

Abstract

MODIFIED CONJUGATED DIENE POLYMER, MODIFIED CONJUGATED DIENE POLYMER COMPOSITION, TIRE, AND METHOD FOR PRODUCING MODIFIED CONJUGATED DIENE POLYMER

A modified conjugated diene polymer satisfying the following conditions (I) to (IV):

(I) at least two peaks are observed in a molecular weight distribution curve obtained from measurement by gel permeation chromatography (GPC);

(II) when a peak of the highest molecular weight is defined as a peak (B), a peak of the largest peak area except for the peak (B) is defined as a peak (T) in the molecular weight distribution curve, a peak molecular weight of the peak (B) is from 500,000 to 2,500,000 and a peak molecular weight of the peak (T) is from 150,000 to 600,000;

(III) an area of the peak (T) is from 30% to 80% and a total value of an area of the peak (B) and the area of the peak (T) is 65% or more when the total area of the molecular weight distribution curve is defined as 100%; and

(IV) a proportion of a modified polymer chain(s) in a region ranging from a low-molecular-weight side to a point of 5% cumulative area is from 60% to 99% in the molecular weight distribution curve.