

Title (en)

WEFT KNITTING MACHINE, AND ITS FEEDING METHOD

Title (de)

FLACHSTRICKMASCHINE UND FADENFÜHRUNGSVERFAHREN

Title (fr)

MÉTIER À MAILLES CUEILLIES ET SON PROCÉDÉ D'ALIMENTATION

Publication

EP 2206815 A4 20121219 (EN)

Application

EP 08829712 A 20080905

Priority

- JP 2008002464 W 20080905
- JP 2007233449 A 20070907

Abstract (en)

[origin: EP2206815A1] The invention provides a flatbed knitting machine that enables proper feeding of a knitting yarn without moving vertically a yarn feeder port as well as a method for properly feeding the yarn. A height of a yarn feeder port 10 is held high to avoid interference with knitting needles 12 that advance to the needle bed gap even when the yarn feeders 10 of a plurality of tracks intersect, and to allow a knitting yarn 11 to be caught on a hook of the knitting needle 12. As shown in Fig. 1(a), when a knitting yarn is properly fed from a feeder port 9 of a yarn feeding position 9a that advances by a lead "X0" only to a knitting needle at a yarn catching position 4a, the yarn fed from the yarn feeder port 10 located at the position only "y" higher from the yarn feeder port 9 can be subject to the equivalent yarn catching conditions. Even if the knitting yarn 11 from the feeder port 10 is fed to the knitting needle 12, making the lead "X2" of the yarn feeder port 10 only "x" larger than the lead "X0" of the yarn feeder port 9 can achieve the same gradient for the knitting yarn 11. As shown in Fig. 1(b), adjusting leads "X1", "X2", and "X3" at the yarn feeding positions 10a, 10d, and 10s in accordance with knitting conditions of knitting needles 12a, 12d, and 12s further enables appropriate yarn feeding.

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Citation (search report)

- [A] US 5417087 A 19950523 - MARCELLO BASEGGIO [CH]
- [A] EP 0415512 A1 19910306 - IKENAGA CO LTD [JP]
- [A] US 5615562 A 19970401 - ROELL FRIEDRICH [DE]
- [AD] EP 0898002 A2 19990224 - SHIMA SEIKI MFG [JP] & JP 3044370 B
- [AD] EP 1391545 A1 20040225 - SHIMA SEIKI MFG [JP] & WO 02079556 A1 20021010 - SHIMA SEIKI MFG [JP], et al
- See references of WO 2009031322A1

Cited by

CN104746231A; US2023279587A1

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