

Title (en)
CLEANING MEMBER AND CLEANING TOOL

Title (de)
REINIGUNGSELEMENT UND REINIGUNGSWERKZEUG

Title (fr)
ÉLÉMENT DE NETTOYAGE ET OUTIL DE NETTOYAGE

Publication
EP 2781181 B1 20170628 (EN)

Application
EP 12850557 A 20121113

Priority
• JP 2011249372 A 20111115
• JP 2011277985 A 20111220
• JP 2012007288 W 20121113

Abstract (en)
[origin: EP2781181A1] Provided is a cleaning member (1) comprising of at least a sheet structure (4) in which a fiber bundle (2) having a structure in which multiple fibers are bundled together are joined to a base sheet (3) and a configuration in which a support handle insertion part (6) having an insertion space part (7) which enables a support handle (27) for supporting the sheet structure to insert in a predetermined direction is formed on the sheet structure (4), wherein the base sheet (3) is formed in a tubular shape and has a space part (8) formed in the interior thereof, the sheet structure (4) joins the fiber bundle (2) to an outer peripheral surface of the base sheet (3), and the space part (8) of the base sheet (3) and the insertion space part (7) of the support handle insertion part (6) are formed apart from each other. It is possible to sufficiently capture dust and dirt with the cleaning member (1) while suppressing the problem of the efficient use of the entire fibers during cleaning and the problem of increase in manufacturing costs.

IPC 8 full level
A47L 13/16 (2006.01); **A47L 13/20** (2006.01)

CPC (source: EP US)
A47L 13/16 (2013.01 - US); **A47L 13/38** (2013.01 - EP US); **A47L 13/46** (2013.01 - EP US)

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

DOCDB simple family (publication)
EP 2781181 A1 20140924; EP 2781181 A4 20150617; EP 2781181 B1 20170628; CN 103889296 A 20140625; CN 103889296 B 20161214; JP 2013126517 A 20130627; JP 5912503 B2 20160427; TW 201336460 A 20130916; TW I536945 B 20160611; US 2014310903 A1 20141023; WO 2013073174 A1 20130523

DOCDB simple family (application)
EP 12850557 A 20121113; CN 201280051773 A 20121113; JP 2011277985 A 20111220; JP 2012007288 W 20121113; TW 101139060 A 20121023; US 201214355956 A 20121113