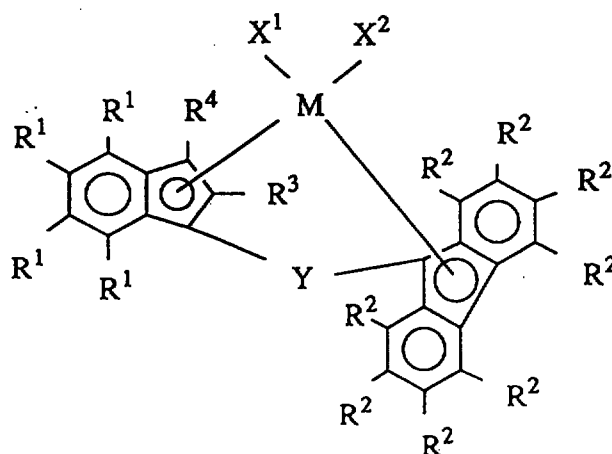




OLEFIN POLYMERIZATION CATALYST, PROCESS FOR PREPARING
OLEFIN POLYMER, AND OLEFIN POLYMER

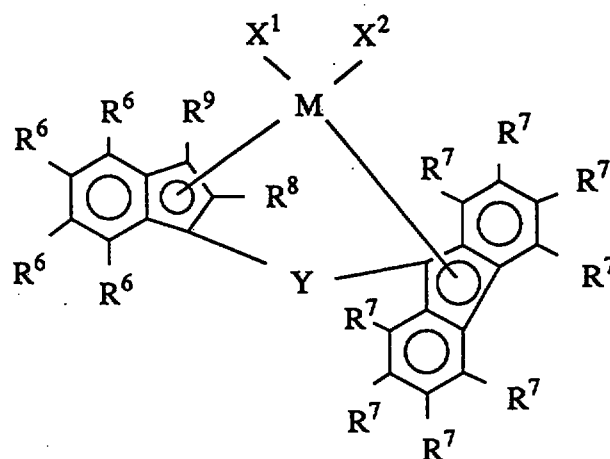
ABSTRACT

The olefin polymerization catalyst of the invention is formed from a Group IVB transition metal compound represented by the following formula (I) and an
5 organoaluminum oxy-compound or a compound which reacts with the transition metal compound to form an ion pair. In the olefin polymerization process of the invention using this catalyst or a catalyst formed from a Group IVB transition metal compound represented by the following formula (II)
10 and an organoaluminum oxy-compound or a compound which reacts with the transition metal compound to form an ion pair, an olefin (co)polymer having a high molecular weight can be obtained with high polymerization activities, and besides an olefin copolymer having a high comonomer content
15 can be obtained even if a comonomer is used in a small amount.



(I)

167



(II)

wherein, M is a transition metal of Group IVB, at least one of R^1 is an aryl group and the remainder is hydrogen or the like, R^2 is hydrogen, an alkyl group or the like, R^3 and R^4 are each hydrogen, an alkyl group or the like, R^6 is hydrogen, an alkyl group or the like, R^7 is hydrogen, an alkyl group or the like, any one of R^8 and R^9 is an alkyl group, and X^1 and X^2 are each halogen, a hydrocarbon group or the like.

FIGURE 1