

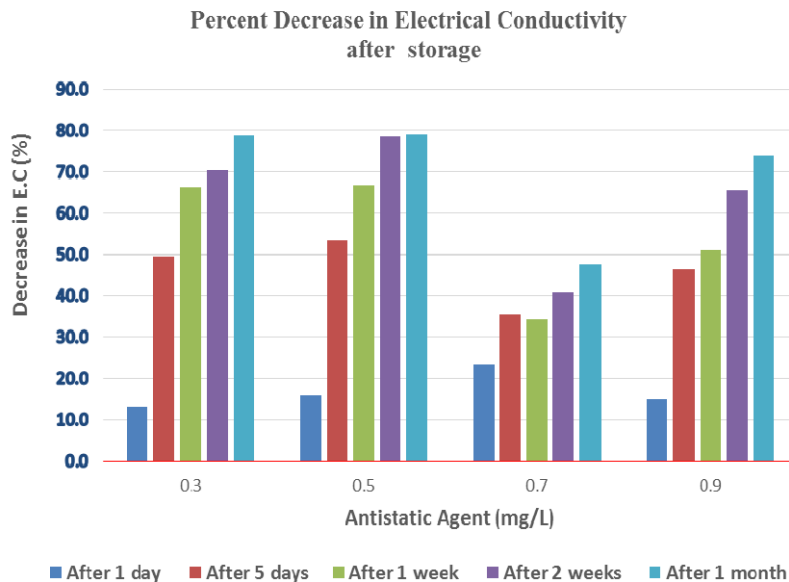
## Study on the electrical conductivity degradation of an antistatic additives doped- jet fuel over fuel storage

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Electrical conductivity is an important measure to assess the ability of static charge dissipation of a fuel. The low conductivity fuel such as straight- run fuel distillates can accumulate static electrical charges during the dispensing process and comes out in the form of a spark overtime. In order to speed up the rate of electrical charge dissipation and to reduce the static hazard, the conductivity of fuel can be increased by the addition of static dissipater additive (SDA). In this study, different amounts of Stadis 450, static dissipater additive, are doped to the refinery direct product jet fuel to increase the electrical conductivity of the fuel. The degradation of the stability of electrical conductivities of SDA-doped jet fuels has been evaluated according to ASTM D-2624. The jet fuels doped by 0.7 mg/L of SDA 450 showed the maximum stability of electrical conductivity over long storage period.



**Keywords:** Antistatic agent - doped jet fuel; Electrical conductivity, Storage period