Title (en)

METHOD AND DEVICE FOR PRESSURE SLIP CASTING

Title (de

VERFAHREN UND VORRICHTUNG ZUM SCHLICKERGIESSEN UNTER DRUCKEINWIRKUNG

Title (fr)

PROCEDE ET DISPOSITIF DE COULEE EN BARBOTINE SOUS PRESSION

Publication

EP 1399304 B1 20080924 (DE)

Application

EP 02747420 A 20020620

Priority

- DE 10130186 A 20010622
- EP 0206863 W 20020620

Abstract (en)

[origin: DE10130186A1] The invention relates to a method for pressure slip casting for producing ceramic products, especially hollow ceramic products, as well as to a device suitable for use in said method. The inventive method is characterized by filling slip in a mold cavity formed by a mold and subjecting it to an excess pressure to build the body of the ceramic product. Once the mold cavity is filled with slip, an inflatable hollow body element from non-porous yet flexible material is introduced into the slip and immersed. Said hollow body element is then inflated like a balloon by the effect of a fluid pressure exercised in the interior of the hollow body element, thereby subjecting the slip in the closed mold to pressure. The inventive device used for pressure slip casting for producing ceramic products, especially hollow ceramic products, is characterized by a hollow body element from non-porous yet flexible material that can be inflated like a balloon by the effect of a fluid pressure exercised in the interior thereof. Said hollow body element, in the fluid pressureless state, can be immersed in the mold cavity and the slip contained therein, and it can be removed in a deflated state of the hollow body element once the body of the ceramic product is formed.

IPC 8 full level

B28B 1/44 (2006.01); B28B 1/26 (2006.01); B28B 3/00 (2006.01); B28B 7/32 (2006.01)

CPC (source: EP)

B28B 1/265 (2013.01); B28B 3/003 (2013.01)

Cited by

DE102020100414A1; CN106426514A; WO2011061593A1; US9126264B2; EP3851262A1

Designated contracting state (EPC)

DE FR GB IT

DOCDB simple family (publication)

**DE 10130186 A1 20030102**; DE 50212808 D1 20081106; EP 1399304 A1 20040324; EP 1399304 B1 20080924; WO 03000476 A1 20030103

DOCDB simple family (application)

**DE 10130186 A 20010622**; DE 50212808 T 20020620; EP 0206863 W 20020620; EP 02747420 A 20020620