Appropriate and approachable technologies for self-building with raw earth
Interventions in developing countries: some cases studies

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The thesis was born from an internship at a non-profit association that deals with
design and self-building in developing countries. Its main topics are housing
problems and technology in developing countries, and its aim is to conduct studies
on these problems and to look for alternative solutions to solve them in the simplest
and most economical way. The solution of raw ground, more specifically the use of
Blocco Mattone, BTC particular block with grooves and ridges, is analyzed and used
in two different case studies, the first one for a house in Senegal and the second for
a battery of latrines in Guinea.
The case study in Senegal, deals with the design of a building for residential use,
whose rectangular and simple shapes are designed to be easily built by the local
population. The main materials adopted are: reinforced concrete (solely used for the
foundations, which are carefully designed and fitted to safeguard the economy of the
intervention), the Blocco Mattone for weaving walls and a corrugated metal sheet as
a cover.
The second case study in Guinea, takes shape from a careful study of the sanitary
problem in developing countries and suggests a solution of latrine for the village
community in question.

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