

Title (en)
Machine for forming packs of folded napkins, provided with means for synchronizing the speed of advancing movement of the pack separating element

Title (de)
Maschine zum Bilden von Packungen aus gefalteten Papierservietten mit Mitteln zur Synchronisierung der Geschwindigkeit der Vorschubbewegung des Packungstrennelements

Title (fr)
Machine pour former des paquets de serviettes pliées, dotée de moyens pour synchroniser la vitesse d'avancement de l'élément de séparation des paquets.

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Application
EP 10187093 A 20101011

Priority
IT MI20091778 A 20091015

Abstract (en)
Machine for forming packs (P) of napkins (1c) folded into four, comprising a pair of cylinders (10) for picking up a sheet of paper (1) suitably pre-folded and feeding said sheet (1) folded along vertical folding lines (1b), said folding means (1a) also performing counting of the napkins which must form each pack; a conveying surface (20) with vertical shoulders (21) for supporting and retaining the napkins (1c); means (30) for unloading each pack (P) formed by a given number of napkins and extracted from the machine, said means being associated with at least one sensor (40) able to detect a pressure corresponding to the presence of a complete pack and emit corresponding consent signals to programming and control means (1000); an apparatus (100) for separating the packs (P 1 ..P n) formed in succession, which comprises a feeler arm (110) movable rotationally about an axis parallel to the transverse direction (Y-Y), from a lowered position, where it engages with the first napkin in a pack, into a raised position where it does not interfere with the advancing packs (P) and vice versa; said feeler arms being mounted on a transverse shaft (112) operated displaceably by associated pneumatic cylinders (114) designed to move the feeler arms from a position advanced in the longitudinal direction (X-X) into a position (M2) retracted in the same longitudinal direction; means (200) for retaining the advancing packs (P) in the longitudinal direction (X-X), substantially comprising a pair of flanges (210) movable rotationally about an axis parallel to the longitudinal direction (X-X) from a raised, non-interfering position into a lowered position where they interfere with the first pack (P n) which is advancing towards the unloading means (30); the flanges (210) being displaceable in the longitudinal direction (X-X) from an advanced position (F1) close to the unloading means (30) where the upwards rotation for disengagement from the pack (P) occurs into a retracted position (F2) where they rotate downwards so as to interfere with the advancing pack (P), the means for performing displacement of the flanges (210) comprising an electric motor (300) controlled by the programming and control means (1000) able to determine a corresponding speed of forwards displacement of the flanges (210).

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Citation (search report)
• [A] DE 29507166 U1 19950622 - HOBEMA MASCHF HERMANN [DE]
• [A] WO 0212102 A1 20020214 - O M T S R L [IT], et al
• [A] EP 0371931 A1 19900606 - OMT COSTR MECC SRL [IT]
• [A] US 3451521 A 19690624 - FEHST JURGEN, et al

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CN104192351A; CN110668218A; US2012167527A1; CN109928257A; CN107521242A; CN102887393A

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