

Microgel-containing tread mixture for winter tyres

Abstract

- 5 The present invention relates to vulcanizable rubber mixtures comprising at least the following components:
- 10 I.) 100 parts by weight of an oil-free rubber matrix consisting of
- a) 15 to 79 parts by weight, preferably 20 to 70 parts by weight, of at least one solution SBR (S-SBR) (oil-free) having a glass transition temperature ($T_{g(S-SBR)}$) between -70°C and -10°C ,
- b) 20 to 75 parts by weight, preferably 25 to 70 parts by weight, of at least one 1,4-cis-polybutadiene (BR) (oil-free) having a glass transition temperature ($T_{g(BR)}$) between -95°C and -115°C ,
- 15 c) 1 to 37.5 parts by weight, preferably 5 to 35 parts by weight, of natural rubber (NR) (oil-free) and/or at least one synthetic polyisoprene (IR) having a glass transition temperature ($T_{g(NR)}$) between -50°C and -75°C based on the oil-free natural rubber (NR) or the oil-free, synthetic polyisoprene (IR),
- II.) at least one hydroxyl-containing microgel based on polybutadiene,
- 20 III.) at least one hydroxyl-containing, oxidic filler,
- IV.) at least one polysulphide-containing alkoxysilane,
- V.) at least one vulcanizing agent,
- VI.) optionally at least one rubber additive.