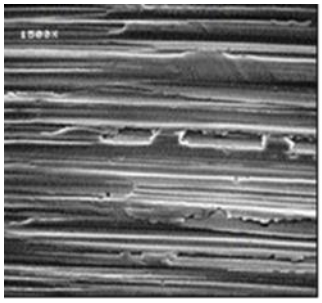
XPR®

EXTREME PERFORMANCE RACING OIL

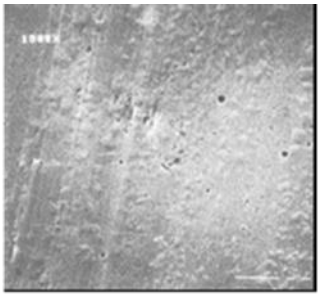
Royal Purple® XPR® oils are formulated specifically for the rigorous demands and severe operating conditions of racing and extreme performance engine applications. These engine oil formulae represent the absolute state-of-the-art in formulation and additive chemistry, providing unmatched protection and performance no matter the type of racing. XPR® engine oils are fortified with a high level of zinc / phosphorus anti-wear additive and a generous dose Synerlec®.

Synerlec® is Royal Purple's proprietary additive chemistry that greatly increases the protective film strength of the oil, reducing metal to metal contact, friction and wear. This unique and highly effective additive technology greatly enhances wear protection above and beyond that achievable in any other commercially available engine oil. Synerlec® also increases the oil's resistance to thermal degradation, enhancing lubrication at extreme engine temperatures, reducing deposit formation and lengthening the oil's useful life.



New Bearing*

After Leading Synthetic*



After Royal Purple w/ Synerlec*

* Same bearing shell from same engine, magnified 1500x

Recommended for use in various racing applications and are popular in a variety of motorsports including: NASCAR, NHRA, World of Outlaws and Bonneville Salt Flats. Outstanding choice for blown alcohol, nitro-methane, or any racing applications that experience excessive fuel dilution. If the absolute best performance and protection is desired for a primarily street driven vehicle, XPR® engine oils (except for the ultra-light XPR 0W-8) are appropriate for extended use in street driven gasoline engine applications, as well.

PERFORMANCE ADVANTAGES

- GREATEST WEAR PROTECTION – Protection against engine wear that is unmatched by any commercially available engine oil
- INCREASED POWER – Superior lubricity and low coefficient of friction for less parasitic loss; more power to the wheels
- SUPERIOR HIGH-TEMP. PERFORMANCE - Premium synthetic base oils and **Synerlec®** technology resist thermal degradation
- INCREASED LSPI PROTECTION – Formulations reduce Low Speed Pre-Ignition in late model turbocharged GDI engines.
- IMPROVED COMPATIBILITY WITH EXOTIC FUELS – Prevents the sludge and dilution by exotic fuels (alcohols and nitromethane)

ROYAL PURPLE® SYNTHETIC OIL

TECHNICAL DATA SHEET

Typical Physical Properties						
Property	**Test Method**	**0W-8**	**0W-20**	**5W-20**	**0W-30**	**5W-30**
Viscosity @ 40°C, cSt	ASTM D445	27.5	40.67	47.98	47.52	55.1
Viscosity @ 100°C, cSt	ASTM D445	5.62	8.9	8.5	10.18	10.63
Viscosity Index	ASTM D2270	150	209	157	210	187
Cold Crank Simulator, cP	ASTM D5293	2,300 @-35°C	4,112 @-30°C	3,965 @-30°C	5,536 @-35°C	4,173 @-30°C
HTHS, @150°C, cP	ASTM D5481	1.9	2.7	2.7	3.2	3.7
Flash Point, °C (°F)	ASTM D92	199 (390)	216 (420)	227 (440)	221 (430)	213 (416)
Pour Point, °C (°F)	ASTM D97	66 (-87)	-62 (-81)	-48 (-54)	-60 (-76)	-54 (-65)
TBN, mg KOH	ASTM D2896	9.6	10.2	10.4	9.3	9.7

Typical Physical Properties						
Property	**Test Method**	**5W-40**	**10W-40**	**5W-50**	**20W-50**	**10W-60**
Viscosity @ 40°C, cSt	ASTM D445	61.26	76.99	78.21	137.75	103.1
Viscosity @ 100°C, cSt	ASTM D445	12.79	13.45	18.72	19.79	22.46
Viscosity Index	ASTM D2270	214	179	262	165	248
Cold Crank Simulator, cP	ASTM D5293	4,879 @-30°C	4,191 @-25°C	5,835 @-30°C	4,358 @-15°C	5,460 @-25°C
HTHS, @150°C, cP	ASTM D5481	3.7	4.6	5.3	5.3	6.3
Flash Point, °C (°F)	ASTM D92	224 (436)	210 (410)	206 (404)	213 (416)	204 (400)
Pour Point, °C (°F)	ASTM D97	-45 (-49)	-43 (-45)	-47 (-54)	-43 (-45)	-42 (-44)
TBN, mg KOH	ASTM D2896	10.2	10	10	9.8	10