









Introduction

Wouter Klijn

Member of board of association since 2010
Partner of Leonardo group (STEP)
Straw bale trainer / advisor

Active with website and forum

Straw bale constructions & details & building physics

wouter@strobouwer.nl











Introduction

Strobouw Nederland: what brings 2015>

Some buildings of the time-line in The Netherlands

- Why don't we need Straw bale Codes
- Do we keep on building as self builders
- Can we accelerate towards mainstream
- Do we need more training / education









History . .

Heeze, Jan Gubbels: 1942 - 1944



No bricks?
Use straw!









History . .

Heeze: 1960 « renovation »

Demolition of first NL stawbale building. Exchange of straw for bricks.





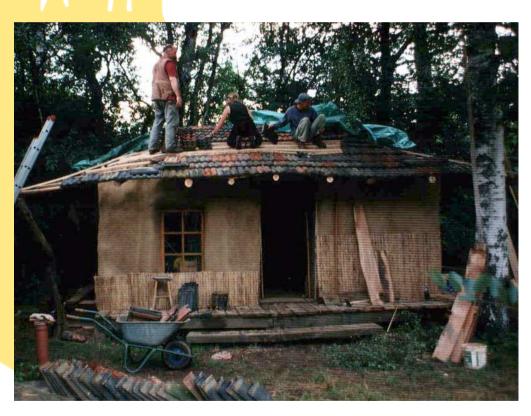






History..

50 years later: Swalmen 1998: Main-stream: experimenting with straw



Time to start with Straw experiments









History . . 1998

Ouwerkerk, W.J. van Dort

First straw bale house with building permit



Steel inside the

First earth plaster, exchanged withlime plaster









History . . 1999

Koudum,











History . . 2002

Floriade, Hierden,

CUT technique of Tom Rijven





Build as loadbearing without load, with rod-ends through the bales









History . . 2003

Starting year of "strobouw-group"

Markelo: Robert W. Jansen



Selfbuilder

Steel inside the straw is insulated.









History . . 2004

Den Haag, Maarssen, Warns

Start of focus on: lime plaster on the outside











History . . 2005

Amsterdam IJburg, Edwin Smit (Q-woning)





Wooden post (235x38) in-between every bale on edge.









History . . 2006

Almere, Kampen, Emmeloord

Selfbuild, posts with bale on edge





Prefab: wood with fermacel at inside

Straw mounted at Outside with rope



Selfbuild: large wood construction, filled with bales flat between small double posts.









History . . 2008

Amsterdam IJburg, Rene Dalmeijer,

first prefab panel house













History . . 2009

Well, Veghel, Haps



Large construction, straw flat



Two projects in CUT: started as workshop with Tom Rijven











History . . 2010

Cuijk, Den Haag, Breda

Loadbearing temporary
Build with volonteers





Large construction



Bales on edge Between double posts



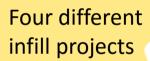






History . . 2011

Weesp, Wijhe, Halle, Gaanderen



















History . . 2012

Bussum, Olst, Amsterdam,



Prefab boxtype straw panel.

Two infill straw constructions













History . . 2013

Steenwijkerwold, Haaren

Infill bales flat between double posts
High performance in air-teightness





CUT technique semi loadbearing









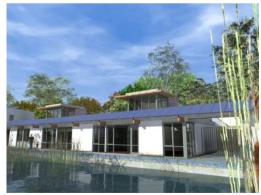
History . . 2014

Nijmegen, Gelselaar, Heerhugowaard Loadbearing with profiled bales





Two infill constructions with posts and OSB at outside, profiled straw bales at inside, plastered.



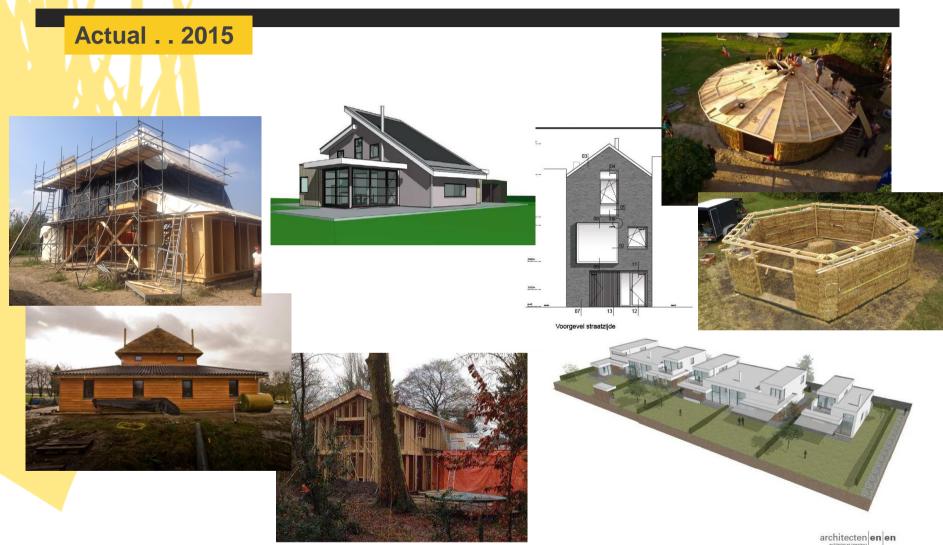
Self made I-beams, straw on edge covered with softwood board

















2016 > ?

Construction Systems over the last 10 years:

- Infill straw between posts (single, double, I-beam, etc)
- Only small devepoment in prefab (self made panels, straw panels)
- Last year some projects with OSB at outside (higer risk?)
- Small scale development in straw-panels

Who is building with straw:

- Selfbuilders / with help of more experianced builders
- Main structure by contractor and infill by selfbuilders
- Only a few contractors build with straw

How do we learn to build with straw:

- Workshops, internet, books . . .
- _ '









What can we do best?

Our main objective as an assosiation is: « support development by creating opportunities »

My question for the ESBG-2015 is: In what direction can I support NL?

Suggestions found at this meeting are:











Tank you



Any question or advise?

Please contact me at wouter@strobouwer.nl

www.strobouwer.nl www.strobouwforum.nl





