# The housing co-operative sector – using timber for sustainable development



### The housing industry and the housing co-operative sector: concern for people and planet

The housing industry is a major consumer of natural resources. In developed countries, housing accounts for about one third of construction industry activity. Timber frame housing represents approximately 70% of the total housing stock. Timber is also used extensively in repair and maintenance work. In some countries such as Australia, Canada, Norway and Sweden, the market share for timber frame construction is more than 90%. The co-operative housing sector is not the largest provider of housing. It is, nevertheless, an important player. Globally housing co-operatives manage approximately 20 million dwellings. ICA Housing and CECODHAS - Housing Europe data shows that approximately 10% of Europe's population, some 20 million people, live in housing co-operatives.









#### Timber frame construction is sustainable

Timber and other forestry products are natural, renewable resources for the housing and construction industry.

Trees are net consumers of  $CO_2$  during their growth and are vital 'carbon sinks' that help counteract the effects of carbon emissions from the burning of fossil fuels. Timber frame construction has the lowest  $CO_2$  cost of any commercially available building material. Research indicates that the production of timber frame walls consumes around 58% of the energy input required to produce lightweight block walls and 38% compared to concrete. Every cubic meter of wood used in housing saves 0.8 tonne of  $CO_2$  from the atmosphere as compared to other building materials.

Timber is needed for, and should be used for, housing construction. But, for the sake of people and the planet, it must be sustainably sourced and used in a way that does not destroy the world's forests and woodlands.

Based on information from the FSC International and the UK Timber Frame Association websites and, the publication Sustainable Homes: Timber Frame Housing by Simon Palmer, The Palmer Partnership

#### Sustainable under certain conditions





Timber must come from well managed forests to be sustainable in the long run. Well managed forests are those where the principles of sustainability are applied, as defined by reputable organizations such the Forest Stewardship Council (FSC) or the Programme for the Endorsement of Forest Certification (PEFC) International. This ensures that, by independent third party certification throughout the entire forest supply chain, timber and non-timber forest products are produced with respect for the highest ecological, social and ethical standards.

Certified timber is environmentally sustainable. Harvesting is done in a way to minimize waste and damage. Wildlife habitats and flora are protected to preserve biodiversity. Certified timber contrasts sharply with illegal logging, a major driver of deforestation. Deforestation causes soil erosion, desertification, flooding, loss of biodiversity, and increases the risk of unsustainable concentrations of greenhouse gases in the atmosphere. Sustainable forest management helps reduce flooding risks and combat global warming, with all the attendant adverse climate change impacts it brings.

Certified timber is also economically and socially sustainable. The World Bank estimates the global market value of losses from illegal logging at over US\$10 billion per annum and the loss of revenue to governments of around US\$5 billion per annum. Sustainable sourcing works with the communities living with and in forests not against them. Communities become active participants in the implementation of forestry management programs and reap their share of the benefits.

## Make a difference: Use Certified Timber and Forestry Products