

Title (en)

Reinforcing member for the formation of support frames in tunnelling.

Title (de)

Bewehrungselement zur Bildung von Ausbaurahmen im Tunnelbau.

Title (fr)

Élément de renforcement pour la formation de cadres de support dans la construction de tunnels.

Publication

EP 0410335 B1 19951102 (DE)

Application

EP 90114022 A 19900721

Priority

AT 181389 A 19890727

Abstract (en)

[origin: EP0410335A2] To form support frames in tunnelling or the like, arched reinforcing members (1) are used which have at least three arched chord members (3, 4). These chord members (3, 4) are connected by means of cross members (5) to form lattice girders which are open on the wall side. To close the open side, the reinforcing member (1) comprises a closure part (8) which is curved in the longitudinal direction and has at least one arched longitudinal member (9, 14) connected by cross members (10). The closure part (8) is frictionally connected to the lattice girder (2) and for this purpose preferably has connecting elements (11, 12) which protrude from the surface of curvature and to which chord and/or cross members (3, 4, 5) of the lattice girder (2) can be secured. Furthermore, the reinforcing member (1) preferably has a reinforcing mat strip (6) which adjoins the lattice girder (2) and the free longitudinal edge area of which forms a closure part (8) for a lattice girder (2) of the adjoining reinforcing member (1).
<IMAGE>

IPC 1-7

E21D 11/12; **E21D 11/18**

IPC 8 full level

E21D 11/10 (2006.01); **E21D 11/15** (2006.01)

CPC (source: EP)

E21D 11/107 (2013.01); **E21D 11/152** (2013.01)

Cited by

CN110344856A; CN106640123A; EP1267035A1; ITMO20080240A1; CN112392505A; EP0501897A1; FR2673443A1; ES2270654A1; WO2010032117A3

Designated contracting state (EPC)

AT CH DE FR GB IT LI SE

DOCDB simple family (publication)

EP 0410335 A2 19910130; **EP 0410335 A3 19910904**; **EP 0410335 B1 19951102**; AT E129777 T1 19951115; DE 59009832 D1 19951207

DOCDB simple family (application)

EP 90114022 A 19900721; AT 90114022 T 19900721; DE 59009832 T 19900721