Title (en)

Heat dissipating system of high-speed circular knitting machine

Title (de)

Wärmeabführungsvorrichtung für eine Hochgeschwindigkeitsrundstrickmaschine

Title (fr)

Système pour la dissipation de chaleur pour un métier à tricoter circulaire à grande vitesse

Publication

EP 1749915 A1 20070207 (EN)

Application

EP 05107589 A 20050901

Priority

CN 200510088910 A 20050801

Abstract (en)

A heat dissipating system of a high-speed circular knitting machine (10) includes a super low temperature air gun (100) installed onto a circular knitting machine (10), and cold air is ejected from a cold air outlet (102) of the super low temperature air gun (100) for carrying away the high heat produced by a cylinder base (11) during a knitting process. The super low temperature air gun (100) is connected to an extension pipe (110) and extended to a gap between a cutting disc (14) and a pressing plate (17), or between saddle bases (12), or between a lower rhombus ring (15) and two saddle bases (12), or between yarn feeding nozzles (19). Cold air ejected from the cold air outlet (102) passes through the gap to the cylinder base (11) or other peripheral components such as a cam, a sinker and a knitting needle of the high-speed circular knitting machine (10) to achieve the heat dissipating effect. In addition, the super low temperature air gun (100) is installed inside a leg (18) for supporting a yarn supplying device or on its external surface or on a yarn feeding ring (20) according to the required cooling positions.

IPC 8 full level

D04B 35/30 (2006.01)

CPC (source: EP)

D04B 35/30 (2013.01)

Citation (applicant)

- US 5737942 A 19980414 - GUTSCHMIT ALAN [US]
- US 6199408 B1 20010313 - SHIBATA TAKAO [JP]

Citation (search report)

- [A] GB 2091302 A 19820728 - SULZER MORAT GMBH
- [A] GB 2239266 A 19910626 - SIPRA PATENT BETEILIGUNG [DE]

Designated contracting state (EPC)

AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HU IE IS IT LI LT LU LV MC NL PL PT RO SE SI SK TR

Designated extension state (EPC)

AL BA HR MK YU

DOCDB simple family (publication)

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