

Title (en)

Method and device for controlling the yarn tension in a textile machine and use of the method

Title (de)

Verfahren und Vorrichtung zur Regelung der Fadenspannung auf einer Textilmaschine sowie Anwendung des Verfahrens

Title (fr)

Procédé et dispositif pour contrôler la tension du fil dans une machine textile et l'usage de ce procédé

Publication

**EP 1318097 B1 20100224 (DE)**

Application

**EP 02020139 A 20020909**

Priority

- EP 02020139 A 20020909
- EP 01128877 A 20011205

Abstract (en)

[origin: EP1318097A1] In a textile machine process to regulate thread tension, thread (F) is drawn (5) from a supply (2) and paid out (11) at a speed regulated by a selected parameter. The regulation process differs esp. between variations in thread tension due to periodic and random causes and employs the periodic variations as the regulating parameter. <??>The random variations are also determined and applied in the tension regulation process. Thread speed correction is applied in accordance with the current position of the thread paying-out (11) guide (12). The adaptation target value is the achievement of equal tension at those points where the thread direction of travel is reversed, and at the centre of the thread guide (12) range of movement. Also claimed is a suitable assembly in which the supply drive wheel (5) motor (4) effects speed corrections arising from periodic speed variations. The assembly further has a tension sensor (3) located at the mid-point between the thread (F) drive wheel (5) and the pay out (11) which provides correction information arising from random speed variations. The assembly has a first control stage (17) for the yarn reel (19) and thread guide (12) linked with a second control stage (18) for the supply drive wheel (5) drive (4).

IPC 8 full level

**B65H 59/38** (2006.01); **B65H 59/00** (2006.01)

CPC (source: EP)

**B65H 59/005** (2013.01); **B65H 59/384** (2013.01); **B65H 2701/31** (2013.01)

Cited by

EP2465802A3; EP1520825A1; EP1520827A1; CN108313826A; WO2021224750A1; EP3950552A1

Designated contracting state (EPC)

AT BE BG CH CY CZ DE DK EE ES FI FR GB GR IE IT LI LU MC NL PT SE SK TR

DOCDB simple family (publication)

**EP 1318097 A1 20030611; EP 1318097 B1 20100224**

DOCDB simple family (application)

**EP 02020139 A 20020909**