

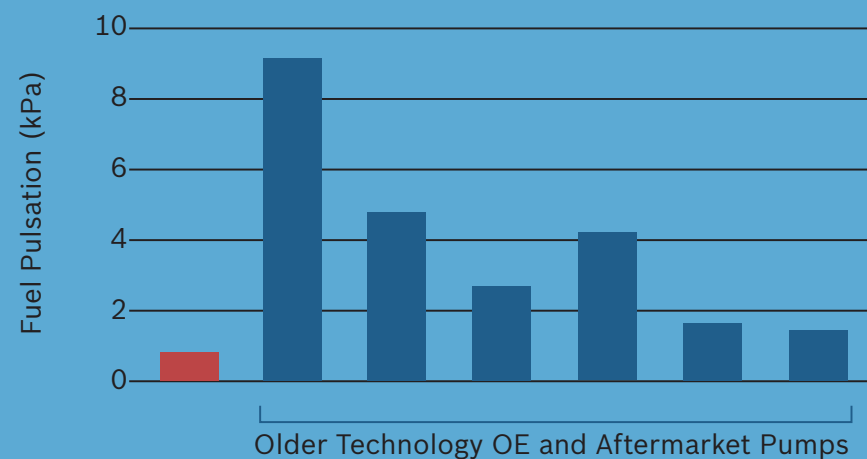
Bosch is the worldwide leader in fuel system technology

Constantly evolving technologies and state-of-the-art manufacturing over the past 35 years gives Bosch the ability to excel in tolerances and design on fuel pumps, making way for the latest advancement – turbine pump technology. This revolutionary technology replaces older pump designs, to provide improved drivability, reduced fuel pump noise, reduced hot start problems, and longer service life.

When it comes to a fuel pump repair on a complex fuel system, Bosch Turbine Fuel Pumps are nearly identical in dimension and appearance to the units they replace. That means a precise fit every time. Plus, application-specific, illustrated step-by-step installation instructions are included with all Bosch Turbine Fuel Pumps, so you can install them with complete confidence.

Smooth fuel delivery translates to better durability.

The superior design of Bosch Turbine Fuel Pumps virtually eliminates fuel pulsation and noise.



Technological leadership

Bosch supplied the industry's first fuel injection system with a high pressure electric fuel pump in 1967. Since then, Bosch continues to be at the forefront of fuel system technology, and supplies fuel pumps to virtually all vehicle manufacturers worldwide.



Premium Fuel Pumps

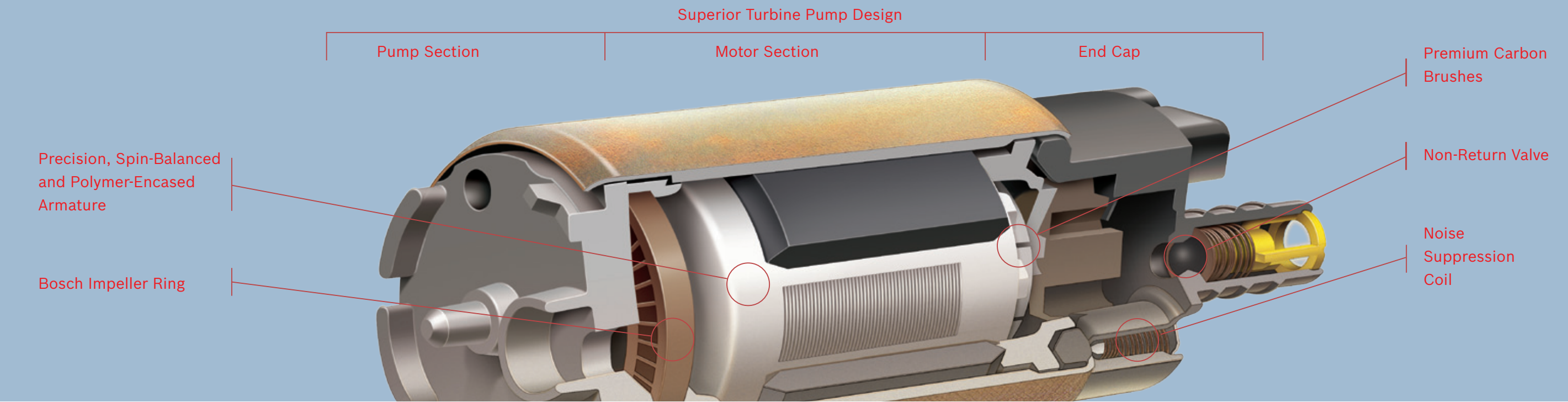


BOSCH
Invented for life



Bosch
Performance





The Worldwide Leader in Fuel System Technology

Built to last

Bosch state-of-the-art turbine pumps offer many advantages when compared to older roller-cell and inner-gear pump designs. Not only do the pumps offer near silent operation and improved drivability, the core components of this turbine design significantly reduce wear and deliver a longer service life. That's an important consideration when choosing a replacement fuel pump.

Feature

Superior turbine pump design

Bosch impeller ring

Precision, spin-balanced and polymer-encased armature

Premium carbon brushes, utilizing advanced materials

Non-return valve

Noise suppression coil

Benefit

Virtually eliminates fuel pulsation for better drivability and reduces fuel pump noise
Increases durability for long life

Assures smooth fuel flow

Reduces noise and vibration for quiet operation

Provides longer, reliable service life

Maintains system pressure
Reduces hot start problems

Virtually eliminates radio frequency interference



Revolutionary turbine pump technology



Built to last



Original equipment fit and installation



Bosch Filter Screens

A new filter screen should always be installed when replacing an in-tank fuel pump. Bosch offers a complete line of fuel pump filter screens, manufactured with advanced materials to ensure precise filtration and longer fuel pump service life.

Bosch filter screen dimensions are matched to OEM specs to ensure

correct positioning in the fuel tank for trouble-free operation. Fuel contaminants as small as 35 microns are filtered out (better than many OE screens), preventing damage to the fuel pump. Bosch uses one piece molded adapters that will not degrade over time, paying attention to the smallest detail to ensure quality and precision.

Bosch Fuel Tank Gaskets

Many vehicle manufacturers recommend a new fuel tank gasket also be installed when replacing an in-tank fuel pump. Bosch fuel tank gaskets ensure perfect installation of in-tank fuel pump assemblies to the fuel tank.



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Premium Fuel Pumps

Benchmark Quality from
the Worldwide Leader in
Fuel System Technology



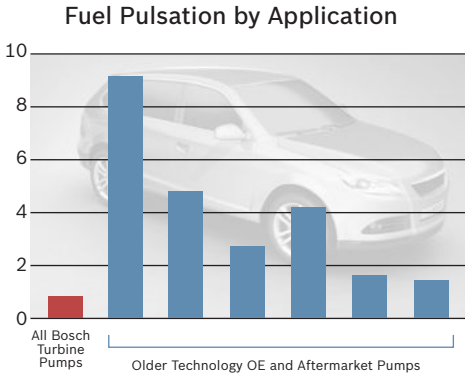
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Technological Leadership

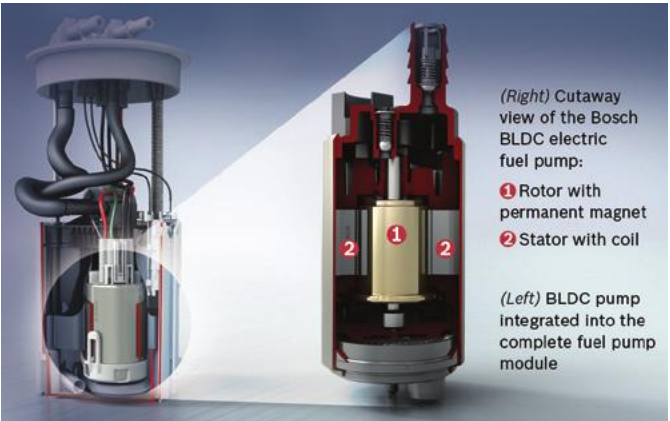
Bosch supplied the industry’s first fuel injection system with a high pressure electric fuel pump in 1967. Since then, Bosch has continued in the forefront of fuel system technology, and is recognized throughout the industry for innovation and superior product quality. Now Bosch brings its fuel system expertise to the aftermarket with a premium fuel pump program for domestic, Asian and European vehicles, offering:

- Electric fuel pump modules and assemblies
- Fuel pump filter screens
- Electric fuel pump kits
- Fuel tank gaskets

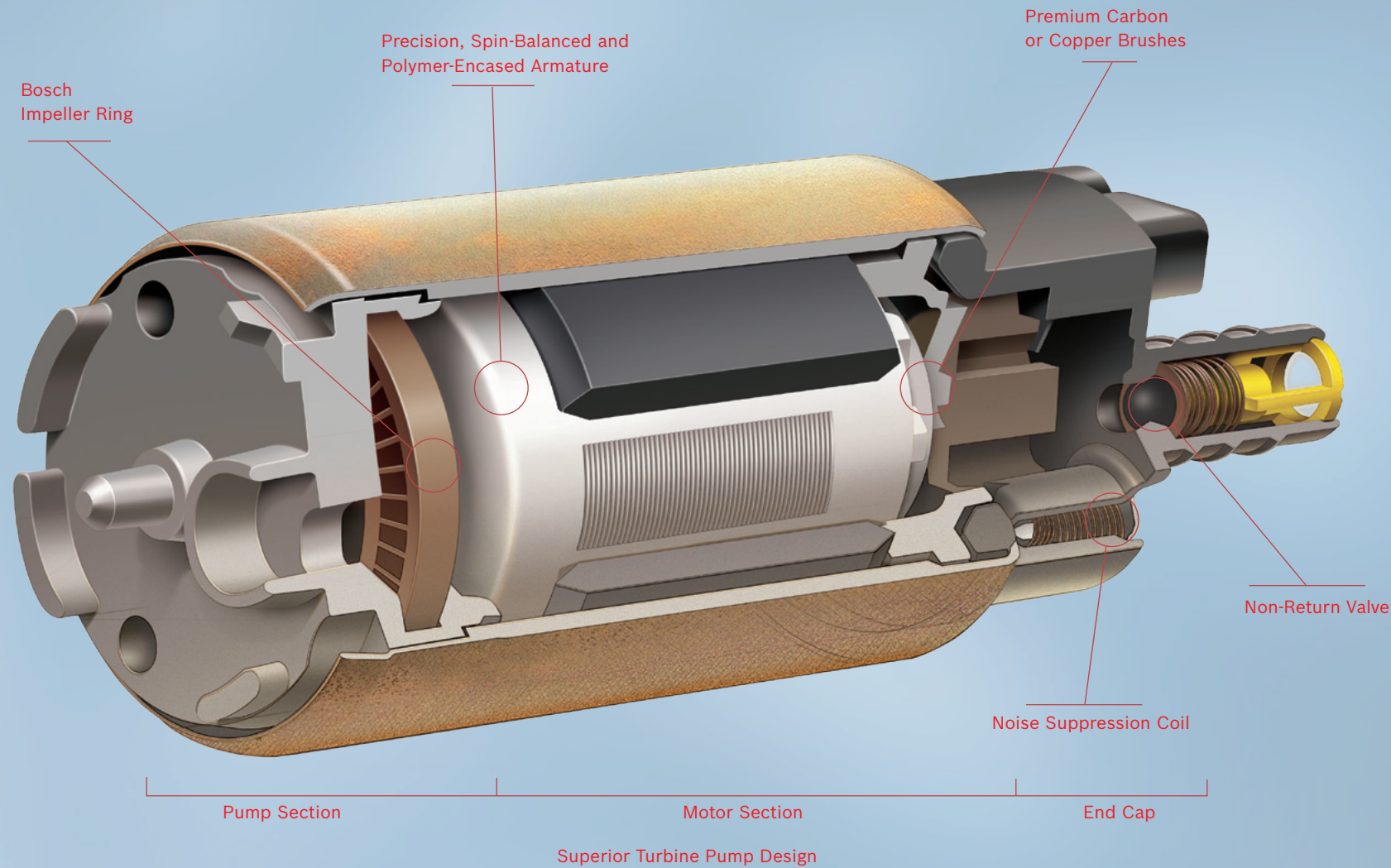


Cutting-Edge Technology

Bosch continues to define the future as the OE market leader by developing cutting edge fuel delivery technology including Demand Controlled Fuel Supply (DECOS) and brushless fuel pump technology. All of which was developed by Bosch and is used in our fuel pumps. The benefits of DECOS technology include the reduction of fuel consumption, reduction in evaporative emissions and higher durability.



Turbine Pump Technology for Quiet, Reliable Performance



Bosch Turbine Fuel Pumps

Bosch brings the benefits of turbine fuel pumps to the aftermarket for late-model vehicles, as well as for many earlier applications with older technology fuel pumps. The superior design of Bosch Turbine Pumps virtually eliminates fuel pulsation and noise, reduces hot-start problems, and prevents on-board electronics interference with the best electromagnetic shielding in the industry. These pumps are produced on the same world-class production lines, built and tested to the same exacting quality standards as Bosch OE fuel pumps to ensure a long, reliable service life.

Enhanced Product Design & Performance

Bosch state-of-the-art turbine fuel pumps offer many advantages when compared to older roller-cell and inner-gear pump designs. The Bosch turbine pump design offers near silent operation and eliminates fuel pulsation for improved drivability. In addition, the core components of this turbine design never come in contact with one another, significantly reducing wear and delivering a longer service life.

Impeller ring unique design features 47 evenly-spaced blades to eliminate fuel pulsation and the unstable fuel pressure and combustion problems it can cause.

Precision, spin-balanced armature allows operation in excess of 7,000 rpm while reducing noise and vibration for quiet operation, and **polymer encasing** reduces turbulence in the pump and protects the windings from contamination that can shorten service life.

Premium carbon brushes have an even surface for more direct contact and utilize advanced materials for longer, reliable service life.

Noise suppression coil virtually eliminates radio frequency interference.

Non-return valve maintains fuel system pressure between starts, reducing vapor lock and hot start problems.

Bosch Brand Equity

The Bosch brand is recognized by both technicians and consumers in the aftermarket for premium quality and innovation across many different product lines. Leverage that reputation to grow your fuel pump business. Bosch quality on the inside, coupled with domestic and import coverage, high-impact packaging, competitive pricing and total marketing support clearly distinguish the Bosch Premium Fuel Pump program. Bosch delivers the complete package.

Safe and Easy Installation

Replacing a fuel pump can be a complex job, but your customers can install Bosch Premium Fuel Pumps with complete confidence. Application-specific, illustrated step-by-step installation instructions are included with all Bosch Turbine Fuel Pumps.

Did You Know?

New E15 Blend Affects Fuel Pump Design

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History

Until recently, the current U.S. limitation in ethanol fuel mixture had a rating of E10 – 10% ethanol and 90% gasoline. However, the Environmental Protection Agency (EPA) has now approved the use of E15 in model year vehicles as far back as 2001. This new option at gas stations could affect the kinds of fuel pumps some vehicles require in order to use this new gasoline.

Prior to the limitation being expanded, the average competitive aftermarket fuel pump available has typically been manufactured to a rating of E10. Using E15 gasoline in vehicles with fuel pumps rated for E10 can cause damage to critical components leading to premature failure of the fuel pump.

Ahead-of-the-Times

Bosch Turbine Fuel Pumps manufactured in Anderson, S.C. are validated to E20, so you are assured of reliable performance to a standard that has been exceeding the new E15 allowance. Using a high quality, time-tested product from Bosch can reduce the risk of costly comebacks or premature failures. Plus, Bosch Turbine Fuel Pumps are already validated for blends up to E20 should the EPA expand the limitations again.



Harmful Effects of Ethanol

- ▶ Ethanol is corrosive and can cause premature fuel pump failure due to damage to the fuel level sensor, fuel pump electrical contacts or the fuel pump brush contacts.
- ▶ Deterioration of plastic and rubber fuel system components.
- ▶ Lower fuel mileage due to lower energy content in ethanol vs gasoline.