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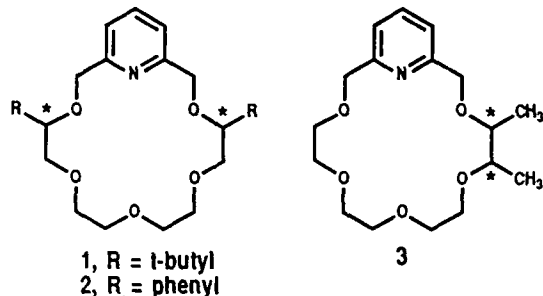
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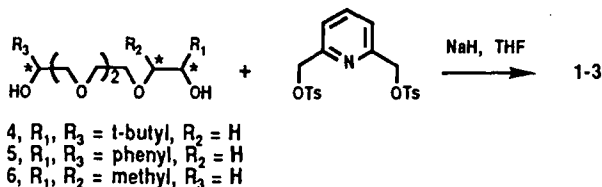
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<p>Three new chiral pyridino-18-crown-6 ligands containing either two t-butyl, two phenyl or two methyl substituents have been prepared (1-3, Figure 1). These ligands were prepared by reacting the appropriate chiral tetraethylene glycol with 2,6-pyridinedimethyl ditosylate (Scheme I) to give 1, an oil, $[\alpha]_D -15.09^\circ$ (c = 0.424, benzene); 2, mp 66-67 °C, $[\alpha]_D -128.9^\circ$ (c = 0.34, benzene); 3, an oil, $[\alpha]_D -22.45^\circ$ (c = 1.648, benzene). The starting chiral tetraethylene glycols (4-6) were prepared as shown in Scheme II. t-Butylethylene glycol needed to prepare the chiral di-t-butyltetraethylene glycol (4) was resolved through its hydrogen phthalate ester and using brucine as the resolving agent.</p>					
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Figure 1. Chiral di-t-butyl, diphenyl, and dimethylpyridino-18-crown-6



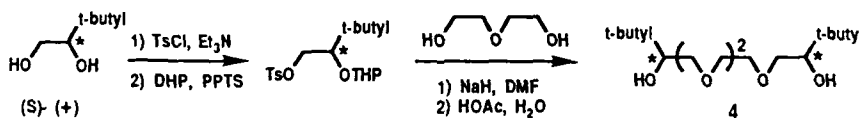
Scheme I. Preparation of chiral pyridino-crowns



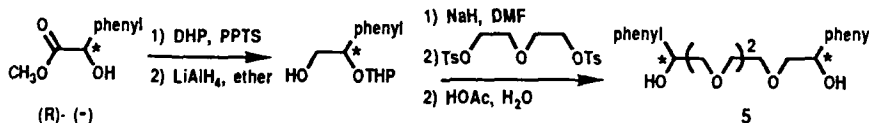
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Scheme II. Preparation of chiral tetraethylene glycol starting materials

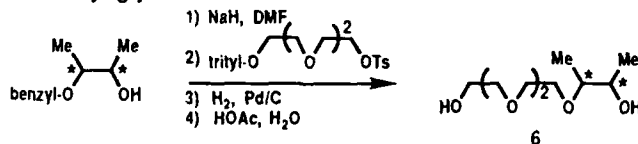
A. Di-t-butyl glycol



B. Diphenyl glycol



C. Dimethyl glycol



Complexation of the (R)- and (S)- forms of α -(1-naphthyl)ethylammonium perchlorate by chiral ligands 2 and 3 have been studied by ^1H NMR methods in CD_3OD . Ligand (R,R)-2 exhibited modest chiral recognition for the (S)- form of the salt over the (R)- form. However, ligand (R,R)-3 exhibited little or no chiral recognition for the enantiomers of the ammonium salt.

Diastereomeric Compounds, 1, 2, 3, 4, 5, 6, 7, 8, 9, 10, 11, 12, 13, 14, 15, 16, 17, 18, 19, 20, 21, 22, 23, 24, 25, 26, 27, 28, 29, 30, 31, 32, 33, 34, 35, 36, 37, 38, 39, 40, 41, 42, 43, 44, 45, 46, 47, 48, 49, 50, 51, 52, 53, 54, 55, 56, 57, 58, 59, 60, 61, 62, 63, 64, 65, 66, 67, 68, 69, 70, 71, 72, 73, 74, 75, 76, 77, 78, 79, 80, 81, 82, 83, 84, 85, 86, 87, 88, 89, 90, 91, 92, 93, 94, 95, 96, 97, 98, 99, 100