

Title (en)
METHOD FOR SYNTHESIZING PEPTIDES

Title (de)
VERFAHREN ZUR SYNTHESE VON PEPTIDEN

Title (fr)
PROCEDE DE SYNTHESE DE PEPTIDES

Publication
EP 1546186 A4 20060208 (EN)

Application
EP 02765630 A 20020826

Priority
KR 0201604 W 20020826

Abstract (en)
[origin: WO2004018501A1] The present invention relates to a novel method for synthesizing peptides in solution, the method comprising: a) treating a peptide or amino acid derivative, which has an alpha-amine function blocked with a urethane group of the formula $R<1>-SO_2-CH_2CH_2-O-CO-$, wherein $R<1>$ is aryl, with an excess of an aliphatic secondary amine in an organic solvent to provide the release of the free alpha-amine function of said amino acid or peptide derivative and the formation of a tertiary amine adduct between said secondary amine and the liberated vinyl compound of the formula $R<1>-SO_2-CH_2=CH_2$; b) removing the solvent and the excess of said secondary amine; c) contacting thus formed mixture of the Nalpha-deprotected amino acid or peptide derivative and said tertiary amine adduct with subsequent peptide or amino acid derivative Nalpha-protected with the above indicated or another urethane group under conditions providing the formation of a peptide bond between the free alpha-amine function of the Nalpha-deprotected amino acid or peptide derivative and an alpha-carboxylic function of the subsequent Nalpha-protected peptide or amino acid derivative; d) separating the newly formed peptide from the reaction mixture; e) repeating procedures as set forth above until the desired polypeptide is obtained.

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- [Y] SABIROV A N ET AL: "[2-(4-Chlorophenyl)sulfonylethoxycarbonyl (Cps) amino-protecting group for the synthesis of peptides in a solution. Synthesis of [Leu]enkephalin and its [D-ala2]analog]", BIOORGANICHESKAIA KHIMIJA. JUN 1987, vol. 13, no. 6, June 1987 (1987-06-01), pages 754 - 759, XP008057221, ISSN: 0132-3423
- [YD] SAMUKOV V V ET AL: "2-(4-NITROPHENYL)SULFONYLETHOXYCARBONYL (NSC) GROUP AS A BASE-LABILE ALPHA-AMINO PROTECTION FOR SOLID PHASE PEPTIDE SYNTHESIS", 17 October 1994, TETRAHEDRON LETTERS, ELSEVIER, AMSTERDAM, NL, PAGE(S) 7821-7824, ISSN: 0040-4039, XP001034109
- See references of WO 2004018501A1

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