

Title (en)

Colloidal products containing boron and phosphorus, their preparation and their use as additives for lubricants.

Title (de)

Bor und Phosphor enthaltende kolloidale Produkte, ihre Herstellung und ihre Verwendung als Schmieröladditive.

Title (fr)

Produits colloïdaux renfermant du bore et du phosphore, leurs préparations et leurs utilisations comme additifs pour lubrifiants.

Publication

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Application

EP 92402594 A 19920921

Priority

FR 9112096 A 19910930

Abstract (en)

Colloidal products containing boron and phosphorus which are obtained by a process which comprises: (1) obtaining a borated superbasic alkali or alkaline-earth metal sulphonate; (2) reacting at least one phosphorus sulphide with the borated superbasic sulphonate; and (3) isolating the product obtained. According to an advantageous alternative form, 2,5-dimercapto-1,3,4-thiadiazole or one of its derivatives is added to the reaction mixture. The compounds described can be employed as antiwear and extreme-pressure additives to lubricating oils and greases. <IMAGE> <IMAGE>

Abstract (fr)

On décrit des produits colloïdaux renfermant du bore et du phosphore obtenus par un procédé qui comprend : (1) l'obtention d'un sulfonate alcalin ou alcalino-terreux surbasique boraté ; (2) la réaction sur le sulfonate surbasique boraté d'au moins un sulfure de phosphore ; et (3) la séparation du produit obtenu. Selon une variante avantageuse, on ajoute au milieu réactionnel du 2,5-dimercapto-1,3,4-thiadiazole ou un des ses dérivés. Les composés décrits sont utilisables comme additifs anti-usure et extrême-pression dans les huiles lubrifiantes et les graisses. <IMAGE> <IMAGE>

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Citation (search report)

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