

Title (en)
APPARATUS FOR PLASTIFYING PELLETS, IN PARTICULAR PLASTICS PELLETS, AND INJECTION-MOULDING OR EXTRUSION SYSTEM
EQUIPPED WITH THIS APPARATUS

Title (de)
VORRICHTUNG ZUM PLASTIFIZIEREN EINES GRANULATS, INSBESONDERE EINES KUNSTSTOFFGRANULATS, SOWIE MIT EINER
SOLCHEN VORRICHTUNG AUSGESTATTETE SPRITZGIESS- ODER EXTRUSIONSANLAGE

Title (fr)
DISPOSITIF DE PLASTIFICATION D'UN GRANULE ET EN PARTICULIER D'UN GRANULE DE MATIERE SYNTHETIQUE, ET INSTALLATION
DE MOULAGE PAR INJECTION OU D'EXTRUSION EQUIPEE D'UN TEL DISPOSITIF

Publication
EP 1993806 A1 20081126 (DE)

Application
EP 07703985 A 20070118

Priority
• EP 2007050490 W 20070118
• DE 102006010060 A 20060304

Abstract (en)
[origin: WO2007098992A1] An apparatus is described for plastifying pellets, in particular plastics pellets. A feature of the invention is a plastifying cylinder (2) which can receive a rotary drive and which has at least one fillet (6) substantially in the shape of a screw thread on the inside of the plastifying cylinder (2), and a mandrel (7) arranged in the interior of the plastifying cylinder (2) and surrounded by the fillet (6), where at least one channel (11) is formed in the cylinder for conveying of material. The "screw channel"; and "rotation"; functions are thus transferred to the exterior component, the plastifying cylinder. The invention further relates to an injection-moulding or extrusion apparatus with this plastifying apparatus and with a mould (12), where the frontal end of the plastifying cylinder (2) has been shaped as a cylindrical die (15) and the mould (12) has a sprue bush (13) with a cylindrical cutout (14), in which the die (15) of the plastifying cylinder (2) has been mounted rotatably, for example on a melt film formed by leakage flow in the manner of a hydrostatic bearing or by suitable radial and/or axial bearings (17).

IPC 8 full level
B29C 45/46 (2006.01); **B29C 45/62** (2006.01); **B29C 48/51** (2019.01); **B29C 48/515** (2019.01)

CPC (source: EP KR US)
B29C 45/46 (2013.01 - EP KR); **B29C 45/62** (2013.01 - EP US); **B29C 48/2522** (2019.02 - EP US); **B29C 48/36** (2019.02 - KR);
B29C 48/361 (2019.02 - EP US); **B29C 48/395** (2019.02 - EP US); **B29C 48/445** (2019.02 - EP US); **B29C 48/45** (2019.02 - EP US);
B29C 48/51 (2019.02 - EP US); **B29C 48/68** (2019.02 - EP US); **B29C 48/687** (2019.02 - EP US); **B29C 48/03** (2019.02 - EP US);
B29C 48/515 (2019.02 - EP US); **B29C 2045/0094** (2013.01 - EP)

Designated contracting state (EPC)
AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HU IE IS IT LI LT LU LV MC NL PL PT RO SE SI SK TR

DOCDB simple family (publication)
DE 102006010060 A1 20070906; CN 101394985 A 20090325; EP 1993806 A1 20081126; KR 20090007311 A 20090116;
WO 2007098992 A1 20070907

DOCDB simple family (application)
DE 102006010060 A 20060304; CN 200780007719 A 20070118; EP 07703985 A 20070118; EP 2007050490 W 20070118;
KR 20087024414 A 20081006