

Title (en)

Reel for winding up material in strip form

Title (de)

Haspel zum Aufwickeln von bandförmigem Material

Title (fr)

Bobineuse destinée à enrouler un matériau en forme de bande

Publication

EP 2896465 B1 20180307 (DE)

Application

EP 15150604 A 20150109

Priority

DE 102014200942 A 20140120

Abstract (en)

[origin: CN104787605A] The invention provides a reel for winding up material in strip form on a reel mandrel; the reel mandrel is driven by a driver and provided with an expansion segment containing a spool in a radial prestress manner; the expansion segment can radially move away from an axially movable reel mandrel shaft so as to enlarge a diameter the reel mandrel; the reel mandrel is divided in the axial direction and comprises a first and a second reel mandrel elements arranged on a common reel axial line; the reel mandrel element comprises opposite linking ends connected through a coupler arranged between the linking ends, wherein the linking ends can move in the axial direction facing each other; the reel mandrel element is arranged in an axially movable frame under each condition, and the frame is arranged through a first translation device; the reel mandrel element comprises a reel mandrel rod having the expansion segment; the reel mandrel is movable against the expansion segment through a second translation device arranged on the frame.

IPC 8 full level

B21C 47/30 (2006.01)

CPC (source: CN EP US)

B21C 47/30 (2013.01 - EP); **B65H 18/04** (2013.01 - CN); **B65H 75/2484** (2021.05 - CN EP US)

Citation (opposition)

Opponent : SMS group GmbH

- US 4105172 A 19780808 - PETROS ANDREW J
- US 2117640 A 19380517 - WEAN RAYMOND J, et al
- GB 925755 A 19630508 - AUGUST SCHMITZ
- JP H10137848 A 19980526 - ISHIKAWAJIMA HARIMA HEAVY IND
- DE 102008053673 A1 20090514 - FUJI IRON WORKS [JP]
- DE 3150319 A1 19830630 - OKUN DAVID [SU], et al
- DE 4335258 A1 19950420 - GRIMM HANS DR ING [DE]
- DE 2818042 A1 19791108 - SCHLOEMANN SIEMAG AG
- DE 102006038493 A1 20080221 - SMS DEMAG AG [DE]
- JP S5524713 A 19800222 - HITACHI LTD
- JP H01143716 A 19890606 - HITACHI LTD

Cited by

DE102021101531A1; WO2022156957A1; DE102021101531B4; WO2022156955A3; DE102021101530A1; WO2022156955A2; US11919733B2

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