

Title (en)  
FUSION OF PEPTIDOGLYCAN HYDROLASE ENZYMES TO A PROTEIN TRANSDUCTION DOMAIN ALLOWS ERADICATION OF BOTH EXTRACELLULAR AND INTRACELLULAR GRAM POSITIVE PATHOGENS

Title (de)  
FUSION VON PEPTIDOGLYCANHYDROLASE-ENZYMEN AN EINE PROTEINTRANSDUKTIONSDOMÄNE ZUR BESEITIGUNG VON EXTRAZELLULÄREN WIE AUCH INTRAZELLULÄREN GRAMPOSITIVEN PATHOGENEN

Title (fr)  
FUSION DE PEPTIDOGLYCANE HYDROLASES À UN DOMAINE DE TRANSDUCTION DES PROTÉINES POUR ÉRADICUER À LA FOIS LES PATHOGÈNES GRAM-POSITIFS EXTRACELLULAIRES ET INTRACELLULAIRES

Publication  
**EP 2661495 A4 20140827 (EN)**

Application  
**EP 11854973 A 20110105**

Priority  
US 2011020230 W 20110105

Abstract (en)  
[origin: WO2012094004A1] Lysostaphin is a bacteriocin secreted by *S. simulans* to kill *S. aureus*, and has been shown to also be a potent antimicrobial for many antibiotic-resistant strains of *S. aureus*. By adding a -13 amino acid protein transduction domain (PTD) from the HIV-TAT protein to lysostaphin to form lysostaphin-PTD, both extracellular and intracellular forms of *S. aureus* and MRSA are killed in all (multiple) cell types examined.

IPC 8 full level  
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CPC (source: EP)  
**C12N 9/52** (2013.01); **C12Y 304/13** (2013.01); **C12Y 304/24075** (2013.01); **A61K 38/00** (2013.01); **C07K 2319/10** (2013.01)

Citation (search report)  
• [XI] BORYSOWSKI JAN ET AL: "Fusion to cell-penetrating peptides will enable lytic enzymes to kill intracellular bacteria", MEDICAL HYPOTHESES, EDEN PRESS, PENRITH, US, vol. 74, no. 1, 4 August 2009 (2009-08-04), pages 164 - 166, XP002587106, ISSN: 0306-9877, DOI: 10.1016/J.MEHY.2009.07.006  
• See references of WO 2012094004A1

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

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