

Title (en)

TYRE TREAD FOR A HEAVY VEHICLE WITH IMPROVED RESISTANCE TO AGGRESSIVE EFFECTS

Title (de)

REIFENLAUFFLÄCHE FÜR EIN SCHWERFAHRZEUG MIT VERBESSERTER BESTÄNDIGKEIT GEGEN AGGRESSIVE EFFEKTE

Title (fr)

BANDE DE ROULEMENT DE PNEUMATIQUE POUR UN VÉHICULE POIDS LOURD AYANT UNE RÉSISTANCE AUX AGRESSIONS AMÉLIORÉE

Publication

**EP 4251433 A1 20231004 (FR)**

Application

**EP 21823964 A 20211119**

Priority

- FR 2012247 A 20201127
- FR 2021052039 W 20211119

Abstract (en)

[origin: WO2022112689A1] The present invention relates to a tyre tread (1) for a heavy vehicle and is intended to improve its resistance to aggressive effects resulting from stones. The tread (1), in the new state, comprises at least one complex cut-out (5) comprising, according to a mean line (Lm), an alternating arrangement of external cavities (6) which open at the tread surface (2), and internal cavities (7) which do not open at the tread surface (2), two consecutive cavities, an external one (6) and internal one (7), respectively, which are connected to each other by a connection channel (8) with a non-zero length, the height (H11) of each external cavity (6) being at least equal to half of the height (H) of the complex cut-out (5), the height (H3) of each connection channel (8) being at most equal to one third of the height (H) of the complex cut-out (5).

IPC 8 full level

**B60C 11/03** (2006.01); **B60C 11/12** (2006.01)

CPC (source: EP US)

**B60C 11/0309** (2013.01 - EP); **B60C 11/0323** (2013.01 - EP US); **B60C 11/125** (2013.01 - EP US); **B60C 11/1281** (2013.01 - EP US); **B60C 11/032** (2013.01 - EP); **B60C 2011/0346** (2013.01 - EP); **B60C 2011/0355** (2013.01 - EP); **B60C 2200/06** (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

Designated extension state (EPC)

BA ME

Designated validation state (EPC)

KH MA MD TN

DOCDB simple family (publication)

**WO 2022112689 A1 20220602**; CN 116568530 A 20230808; EP 4251433 A1 20231004; FR 3116763 A1 20220603; FR 3116763 B1 20240405; US 2024092126 A1 20240321

DOCDB simple family (application)

**FR 2021052039 W 20211119**; CN 202180079462 A 20211119; EP 21823964 A 20211119; FR 2012247 A 20201127; US 202118038918 A 20211119