



U. S. Oil & Refining Co.

3001 Marshall Avenue, Tacoma, Washington, 98421 (253) 383-1651

Naval Distillate, F-76

Property	ASTM Method	Specifications	
		Min.	Max
Appearance, @ greater of 25°C or ambient	D 4176 ^a	Clear & Bright	
Color	D 1500 ^a		3
Acid Number, mg KOH/g	D 974 ^{a&b}		0.30
Sulfur, mass %	D 4294 ^a		0.5 ^e
Hydrogen Content, mass %	D 4808 ^a	12.5	
Trace Metals, ppm	D 3605 ^a		
Calcium			1.0
Lead			0.5
Sodium + Potassium			1.0
Vanadium			0.5
Distillation, °C	D 86		
- 10% Recovered		Report	
-50% Recovered		Report	
-90% Recovered			357
Final Boiling Point ^b			385
Residue + Loss, Volume %			3.0
Flash Point, °C	D 93	60	
Density @ 15°C, kg/m ³	D 4052 ^a		876
Viscosity, @ 40°C, mm ² /sec (cSt)	D 445	1.7	4.3
Cloud Point, °C	D 5771 ^{a&b}		-1
Pour Point, °C	D 5950 ^{a&b}		-6
Ash, mass %	D 482		0.005
Carbon Residue, (10% Bottoms), mass % ^c	D 4530 ^a		0.14
Corrosion, Copper Strip @ 100°C	D 130		1B
Storage Stability, total insolubles, mg/100ml	D 2274 ^{a&b}		1.5
Particulate, mg/liter	D 5452 ^{a&b}		10
Demulsification, @ 25°C, minutes	D 1401 ^b		10
Cetane Index ^c	D 976 ^a	43	
Red dye			Prohibited ^d

Conforms to MIL-DTL-16884L

- a. See MIL-DTL-16884L for alternate method.
- b. See MIL-DTL-16884L for method exception.
- c. See MIL-DTL-16884L for specific reporting requirements.
- d. See Solicitation & Contract for exception or alternative.
- e. Effective 2008. Until then, limit is 1.0 mass %.