Croatia

BUILT ENVIRONMENT:

1.1 INDRA project

INternational Disaster Resilient Architecture

UNESCO HQ developed the INDRA project: a holistic approach towards INternational Disaster Resilient Architecture by learning from vernacular construction.

A safe built environment plays a key role in reducing the risks of disasters caused by natural hazards. Failure of construction can cause both human and economic losses. Informal settlements in Croatia's coastal areas, such as Vir or Rogoznica, might be highly vulnerable to natural hazards. Due to Climate Change, the impact and frequency of these hazards are increasing. At the same time, the pace and volume of present-day urbanization presents key opportunities for safer construction and sustainable development.

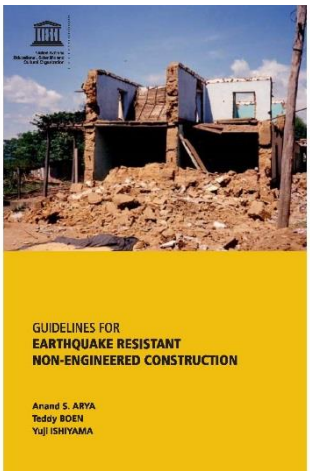
The International Disaster Resilient Architecture (INDRA) project links modern disaster proof construction projects with traditional disaster proof architecture. It aims to highlight the importance of vernacular architecture as a basis for contemporary disaster resilient construction, by learning from traditional practices that were perfectly adapted to local climate and resistant to local natural hazards.

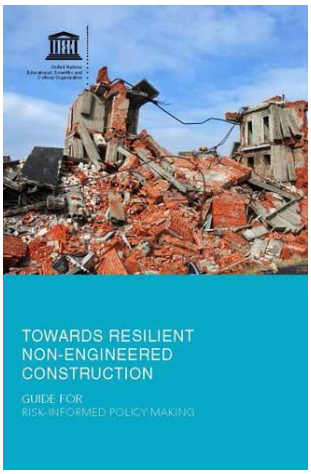
Through the INDRA project, UNESCO aims to build capacity of the local construction sector and thereby stimulating local economy. By using science, technology and indigenous knowledge, innovative sustainable architectural solutions will be developed based on a holistic approach learnt from vernacular architecture. The project will foster involvement and empowerment of local practitioners by raising awareness, stimulating research, facilitating policy setting, fostering collaboration and exchanging knowledge about the significant value of vernacular architecture and the important role of construction to create a disaster resilient environment.

After a comprehensive research and analysis of the local traditional and current practices, a wide range of activities will be implemented according to the local needs:

- training courses
    - for students architecture/engineering
    - for national building personnel or local builders and communities
- development of didactic material for educational purpose
- publication of illustrated technical manuals for local builders
- organizing workshops of building a prototype with local builders/architects/engineers
- development of a policy brief and promotion of local action as a response
- development of a specific didactic module focused on methodologies of the potential of local traditional architecture in reducing disaster risks and including this within the curriculum of all engineering and architectural schools
- facilitate the development of local building regulation for non-engineered construction

1.2 Guidelines





In addition to the INDRA project, UNESCO developed guidelines for informal construction. The first publication 'Guidelines for earthquake resistant non-engineered construction' contains construction tips for practitioners with little or no engineering background.
Recently, we launched a new publication 'Towards resilient non-engineered construction – Guide for risk-informed policy making' at the Habitat III conference in Quito, Ecuador.

More information on these guidelines can be found here: http://www.unesco.org/new/en/natural-sciences/about-us/single-view/news/safer_buildings_for_safer_cities/#.WAZYxcknkeE. Both publications are online available on this website.

The general and basic information from these publications can be integrated in the INDRA project to adapt it to the local context and local needs. We have a wide network of experts to give trainings to communities, masons and local government officials by using these guidelines.

CONTACT:

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