

Maximizing Asset Life Through Technology

# PROTECT AND EXTEND THE LIFE OF YOUR MACHINE AND FLUID

**DECON AO™** is a critical step in our mission to reduce unnecessary oil waste and production by transforming your lubes into **Fill4Life™** fluids. We've created proprietary technologies that can both replace depleted antioxidants in oil and eliminate deposits and varnish from the system.

#### **DECON AO BENEFITS**

- · Extends the life of your oil
- Transforms your oil from a consumable to an asset
- No-risk guarantee
- 100 % success rate
- Reduces carbon emissions through demand reduction
- Increases RULER™ test results

- Increases RPVOT results
- Rapid reduction of the oil's varnish potential as measured by MPC, UC and Particle Counts.
- Excellent oxidation stability and/or deposit control characteristics
- No adverse impact on the in-service oil's performance (i.e. air release, foam, demulsibility, etc.)



#### **DEPOSIT CONTROL FEATURES**

**DECON** dissolves varnish

**DECON** provides an immediate impact on system Decontamination

**DECON** protects the oil from forming varnish, providing long-term Deposit Control performance

# **ELIMINATE DEPOSITS FROM YOUR FLUID AND SYSTEM**

#### Decontamination

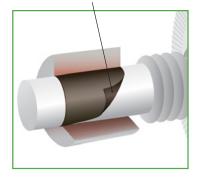
 Quickly and safely dissolves varnish from the machine internals, increasing the life and performance of the servo-valves, improving the efficiency of heat exchangers and hydrogen seals and removing bearing deposits.

#### Deposit Control

- Enhances the deposit control performance of in-service fluids.
- Long-term system protection against deposits, sludge & varnish.

DECON WORKS BY RAPIDLY DISSOLVING OIL DEGRADATION DEPOSITS



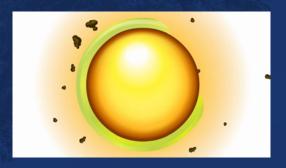




# HOW ANTIOXIDANT REPLENISHMENT WORKS

### **ANTIOXIDANT REBALANCING**

DECON AO is customized specifically for your oil and designed to rebalance your additive system. The formulation and treat rate are developed based on your original oil formulation and current condition of the in-service oil. The tailored additive components are blended into a concentrate having a similar viscosity of your in-service oil allowing DECON AO to be blended on-site with no special equipment.



Antioxidants are sacrificial and depleted

### **CUSTOM SIMULATION TESTING**

Fluitec's scientists have developed a Customized Simulation Test ensuring maximum compatibility and success prior to considering DECON AO. Simulation Testing includes running a battery of tests on your in-service oil, developing a customized formulation, blending DECON AO at the specified treat rate with your in-service oil and performing compatibility testing according to ASTM D7155.



DECON AO restores antioxidants



# **DECON AO + ESP**

# Fill4Life\*

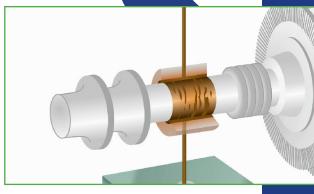
DECON AO + ESP (Electrophysical Separation Process™)

A true **Fill4Life<sup>TM</sup>** system will both replace antioxidants and remove oil degradation byproducts. Fluitec provides DECON AO and ESP technologies to extend the life of your lubricants, converting them into into assets.

# DECON AO AND ESP WORKING TOGETHER

Through oxidative and thermal stresses, the sacrificial antioxidants in an oil will deplete. The by-product of these processes causes varnish. DECON AO will replenish depleted antioxidants into the oil, however the existing varnish-causing molecules also need to be removed.

This is why Fluitec created ESP. This technology relies on the principles of chemisorption. ESP selectively removes oil degradation products that are in suspension or in solution without disturbing the fluid's additive system. For optimal performance, ESP media is fully customized for each application and is selected based on oil type and condition.



Depleted antioxidants create varnish causing by products in the oil

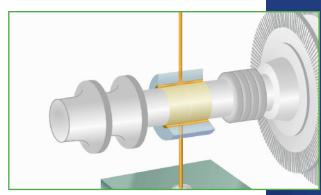


ESP removes the Varnish from the oil and DECON AO replenishes antioxidants

## **VITA ESP SYSTEMS**

Use Fluitec's VITA ESP delivery systems to remove varnish from the oil while DECON AO replenishes the antioxidants.





System cleanliness and antioxidants are restored



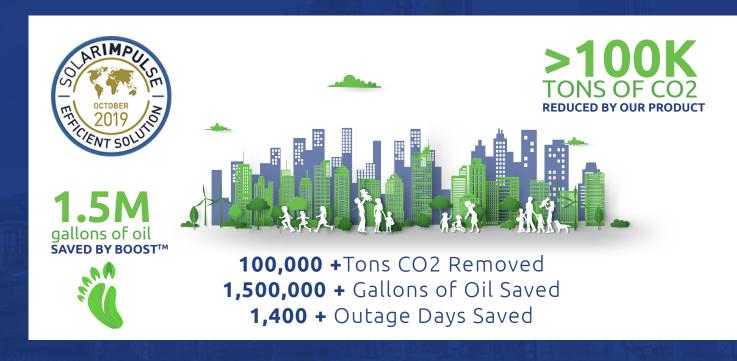
# SUSTAINABILITY AND FILL4LIFE

Fluitec delivers value to our customers by maximizing the life of their rotating equipment assets (not only of their fluids) through our

Fill4Life™ program. This program not only extends the life of their capital equipment and their fluids but also aims to support our customers' quality and maintenance programs by minimizing their overall costs and waste. The program leverages the entire Fluitec product and service portfolio.

We know that many industrial lubricant applications have the potential to be Fill4Life fluids. This is accomplished by minimizing contaminant ingression, removing oil degradation byproducts and replenishing sacrificial additive components, all while monitoring the health of the fluid.

Fluitec's oil life extension technologies have reduced the equivalent of over **100,000 tons of CO2!** Our proven technologies have been independently verified by Solar Impulse and B Corporation. In fact our products, **Boost AO™**, **DECON AO™** and **Infinity TO™** have been awarded the **"1000 Solutions Challenge"** by Solar Impulse. In this program, the 'solutions' or products, submitted by companies must meet the foundation's rigorous mission criteria of profitability, market usage and positive ecological impact.



# **ENVIRONMENTAL & FINANCIAL WINS**

#### Great news for the Planet and your CFO

For every 1 gallon of DECON AO, 50 gallons of waste oil are saved from the earth. Think about it: It took millions of years for the earth to make your oil – then a tremendous amount of time, energy and money to extract, ship, refine and formulate it. Shouldn't you do everything possible to extend the life of the oil you use, for as long as possible?

Our customers enjoy the environmental benefits of not having to dispose of waste oil and lower CO2 emissions by reduced demand of oil. Even more, they are saving money on both ends. DECON AO customers do not have to pay for waste handling fees, nor do they have to spend money on new oil. DECON AO and Fluitec's Fill4Life mission makes it a win-win proposition for both you and the planet.



# **DECON AO SPECIFICATIONS & WARRANTY**

#### **PRODUCT SPECIFICATIONS**

| SIZE        | DIMENSIONS              | WEIGHT  |
|-------------|-------------------------|---------|
| 5 gal Pail  | 13 x 13 x 16 (inches)   | 41 lbs  |
| (19 L)      | 33 x 33 x 40.7 (cm)     | 19 kg   |
| 55 gal Drum | 23 x 23 x 36 (inches)   | 462 lbs |
| (208 L)     | 58.5 x 58.5 x 91.5 (cm) | 210 kg  |

| HS CODE    | 3811.29.0000 |
|------------|--------------|
| I I S CODE | 3611.29.0000 |

| TEST                              | SPECIFICATION      |
|-----------------------------------|--------------------|
| Appearance                        | Light brown, Clear |
| Color, ASTM D1500                 | < 3, ASTM D1500    |
| Specific Gravity, ASTM D1298, 21C | 0.85 g/ml          |
| Viscosity @ 40C, ASTM D445        | 29cSt              |

#### **DECON AO WARRANTY**

Fluitec warrants that DECON AO is compatible with the existing turbine oil and will not cause any adverse performance effects to the in-service lubricating oil, provided simulation testing is performed. The addition of DECON AO, when used with qualified inservice oils, is warranted to meet the oxidative and viscometric performance requirements of OEM and International Standard Body turbine oil specifications, including:

- Alstom HTGD 90117
- · GEK 32568]
- GEK 27070
- · GEK 28143A
- · GEK 46506D

- Siemens TLV 9013 04
- · Siemens Westinghouse M spec 55125Z3
- · Solar ES 9-224
- · ASTM D4304
- British Standards Institution BS 489
- · DIN 51515



© 2021 Fluitec. All Rights Reserved. | v7-0221



This company meets the highest standards of social and environmental impact