

## Title (en)

Mixer with a fixed vat, in particular aimed at mixing wet or dry components, for obtaining concrete

## Title (de)

Mischmaschine mit ortsfestem Behälter, insbesondere zum Mischen von feuchten oder trockenen Bestandteilen, zur Herstellung von Beton

## Title (fr)

Malaxeur à cuve fixe, notamment destiné au mélange de composants humides ou secs, pour l'obtention de béton

## Publication

**EP 1842583 B1 20080924 (FR)**

## Application

**EP 07370005 A 20070319**

## Priority

FR 0603065 A 20060407

## Abstract (en)

[origin: EP1842583A1] The mixer with fixed drum to mix wet or dry components such as cement and silica sand for obtaining concrete, comprises a mixing axle having a shaft with blades to stir the components present in the drum, a support (1) subjected to the rotatable plate of the mixer, and a ring element allows centering and fixing of hollow bodies with the rotatable plate of the mixer. The mixing axle is led into simple or complex rotation by a device having a rotatable plate. The support comprises a cylindrical casing element (3) of uncovered contour having two terminal edges. The mixer with fixed drum to mix wet or dry components such as cement and silica sand for obtaining concrete, comprises a mixing axle having a shaft with blades to stir the components present in the drum, a support (1) subjected to the rotatable plate of the mixer, and a ring element allows centering and fixing of hollow bodies with the rotatable plate of the mixer. The mixing axle is led into simple or complex rotation by a device having a rotatable plate. The support comprises a cylindrical casing element (3) of uncovered contour having two terminal edges, a rectangular plate (7) having a dimension corresponding to an opening, which separates the terminal edges of the element subjected to the sides of the terminal edges for making a hollow body of closed contour with casing element, and a temperature measurement probe. The plate has internal and external sides respectively turned towards an interior and exterior of the hollow bodies, a fixing projection unit of a fluid pressure present in the hollow bodies and subjected to the internal side of the plate, and an arm fitted with blade subjected to the external side of the plate. The casing element is cylindrical, which is obtained after a revolution of 250[deg]. The two terminal edges are parallel to a revolution axis of the element. The plate is rectangular with equal length or slightly greater than a distance separating the terminal edges of the casing element width approximately equal to a height of the cylindrical casing element. The ring element has an external contour, which is dimensioned and adjusted with an internal profile of the hollow bodies with a circular part closely with an internal diameter of the cylindrical casing element and straight part for cooperating closely with the rectangular plate. The ring element is not closed, and has a passage for supplying a fluid through a conduit of projection device. The support has a rectangular rigid duct on the internal diameter of the cylindrical casing element, and a double vertical wall of which a part is formed by an internal wall of the cylindrical casing element and by a coaxial cylindrical part of small diameter. A horizontal double wall of the support is formed by two circular flat strips welded and sealed with vertical walls. The rigid duct has an upper edge on which a fluid inlet opening is formed. The support presents in a connection element for flexible tubular conduit. The connection element comprises a top bore fixed with a tubular conduit end, an outlet for fluid positioning on the inlet opening of the rigid duct, an inner recess connecting the top bore and the outlet, an upper side in which top bore is formed, a rear side opened in the inner recess, two lateral sides in rectangular trapeze form with two free edges at the rear side to be welded and sealed on the internal wall of the cylindrical casing element, and a lower surface in which outlet is made, where the outlet has a U-shaped edge to be welded and sealed to an upper edge of rigid duct. The probe is subjected to a lower end of an arm making downwards projection in the drum, and an upper end of the arm is subjected directly or indirectly to an inner side of the rectangular plate.

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