INNOVATION AND THE ENVIRONMENT

NEW CATALYST SLASHES EMISSIONS

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Johannesburg-based company is promoting a catalyst which slashes the emissions of internal-combustion engines significantly, thereby reducing their harmful effects on human health and the environment.

Fuel Effect director Andre Steyn says the new product, called Fuel-Effect, is an internationally-patented hydrocarbon-based fuel treatment which, when added to any liquid fuel – diesel or petrol – promotes the efficiency in several ways. "The product actually onens up

the structure of the fuel molecule, which ensures a more complete burn," says Steyn. Recent tests conducted by a laboratory at Fleet Africa, based at

Johannesburg International Airport, made several findings after a four-

month trial period.

A 22% reduction of carbon monoxide and carbon dioxide was recorded, nitric oxide reduced by 27%, nitrogen dioxide reduced by 30% and hydrocarbon emission was reduced by a staggering 57%.

"The reduction of hydrocarbon emissions is concrete proof of the achievable fuel savings – normally 6% to 8%," says Steyn.

The report also stated that the use of the product in indoor environments, such as warehouses or mines underground or quarries, would reduce the amount of ventilation required and be of great risk benefit to employee health.

The product is safe in terms of handling and storage. It complies with the SABS 342 standard and has several original-equipment manufacturer warranty approvals.

It is an organic fuel catalyst, made 94% from natural oil, with the base product being pharmaceutical oil, containing no metals, solvents or harmful chemicals.

"The physical composition of the product is of such a nature that it is impossible to harm any engine," says Stevn.

Fuel-Effect improves the lubricity and viscosity of the fuel, protecting injectors and valves from premature wear and failure.

This leads to prolonged and improved injector spray patterns, which results in extended efficiency of the fuel-burning process, less heat, less soot and improved allround efficiency.

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The product reduces carbon build-up in engines as a result of improved fuel combustion, reducing abrasive engine wear and extending viscosity.

The product improves cloud point by opening up the diesel wax structure, thereby reducing wax build-up in filters, which leads to improved filtration.

"The results of using fuel effectively are less heat, less carbon buildup, prolonged injector spray patterns, increased engine life and reduced emissions of dangerous gases," says Steyn.

He adds: "This product actually pays for itself – return on investment is over 230% on the fuel saving alone."

Negotiations with several large mining companies are well under way.

The product will assist in meeting the new emissions legislation. MINING WEEKLY COUPON ON PAGE 53 E88897