

Title (en)

Fire resistant steel beam coacting with concrete.

Title (de)

Mit Beton Zusammenwirkender feuerständiger Stahlträger.

Title (fr)

Poutre d'acier résistant au feu et coopérant avec du béton.

Publication

**EP 0292449 A2 19881123 (EN)**

Application

**EP 88850148 A 19880429**

Priority

SE 8701937 A 19870511

Abstract (en)

The fire resistant, pre-stressed structural flooring carrying beam of steel includes two vertical webs (2) and a bearing plate (4) along the bottom of the beam extending outside the webs (2) for bearing the floor structure, the upper side of which is above the upper side of the steel beam after finished concrete pouring. The webs (2) are those of two channels (1) fixed to the bearing plate (4) with their toes in opposing, mutual, spaced relationship. The upper flanges (5) of the channels are provided with projecting means (6, 6 min ) fixed at pre-determined mutual spacing along the beam. An open space between the channels (1) is thus provided between the toes of the channels for filling with concrete (10) when concrete is poured, such as to achieve static co-action between the steel beam and concrete via the means (6).

IPC 1-7

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IPC 8 full level

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CPC (source: EP SE)

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Cited by

EP1405961A1; KR100477189B1; EP1416101A1; CN104264899A; KR100787133B1; EP1862606A1; EP0328986A1; FR2718174A1; EP0676513A1; EP0675243A1; CN103114680A; US5560176A; AU680648B2; KR100416877B1; IT201600078034A1; DE102018212750A1; US11959278B2; DE202015104628U1; ES2681568A1; ES2732719A1; WO2004090253A1; WO9419560A1; WO9012173A1; WO9015907A1; WO9416169A1; WO2018020407A1; WO9001596A1; EP1278922A4; US2018291626A1; US10407910B2; EP3344823B1

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