

Title (en)

METHOD AND APPARATUS FOR ELECTRO-CATALYTICAL HYDROGENATION OF VAT DYES AND SULPHIDE DYES

Title (de)

VERFAHREN UND APPARATUR ZUR ELEKTROKATALYTISCHEN HYDRIERUNG VON KÜPEN- UND SCHWEFELFARBSTOFFEN

Title (fr)

PROCEDE ET APPAREILLAGE POUR L'HYDROGENATION ELECTROCATALYTIQUE DE COLORANTS DE CUVE ET DE COLORANTS AU SOUFRE

Publication

**EP 1458924 A1 20040922 (DE)**

Application

**EP 02782627 A 20021220**

Priority

- CH 0200718 W 20021220
- CH 23222001 A 20011220
- CH 8012002 A 20020513

Abstract (en)

[origin: WO03054286A1] The invention relates to a method for electro-catalytical hydrogenation of vat dyes and sulphide dyes in aqueous solutions, and to an apparatus for carrying out said method. The inventive method is suitable for batch operation and continuous operation. It works entirely without any reducing agents and provides substantially salt-free dye concentrations of up to 200 g/l. The dyed threads are characterised by good friction qualities and by a high weaving yield. As far as waste water is concerned, no toxic load occurs and the salt loads are much lower, thereby enabling the waste water to be recycled in a substantially less complex manner in comparison with other conventional dye systems. The invention also relates to an apparatus for carrying out said method.

IPC 1-7

**D06P 1/22; D06P 1/30; D06P 5/20**

IPC 8 full level

**D06P 1/22** (2006.01); **D06P 1/30** (2006.01); **D06P 5/20** (2006.01)

CPC (source: EP US)

**D06P 1/22** (2013.01 - EP US); **D06P 1/221** (2013.01 - EP US); **D06P 1/30** (2013.01 - EP US); **D06P 5/2016** (2013.01 - EP US)

Citation (search report)

See references of WO 03054286A1

Designated contracting state (EPC)

AT BE BG CH CY CZ DE DK EE ES FI FR GB GR IE IT LI LU MC NL PT SE SI SK TR

DOCDB simple family (publication)

**WO 03054286 A1 20030703**; AU 2002347126 A1 20030709; EP 1458924 A1 20040922; US 2005121336 A1 20050609

DOCDB simple family (application)

**CH 0200718 W 20021220**; AU 2002347126 A 20021220; EP 02782627 A 20021220; US 49977005 A 20050119