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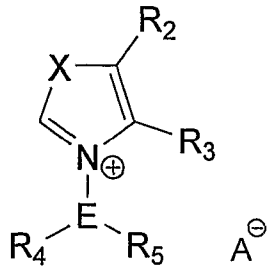
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(54) Title: COMPOSITIONS FOR TRANSFECTION OF OLIGONUCLEOTIDES ACTIVE FOR GENE SILENCING AND THEIR BIOLOGICAL AND THERAPEUTICAL APPLICATIONS



(I)

(57) Abstract: The invention relates to compositions of transfection comprising an oligonucleotide and an amphiphilic cationic molecule of formula (I) wherein, - X is N-R_1, S or O, R_1 being a C1-C4 alkyl radical or an hydroxylated C3- C6 alkyl radical, R_2 and R_3, identical or different, represent H or a C1-C4 alkyl radical, or R_2 and R_3 are linked together to form a saturated or unsaturated cycle or a heterocycle having 5 or 6 elements, E is a C1-C5 alkyl spacer, R_4 and R_5, identical or different, represent saturated or unsaturated, linear or branched, C10-C36 hydrocarbon or fluorocarbon chains, optionally comprising C3-C6 cycloalkyle, A- is a biocompatible anion. The invention relates to compositions active for oligonucleotides delivery into eukaryotic cells in culture, ex vivo or in vivo. The invention relates to compositions of transfection comprising an oligonucleotide active for RNA interference. Such compositions can be used as tools for biological studies or as drugs for therapies.

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