## Effect of the friction characteristics of friction pair elastomer – support foundation trailer coupling properties of automobile wheel

## © A.A. Kupreyanov

Bauman Moscow State Technical University, Moscow, 105005, Russia

The article contains the data from the literature on the dependence of traction properties of automobile wheel and  $\varphi(S)$ -chart used in the theory of anti-lock and traction control system from the speed, mode of force loading wheel, rate of change of these parameters and from the coefficient of sliding friction in the contact of the tire with road. In article it is shown that these properties depend on the tribological characteristics of the tire contact tyre with road. Experimental and analytical research of friction between the rubber tire tread, and a variety of surfaces. The author of the article proposed practical methods of solving the problem of increasing the friction and traction-coupling properties of the tyres on the asphalt surfaces (dry, wet and contaminated).

**Keywords:** tire temperature, viscoelasticity, elastomer friction, tire traction, ABS, traction control

**Kupreyanov A.A.** (b. 1940), Ph.D., Assoc. Professor of the Wheeled Vehicles Department of Bauman Moscow State Technical University. Author of more than 60 scientific publications in the field of design of wheeled vehicles. Specializes in the design and analysis of transmissions wheeled vehicles. e-mail: VlAnkup@yandex.ru