

Title (en)

Method of and device for controlling fabric take-up in electronic pattern knitting machine

Title (de)

Verfahren und Vorrichtung zur Steuerung der Stoffaufnahme in einer elektronischen Musterstrickmaschine

Title (fr)

Procédé et dispositif de commande de rattrapage de tissu dans une machine de tricotage de motifs électronique

Publication

**EP 2546401 A1 20130116 (EN)**

Application

**EP 12175937 A 20120711**

Priority

JP 2011155075 A 20110713

Abstract (en)

The present invention provides a take-up control method and a take-up control device both for use in an electronic pattern knitting machine, which are effective to automatically perform take-up of the knitted fabric under a proper, and stabilized take-up tension even though the pattern of the knitted fabric is changed, in which by means of a take-up control unit (6), a control mode of a take-up servo motor (5) is settable to one of modes including a torque control mode, in which the take-up servo motor (5) is rotated so that a take-up tension of the knitted fabric may be constant, and a position control mode in which the take-up servo motor 5 is rotated at a certain angle of rotation relative to the rotation of the knitting unit (2), and, in the event that a change is made to a second pattern while the knitted fabric having a first pattern is being produced under the position control mode, the position control mode is automatically switched over to the torque control mode to enable a knitted fabric having the second pattern, changed under the torque control mode, to be automatically performed.

IPC 8 full level

**D04B 15/88** (2006.01)

CPC (source: EP)

**D04B 15/66** (2013.01); **D04B 15/88** (2013.01)

Citation (applicant)

JP 2010285700 A 20101224 - PRECISION FUKUHARA WORKS LTD

Citation (search report)

- [XD] EP 2261407 A1 20101215 - PRECISION FUKUHARA WORKS LTD [JP] & JP 2010285700 A 20101224 - PRECISION FUKUHARA WORKS LTD
- [A] US 5566604 A 19961022 - SPERLING WERNER [DE], et al
- [A] US 5730005 A 19980324 - CHEN WAN-YIH [TW]
- [A] US 4236390 A 19801202 - BLANK JOCHEN, et al
- [A] EP 0622486 A1 19941102 - FUKUHARA SEIKI SEISAKUSHO [JP]

Cited by

EP2918713A4; CN104178906A; CN104178905A

Designated contracting state (EPC)

AL AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HR HU IE IS IT LI LT LU LV MC MK MT NL NO PL PT RO RS SE SI SK SM TR

Designated extension state (EPC)

BA ME

DOCDB simple family (publication)

**EP 2546401 A1 20130116; EP 2546401 B1 20160309; CN 102877208 A 20130116; CN 102877208 B 20151125; JP 2013019082 A 20130131; TW 201319348 A 20130516; TW I604099 B 20171101**

DOCDB simple family (application)

**EP 12175937 A 20120711; CN 201210244618 A 20120711; JP 2011155075 A 20110713; TW 101124682 A 20120709**