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(54) **TERRACE CANOPY**

TERRASSENDACH

AUVENT POUR TERRASSE

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Description

[0001] The present invention relates to a terrace canopy.

[0002] In particular, the invention is intended for a screen awning which is used as terrace canopy or pergola.

[0003] The screen awning contains a screen, for example in the form of a tarpaulin, which is retractable and extendable on a shaft from a roller casing which is mounted on a façade or the like at a certain height.

[0004] On its side edges, the screen is guided in two parallel side guide rails which depart from the roller casing and run diagonally downward to give the screen a certain slope when retracting and extending.

[0005] At or near the front lower extremities furthest removed from the façade each side guide rail is supported by a support post.

[0006] The screen awning is mounted to the façade and needs a minimum screen slope.

[0007] The drop and screen slope depends on the mounting height to the façade and the available distance to the façade for mounting the support posts. The mounting height of the roller casing is also determined by the straightness of the wall, distribution of the bores for mounting and where drilling is possible, etc.

[0008] Due to said variation/distribution during mounting, the roller casing needs to be able to tilt more or less around its longitudinal axis and the coupling of the side guide rails with the front support post must at least be rotatable around a horizontal shaft which extends perpendicularly to the longitudinal direction of the side guide rails and/or the height of the coupling must be adjustable.

[0009] Existing terrace canopies on the market allow an adjustment along and on the outside of the support post to, for example, after a heavy rain shower whereby water has accumulated in a dip of the tarpaulin, lower the tarpaulin sufficiently at the front to be able to evacuate the water.

[0010] This is known from the patent EP 3.054.063 for example, whereby the support posts protrude more or less above the canopy, which is not aesthetic. Further, said known embodiment requires a complicated coupling piece for the connection with the support post and a channel in a sidewall of the support post which weakens the support post and consequently requires a certain thickness of the walls of the support post and thus more material with a related higher cost.

[0011] Another embodiment is known from EP 2.333.188 whereby the guide rails are supported at their lower end with a coupling piece in a gutter composed of a gutter profiled section with a channel for the lateral guidance and a tilting movement of the coupling piece, whereby the coupling piece is also provided with limited guidance in the longitudinal direction of the tarpaulin guide rails. This embodiment is relatively complex and difficult to mount and adjust and does not allow the guide rails and the tarpaulin to protrude forward beyond the gutter.

[0012] Another embodiment is known from EP 3.354.817, whereby the awning comprises at least one shading element, the front end of which is attached to an extension profile, the extension profile being guided on guide rails so that it can be moved in the extension direction and in the extension direction front ends of the guide rails are supported by supports, at least one support being variable in length and the connection between a support and that of this support carried guide rail is formed by an articulated connection between the guide rail and the support, the articulated connection allowing the guide rail to pivot relative to the support about an articulated axis parallel to the extension profile and the articulated parts of the articulated connection can be disengaged parallel to the articulated axis.

[0013] Another embodiment is known from DE 20.2010.011307U, wherein the terrace canopy comprises a fabric shaft that can be mounted on a holding structure, an awning fabric that can be wound on it, a drop profile at the front end of the awning fabric, on both sides parallel to the dropout direction (A) of the awning fabric arranged guide rails for the dropout profile, and support columns at the ends of the guide rails facing away from the holding structure, wherein at least one of the support columns for one-sided lowering of the awning fabric is variable in height.

[0014] The purpose of the present invention is to provide a solution for one or more of the aforementioned and other disadvantages with an all-in-one solution with a coupling piece that ensures attachment and strengthening, allowing finetuning of at least the height and translation of the lower end of the side guide rails relative to the support post, whereby all controls are easily accessible and are all grouped close together in one location and ultimately are practically invisible from the outside.

[0015] To this end, the invention relates to a terrace canopy according to claim 1.

[0016] In this way, the coupling piece is hidden from view for bystanders or people under the terrace canopy.

[0017] Preferably, the hinge mounted on the side guide rail is movable in the longitudinal direction of the side guide rail.

[0018] Preferably, the hollow support posts are composed of an open basic profile with two or three legs perpendicular to each other which define an open space and of a removable cover profile which covers the aforementioned space in the longitudinal direction of the basic profile.

[0019] Thus, the coupling piece is easily accessible after disassembly of the cover profile for an easy adjustment of the position of the coupling piece and thus of the slope of the relevant side guide rail.

[0020] Preferably, the coupling piece is executed as a strengthening bracket which connects at least two legs of the basic profile with each other and is height adjustably mounted on the inside of the basic profile.

[0021] Thus, the coupling piece also has the role of strengthening the base piece of the support post such

that such support post can be used as single support post without the profile of the support post, typically from aluminium, having to be executed extra heavy.

[0022] According to a practical embodiment the coupling piece contains a substantially L-shaped or U-shaped section with which the coupling piece is mounted against the inside of the basic profile of the support post.

[0023] Such L-shaped or U-shaped section can easily be realised in steel plate.

[0024] For an extra strengthening in terms of torque the coupling piece can be provided with a transverse strengthening which connects at least two legs of the L-shaped or U-shaped section with each other.

[0025] Preferably, the basic profile is provided with one or more undercut mounting grooves lengthways and the coupling piece is translationally mounted on the basic profile by means of nuts which are translationally mounted in the grooves and screwed tight in the nuts by means of bolts through bores in the coupling piece for clamping the coupling piece.

[0026] Consequently, mounting and clamping the coupling piece at the desired height on the basic profile of the support post is simple, particularly after removing the cover profile.

[0027] Preferably, the basic profile is provided with a stop to limit the upward translation of the coupling piece, said stop being mounted such that the coupling piece cannot protrude above the upper end of the support post.

[0028] Thus it can be avoided that the coupling piece would indeed become visible due to an unintended mounting.

[0029] Preferably, there is also a stop for the downward translation of the coupling piece such that the coupling piece upon mounting cannot accidentally slide down.

[0030] For the support of the aforementioned hinge the coupling piece contains a support, for example in the form of a transverse support plate which is provided with at least one slotted hole that extends parallel to a plane perpendicular to the shaft of the hinge and the hinge foot is translationally mounted on the support by means of one or more bolts screwed through the at least one slotted hole in the hinge nut for clamping the hinge foot to the support.

[0031] Thus, a simple control of the position of the side guide rail in the longitudinal direction of the side guide rail is provided.

[0032] Preferably, the hinge parts of the aforementioned hinge, seen in a cross-section perpendicular to the shaft of the hinge, are shaped substantially triangularly and the tips overlap each other at a certain height.

[0033] In this way the hinge parts have a sufficient range of movement to not collide with the walls of the support post when setting the slope of the side guide rail.

[0034] Optionally, the terrace canopy can be provided with a front bar with which the support posts are mutually connected and/or with one or more substantially horizontal side bars for the connection between a support post and a wall or other support posts to which the roller casing

is mounted.

[0035] Such bars give extra strength to the terrace canopy.

[0036] If hollow profiles are used for said front and side bars, said bars can also serve as roller casing for the integration of a roller and a retractable and extendable screen thereon, for example to be able to shield the terrace at the front and/or sides from wind and sun.

[0037] With the intention of better showing the characteristics of the invention, a preferred embodiment of a terrace canopy according to the invention is described hereinafter, by way of an example without any limiting nature, with reference to the accompanying drawings wherein:

figure 1 schematically shows a perspective view of a terrace canopy according to the invention;

figure 2 shows a side view of the terrace canopy of figure 1 mounted against a wall according to arrow F2;

figure 3 shows a perspective view on a larger scale of the section of figure 1 indicated by the frame F3;

figure 4 shows the section of figure 3 but with a disassembled section of the support post;

figure 5 shows the section of figure 4 but seen from above and with the side guide rail disassembled;

figure 6 shows a view according to arrow F6 in figure 4;

figure 7 shows an analogue view as that of figure 6, but in another position;

figures 8 to 10 show variants of a terrace canopy according to the invention, with specifically in figure 10 a double canopy;

figure 11 shows the section indicated in figure 10 by frame F11 on a larger scale;

figures 12 to 14 show the section of figure 11 in different stages of disassembly and partial omissions.

[0038] The terrace canopy 1 shown in figures 1 to 7 contains a roof structure 2 containing a roller casing 3 which is mounted against a façade 4 or other bearing structure at a certain height and contains a roll with a retractable and extendable screen 5, for example a tarpaulin, which on the lower edge is provided with a bottom bar 6 which when retracting and extending is guided in two parallel sloping side guide rails 7 which are supported on their lower extremity 8 by two support posts 9 located at a distance from the façade 4.

[0039] The support posts 9 are hollow support posts which in the example are mutually connected by means of a front bar 10 and are connected to the façade 4 by means of side bars 11 which extend substantially horizontally under the side guide rails 7.

[0040] Traditionally, the roller casing 3 is mounted against the façade 4 by means of a suspension (not shown) with which the roller casing 3 is tiltable around its longitudinal axis to, upon mounting, set the slope of the side guide rails 7 and thus of the screen 5 depending

on the local circumstances such as, among others, the available mounting height B against the façade 4 and the available distance C to the façade 4 for mounting the support posts 9.

[0041] On adjusting the roof slope A it must be possible to let the side guide rails 7 hinge relative to the support posts 9, for which purpose the invention provides a coupling piece 12 which is mounted in the hollow support posts 9 and is provided with a hinge 13 with a horizontal shaft 13c which is transversely oriented according to the transversal direction X-X' relative to the longitudinal direction Q-Q' of the side guide rails 7.

[0042] In the example of the figures, the hollow support posts 9 are composed of an L-shaped open basic profile 14 with two legs 14a and 14b perpendicular to each other which define an open space 15 and of a removable L-shaped cover profile 16 that covers the aforementioned space 15 over the height of the basic profile 14 and which is snapped on the basic profile 14, for example, to form a support post together with a closed square or rectangular cross-section.

[0043] The front bar 10 and the side bars are mounted on the base piece 14 of the support posts 9.

[0044] The legs 14a and 14b of the basic profile 14 are provided on their free edges on the inside of the basic profile 14 with an undercut mounting groove 17 for mounting the coupling piece 12 or other possible accessories by means of nuts (not shown) which translationally fit in the undercut mounting groove and with which the relevant coupling piece 12 can be clamped by means of bolts 18 through bores 19 in the coupling piece 12 at a desired height against the basic profile 14.

[0045] In this case, the coupling piece 12 is executed as an L-shaped strengthening bracket 20 with two legs 12a and 12b provided with the aforementioned bores 19 for mounting the coupling piece 12 in the basic profile 14, said legs being diagonally connected with each other by a strengthening bar 12c.

[0046] Further at the top the coupling piece 12 is provided with a support 12d to support the aforementioned hinge 13, said support 12d for example being formed by a perpendicular folded over section of one of the legs 12b of the coupling piece 12.

[0047] The hinge 13 is composed of a hinge foot 13a and a hinge head 13b which are hingeably connected to each other by means of the aforementioned shaft 13c, whereby the hinge foot 13a is translationally mounted on the support 12d of the coupling piece 12 according to a direction Y-Y' in a vertical plane perpendicular to the direction X-X' of the shaft 13c

and the hinge head 13b is translationally mounted under the side guide rail 7 according to the direction Q-Q'.

[0048] For the translation of the hinge 13 on the support 12d of the coupling piece 12, said support 12d is provided with at least one slotted hole 21 which extends parallel to a plane perpendicular to the shaft 13c of the hinge 13 and the hinge 13 is mounted on the support 12d with its hinge foot 13a by means of one or more bolts 18 which

are screwed through the slotted hole 21 in the hinge foot 13a and which are translationally guided in the slotted hole 21.

[0049] The hinge head 13b is translational in the longitudinal direction Q-Q' of the side guide rail 7, for which purpose the side guide rail 7 is provided with a channel 7a at the bottom.

[0050] Both the hinge foot 13a and the hinge head 13b are provided with locking screws 18 for locking their position in the relevant sliding direction.

[0051] As appears from the figures 6 and 7 the hinge foot 13a and the hinge head 13b have a substantially triangular form, seen in a cross-section perpendicular to the shaft 13c of the hinge 13, and the tips of said hinge parts 13a and 13b are mounted such that their tips are facing each other and overlap over a certain height.

[0052] Thanks to the coupling piece 12 according to the invention, as shown in figure 4, a rotation R of the side guide rail 7 around the shaft 13c of the hinge 13 is possible and the position of the hinge 13 can be adjusted in the following directions:

- in the longitudinal direction Q-Q' of the side guide rail;
- in a direction Y-Y' in a vertical plane perpendicular to the shaft 13c of the hinge 13;
- in the height direction Z-Z'.

[0053] The basic profile 14 can be provided with a stop 22 for limiting the stroke of the movement of the coupling piece 12 in the height, for example in the form of a peg which is mounted in an aforementioned mounting groove 17 and on the level of a vertical recess 23 in one of the legs 12a or 12b of the coupling piece 12 and which forms a stop 22 for the coupling piece 12 in its highest position as shown in figure 6, on the one hand, and for the coupling piece 12 at its lowest position as shown in figure 7, on the other hand.

[0054] The length of the recess determines the stroke over which the coupling piece is movable and is such that the coupling piece 12 does not protrude in its highest position of figure 6 above the support post 9 and in its lowest position of figure 7 still allows a minimum slope of the side guide rail 7 without interference between the side guide rail 7 and the support post 9.

[0055] Alternatively, the stop 22 can be formed by a screw which is used for example to fix the cover profile 16 on the front bar 10 through the recess 23 in the coupling piece 12 and through a bore in the basic profile 14.

[0056] In the embodiment of figure 8 the front bar 10 and the side bars 11 are executed as hollow profiles which serve as roller casing for a roller with a retractable and extendable screen 24 thereon with which the front and the sides can be shielded.

[0057] The invention is also applicable to a terrace canopy 1 without side bars as shown in figure 9 or to a free standing pergola with four support legs.

[0058] It is understood that the side guide rails 7 can also be supported in a location at a distance from their

lower end 8, whereby in other words the side guide rails 7 protrude forward beyond the support posts 9 over a certain length.

[0059] Figure 10 shows an embodiment whereby two terrace canopies 1 are arranged next to each other as a contiguously continuous double terrace canopy with two roller casings 3 located in each other's extension and two adjacent side guide rails 7.

[0060] According to a specific aspect the adjacent side guide rails 7 are supported at their lower end 8 by one communal support post 9 with one communal coupling piece 12 therein and a communal hinge 13 thereon for both adjacent side guide rails 7.

[0061] The communal support post 9 is in this case composed of a U-shaped base piece 14 with a substantially U-shaped cross-section, the opening of which is oriented to the front and a substantially flat cover profile 16 to cover the opening.

[0062] The communal coupling piece 12 is U-shaped with a U-shaped section which fits in the U-shaped basic profile 14 and is height adjustably mounted therein.

[0063] Between the adjacent guide rails 7 a seal may be mounted (not shown in the figures).

[0064] The present invention is by no means limited to the embodiments described as an example and shown in the figures, but a terrace canopy according to the invention can be realised in all kinds of forms and dimensions without departing from the scope of the invention as defined by the claims.

Claims

1. Terrace canopy comprising a roof structure (2) with a retractable and extendable screen (5) guided in sloping side guide rails (7) for the screen (5), said side guide rails (7) being supported on or at a distance from their lower extremity (8) by a hollow support post (9) by means of a hinge (13) with a horizontal shaft (13c) which is transversely oriented to the longitudinal direction (Q-Q') of the side guide rail (7), wherein for setting the slope (A) of the side guide rail (7), the hinge (13) is mounted on a coupling piece (12) that is concealedly mounted in the hollow support post (9) and is height adjustably mounted in the support post (9), **characterised in that** the hinge (13) is translationally mounted on the coupling piece (12) in a direction (Y-Y') parallel with a plane perpendicular to the shaft (13c) of the hinge (13).
2. Terrace canopy according to claim 1, **characterised in that** the hinge (13) on the side guide rail (7) is movably mounted in the longitudinal direction (Q-Q') of the side guide rail (7)
3. Terrace canopy according to any one of the previous claims, **characterised in that** the hollow support post (9) is composed of an open basic profile (14)

with two or three legs (14a,14b) perpendicular to each other which define an open space (15) and of a removable cover profile (16) which covers the aforementioned space (15) in the longitudinal direction of the basic profile (14).

4. Terrace canopy according to claim 3, **characterised in that** the coupling piece (12) is executed as a strengthening bracket (20) which connects at least two legs (14a,14b) of the basic profile (14) with each other and is mounted height adjustably on the inside of the basic profile (14).
5. Terrace canopy according to claim 3 or 4, **characterised in that** the coupling piece (12) contains a substantially L-shaped or U-shaped section with which the coupling piece (12) is mounted against the inside of the basic profile (14) of the support post (9).
6. Terrace canopy according to claim 3 or 4, **characterised in that** the coupling piece (12) is provided with a transverse strengthening (12c) which connects at least two legs of the L-shaped or U-shaped section with each other.
7. Terrace canopy according to any one of the claims 3 to 6, **characterised in that** the basic profile (14) is provided with undercut mounting grooves (17) in the longitudinal direction and that the coupling piece (12) is translationally mounted on the basic profile (14) by means of nuts which are translationally mounted in the grooves (17) and are screwed tight in the nuts by means of bolts (18) through bores in the coupling piece (12) for clamping the coupling piece (12).
8. Terrace canopy according to any one of the claims 3 to 7, **characterised in that** the basic profile (14) is provided with a stop (22) to limit the upward translation of the coupling piece (12), said stop (22) being mounted such that the coupling piece (12) cannot protrude above the upper end of the support post (9).
9. Terrace canopy according to any one of the claims 3 to 8, **characterised in that** the basic profile (14) is provided with a stop (22) to limit the upward and downward translation of the coupling piece (12), whereby the stop (22) is mounted in a vertical recess (23) of the coupling piece (12) and the length of the recess determines the stroke of the movement of the coupling piece (12) in the height.
10. Terrace canopy according to any one of the previous claims, **characterised in that** the coupling piece (12) contains a support (12d) for the support of the aforementioned hinge (13).
11. Terrace canopy according to claim 10, **character-**

ised in that the hinge (13) is composed of a hinge foot (13a) and a hinge head (13b) which are hingeably connected to each other by means of the aforementioned shaft (13c), whereby the hinge foot (13a) is translationally mounted on the support (12d) of the coupling piece (12) and the hinge head (13b) is translationally mounted under the side guide rail (7).

12. Terrace canopy according to claim 11, **characterised in that** the support (12d) is executed as a transverse support plate which is provided with at least one slotted hole (21) which extends parallel to a plane perpendicular to the shaft (13c) of the hinge (13) and that the hinge foot (13b) is translationally mounted on the support (12d) by means of one or more bolts (18) which are screwed through the at least one slotted hole (21) in the hinge foot (13a) for clamping the hinge foot on the support.

13. Terrace canopy according to claim 11 or 12, **characterised in that** the hinge foot (13a) and the hinge head (13b), seen in a cross-section perpendicular to the shaft (13c) of the hinge, are shaped substantially triangularly and their tips overlap over a certain height.

14. Terrace canopy according to any one of the previous claims, **characterised in that** the screen (5) is mounted retractably and extendably on a roller which is mounted in a roller casing (3) which connects the upper ends of the side guide rails (7) to each other, whereby the roller casing (3) is provided with a suspension for mounting the roller casing (3) to a façade (4) or other bearing construction and whereby the roller casing (3) is provided tiltable around its longitudinal axis in the suspension to, upon mounting, set the slope (A) of the side guide rails (7) and thus of the screen.

15. Terrace canopy according to any one of the previous claims, **characterised in that** the side guide rails (7) are provided with a channel for guiding the side edges of the screen (5) and/or a bottom bar (6) at the lower edge of the screen (5).

16. Terrace canopy according to any one of the previous claims, **characterised in that** the terrace canopy (1) is provided with a front bar (10) with which the support posts (9) are mutually connected to each other.

17. Terrace canopy according to any one of the claims 14 to 16, **characterised in that** the terrace canopy (1) is provided with at least one substantially horizontal side bar (11) for the connection between a support post and the façade (4) or another bearing construction to which the roller casing (3) is mounted.

18. Terrace canopy according to any one of the claims

16 and/or 17, **characterised in that** the front bar (10) and/or one or more side bars (11) are formed as hollow profiles with a roller therein and a retractable and extendable screen (24) thereon.

19. Terrace canopy according to any one of the previous claims, **characterised in that** it contains two adjacent roller casings next to each other, each with two side guide rails, whereby the adjacent side guide rails are supported on or near their lower ends by one communal support post with one communal coupling piece therein and a communal hinge thereon for both adjacent side guide rails.

Patentansprüche

1. Terrassenüberdachung, die eine Dachkonstruktion (2) umfasst, die einen ein- und ausfahrbaren Schirm (5) umfasst, der in schrägen für den Schirm (5) bestimmten Seitenführungsschienen (7) geführt ist, wobei die Seitenführungsschienen (7) an oder in einem Abstand von ihrem unteren Ende (8) durch einen hohlen Stützpfeiler (9) mittels eines eine horizontale Welle (13c) umfassenden Scharniers (13) abgestützt sind, wobei die Welle (13c) quer zur Längsrichtung (Q-Q') der Seitenführungsschiene (7) ausgerichtet ist, wobei zur Einstellung der Neigung (A) der seitlichen Führungsschiene (7) das Scharnier (13) an einem Kupplungsstück (12) angebracht ist, das verdeckt in dem hohlen Stützpfeiler (9) und höhenverstellbar in dem Stützpfeiler (9) montiert ist, **dadurch gekennzeichnet, dass** das Scharnier (13) auf dem Kupplungsstück (12) in einer Richtung (Y-Y') parallel zu einer Ebene senkrecht zur Achse (13c) des Scharniers (13) verschiebbar angebracht ist.

2. Terrassenüberdachung nach Anspruch 1, **dadurch gekennzeichnet, dass** das Scharnier (13) an der Seitenführungsschiene (7) in Längsrichtung (Q-Q') der Seitenführungsschiene (7) beweglich montiert ist.

3. Terrassenüberdachung nach einem der vorhergehenden Ansprüche, **dadurch gekennzeichnet, dass** der hohle Stützpfeiler (9) aus einem offenen Grundprofil (14), das zwei oder drei senkrecht zueinander stehende Schenkel (14a, 14b) umfasst, die einen offenen Raum (15) begrenzen, und aus einem abnehmbaren Abdeckprofil (16) besteht, das den oben genannten Raum (15) in Längsrichtung des Grundprofils (14) abdeckt.

4. Terrassenüberdachung nach Anspruch 3, **dadurch gekennzeichnet, dass** das Kupplungsstück (12) als ein Verstärkungsbügel (20) ausgeführt ist, der mindestens zwei Schenkel (14a, 14b) des Grundprofils

(14) miteinander verbindet und der höhenverstellbar an der inneren Seite des Grundprofils (14) angebracht ist.

5. Terrassenüberdachung nach Anspruch 3 oder 4, **dadurch gekennzeichnet, dass** das Kupplungsstück (12) einen im Wesentlichen L- oder U-förmigen Abschnitt enthält, mit dem das Kupplungsstück (12) an der inneren Seite des Grundprofils (14) des Stützpfostens (9) angebracht ist. 5
6. Terrassenüberdachung nach Anspruch 3 oder 4, **dadurch gekennzeichnet, dass** das Kupplungsstück (12) mit einer Querverstärkung (12c) versehen ist, die mindestens zwei Schenkel des L- oder U-förmigen Profils miteinander verbindet. 10
7. Terrassenüberdachung nach einem der Ansprüche 3 bis 6, **dadurch gekennzeichnet, dass** das Grundprofil (14) in Längsrichtung mit hinterschnittenen Montagenuten (17) versehen ist, und dass das Kupplungsstück (12) mittels Muttern, die in den Nuten (17) verschiebbar montiert sind und mittels Bolzen in den Nuten durch Bohrungen im Kupplungsstück (12) zum Festklemmen des Kupplungsstücks (12) festgeschraubt werden, auf dem Grundprofil (14) verschiebbar montiert ist. 20
8. Terrassenüberdachung nach einem der Ansprüche 3 bis 7, **dadurch gekennzeichnet, dass** das Grundprofil (14) mit einem Anschlag (22) versehen ist, um die Verschiebung des Kupplungsstück (12) nach oben zu begrenzen, wobei der oben genannte Anschlag (22) so angebracht ist, dass das Kupplungsstück (12) nicht über das obere Ende des Stützpfostens (9) herausragen kann. 30
9. Terrassenüberdachung nach einem der Ansprüche 3 bis 8, **dadurch gekennzeichnet, dass** das Grundprofil (14) mit einem Anschlag (22) versehen ist, um die Aufwärts- und Abwärtsverschiebung des Kupplungsstücks (12) zu begrenzen, wobei der Anschlag (22) in einer vertikalen Ausnehmung (23) des Kupplungsstücks (12) angebracht ist und wobei die Länge der Ausnehmung den Hub der Bewegung des Kupplungsstücks (12) in der Höhe bestimmt. 35
10. Terrassenüberdachung nach einem der vorhergehenden Ansprüche, **dadurch gekennzeichnet, dass** das Kupplungsstück (12) einen Träger (12d) zur Abstützung des oben genannten Scharniers (13) enthält. 40
11. Terrassenüberdachung nach Anspruch 10, **dadurch gekennzeichnet, dass** das Scharnier (13) aus einem Scharnierfuß (13a) und einem Scharnierkopf (13b) besteht, die mittels der oben genannten Welle (13c) gelenkig miteinander verbunden sind, 45

wobei der Scharnierfuß (13a) auf dem Träger (12d) des Kupplungsstücks (12) und der Scharnierkopf (13b) unter der seitlichen Führungsschiene (7) verschiebbar angebracht sind.

12. Terrassenüberdachung nach Anspruch 11, **dadurch gekennzeichnet, dass** der Träger (12d) als Querträgerplatte ausgeführt ist, die mit mindestens einem Langloch (21) versehen ist, das sich parallel zu einer Ebene senkrecht zur Welle (13c) des Scharniers (13) erstreckt und dass der Scharnierfuß (13b) mittels eines oder mehrerer Bolzen (18), die durch das mindestens eine Langloch (21) in dem Scharnierfuß (13a) geschraubt werden, um den Scharnierfuß an dem Träger festzuklemmen, verschiebbar an dem Träger (12d) angebracht ist. 50
13. Terrassenüberdachung nach Anspruch 11 oder 12, **dadurch gekennzeichnet, dass** der Scharnierfuß (13a) und der Scharnierkopf (13b), im Querschnitt senkrecht zu der Scharnierachse (13c) gesehen, im Wesentlichen dreieckig geformt sind und ihre Spitzen sich über eine bestimmte Höhe überlappen. 55
14. Terrassenüberdachung nach einem der vorhergehenden Ansprüche, **dadurch gekennzeichnet, dass** der Schirm (5) ein- und ausfahrbar an einer Rolle gelagert ist, die in einem Rollenkasten (3) gelagert ist, der die oberen Enden der Seitenführungsschienen (7) miteinander verbindet, wobei der Rollenkasten (3) mit einer Aufhängung zur Befestigung des Rollenkastens (3) an einer Fassade (4) oder einer anderen Tragkonstruktion versehen ist und wobei der Rollenkasten (3) in der Aufhängung um seine Längsachse schwenkbar vorgesehen ist, um bei der Montage die Neigung (A) der Seitenführungsschienen (7) und damit des Schirms einzustellen. 60
15. Terrassenüberdachung nach einem der vorhergehenden Ansprüche, **dadurch gekennzeichnet, dass** die seitlichen Führungsschienen (7) mit einem Kanal zur Führung der Seitenkanten des Schirms (5) und/oder einer unteren Leiste (6) an dem unteren Rand des Schirms (5) versehen sind. 65
16. Terrassenüberdachung nach einem der vorhergehenden Ansprüche, **dadurch gekennzeichnet, dass** die Terrassenüberdachung (1) mit einer vorderen Leiste (10) versehen ist, mit der die Stützpfosten (9) miteinander verbunden sind. 70
17. Terrassenüberdachung nach einem der Ansprüche 14 bis 16, **dadurch gekennzeichnet, dass** die Terrassenüberdachung (1) mit mindestens einer im Wesentlichen waagerechten seitlichen Leiste (11) für die Verbindung zwischen einem Stützpfosten und der Fassade (4) oder einer anderen Tragkonstruktion, an der der Rollenkasten (3) befestigt ist, verse-

hen ist.

18. Terrassenüberdachung nach einem der Ansprüche 16 und/oder 17, **dadurch gekennzeichnet, dass** die vordere Leiste (10) und/oder eine oder mehrere seitlichen Leisten (11) als Hohlprofile mit einer darin befindlichen Rolle und einem darauf befindlichen ein- und ausfahrbaren Schirm (24) ausgebildet sind. 5
19. Terrassenüberdachung nach einem der vorhergehenden Ansprüche, **dadurch gekennzeichnet, dass** sie zwei nebeneinander liegende Rollenkästen enthält, die jeweils zwei Seitenführungsschienen umfassen, wobei die nebeneinander liegenden Seitenführungsschienen an oder nahe ihren unteren Enden von einem gemeinsamen Stützpfeiler mit einem darin befindlichen gemeinsamen Kupplungsstück und einem daran befindlichen gemeinsamen Scharnier für beide nebeneinander liegenden Seitenführungsschienen getragen werden. 10 20

Revendications

1. Auvent de terrasse qui comprend une structure (2) qui forme un toit, comprenant un écran rétractable et extensible (5) qui est guidé dans des rails de guidage latéraux inclinés (7) qui sont destinés à l'écran (5), lesdits rails de guidage (7) étant supportés, à leur extrémité inférieure (8) ou à une distance de celle-ci, par l'intermédiaire d'un montant de support creux (9) au moyen d'une articulation (13) qui comporte un arbre horizontal (13c) qui est orienté dans la direction transversale par rapport à la direction longitudinale (Q-Q') du rail de guidage latéral (7), dans lequel, à des fins de réglage de la pente (A) du rail de guidage latéral (7), l'articulation (13) est montée sur une pièce d'accouplement (12) qui est montée de manière dissimulée dans le montant de support creux (9) et qui est montée d'une manière telle que sa hauteur peut être réglée, dans le montant de support (9), **caractérisé en ce que** l'articulation (13) est montée en translation sur la pièce d'accouplement (12) dans une direction (Y-Y') qui est parallèle à un plan perpendiculaire à l'arbre (13c) de l'articulation (13). 25 30 35 40 45
2. Auvent de terrasse selon la revendication 1, **caractérisé en ce que** l'articulation (13) sur le rail de guidage latéral (7) est montée en mobilité dans la direction longitudinale (Q-Q') du rail de guidage latéral (7). 50
3. Auvent de terrasse selon l'une quelconque des revendications précédentes, **caractérisé en ce que** le montant de support creux (9) se compose d'un profilé de base ouvert (14) qui possède deux ou trois branches (14a, 14b) perpendiculaires les unes aux autres, qui définissent un espace ouvert (15), et d'un profilé de recouvrement amovible (16) qui recouvre l'espace (15) qui a été mentionné ci-dessus, dans la direction longitudinale du profilé de base (14). 5
4. Auvent de terrasse selon la revendication 3, **caractérisé en ce que** la pièce d'accouplement (12) est réalisée sous la forme d'un support de renforcement (20) qui relie au moins deux branches (14a, 14b) du profilé de base (14) l'une à l'autre et qui est monté, de manière à pouvoir régler sa hauteur, sur le côté interne du profilé de base (14). 10
5. Auvent de terrasse selon la revendication 3 ou 4, **caractérisé en ce que** la pièce d'accouplement (12) contient un tronçon qui possède essentiellement une configuration en forme de L ou qui possède essentiellement une configuration en forme de U, avec lequel la pièce d'accouplement (12) est montée contre le côté interne du profilé de base (14) du montant de support (9). 15 20
6. Auvent de terrasse selon la revendication 3 ou 4, **caractérisé en ce que** la pièce d'accouplement (12) est équipée d'un renforcement transversal (12c) qui relie l'une à l'autre au moins deux branches du tronçon possédant une configuration en forme de L ou une configuration en forme de U. 25
7. Auvent de terrasse selon l'une quelconque des revendications 3 à 6, **caractérisé en ce que** le profilé de base (14) est muni de rainures de montage (17) sous la forme de contre-dépouilles dans la direction longitudinale, et **en ce que** la pièce d'accouplement (12) est montée en translation sur le profilé de base (14) au moyen d'écrous montés en translation dans les rainures (17) et serrés par vissage dans les écrous au moyen de boulons (18) qui traversent des alésages dans la pièce d'accouplement (12) à des fins de serrage de la pièce d'accouplement (12). 30 35 40
8. Auvent de terrasse selon l'une quelconque des revendications 3 à 7, **caractérisé en ce que** le profilé de base (14) est muni d'un arrêt (22) destiné à limiter la translation vers le haut de la pièce d'accouplement (12), ledit arrêt (22) étant monté d'une manière telle que la pièce d'accouplement (12) ne peut pas faire saillie au-dessus de l'extrémité supérieure du montant de support (9). 45 50
9. Auvent de terrasse selon l'une quelconque des revendications 3 à 8, **caractérisé en ce que** le profilé de base (14) est muni d'un arrêt (22) destiné à limiter la translation vers le haut et vers le bas de la pièce d'accouplement (12), dans lequel l'arrêt (22) est monté dans un évidement vertical (23) de la pièce d'accouplement (12) et la longueur de l'évidement détermine la course du mouvement de la pièce d'accouplement (12). 55

couplement (12) sur la hauteur.

10. Auvent de terrasse selon l'une quelconque des revendications précédentes, **caractérisé en ce que** la pièce d'accouplement (12) contient un support (12d) pour le support de l'articulation (13) qui a été mentionnée ci-dessus. 5
11. Auvent de terrasse selon la revendication 10, **caractérisé en ce que** l'articulation (13) se compose d'un pied d'articulation (13a) et d'une tête d'articulation (13b) qui sont reliés en articulation l'un à l'autre au moyen de l'arbre (13c) qui a été mentionné ci-dessus, dans lequel le pied (13a) de l'articulation est monté en translation sur le support (12d) de la pièce d'accouplement (12) et la tête (13b) de l'articulation est montée en translation sur le rail de guidage latéral (7). 10
12. Auvent de terrasse selon la revendication 11, **caractérisé en ce que** le support (12d) est réalisé sous la forme d'une plaque de support transversale qui est équipée d'au moins un trou (21) en forme de fente qui s'étendant parallèlement à un plan perpendiculaire à l'arbre (13c) de l'articulation (13), et **en ce que** le pied (13b) de l'articulation est monté en translation sur le support (12d) au moyen d'un ou de plusieurs boulons (18) qui sont vissés à travers ledit au moins un trou (21) en forme de fente dans le pied (13a) de l'articulation à des fins de serrage du pied de l'articulation sur le support. 20 25
13. Auvent de terrasse selon la revendication 11 ou 12, **caractérisé en ce que** le pied (13a) de l'articulation et la tête (13b) de l'articulation, lorsqu'on regarde dans une vue en coupe transversale perpendiculairement à l'arbre (13c) de l'articulation, possèdent une configuration essentiellement en forme de triangle et leurs extrémités se chevauchent sur une certaine hauteur. 30 35 40
14. Auvent de terrasse selon l'une quelconque des revendications précédentes, **caractérisé en ce que** l'écran (5) est monté de manière rétractable et extensible sur un rouleau qui est monté dans un boîtier de rouleau (3) qui relie les extrémités supérieures des rails de guidages latéraux (7) l'une à l'autre, respectivement, dans lequel le boîtier de rouleau (3) est équipé d'une suspension pour le montage du boîtier de rouleau (3) contre une façade (4) ou contre une autre construction de support, et dans lequel le boîtier de rouleau (8) est prévu de manière à pouvoir basculer autour de son axe longitudinal dans la suspension dans le but de, après le montage, déterminer la pente (A) des rails de guidages latéraux (7) et par conséquent de l'écran. 45 50 55

15. Auvent de terrasse selon l'une quelconque des re-

vendications précédentes, **caractérisé en ce que** les rails de guidages latéraux (7) sont équipés d'un canal pour le guidage des bords latéraux de l'écran (5) et/ou d'une barre inférieure (6) au bord inférieur de l'écran (5).

16. Auvent de terrasse selon l'une quelconque des revendications précédentes, **caractérisé en ce que** l'auvent de terrasse (1) est équipé d'une barre frontale (10) avec laquelle les montants de support (9) sont reliés l'un à l'autre de manière réciproque.
17. Auvent de terrasse selon l'une quelconque des revendications 14 à 16, **caractérisé en ce que** l'auvent de terrasse (1) est équipé d'au moins une barre latérale essentiellement horizontale (11) pour la liaison entre un montant de support et la façade (4) ou une autre construction de support contre laquelle le boîtier de rouleau (3) est monté.
18. Auvent de terrasse selon l'une quelconque des revendications 16 et/ou 17, **caractérisé en ce que** la barre frontale (10) et/ou une ou plusieurs barres latérales (11) est/sont réalisée(s) sous la forme de profils creux dans lesquels est inséré un rouleau et sur lesquels est disposé un écran rétractable et extensible (24).
19. Auvent de terrasse selon l'une quelconque des revendications précédentes, **caractérisé en ce qu'il** contient deux boîtiers de rouleaux disposés en position adjacente, l'un à côté de l'autre, chacun comportant deux rails de guidages latéraux, dans lequel les rails de guidages latéraux adjacents sont supportés sur ou à proximité de leurs extrémités inférieures par un montant de support commun dans lequel est insérée une pièce d'accouplement commune et sur lequel est disposée une articulation commune pour les deux rails de guidages latéraux adjacents.

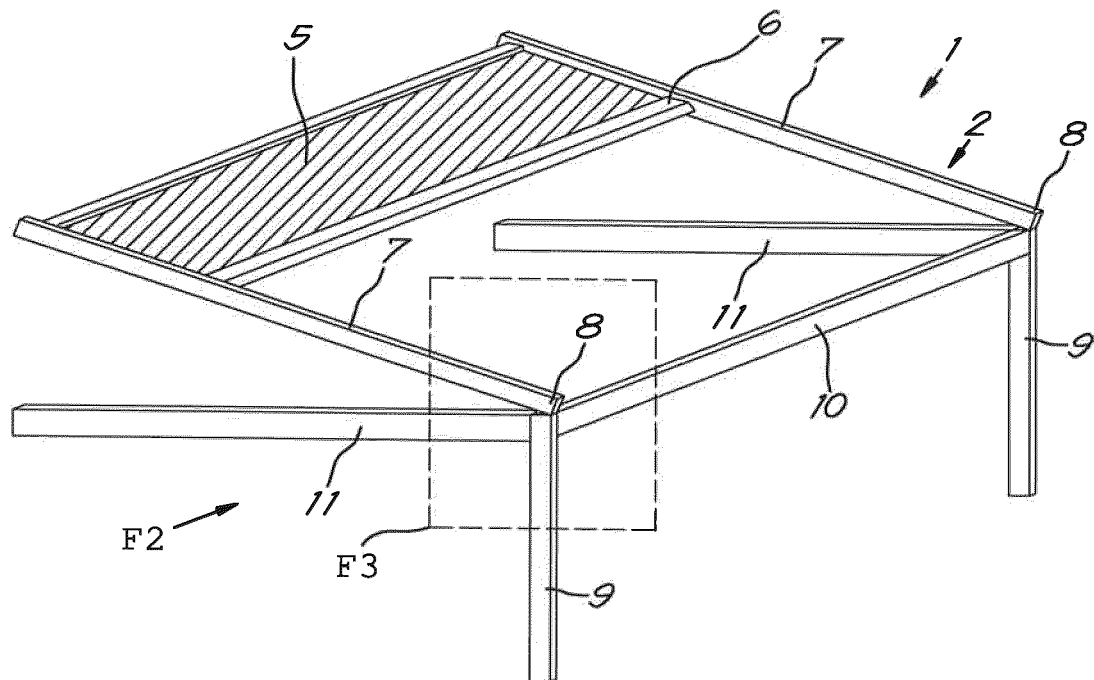


Fig. 1

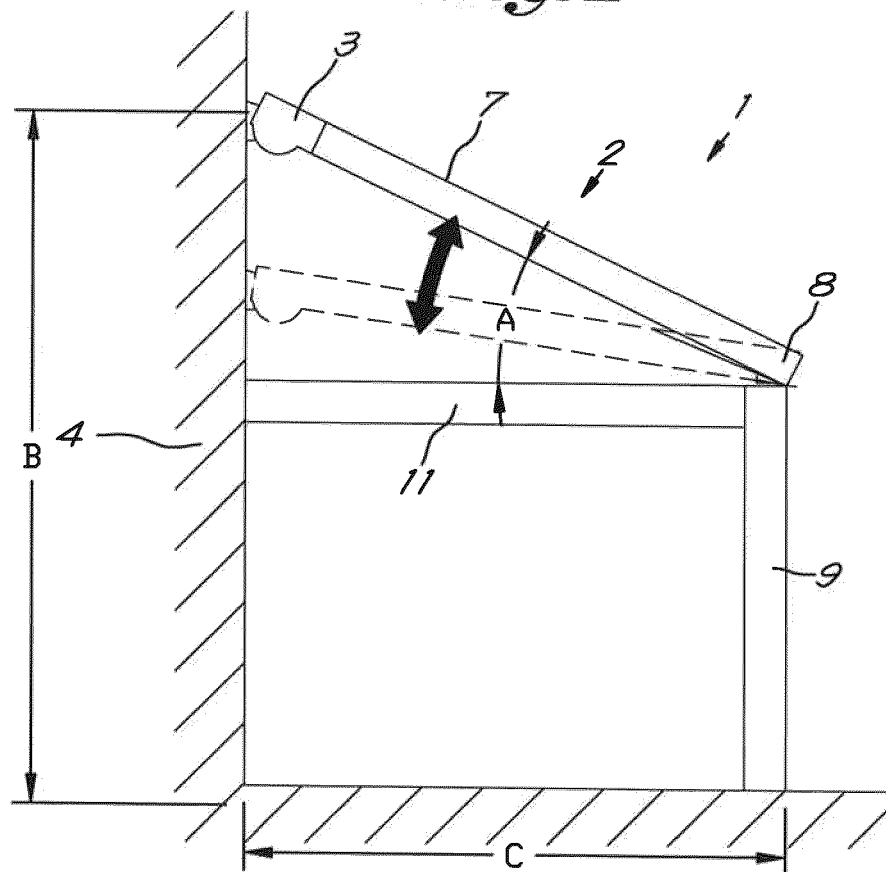


Fig. 2

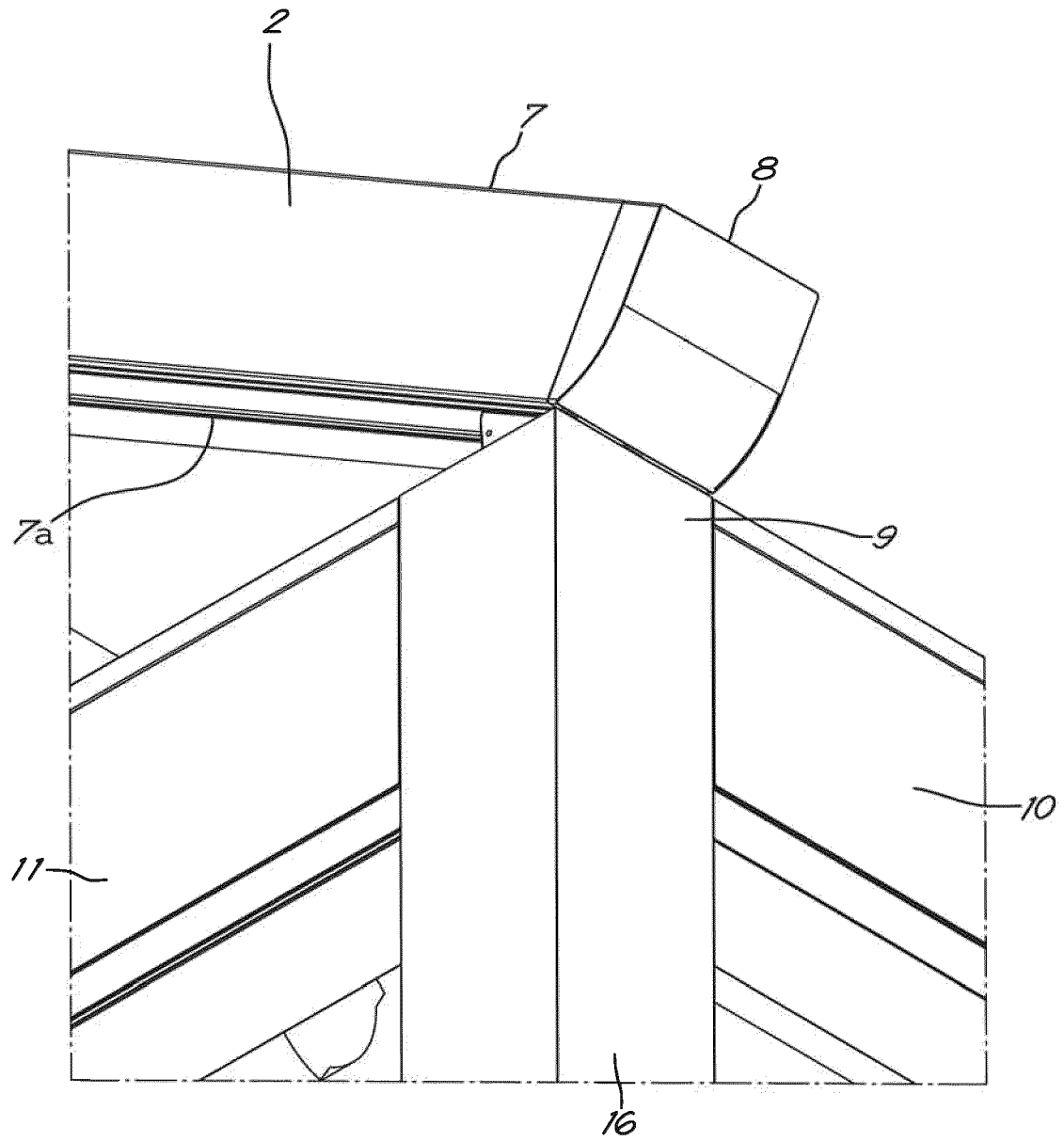


Fig.3

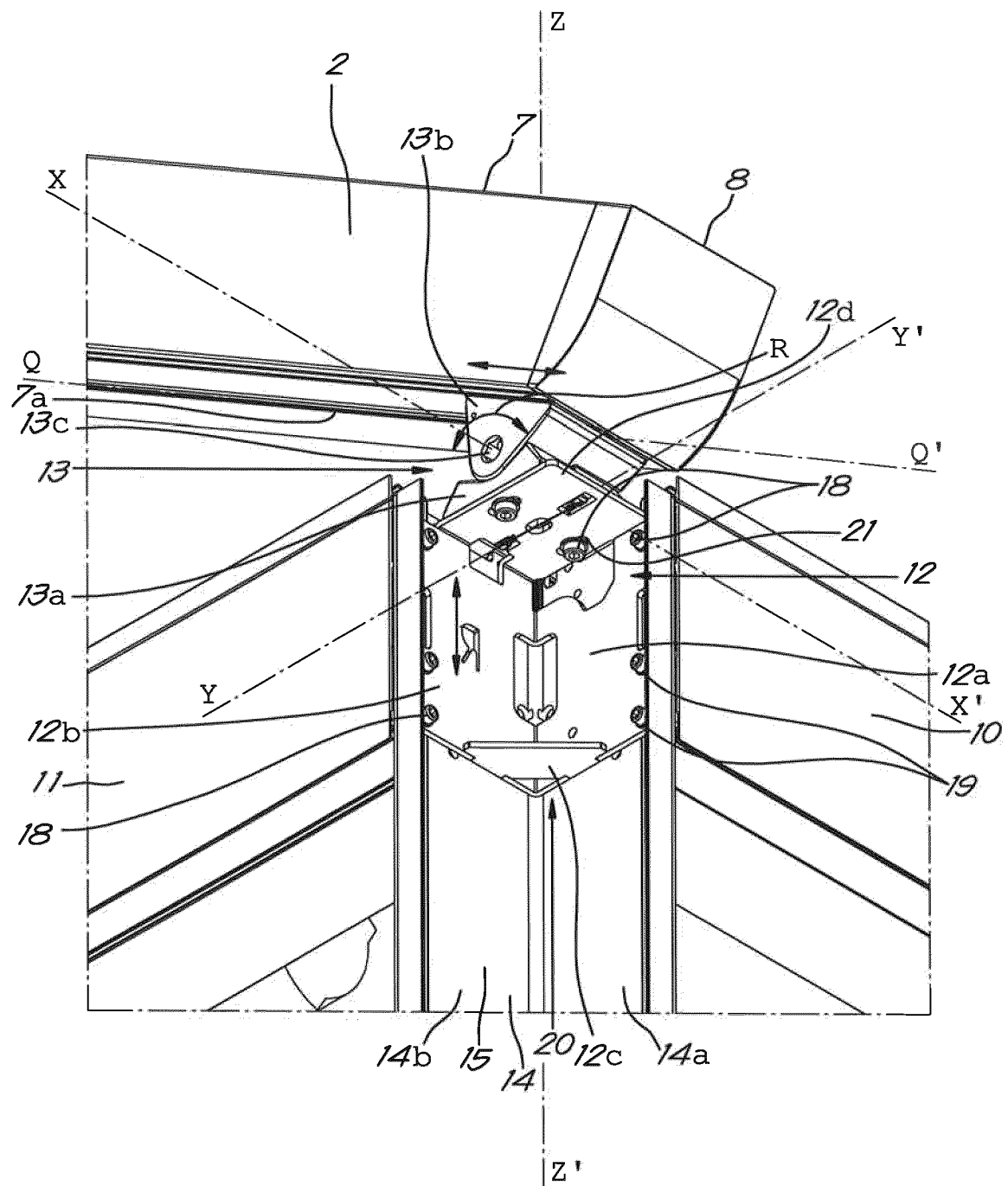


Fig. 4

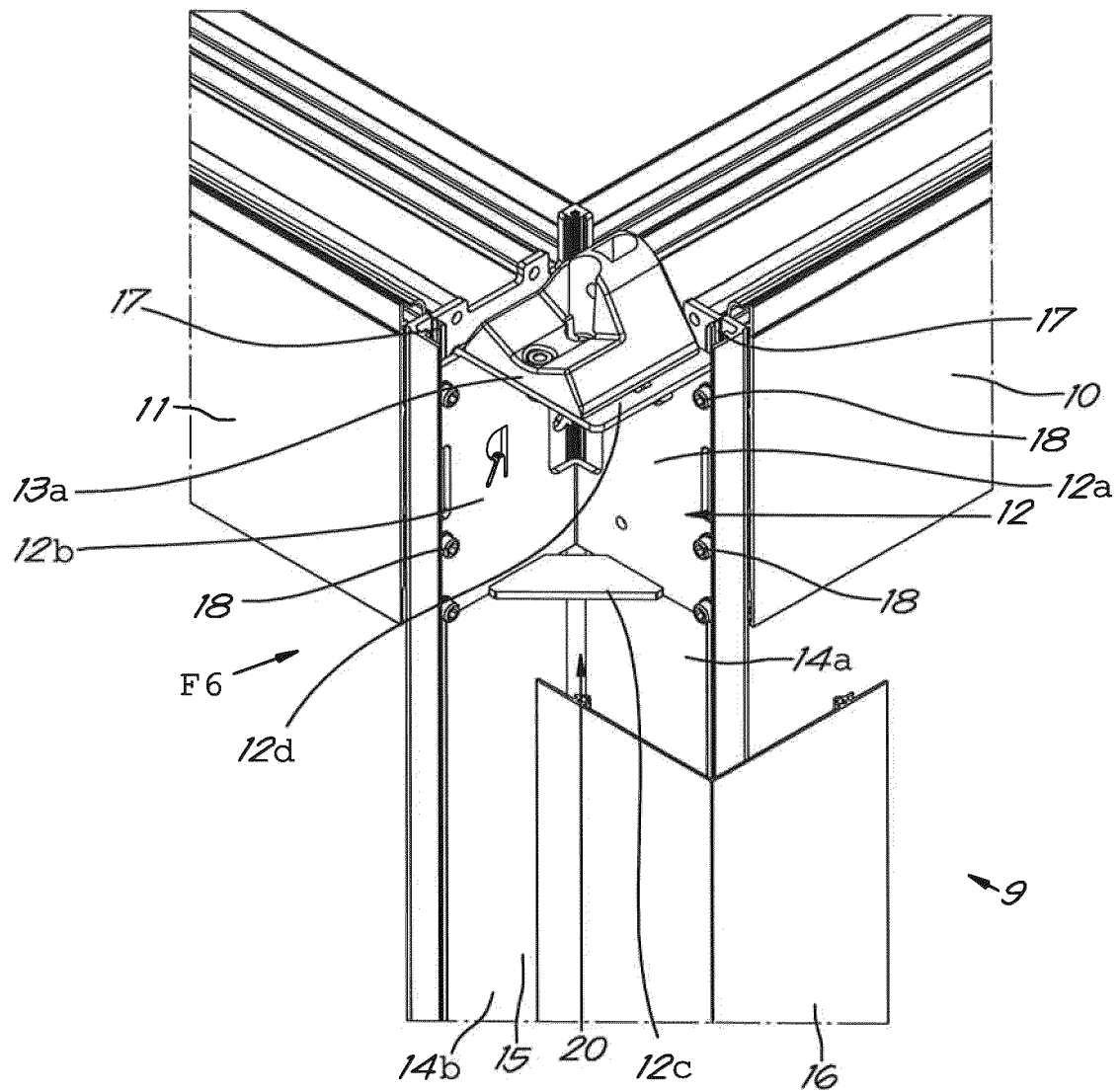


Fig.5

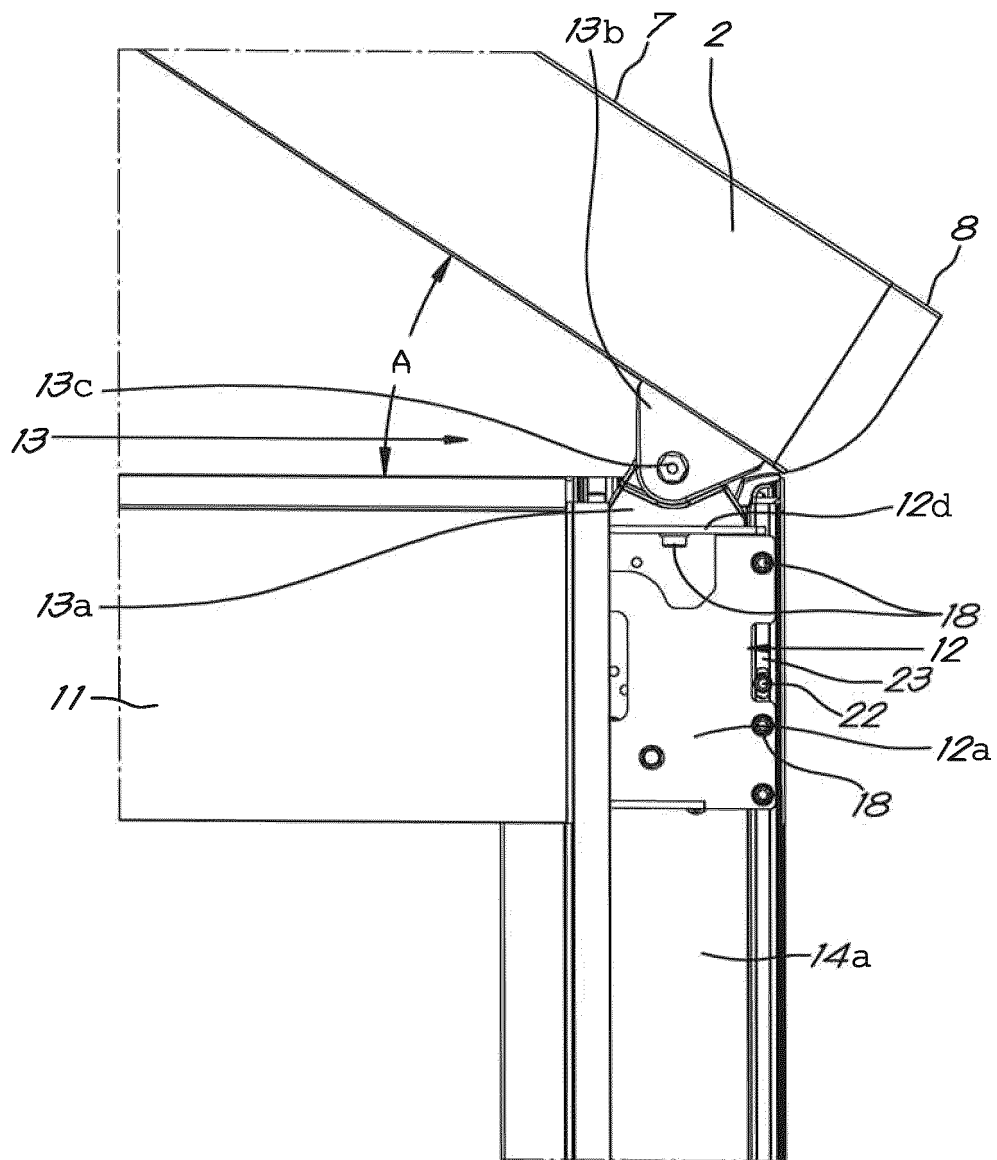


Fig. 6

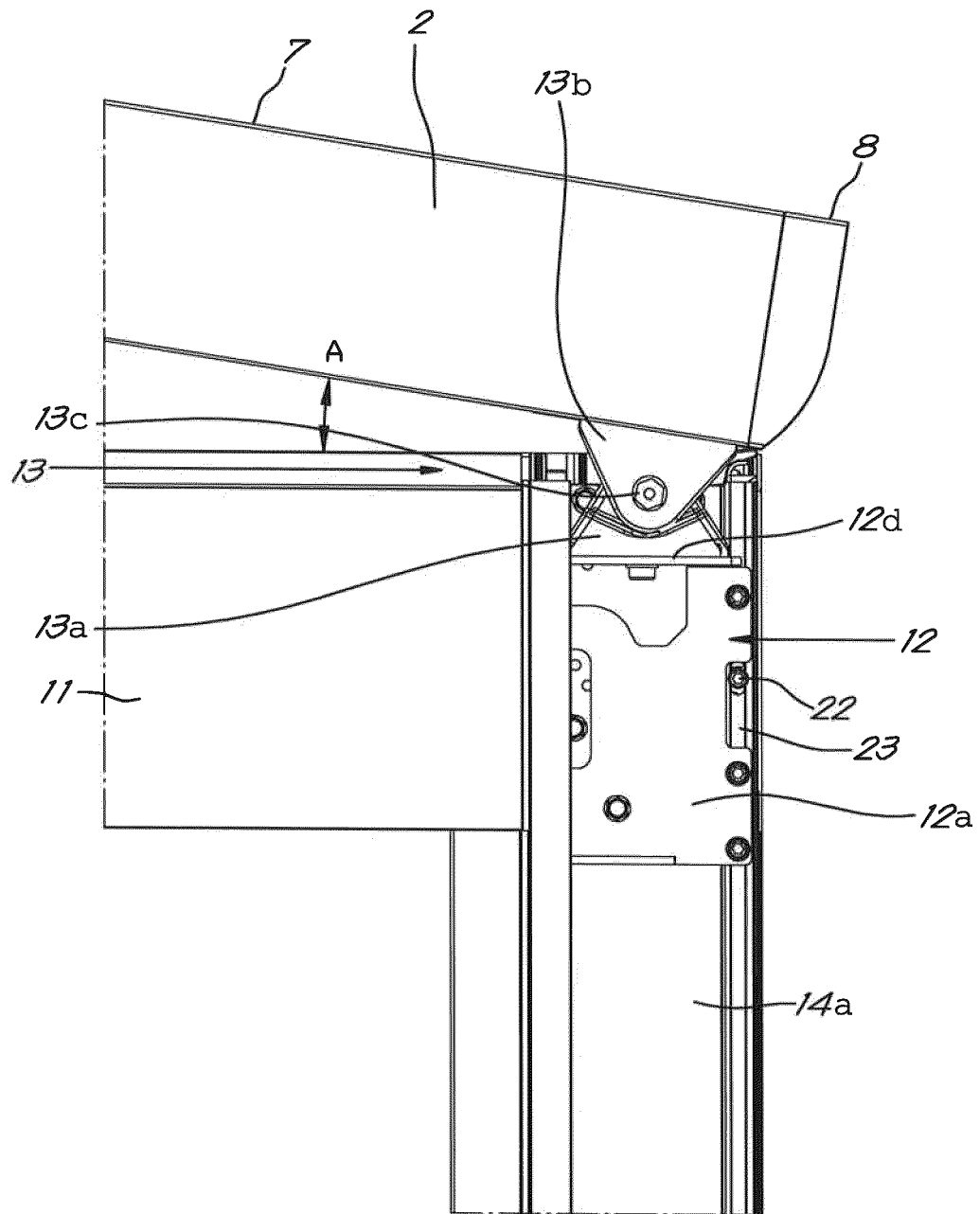


Fig. 7

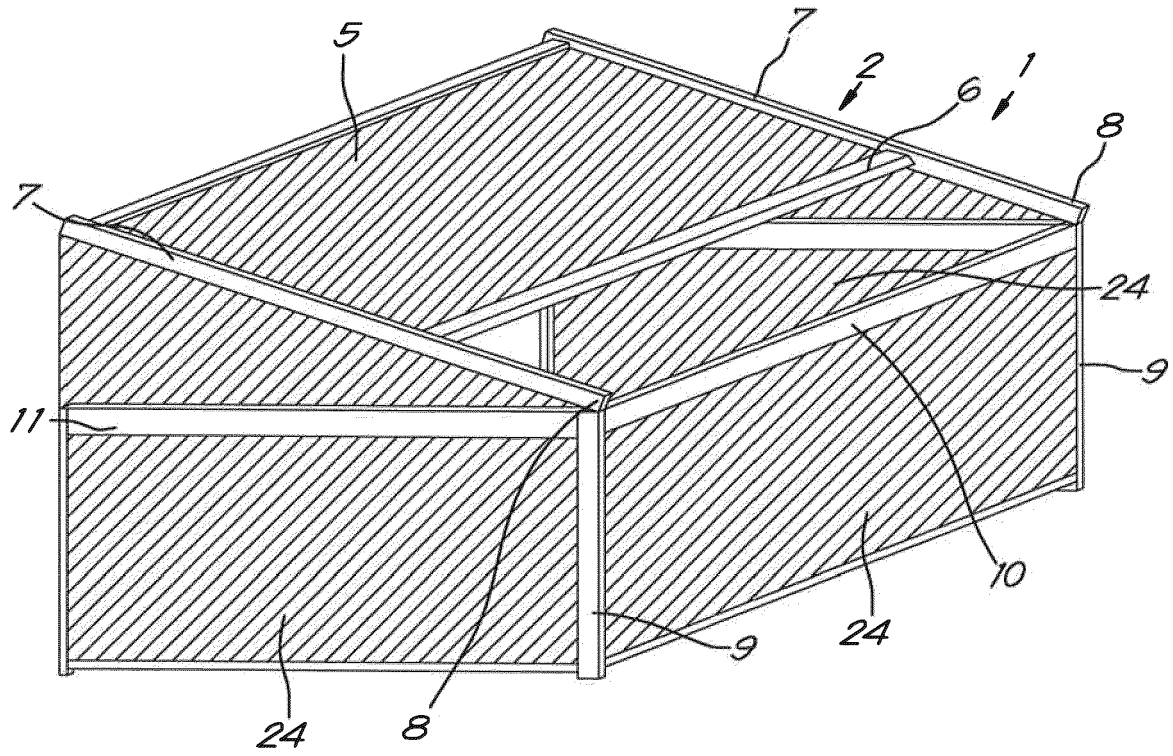


Fig. 8

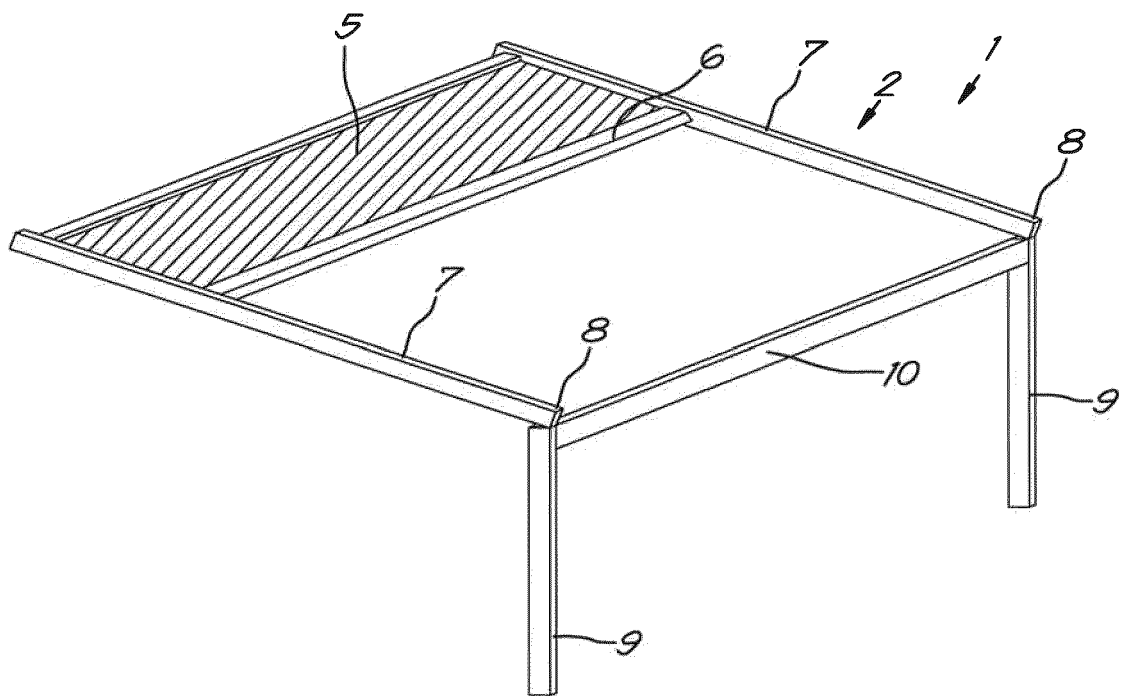


Fig. 9

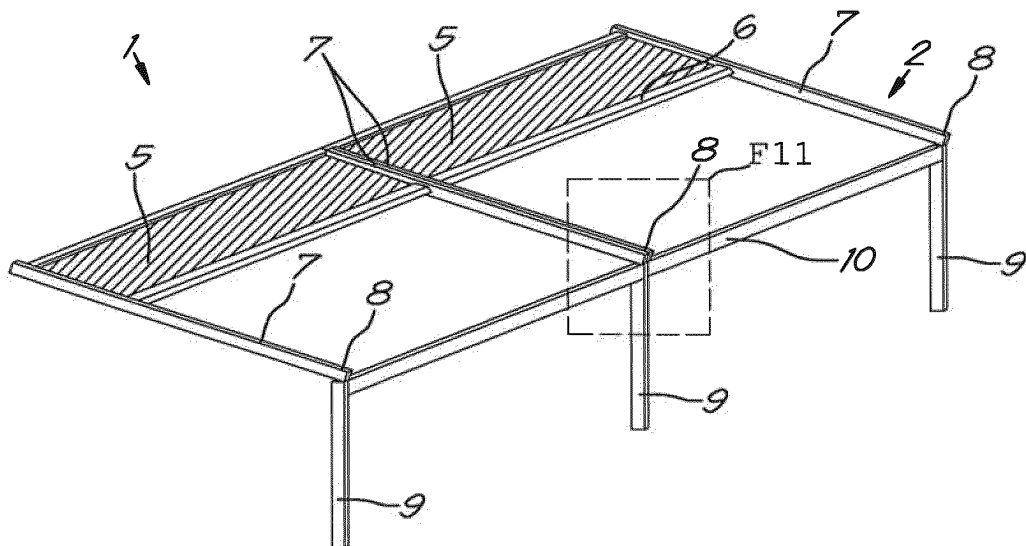


Fig. 10

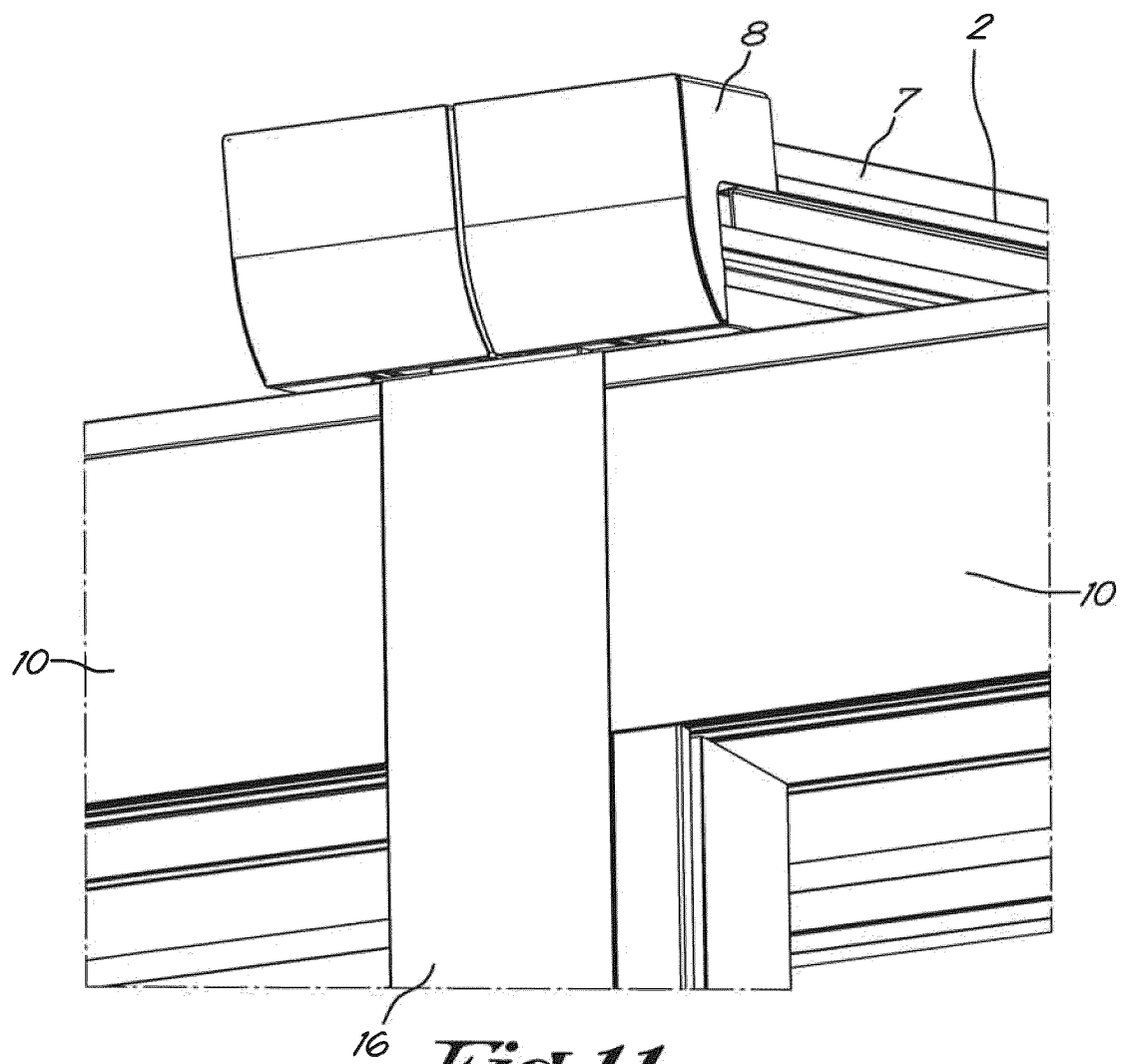


Fig. 11

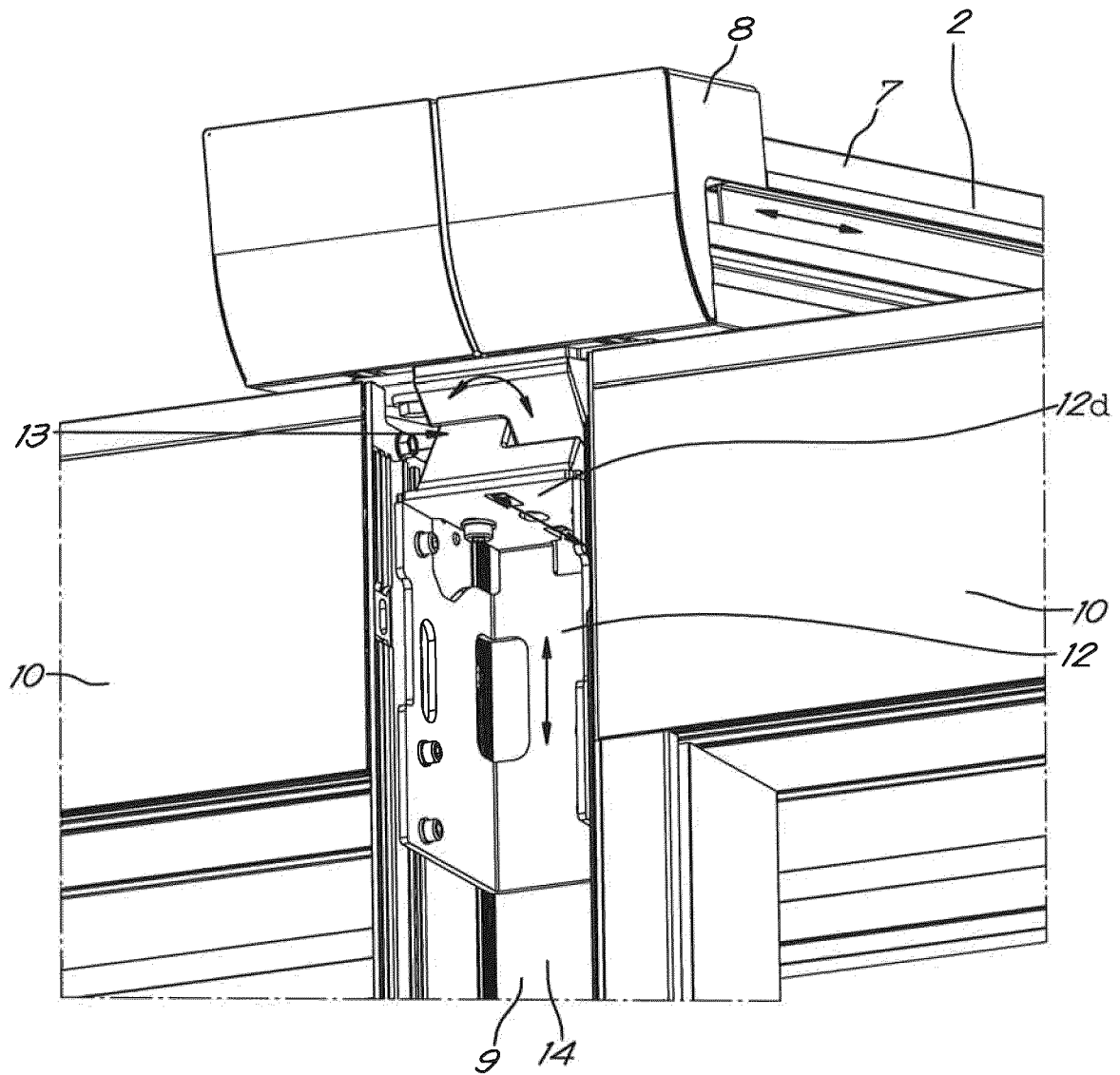


Fig. 12

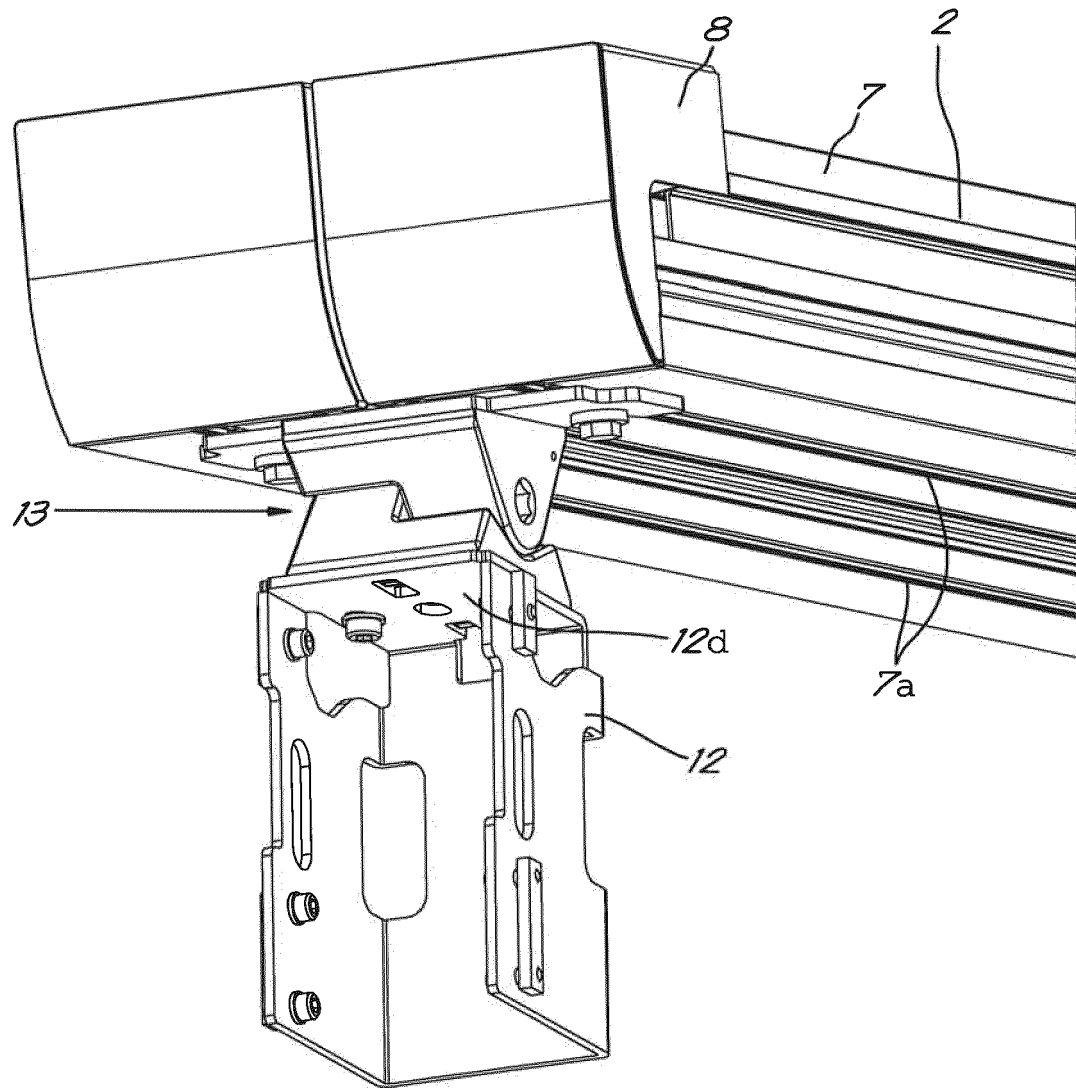


Fig. 13

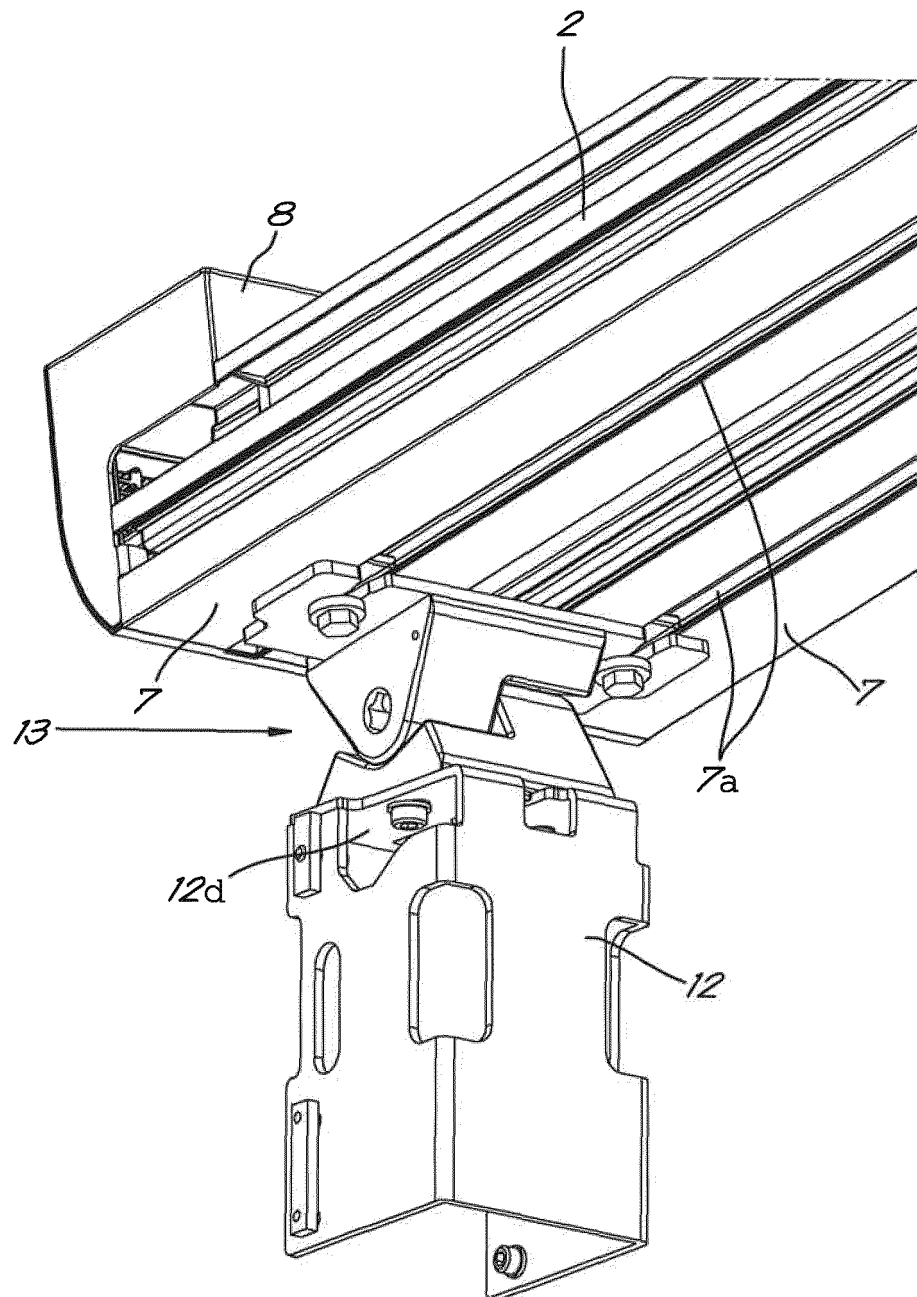


Fig. 14

REFERENCES CITED IN THE DESCRIPTION

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