Embodiments of the invention reduce problems related to the production and transport processes of currently available thermal timber modification kilns.

According to a first aspect of the present invention, there is provided a method for manufacturing a thermal timber modification kiln, the method comprises making plate modules from steel plates, the modules comprise a panel section and edges, the edges comprise end and side sections, first flaps between the panel and the sections, and overlays, and, the first flaps between the panel and the sections are formed such that the sections are folded inwards in such a way that the folded sections present the first flaps at some angle with the panel, method further comprises forming second flaps between the sections and the overlays such that the overlays are folded outwards in such a way that the folded overlays are substantially parallel to the panel and present the second flaps at some angle with the sections, and the first and second flaps enable adjacent modules to be interconnected for constructing a kiln frame.

According to a second aspect of the present invention, there is provided a plate module for manufacturing a thermal timber modifica-tion kiln, said module is made by the above method and comprises a panel section and edges, the edges comprise end and side sections, first flaps between the panel and the sections, and overlays, the sections are folded inwards in such a way that the folded sections present the first flaps at some angle with the panel, and the overlays are folded outwards in such a way that the folded overlays are substantially parallel to the panel and present second flaps at some angle with the sections, and the first and second flaps enable adjacent modules to be interconnected for constructing a kiln frame.

According to a third aspect of the present invention, there is provided a thermal timber modification kiln, which has its frame con-sisting of plate modules and which is manufactured by a method the above method, each modules comprising a panel section and edges, the edges comprise end and side sections, first flaps between the panel and the sections, and overlays, the sections are folded inwards in such a way that the folded sections present the first flaps at some angle with the panel, and the overlays are folded outwards in such a way that the folded overlays are substantially

parallel to the panel and present second flaps at some angle with the sections, and the first and second flaps enable adjacent modules to be interconnected for constructing a kiln frame.

A method according to one embodiment, which is intended for manufacturing a thermal timber modification kiln, comprises constructing plate modules from steel plates by forming the plate edges with flaps that enable adjacent modules to be interconnected for a kiln frame.

In a plate module according to one embodiment, which is intended for manufacturing a thermal timber modification kiln, the edges of a module constructed from a steel plate are formed with flaps that enable adjacent modules to be interconnected for a kiln frame.

In a thermal timber modification kiln according to one embodiment, the kiln frame is manufactured of plate modules, which are constructed from steel plates by forming the plate edges with flaps that enable adjacent modules to be interconnected.

Brief description of the figures

The detailed description of the figures will deal with exemplary embodiments of the invention more precisely with reference to the accompanying figures, in which

fig. 1 shows a flowchart for a method of manufacturing a thermal timber modification plant,

figs. 2a-2f show from various perspectives a steel plate cut for folding a plate module, as well as a complete module with folded flaps, and

figs. 3a-3b show from a side and obliquely from the front a thermal modification plant constructed from plate modules.

Detailed description of the figures