PULPING ROTORS

Publication

EP 0124431 B1 19870211 (FR)

Application

EP 84400817 A 19840420

Priority

FR 8306636 A 19830422

Abstract (en)

[origin: ES287335U] The invention relates to a primary pulper turbine for processing recycled paper, of the type having the general shape of an helix. This turbine is formed of a shaft (2) carrying at least two helical disks (3, 4) coaxial to the shaft (2) and having a small pitch. These disks extend over at most 360 DEG and are spaced from each other along the shaft (2) by a distance of at least 1.5 times the helical pitch of a disk. The turbine carries on its base a set of radially extending fins (6, 7, 8), each one of which is curved into a spiral starting from the shaft (2). Preferably, the slant of the helical disks (3, 4, 5) relative to a plane perpendicular to the shaft (2) is approximately 15 DEG , and the disks are angularly spaced from each other by a same angle approximately equal to 360 DEG divided by the number of disks, for providing a proper dynamic balance of the turbine. The turbine of the invention is designed so as to have a high separation power for fibers, and to separate contaminants, such as plastics, from the paper pulp, without breaking them up into small pieces. This design lends itself to the building of small efficient primary pulpers, the volume of which may be less than 5 m3, as well as of larger ones.

IPC 1-7

D21B 1/34

IPC 8 full level

D21B 1/32 (2006.01); D21B 1/34 (2006.01)

CPC (source: EP US)

D21B 1/347 (2013.01 - EP US)

Cited by

EP1594597A4; EP0275848A1; CN112746512A; FR2908058A1; EP0275849A1; US8444807B2; US7626881B2; WO2006122538A3

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

DOCDB simple family (publication)

EP 0124431 A1 19841107; EP 0124431 B1 19870211; AT E25468 T1 19870215; DE 3462376 D1 19870319; ES 287335 U 19851216; ES 287335 Y 19860716; FI 75002 B 19871231; FI 75002 C 19880411; FI 841587 A0 19840419; FI 841587 A 19841023; FR 2544756 A1 19841026; FR 2544756 B1 19850830; JP S6045691 A 19850312; JP S6212354 B2 19870318; US 4607802 A 19860826

DOCDB simple family (application)

EP 84400817 A 19840420; AT 84400817 T 19840420; DE 3462376 T 19840420; ES 287335 U 19840418; FI 841587 A 19840419; FR 8306636 A 19830422; JP 8035384 A 19840423; US 59909184 A 19840411