

Title (en)

FLUORESCENT LIGHT MICROSCOPIC MEASUREMENT OF A SAMPLE USING RED-SHIFTED STOKES LINES

Title (de)

FLUORESZENZLICHTMIKROSKOPISCHES MESSEN EINER PROBE MIT ROTVERSCHOBENEN STOKES-LINIEN

Title (fr)

MESURE EN MICROSCOPIE À FLUORESCENCE D'UN ÉCHANTILLON AVEC DES LIGNES DE STOKES DÉCALÉES VERS LE ROUGE

Publication

**EP 2195612 A2 20100616 (DE)**

Application

**EP 08837241 A 20081001**

Priority

- EP 2008063171 W 20081001
- DE 102007048135 A 20071005

Abstract (en)

[origin: WO2009047189A2] According to the invention, fluorescent light microscopic measurement of a sample (2) is carried out by converting a fluorescent dye in the sample (2) from one state to another state using light (8) of a given wavelength, wherein light (10) of a different wavelength is injected at such an intensity into an optic fibre (13) selected such that Raman scattering is stimulated in said optic fibre (13) to such an extent that a light spectrum emitted from the optic fibre (13) has at least one red-shifted Stokes line (19 to 28) in addition to the injected wavelength, the half peak height width of which is less than half the separation from the adjacent blue-direction line (18 to 28) of the light spectrum (17) and one wavelength is selected from one of the red-shifted Stokes lines (19 to 28) and fluorescent light (6) from the sample (2) is locally measured.

IPC 8 full level

**G01N 21/64** (2006.01); **G01N 21/65** (2006.01); **G02B 21/16** (2006.01); **H01S 3/30** (2006.01)

CPC (source: EP US)

**G01N 21/6458** (2013.01 - EP US); **G01N 21/65** (2013.01 - EP US); **G02B 21/16** (2013.01 - EP US); **G01N 2021/655** (2013.01 - EP US); **H01S 3/302** (2013.01 - EP US)

Citation (search report)

See references of WO 2009047189A2

Designated contracting state (EPC)

AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HR HU IE IS IT LI LT LU LV MC MT NL NO PL PT RO SE SI SK TR

Designated extension state (EPC)

AL BA MK RS

DOCDB simple family (publication)

**DE 102007048135 A1 20090416**; **DE 102007048135 B4 20120216**; EP 2195612 A2 20100616; JP 2011503525 A 20110127; US 2010187438 A1 20100729; US 8039815 B2 20111018; WO 2009047189 A2 20090416; WO 2009047189 A3 20090903

DOCDB simple family (application)

**DE 102007048135 A 20071005**; EP 08837241 A 20081001; EP 2008063171 W 20081001; JP 2010527448 A 20081001; US 75334910 A 20100402