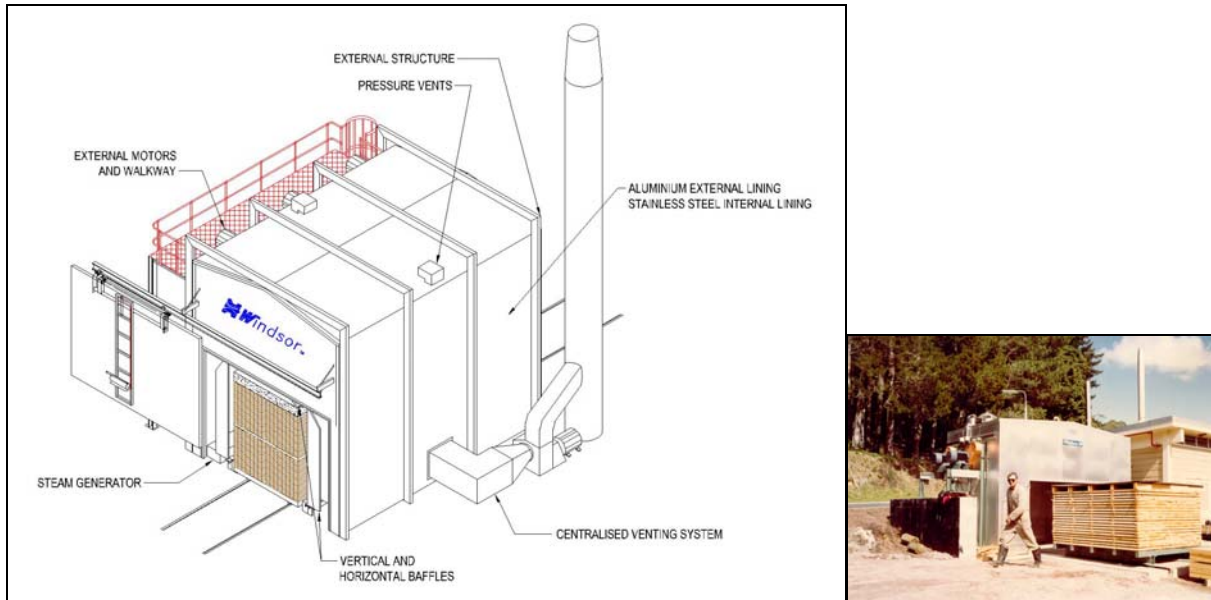


THERMAL MODIFICATION KILN SYSTEMS - TMK



Thermal modification of timber

Timber subjected to a thermal modification process results in an environmentally friendly and stable product without the use of chemicals.

The molecular structure of timber, softwood or hardwood, is changed by this process to create a product which has increased resistance to insect and fungal attack, is "darker" in colour and is less prone to shrinkage and swelling.

The process

Thermal modification of timber is a four phase process and takes place at very high temperature and high humidity conditions:

- Drying - target less than 2% moisture content
- Thermal modification
- Cool down
- De-stressing and conditioning

Kiln temperatures can vary from 130°C to 260°C dry bulb, depending on the timber species and the desired colour requirement.

Windsor TMK kiln design features

Windsor TMK kiln systems incorporate the following base designs:

- Heater coils sized for dry bulb set-points of up to 260°C.
- Internal steam generator sized for humidity control and full conditioning.
- Water spray systems for the "cool down" phase.
- Inert kiln atmosphere for fire retardation.
- Stainless steel internal construction, aluminum external lining and external structure.
- Variable control central vent system with energy recovery options.
- External fan motors with walkway.
- Dryspec and DryTrack MC control systems.