

Title (en)

Method and system for applying a suspension to a sheet of material

Title (de)

Verfahren und Anlage zum Aufbringen einer Suspension auf eine Materialbahn

Title (fr)

Procédé et installation destinés à l'application d'une suspension sur une bande de matériau

Publication

EP 2223748 B1 20130619 (DE)

Application

EP 10153943 A 20100218

Priority

DE 102009009862 A 20090220

Abstract (en)

[origin: EP2223748A1] The method for applying a suspension such as coating color, starch, binder, adhesive, impregnating agent or like surface coating agent onto a moving surface of a material web such as a paper web by spraying using a nozzle (1), is claimed. The spraying of the suspension takes place using water vapor or water vapor/air mixture. The water vapor/air mixture is saturated or unsaturated air. The air is used with a temperature of 25-40[deg] C for producing water vapor/air mixture. The water vapor is used with a temperature of 100-130[deg] C for producing water vapor/air mixture. The method for applying a suspension such as coating color, starch, binder, adhesive, impregnating agent or like surface coating agent onto a moving surface of a material web such as a paper web by spraying using a nozzle (1), is claimed. The spraying of the suspension takes place using water vapor or water vapor/air mixture. The water vapor/air mixture is saturated or unsaturated air. The air is used with a temperature of 25-40[deg] C for producing water vapor/air mixture. The water vapor is used with a temperature of 100-130[deg] C for producing water vapor/air mixture. The water vapor/air mixture is supplied to the nozzle at 80-110[deg] C with a pressure of 250-500 mbar. The suspension has a viscosity of 15-100 mPa.s and a solid content of 10-50. A plastic e.g. polyetheretherketone is used as material for the nozzle.

IPC 8 full level

B05B 7/00 (2006.01); **D21H 23/50** (2006.01)

CPC (source: EP)

D21H 23/50 (2013.01); **B05B 7/04** (2013.01)

Cited by

WO2018184765A1; DE102014100605A1; WO2015112436A2; US10052647B2; EP3674004A1

Designated contracting state (EPC)

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 SE SI SK SM TR

DOCDB simple family (publication)

EP 2223748 A1 20100901; **EP 2223748 B1 20130619**; DE 102009009862 A1 20100826; DE 102009009862 B4 20131010;
PL 2223748 T3 20131231

DOCDB simple family (application)

EP 10153943 A 20100218; DE 102009009862 A 20090220; PL 10153943 T 20100218