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(54) DEVICE FOR SAWN TIMBER DRYING

VORRICHTUNG ZUR TROCKNUNG VON SCHNITTHOLZ DISPOSITIF DE SÉCHAGE DE BOIS DE SCIAGE

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Technical field

[0001] The invention relates to the field of woodworking industry. A new device for drying of sawn timber is resolved. The device according to the invention is suitable especially for drying of sawn timber in chocks.

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Background Art

[0002] The problems of wood drying are connected to sawn timber first of all. As sawn timber is meant the wood after cutting to pieces, which is in a form of so called trimmed sawn timber or non-trimmed sawn timber after primary treatment by the way of cutting to pieces or which is in a form of lamellas, balks, veneer and the like.

[0003] Sawn timber drying depends particularly on temperature, moisture and provision of flow of medium serving for a discharge of moisture during drying. Sawn timber drying is commenced by cutting the original material to pieces in fact when it is under progress in common surrounding under natural conditions. The industrial devices for drying are implemented by the way of drying in chambers or in other determined rooms. The sawn timber is dried in a form of individual pieces or in most cases in a form of so called chocks which are the systems where the sawn timber is laid loose in layers one above another and individual layers are interlaid by so called piling sticks. Each layer of sawn timber creates an areal flat formation and there are gaps created among them by the means of so called piling sticks which gaps serve for circulation of medium which draws discharged moisture off. The bodies of simple form, for example lathes, balks, boards and similar simple items which allow creation of gaps among individual layers of the sawn timber are used as piling sticks. Sometimes there is a weight put additionally on the chock of sawn timber in order to increase an effect of weight influence and thereby to limit undesirable warping of the sawn timber during drying. The processes of drying are constantly forwarded and improved. The drying processes are known from number of documents. The methods of drying as well as methods serving for forwarding and improvement of drying are focused on physically-chemical influence on the sawn timber. This is first of all a choice of suitable surrounding for drying, a temperature, moisture, influence of microwaves, for example according to WO 82/01766, conservation of dissimilar percent of humidity of drying surrounding when compared with the moisture of sawn timber as for example according to WO 82/01411 and the like. These existing methods reach their effect in fact only by the way of creation of fit surrounding for dried sawn timber and devices for implementation of these methods are represented by chambers equipped with means leading to creation of desirable surrounding.

[0004] The disadvantage of existing sawn timber drying devices is the fact that they do not solve the problem

of undesirable breaks in fibres and of warping of form of the sawn timber during drying fully and sufficiently from the point of view of economy. The problem arises in such a way that the dimensions of sawn timber are lessened by drying which results in a creation of breaks in the wood and in creation of cracks and gaps among individual pieces of the sawn timber in the layers of chock. That is to say the decreasing of the dimensions induces tension and movement of material while cracks and gaps arising concurrently among individual pieces of material facilitate warping and breaking and they even help to the fixation of arisen breaks and deformations. Because usually the sawn timber is laid loose in chocks, the piling sticks among the layers of sawn timber cannot prevent undesirable mentioned effects of drying.

[0005] The device of sawn timber drying with the exploitation of creation of certain pressure in a drying room is described in application WO 1999/023429 (PCT/FR 1998/002318). A sealed chamber is pressured to the pressure determined in advance by the way of injecting or by the way of generating saturated vapour and in maintaining such pressure for a predetermined time interval at concurrent conservation of forced circulation of air and saturated vapour in the chamber. Then heating the wood core by emitting of microwaves and drawing off the liquid exudates coming down from the wood to the chamber base where they are collected is implemented. The device according to WO 1999/023429 contains a chamber interconnected with waveguide by the means of windows and equipped with elements serving for creation and preservation of the stated physically-chemical processes in the cavity of chamber. There is a sawn timber found in the chamber which sawn timber is piled on chocks during drying. The chocks are created on the truck which allows the transport from and to the chamber. There is no operation by any mechanical means made on the chocks themselves or on the layers of the sawn timber in the chocks during the process of drying. According to this patent the influence of pressure created by overall increase of pressure in the chamber cavity for a certain period of time has positive effects on the drying process. The document mentions the fact that the pressure increase reaches the limitation of the breaks in wood fibres and reduces the rate of undesirable material deformations.

[0006] It is true that the increase of atmospheric pressure in the room of drying partially limits the breaks of fibres of wood material however in fact the spatial dry shrinkage of material and its consequences are not limited. That is why the consequences of dry shrinkage of material which is accompanied by reduction of volume of dried sawn timber are not eliminated either at this way of drying and at utilization of stated device. There are gaps created among individual pieces of material, pieces laid in the layer side by side, during drying in the same way as at the other existing methods of drying and at existing devices as a consequence of dry shrinkage, and this spatial clearance allows breaking, warping and un-

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desirable crimping of the sawn timber.

[0007] State sawn timber drying devices and methods are described in US 1,576,271, US 2005223590, US 3283412, WO 2005054765. All the showing devices are provided with simply pressure elements, like a spring, piston and so, being situated outside a chock. For instance WO20050504765 is using a pressure element with the spring which pressure element has to be used around a chock. US 2005223590 describe a device providing with pressure elements consisting of pivot arms fixed into bars. The bars are situated outside, in the opposite sides of a chock. US 1,576,271 describe a device providing with a chock consisting of vertical layers of sawn timber. The top end a chock has to be pressed in common with helping spring pressure. The spring instrument is situated outside the chock. The corner stone of most of the found documents is to clamp pieces of sawn timber together during a drying by a device that no undesirable contort affects the sawn timber. All the devices in the found documents are arranged in such a way that they are only able to apply pressure broadly on the whole sides of a chock. In such a case, even if a piston, spring or other device is used, the clamping is only general.

<u>Disclosure of Invention</u>

[0008] The invention removes all the above stated disadvantages to a considerable extent.

[0009] The device according to the invention is suitable for sawn timber drying. The device for sawn timber drying in chocks is of the type in which sawn timber layers are placed and create flat planar formations, and these layers being interlaid with parallel rows of piling sticks. The device comprises:

- at least two piling sticks in the form of oblong bodies with flat thrust faces for propping against the sawn timber, said thrust faces located on opposite sides of the body of each piling stick, the piling sticks being firmly, immovably connected to each other, the piling sticks being in parallel position with a gap between them
- at least one pair of arresting stops being common to a pair of adjacent piling sticks, the arresting stops being situated in the area of the sticks opposite ends, with at least one of these arresting stops being movable, wherein the movable arresting stop has a slide gripping towards the piling stick,
- at least one spring having at least one of its ends fixed to the movable arresting stop for pressing it to the other arresting stop, the spring being located in the gap, wherein

the arresting stops being each provided with at least one pressure face situated against each other in order to induce pressure force on a layer of piled sawn timber, the said pressure face protruding on the same outside periphery of the pair of adjacent piling stick on the side

where its thrust face is located.

[0010] The movable arresting stop is preferably provided with at least one setting element serving for preservation of its position in stretched conditions. The screw, pin or any other common setting element may be used as a setting element which will allows a temporary fixation of the position of the movable arresting stop in stretched conditions in such a way for the piling stick to be able to be put on the sawn timber or for the sawn timber to be piled on the piling stick according to the invention. Then the sawn timber is drawn together by the move of movable arresting stop in the direction to the opposite arresting stop by a simple release of setting element.

[0011] Between the opposite ends of the piling sticks there are at least two movable arresting stops created preferably at one thrust face. Each movable arresting stop is attached to the force element. The solution with two arresting stops when both of them may be movable is advantageous especially at larger dimensions. The number of arresting stops higher than two may be advantageous for large dimensions, for example there may be an immovable arresting stop found between movable arresting stops and the like. This version of solution is suitable especially at larger dimensions, when the piling sticks are longer then usually.

[0012] The piling sticks may be preferably created as rods of tetragonal cross-section which rods are provided with arresting stops in the form of bodies which are also of the shape of rod and which have also tetragonal cross-section. This version is especially advantageous for its practicality and simplicity of workmanship however it does not limit a possibility to execute other shapes according to the intention and possibilities of manufacturer anyhow.

[0013] Preferably at least some of the piling sticks that are located above each other are interconnected with each other. The device with the interconnected piling sticks can exist like the ever-ready unit suitable for inserting or replacing of particular pieces the sawn timber. [0014] The interconnection of at least some piling sticks is detachable, by means of connecting elements for a detachable connection. So attachment of the piling sticks, the ones which do not create a fixed block with an attachment by welded bar or another practical block, is preferably executed as a unit which may be disassembled by the means of connecting elements of the demountable unit as for example bolts with nuts, clips, clamps and the like.

[0015] The chocks with sawn timber are preferably provided with at least another pressure element located on the surface of the body which is created by the chock as a modular unit, namely in functional position to induce a pressure on the chock perpendicularly towards the direction of movement of arresting stops. This may be implemented easily, for example by the means of weights or pistons and rods and so on. Eventually the chock may be also provided with other additional piling sticks which are of the same structure with the arresting stops as the

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piling sticks incorporated in the chock, they are also situated parallelly against each other however along the lateral sides of the layers of sawn timber, perpendicularly to the piling sticks lying on planar surfaces of these layers. These additional piling sticks are then provided with arresting stops and with force elements but the pressure areas of arresting stops of these additional piling sticks are propped on the upper and lower wall of the chock.

[0016] The invention is useable for sawn timber drying, namely both of individual pieces and also of the sawn timber in layers or in chocks. It is suitable for drying of various kinds of sawn timber as for example veneer, lamellas, sawn timber with bark and/or bast, as for example sawn timber from frame-saw as well as sawn timber free of bark as for example floorboards, boards, lathes, balks and others. It is suitable for drying in natural way in a common surrounding of terrain or of halls and also for methods of drying with utilization of drying halls, chambers or tunnels with the use of artificially crated conditions for drying as for example influence of heat, air circulation, decrease or increase of pressure, influence of microwaves, UV radiation and the like. Its main advantage is represented by the compensation of dry shrinkage which prevents creation of undesirable breaks in the wood and undesirable warping of the sawn timber very efficiently. The advantage of the new technical solution according to the invention is represented also by its undemanding character for energy with a possibility to combine the new device with another drying device and methods additionally within a common process and in one period of time. Another advantage is represented by the possibility of its utilization in the field or in free environment, the possibility of the proposed device to be disassembled, its storability as well as a possibility of transport to any place as well as undemanding character for space.

Brief Description of Drawings

[0017] The invention is illustrated using drawings, where shows Fig. 1 view of the example device according to the invention with one dried layer of sawn timber from the top, Fig. 2 view of the same from the front, meaning upon previous picture, Fig. 3 view of the same from the right side, meaning upon previous two pictures. Fig. 4 the same view of the device like Fig.2 but with a chock of sawn timber provided with the pressure elements.

Example

[0018] An example of embodiment of the invention is the device for sawn timber drying according to Figures 1 to 4.

[0019] The drying device which includes also dried sawn timber <u>1</u> for clearness is demonstrated. The device is created in a modular way out of bodies from the connected pairs of piling <u>sticks 2</u> which are distributed parallelly partly on the bottom, under the dried sawn timber <u>1</u> and partly on the dried sawn timber <u>1</u>. There is a section

comprising such a pair of connected piling sticks 2 chosen an illustration in the pictures, such sections are then repeated in all the length of the sawn timber 1 in the same arrangement side by side. The chosen section contains two bodies from connected pairs of piling sticks 2 which are situated above each other. Both these bodies containing a pair of piling sticks 2 are constructed in the same way. First of them is the upper body with a pair of piling sticks 2 lying on the sawn timber 1 on the top and the other one is found under this first one. The piling sticks 2 themselves are of the shape and of dimensions which are known in the branch, suitable for adding to the surface of dried sawn timber 1. They are created as oblong bodies made of steel with flat thrust faces 3 for propping of the dried sawn timber 1 which thrust faces 3 are located on the body of the piling stick 2 from the opposite sides. The ends of piling sticks 2 are welded on the fixed plates which create fixed couplers among them this way and it allows the piling sticks 2 to be fixed side by side in each pair firmly, non-demountable way. One of these plates, in Fig. 1 and Fig. 2 on the right, is at once the fixed immovable arresting stop 4 for the laid sawn timber 1. There is the movable arresting stop 5 found in the area of opposite ends of each pair of interconnected piling sticks 2 which arresting stop is movable towards the pair of connected piling sticks 2. The difference in the position of movable arresting stop 5 of the upper pair of piling sticks 2 is well apparent in the pictures Fig. 1 and 2 at the stretched position of the device when compared with the position of the movable arresting stop $\underline{5}$ of the bottom pair of the piling sticks 2 where there is a sawn timber 1 included. The movable arresting stop 5 is provided with a spring 6 for its forcing down in the direction to the other one of this pair of arresting stops 4,5 which is to the immovable arresting stop 4.

[0020] Both arresting stops $\underline{4,5}$ have a lever pressure face $\underline{7}$ created on them for evocation a pressure power to the laid sawn timber $\underline{1}$. Pressure face $\underline{7}$ protrudes on the outside periphery of the piling stick $\underline{2}$ on its side where there is thrust $\underline{\text{face 3}}$ found. Both two arresting stops $\underline{4,5}$ are located on the same side of the piling stick $\underline{2}$, at the same thrust face $\underline{3}$, and pressure faces $\underline{7}$ of these arresting stops $\underline{4,5}$ are located against each other.

[0021] Each of the demonstrated pair of the piling sticks in the pictures Fig. 1 to Fig. 3 is an independent detachable body. It is possible and also practical due to this fact that each pair of firmly connected piling sticks 2 disposes of created common arresting stops $\underline{4,5}$ and in the gap $\underline{62}$ which means in the space between the piling sticks 2 there is a spring $\underline{6}$ found. This is stretched between the arresting stops $\underline{4,5}$, where it is fixed to the movable arresting stop $\underline{5}$ by one end and to the immovable arresting stop $\underline{4}$ by the other end. The movable arresting stop 5 is provided with the bolt with nut in the position of setting element $\underline{8}$ for keeping its position in stretched conditions, which allows an easy storage of damp sawn timber $\underline{1}$.

[0022] The piling sticks 2 are created in a simple prac-

tical shape as rods of the tetragonal cross-section and they are provided with arresting stops 4.5 in the form of plates which are also of the shape of a rod and of tetragonal cross-section.

[0023] The bodies of the pairs of the connected piling sticks 2 are laid for drying on the sawn timber 1 side by side, crosswise towards the sawn timber 1. In the pictures Fig. 1 and Fig. 2 there are other screws apparent which screws are found at the fixed couplers of the piling sticks 2. They create fixation mandrels 9 which allow a fixation of piling sticks 2 found one above another in combination with openings 10 in fixed couplers of the piling sticks 2. [0024] All the set is modularly built up in such a way that the pairs of piling sticks 2 with arresting stops 4,5 in stretched conditions are placed side by side on the bottom. Then there is a layer of sawn timber 1 laid down on the piling sticks 2 crosswise towards them. The sawn timber 1 has to be piled side by side. When the entire layer is laid down, another layer of pairs of piling sticks 2 is laid down on the top of the sawn timber 1. These pairs of piling sticks 2 are connected to the pairs of piling sticks 2 beneath. Then there are setting elements 8 released which release disengages springs 6 in the shape of spring which will cause that the movable arresting stops 5 will be forced down on the layer of sawn timber 1 and they start to induce a pressure power towards immovable arresting stops 4. This will put the device into operative conditions and it allows using of the best method of drying of sawn timber 1.

[0025] At this best method of drying of sawn timber 1 there is at least a temporary influence on the dried sawn timber 1 implemented by the means of pressure power induced by mechanical means, by their forcing to the dried pieces of the sawn timber 1, namely in the opposite direction to the two opposite sides of the sawn timber 1 when compared with the position of the piling sticks 2 besides the fact that the dried pieces of sawn timber 1 are fixed against warping by the way of loading by the means of adding the piling sticks 2 to the two opposite sides of dried pieces of sawn timber 1. The pressure power is induced by the force element in the form of spring 6, which causes that the movable arresting stop 5 forces to a layer of the sawn timber 1 down in the direction to the immovable arresting stop 4, whereby the layer of sawn timber 1 is pushed down and individual pieces of sawn timber 1 are pressed to each other. The showed device according to the invention contains rows of bodies with pairs of piling sticks 2 with being free space along those surfaces of the sawn timber 1 where there are piling sticks 2 found. That makes the possibility to discharge a moisture there through this free space from the sawn timber 1 drawn off 1 during drying. The device for drying of sawn timber 1 according to the pictures Fig. 1 to Fig. 3 thus represents the technical solution at which the sawn timber 1 can be piled in a layers creating an areal planar formation when being laid to be dried, whereas the bodies of connected piling sticks 2 are added onto planar surfaces between this layers which piling sticks 2 create free

space around these planar surfaces. The device according to the invention makes the possibility that there is a drying implemented while during the drying a pressure force induced by the springs is induced on the lateral surfaces of this layer in opposite direction and at the same time in the direction of the course of planar surface areas of the layer. Such influence may be under progress continuously or interruptedly, for example in a way of pulses, for a certain period of time. The pressure power at it is induced in the intensity which is at least sufficient to force the adjacent pieces of sawn timber 1 down to each other and to keep them side by side as close as possible even after reduction of volume caused by the dry shrinkage of the wood substance without creation of vacancies if possible. The bodies with the connected piling sticks 2 can be disassembled after exsiccation and they are suitable to be put at suitable place or they can be directly relocated on the new damp sawn timber 1 for other utilization while dried sawn timber $\underline{1}$ is passed on other treatment or sale. It is purposeful to leave the device common with the sawn timber $\underline{1}$ as long as possible. The device also may exist like a complete built-up unit in which the sawn timber 1 can be removable.

[0026] It is also possible to make some following additional operations of sawn timber 1 treatment when the device according to the invention containing the connected piling sticks 2 being fixed to sawn timber 1. This applies especially to the operations at which there is an influence by chemical or biochemical agents induced on the sawn timber 1. This is possible before drying, during the course of drying or after drying of sawn timber 1 being situated into the device according to the invention.

[0027] Some pressure elements are recommended to apply the pressure perpendicularly towards the direction of the movement of the arresting stops (4,5).

[0028] Fig.4 shows the possibility of using the pressure elements <u>11</u> in the form of pistons to apply the pressure perpendicularly towards the direction of the movement of the arresting stops (4,5). They may be used alternatively to the create fixation mandrels 9 or additionally.

Claims

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- Device for sawn timber drying in chocks, of the type in which sawn timber (1) layers are placed and create flat planar formations, and these layers being interlaid with parallel rows of piling sticks (2), said device comprising:
 - at least two piling sticks (2) in the form of oblong bodies with flat thrust faces (3) for propping against the sawn timber (1), said thrust faces (3) located on opposite sides of the body of each piling stick (2), the piling sticks (2) being firmly, immovably connected to each other, the piling sticks (2) being in parallel position with a gap (62) between them,

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- at least one pair of arresting stops (4,5) being common to a pair of adjacent piling sticks (2), the arresting stops (4,5) being situated in the area of the sticks opposite ends, with at least one of these arresting stops (4,5) being movable, wherein the movable arresting stop (5) has a slide gripping towards the piling stick (2),
- at least one spring (6) having at least one of its ends fixed to the movable arresting stop (5) for pressing it to the other arresting stop (4), the spring being located in the gap (62),

wherein

the arresting stops (4,5) being each provided with at least one pressure face (7) situated against each other in order to induce pressure force on a layer of piled sawn timber (1), the said pressure face (7) protruding on the same outside periphery of the pair of adjacent piling stick (2) on the side where its thrust face (3) is located.

- 2. Device for sawn timber drying according to claim 1, characterised by that movable arresting stop (5) is provided with at least one setting element (8) for keeping its position in a stretched state.
- 3. Device for sawn timber drying according to claims 1 and 2, **characterised by** that between the opposite ends of the piling sticks (2) there are at least two movable arresting stops (5) created at the same thrust face (3), where each of the movable arresting stops (5) is connected to the spring (6).
- 4. Device for sawn timber drying according to claims 1 to 3, characterised by that piling sticks (2) are created as rods having tetragonal cross-section and these piling sticks (2) are provided with arresting stops (4,5) in the form of bodies which are also created as rods having tetragonal cross-section.
- 5. Device for sawn timber drying according to claims 1 to 4, characterised by that at least some of the piling sticks (2) that are located above each other are interconnected with each other.
- 6. Device for sawn timber drying according to claim 5, characterised by that the interconnection of at least some piling sticks (2) is detachable, by means of connecting elements for a detachable connection.
- 7. Device for sawn timber drying according to claims 5 and 6, **characterised by** that the chock is provided with at least one pressure element (11) situated on its surface, namely in a functional position to induce the pressure perpendicularly towards the direction of the movement of the arresting stops (4,5).

Patentansprüche

- Vorrichtung zur Trocknung von Schnittholz in Holzstapeln der Art, bei der das Holz in Schichten, die ebene Flächengebilde bilden, gelegt wird und diese Schichten durch parallel angeordnete Reihen von Stapellatten (2) belegt werden, wobei die Vorrichtung umfasst:
 - mindestens zwei Stapellatten (2) in Form von länglichen Körpern mit ebenen Stützflächen (3) für Abstützung des getrockneten Schnittholzes (1), diese Stützflächen (3) auf gegenüberliegenden Seiten vom jeder Stapellatten (2), wobei die Stapellatten (2) fest, unbeweglich miteinander verbunden sind und relativ zueinander in parallelen Stellung mit einem Spalt (62) dazwischen angeordnet sind,
 - mindestens ein Paar von Anschlägen (4, 5), die auf einem Paar benachbarten Stapellatten (2) befestigt sind, wobei diese Anschläge (4, 5) im Bereich der gegenüberliegenden Enden der Stapellatten (2) angeordnet sind, davon mindestens ein von diesen Anschlägen (4, 5) beweglich ist, und dieser Anschlag (5) verschiebbar zu den Stapellatten (2) montiert ist,
 - mindestens eine Feder (6) zum Drücken des verschiebbaren Anschlags (5) in Richtung zum gegenüberliegenden Anschlag (4), wo diese Feder (6) in der Spalt (62) angebracht ist und mindestens ein von seinen Enden auf dem beweglichen Anschlag (5) befestigt ist,

wobei

jeder von den Anschlägen (4, 5) mit mindestens einer ebenen Druckfläche (7) ausgestattet ist und die Anschläge mit diesen Druckflächen zur Auslösung von Druckkräften auf die Schicht des gelagerten getrockneten Schnittholzes (1) gegeneinander angeordnet sind, wobei die Druckflächen (7) auf der Seite von miteinander verbundenen Stapellatten (2) herausragen, wo ihre Stützfläche (3) angeordnet ist.

- Vorrichtung zur Trocknung von Schnittholz nach Anspruch 1, dadurch gekennzeichnet, dass der bewegliche Anschlag (5) mit mindestens einem Steller (8) zum Halten dessen Position im gestreckten Zustand versehen ist.
- Vorrichtung zur Trocknung von Schnittholz nach den Ansprüchen 1 und 2, dadurch gekennzeichnet, dass bei einer Stützfläche (3) zwischen den entgegengesetzten Enden der Stapellatten (2) mindestens zwei bewegliche Anschläge (5) ausgebildet sind, wobei jeder von diesen Anschlägen (5) mit der Feder (6) verbunden ist.
 - 4. Vorrichtung zur Trocknung von Schnittholz nach den

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Ansprüchen 1 bis 3, **dadurch gekennzeichnet, dass** die Stapellatten (2) als Stäbe mit viereckigem Querschnitt ausgebildet sind und diese Stapellatten (2) mit Anschlägen (4, 5) in Form von Körpern versehen sind, die ebenfalls als Stäbe mit viereckigem Querschnitt ausgebildet sind.

- Vorrichtung zur Trocknung von Schnittholz nach den Ansprüchen 1 bis 4, dadurch gekennzeichnet, dass mindestens einige, übereinander angeordnete Stapellatten (2), zueinander fest und unbeweglich verbunden sin
- Vorrichtung zur Trocknung von Schnittholz nach Anspruch 5, dadurch gekennzeichnet, dass mindestens einige Verbindungen von Stapellatten (2) abtrennbar durchgeführt sind, mittels Verbindungselemente zur lösbaren Verbindung.
- 7. Vorrichtung zur Trocknung von Schnittholz nach den Ansprüchen 5 und 6, dadurch gekennzeichnet, dass der Holzstapel mit mindestens einem, auf seiner Oberfläche angebrachten Druckelement (11) versehen ist, und zwar in einer Gebrauchsstellung zur Bewirkung von Druck senkrecht zur Bewegungsrichtung der Anschläge (4, 5).

Revendications

- 1. Un dispositif de séchage du bois de sciage débité emmeulé, ce type dans lequel le bois débité séché est stocké en couches qui composent un domaine des formations planes et ces couches sont entrecoupées par des rangées parallèles des interlignes (2), ce dispositif comprenant :
 - au moins deux interlignes (2) sous une forme de corps allongées avec surfaces d'appui planes (3) pour soutenir le bois débité séché (1), ces surfaces d'appui (3) situées sur les côtés opposés de chaque interligne (2), ces interlignes (2) solidement fixées les unes aux autres de façon immobile, fermement attachées l'une à l'autre en position parallèle et avec une interstice (62) entre-eux,
 - au moins une paire de butées (4,5) fixées sur une paire d'interlignes (2) adjacentes, ces butées (4,5) sont situées aux extrémités opposées des interlignes (2), dont au moins une de ces butées (4,5) est mobile et cette butée mobile (5) est montée de manière coulissante vers les interlignes (2),
 - au moins un ressort (6) pour pousser la butée mobile (5) en direction de la butée opposée (4), où ce ressort (6) est situé dans l'interstice (62) et au moins une de ses extrémités est fixée à la butée mobile (5);

tandis que

les butées (4,5) sont toutes équipées avec au moins une surface poussante (7) plate et à l'aide de ces zones de pression celles-ci sont placées l'une contre l'autre afin de provoquer une force de compression sur la couche de dépôt du bois débité séché (1), dont les surfaces poussantes (7) dépassent sur le côté des interlignes unies (2), où se trouve leur surface d'appui (3).

- 2. Dispositif de séchage du bois débité selon la revendication 1, caractérisé par le fait que la butée mobile (5) soit munie d'au moins un élément dé réglage (8) afin de maintenir sa position en l'état étiré.
- 3. Dispositif de séchage du bois débité selon les revendications 1 et 2, caractérisé par le fait que, entre les extrémités opposées de l'interligne (2), au moins deux butées mobiles (5) sont formées dans une surface d'appui (3), tandis que chacune desdites butée mobiles (5) est relié à un ressort (6).
- 4. Dispositif de séchage du bois débité selon les revendications 1 à 3, caractérisé par le fait que les d'interlignes (2) sont conçues sous forme des tiges ayant une section quadrangulaire et ces interlignes (2) sont équipées de butées (4,5) sous la forme des ensembles qui sont également créées ainsi que des tiges de section quadrangulaire.
- 5. Dispositif de séchage du bois débité selon les revendications 1 à 4, caractérisé par le fait qu'au moins certaines interlignes (2), situées l'une au dessus de l'autre, soient reliées entre elles fermement de manière immobile.
- 6. Dispositif de séchage du bois débité selon la revendication 5, caractérisé par le fait qu'au moins une partie des interlignes (2) peut être connectée de façon amovible par l'intermédiaire de l'élément de raccordement pliable.
- 7. Dispositif de séchage du bois débité selon les revendications 5 et 6, caractérisé par le fait que le bois emmeulé soit équipée d'au moins un élément de serrage (11) faisant face à la surface, dans la position de fonctionnement pour provoquer une pression perpendiculaire à la direction de mouvement des butées (4,5).

7

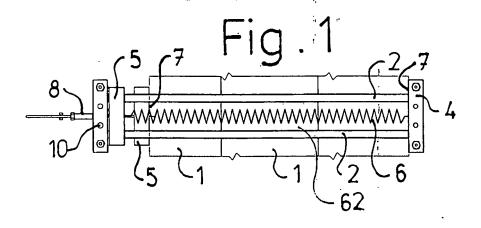


Fig. 2

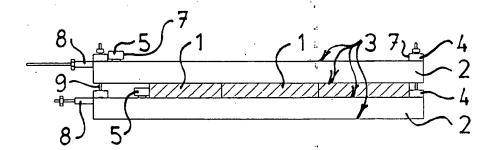
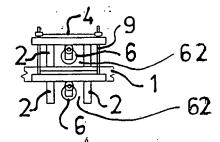
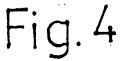
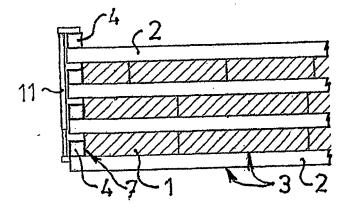


Fig. 3







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REFERENCES CITED IN THE DESCRIPTION

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