

Title (en)  
ROLLING DEVICE

Title (de)  
WALZVORRICHTUNG

Title (fr)  
DISPOSITIF DE LAMINAGE

Publication  
**EP 1114681 B1 20041215 (EN)**

Application  
**EP 99910749 A 19990329**

Priority  
• JP 9901596 W 19990329  
• JP 8536998 A 19980331

Abstract (en)  
[origin: EP1114681A1] A work roll for use in rolling apparatus for producing from a metal blank sheet articles having a deformed cross section and comprising, for example, a plate portion, and a plurality of upright walls formed on one surface of the plate portion integrally therewith and arranged as spaced apart from one another, such as flat heat exchange tube component members, heat sinks and lead frames. The work roll assures more simplified production work and provides surface finishes with higher accuracy than conventionally. The work roll comprises different kinds of disks having different diameters and arranged alternately on an axis into juxtaposed layers as secured to one another. Large disks 20A, 20B, are arranged at respective portions not forming the upright walls, and small disks 21A, 21B smaller than the large disks 20A, 20B in radius by an amount corresponding to the height of the upright walls are arranged at respective portions for forming the upright walls. Each of the disks 20A, 20B, 21A, 21B has an outer peripheral surface serving as a working surface. <IMAGE>

IPC 1-7  
**B21B 27/00**; **B21B 13/00**

IPC 8 full level  
**B21B 13/00** (2006.01); **B21B 27/00** (2006.01); **B21B 1/22** (2006.01); **B21B 3/00** (2006.01); **B21B 27/02** (2006.01)

CPC (source: EP US)  
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Cited by  
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**EP 1114681 A1 20010711**; **EP 1114681 A4 20030611**; **EP 1114681 B1 20041215**; AT E284764 T1 20050115; CA 2326331 A1 19991007;  
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