

Title (en)

MULTILAYERED SPUN YARN, HEAT-RESISTANT FABRIC OBTAINED USING SAME, AND HEAT-RESISTANT PROTECTIVE GARMENT

Title (de)

MEHRSCHECHTIGES GESPONNENES GARN, DAMIT HERGESTELLTES HITZEBESTÄNDIGES GEWEBE UND HITZEBESTÄNDIGE SCHUTZKLEIDUNG

Title (fr)

FILÉ MULTICOUCHE, TISSU RÉSISTANT À LA CHALEUR OBTENU À L'AIDE DE CELUI-CI, ET VÊTEMENT DE PROTECTION RÉSISTANT À LA CHALEUR

Publication

EP 3109351 A1 20161228 (EN)

Application

EP 16745032 A 20160216

Priority

- JP 2015055417 A 20150318
- JP 2016054388 W 20160216

Abstract (en)

A multilayer-structured spun yarn (20) of the present invention includes a core component (21) and a sheath component (22). The core component (21) includes a stretch-broken spun yarn of a para-aramid fiber. The sheath component (22) includes a polybenzimidazole fiber and a meta-aramid fiber, which are blended together. The polybenzimidazole fiber and the meta-aramid fiber have at least two different colors. The multilayer-structured spun yarn (20) appears to be different in color from the polybenzimidazole fiber and the meta-aramid fiber. A heat-resistant textile of the present invention uses the multilayer-structured spun yarn. A heat-resistant protective suit of the present invention uses the heat-resistant textile. Thus, the present invention can provide the multilayer-structured spun yarn that can facilitate color matching, improve the washing resistance, and can achieve high heat resistance and high flame retardance, and the heat-resistant textile and the heat-resistant protective suit that use the multilayer-structured spun yarn.

IPC 8 full level

D02G 3/36 (2006.01); **D02G 3/04** (2006.01)

CPC (source: EP)

D02G 3/443 (2013.01); **D10B 2331/021** (2013.01); **D10B 2331/14** (2013.01); **D10B 2401/14** (2013.01)

Cited by

CN110004542A; EP3524720A4; CN111058134A; US11248319B2; WO2021127454A1

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 3109351 A1 20161228; EP 3109351 A4 20180418; JP 2016176149 A 20161006; JP 5972420 B1 20160817; WO 2016147779 A1 20160922

DOCDB simple family (application)

EP 16745032 A 20160216; JP 2015055417 A 20150318; JP 2016054388 W 20160216