

nano-ATH 첨가를 통한 엔지니어링 플라스틱의 표면개질

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Surface Reforming of Engineering Plastic for adding nano-ATH

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Abstract : Surface contamination and leakage current have caused operating problems. A flashover in a substation may result in destruction of an insulator or many others electrical equipment. Engineering plastics have good characteristic (light weight, good productivity and little of void) as compare with epoxy or porcelain insulators. Outdoor insulator must have resistance to contamination. However, they are not suited to outdoor insulator by reason of being not good hydrophobic. RTV has a good property of hydrophobic and ATH has characteristic obstructing exothermic reaction. In order to reduce the incidence of insulator flashover and damage, the silicon rubber contained nano size ATH coat on surface of engineering plastics. In this paper, it compares resistance tracking of the engineering plastic coated RTV with that of non-coated engineering plastic and ATH filled composites performed much better than non-filled composites.