

1. Lubricity & Wear

HERR: High Frequency Reciprocating Rig Lubricity Test (Intertek, California):

- Known as ASTM D 6079, this test measures the suitability of Ultra Low Sulfur Diesel (ULSD) fuel for use in 2006 or older diesel engines, and is known as **Sulphur Replacement Technology (SRT)**.
- Add BestLine Diesel Fuel Treatment (typically 2 to 3 oz/10 Gal) to ULSD fuel
- Reduces wear over 25% from what is deemed acceptable using D6079 high frequency reciprocating rig (HFRR) test using Micro Lubrication Technology (MLT).
- Allowable D6079 wear limit of fuel pump is: **520 µm** (micro-metre).
- Actual ULSD fuel wear test is: **534 µm (14 µm over the allowable limit)**
- See Table 1 for ULSD fuel wear tests when treated with BestLine DFT at concentrations:



Table 1: HFRR Wear Test (ASTM D6079) versus BestLine Diesel Fuel Treatment Concentration.

DFT Concentration (oz/10 Gal; ml/40 L)	Wear (µm and mg wear)	Wear Reduction from Allowable Limit (520µm)
1oz or 30ml or (1:1280)	429	17%
2oz or 60ml or (1:640)	394	25%
3oz or 90ml or (1:427)	354	31%



2. **Improve Fuel Combustion; Reduce Fuel Consumption, Cylinder Cleaning & Emissions**

Contains a Cetane enhancer to improve diesel and biodiesel combustion efficiency; increases BTU/engine power and performance, reducing the per ton-mile operating cost with most heavy vehicles.

Lubricates and cleans injectors, combustion chamber and cylinder top end, reducing wear and carbon deposits. Reduces soot emissions by approx 10% and NOx emissions by approx 3%.

3. **Diesel & Biodiesel Stabilization, Shelf Life, Fuel System Corrosion/Oxidation**

Antioxidants help mitigate moisture, ethanol, oxidation and corrosion in #2 diesel fuel lines and tanks/storage. Helps stabilize #2 diesel for 1 to 2 years and stabilize biodiesel (B5 to B20) shelf life from approximately 1 month to 3 months.

4. **Low Temperature Performance -Cold Flow Improver**

BestLine's Synthetic diesel fuel Treatment contains the latest cold flow improver chemistry that reduces the cloud point and pour point down to -40deg C with pump (#2) summer fuel. Provides added performance and protection characteristics when burning #1 winter fuel.

5. **Algaecide /Biocide Protection**

A biocide reduces algae formation from moisture in the fuel particularly in warm conditions

6. **Diesel Fuel Compatibility**

Compatible with biodiesel, summer (#2) and winter (#1) diesel grades, Marine fuels including HFO.

7. **Mixture (minimum recommended):** 2oz per 10 Gal or 60ml per 40 L (or 1:640 parts)

8. **Material Safety Data Sheet:** [MSDS/SDS Diesel Fuel Treatment 160712.pdf](#)

9. **Applications:** Agriculture, Forestry, Marine, Heavy Construction, Power Generators, Trucking, Railway

10. **Product: DIESEL FUEL TREATMENT: 16oz/473ml, 1 gal/3.78L, 5 gal/20L, 55gal/208L**