

Title (en)

LAUNDRY DETERGENT COMPOSITION

Title (de)

WÄSCHEWASCHMITTELZUSAMMENSETZUNG

Title (fr)

COMPOSITION DE DÉTERGENT POUR LE LINGE

Publication

**EP 3559189 A4 20200520 (EN)**

Application

**EP 17885223 A 20171219**

Priority

- EP 16206451 A 20161222
- EP 16206461 A 20161222
- EP 16206477 A 20161222
- EP 16206480 A 20161222
- EP 16206487 A 20161222
- EP 16206490 A 20161222
- EP 16206498 A 20161222
- EP 16206503 A 20161222
- EP 17172999 A 20170526
- EP 17173000 A 20170526
- EP 17173001 A 20170526
- EP 17173002 A 20170526
- EP 17173004 A 20170526
- EP 17173005 A 20170526
- EP 17173006 A 20170526
- EP 17173007 A 20170526
- EP 17173087 A 20170526
- CN 2017117072 W 20171219

Abstract (en)

[origin: WO2018113643A1] A solid laundry detergent composition comprises: (a) from 80wt% to 99.9wt% first particle comprising:(i) from 20wt% to 39wt% detergents surfactant;(ii) from 10wt% to 40wt% inorganic salts selected from sodium carbonate, sodium sesquicarbonate, sodium bicarbonate and any mixtures thereof; and (iii) optionally, from 10wt% to 40wt% citric acid and/or salts thereof, (b) from 0.1wt% to 20wt% second particle, wherein the second particle comprises from 0.05wt% to 5wt% active enzyme protein, wherein the first particle in the form of a coated laundry detergent particle that is curved and the second particle in the form of an enzyme laundry detergent particle both has perpendicular dimensions x, y and z, wherein x is from 0.5mm to 2.0mm, y is from 2.0mm to 8.0mm, and z is from 2.0mm to 8.0mm, optionally, wherein at 1wt% dilution in de-ionised water at 20°C, the composition has a pH in the range of from 7.6 to 10.0 and a reserve alkalinity to pH 7.5 of greater than 3.0.

IPC 8 full level

**C11D 17/00** (2006.01); **C11D 3/10** (2006.01); **C11D 3/386** (2006.01)

CPC (source: EP)

**C11D 3/10** (2013.01); **C11D 3/2086** (2013.01); **C11D 3/38609** (2013.01); **C11D 17/06** (2013.01)

Citation (search report)

- [I] WO 2013139702 A1 20130926 - UNILEVER PLC [GB], et al
- [A] WO 2015158723 A1 20151022 - NOVOZYMES AS [DK]
- [A] WO 2016041681 A1 20160324 - BASF SE [DE]
- [A] WO 2015189371 A1 20151217 - NOVOZYMES AS [DK]
- [A] WO 2016102356 A1 20160630 - NOVOZYMES AS [DK]
- [A] WO 2016041679 A1 20160324 - UNILEVER PLC [GB], et al
- [A] WO 2016180552 A1 20161117 - UNILEVER PLC [GB], et al
- [A] WO 2014177709 A1 20141106 - NOVOZYMES AS [DK]
- See references of WO 2018113643A1

Designated contracting state (EPC)

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

DOCDB simple family (publication)

**WO 2018113643 A1 20180628**; EP 3559189 A1 20191030; EP 3559189 A4 20200520

DOCDB simple family (application)

**CN 2017117072 W 20171219**; EP 17885223 A 20171219