

Title (en)

Process for manufacturing a shadow mask, made from an iron-nickel alloy

Title (de)

Verfahren zur Herstellung einer Schattenmaske aus einer Eisen-Nickel Legierung

Title (fr)

Procédé de fabrication d'un masque d'ombre en alliage fer/nickel

Publication

**EP 0719873 B1 20000621 (FR)**

Application

**EP 95402753 A 19951207**

Priority

FR 9415663 A 19941227

Abstract (en)

[origin: EP0719873A1] Process for the mfr. of an iron-nickel alloy shadow mask comprises: (a) providing a metal sheet pierced with uniformly distributed hole, the metal sheet comprising an alloy comprising (in wt.-%): 35.5-37 Ni; max. 0.5 Co; max. 0.1 Cr; max. 0.1 Cu; max. 0.1 Mo; max. 0.1 V; max. 0.1 Nb; max. 0.1 Mn; 0.03-0.15 Si; max. 0.001 S; 0.0001-0.002 Ca; 0.0001-0.002 Mg; max. 0.005 Al; max. 0.01 O; max. 0.002 C; max. 0.005 N; max. 0.003 P; 0.001 H; max. 0.001 B; balance Fe plus usual impurities, the following relationships satisfied: max. S = 0.02 x Mn + 0.8 x Ca + 0.6 x Mg Cr + Cu + Mo + V + Nb + Si = max. 0.15; (b) heat treating the sheet to obtain a grain size which defined by ASTM E112-88,12.4 is greater or equal to 7 ASTM; and (c) forming the sheet to the required shape. The shadow mask is also claimed.

IPC 1-7

**C22C 38/08; C21D 8/02; H01J 9/14**

IPC 8 full level

**C21D 6/00** (2006.01); **C21D 8/02** (2006.01); **C21D 9/46** (2006.01); **C22C 38/00** (2006.01); **C22C 38/08** (2006.01); **C22C 38/54** (2006.01); **H01J 9/14** (2006.01); **H01J 29/07** (2006.01)

CPC (source: EP KR US)

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Cited by

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**EP 0719873 A1 19960703; EP 0719873 B1 20000621**; CN 1050639 C 20000322; CN 1133896 A 19961023; DE 69517577 D1 20000727; DE 69517577 T2 20010308; DK 0719873 T3 20001023; FR 2728724 A1 19960628; FR 2728724 B1 19970124; JP 2007231423 A 20070913; JP H08333638 A 19961217; KR 100379871 B1 20030619; KR 960026015 A 19960720; PL 186742 B1 20040227; PL 312029 A1 19960708; US 5643697 A 19970701

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