EMD/TRANS ENGINE OIL MARINE & RAILROAD

[HVI BASE+ TBN 9]

Typical	<u>Properties</u>
 	

SAE Grade Engine Class Viscosity, cSt	30	40	20W-40
At 40 C	111	152	125
At 100 C	12.1	14.8	14.5
Viscosity Index	97	96	120
Flash Point, (COC) Deg F°	435	450	435
Pour Point, Deg F°(C°)	-5(-21)	0(-18)	-15(-26)
TBN, ASTM D 2896	9	9	9
Ash, %wtSulfated	1.0	1.0	1.0
Zinc Content, ppm	<10	<10	<10
Chlorine, ppm	<50	<50	<50
Gravity, API @ 60°F	28.3	27.2	29.6
Density, Ibs/gal @ 60°F	7.373	7.124	7.314

The values shown are typical of current production. Some are controlled in the manufacturing process, while others are not. All of them may vary within tolerable ranges.

Outstanding high-dispersancy with reserve alkalinity crankcase oil for railroad and marine diesel engines. Compounded from HVI Base (Paraffinic) oils. Contains detergent, dispersant, anti-wear/EP agent, antioxidant, corrosion inhibitor, and foam-suppressant additives. The additive system does NOT contain "zinc-compounded" derivatives; they are classified as zinc-free at less than 10 ppm zinc in the formulated product; they are non-chlorinated.

APPLICATIONS

Recommended for use in Electro-Motive Division of General Motors Corporation (EMD), Caterpillar, General Electric Generation IV, LMOA Generation V, VI, and other diesel engines operating on lower sulfur distillate-fuel with a sulfated ash of 1.0%. Meets API Service Classification Level "CD" and can be used in all two and four cycle, turbocharged and non-turbocharged, railroad diesel engines burning distillate type fuels where the use of a zinc-free addictive system and HVI base oils are preferred. EMD and GE Engines manufactured for railroad and marine use are frequently used in stationary power generation systems with similar crankcase lubrication requirements.