

Title (en)

INTERCALATED BLEACH COMPOSITIONS, RELATED METHODS OF MANUFACTURE AND USE

Title (de)

INTERKALIERTE BLEICHMITTELZUSAMMENSETZUNGEN, ZUGEHÖRIGE VERFAHREN ZUR HERSTELLUNG UND VERWENDUNG

Title (fr)

COMPOSITIONS DE PRODUIT DE BLANCHIMENT INTERCALÉ ET PROCÉDÉS DE FABRICATION ET D'UTILISATION S'Y RAPPORTANT

Publication

EP 3055398 A4 20170607 (EN)

Application

EP 13895310 A 20131009

Priority

US 2013064163 W 20131009

Abstract (en)

[origin: WO2015053772A1] The invention relates to compositions, methods of use, and methods of manufacture for an intercalated bleach compound and compositions thereof. The intercalated bleach compound has the formula $M_x(OCI)_y(O)_m(OH)_n$ where M is an alkaline earth metal such as magnesium, calcium or mixture thereof. The values of x and y independently equal any number greater than or equal to 1 (e.g., 1, 2, 3, 4, etc.), and m and n independently equal any number greater than or equal to 0 (e.g., 0, 1, 2, 3, 4, etc.), but m and n are not both 0. In addition, the molar ratio of the alkaline earth metal (e.g., magnesium or calcium) to hypochlorite is at least 3: 1. In other words, $x \geq 3y$. The compounds exhibit excellent stability, little or no chlorine bleach odor, exhibit excellent pH buffering characteristics, and less reactivity with organic materials as compared to alternative chlorine bleach products.

IPC 8 full level

C11D 3/395 (2006.01); **C11D 7/18** (2006.01)

CPC (source: EP KR)

C11D 3/042 (2013.01 - KR); **C11D 3/1213** (2013.01 - KR); **C11D 3/386** (2013.01 - KR); **C11D 3/3953** (2013.01 - EP KR); **C11D 3/3956** (2013.01 - EP KR); **C11D 3/40** (2013.01 - KR); **C11D 3/48** (2013.01 - KR); **C11D 3/50** (2013.01 - KR); **C11D 17/06** (2013.01 - KR)

Citation (search report)

- [A] JP H09227104 A 19970902 - KUREHA CHEMICAL IND CO LTD
- [A] US 4355014 A 19821019 - MURAKAMI TSUGIO, et al
- See references of WO 2015053772A1

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 2015053772 A1 20150416; CA 2924068 A1 20150416; CN 105555933 A 20160504; CN 105555933 B 20180914; EP 3055398 A1 20160817; EP 3055398 A4 20170607; EP 3055398 B1 20171227; HK 1223641 A1 20170804; HK 1224327 A1 20170818; KR 102046689 B1 20191119; KR 20160081901 A 20160708; MX 2016004458 A 20160621

DOCDB simple family (application)

US 2013064163 W 20131009; CA 2924068 A 20131009; CN 201380079644 A 20131009; EP 13895310 A 20131009; HK 16111977 A 20161017; HK 16112656 A 20161103; KR 20167010495 A 20131009; MX 2016004458 A 20131009