

Title (en)
Process for upgrading low-quality wood.

Title (de)
Verfahren zur Verbesserung von Holz niedriger Qualität.

Title (fr)
Procédé de valorisation de bois de basse qualité.

Publication
EP 0623433 A1 19941109

Application
EP 94201159 A 19940427

Priority
EP 93201237 A 19930429

Abstract (en)
A process for upgrading low-quality wood to high-quality wood, comprising: a) a softening stage, wherein one or more sections of low-quality wood are heated to a temperature in the range of from 160 to 240 DEG C in the presence of an aqueous medium and at a pressure which is at least the equilibrium vapour pressure of said aqueous medium at the operating temperature, thereby at least partially hydrolysing the hemicellulose and disproportionating the lignin present in said wood, b) a dewatering stage, and c) a curing stage, characterised in that the softening stage is conducted in the presence of an aqueous pH buffer, having a pH in the range of from 3.5 to 8.

IPC 1-7
B27K 5/06; **B27N 1/00**

IPC 8 full level
B27K 5/06 (2006.01); **B27N 1/00** (2006.01)

CPC (source: EP)
B27K 5/001 (2013.01); **B27K 5/06** (2013.01); **B27N 1/00** (2013.01)

Citation (search report)
• [DA] EP 0373725 A2 19900620 - SHELL INT RESEARCH [NL]
• [A] EP 0197674 A1 19861015 - FAVOT PETER

Cited by
US8465845B2; EP2476526A1; CN104960052A; CN106272815A; CN103753661A; CN105946068A; FR2751580A1; US5901463A; NL2000405C2; US2010143739A1; EP2707184A4; DE102009047137A1; WO2008079000A1; WO9804393A1; DE102011104025A1; DE102015013450A1; JP2010513085A

Designated contracting state (EPC)
AT BE CH DE DK ES FR GB IT LI NL SE

DOCDB simple family (publication)
EP 0623433 A1 19941109; **EP 0623433 B1 19960828**; AT E141851 T1 19960915; DE 69400417 D1 19961002; DE 69400417 T2 19970213; DK 0623433 T3 19960916; ES 2091087 T3 19961016

DOCDB simple family (application)
EP 94201159 A 19940427; AT 94201159 T 19940427; DE 69400417 T 19940427; DK 94201159 T 19940427; ES 94201159 T 19940427