Search history

Search 1: SFT=(pincer press) (Results 4)

Search 2: CPC=(b66c1/48) (Results 603)

Search 3: 1 and 2 (Results 0)

Search 4: clamp and cylinder and pin and ratchet (Results 5654)

Search 5: 4 and lariat and spring and pinion and gear and reel (Results 0)

Search 6: 2 and 4 (Results 2)

Search 7: PN=(CO20170003256) (Results 1)

Search 8: fn=(71677407) (Results 1)

Search 9: fn=(71677407) (Results 1)

Search 10: [SP]: prensa de alacran con tensor de trinquete alacran press with ratchet tensioning la presente invencion se refiere a una herramienta de sujecion utilizada por lo general en la fabricacion de objetos de madera, mas exactamente en el acople de piezas para generar ensanchamiento, en el acople de piezas para el encolado de cantos y en el ensamble de estructuras, la cual es una prensa tipo alacran, pero mejorada ergonomica y funcionalmente debido a la presencia de una guia cilindrica (2) con una ranura (21) que mantiene recto el desplazamiento de la mordaza movil (3) y un subsistema de transmision (5), para generar la presion entre las mordazas, el cual es un mecanismo con tensor de trinquete que comprende un trinquete motriz (51) en forma y, un resorte de compresion (52) ubicado en la base de la y, un trinquete trabante (53), un resorte de tension (54), un pinon trinquete (55), un carrete (56), un brazo de empuje (58) y una empunadura (57). esta herramienta resulta mas amable con el operario al momento de realizar las fuerzas, debido a que funciona por medio de una palanca con una empunadura que permite que la muneca del usuario siempre este alineada longitudinalmente con el antebrazo, minimizando de esta manera las posibles lesiones del operario, y mejora la fuerza de agarre de las mordazas (3, 4), gracias a la presencia de dos trinquetes (55). the present invention relates to a clamping tool used in the manufacture of wooden objects, more exactly in the coupling parts to generate widening, in the coupling parts for bonding edges and in the assembly of structures, which is an improved ergonomic and functionally alacran type, but due to the presence of a cylindrical guide (2) with a slot (21) which maintains straight movement of the movable jaw (3) and a transmission (5), so as to generate the pressure between the jaws, which is a drive mechanism with belt tensioner ratchet comprising a pawl (51), and a compression spring (52) located in the base of the trabante, a pawl (53), and a tension spring (54), a pinion pawl (55), a spool (56), a pushing arm (58) and a handle (57). this tool is more friendly with the operator at the time of forces, because it operates by means of a lever with a handle that allows the wrist of the user is always longitudinally aligned with the forearm, thereby minimizing the possible injury to the operator, and improves the gripping force of the jaws (3, 4), thanks to the presence of two pawls (55). (Results 1)

Search 11: fn=(71677407) (Results 1)

Search 12: clamp and 2 (Results 268)

Search 13: 2 and press (Results 69)

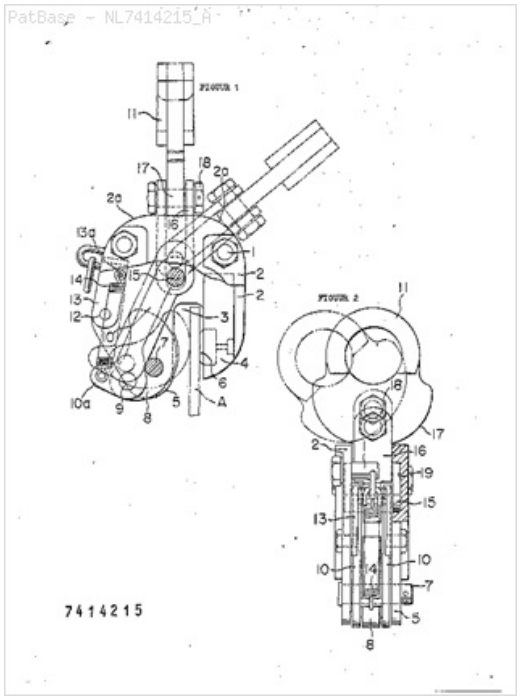
Search 14: 12 and 13 (Results 45)

1) Family number: 4891020 (NL7414215A)

Title: FLAT ITEM LIFTING CLAMP - HAS SEMICIRCULAR PLATE UNDER LIFTING EYE HINGING ON COUPLING ROD UNDERNEATH

Abstract: The clamp has a body with a slot accommodating the edge of the item to be lifted, and jaws on the opposite sides of the slot and extending towards it, each mounted on an arm. One or both jaws comprise a cam plate, hinging on the body, a lifting eye and a set of coupling rods, the latter connecting the lower end of the eye to a point on the cam plate eccentric to its pivot axis. The eye (11) has a semicircular plate (17) at its lower end, and hinges by means of a first pin (18) onto a coupling rod (16) under the centre of the plate. The other end of this rod is coupled to the others by a second pin (15) at right angles to the first, and whose ends work in a pair of opposite vertical slots formed in the body. There are shoulders (2a) on the body, extending outwards at the top end of the slots.

Classifications:
International (IPC 8-9): B66C1/48 (Advanced/Invention);
B66C1/42 (Core/Invention)
International (IPC 1-7): B66C1/48
CPC: B66C1/48
European: B66C1/48



Family:

Publication number	Publication date	Application number	Application date
NL155238 B	19771215	NL19740014215	19741031
NL7414215 A	19760504	NL19740014215	19741031

Priority:

NL19740014215 19741031

Probable Assignee: EAGLE CLAMP CO

Assignee(s): (std)**:** EAGLE CLAMP CO

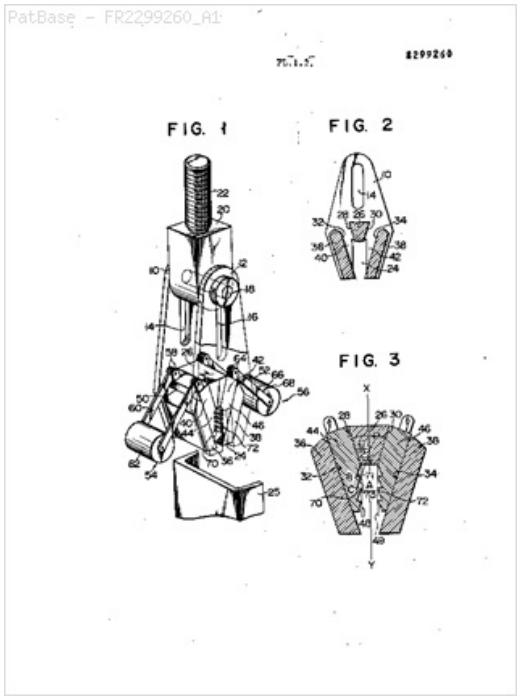
Assignee(s): EAGLE CLAMP CO LTD NARA JAPAN ; EAGLE CLAMP CO LTD TE NARA JAPAN

2) Family number: 3510022 (FR2299260A)

Title: GRIPPER FOR LIFTING APPTS - HAS SUPPORT PLATES SANDWICHING TRAPEZOIDAL COLUMN AND SLIDABLE CLAMPING MEMBERS

Abstract: Between a pair of support plates extending from their upper ends connected to the lifting apparatus toward their lower ends there is provided a trapezoidal column presenting in cross section an isosceles trapezoid arranged with its bottom surface turned in the upper end. A pair of guide members have side surfaces arranged, respectively, in parallel with both inclined side surfaces of the trapezoidal column. A pair of clamping members adapted to grip the article when allowed to slide toward the other end side, are disposed, respectively, within a pair of elongate spaces each defined between the inclined side surface of the trapezoidal column and the side surface of the guide member and united into one space on the lower end side.

Classifications:
International (IPC 8-9): B66C1/48 (Advanced/Invention);
B66C1/42 (Core/Invention)
International (IPC 1-7): B66C1/48
CPC: B66C1/48
European: B66C1/48



Family:

Publication number	Publication date	Application number	Application date
FR2299260 A1	19760827	FR19750002796	19750129
FR2299260 B1	19780623	FR19750002796	19750129

Priority:

FR19750002796 19750129

Probable Assignee: KONDO YOSHIZI

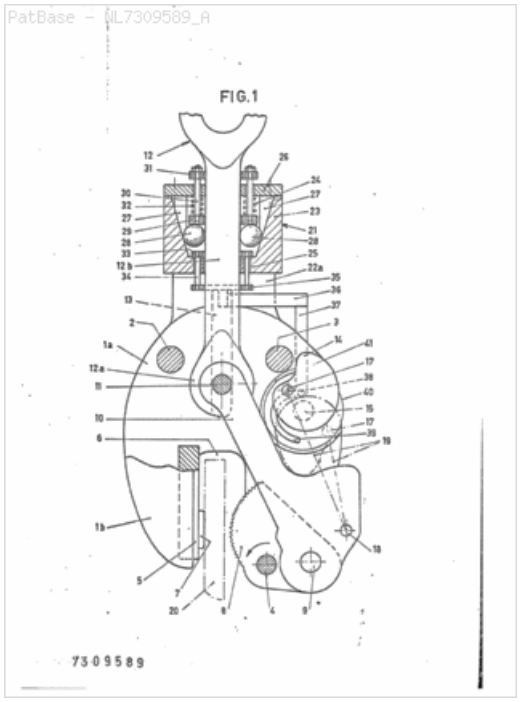
Assignee(s): (std)**:** KONDO YOSHIZI

3) Family number: 6115027 (NL7309589A)

Title: SELF-LOCKING LIFTING CLAMP - HAS SPRING-LOADED WEDGES PREVENTING ACCIDENTAL JAW RELEASE

Abstract: The clamp is particularly for handling metal plates and profile sections, having a slot for the plate edge with jaws on either side, one at least of these being forced against the plate when the clamp is lifted by the eye. The guide in which the eye works has a one-way automatic locking device preventing the jaw releasing, although it can be released by other devices when the eye is unloaded. Typically, the locking device may be spring-loaded wedges, forced into a taper opening at the top end of the guide between the wall of the latter and the shaft attached to the eye. The wedges can be in the form of balls, working in grooves diverging towards the top.

Classifications:
International (IPC 8-9): B66C1/48 (Advanced/Invention);
B66C1/42 (Core/Invention)
International (IPC 1-7): B66C1/44 B66C1/48
CPC: B66C1/48
European: B66C1/48



Family:

Publication number	Publication date	Application number	Application date
NL7309589 A	19750113	NL19730009589	19730709

Priority:

NL19730009589 19730709

Probable Assignee: INTERLAS NV

Assignee(s): (std)**:** INTERLAS NV

Assignee(s): INTERLAS TE SOESTERBERG NV ; INTERLAS N V TE SOESTERBERG

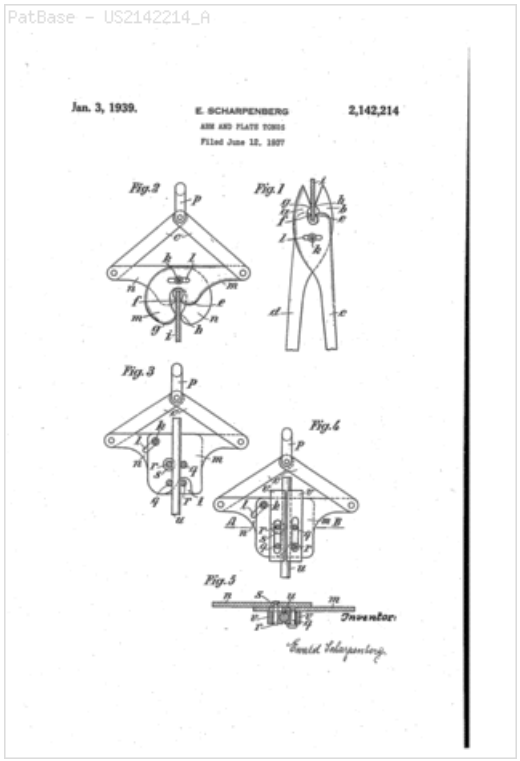
4) Family number: 21725041 (US2142214A)

Title: ARM AND PLATE TONGS

Abstract: 1. Tongs for carrying sheet metal plates, plates, wire and the like, comprising in combination two arms contacting intermediate of their length, two jaws near one end of each of said arms situsted one on each side of the central axis of the tongs and adapted to bear from opposite sides against the article to be carried, and each of the jaws on each arm being opposite a jaw on the other arm and i'orming therewith two pairs of jaws, and a pin and slot connection pivotally and slidably connecting said arms to bring both pairs of jaws into contact with the article.

Classifications:

International (IPC 8-9): B66C1/48 (Advanced/Invention);
B66C1/42 (Core/Invention)
CPC: B66C1/48
European: B66C1/48
US: 294/118 294/92



Family:

Publication number	Publication date	Application number	Application date
US2142214 A	19390103	US19370147919	19370612

Priority:

19360623 US19370147919 19370612

Probable Assignee: EWALD SCHARPENBERG

Assignee(s): (std)**:** EWALD SCHARPENBERG

Inventor(s): (std)**:** EWALD SCHARPENBERG

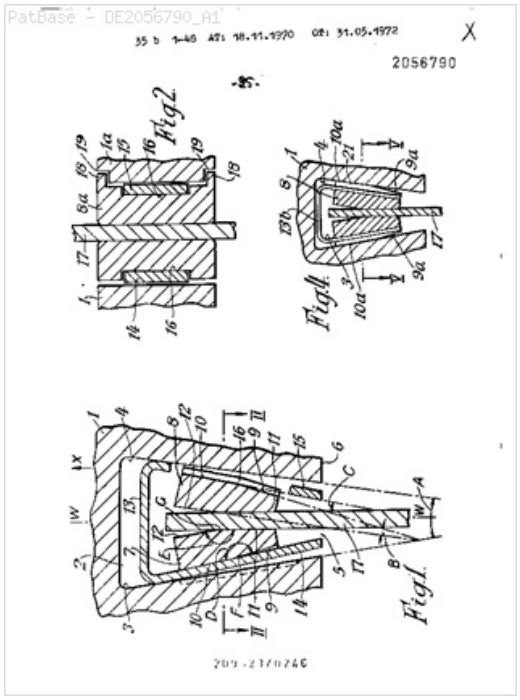
Inventor(s): SCHARPENBERG EWALD

5) Family number: 534084 (DE2056790A1)

Abstract: Source: DE2056790A1 [DE] Patentansprueche Greifvorrichtung mit einer Spannbacke in einem Schlitz einer Halterung, wobei der Schlitz eine Oeffnung zur Aufnahme eines Gegenstandes, der von der Spannbacke ergriffen werden soll, sowie gegenueberliegende ebene Waende aufweist, welche gegen die Oeffnung konvergieren, dadurch g e k e n n z e i c h n e t, dass die Spannbacke (7t) eine nach innen weisende Flaeche mit unter stumpfem Winkel'(E') gegeneinander geneigten inneren (12t) und aeusseren Abschnitten (11t) sowie eine nach aussen weisende Flaeche mit ebenfalls unterstumpfem Winkel (D') gegeneinander geneigten inneren (lo') und aeusseren Abschnitten (91) aufweist, wobei der innere Abschnitt (12') der nach innen weisenden Flaeche gegen den aeusseren Abschnitt (9') der nach aussen weisenden Flaeche um einen Winkel (B') geneigt liegt, der kleiner ist als der Winkel (C') zwischen dem aeusseren Abschnitt (11t) der nach innen weisenden Flaeche und dem inneren Abschnitt (lo') der nach aussen weisenden Flaeche, und dass eine Feder (15') vorgesehen ist, die den aeusseren Abschnitt (11') der nach innen weisenden Flaeche der Spannbacke normalerweise gegen den zu ergreifenden Gegenstand (17) presst 2.

Machine translation: Claims gripping device with a clamping jaw in a slot of a bracket, wherein the slot has an opening for receiving an object to be gripped by the jaw and opposing flat walls which converge toward the aperture, wherein the clamping jaw (7t) an inward-facing surfaces with an obtuse angle '(E') mutually inclined inner (12t) and outer sections (11t) and an outwardly facing surface, also with unterstumpfem angle (D ') mutually inclined inner (lo' external) and sections (91), said at the inner portion (12 ') of the inwardly facing surface opposite the outer section (9') of the outwardly facing surfaces at an angle (B ') inclined, is smaller than the angle (C ') 11t between the outer portion () of the inward-facing surface and the inner portion (lo') of the outwardly facing surface, and that a spring (15 ') is provided, the outer portion (11') of the inward facing surfaces of the jaw usually to be taken against the object (17) pressed second

Classifications:
International (IPC 8-9): A01G17/16 B66C1/48 (Advanced/Invention);
A01G17/00 B66C1/42 (Core/Invention)
International (IPC 1-7): B66C1/48
CPC: A01G17/16 B66C1/48
European: A01G17/16 B66C1/48



Family:

Publication number	Publication date	Application number	Application date
DE2056790 A1	19720531	DE19702056790	19701118
DE2056790 B2	19740221	DE19702056790	19701118
DE2056790 C3	19741010	DE19702056790	19701118

Priority:

DE19702056790 19701118

Probable Assignee: DEW H

Assignee(s): (std)**:** DEW H ; DEW HERBERT OLIVER RICHARD

Assignee(s): DEW HERBERT OLIVER RICHARD HINTLESHAM IPSWICH SUFFOLK GROSSBRITANNIEN

Inventor(s): (std)**:** DEW HERBERT OLIVER RICHARD

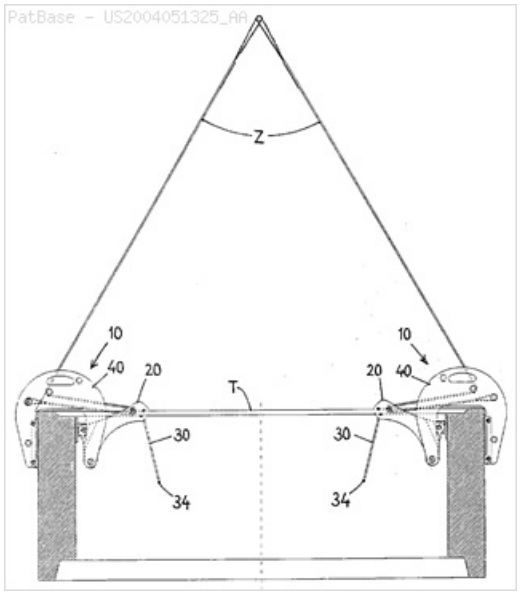
Inventor(s): DEW HERBERT OLIVER RICHARD HINTLESHAM IPSWICH ; DEW HERBERT OLIVER RICHARD HINTLESHAM IPSWICH SUFF ; DEW HERBERT OLIVER RICHARD HINTLESHAM IPSWICH SUFFOLK GROSSBRITANNIEN

6) Family number: 28421105 (US2004051325A)

Title: GRIPPING MEANS

Abstract: The invention concerns locking and unlocking of gripper devices 10 raising and lowering construction components (T), large parts and the like which can be clamped between mutually displaceable gripper jaws 15, 45 of an overall n-shaped carrying frame 12 by means of rocker levers 20 elastically supported on said frame, said invention also comprising a latch 30, for instance a rod to selectively lock and release the rocker lever 20. The articulation 32 of the rod 30 is situated at the free end 25 of the rocker lever 20 near a reversal pin 28 for a traction element which applies clamping forces to the gripper jaws 15, 45. A grip 34 of the rod 30 may snap into a notch 40 at the periphery of the carrying frame 12 which is fitted in its upper region with a stop 38 acting as a rocker articulation when the disengaged rod 30 is pivoted upward. A mating stop 36 catches the disengaged rod 30 near a reversal pin 28 of the rope system Z. The carrying frame 12 is fitted with a limit stop 18 for the free end 25 of the rocker lever 20, said limit stop simultaneously constituting a reversal pin for the traction element Z, for instance closely below a suspension slot 14 in the upper portion of the carrying frame 12. The distances of the reversal pins 18, 28 are adjustable relative to each other and/or relative to the affixation point 16. At least one of the reversal pins 18, 28 and/or the affixation point 16 is supported in swiveling manner to compensate pivoting displacements of the construction component T or deformations of the traction element Z illustratively made of a polyester band.

Classifications:
International (IPC 8-9): B66C1/48 (Advanced/Invention);
B66C1/42 (Core/Invention)
International (IPC 1-7): B66C1/28 B66C1/48
CPC: B66C1/48
European: B66C1/48
US: 294/103.1 294/82.13



Family:

Publication number	Publication date	Application number	Application date
DE10330652 A1	20040226	DE20031030652	20030708
DE10330652 B4	20060706	DE20031030652	20030708
DE20212400 U1	20030417	DE20022012400U	20020813
FR2843588 A1	20040220	FR20030009358	20030725
FR2843588 B1	20080711	FR20030009358	20030725
US2004051325 AA	20040318	US20030636776	20030808

Priority:

DE20022012400U 20020813 DE20031030652 20030708

Probable Assignee: WINDEN U MASCHINENBAU GRESSBACH GMBH

Assignee(s): (std)**:** WINDEN U MASCHB GRESBACH GMB ; WINDEN U MASCHB GRESSBACH GM ; WINDEN UND MASCHB GRESBACH GMB ; WINDEN UND MASCHB GRESSBACH GM

Assignee(s): WINDEN UND MASCHINENBAU GRESBACH GMBH ; WINDEN UND MASCHINENBAU GRESSBACH GMBH ; GRESSBACH GERHARD ; WINDEN U MASCH ; WINDEN U MASCHINENBAU GRESBACH GMBH ; WINDEN U MASCHINENBAU GRESSBACH GMBH

Inventor(s): (std)**:** GRESSBACH GERHARD ; GRESBACH GERHARD

7) Family number: 58107 (GB1071759A)

Title: Improvements in or relating to lifting clamps

Abstract: 1,071,759. Lifting-dogs for metal plates. DEEWELD Ltd. Aug. 4, 1965, No. 33307/65. Heading B8H. In a lifting-dog for metal plates which has fixed and movable jaws 17, 18, the movable jaw 18 is urged into engagement with the plate by a spring 30 extending between a point 31 on an operating link 24 and a pivot axis 27 of a cam 26. The latter, which is rotated by a lever 28, locks the movable jaw in an open position by bearing on a cam surface 25 on the link 24. The lever 28 may be remotely operated by a cable.

Classifications:
International (IPC 8-9): B66C1/48 (Advanced/Invention);
B66C1/42 (Core/Invention)
International (IPC 1-7): B66C1/48
CPC: B66C1/48
European: B66C1/48

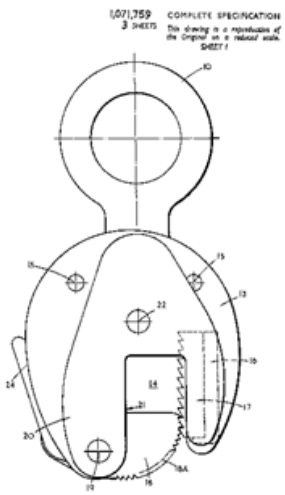


FIG1

Family:

Publication number	Publication date	Application number	Application date
BE692963 A	19670703		19670120
GB1071759 A	19670614	GB19650033307	19650804

Priority:

GB19650033307 19650804

Probable Assignee:	DEEWELD LTD
Assignee(s): (std)**:**	DEEWELD LTD
Assignee(s):	DEEWELD LIMITED
Inventor(s): (std)**:**	BURNS LAWRENCE

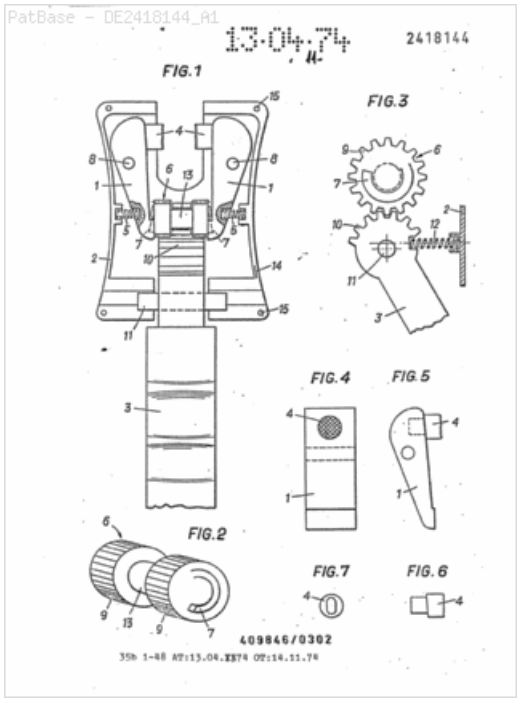
8) Family number: 1952109 (DE2418144A1)

Title: KLEMMEINRICHTUNG ZUM TRANSPORT FLACHER GEGENSTAENDE TERMINAL EQUIPMENT TRANSPORT Flat articles (Machine translation)

Abstract: Source: DE2418144A1 [DE] Patentansprueche: 1 Klemmeinrichtung, insbes fuer den Transport flacher Gegenstaende zB Tafeln, Platten oddgl mit gegeneinander beweqbar gelagerten Klemmbacken, die insbes unter dem Einfluss der zu transportierenden Last in der Klemmstellung gehalten sind, dadurch gekennzeichnet, dass zur Bewegung der Klemmbacken (1) in einem Gehaeuse (2) gelagerte Nocken (7) vorgesehen sind, die mit einem, zB.

Machine translation: Claims: one clamping device, particularly for the transport flat objects such as plates, oddgl stored with each other beweqbar jaws, which are particularly considered under the influence of transportable load in the clamping position, wherein the movement of the jaws (1) a housing (2) mounted cams (7) are provided with one, for example.

Classifications:
International (IPC 8-9): B66C1/48 (Advanced/Invention);
B66C1/42 (Core/Invention)
International (IPC 1-7): B66C1/48
CPC: B66C1/48
European: B66C1/48



Family:

Publication number	Publication date	Application number	Application date
DE2418144 A1	19741114	DE19742418144	19740413

Priority:

AT19730003455 19730418

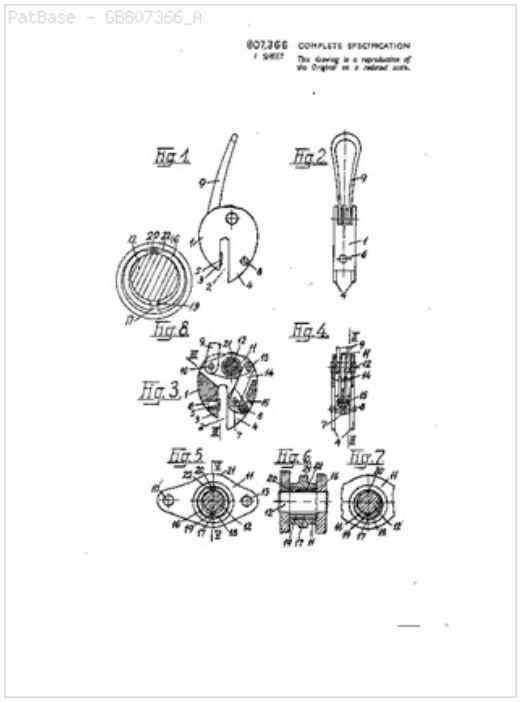
Probable Assignee:	NEUMANN ROSA
Assignee(s): (std)**:**	NEUMANN ROSA
Assignee(s):	NEUMANN ROSA 5800 HAGEN
Inventor(s): (std)**:**	WEISSMANN ALFRED ING
Inventor(s):	WEISSMANN ALFRED ING WIEN

9) Family number: 20264112 (GB807366A)

Title: Improvements in or relating to claws for hoisting apparatus

Abstract: 807,366. Lifting dogs automatic locking. THOMSEN, K. H. E. April 17,1957 [April 25, 1956], No. 12493/57. Class 78 (4). [Also in Group XXV] A cylindrical friction lock 16, 18 (Fig. 3) locks a lifting dog after it has been caused to grip the load by the force applied to its suspension member 9. The dog illustrated is of the type in which a clamp 7 is turned about a pivot 8 to press the load against a shoe 5 by force transmitted from the suspension member 9 through a lever 11 and links 14. The lever 11 includes a boss 18 which fits loosely over a pin 12 from which it is separated by a resilient steel clamping ring 16 (Fig. 5) held against rotation by a key 20 projecting from the pin 12 into a recess in the ring 16. When the load is raised the upward movement of the lever 11 forces the split end 17 of the ring 16 over a wedge 19 on the pin 12 so that the ring 16 is forced into frictional.engagement with the boss 18 thus locking the dog. The dog is released by a hammer blow on the part 21 of the lever 11. The split ends of the ring 16 and the wedge 19 are preferably hardened and the diametrically opposite portion 20 of the ring 16 is reduced to render the ring more flexible.

Classifications:
International (IPC 8-9): B66C1/48 (Advanced/Invention);
B66C1/42 (Core/Invention)
International (IPC 1-7): B66C1/48
CPC: B66C1/48
European: B66C1/48



Family:

Publication number	Publication date	Application number	Application date
DE1074244 B	00000000		00000000
FR1174349 A	19590310		19570424
GB807366 A	19590114	GB19570012493	19570417
NL94644 C	00000000		00000000

Priority:
19560425

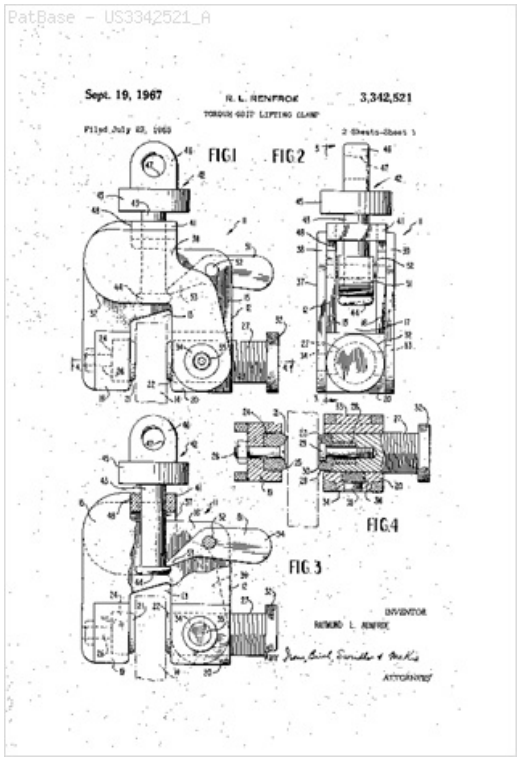
Probable Assignee: KNUD HENRI ERHARD THOMSEN
Assignee(s): (std)**:** KNUD HENRI ERHARD THOMSEN
Inventor(s): (std)**:** THOMSEN KNUD HENRI ERHARD

10) Family number: 50135 (US3342521A)

Title: TORQUE GRIP LIFTING CLAMP

Abstract: 1,145,534. Lifting devices. J. C. RENFROE and SONS Inc. 20 June, 1966 [23 July, 1965], No.27452/66. Heading B8H. A lifting clamp comprises an inverted U- shaped body 12 providing a slot 13 to receive an article 14 to be lifted and a shackle member 37 pivotally connected to the body to apply a torque gripping action on the article (Fig. 5, not shown) when the shackle member is lifted by means not shown. The body 12 mounts a pair of opposed jaws 21, 22 on opposite sides of the slot 13, the jaw 22 is adjustable relative to the slot by way of a screw thread 27 and is fixed by a clamp 35 prior to lifting. The shackle member pivots in a vertical plane containing the axis of the jaws about an axis horizontally offset from the slot and on a level with the axis of the jaws. The jaws 21, 22 are rotatable in their mountings and one 22 is adjustable by means of screw 27 to grip the article prior to lifting. The shackle member mounts a lifting connection 42 slidable vertically and rotatable relative thereto in a bush 41, which bush abuts a stop 48 on the body 12 when the lifting connection is directly above the slot 13. The lower end of the lifting connection 42 has a head 44 engageable with a pivotable lever 51 whereby on setting down an article the head 44 slides past the lever 51 which then engages the shoulder behind the head to lock the lifting connection vertically above the slot 13 so that on raising the clamp no torque gripping action occurs between the jaws 21, 22 and the clamp may be removed from the article. When an article is to be lifted the lifting connection is lowered and the lever 51 manually withheld from engagement with the head 44 whilst the lifting connection is raised. In an alternative embodiment, Figs. 7, 8 (not shown), the pivot point of the shackle on the body is below the level of the axis of the jaws.

Classifications:
International (IPC 8-9): B66C1/48 (Advanced/Invention);
B66C1/42 (Core/Invention)
International (IPC 1-7): B66C1/48 E01H1/08
CPC: B66C1/48
European: B66C1/48
US: 294/103.1 294/92



Family:

Publication number	Publication date	Application number	Application date
BE684354 A	19670103		19660719
DE1295151 B	19690514	DE1966R043646	19660707
FR1486901 A	19670630	FR19660069694	19660718
GB1145534 A	19690319	GB19660027452	19660620
NL6610062 A	19670124	NL19660010062	19660718
US3342521 A	19670919	US19650474403	19650723

Priority:

US19650474403 19650723 FR19660069694 19660718

Probable Assignee: RENFROE AND SONS J C

Assignee(s): (std)**:** RENFROE AND SONS J C

Assignee(s): J C RENFROE AND SONS ; J C RENFROE AND SONS INC

Inventor(s): (std)**:** LEON RENFROE RAYMOND ; RENFROE RAYMOND L

11) Family number: 1742147 (DE2255629A1)

Title: GREIFVORRICHTUNG FUER PLATTEN ODER DGL GRIEF DEVICE FOR BOARDS, OR THE LIKE (Machine translation)

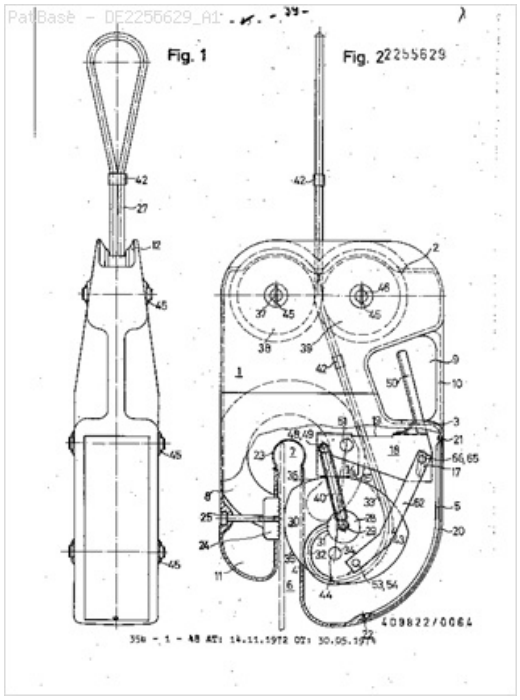
Abstract: Source: DE2255629A1 [DE] Patentansprueche 1 (;reifvorrichtung fuer Ilatten oder dgl bestehend aus einem Gehaeuse mit einem nach unten offenen Lastaufnahmeschlitz, mit Klemmbacken, Kraftuebertragungsgliedern und Sicherungs vorrichtung, dadurch gekennzeichnet, dass das Gehaeuse ein Gusskoerper ist, die i::raftuebertragunsglieder eine ansteigende Klemmkraft als Abhaengige von der zunehmenden Iaterialstaer- ke und dem gewicht der Last an der Last erzeugen und als biegsame oder starre Glieder ausgebildet sind, fuer eine nur vom Lastgewicht bestimmte lemmkraft das Kraftuebertragungs glied als ahnradsegment ausgebildet ist, die jicherungs- vorrichtung staendig im eingriff ist und nur bewusst mit ei nem geschuetzt liegenden handgriff kurzzeitig entriegelt werden kann, zum leichteren Loesen der Greifvorrichtung von der Last das hlemmgegenstueck weggeschwenkt werden kann oder frei beweglich - schwimmend - montiert ist und die Klemm backe zwangslaeufig mittels Hebel oder Bowdenzug von der Last abgehoben wird, die Bewegungen des Entriegelns der Sicherungsfunktion und der Loesefunktion der Klemmbacke und des Klemmgegenstuecks mit einer Bewegung des Handgriffs der Sicherungsvorrichtung ausgefuehrt werden, und dass zur Weg und Kraftvergroesserung fuers Entriegeln oder Loesen der Klemmbacke und des Klemmgegenstuecks ineinandergreifende Kniehebelkombinationen zwischen den handgriff und der Siche- rungsvorrichtung und den Loesegliedern fuer die Klemmbacke und das Klemmgegenstueck eingebaut sind 2.

Machine translation: Claims 1 (; ready device for Ilatten or the like comprising device comprises a housing with a downwardly open load receiving slot, with jaws, Kraftuebertragungsgliedern and fuse, wherein the housing is a cast iron body, the i:: raftuebertragunsglieder an increasing clamping force to be dependent on increasing is Iaterialstaer-ke and the weight of the load produce at the load and is designed as flexible or rigid limbs, for a given only by the load weight extractable power, the power transmission member formed as ahnradsegment that jicherungs device intervened constantly in and is only aware of an NEM protected underlying handle can be unlocked for a short time, can be swiveled for easy release of the gripping device of the load, the hlemmgegenstueck or move freely - floating - is mounted and the clamp jaw necessarily using lever or Bowden is lifted from the burden of the movements of unlocking the backup function and the Loesefunktion the jaw and the Klemmgegenstuecks with a movement of the handle of the backup device can be executed, and that the path and Kraftvergroesserung for unlocking or releasing the clamp and the Klemmgegenstuecks interlocking toggle combinations between the handle and for the hedging device and the Loesegliedern the jaw and the second Klemmgegenstueck are built

Classifications:

International (IPC 8-9): B66C1/48 (Advanced/Invention);

B66C1/42 (Core/Invention)
International (IPC 1-7): B66C1/48
CPC: B66C1/48
European: B66C1/48



Family:

Publication number	Publication date	Application number	Application date
DE2255629 A1	19740530	DE19722255629	19721114
DE2255629 B2	19800313	DE19722255629	19721114
DE2255629 C3	19801106	DE19722255629	19721114

Priority:

DE19722255629 19721114

Probable Assignee: BRANDT LOTHAR

Assignee(s): (std)**:** BRANDT LOTHAR

Assignee(s): BRANDT LOTHAR 7705 STEISSLINGEN ; BRANDT LOTHAR 7768 STOCKACH

Inventor(s): (std)**:** BRANDT LOTHAR

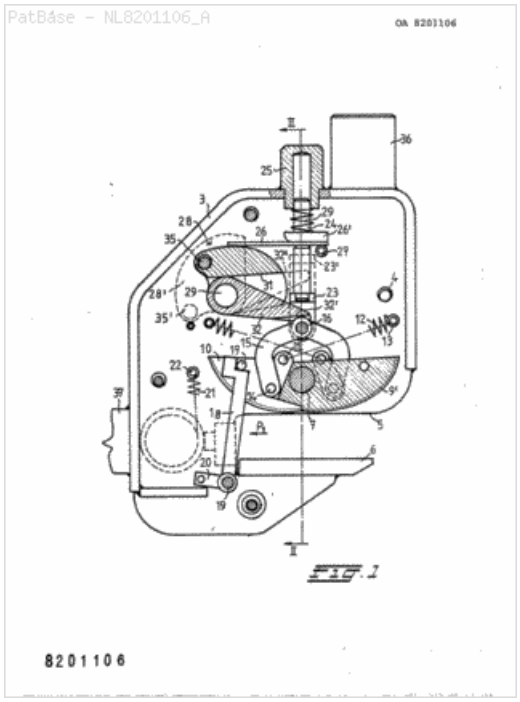
Inventor(s): BRANDT LOTHAR 7705 STEISSLINGEN ; BRANDT LOTHAR 7768 STOCKACH

12) Family number: 10122232 (NL8201106A)

Title: PLATE EDGE CLAMP WITH SPRING SEGMENT - HAS LOCKING MECHANISMS HOLDING CLAMP IN OPEN AND SHUT POSITIONS

Abstract: The clamp fits over the edge of a plate or a profiled flange, and comprises a set of side plates, each with a recess forming one jaw of the clamp. Spring-loaded pivoting segments between the plates grip the inserted plate edge and are locked by levers and an eccentric. A locking mechanism (17-21) secures each segment in the open position and a second one (24-26) in the engaged position. After release, an arm (32) brings the segment back into the open position against the spring action. External fixing devices (36,37) secure the bars or pipes of railings.

Classifications:
International (IPC 8-9): B63B17/04 B66C1/48 (Advanced/Invention);
B63B17/00 B66C1/42 (Core/Invention)
International (IPC 1-7): B63B17/04 B66C1/48
CPC: B63B17/04 B66C1/48
European: B63B17/04 B66C1/48



Family:

Publication number	Publication date	Application number	Application date
NL8201106 A	19831017	NL19820001106	19820317

Priority:

NL19820001106 19820317

Probable Assignee: INTERPRODUCT BV

Assignee(s): (std)**:** INTERPRODUCT BV

Assignee(s): INTERPRODUCT B V BUNTLAAN 38 44 TE 3970 AC DRIEBER ; INTERPRODUCT B V BUNTLAAN 38 44 TE 3970 AC DRIEBERGEN

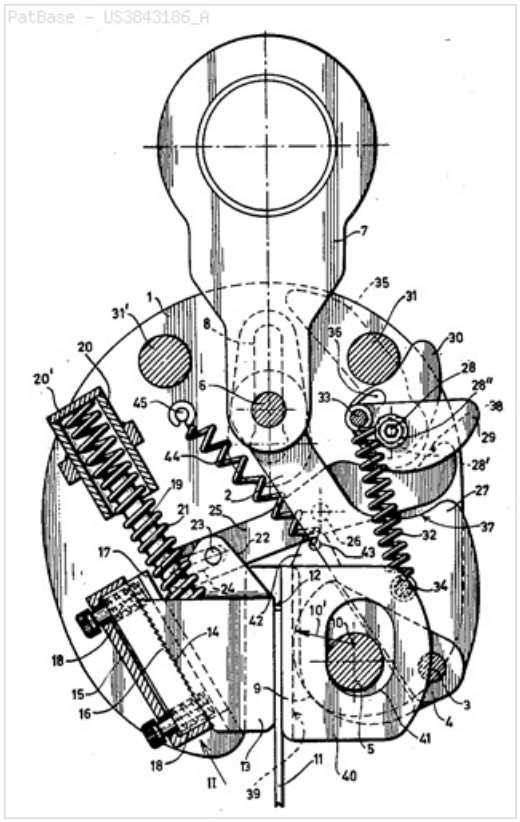
13) Family number: 19171242 (US3843186A)

Title: HOIST CLAMP

Abstract: 1385772 Hoist clamps INTERPRODUCT NV 11 April 1972 [19 April 1971 1 Feb 1972] 16705/72 Heading B8H [Also in Division E2] A hoist clamp for clamping a plate 11 comprises a toggle lever system 2, 4 pivotally coupled at a pin 3, the lever 2 being pivotally connected to a hoisting eye 7 by means of a pin 6 movable in a slot formed in the side of the clamp, the lever 4 bearing a channel member 40 having a web 39 between which and a wedge 13 the plate 11 is clamped. In the position of the clamp in Fig. 1 in which the plate 11 is clamped a locking mechanism comprising locking members 29, 30 is inoperative, but in the inoperative position of the clamp shown in Fig. 3 the said locking members 29, 30 are operative to hold the clamp in its open condition. The members 29, 30 are movable anti-clockwise from their positions shown in Fig. 3 to that of Fig. 1 by means of a handle 35 connected to a shaft 28 on which the members 29, 30 are mounted, the member 29 engaging a curved surface 37 of the lever 2 and the member 30 engaging a surface part 38 of a lever 25 which is pivotally mounted on a stationary shaft 26, a slot 24 in the lever 25 receiving a pin 23 mounted at the top of the wedge 13. In operation of the clamp to grip the plate 11 the lock members 29, 30 are rotated anti-clockwise and the member 30 disengages from the lever 25 while the member 29 remains in engagement with the lever 2, Fig. 4 (not shown). In this position a spring 21 urges the wedge 13 towards the members 9, 40, and then by further rotation of the handle 35 the member 29 becomes disengaged from the lever 2 of the toggle system whereupon on upward movement of the hoisting eye 7 the wedge 13 co-operates with a stationary block 15 so that the plate 11 is fully clamped between the wedge 13 and the channel member 40. The wedge 13 is formed with a toothed face 14 which, in the position of Fig. 1, engages with a complementary toothed face 16 of the stationary block 15. In the inoperative condition of the clamp shown in Fig. 3 the toothed faces are pressed away from each other by means of a pair of compression springs 18.

Classifications:

International (IPC 8-9): B66C1/44 B66C1/48 (Advanced/Invention); B66C1/42 (Core/Invention)
International (IPC 1-7): B66C1/00 B66C1/42 B66C1/44 B66C1/48 F16B2/14 F16B2/18
CPC: B66C1/48
European: B66C1/48
US: 294/101 294/102.1 294/104



Family:

Publication number	Publication date	Application number	Application date
AU197241268 A1	19731025	AU19720041268	19720418
BE782201 A	19721017	BE19720782201	19720417
CA957710 A1	19741112	CA19720139737	19720414
CH548343 A	19740430	CH19720005629	19720417
DD98266 C	19730612	DD19720162415	19720419
DE2218832 A1	19721207	DE19722218832	19720419
DE7214818 U	19720928	DE19720114818U	19720419
FR2133896 A1	19721201	FR19720013798	19720419
FR2133896 B1	19750620	FR19720013798	19720419
FR2133896 B3	19750620	FR19720013798	19720419
GB1385772 A	19750226	GB19720016705	19720411
IT987558 A	19750320	IT19720023320	19720419
NL7105257 A	19721023	NL19710005257	19710419
NL7201281 A	19730803	NL19720001281	19720201
US3843186 A	19741022	US19720245071	19720418
ZA7202479 A	19730328	ZA19720002479	19720413

Priority:

NL19710005257 19710419 NL19710015257 19710419 NL19720001281 19720201
NL19720021281 19720201

Probable Assignee: INTERPRODUCT NV

Assignee(s): (std)**:** INTERPRODUCT N V ; INTERPRODUCT N V 38 44 BUNTLAAN DRIEBERGEN NEDER ; INTERPRODUCT NV ; INTERPROD NV

Assignee(s): INTERPROD NV NL ; INTERPRODUCT N V 38 44 BUNTLAAN DRIEBERGEN NEDERL ; INTERPRODUCT N V 38 44 BUNTLAAN DRIEBERGEN NEDERLAND ; VAN DE WETERING MARTINUS B

Inventor(s): (std)**:** DE WETERING M VAN ; MARTINUS VAN DE WETERING ; VAN DE WETERING M ; VAN DE WETERING MARTINUS B ; WETERING MARTINUS VAN DE

Inventor(s): VAN DE WETERING M NL

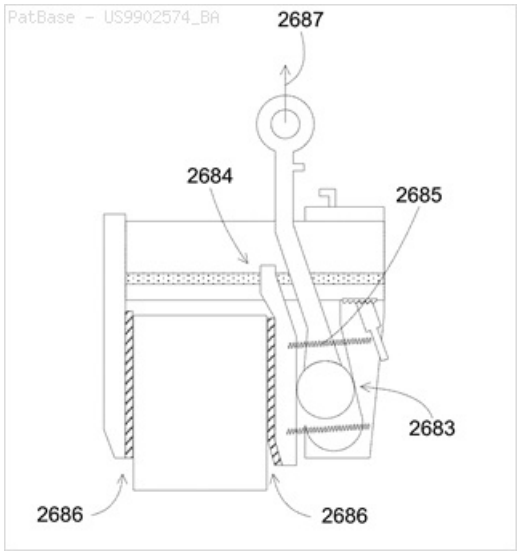
14) Family number: 68692243 (US9902574B)

Title: CLAMPING DEVICE FOR LIFTING AND TRANSFER OBJECTS

Abstract: A clamping device for lifting and transferring objects can employ slanting interfaces to convert a pulling action on the clamping device to a clamping action on the object. A pulling element in the form of a triangle can be disposed between a jaw and a jaw support of the clamping device. When the pulling element is pulled up, the base of the triangle shape pulling element can exert a force on the jaw against the jaw support, for securing a gripping action on the object.

Classifications:
International (IPC 8-9): A47F7/28 B25B5/16 B65G1/04 B65G1/06 B65G63/00 B66C1/28 B66C1/44 B66C1/48 E04H6/24

F16B2/14 (Advanced/Invention)
CPC: B66C1/442 A47F7/28 B65G1/04 B65G1/0492 B65G1/06 B65G63/004 B66C1/48 E04H6/245



Family:

Publication number	Publication date	Application number	Application date
AU2017276165 AA	20180906	AU20170276165	20171211
AU2017276165 BB	20181129	AU20170276165	20171211
CA2988716 AA	20180821	CA20172988716	20171212
CN108455448 A	20180828	CN201810133115	20180209
EP3363332 A1	20180822	EP20180150916	20180110
US9902574 BA	20180227	US20170438735	20170221
WO18154441 A1	20180830	WO2018IB51041	20180221

Priority:

US20170438735 20170221

Probable Assignee: NGUYEN NHON HOA

Assignee(s): (std)**:** NGUYEN HOA ; NGUYEN HOA NHON ; NGUYEN NHON

Assignee(s): NGUYEN NHON HOA

Inventor(s): (std)**:** NGUYEN HOA NHON ; HOA NHON NGUYEN ; NGUYEN NHON HOA

Agent(s): ATKINSON IP; BHOLE IP LAW; HIMMELSBACH MATHIAS; TUE

Designated states: AE AG AL AM AO AT AU AZ BA BB BE BF BG BH BJ BN BR BW BY BZ CA CF CG CH CI CL CM CN CO CR CU CY CZ DE DJ DK DM DO DZ EC EE EG ES FI FR GA GB GD GE GH GM GN GQ GR GT GW HN HR HU ID IE IL IN IR IS IT JO JP KE KG KH KM KN KP KR KW KZ LA LC LI LK LR LS LT LU LV LY MA MC MD ME MG MK ML MN MR MT MW MX MY MZ NA NE NG NI NL NO NZ OM PA PE PG PH PL PT QA RO RS RU RW SA SC SD SE SG SI SK SL SM SN ST SV SY SZ TD TG TH TJ TM TN TR TT TZ UA UG US UZ VC VN ZA ZM ZW

15) Family number: 245254 (DE1481741A1)

Title: KLEMME ZUM HEBEN EINER PLATTE TERMINAL FOR LIFTING A PLATE (Machine translation)

Abstract: Source: DE1481741A1 [DE] (Claim 1) 1. Patentansprueche Klemme zum Heben einer Platte, die eine bewegliche Klemmbacke und eine feststehende Klemmbacke aufweist,dadurch gekennzeich- net, dass die Klemmflaeche (17A) der feststehenden Klemmbacke (17) eine aufgerauhte Ausbildung aufweist.

Machine translation: (claim 1) 1 Claims for lifting a terminal plate having a movable clamping jaw and a fixed jaw , characterized Marked-net that the Klemmflaeche (17A) of the fixed jaw (17) comprises a roughened training.

Classifications:
International (IPC 8-9): B66C1/48 (Advanced/Invention);
B66C1/42 (Core/Invention)
International (IPC 1-7): B66C1/48
CPC: B66C1/48
European: B66C1/48

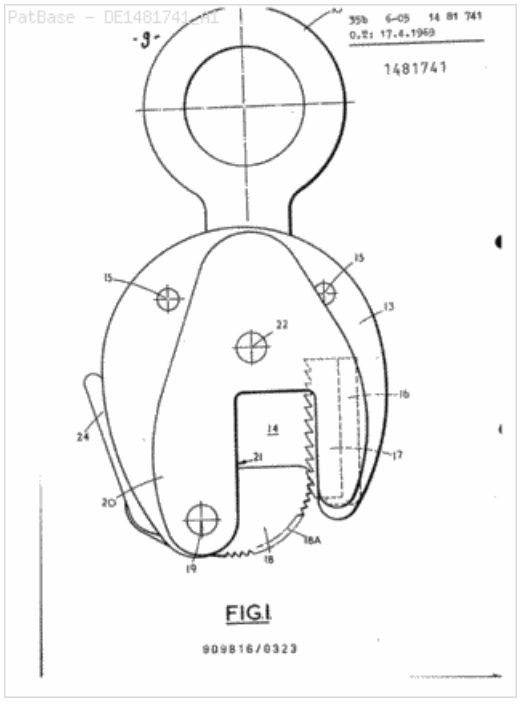


FIG.1

909816/0323

Family:

Publication number	Publication date	Application number	Application date
DE1481741 A1	19690417	DE19671481741	19670119

Priority:

DE1967D052054 19670119

Probable Assignee: DEEWELD LTD

Assignee(s): (std)**:** DEEWELD LTD

Inventor(s): (std)**:** BURNS LAWRENCE

16) Family number: 73926268 (US2019106299A)

Title: CLAMPING DEVICE WITH SINGLE MOVABLE JAW

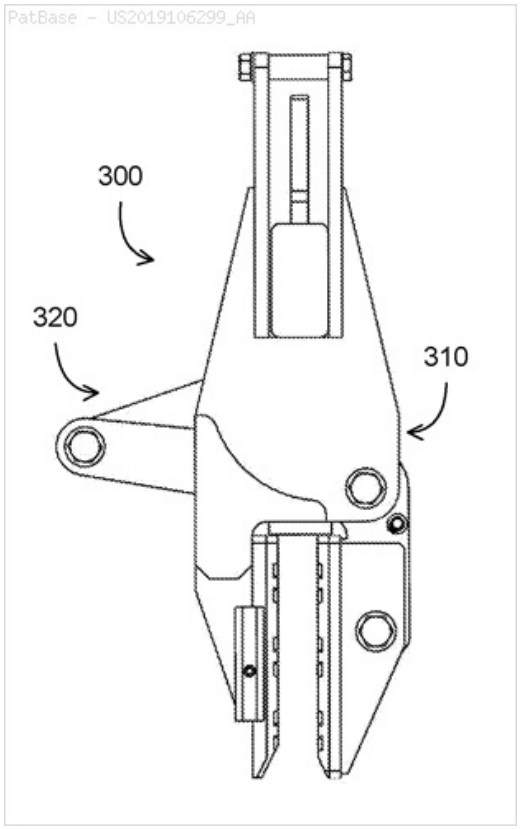
Abstract: A clamping device for lifting and moving objects can include a fixed and rotatable jaw facing a movable and rotatable jaw, which is activated by an arm assembly coupled to a fixed body. The clamping device can include a hand-free mechanism for switching between a clamping action and a jaw opening action for inserting the object. The clamping device can include a guiding mechanism for guiding an object to the space between the jaws, effectively enlarging the jaw opening for ease of clamping on thicker objects.

Classifications:

International (IPC 8-9): B62B1/26 B62B3/04 B62B3/10 B65G1/06 B65G7/12 B66C1/42 B66C1/44 B66C1/48 B66F9/06 E04F21/18 E04G21/14 E04G21/16 F16B2/10 (Advanced/Invention)

CPC: B66C1/48 E04G21/168 E04F21/1822 E04F21/1816 E04F21/1844

US: 1/1 414/11



Family:

Publication number	Publication date	Application number	Application date
AU2018349288 AA	20190613	AU20180349288	20181010
AU2018349288 AA	20190418	AU20180349288	20181010
CA3047309 AA	20190613	CA20183047309	20181010
US2019106299 AA	20190411	US20180154734	20181009
US2019145113 AA	20190516	US20180188744	20181113
WO19073392 A1	20190418	WO2018IB57829	20181010
WO19092682 A1	20190516	WO2018IB58922	20181113

Priority:

US20170570108P 20171010 US20170584923P 20171113 US20180741555P 20181005
US20180741557P 20181005 US20180154734 20181009 WO2018IB57829 20181010
US20180188744 20181113

Probable Assignee: NGUYEN NHON HOA

Assignee(s): (std)**:** NGUYEN NHON HOA

Inventor(s): (std)**:** NGUYEN NHON HOA

Agent(s): ATKINSON IP

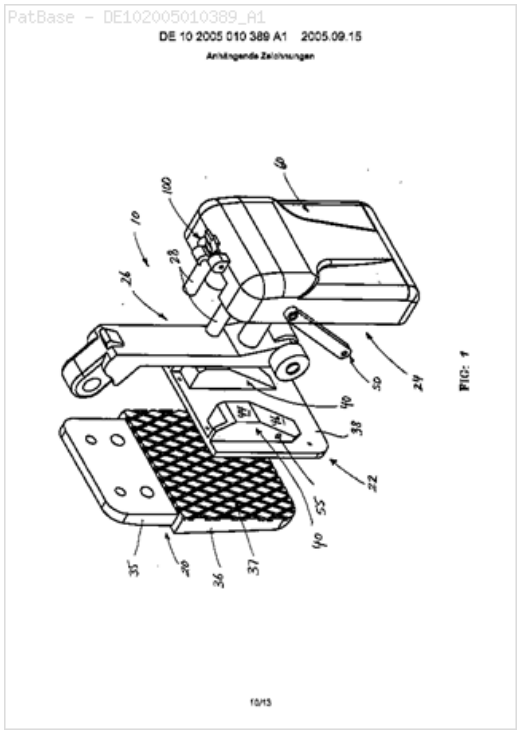
Designated states: AE AG AL AM AO AT AU AZ BA BB BE BF BG BH BJ BN BR BW BY BZ CA CF CG CH CI CL CM CN CO CR CU CY CZ DE DJ DK DM DO DZ EC EE EG ES FI FR GA GB GD GE GH GM GN GQ GR GT GW HN HR HU ID IE IL IN IR IS IT JO JP KE KG KH KM KN KP KR KW KZ LA LC LK LR LS LT LU LV LY MA MC MD ME MG MK ML MN MR MT MW MX MY MZ NA NE NG NI NL NO NZ OM PA PE PG PH PL PT QA RO RS RU RW SA SC SD SE SG SI SK SL SM SN ST SV SY SZ TD TG TH TJ TM TN TR TT TZ UA UG US UZ VC VN ZA ZM ZW

17) Family number: 32173281 (DE102005010389B4)

Title: KLEMMVORRICHTUNG ZUM HEBEN VON PLATTEN-, PANEEL- ODER BLECHMATERIAL

Abstract: The clamping device (10) has stationary and movable jaws (20,22) having respective clamping surfaces (37), and an actuating carriage (26) for transmitting a clamping force. The carriage is arranged between movable jaw and a frame housing (24) for reciprocating movement along a longitudinal axis on actuator tracks provided at movable jaw and frame housing. A portion of one of the actuator tracks has an inclined portion biasing the movable jaw towards the stationary jaw as the carriage is caused by clamping force to be displaced along the inclined portion, wherein the respective clamping surfaces contact the opposite faces of a sheet-like object when received within the frame and frictionally clamp the object against displacement. The movable jaw is supported at and mounted to the frame by link arms (50) that are articulated or pivoted at the movable jaw and near the upper end of frame, respectively.

Classifications:
International (IPC 8-9): B66C1/44 B66C1/48 (Advanced/Invention);
B66C1/42 (Core/Invention)
International (IPC 1-7): B66C1/44 B66C1/48
CPC: B66C1/44 B66C1/48



Family:

Publication number	Publication date	Application number	Application date
AU2005201021 AA	20050728	AU20050201021	20050307
AU2005201021 BB	20090122	AU20050201021	20050307
AU2009201532 AA	20090514	AU20090201532	20090420
AU2009201532 AB	20090528	AU20090201532	20090420
AU2009201632 AA	20090521	AU20090201632	20090424
DE102005010389 A1	20050915	DE200510010389	20050307
DE102005010389 B4	20100805	DE200510010389	20050307

Priority:

VN200400017 20040107 VN20040000017 20040107 AU20050201021 20050307
AU20090201532 20090420 AU20090201632 20090424

Probable Assignee: ABACO MACHINES AUSTRALASIA PTY

Assignee(s): (std)**:** ABACO MACHINES AUSTRALASIA PTY ; ABACO MACHINES AUSTRALASIA PTY LTD ; ABACO MACHINES PTY LTD

Assignee(s): ABACO MACHINES AUSTRALASIA PTY LIMITED

Inventor(s): (std)**:** NGUYEN NHON HAU ; NHON HAU NGUYEN

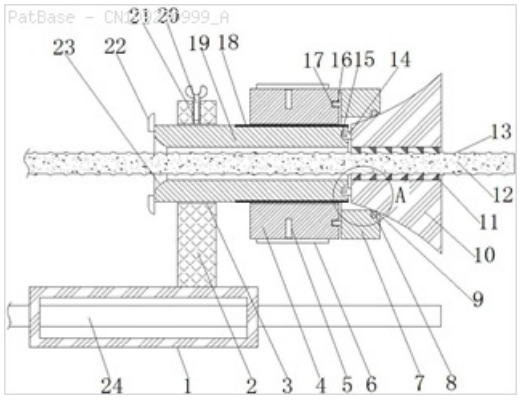
Agent(s): WATERMARK PATENT AND TRADE MARKS ATTORNEYS; WATERMARK INTELLECTUAL PROPERTY PTY LTD; ATKINSON IP

18) Family number: 72893297 (CN109230999A)

Title: STEEL-BAR LIFTING DEVICE FOR ARCHITECTURAL ENGINEERING

Abstract: The invention belongs to the technical field of steel-bar lifting, and particularly relates to a steel-bar lifting device for architectural engineering, aiming at the problem that steel bars are stilleasy to fall in spite of repeated bundling in the conventional lifting process. The steel-bar lifting device comprises steel bar bodies, a middle beam and two beam tubes; equidistantly-distributed fixed snap rings are welded with the upper surface of each beam tube, and a round hole is reserved in the middle of each fixed snap ring; clamping devices are inserted into the round holes, and compriseround tubes, inner threaded tubes and tightening rings; the inner threaded tubes and the tightening rings are screwed to the circumferential outer walls of the round tubes; a self-locking thread is reserved at one end, away from the middle beam, of the circumferential outer wall of each round tube. The steel-bar lifting device has the advantages that two arc-shaped film flaps can tightly clamp the steel bar bodies in the middle when gathering towards the middle, and can cooperate with stop teeth to press against ribs on the outer walls of the steel bar bodies, and accordingly, the steel bar bodies are prevented from horizontal movement after being stressed.

Classifications:
International (IPC 8-9): B66C1/44 B66C1/62 (Advanced/Invention)
CPC: B66C1/62 B66C1/48



Family:

Publication number	Publication date	Application number	Application date
CN109230999 A	20190118	CN201811336538	20181112

Priority:

CN201811336538 20181112

Probable Assignee: WANG LIANG

Assignee(s): (std)**:** WANG LIANG

Inventor(s): (std)**:** WANG LIANG

19) Family number: 68852306 (CN207566736U)

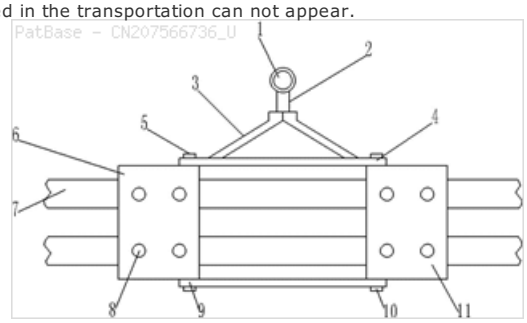
Title: FIXED CONVEYER OF BUILDING STEEL PIPE CONVENIENT TO EQUIPMENT

Abstract: The utility model provides a fixed conveyer of building steel pipe convenient to equipment belongs to the building field. Press from both sides tight seat, lead screw, arc fixed rubber pad, arc limiting rubber pad and clamping hole including the tight seat of first clamp, steel pipe, second, clamping hole sets up in tight seat of first clamp and the tight seat of second clamp, arc limiting rubberpad adopts the fixed bonding of glue on the inboard arc wall of clamping hole, the lead screw passes through the rotatory setting in internal thread hole in clamping hole, arc limiting rubber pad adopts the fixed bonding of glue on the stopper lateral wall, the steel pipe sets up at the tight seat right -hand member of second clamp through the clamping hole that tight of first clamp and second pressed from both sides in the tight seat, and the steel pipe lateral wall pastes on the fixed rubber pad of arc, hugs closely the steel pipe through the arc limiting rubber pad on the rotary screw rod removal stopper. The utility model discloses the device sets up rationally, and the equipment is convenient, and firm safety can be be effectively transported the steel of equidimension, length not, the problem that the steel pipe dropped in the transportation can not appear.

Classifications:

International (IPC 8-9): B66C1/44 B66C1/48 (Advanced/Invention)

CPC: B66C1/48



Family:

Publication number	Publication date	Application number	Application date
CN107792781 A	20180313	CN201710968702	20171018
CN207566736 U	20180703	CN201721338427U	20171018

Priority:

CN201710968702 20171018 CN201721338427U 20171018

Probable Assignee: HUIAN JIRUI INFORMATION TECH CO LTD

Assignee(s): (std)**:** FANG WENBIN ; HUIAN JIRUI INFORMATION TECH CO LTD

Assignee(s): HUIAN JIRUI INFORMATION TECHNOLOGY CO ; PARTY ANNIK ; HUI AND SET RUI INFORMATION TECHNOLOGY CO LTD

Inventor(s): (std)**:** FANG WENBIN ; HUANG WENKAI

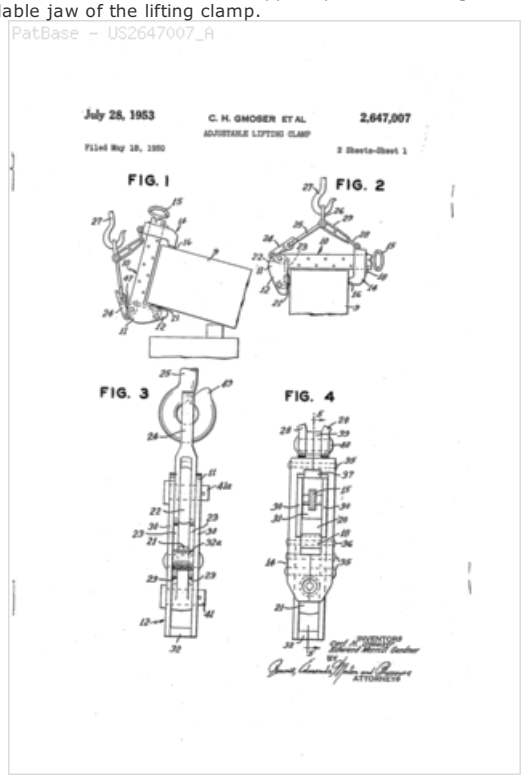
20) Family number: 22452324 (US2647007A)

Title: ADJUSTABLE LIFTING CLAMP

Abstract: (Claim 1) 1. An adjustable lifting clamp comprising a. tension beam having a head including a fixed clamping jaw extending from one side of the beam, said tension beam comprising a pair of similar steel side plates mounted face to face in spaced relation, a spacer bar mounted between said plates from substantially the head of the beam to the opposite end of the

beam thereby providing a space between the portions of the plates fornnng the head of the clamp and jaw, means for securing said plates and bar in a compact rigid assembly, a slidable jaw mounted on said beam facing said nxed jaw, means for retaining said slidable jaw in position along said beam, a cam pivcted between the plates in the lower portion of the fixed jaw and adapted to be rotated toward the slidable jaw in a. lifting operation, leverage means mounted between the plates in said head including a. radius link pivoted in the upper portion of the head and extending generally in the direction of the beam, a pair of compression connecting links arranged in parallel with one end of the pair of links pivoted to the inner end of the radius link, the other end of the pair of connecting links being pivoted to the cam inwardly from its pivot point with respect to the plates forming the jaw, and a forked lifting linkage one leg of which is pivotally connected to the slidable jaw and the other leg of which is pivotally connected to the outer end of the radius link, whereby the application of a force to the outer end of the radius link applies pressure through the radius link to said pair of connecting links to force the cam toward the slidable jaw of the lifting clamp.

Classifications:
International (IPC 8-9): B66C1/48 (Advanced/Invention); B66C1/42 (Core/Invention)
International (IPC 1-7): B66C1/44
CPC: B66C1/48
European: B66C1/48
US: 294/101 294/104



Family:

Publication number	Publication date	Application number	Application date
US2647007 A	19530728	US19500162672	19500518

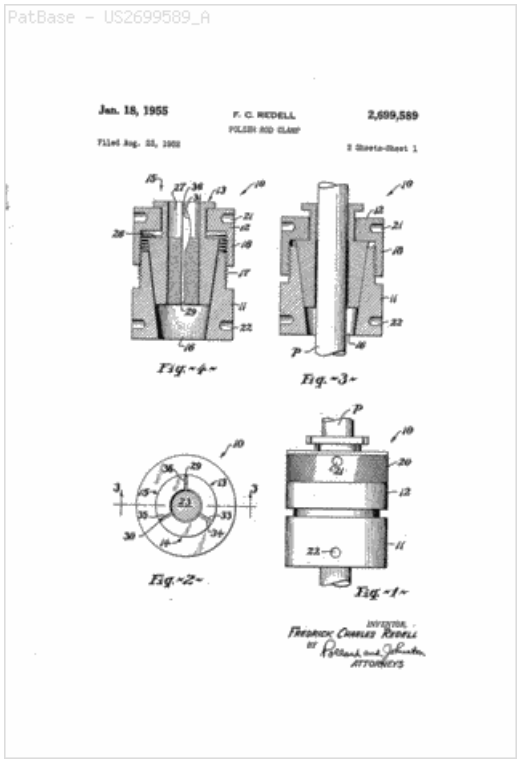
Priority:
US19500162672 19500518

Probable Assignee: MERRILL BROTHERS
Assignee(s): (std): MERRILL BROTHERS
Inventor(s): (std): GMOSER CARL H ; MERRILL GARDNER EDWARD
Inventor(s): GARDNER EDWARD MERRILL

21) Family number: 23773332 (US2699589A)

Abstract: (Claim 1) The outer surface of cap member 12 may be milled or knurled, as at 20, to facilitate gripping thereof in eflecting rotation of the cap member relative to the lower cup member. Further, the cap member and lower cup member are preferably formed with radially opening blind bores 21 and 22 respectively, to accommodate suitable wrenches for star_ing the relative rotation of the cap member and lower cup member. The circular to of cap member 12 is formed with a central opening 23 (Fig. 8) for receiving portions of wedge members 13, 14 and 15, which are now to be described in detail. Each of the wedge members is formed to encompass slightly less than one-third of the polish rod P which is to be clamped so that small radial spaces are defined between the confronting edges of the wedge members when the latter are arranged around the polish rod, as shown in Fig.

Classifications:
International (IPC 1-7): F04B21/08
CPC: Y10S411/918 Y10S411/935 B66C1/48 F04B27/047 Y10T279/17581 Y10T403/7054
US: 254/29A 279/56 294/102.1 403/369 411/918 411/935



Family:

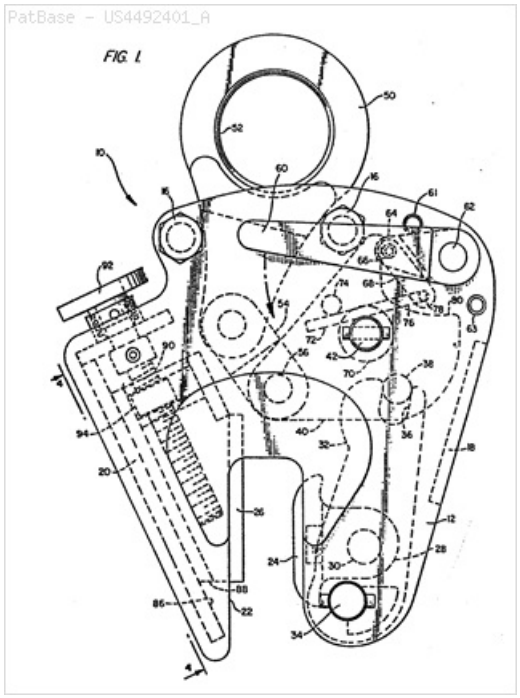
Publication number	Publication date	Application number	Application date
US2699589 A	19550118		00000000

22) Family number: 17914372 (US4492401A)

Title: Non-marring lifting clamp

Abstract: A non-marring lifting clamp for articles such as metal plates has a pair of opposed jaws mounted on opposite sides of a slot formed in the side plates of the clamp body with one of the jaws being pivotally mounted for opening and closing movements relative to the other jaw, and a lifting shackle being mounted for guided movement in the clamp body. A linkage assembly in the body couples the shackle to the pivotally mounted gripping jaw to urge the gripping jaw toward the other jaw when a lifting force is applied to the shackle. The linkage assembly includes a swing link connected to move the gripping jaw and a control link pivoted to the clamp body with a connecting mechanism coupling the control link both to the shackle and to the swing link. A manually operated pivotally mounted handle accessible exteriorly of the clamp body operates a locking mechanism which includes a coil spring associated with the control link, this spring acting on such control link and being tensioned or released by operation of the handle. The locking mechanism includes a cam link mechanism connected to be shifted by handle movements, the cam link mechanism cooperating through the coil spring with the control link to bias the control link alternately to the jaw closing position or jaw open position. The cam link means also provides a limiting stop acting on the control link to retain it alternately in jaw open position or jaw closing position while still allowing limited opening movement of the jaws by overcoming the biasing force of the tensioned coil spring. The lifting clamp further has the other jaw carried on a manually adjustable wedge with visually observable indicia associated with this other jaw and also with the gripping jaw for the operator to visually determine the clamp's suitability in handling a particular size plate to be lifted.

Classifications:
International (IPC 8-9): B66C1/00 B66C1/48 B66C1/62 B66C1/64 F16B2/12 F16B2/18 (Advanced/Invention); B66C1/62 (Advanced/Non-invention); B66C1/42 B66C1/62 F16B2/02 (Core/Invention)
International (IPC 1-7): B66C1/00 B66C1/42 B66C1/48 B66C1/64 B66D3/02 B66F19/00 F16B2/12 F16B2/18
CPC: B66C1/48
European: B66C1/48
US: 294/101 294/104
JP F-Term: 3F004 3F004/EA03 3F201 3F201/EA03 3J022 3J022/AA05 3J022/BC06 3J022/BE02 3J022/EA41 3J022/EB03 3J022/EC02 3J022/ED02 3J022/FA01 3J022/FB12 3J022/FB15 3J022/GA06 3J022/GA13 3J022/GA15 3J022/GA17 3J022/GB23 3J022/GB28 3J022/GB32
JP F-Index: B66C1/48 B66C1/62/X B66C1/64 F16B2/12/A F16B2/18/B F16B2/18/F



Family:

Publication number	Publication date	Application number	Application date
AU198429349 A1	19841220	AU19840029349	19840613
CA1228095 A1	19871013	CA19840456503	19840613
EP0131396 A1	19850116	EP19840304014	19840614
JP1434854 C3	19880407	JP19840122876	19840614
JP60069306 A2	19850420	JP19840122876	19840614
JP62044125 B4	19870918	JP19840122876	19840614
KR19850000354 A	19850226	KR19840003331	19840614
KR850000354 A	19850226	KR19840003331	19840614
US4492401 A	19850108	US19830504313	19830614

Priority:

US19830504313 19830614 CA19840456503 19840613

Probable Assignee: JC RENFROE AND SONS INC JACKSONVILLE FLA A CORP OF

Assignee(s): (std)**:** RENFROE J C AND SONS INC ; RENFROE AND SONS INC J ; RENFROE AND SONS J C

Assignee(s): JEI SHII RENFUROO ANDO SANZU INC ; JIEI SHII RENFUROO ANDO SANZU INC ; RENFROE CHARLES J ; RENFROE JC AND SONS INC ; DAVIES WILLIAM ; J C RENFROE AND SONS INC ; JC RENFROE AND SONS INC ; JC RENFROE AND SONS INC JACKSONVILLE FLA A CORP OF

Inventor(s): (std)**:** RENFROE CHARLES J ; DAVIES WILLIAM ; CHIYAARUZU JIEI RENFUROO ; UIRIAMU DEEBISU ; CHARLES J RENFROE ; WILLIAM DAVIES

Inventor(s): CHAARUZU JEI RENFUROO

Agent(s): WATERMARK PATENT AND TRADE MARKS ATTORNEYS; WATERMARK INTELLECTUAL PROPERTY PTY LTD; SIM AND MCBURNEY

Designated states: BE DE FR GB IT SE

23) Family number: 59967482 (CN104803282A)

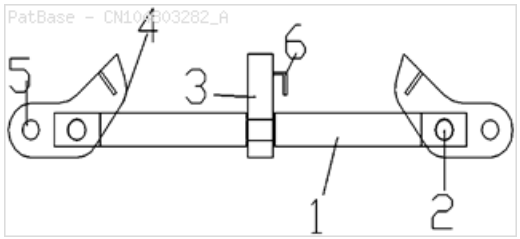
Title: CLAMP CAPABLE OF BEING USED FOR VERTICALLY HANGING STEEL PIPES

Abstract: The invention relates to a clamp capable of being used for vertically hanging steel pipes. The clamp is provided with a plurality of arc plates, wherein the arc plates are connected into a sealed circular ring structure through a press tongue shaft arranged among the arc plates, a press tongue is pivoted on the press tongue shaft, the bottom force arm of the press tongue is a flat end, and a press tongue tooth extends from one end of the bottom force arm towards the upper edge. The clamp has the advantages that the self weight of the steel pipes can be used for enabling the press tongue of the clamp to freely and tightly press the steel pipes, and in addition, the vertical steel pipes can be hung up; after the steel pipes reach the proper position, when a slide rope is pulled by force, the self weight of the clamp can be used for releasing the press tongue, in addition, after the falling to the convenient-to-operate height along with the descending of a crane, a steel wire rope is hung in a hook, the clamp can be lifted, and release of a hanging machine is also realized. The problem that a hanging point needs to be welded and dismounted during the steel pipe hanging is solved; the materials are greatly saved, the hanging efficiency is improved, and the adverse influence caused on the steel pipes is avoided.

Classifications:

International (IPC 8-9): B66C1/48 (Advanced/Invention)

CPC: B66C1/48



Family:

Publication number	Publication date	Application number	Application date
CN104803282 A	20150729	CN201510249000	20150515

Priority:

CN201510249000 20150515

Probable Assignee: OFFSHORE OIL ENGINEERING ZHUHAI CO LTD

Assignee(s): (std)**:** CHINA NAT OFFSHORE OIL CORP ; CHINA NATIONAL OFFSHORE OIL CORP ; OFFSHORE OIL ENG CO LTD ; OFFSHORE OIL ENGINEERING CO LTD ; OFFSHORE OIL ENGINEERING ZHUHAI CO LTD

Assignee(s): OFFSHORE OIL ENGINEERING ZHUHAI CO ; OFFSHORE OIL ENGINEERING CO

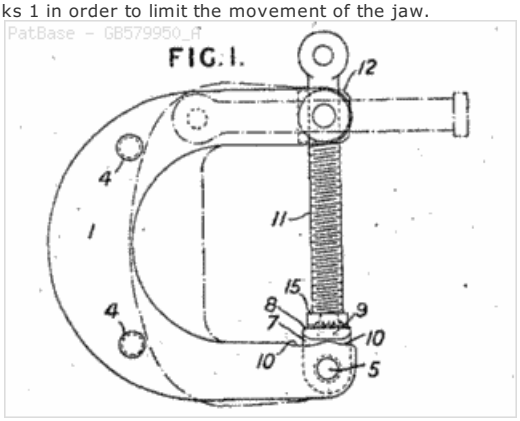
Inventor(s): (std)**:** HUANG ZHIHUI ; JIA QIUXUAN ; LI JING ; LI WENWU ; LU FEI ; REN KAI ; WANG CHANGLIN ; WEI XUMIN ; YANG KAIWEN ; ZHANG CHAOJUN ; ZHANG CHUANRONG ; ZHAO WEN

24) Family number: 19309514 (GB579950A)

Title: Improved grab

Abstract: 11158. [Class 61 (ii)] The body of a clamp consists of two cheeks 1 spaced apart and secured by distance pieces 4 and 5 and the upper jaw 15 is carried on an eye-bolt 11 working in a pivotally mounted nut 12 enabling the eye bolt to be housed between the body cheeks for protection against damage or to allow the clamp to pass over obstruction without being unscrewed. The distance piece 5 acts also as a support-for the pivotally mounted jaw 7 which has a serrated upper surface 8 projecting sideways at 9. so as to overhang and co-act with the stops 10 on the cheeks 1 in order to limit the movement of the jaw.

Classifications:
International (IPC 8-9): B66C1/48 (Advanced/Invention);
B66C1/42 (Core/Invention)
International (IPC 1-7): B25B5/10
CPC: B66C1/48
European: B66C1/48



Family:

Publication number	Publication date	Application number	Application date
GB579950 A	19460821	GB19440011158	19440610

Priority:

GB19440011158 19440610

Probable Assignee: GAVIN MEIKLE NORTH

Assignee(s): (std)**:** GAVIN MEIKLE NORTH

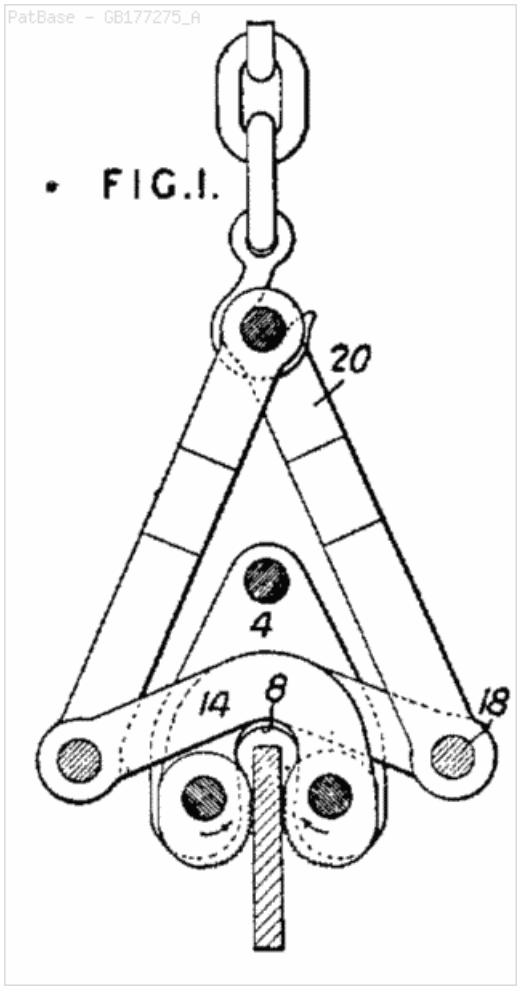
25) Family number: 18237592 (GB177275A)

Title: Improved lifting clamps

Abstract: Lifting dogs. Double grip liftingdcgs, for raising flat articles such as metal plates, are constructed so that the gripping jaws exert an inward and upward pressure on the plate being lifted. Two links 20 suspended from a hook or the like are pivoted to curved gripping levers 14 which are pivoted in turn to a pair of parallel plates 4 at the lower end of a central load-receiving notch 8 in the plates. When the clamp is free, the weight of the unsupported plates 4 depresses the inner end of the gripping-levers and so rotates them about the axes 18 to close the jaws. On being lowered into contact with a plate the closed jaws rest on the edge of the plate until the continued lowering of the links 20 rotates the levers 14 to open the jaws sufficiently to allow the plate to pass into the notch. Tension applied to the members 20 then closes the gripping-levers again so that the jaws engage the plate with an upward bite.

Classifications:
International (IPC 8-9): B66C1/48 (Advanced/Invention);
B66C1/42 (Core/Invention)
CPC: B66C1/48

European: B66C1/48



Family:

Publication number	Publication date	Application number	Application date
GB177275 A	19220330	GB19200036537	19201230

Priority:

GB19200036537 19201230

Probable Assignee: WILLIAM MARKLE HENCH

Assignee(s): (std)**:** WILLIAM MARKLE HENCH

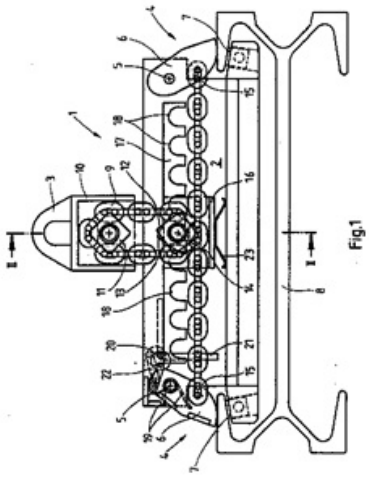
26) Family number: 4521597 (EP0216175A1)

Title: Load Transporting Device.

Abstract: 1. A load transporting device which has beneath an intermediate suspending member (3) for suspending in a lifting device at least two pivotable clamping levers (6) mounted on crossbolts (5), which are connected to the suspending member (3) by a force transmitting and pulling element coupling the two clamping levers (6), characterized in that the clamping levers (6) are arranged between longitudinal walls (2) of a load crossbeam (1) connected to one another rigidly to form a frame and the load crossbeam (1) has the clamping levers (6) and opposed rails (17) fixes on the inside on the longitudinal walls which are provided with a plurality of recesses (18) spaced apart from one another.

Classifications:

International (IPC 8-9): B66C1/48 B66C1/64 (Advanced/Invention)
International (IPC 1-7): B66C1/48 B66C1/64
CPC: B66C1/48 B66C1/64
European: B66C1/48 B66C1/64



Family:

Publication number	Publication date	Application number	Application date
DE3534261 C1	19870702	DE19853534261	19850926
EP0216175 A1	19870401	EP19860111818	19860826
EP0216175 B1	19890524	EP19860111818	19860826

Priority:

DE19853534261 19850926

Probable Assignee: RHEIN RUHR FABRIKATIONS UND HA

Assignee(s): (std)**:** RHEIN RUHR FABRIKAT GMBH ; RHEIN RUHR FABRIKATIONS U HA ; RHEIN RUHR FABRIKATIONS UND HA

Assignee(s): RHEIN RUHR FABRIKATIONS UND HANDELSGESELLSCHAFT MBH ; RHEIN RUHR FABRIKATIONS UND HANDELSGESELLSCHAFT MBH 4000 DUESSELDORF DE

Inventor(s): (std)**:** ROERIG WILHELM ; RORIG WILHELM

Inventor(s): ROERIG WILHELM 4700 HAMM DE

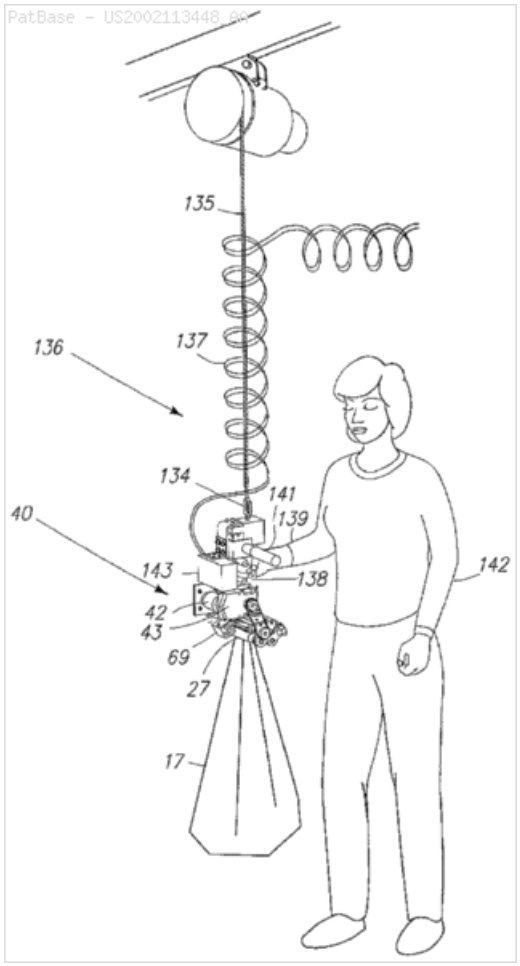
Designated states: FR GB

27) Family number: 28300675 (US2002113448A)

Title: Mechanical grapple for manipulating objects

Abstract: The invention provides a grapple device and a method for manipulating, i.e., grabbing, holding and releasing objects. The grapple comprises two parallel rollers with gripping surfaces, where the rollers are pushed towards each other with sufficient force to hold a graspable portion of a deformable object. When the grapple comes onto contact with any portion of the deformable object, a signal activates a set of gears causing the rollers to rotate in opposing directions so that a graspable portion of the object is dragged between the rollers. When sufficient material is caught between the rollers, a signal activates a brake automatically stopping the rotation of the rollers, whereby the rollers then hold the graspable portion of the object allowing the object to be moved to a desired location. When the object is properly located, a signal is generated which causes the rollers to rotate in the opposite direction to release the object. The grapple device of the invention provides a control system to generate the signals and operated the grapple.

Classifications:
International (IPC 8-9): B25J15/00 B66C1/44 B66C1/48 B66D3/18 (Advanced/Invention)
International (IPC 1-7): B25J15/00 B66C1/42 B66C1/44 B66C1/59
CPC: B25J15/00 B66C1/445 B66C1/48 B66D3/18
European: B25J15/00 B66C1/44D B66C1/48 B66D3/18
US: 271/21 294/1.1 294/106 294/106S 294/213 294/86.4 294/86.400P 901/35 901/38



Family:

Publication number	Publication date	Application number	Application date
US2002113448 AA	20020822	US20010876010	20010607
US2002125727 AA	20020912	US20010755496	20010105
US6474711 BB	20021105	US20010876010	20010607
US6554337 BB	20030429	US20010755496	20010105

Priority:

US20000251931P 20001207 US20010755496 20010105 US20010876010 20010607

Probable Assignee: KAZEROONI HOMAYOON

Assignee(s): (std)**:** KAZEROONI HOMAYOON

Assignee(s): FOLEY CHISTOPHER JUDE ; FOLEY CHRISTOPER JUDE

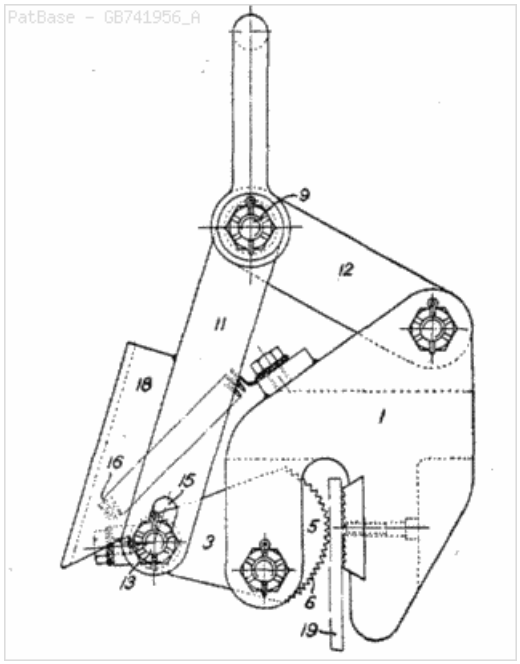
Inventor(s): (std)**:** KAZEROONI HOMAYOON ; FOLEY CHRISTOPER JUDE ; FOLEY CHISTOPHER JUDE ; FOLEY CHRISTOPHER JUDE

28) Family number: 20161677 (GB741956A)

Title: Improvements relating to lifting dogs

Abstract: 741,956. Lifting dogs. FERRANTI, Ltd. May 7, 1954 [May 8, 1953], No. 12830/53. Class 78 (4). To prevent jerking from causing the load 19 to slip from the lifting dog shown, lost motion is provided between the cam 3 by which the load is secured and the spindle 9 by which the dog is suspended, and an elastic bias urges the cam 3 to its gripping position. The lost motion may be provided by a slot 15 in which a pin 13 of the cam 3 may engage or by a slot in the link 11 to receive the pin 9 or by a slot in the cam 3 to receive a pin in the link 11. The bias may be provided by a tension spring 16 connected between the frame 1 and the cam 3 as illustrated or by a compression spring acting between the frame 1 and the end 5 of the cam. A guard 18 protects the spring 16. Either or each link 11, 12 may be replaced by two or more parallel links and the cam surface 6 may be provided on a separate component secured to the cam lever 3. The lost motion and bias are such that the dog can be opened by lowering it to rest on the ground.

Classifications:
International (IPC 8-9): B66C1/48 (Advanced/Invention);
B66C1/42 (Core/Invention)
International (IPC 1-7): B66C1/48
CPC: B66C1/48
European: B66C1/48



Family:

Publication number	Publication date	Application number	Application date
GB741956 A	19551214	GB19530012830	19530508

Priority:

GB19530012830 19530508

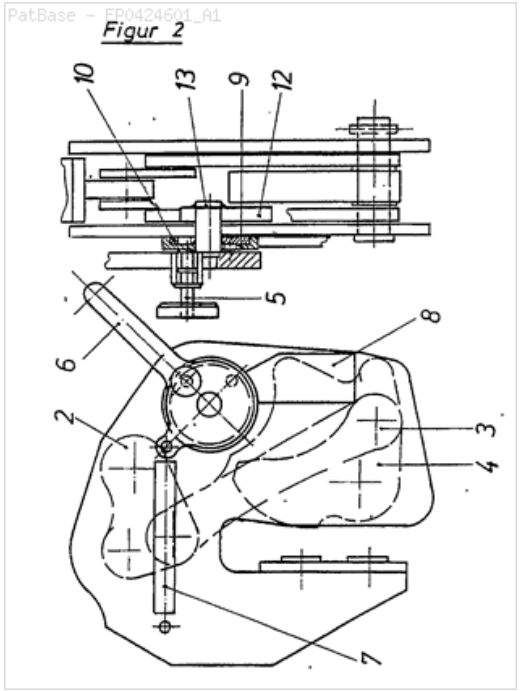
Probable Assignee:	FERRANTI LTD
Assignee(s): (std)**:**	FERRANTI LTD
Assignee(s):	FERRANTI LIMITED
Inventor(s): (std)**:**	RATCLIFFE THOMAS

29) Family number: 8034691 (EP0424601A1)

Title: CLAMP FOR THE TRANSPORT OF SHEET METAL.

Abstract: Clamps for the transport of long material according to DIN 1502, Section 1.5, characterised by a stepping mechanism (6, 5, 7, 9, 10, 12, 13) which prevents inadvertent or unintentional opening of the clamp during transport. First pull: stepping mechanism prepares opening mechanism. Second pull: clamp is opened. Sheet-pile clamps must be released from below after the sheet piles are orientated. This is done with a cable (14) which is pulled from below and sets the opening mechanism in motion.

Classifications:
International (IPC 8-9): B66C1/48 (Advanced/Invention); B66C1/42 (Core/Invention)
International (IPC 1-7): B66C1/48
CPC: B66C1/48
European: B66C1/48



Family:

Publication number	Publication date	Application number	Application date
DE3935758 A1	19910502	DE19893935758	19891027
DE3935758 C2	19930909	DE19893935758	19891027
EP0424601 A1	19910502	EP19900108167	19900428

Priority:

DE19893935758 19891027

Probable Assignee: SIEGERT AND CO

Assignee(s): (std)**:** SIEGERT AND CO ; SIEGERT AND CO GMBH AND CO

Assignee(s): SIEGERT AND CO 2000 HAMBURG DE

Inventor(s): (std)**:** VOIGT WILHELM

Inventor(s): VOIGT WILHELM 2080 PINNEBERG DE

Designated states: AT BE CH DE DK ES FR GB IT LI LU NL SE

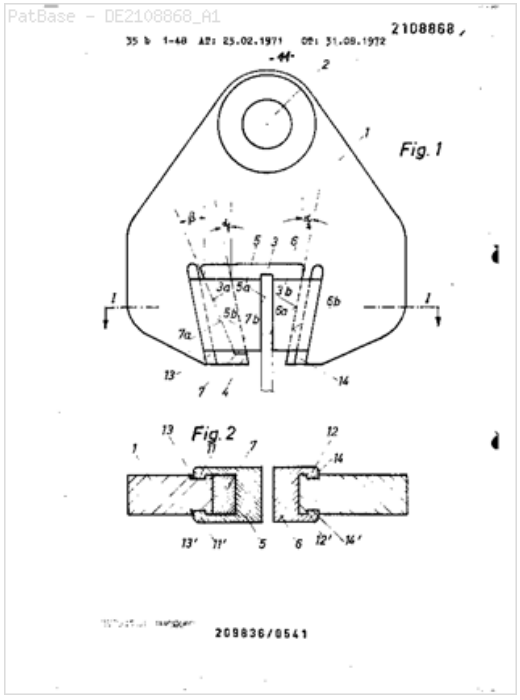
30) Family number: 127716 (DE2108868A1)

Title: Patentansprueche 1

Abstract: Source: DE2108868A1 [DE] (Claims 1) Patentansprueche 1 Klemmzange an einem Ziehgeraet, bestehend aus einem Gehaenge mit einem sich zu seiner OfRnung hin ver Juengenden Maul und aus in Richtung zur Mauloeffnung nach innen laufenden, an den Maulflanken des Ge haenges gefuehrten, sich zur Mauloeffnung, hin ver Juengenden, keilfoermigen, mit zueinander parallel verlaufenden Bauchflaechen versehenen Klemmbacken, zwischen denen ein Ziehkoerper einspannbar ist, dadurch gekennzeichnet, dass zwischen zumindest einer Maulflanke (5a,5b) und der Keilrueckenflaeche (5b) der zugeordneten Klemmbacke (5) ein sich in Richtung zur Mauloeffnung hin verjuengender Zwischenkeil (7) angeordnet ist 2.

Machine translation: (claim 1) claims 1 clamp assembly in a Ziehgeraet, consisting of a suspension with one to his OfRnung to different tapering mouth and out towards the Mauloeffnung inward current, at the foot slopes of the total hang-run, is to Mauloeffnung, to different tapering, wedge-shaped, with mutually parallel Bauchflaechen bearing jaws between which a Ziehkoerper is clamped, wherein between at least a foot edge (5a, 5b) and the Keilrueckenflaeche (5b) of the associated clamping jaw (5) is the direction Mauloeffnung is tapering wedge between (7) placed second

Classifications:
International (IPC 8-9): B66C1/48 (Advanced/Invention); B66C1/42 (Core/Invention)
International (IPC 1-7): B25B B66C1/48
CPC: B66C1/48
European: B66C1/48



Family:

Publication number	Publication date	Application number	Application date
BE777607 A	19720417	BE19710777607	19711231
DE2108868 A1	19720831	DE19712108868	19710225

Priority:

DE19712108868 19710225

Probable Assignee: DEMAG DRUCKLUFTTECH

Assignee(s): (std)**:** DEMAG DRUCKLUFTTECH

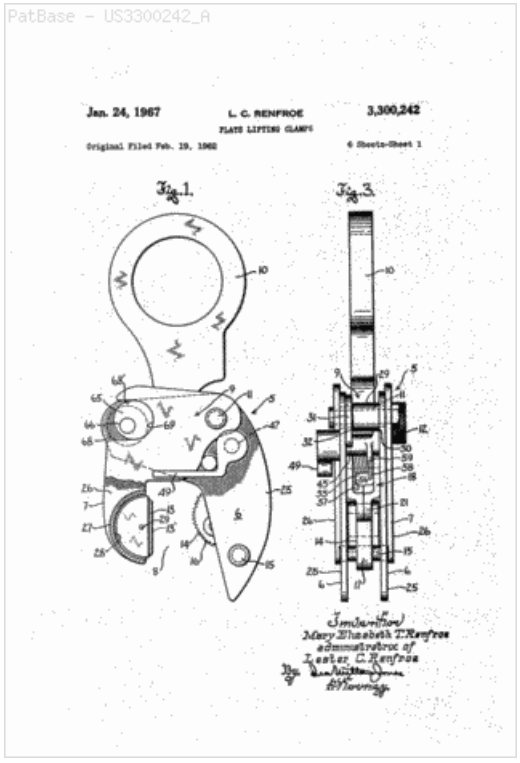
Assignee(s): FRANKFURTER MASCHINENBAU A G VORMALS POKORNY AND ; FRANKFURTER MASCHINENBAU A G VORMALS POKORNY AND WITTEKIND SOLMSSTRASSE 2 26 6 FRANKFURT A M WEST 13 ALLEMAGNE ; FRANKFURTER MASCHINENBAU AG WAS POKORNY AND WITTEKIND SOLMSSTRASSE 2 26 6 FRANKFURT AM WEST 13 ALLEMAGNE..

31) Family number: 22217722 (US3300242A)

Title: PLATE LIFTING CLAMPS

Abstract: 1. A plate-lifting clamp comprising a substantially tiat body structure defining: (A) a platmreceiving mouth having spacedapart jaws projecting from and substantially coplanar with a bight portion, with the inner opposing faces of the jaws at opposite sides of a median plane perpendicular to and passing through the bight portion; (B) means on one of said jaws defining a semicylindricaliy bottomed socket opening to the inner face of the jaw with the axis of its curved bottom parallel to said median plane and perpendicular to the general plane of the body structure, the bottom of the socket havingan elongated slot therethrough disposed transversely of the axis of the curved bottom; (C) a semicylindrical friction pad having a substantially ftat side and an opposite convexly curved side, said friction pad being seated in the socket with its convexly curved side in mating sliding engagement with the curved bottom of the socket; (D) retaining means extending from the convexly curved side of the friction pad and into said slot in the bottom of the socket, to hold the pad in the socket while allowing the pad to rock about the axis of the scnii-cylindrical bottom of the socket; (E) frictional gripping means on the flat side of the friction pad projecting beyond the adjacent inner face of the jaw to engage one side of a plate received in the month of the clamp; (F) a self-energizing gripping cam pivotally mounted on the other jaw to swing between an extended operative position in which it coacts with the friction pad to grip a plate therebetween, and a retracted inoperative position; (G) a pivot pin on the bight portion of the body structure near its junction with the jaw on which the gripping cam is mounted; (H) a cam actuating lever rnedially journalled on said pivot pin and having one end portion thereof projecting over the inner closed end of the mouth and its other end portion projecting toward the pivot axis of the gripping cam and extending far enough in said direction to have a portion of the gripping cam disposed between it and the friction pad, said lever being operable to effect motion of the earn to its extended operative position in consequence of rocking motion of the lever in one direction; and (I) a shackle pivotally connected to said first narned end portion of the actuating lever, with the axis of the pivotal connection therebetween substantially on said median plane, the weight of the clamp when suspended by the shackle automatically causing the actuating lever to rock in the direction to effect rnove» ment of the gripping cam towards its extended operative position.

Classifications:
International (IPC 8-9): B66C1/48 (Advanced/Invention); B66C1/42 (Core/Invention)
International (IPC 1-7): B66C1/48
CPC: B66C1/48
European: B66C1/48
US: 294/101 294/104 294/116



Family:

Publication number	Publication date	Application number	Application date
US3300242 A	19670124	US19660553580	19660527

Priority:
US19660553580 19660527

Probable Assignee:	SAFETY CLAMPS INC
Assignee(s): (std)**:**	SAFETY CLAMPS INC
Inventor(s): (std)**:**	RENFROE MARY ELIZABETH T

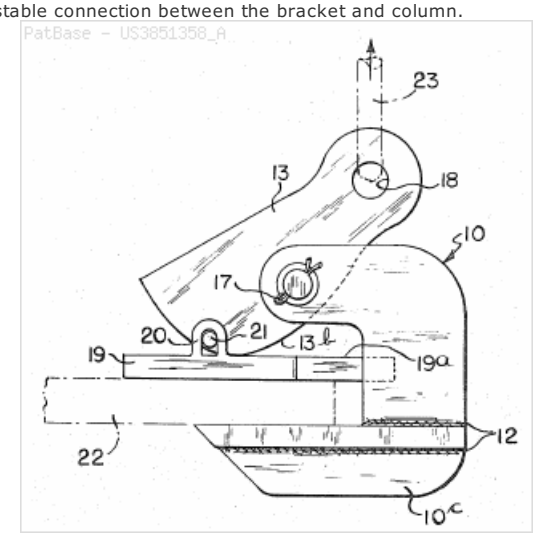
32) Family number: 1110750 (US3851358A)

Title: NON-MARRING HORIZONTAL CLAMP

Abstract: A strong, compact clamp of simple construction is presented for lifting flat workpieces such as steel plates in a horizontal position without marring the surface of the plate being handled. The main body of the clamp comprises two identical parallel generally C-shaped planar body portions which are inserted into slots in a flat clamping surface body portion and welded there. Between the front portions of the upper arms of the C-clamp members is pivotally mounted a clamping lever having an eccentric clamping surface which presses against a separate flat clamping plate which has a pin and slot connection with the lower end of the clamping lever. The upper end of the clamping lever is provided with means for attaching a lifting device there. A modification shows a fixed column rising above the clamping surface body portion, a clamping bracket pivotally supporting the

clamping lever and movable vertically on the column with a height-adjustable connection between the bracket and column.

Classifications:
International (IPC 8-9): B66C1/48 (Advanced/Invention); B66C1/42 (Core/Invention)
International (IPC 1-7): A44B21/00 B66C1/48
CPC: B66C1/48
European: B66C1/48
US: 294/103.1 294/104



Family:

Publication number	Publication date	Application number	Application date
US3851358 A	19741203	US19730402406	19731001

Priority:

US19730402406 19731001

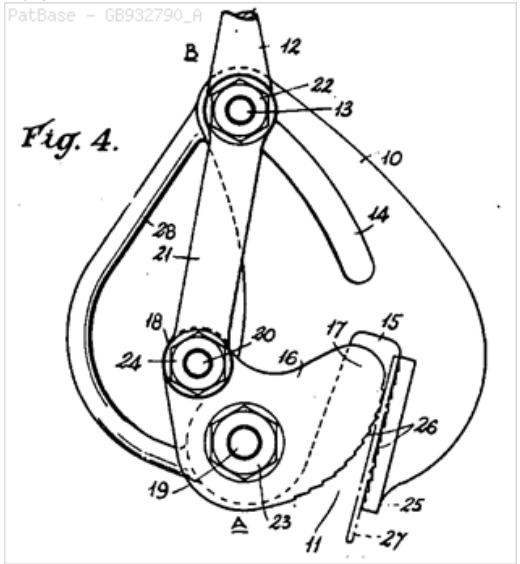
Probable Assignee:	JANOSKO M
Assignee(s): (std):	JANOSKO M
Assignee(s):	JANOSKO M US
Inventor(s): (std):	JANOSKO M
Inventor(s):	JANOSKO M US

33) Family number: 29798788 (GB932790A)

Title: Improvements in lifting clamps

Abstract: 932,790. Clamps for lifting sheets. LIFTING GEAR PRODUCTS (ENGINEERING) Ltd. Nov. 25, 1959 [Dec. 1, 1958], No. 38741/58. Class 78 (4). In a clamp for lifting sheets, of the type in which a cam 17 is turned about its pivot 19 to grip the sheets 27 by a connection 21 to a shackle pin 13 from which the clamp is suspended, the shackle pin 13 is guided by an arcuate slot 14 so arranged that an effective grip is maintained when lifting a sheet from the horizontal to the vertical position or vice versa. The body of the clamp illustrated is formed by a plate 10 on either side of which are carried the cams 16 and the links 21. The body may, however, be formed of two plates with the cams 16 mounted between them.

Classifications:
International (IPC 8-9): B66C1/48 (Advanced/Invention); B66C1/42 (Core/Invention)
CPC: B66C1/48
European: B66C1/48



Family:

Publication number	Publication date	Application number	Application date
FR1242057 A	19600923	FR19590811823	19591201
GB932790 A	19630731	GB19580038741	19581201

Priority:

GB19580038741 19581201

Probable Assignee: LIFTING GEAR PRODUCTS ENGINEER
Assignee(s): (std): LIFTING GEAR PRODUCTS ENGINEER
Assignee(s): LIFTING GEAR PRODUCTS ENGINEERING LIMITED ; LIFTING GEAR PRODUCTS ENGINEERING LTD
Inventor(s): (std): HUTCHINSON AMBROSE

34) Family number: 3695788 (FR2395220A)

Title: HOIST FOR SHEET MATERIAL - HAS LOCKING LEVER OR SHOE WHICH WEDGES AGAINST COLLAR WHEN CAM COUPLED TO HOOK ROTATES IN UNLOCKING DIRECTION

Abstract: The sheet hoist has a body with a pivotally mounted locking cam coupled by a rod, chain or cable to a hook assembly. A lever or shoe is pivoted on the body and is resiliently pressed against a collar which is coaxial with the cam pivot and rotatably coupled to the cam. The lever or shoe wedges against the collar when the cam tends to pivot in the unlocking direction. The tangent of the collar at its point of contact of the lever or wedge pref. forms an angle between 65 deg. and 88 deg. with the line between the lever and collar axis.
Classifications:
International (IPC 8-9): B66C1/48 (Advanced/Invention);
B66C1/42 (Core/Invention)
International (IPC 1-7): B66C1/48
CPC: B66C1/48
European: B66C1/48

Family:

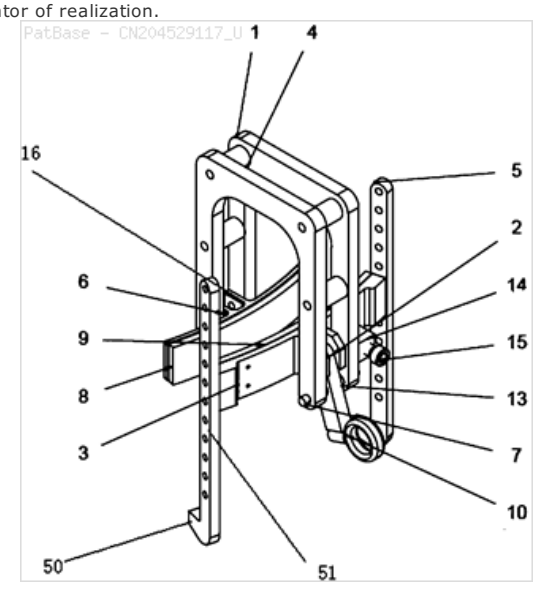
Publication number	Publication date	Application number	Application date
FR2395220 A1	19790119	FR19770020419	19770624

Priority:
FR19770020419 19770624
Probable Assignee: STAS SOC TECH ACCESS SPEC
Assignee(s): (std): ACCESSOIRES SPECIALISES STE TE ; STAS SOC TECH ACCESS SPEC
Assignee(s): ACCESSOIRES SPECIALISES STE TECH
Inventor(s): (std): ARCHER JEAN FRANCOIS
Inventor(s): JEAN FRANCOIS ARCHER

35) Family number: 59250808 (CN204529117U)

Title: STATOR TURN-OVER FROCK

Abstract: The utility model relates to a stator turn-over frock, including connecting rod and pivot, said connecting rod has two, and is the style of calligraphy of falling U symmetrical arrangement side by side, fixes with 4 spacing axles between two connecting rods, and press from both sides tight in the inboard horizontal mutual disposition in its both ends has and press from both sides tight with outer, the tight piece of interior clamp fix and serve at connecting rod no. 1, the other end that the connecting rod was passed in said pivot also passes the middle part of placing the jib between this connecting rod in simultaneously, and this jib one end is rotated with the tight piece of outer clamp and is connected and places in between the connecting rod, and other end welding has rings, and the outside welding of pressing from both sides the connecting rod of tight piece outside being connected with there is the nut to withstand the outer tight piece that presss from both sides with the bolt that passes this nut, the both ends vertical lifting hook of installing respectively of the tight piece of outer clamp. The utility model discloses the turn-over effect of safe, the convenient large-scale rule stator of realization.
Classifications:
International (IPC 8-9): B66C1/48 B66C13/08 (Advanced/Invention)
CPC: B66C1/48 B66C13/08



Family:

Publication number	Publication date	Application number	Application date
CN104609298 A	20150513	CN201510026714	20150120

CN104609298 B	20170104	CN201510026714	20150120
CN204529117 U	20150805	CN201520036577U	20150120

Priority:

CN201510026714 20150120 CN201520036577U 20150120

Probable Assignee: PHASE MOTION CONTROL NINGBO LTD

Assignee(s): (std)**:** PHASE MOTION CONTROL NINGBO LTD

Assignee(s): MOTOR TECHNOLOGY CO LTD NINGBO FEISHI

Inventor(s): (std)**:** HE DONGSHENG ; LIU JIANBO ; LIU XUEJUAN ; WANG BO ; WANG TING ; XU XIAOYING ; YAN CONGJUN

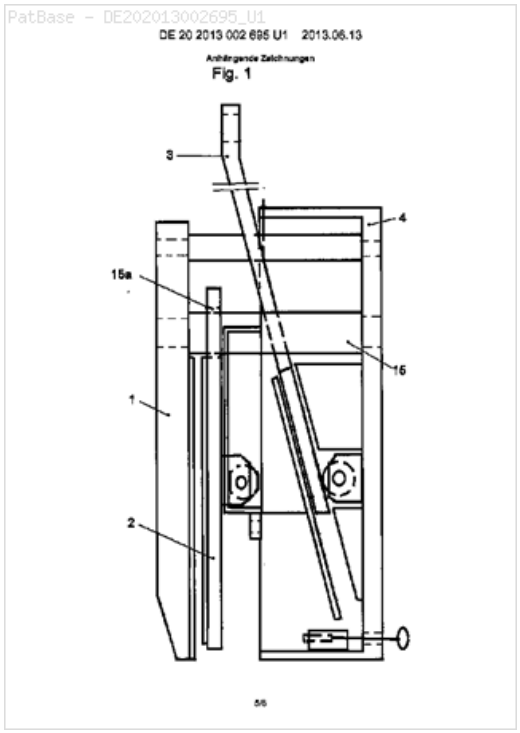
36) Family number: 53977833 (DE202013002695U1)

Title: PLATTENHEBER, HEBERGERAET FUER PLATTENFOERMIGES MATERIAL JACK PLATE, HEBERGERAET MATERIALS FOR PLATTENFOERMIGES (Machine translation)

Abstract: Source: DE202013002695U1 [DE] Plattenheber-Hebegeraet zum Heben und bewegen von Plattenfoermigem Material, dadurch gekennzeichnet, dass eine Rueckplatte (1) durch mehrere Vebindungselemente (14, 15) mit einem gegenueberliegenden Gehaeuse (4) starr verbunden ist und dass zwischen selbigen auf den unteren Verbindungselementen (15) eine Druckplatte (2) parallel angebracht ist welche sich seitlich auf selbigen frei bewegen kann und das zwischen dem Gehaeuse (4) und der Druckplatte (2) ein Haken (3) beweglich in Fuehrungen (10) und zwischen den Verbindungselementen (14, 15) fixiert ist.

Machine translation: Plate lifter Lifter for lifting and moving of sheet material, characterized in that a Rueckplatte (1) by a plurality Vebindungselemente (14, 15) having an opposite-lying housing (4) is rigidly connected, and that between the selfsame to the lower connecting elements (15) a pressure plate (2) is mounted in parallel which side is free to move on selfsame and between the housing (4) and the pressure plate (2) comprises a hook (3) movable in guides (10) and between the connecting elements (14, 15 is fixed).

Classifications:
International (IPC 8-9): B66C1/48 (Advanced/Invention)
CPC: B66C1/48 B66C1/442



Family:

Publication number	Publication date	Application number	Application date
DE202013002695 U1	20130613	DE201320002695U	20130314

Priority:

DE201320002695U 20130314

Probable Assignee: JUERGENS MARINA

Assignee(s): (std)**:** JUERGENS MARINA

Assignee(s): JUERGENS

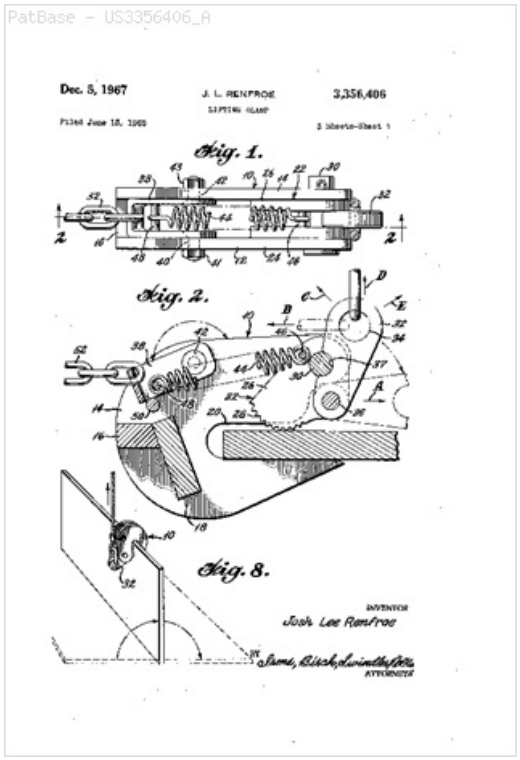
37) Family number: 42890869 (US3356406A)

Title: LIFTING CLAMP

Abstract: 1,116,247. Lifting clamps. J. C. RENFROE and SONS Inc. 1 June, 1966 [15 June, 1965], No. 24441/66. Heading B8H. A lifting force may be applied to a shackle 32 of a lifting clamp in any direction between those indicated by arrows A, B, e.g. C, D, E, to urge a gripping jaw 22 into engagement with a load in a slot 20. When the force is applied in directions B, C or D the shackle

abuts the pivotpin 30 of the jaw 22 which acts as a fulcrum. A spring 44, which is tensioned by an overcentre lever 38, urges the jaw into the slot 20 when there is no tension on the shackle 32. Fig. 5 (not shown), illustrates a similar embodiment in which a shackle (84) moves a pivoted jaw into load-engaging position by abutting a portion (79) of the jaw itself in certain directions of pull on the shackle.

Classifications:
International (IPC 8-9): B66C1/48 B66C1/64
E04G21/16 (Advanced/Invention);
B66C1/42 B66C1/62 E04G21/16 (Core/Invention)
International (IPC 1-7): B66C1/42 B66C1/48
CPC: B66C1/48 B66C1/64 E04G21/16
European: B66C1/48 B66C1/64 E04G21/16
US: 294/101
JP F-Term: 3F004 3F004/AK03 3F004/AK04 3F004/AK06 3F004/AK08 3F004/AL03
JP F-Index: B66C1/48



Family:

Publication number	Publication date	Application number	Application date
BE682516 A	19661114		00000000
BE682517 A	19661114		00000000
DE1481800 B	19701217	DE1966R043476	00000000
DE1481800 B1	19701217	DE19661481800	19660615
DE1481801 B	19700730	DE1966R043477	00000000
DE1481801 B1	19700730	DE19661481801	19660615
FR1482695 A	19670526	FR19660064797	19660609
FR1482696 A	19670526	FR19660064798	19660609
GB1116247 A	19680606	GB19660024441	19660601
GB1116248 A	19680606	GB19660024442	19660601
JP48041301 B4	19731205	JP19660036377	19660607
NL144231 B	19741216	NL19660008056	19660610
NL6608056 A	19661216	NL19660008056	19660610
NL6608250 A	19661216	NL19660008250	19660614
US3336068 A	19670815	US19650464136	19650615
US3356406 A	19671205	US19650464135	19650615

Priority:

US19650464135 19650615 US19650464136 19650615 FR19660064797 19660609 FR19660064798 19660609

Probable Assignee: RENFROE AND SONS J C

Assignee(s): (std): RENFROE AND SONS J C

Assignee(s): J C RENFROE AND SONS INC ; J C RENFROE AND SONS INC JACKSONVILLE FLORIDA VER ST V AM

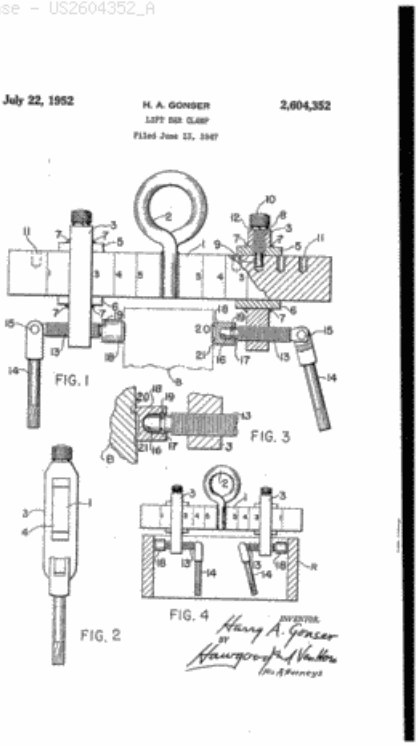
Inventor(s): (std): RENFROE RAYMOND L ; LEON RENFROE RAYMOND ; RENFROE JOSH L

38) Family number: 22146879 (US2604352A)

Title: LIFT BAR CLAMP

Abstract: (Claim 1) 1. A lifting device comprisin_ a rigid unitary beam, two clamping elements adjustably carried by the beam, locking mearis positively locking said elements in adjusted position upon the beam, each clamping element having mechanical advantage moving means and including an article engaging jaw, and the jaw of each element having a sharp circular edge.

Classifications:
International (IPC 8-9): B66C1/48 B66C1/54 (Advanced/Invention);
B66C1/42 (Core/Invention)
International (IPC 1-7): B66C1/48 B66C1/56
CPC: B66C1/54 B66C1/48 Y10T24/44598 Y10T24/44744
European: B66C1/48 B66C1/54
US: 24/525 24/542 269/145 269/208 269/54.2 294/119.1 294/93



Family:

Publication number	Publication date	Application number	Application date
US2604352 A	19520722	US19470754551	19470613

Priority:
US19470754551 19470613

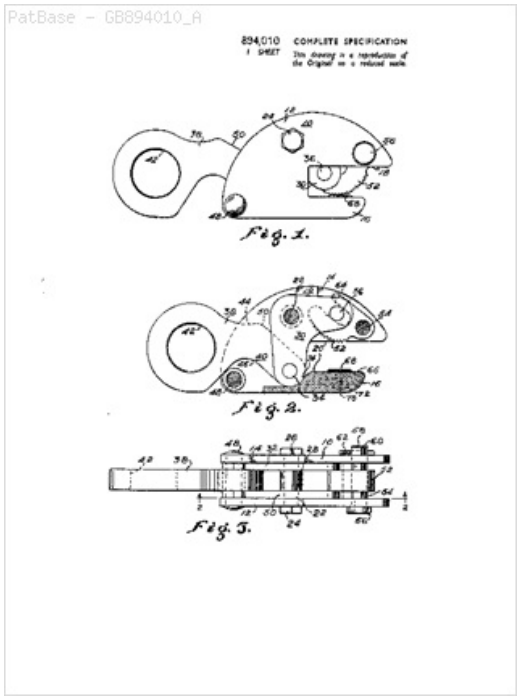
Probable Assignee:	ADEN GONSER HARRY
Assignee(s): (std)**:**	ADEN GONSER HARRY
Inventor(s): (std)**:**	ADEN GONSER HARRY
Inventor(s):	GONSER HARRY ADEN

39) Family number: 20837883 (GB894010A)

Title: Improvements in or relating to clamps

Abstract: 894,010. Clamps. RENFROE, C. J., and RENFROE, R. L. Dec. 11, 1958, No. 39931/58. Class 44. A clamp adapted to be attached to hoisting apparatus for lifting heavy plates, c., comprises a housing 10 having two plate-like sides 12, 14 in which are aligned openings 20 for receiving the heavy plates, c., a movable jaw 52 pivotally mounted between the sides 12, 14 on a pin 54, two lever members 30, 32 also pivotally mounted between the sides 12, 14 on a pivot member 22 and connected to each other at their ends by a pair of rivets 34, 36, the rivet 36 being slidably engaged in a slot 64 in the jaw 52, and a hook link 38 pivotally connected to the rivet 34 and provided with an aperture 42 for suspending the clamp from a hook (not shown) of the hoisting apparatus. The sides 12, 14 of the housing 10 are interconnected by an integral web 16 on which is mounted a stationary jaw 68, and when the clamp is suspended from the hook the movable jaw 52 is moved to co-operate with the jaw 68 for gripping the plate. Movement of the hook link 38 relative to the housing 10 is limited by a stop pin 48, the pivot member 22 and a shoulder 74 on the web 16.

Classifications:
International (IPC 8-9): B66C1/48 (Advanced/Invention);
B66C1/42 (Core/Invention)
International (IPC 1-7): F16B2/18
CPC: B66C1/48
European: B66C1/48



Family:

Publication number	Publication date	Application number	Application date
GB894010 A	19620418	GB19580039931	19581211

Priority:

GB19580039931 19581211

Probable Assignee: RAYMOND LEON RENFROE

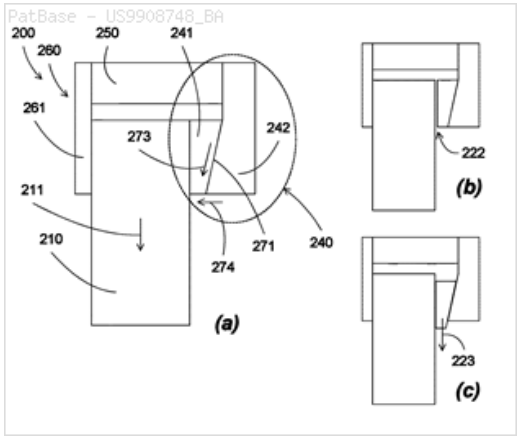
Assignee(s): (std)**:** CHARLES JOSEPH RENFROE ; RAYMOND LEON RENFROE

40) Family number: 68768921 (US9908748B)

Title: CLAMPING DEVICE WITH METAL CORES

Abstract: A clamping device for lifting and transferring objects can employ slanting interfaces to convert a pulling action on the clamping device to a clamping action on the object. Components of the clamping device can include a metal core embedded in a body of a different material. The embedded core construction can allow a simplified fabrication of the clamping device for high stresses, high forces, high durability and high reliability.

Classifications:
International (IPC 8-9): B25B1/00 B25B5/16 B65G7/12 B66C1/42 B66C1/44 B66C1/48 F16B2/14 (Advanced/Invention)
CPC: B65G7/12 B66C1/442 B66C1/48



Family:

Publication number	Publication date	Application number	Application date
AU2018200547 AA	20181025	AU20180200547	20180123
AU2018200547 BB	20190606	AU20180200547	20180123
CA2988466 AA	20181005	CA20172988466	20171212
EP3385210 A1	20181010	EP20180150917	20180110
US9908748 BA	20180306	US20170479283	20170405
WO18185582 A1	20181011	WO2018IB51799	20180319

Priority:

US20170479283 20170405

Probable Assignee: NGUYEN NHON HOA

Assignee(s): (std)**:** NGUYEN HOA NHON ; NGUYEN NHON

Assignee(s): NGUYEN NHON HOA

Inventor(s): (std)**:** NGUYEN HOA NHON ; NGUYEN NHON HOA

Agent(s): ATKINSON IP; BHOLE IP LAW; HIMMELSBACH MATHIAS; TUE

Designated states: AE AG AL AM AO AT AU AZ BA BB BE BF BG BH BJ BN BR BW BY BZ CA CF CG CH CI CL CM CN CO CR CU CY CZ DE DJ DK DM DO DZ EC EE EG ES FI FR GA GB GD GE GH GM GN GQ GR GT GW HN HR HU ID IE IL IN IR IS IT JO JP KE KG KH KM KN KP KR KW KZ LA LC LI LK LR LS LT LU LV LY MA MC MD ME MG MK ML MN MR MT MW MX MY MZ NA NE NG NI NL NO NZ OM PA PE PG PH PL PT QA RO RS RU RW SA SC SD SE SG SI SK SL SM SN ST SV SY SZ TD TG TH TJ TM TN TR TT TZ UA UG US UZ VC VN ZA ZM ZW

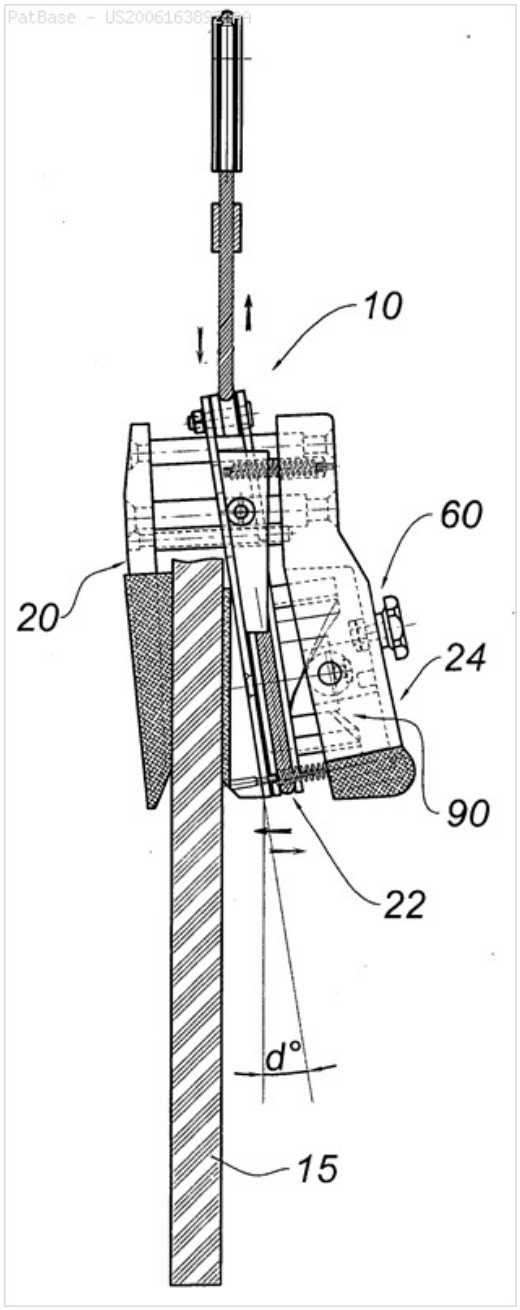
41) Family number: 28830922 (US2006163892A)

Title: CLAMPING DEVICE FOR LIFTING SLAB, PANEL OR SHEET MATERIAL

Abstract: Clamping device suitable for lifting and handling of sheet like-objects, having a rigid frame with a fixed jaw that provides a first clamping surface, a movable jaw that provides a second clamping surface that is substantially parallel to the first clamping surface, the movable jaw being supported at the frame for reciprocating, linear movement towards and away from the fixed jaw, and an operating mechanism arranged to bias the movable jaw towards the fixed jaw in response to an actuating force being exerted on a tensile force transmitting member of the operating mechanism, thereby to abut the respective clamping surfaces onto opposite faces of an object received between the jaws and frictionally clamping same against displacement, characterised in that the movable jaw comprises a clamping plate on which the second clamping surface is provided, the clamping plate being inclined at an angle of about 8 to 12 degrees with respect to the first and second clamping surfaces and being supported at the frame to maintain said angle during movement to and from the fixed jaw, and in that the tensile force transmitting member is guided and supported at an upper location of the clamping plate that substantially aligns with or overhangs the second clamping surface.

Classifications:

International (IPC 8-9): B66C1/44 B66C1/48 (Advanced/Invention);
B66C1/42 (Core/Invention)
International (IPC 1-7): B66C1/44 B66C1/48
CPC: B66C1/442 B66C1/48 Y10S294/901
European: B66C1/44B B66C1/48
US: 269/95 294/102.1 294/103.1 294/901



Family:

Publication number	Publication date	Application number	Application date
AU2003201203 AA	20030724	AU20030201203	20030114
EP1560782 A1	20050810	EP20030729200	20030114
EP1560782 A4	20080430	EP20030729200	20030114
US2006163892 AA	20060727	US20030514967	20030114
US7490882 BB	20090217	US20030514967	20030114
VN358 U	20031125	VN20020000004U	20020114
WO03057613 A1	20030717	WO2003AU00032	20030114

Priority:

VN20020000004 20020114 VN20020000004U 20020114 VN20020000402 20020114
WO2003AU00032 20030114

Probable Assignee: ABACO MACHINES AUSTRALASIA PTY LTD

Assignee(s): (std)**:** ABACO MACHINES AUSTRALASIA PTY ; NGUYEN HAU N ; NGUYEN NHON HOA ; NGUYEN NHON HAU ; NGUYEN HOA N

Assignee(s): ABACO MACHINES AUSTRALASIA PTY LTD ; ABACO MACHINES PTY LTD ; AUSTRALASIA PTY LTD ; ABACO MACHINES (AUSTRALASIA) PTY LTD

Inventor(s): (std)**:** NGUYEN HAU NHON ; NGUYEN HOA NHON ; NGUYEN HAU N ; NGUYEN HOA N ; NGUYEN NHON HAU ; NGUYEN NHON HOA

Inventor(s): NHON HAU NGUYEN ; NHON HOA NGUYEN ; NGUYEN HAU ; NGUYEN HOA

Agent(s): HOA N NGUYEN; SHEWCHUK IP SERVICES LLC; SHEWCHUK JEFFREY D; JEFFREY D

Designated states: AE AG AL AM AT AU AZ BA BB BE BF BG BJ BR BY BZ CA CF CG CH CI CM CN CO CR CU CY CZ DE DK DM DZ EC EE ES FI FR GA GB GD GE GH GM GN GQ GR GW HR HU ID IE IL IN IS IT JP KE KG KP KR KZ LC LI

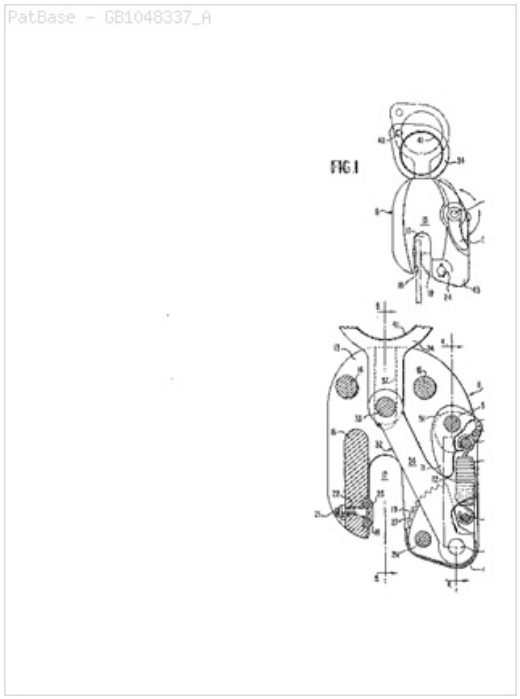
LK LR LS LT LU LV MA MC MD MG MK ML MN MR MW MX MZ NE NL NO NZ OM PH PL PT RO RU SD SE SG SI SK SL SN SZ TD TG TJ TM TN TR TT TZ UA UG US UZ VN YU ZA ZM ZW

42) Family number: 242922 (GB1048337A)

Title: Lifting clamp

Abstract: 1,048,337. Lifting dogs for sheet material. J. C. RENFROE and SONS Inc. June 29, 1965 [July 8, 1964], No. 27459/65. Heading B8H. A lifting-dog for sheet material has a fixed jaw 18, a moving jaw 19 operated by lines 32, and a locking device 51 which holds the moving jaw in contact with the load by bearing on the links 32. The upper ends of the links 32 are guided by slots 37. The loading device has an over-centre action and is held in its operative and inoperative positions by a spring 67 which is attached at its lower end to the links 32. A projection 71 bears against the links when the jaw 19 is in the open position. A handle is provided for rotating the locking device.

Classifications:
International (IPC 8-9): B66C1/48 (Advanced/Invention); B66C1/42 (Core/Invention)
International (IPC 1-7): B66C1/48
CPC: B66C1/48
European: B66C1/48
JP F-Term: 3F004 3F004/AK01 3F004/AL03 3F004/AM08
JP F-Index: B66C1/48



Family:

Publication number	Publication date	Application number	Application date
DE1291878 B	19690403	DE1965R041019	19650705
FI44461 B	19710802	FI19650001633	19650708
FR1438907 A	19660513	FR19650023584	19650706
GB1048337 A	19661116	GB19650027459	19650629
JP49004187 B4	19740130	JP19650040205	19650706
NL136100 B	00000000		00000000
NL6508695 A	19660110	NL19650008695	19650706

Priority:
US19640381193 19640708 FR19650023584 19650706

Probable Assignee: RENFROE AND SONS J C
Assignee(s): (std): RENFROE AND SONS J C
Assignee(s): J C RENFROE AND SONS ; J C RENFROE AND SONS INC
Inventor(s): (std): RENFROE R ; LEON RENFROE RAYMOND

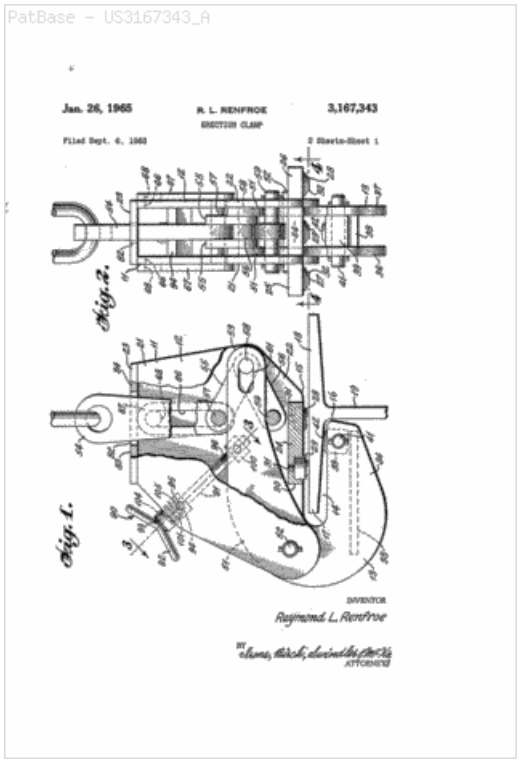
43) Family number: 22593940 (US3167343A)

Title: ERECTION CLAMP

Abstract: (Claim 1) 1. A clamp for liftin._ strlictural articles v,;hich co.-riprises a clamp body including a pair of o-oposod jaws defini,ng a slot betvieen the jaws to receive the str_.ictural articl_- to be Iii'ted, one of said jt,,vs bf,_n_ movable Aith respect to the ollier javi, linka.-_ -Peans conr,,-cted to s,-_i_l clamp body to brin._ said ja-,_,s inwardly toward an gripping relation relative to ',he article as a lift;n-, iorce is !appl_ied to the clan-ip, said 1-inl_age means includil,,- a shaelcle to which said lifting forc- may be appl;ed, f-,djus,_able lock means to positively prevent the retrac_Lion of _;a;d jaws outwardly away fro_i-i sa-id ini_'ial grippiiip, relatio,.i, and resilient means biasing said jaws irr,,vardly beyond sa_ld iniital gripping rel-,ttion to compensat- 'or any siack in sai-d adjustable lock rpeans result-ing from any further inward movement of said jaws.

Classifications:
International (IPC 8-9): B66C1/48 B66C1/64 (Advanced/Invention); B66C1/42 B66C1/62 (Core/Invention)
International (IPC 1-7): B66C1/64
CPC: B66C1/48 B66C1/64
European: B66C1/48 B66C1/64

US: 294/104



Family:

Publication number	Publication date	Application number	Application date
US3167343 A	19650126	US19630307415	19630906

Priority:

US19630307415 19630906

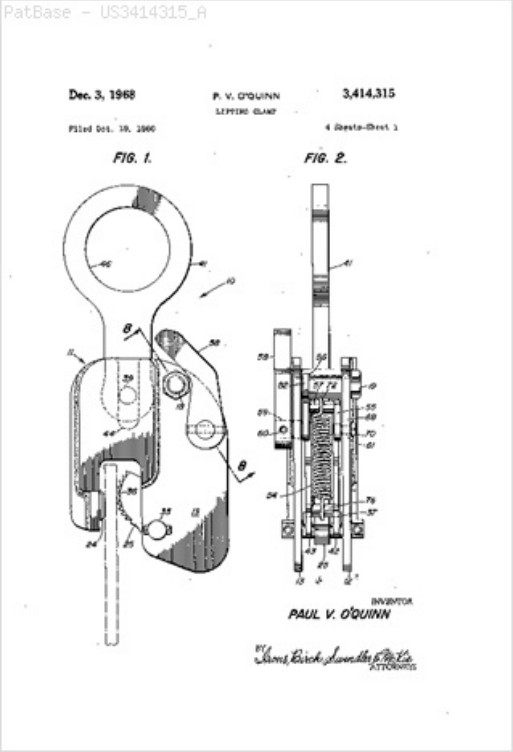
Probable Assignee:	RENFROE RAYMOND L
Assignee(s): (std)**:**	RENFROE RAYMOND L
Inventor(s): (std)**:**	RENFROE RAYMOND L

44) Family number: 67949 (US3414315A)

Title: Lifting clamp

Abstract: ABSTRACT OF THE DISCLOSURE
There is disclosed a lifting clamp having a movable gripping jaw, a shackle, a linkage connecting the shackle to the movable jaw and a locking mechanism engageable with the linkage to lock the jaw in either opened or closed positions, the locking mechanism having opposed latch members connected together by a separable

Classifications:
International (IPC 8-9): B66C1/48 (Advanced/Invention);
B66C1/42 (Core/Invention)
International (IPC 1-7): B66C1/48
CPC: B66C1/48
European: B66C1/48
US: 294/104 D8/71



Family:

Publication number	Publication date	Application number	Application date
BE704444 A	19680201		19670928
DE1531248 A1	19691204	DE19671531248	19670906
FR1550265 A	19681220		19671019
GB1160778 A	19690806	GB19670033944	19670724
NL6712619 A	19680422	NL19670012619	19670915
US3414315 A	19681203	US19660587711	19661019

Priority:

US19660587711 19661019

Probable Assignee: RENFROE AND SONS J C

Assignee(s): (std)**:** FRANK P TURPIN ; RENFROE AND SONS J C

Assignee(s): J C RENFROE AND SONS INC ; JC RENFROE AND SONS INC

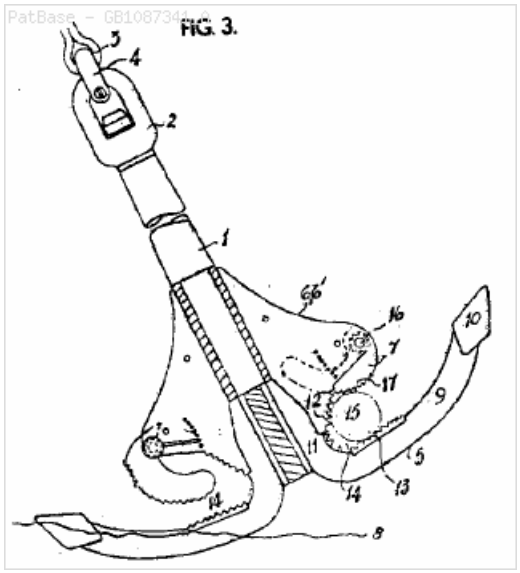
Inventor(s): (std)**:** O QUINN PAUL V ; VINCENT O QUINN PAUL

45) Family number: 22907972 (GB1087341A)

Title: Improvements in or relating to grapnels

Abstract: 1,087,341. Grapnels. ASSOCIATED ELECCAL INDUSTRIES Ltd. Jan. 12, 1965 [Feb. 20, 1964], No. 7125/64. Heading B8H. [Also in Division B7] A submarine cable 15 is clamped against a fixed jaw 13 by a pivoted segment 7 which is biased towards the fixed jaw by gravity and, if required, a spring. Any tendency of the cable to move out of engagement with the jaws causes the grip to increase. More than two sets of jaws may be provided.

Classifications:
International (IPC 8-9): B66C1/34 B66C1/48 (Advanced/Invention);
B66C1/22 B66C1/42 (Core/Invention)
International (IPC 1-7): B66C1/62
CPC: B66C1/34 B66C1/48
European: B66C1/34 B66C1/48



Family:

Publication number	Publication date	Application number	Application date
GB1087341 A	19671018	GB19640007125	19640220

Priority:

GB19640007125 19640220

Probable Assignee: ASS ELECT IND

Assignee(s): (std)**:** ASS ELECT IND

Assignee(s): ASSOCIATED ELECTRICAL INDUSTRIES LIMITED

Inventor(s): (std)**:** HOWICK BAKER EDWARD JOHN