

## Gorkha Earthquake 2015

# Concept of Technical Assistance for Safer Housing Reconstruction



- **Training courses for capacity development of masons, and other construction workers**
  - **Training for skill enhancement of existing masons**
  - Training for development of new masons: two approaches can be followed -
    - On-the-job training to potential unskilled labors
    - Comprehensive mason training course by CTEVT
  - Advanced training for masons on retrofitting technology
  - Refresher courses

- **Training for skill enhancement of existing masons**
  - Mason training course on stone masonry (5-day)
  - Mason training course on brick masonry (5-day)
  - Mason training course on reinforced concrete (5-day)
  - Mason training course with all three modules (8-day)

- **Training courses for Engineers and Technical Professionals**
  - Trainer development
    - Series of trainer development courses
  - End-user
    - Basics of earthquake-resistant construction
    - Advanced design procedures, calculations (new building, and retrofitting)
- **Training Course for Social Mobilizers**
  - Technical, Social mobilization, Housing reconstruction program

# Instructor Development Process (Master Instructor)

- 1. Attend 7-day Mason Training TOT Course**
- 2. Attend Orientation on "Basic Social Mobilizer Training Course"**
- 3. Attend Orientation on "House-Owners Orientation Session"**
- 4. Attend orientation session on Housing Reconstruction Program/ Policies, Technical Assistance (TA) System, Information and Education Campaign, Database Management System etc.**
- 5. Observe Intensive Mason Training Course (IMT) conducted by senior instructors**
- 6. Observe Basic Social Mobilizers Training Course (SMT) conducted by senior instructors**

# Instructor Development Process

- 7. Observe House-owners Orientation Session conducted by senior instructors**
- 8. Serve as Assistant Instructor for at least one IMT Course**
- 9. Serve as Assistant Instructor for at least one SMT Course**
- 10. Serve as Assistant Instructor for at least one House-owners Orientation Session**
- 11. Attend Training or Instructors (TFI) Course**
- 12. Serve as Full Instructor for IMT, SMT and HOS (observed, evaluated and certified by senior Instructors)**

**Can skip few steps to become master instructor on one particular Training Course**

# Summary of courses

Name of training course	Duration of course	Target audience	Main purpose of the course	No. of participant in one course	Pre-requisites for participants	Intended no. of courses in one district	Total no. of courses (3 districts)	Tentative cost per course (USD)
Intensive Mason training course		Working masons, artisans, carpenters and other relevant construction workers	To enhance the skill of existing masons to incorporate earthquake-resistant features in the existing construction practices	32	Practicing Mason Age: 20-45 Able to read and write	75	225	4,000
a) Reinforced Concrete Module	5 days							
b) Stone Masonry Module	5 days							
c) Brick Masonry Module	5 days							
d) Retrofit Module	5 days							
e) All	8 days							
<b>On the Job Training for Masons</b>	<b>1.5 - 2 months</b>	<b>Unskilled workers</b>	<b>To impart the basic skills of building construction as well as skills for earthquake resistant building construction to the unskilled workers</b>	<b>30 in each VDC</b>	<b>Interested young unskilled workers</b>	<b>300 persons</b>	<b>900 Persons</b>	
Mason Training TOT	7 days	Engineers, Sub Engineers, Potential Mason Training Trainers	To enhance the knowledge and application skills on earthquake-resistant construction technology, specially focusing on the mostly prevailing construction typologies and materials  To develop Mason Training Trainers	24	Completed Diploma or Bachelors in Civil Engineering Have 1-2 year experience on building construction	5	15+3 (3 at national level)	4,000
Basic Training for Engineers (BTT)	3	Engineers, Sub Engineers	To enhance the knowledge and application skills on earthquake-resistant construction technology	24	Completed Diploma or Bachelors in Civil Engineering Have 1-2 year experience on		3	2,000

Advanced Training for Engineers (New Construction Design)	5	Engineers	To enhance the skill to analyze and design for RC frame and Masonry house	24	Completed Bachelors in Civil Engineering Have 2-3 year experience on building design. Sound knowledge on design tools and software		2 (at national level)	6,000
Basic Training on Retrofitting	3	Engineers, Sub Engineers	To be able to list different options of seismic retrofitting of RC frame and Masonry house To be aware on different available construction technologies for seismic retrofitting	24	Completed Diploma or Bachelors in Civil Engineering Have 1-2 year experience on building construction	3	9	4,000
Advance Training on Retrofitting	5	Engineers	To be able to analyze and design different options of retrofitting and select most appropriate option for RC frame and Masonry house	24	Completed Bachelors in Civil Engineering Have 2-3 year experience on building design. Sound knowledge on design tools and software Have undergone Basic Retrofitting Training		3	4,000
Social Mobilizers Training TOT	5	Social Mobilizers who will train the large number of social mobilisers required for mobile teams and door to door campaigns	To enhance the skill of existing social mobilizers to further train other social mobilizers on community facilitation on safer reconstruction	24	Completed Bachelors in Sociology, Social Work, Development Studies Have 2-3 years' work experience in social mobilization		5	5,000

Social Mobilizers Training	3	Social Mobilizers/Women Group/Community who will be a part of mobile team and conduct orientation/information dissemination to the house-owners	To enhance the skills in facilitating the community in earthquake resistant construction	24	Completed Diploma or Bachelors in any discipline Have some experience in community mobilization	8	24	6,000
Training For Instructors (TFI)	5	Engineers, Sub Engineers, Social Mobilizers	To develop qualified instructors in the districts who will serve as the Master Trainers for reconstruction	24	Have undergone Mason Training TOT Social Mobilizers TOT	1	3+2 (2 at national level)	10,000
Orientation	3 hours	Community/House owners	To make the house-owners aware on the need of earthquake resistant construction	30	-	2025	6075	20

# Training Plan

Potential Instructors

Instructor Development Process Time Line

End Users Training Courses Timeline

End users as a by-product of instructors development courses

28x3=84

28x3=84 Social Mobilizers

40x3x2=240 Home Owners

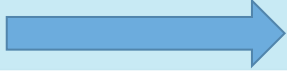
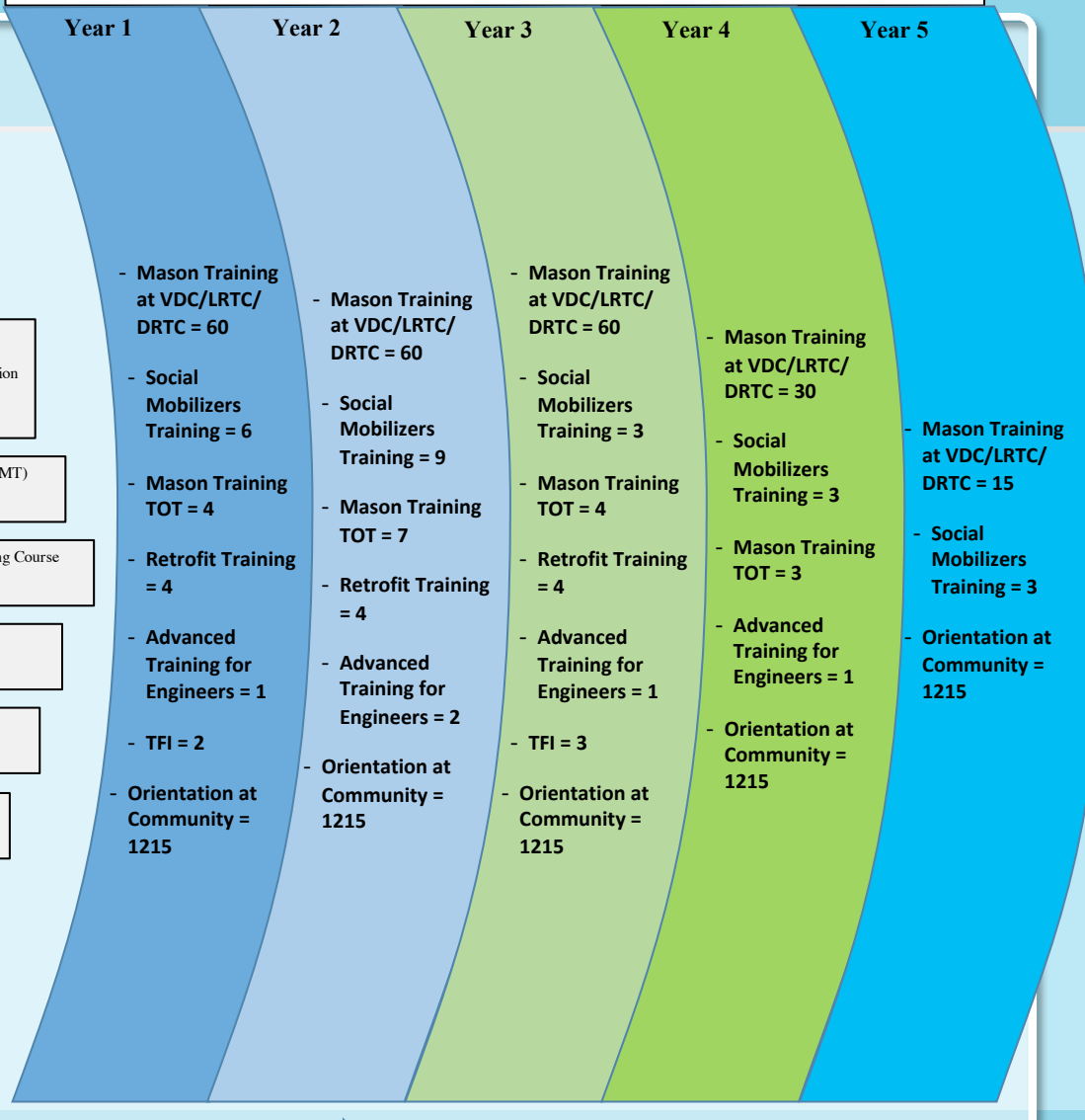
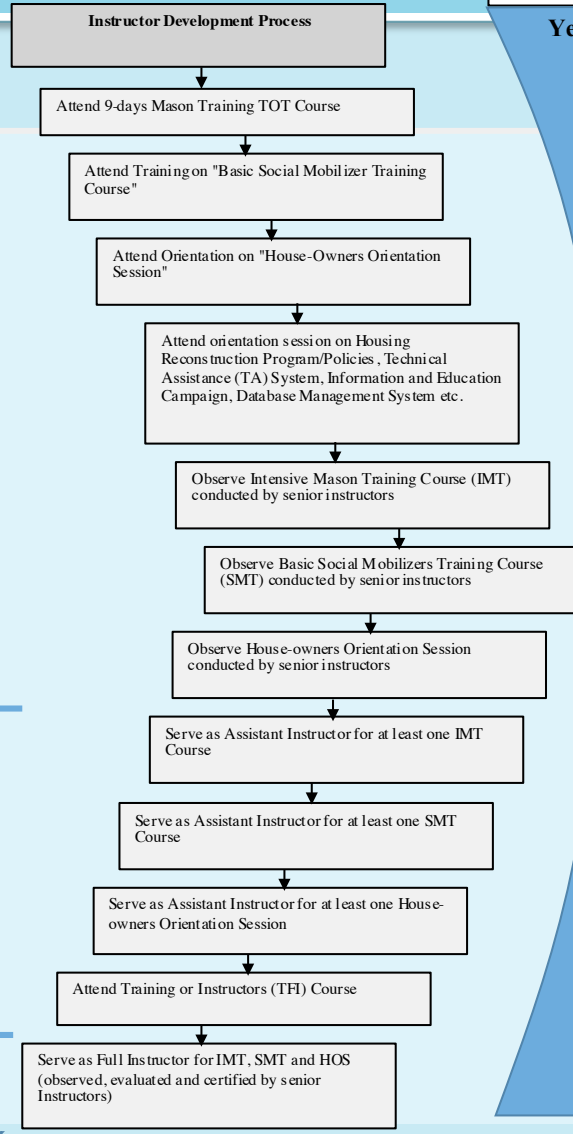
28x3x2=168 Masons

28x3=84 Social Mobilizers

40x3x2=240 Home Owners

Involvement by same potential instructors

28x2=56 Instructors



End Users Courses

**Questions / Comments / Suggestions ...**