Smog Buster

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To minimize the harmful effects of Smog the surrounding areas these experiments were conducted to form a paint which is eco-friendly in a way that it will help to absorb smog from atmosphere. Smog absorbing paint has a vast application in urban areas as it can be applied on the outside of huge buildings to make them Eat Smog. Metal oxides are extensively used today because they have this property that they can have excited electron once sunlight hits them hence help to break down other molecules, including pollutants. Utilizing this property to the best Graphene the wonder material was used with calcium oxide along with other innovative components to absorb harmful gases from atmosphere. Some graphene was taken and converted into graphene oxide. Than 1 mg/ml CaO micro particle for the dispersion purpose was added to “GO solution” making the porous material in a centrifuge machine for 15 minutes.This made the composite for CaO-GO surface.Using the following composites tests were performed. TEST 1 - Graphene + Cao + Al 2 (SO4) 3 TEST 2 - Graphene + Cao +Al 2 (SO 4) 3 + Caesin TEST 3 - Graphene + Cao +Al2(SO4)3 +beetroot TEST 4 - Graphene + Cao + Al2(SO4)3 + Neem TEST 5 - Graphene + Cao + Al2(SO4)3 +Glue TEST 6 - Graphene + Potash Alum + Al2(SO4)3 +CaO + NaCl TEST 7 - Potash Alum + CaCO3 + Al2(SO4)3 + CaO + NaCl After doing tests, in order to confirm whether it worked or not, the following testing technique were used to note the amount of gases being absorbed, namely Optical Detection, Field Detection and Effect Transistor and composite chemistry was tested using OLIS global work. All of these tests proved that these different composites were more effective, stronger and cheaper hence could be used widely all over the world.

Awards Won: