

Title (en)

RAPID PROTOTYPE THREE-DIMENSIONAL STEREOLITHOGRAPHY.

Title (de)

DREIDIMENSIONALE STEREOLITHOGRAPHY ZUM SCHNELLEN HERSTELLEN VON PROTOTYPEN.

Title (fr)

STEREOLITHOGRAPHIE EN TROIS DIMENSIONS ET A PROTOTYPE RAPIDE.

Publication

EP 0640034 A1 19950301 (EN)

Application

EP 93912254 A 19930415

Priority

- US 86948092 A 19920415
- US 9303544 W 19930415

Abstract (en)

[origin: WO9320993A1] Methods and apparatus are disclosed for the production of high precision large scale, micro and mini structures (24) using three-dimensional stereolithography. The objects (24) formed using these methods have minimal stress between layers and low curl distortion. The objects also have low warpage because no post-cure treatment is necessary. The methods include the use of elevated pressure, elevated temperature, or sequential polymerization of polymer precursor fluid (10), or a combination of these, in the three-dimensional stereolithographic process.

IPC 1-7

B29C 35/08

IPC 8 full level

G02F 1/35 (2006.01); **B29C 35/08** (2006.01); **B29C 67/00** (2006.01); **G02F 1/355** (2006.01); **G02F 1/361** (2006.01); **B29K 101/10** (2006.01); **B29K 105/32** (2006.01)

CPC (source: EP US)

B29C 64/129 (2017.07 - EP); **B29C 64/40** (2017.07 - EP US); **B33Y 30/00** (2014.12 - EP US); **B33Y 70/10** (2020.01 - EP US)

Designated contracting state (EPC)

AT BE CH DE DK ES FR GB GR IE IT LI LU MC NL PT SE

DOCDB simple family (publication)

WO 9320993 A1 19931028; AU 4286693 A 19931118; CA 2118021 A1 19931028; EP 0640034 A1 19950301; EP 0640034 A4 19950830; JP H07509188 A 19951012

DOCDB simple family (application)

US 9303544 W 19930415; AU 4286693 A 19930415; CA 2118021 A 19930415; EP 93912254 A 19930415; JP 51860593 A 19930415