

Title (en)
METHOD FOR CONTINUOUSLY CASTING FERRITIC STAINLESS STEEL STRIPS FREE OF MICROCRACKS

Title (de)
VERFAHREN ZUM STRANGGIESSEN ZWISCHEN ZYLINDERN VON FERRITISCHEN ROSTFREIEN STAHLBÄNDERN OHNE MIKRORISSE

Title (fr)
PROCEDE DE COULEE CONTINUE ENTRE CYLINDRES DE BANDES D'ACIER INOXYDABLE FERRITIQUE EXEMPTES DE MICROCRISQUES

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Application
EP 00915238 A 20000329

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Abstract (en)
[origin: US6622779B1] The invention concerns a method for continuously casting a ferritic stainless steep strip with thickness not more than 10 mm directly from liquid metal between two cooled rolls with horizontal axes and driven in rotation, characterized in that: the liquid metal composition in weight percentages is as follows: % C+% N<=0.12; % Mn<=1; % P<=0.4; % Si<=1; % Mo<=2.5; % Cr between 11 and 19; A1<=1%; % Ti+%Nb +% Zr<=1; the rest being iron and the impurities resulting from preparation; the Upsilp index of the liquid metal ranges between 35% and 60%, Upsilp being defined by the formula: $\gamma_{\text{map}} = 420\% \text{ C} + 470\% \text{ N} + 23\% \text{ Ni} + 9\% \text{ Cu} + 7\% \text{ Mn} + 11.5\% \text{ Cr} + 11.5\% \text{ Si} + 12\% \text{ Mo} + 23\% \text{ V} + 47\% \text{ Nb} + 49\% \text{ Ti} + 52\% \text{ A1} + 189$; the surface roughness of said rolls being more than 5 μm ; in the proximity of the meniscus metal liquid present between the rolls an inerting gas is used consisting of at least 60% by volume of a gas soluble in steel.

IPC 1-7
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