

# GEARPLUS<sup>®</sup> SAE 80W-90 GL-5 GEAR LUBRICANT

## Sure Protection For Vehicles Under A Broad Range Of Conditions

### **PRODUCT DESCRIPTION**

PENNZOIL<sup>®</sup> GEARPLUS<sup>®</sup> SAE 80W-90 GL-5 GEAR LUBRICANT, formerly known as Multi-purpose 4096 80W-90, exceeds the latest requirements of gear manufacturers requiring API GL-5 lubricants. It is recommended for use in limited slip and conventional differentials of cars, pick up trucks and sports utility vehicles. It is designed to reduce or eliminate "chatter" that can sometimes occur in limited slip differentials. High-speed shock loads, higher torque requirements for extended periods of time and high operating temperatures call for heavy-duty quality lubricants of this caliber.

PENNZOIL<sup>®</sup> GEARPLUS<sup>®</sup> SAE 80W-90 GL-5 GEAR LUBRICANT is fortified with extreme pressure additives for tough protection under severe operating conditions. It contains rust and corrosion inhibitors to protect against the effects of moisture from condensation. Effective foam inhibitors prevent foaming and aeration that can lead to premature wear. PENNZOIL<sup>®</sup> GEARPLUS<sup>®</sup> SAE 80W-90 GL-5 GEAR LUBRICANT is a fully balanced, robust formulation for optimum axles and transmission protection.

PENNZOIL<sup>®</sup> GEARPLUS<sup>®</sup> SAE 80W-90 GL-5 gives the full protection of SAE 90 under high temperatures and hard driving conditions, while still providing the fast flow characteristics of SAE 80W when cold. This offers maximum lubrication and gear protection over a wide temperature range.

### APPLICATION

PENNZOIL<sup>®</sup> GEARPLUS<sup>®</sup> SAE 80W-90 GL-5 is recommended for use in hypoid or spiral bevel gear differentials and manual transmissions where an API Service GL-5 lubricant and an SAE 80W, 90 or 80W-90 viscosity grade is specified. In addition, PENNZOIL<sup>®</sup> GEARPLUS<sup>®</sup> SAE 80W-90 GL-5 is fully formulated for all limited slip differentials. It may be used as a makeup or refill fluid, even for rebuilt limited slip units and is designed for all high performance hypoid axles of cars, pick up trucks, sports utility vehicles as well as sports, police and racing cars. It is also recommended for conventional differentials.

#### **BENEFITS**

- Exceeds requirements of API GL-5
- Outstanding gear and bearing protection
- Suitable for all limited slip applications
- Combats rust and corrosion
- Inhibits oil oxidation
- Provides outstanding anti-foam protection
- Compatible with other gear oils under a wide range of operating and storage conditions
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# TYPICAL PHYSICAL AND CHEMICAL PROPERTIES PENNZOIL<sup>®</sup> GEARPLUS<sup>®</sup> SAE 80W-90 GL-5 GEAR LUBRICANT

TEST	METHOD	TYPICAL RESULTS
SAE Grade		80W-90
API Service		GL-5
Gravity, °API	ASTM D-287	26
Viscosity @ 40°C, cSt @ 100°C, cSt @ 100°F, SUS @ 210°F, SUS	ASTM D-2161 & D-445	150 14.5 700 76
Viscosity Index		95
Brookfield Viscosity @ 150,000 cP, °-26C(°-15F)	ASTM D-2983	<130,000
Pour Point, °C(°F)	ASTM D-97	-26(-15)
Flash Point, °C(°F)	ASTM D-92	204(400)
Color, ASTM	ASTM D-1500	5
Timken OK Load, lbs.	ASTM D-2782	70
Material Number 12/1 Quart 35 Pound Plastic Pail 120 Pound Drum 400 Pound Drum		4963 4964 4965 4966



# GEARPLUS<sup>®</sup> SAE 80W-90 GL-4

## A Specialty Gear Oil For Applications Requiring GL-4 Performance

#### **PRODUCT DESCRIPTION**

PENNZOIL<sup>®</sup> GEARPLUS<sup>®</sup> SAE 80W-90 GL-4 GEAR LUBRICANT is specially formulated to meet the unique requirements of API GL-4 service in manual transmissions and transaxles of passenger cars, light trucks and SUV's. PENNZOIL<sup>®</sup> GEARPLUS<sup>®</sup> SAE 80W-90 GL-4 GEAR LUBRICANT is blended from select base stocks and additives that yield a lubricant of exacting quality. This product is compounded utilizing specialized extreme pressure chemistry that provides protection of gears and bearings without being corrosive to bronze components. It contains foam suppressants to prevent wear, which can be caused by lubricant foaming and aeration. Effective rust and corrosion inhibitors protect metal surfaces from the effects of water contamination from condensation and the operating environment. PENNZOIL<sup>®</sup> GEARPLUS<sup>®</sup> SAE 80W-90 GL-4 GEAR LUBRICANT resists the formation of varnish deposits on synchronizer components, thus assuring long, trouble-free operation.

PENNZOIL<sup>®</sup> GEARPLUS<sup>®</sup> SAE 80W-90 GL-4 gives the full protection of an SAE 90 under hard driving conditions while providing the flow characteristics of SAE 80W that are necessary during cold weather start-ups. This offers maximum lubrication and gear protection over a wide temperature range.

### **APPLICATION**

PENNZOIL<sup>®</sup> GEARPLUS<sup>®</sup> SAE 80W-90 GL-4 GEAR LUBRICANT is designed for manual transmissions and transaxles of both American and import vehicles. It is formulated to be compatible with "yellow metals", such as bronze, found in synchronizers and other transmission componenets.

#### **BENEFITS**

- Meets the performance requirements of API GL-4 Service
- Will not cause glazing of synchronizer components
- Excellent thermal stability
- Outstanding extreme pressure and antiwear protection
- Prevents rust and corrosion
- Inhibits foaming and aeration
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## TYPICAL PHYSICAL AND CHEMICAL PROPERTIES PENNZOIL<sup>®</sup> GEARPLUS<sup>®</sup> SAE 80W-90 GL-4

TEST	METHOD	TYPICAL RESULTS
SAE Grade		80W-90
API Service		GL-4
Gravity, °API	ASTM D-287	27
Flash Point, °C(°F)	ASTM D-92	210(410)
Viscosity	ASTM D-2161 & D-445	
@210°F, SUS		76
@100°F, SUS		737
@ 40°C, cSt		159
@100°C, cSt		14.5
Viscosity Index	ASTM D-2270	93
Color	ASTM D-1500	5.5
Pour Point, °C(°F)	ASTM D-97	-26(-15)
Low Temperature Viscosity, cP @ °C	ASTM D-2983	<150,000 @ -26
Material Number		
12/1 Quart		21176
35 Pound Plastic Pail		4804
120 Pound Drum		4805
400 Pond Drum		4806