TITLE: ROOF TRUSS

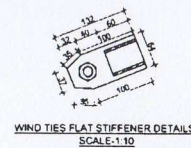
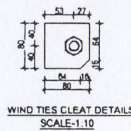
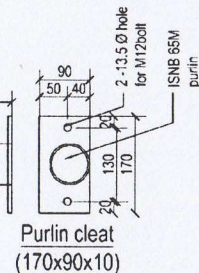
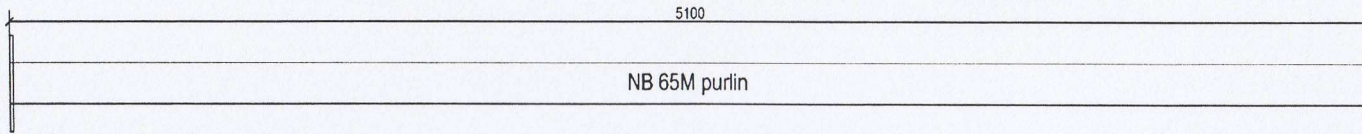
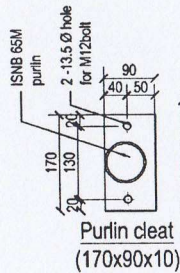
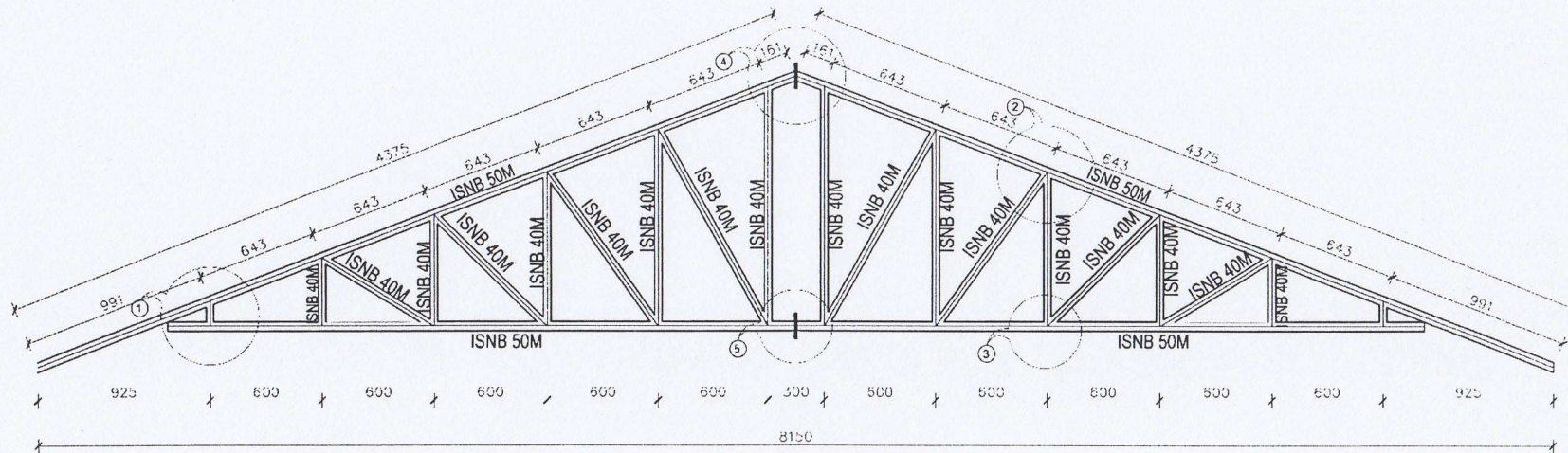
SCALE: 1/10

DATE:

DESIGNED BY: Aashraya Nepal *Handwritten signature*

SMC-1

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Nepal Housing
Reconstruction Programme

TYPE OF HOUSE: MODEL SMC-1
DRAWING TITLE: ROOF TRUSS

SCALE: 1/50

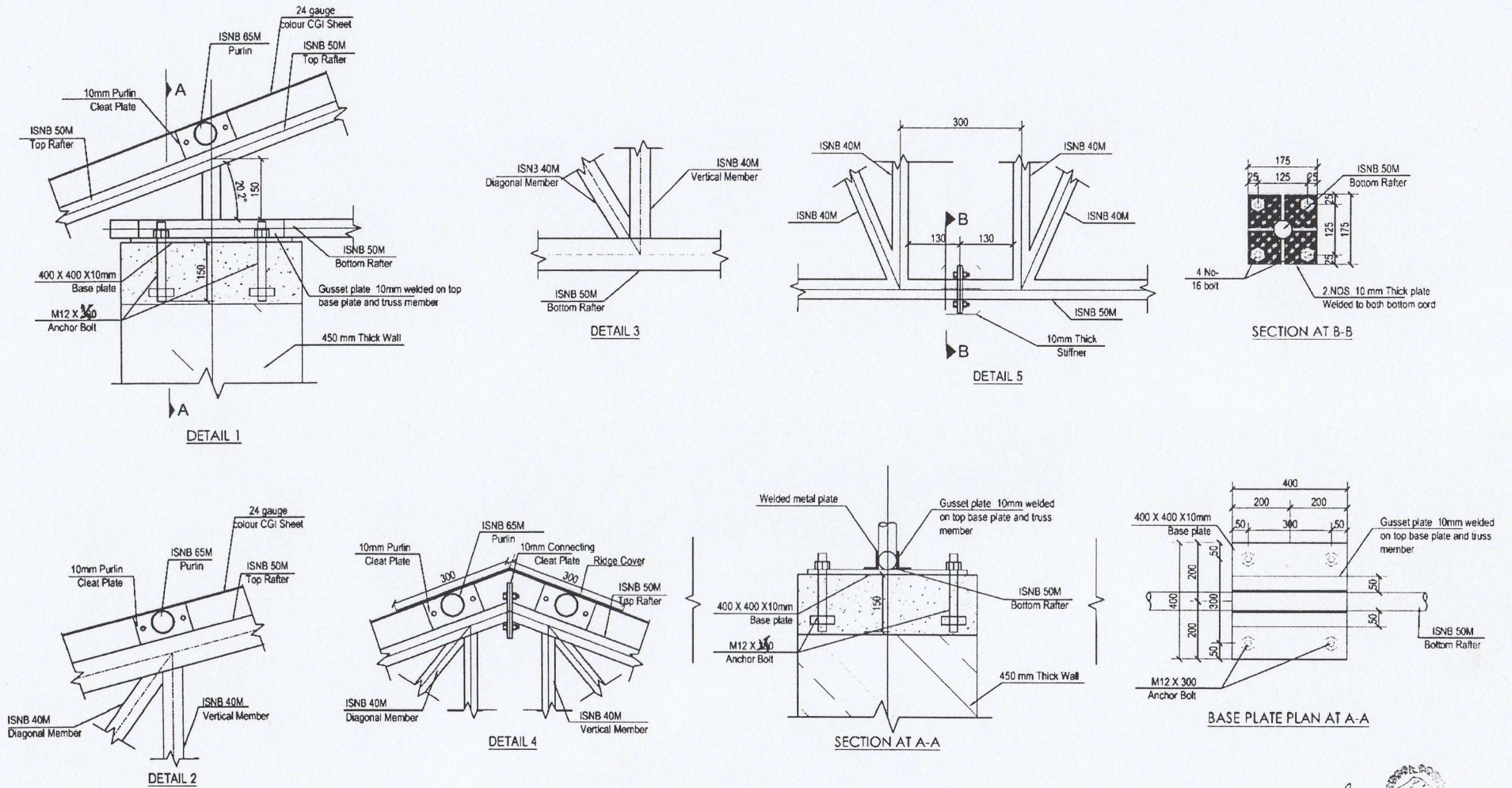
DATE:

DESIGNED BY:

Aashraya Nepal *[Signature]*

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12/13



TRUSS JOINT DETAILS



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Reconstruction Programme

TYPE OF HOUSE: **MODEL SMC-1**
DRAWING TITLE: **ROOF TRUSS**

SCALE: **1/20**

DATE:

DESIGNED BY: **Aashraya Nepal**

SMC-1

13/13

Aashraya Team

Ar. Kumar Yonjan

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