

Title (en)

Fabric take-down roller device for flat bed knitting machines

Title (de)

Warenabzugswalzenanordnung für Flachstrickmaschinen

Title (fr)

Dispositif de rouleaux de tirage d'articles pour des métiers à tricoter rectilignes

Publication

EP 0899369 A3 20000301 (DE)

Application

EP 98113354 A 19980717

Priority

DE 19738013 A 19970830

Abstract (en)

[origin: EP0899369A2] The fabric take-off roller assembly, for a flatbed knitter, is in sections (16) keyed together at the end sides (21,22) by rim gears (38) facing each other. A toothed wheel (15), at a support carrier (17), keys them together. The linkage mounting, for the axially adjacent roller sections (16), is through the teeth of the toothed wheel (15) and/or the rim gears (38) of the roller sections which are curved across the periphery and cambered on a longitudinal section. The toothed wheel unit (15) has two neighboring cogwheels (23,24) keyed together, of the same dia., with the support carrier (17) between them. Their teeth have an identical curvature and camber. The two cogwheels (23,24) have complementary lugs at their axial ends, to lock together, and they are clamped together axially. A radial roller bearing is at the support carrier (17), between the roller sections (16), where the inner race of the bearing is clamped between the two cogwheels (23,24), and the outer race is keyed to the support carrier (17). The support carrier (17) swings on a rigid longitudinal axis (18) along the length of the take-off roller assembly (11), parallel to it, which has mountings at intervals for the support carriers (17). The mountings are recesses for locking disks (34). The support carriers (17) are flat units which are inserted into the whole gap between adjacent roller sections (16). The end of the support carrier (17) has a deflecting projection (67), away from the axis mounting (18), and a lateral covering web member (68) at its outer edge between the mounting and the facing counter roller. Each support carrier (17) has an individual and adjustable sleeve with a scale as a tensioner, to apply a force in the swing direction, and has a cam (61) to take the pressure. The end of the support carrier (17), over the roller section (16), has a projection (66) to limit the swing movement.

IPC 1-7

D04B 15/90

IPC 8 full level

D04B 15/88 (2006.01); **D04B 15/90** (2006.01)

CPC (source: EP US)

D04B 15/90 (2013.01 - EP US)

Citation (search report)

- [DA] DE 4242969 A1 19940623 - STOLL & CO H [DE]
- [A] US 2131692 A 19380927 - SHUTE CHARLES W
- [A] DE 2110079 A1 19720914

Cited by

CN111270405A; CN105220345A; US2014238081A1; US8899079B2; CN104278425A; CN105568538A; US9139938B2

Designated contracting state (EPC)

AT BE CH CY DE DK ES FI FR GB GR IE IT LI LU MC NL PT SE

DOCDB simple family (publication)

EP 0899369 A2 19990303; EP 0899369 A3 20000301; EP 0899369 B1 20030409; DE 19738013 A1 19990304; DE 59807814 D1 20030515; ES 2194258 T3 20031116; JP 4120729 B2 20080716; JP H11181658 A 19990706; US 5960646 A 19991005

DOCDB simple family (application)

EP 98113354 A 19980717; DE 19738013 A 19970830; DE 59807814 T 19980717; ES 98113354 T 19980717; JP 28187398 A 19980828; US 14418098 A 19980831