

# Bio-SynXtra™ SHP SAE 5W40 PCMO Motor Oil (Low Ash)

Biobased Passenger Car Motor Oil for Turbocharged, High-Output, and High-Mileage Engines

Bio-SynXtra™ SHP SAE 5W40 PCMO is a patented, biosynthetic motor oil engineered for high-output turbocharged and supercharged gasoline engines. Developed using Stabilized™ technology, this lubricant exceeds the performance expectations of ILSAC GF-5, API SN/SM, and GM dexos1-equivalent specifications. Designed to deliver enhanced engine protection and fuel economy, this formulation is ideal for both modern and high-mileage vehicles requiring an energy-conserving oil with superior wear resistance.

### **Benefits**

- Meets and exceeds ILSAC GF-5 and API SN/SM performance (unlicensed formula)
- Super high viscosity index (~179) improves film strength and oil stability
- Exceptional low volatility for reduced emissions and oil consumption
- Improved seal conditioning and wear protection for high-mileage vehicles
- Superior cold start performance and pumpability
- Excellent oxidative and thermal stability
- Compatible with catalytic converters
- Booster additives enhance performance in worn or high-load engines
- Inherently biodegradable and USDA BioPreferredSM listed
- Proven in extreme motorsport and endurance conditions

## **Application / New Filling**

Recommended for use in:

- High-output turbocharged and supercharged gasoline engines
- Passenger cars, light trucks, vans, and SUVs requiring SAE 5W40 PCMO
- New engines and older high-mileage vehicles needing superior wear protection
- Applications requiring GM dexos1-equivalent performance
- Environments prioritizing emission reduction and biodegradability

#### **OEM Specifications and Compatibility:**

- Meets physical property targets of SAE J300
- API SN/SM, ILSAC GF-5 compatible (unlicensed formula)
- GM dexos1 equivalent performance
- Passed base oil interchange requirements for API and ILSAC



## **Specifications and Approvals**

• Stabilized™ HOBS Technology

o U.S. Patents: 5,990,055; 6,383,992; 6,534,454

o Canada: 2,498,812; 2,538,768; 2,609,756

o Mexico: 275,334; 308,832

Trusted by:

o U.S. Coast Guard, U.S. Army, USDA, NASA, NOAA

National Parks (Cape Cod, Point Reyes, Pictured Rocks)

o Mark Thomas Racing, Volunteer Chevy, PARTA Transit

TYPICAL SPECIFICATIONS		
Viscosity @ 100°C	ASTM D-445	14
Viscosity @ 40°C	ASTM D-445	93
Viscosity Index	ASTM D-2270	179
Flash Point (COC)	ASTM D-92	225°C
Pour Point	ASTM D-97	-40°C
CCS @ -30°C, cp	ASTM-D-5293	6300
MRV-TP1 @ -30ºC, cP	ASTM-D-4684	22,000
Yield Stress, Pa		None
HTHS @ 150º C, Apparent Viscosity, cP	ASTM-D-4683	3
NOACK Volatility %		11.0
Energy Conserving		YES