



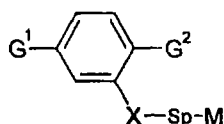
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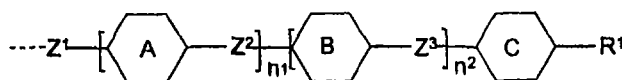


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(54) Title: LIQUID CRYSTAL COMPOUNDS



(I)



(II)

(57) Abstract

A compound of formula (I), wherein G^1 and G^2 independently represent a polymerisable mesogenic residue; X represents a group selected from $-\text{CH}_2-$, $-\text{O}-$, $-\text{CO}-$, $-\text{COO}-$, $-\text{OOC}-$, $-\text{CONR}'$, $-\text{OCOO}-$, $-\text{OCONR}'$; Sp represents a group of the formula $-(\text{CH}_2)_p-$ in which p is an integer of 1 to 18 and in which one or two non adjacent $-\text{CH}_2-$ groups are optionally replaced by $-\text{CH}=\text{CH}-$; or in which one or two $-\text{CH}_2-$ groups are optionally replaced by one or two groups selected from the group consisting of $-\text{O}-$, $-\text{CO}-$, $-\text{COO}-$, $-\text{OOC}-$, $-\text{CONR}'$, $-\text{OCOO}-$, $-\text{OCONR}'$ with the proviso that firstly the spacer group does not contain two adjacent heteroatoms and secondly when X is $-\text{CH}_2-$, p can also have a value of 0; and M represents an achiral group of formula (II) in which A and B independently represent an optionally substituted six membered isocyclic or heterocyclic group or naphthalenediyl; C is selected from the group consisting of an optionally substituted five and six membered isocyclic or heterocyclic group or naphthalenediyl; n^1 and n^2 are 0 or 1 with the proviso that firstly $1 \leq n^1 + n^2 \leq 2$ and secondly, when C is naphthalenediyl $0 \leq n^1 + n^2 \leq 2$; Z^1 is selected from the group consisting of $-\text{O}-$, $-\text{COO}-$, $-\text{OOC}-$, $-\text{CO}-$, $-\text{CONR}'$, $-\text{NR}'\text{CO}-$, $\text{OCOO}-$, $-\text{OCONR}'$, $-\text{NR}'\text{COO}-$ and a single bond; in which R' is selected from the group consisting of hydrogen, a lower achiral alkyl group and a lower achiral alkenyl group; Z^2 and Z^3 are independently selected from the group consisting of single bond, $-\text{COO}-$, $-\text{OOC}-$, $-\text{CH}_2-\text{CH}_2-$, $-\text{CH}_2\text{O}-$, $-\text{OCH}_2-$, $-\text{CH}=\text{CH}-$, $-\text{C}\equiv\text{C}-$, $-(\text{CH}_2)_4-$ and $-(\text{CH}_2)_3\text{O}-$; and R' is selected from the group consisting of $-\text{CN}$, $-\text{COR}$, $-\text{COOR}$, $-\text{OCOR}$, $-\text{CONR}'\text{R}$, $-\text{NR}'\text{COR}$, OCOOR , $-\text{OCONR}'\text{R}$, $-\text{NR}'\text{COOR}$, $-\text{F}$, $-\text{Cl}$, $-\text{CF}_3$, $-\text{OCF}_3$, $-\text{OR}$ and $-\text{R}$ in which R is selected from the group consisting of hydrogen, an achiral C_{1-18} alkyl group and an achiral C_{4-18} alkenyl group with the double bond at 3-position or higher; and R' is as defined above; with the proviso that at most one of the rings A, B and C is a naphthalenediyl group is provided as well as liquid crystalline mixtures, films and electro-optical devices comprising the compound.



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