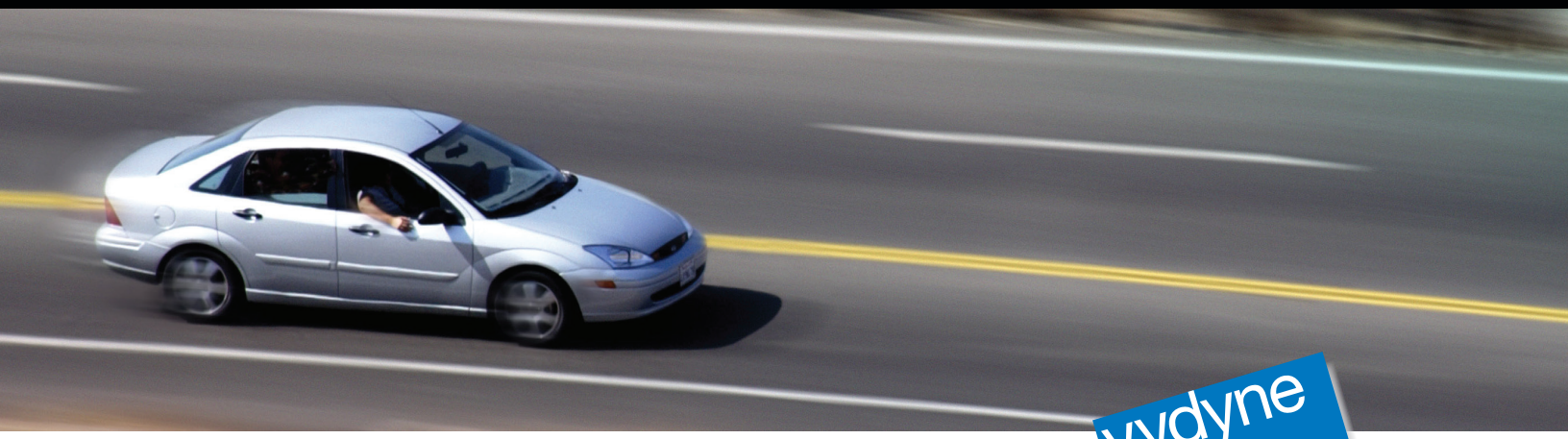
ASCEND PERFORMANCE MATERIALS

application profile:
oil fill tube



In the automotive industry, you need PA66 products that perform to a higher standard. Vydyne® resins and compounds help you get the most out of every part you produce. For under-the-hood applications, Vydyne products deliver superior chemical and heat resistance. For exterior and interior components, Vydyne offers versatile, reliable and customizable resins. Our quality and consistency make the difference in your production efficiency.

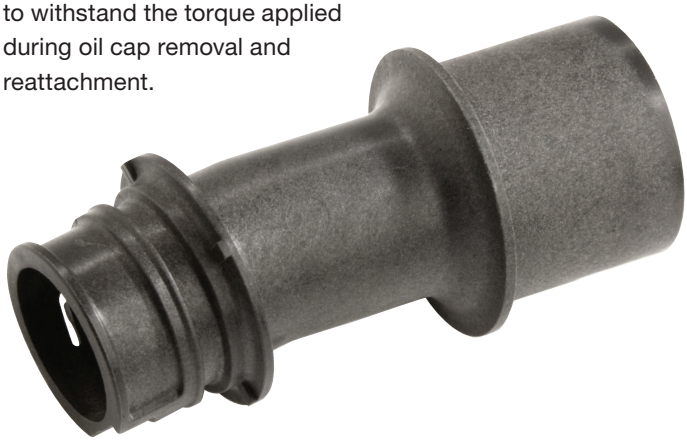
Product Used: R533H, R530H
Benefits: Superior Strength • Stiffness • Chemical Resistance • Inherent Toughness • Temperature Resistance

Application Description

Pictured below is the oil fill tube used on several major, North American vehicles containing 4.6-L and 5.4-L V-8 engines. The oil fill tube is manufactured by a leading thermoplastic components provider.

The Challenge

The oil fill tube must have excellent chemical resistance, temperature resistance, strength, stiffness and toughness. It is attached to the engine and experiences high temperatures during vehicle operation. The oil fill tube must also be able to withstand the torque applied during oil cap removal and reattachment.



The Vydyne Difference

Ascend's Vydyne R533H is ideal for this application due to its superior strength and stiffness. Resistance to engine oil is a key requirement that Vydyne PA66™ offers. Vydyne R533H and R530H meet all material and end-use requirements and have years of proven performance in production vehicles.

The Ascend Automotive team utilizes years of engine component experience to create optimal parts for Ford,® General Motors® and Chrysler.®

For more information, see your Ascend representative or visit www.ascendmaterials.com.

R533H, R530H				
Property*	Method	Units	R533H	R530H
Density	ISO 1183	g/cm^3	1.4	1.37
Tensile Stress	ISO 527-2	MPa	205	195
Flexural Modulus	ISO 178	MPa	10,200	9,600
Notched Izod	ISO 180	kJ/m^2	12	12
DTUL @ 1.8 MPa	ISO 75-2/A	°C	250	250

*Dry as molded (DAM)