

Title (en)  
STEEL ARTICLE

Title (de)  
STAHLARTIKEL

Title (fr)  
ARTICLE EN ACIER

Publication  
**EP 1366204 A1 20031203 (EN)**

Application  
**EP 02701848 A 20020305**

Priority  
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• SE 0100737 A 20010306

Abstract (en)  
[origin: WO02070769A1] A steel article consists of an alloy which contain in weight-%: 1.7 - 2.5 C; 0.1 - 2.0 Si; 0.1 - 2.0 Mn; max 0.2 N; max 0.2 S; 12 16 Cr; 2.1 - 3.5 (Mo + W/2); 5 - 8 V; max 0.1 Nb, balance essentially only iron and unavoidable impurities. The steel has a micro-structure obtainable by a manufacturing of the steel which comprises spray forming of an ingot, the micro-structure of which contains 14 -25 vol-% carbides of mainly MC-type, where M substantially consists of vanadium, of which carbides at least 80 vol-% have a substantially rounded shape and a size in the longest extension of the carbides amounting to 1 - 10  $\mu$  m, and M7C3-carbides, where M substantially consists of chromium, which carbides typically have a more elongated shape than the MC-carbides, of which MC-carbides at least 80 vol-% have a maximal extension amounting to 3-50  $\mu$  m.

IPC 1-7  
**C22C 38/36**

IPC 8 full level  
**B22D 23/00** (2006.01); **C21D 6/00** (2006.01); **C21D 9/00** (2006.01); **C22C 33/02** (2006.01); **C22C 38/00** (2006.01); **C22C 38/22** (2006.01); **C22C 38/24** (2006.01); **C22C 38/36** (2006.01); **C22C 38/38** (2006.01)

CPC (source: EP KR US)  
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