

# Drivetrain & Engine Catalog 2014

November 2013

Noviembre 2013

Novembre 2013

Ver.1.0



Clutch Kit • Clutch Hydraulics • Free Wheel Hub • Oil Pump • Timing Chain Cover  
Automatic Transmission Fluid • Vacuum Switching Valve

## Meet the AISIN Family



Water Pump



Timing Belt Kit



Fan Clutch



Fan Pulley Bracket



Hydraulic Tensioner



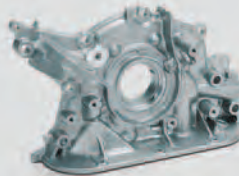
Clutch Kit



Clutch Hydraulics



Free Wheel Hub



Oil Pump



Timing Chain Cover



Form-In-Place-Gasket



Automatic Transmission Fluid



Antifreeze/Coolant



Door Lock Actuator



Vacuum Switching Valve



# Drivetrain Catalog Index

## Catalog Index

Sections/Pages

Technical Notes / Installation Procedures / Troubleshooting	5-35
Clutch Kit	5-25
Hydraulics - Clutch Master Cylinder	26-29
Hydraulics - Clutch Release Cylinder	30-31
Oil Pump	32-35
Part Number Legend	36
<b>Clutch Kit</b>	<i>Applications / Product Images / Buyer's Guide / Components</i> 38-53
<b>Clutch Hydraulics</b>	
Clutch Master Cylinder	<i>Applications / Product Images / Buyer's Guide</i> 56-67
Clutch Release Cylinder	<i>Applications / Product Images / Buyer's Guide</i> 68-84
<b>Free Wheel Hub</b>	<i>Applications / Product Images / Buyer's Guide</i> 86-90
<b>Oil Pump</b>	<i>Applications / Product Images / Buyer's Guide</i> 92-117
<b>Timing Chain Cover</b>	<i>Applications / Product Images / Buyer's Guide</i> 118-123
<b>Automatic Transmission Fluid</b>	<i>Applications / Product Images / Buyer's Guide</i> 124-137
<b>Vacuum Switching Valve</b>	<i>Applications / Product Images / Buyer's Guide</i> 138-143
<b>Interchange Tables</b>	
OEM Interchanges	144-151
Competitive Cross Reference	152-160
Warranty	161

## Indice

Secciones/Páginas

Notas Técnicas / Procedimientos de Instalación / Guía de averías y correcciones	5-35
Kit de Embrague	5-25
Hidráulicos - Cilindro Maestro de Embrague	26-29
Hidráulicos - Cilindro Auxiliar de Embrague	30-31
Bomba de Aceite	32-35
Número de Parte con Códigos Abreviados	36
<b>Kit de Embrague</b>	<i>Aplicaciones / Imágenes de Producto / Guía de Compra / Componentes</i> 38-53
<b>Hidráulicos de Embrague "Clutch"</b>	
Cilindro Maestro de Embrague	<i>Aplicaciones / Imágenes de Producto / Guía de Compra</i> 56-67
Cilindro Auxiliar de Embrague	<i>Aplicaciones / Imágenes de Producto / Guía de Compra</i> 68-84
<b>Rueda Libre o Candados 4X4</b>	<i>Aplicaciones / Imágenes de Producto / Guía de Compra</i> 86-90
<b>Bomba de Aceite</b>	<i>Aplicaciones / Imágenes de Producto / Guía de Compra</i> 92-117
<b>Tapadera o Cubierta de Cadena de Tiempo</b>	<i>Aplicaciones / Imágenes de Producto / Guía de Compra</i> 118-123
<b>Aceite de Transmisión Automática</b>	<i>Aplicaciones / Imágenes de Producto / Guía de Compra</i> 124-137
<b>Interruptor de la valvula de succion</b>	<i>Aplicaciones / Imágenes de Producto / Guía de Compra</i> 138-143
<b>Tabla de Intercambios</b>	
Intercambios contra Equipo Original	144-151
Intercambios contra la competencia	152-160
Garantía	161

## Index du catalogue

Sections/Pages

Notes techniques / Procédures d'installation / Diagnostic	5-35
Trousse d'embrayage	5-25
Hydrauliques - Maître-cylindre d'embrayage	26-29
Hydrauliques - Cylindre de débrayage	30-31
Pompe à huile	32-35
Légende de numéros de pièce	36
<b>Trousse d'embrayage</b>	<i>Applications / Images des produits / Guide de l'acheteur / Composants</i> 38-53
<b>Hydrauliques d'embrayage</b>	
Maître-cylindre d'embrayage	<i>Applications / Images des produits / Guide de l'acheteur</i> 56-67
Cylindre de débrayage	<i>Applications / Images des produits / Guide de l'acheteur</i> 68-84
<b>Moyeu à roue libre</b>	<i>Applications / Images des produits / Guide de l'acheteur</i> 86-90
<b>Pompe à huile</b>	<i>Applications / Images des produits / Guide de l'acheteur</i> 92-117
<b>Carter de chaîne de distribution</b>	<i>Applications / Images des produits / Guide de l'acheteur</i> 118-123
<b>Fluide pour transmission automatique</b>	<i>Applications / Images des produits / Guide de l'acheteur</i> 124-137
<b>Clapet de contacteur de dépression</b>	<i>Applications / Images des produits / Guide de l'acheteur</i> 138-143
<b>Tableaux des pièces équivalentes</b>	
Équivalences à l'équipement d'origine	144-151
Équivalences des produits concurrents	152-160
Garantie	161

# Catalog Abbreviations

## Catalogo De Abreviaturas Abréviations figurant au catalogue

Abbr.	ENGLISH	ESPAÑOL	FRANÇAIS
2WD	2 Wheel Drive	Tracción dos ruedas	Deux roues motrices
4WD	4 Wheel Drive	Tracción cuatro ruedas	Quatre roues motrices
AC	Air Conditioning	Aire acondicionado	Climatisation
All	All Model Trims	Todos los modelos	Garnitures de tous les modèles
AT	Automatic Transmission	Transmision automatica	Transmission automatique
AWD	All Wheel Drive	Tracción todas las ruedas	Transmission intégrale
Base	Base Model	Modelo Base	Modèle de base
CARB	Carbureted	Carburado	à carburateur
cc	Cubic Centimeter	Centimetro cubico	Centimètres cubes
CID	Cubic Inch Displacement	Desplazamiento por pulgada cubica	Cylindrée
DOHC	Dual Overhead Camshaft	Doble arbol de levas	Double arbre à cames en tête
ELEC.	Electric	Electrico	Électrique
Eng.	Engine	Motor	Moteur
Exc.	Except	Excepto	Excepté
FI	Fuel Injection	Inyeccion de Gasolina	Injection de carburant
FWD	Front Wheel Drive	Tracción delantera	Traction avant
GAS	Gasoline	Gasolina	Essence
H4	Horizontal 4 Cylinder	4 cilindros horizontal	4 cylindres horizontaux
H6	Horizontal 6 Cylinder	6 cilindros horizontal	6 cylindres horizontaux
HD Cooling	Heavy Duty Cooling	Enfriamiento equipo pesado	Refroidissement de service intense
inc.	Including	incluyendo	y compris
L	Liter	Litro	Litre
L4	In-line 4 Cylinder	4 cilindros en linea	4 cylindres en ligne
L5	In-line 5 Cylinder	5 cilindros en linea	5 cylindres en ligne
L6	In-line 6 Cylinder	6 cilindros en linea	6 cylindres en ligne
mm	Millimeters	Milímetros	Milimètres
MT	Manual Transmission	Transmision Manual	Transmission manuelle
Natural Asp.	Natural Aspiration	Aspiracion natural	Aspiration naturelle
RWD	Rear Wheel Drive	Tracción trasera	À propulsion
SOHC	Single Overhead Camshaft	Arbol de levas sencillo	Simple arbre à cames en tête
SPD	Speed	Caja de Cambios	Boîte de vitesses
Turbo	Turbocharger	Turbocargador	Turbocompresseur
V6	V Type 6 Cylinder	6 cilindros en V	6 cylindres en V
V8	V Type 8 Cylinder	8 cilindros en V	8 cylindres en V
VIN	Vehicle Identification Number	Número de identificación del vehículo	Numéro d'identification du véhicule
w/	With	Con	Avec
w/o	Without	Sin	Sans
Anniversary	Anniversary	Aniversario	Anniversaire
Bolt Pattern	Bolt Pattern	Diseño tipo tornillo	Modèle boulon
Can Use	Can Use	Utilizable	Peut utiliser
Dealer	Dealer	Concesionario	Concessionnaire
Diesel	Diesel	Diesel	Diesel
Factory	Factory	Fabrica	d'usine
Fan Clutch	Fan Clutch	Fan Clutch	Embrayage du ventilateur
From	From	De	De
Genuine	Genuine	Genuino	Authentique
Housing	Housing	Protector de bomba de agua	Carter
Large	Large	Largo	Grand
Limited	Limited	Limited	Limité
Make	Make	Marca	Marque
Model	Model	Modelo	Modèle
Models Produced In	Models Produced In	Modelo producido en	Modèles produits en
Oil Cooler	Oil Cooler	Enfriador de aceite	Refroidisseur d'huile
One	One	Uno	Un
Original Equipment	Original Equipment	Equipo Original	Équipement d'origine
Outlet	Outlet	Salida	Sortie
Production	Production	Produccion	Production
Special Edition	Special Edition	Edicion especial	Édition spéciale
Sport Suspension	Sport Suspension	Suspension deportiva	Suspension sport
Supercharger	Supercharger	Supercargador	Compresseur à suralimentation
Trim	Trim	Equipamiento	Garniture
Two	Two	Dos	Deux
Up To	Up To	hasta	Jusqu'à
Value Package	Value Package	Paquete plus	Ensemble avantageux
Wagon	Wagon	Vagoneta	Familiale
Year	Year	Año	Année

### IMPORTANT NOTICE

All listings, applications or interchanges contained in this catalog are based on the latest information available at the time of printing. Every effort has been made to ensure that the information contained in this catalog is correct, but we do not assume any responsibility for errors which may occur.

All references to manufacturers names or part numbers are only used as a guide when ordering AISIN parts.

## www.aisinaftermarket.com

### FEATURES

- Online Parts Catalog
- News/Press Release
- AISIN's Global Network
- Product Information
- Multi-Lingual
- & Much More



#### Online Parts Catalog

##### Save Valuable Time

A quick and simple point and click option allows you to look up any specific part number based on year, make and model.

#### AISIN Global Network

##### Beyond the Boundries

Explore beyond the AISIN aftermarket website and learn more about the AISIN brand through our vast global network.

#### Multi-Lingual

##### English / Spanish / French

The entire AISIN aftermarket website (Not including the Global network) is available in three languages.

#### AISIN Global Network

##### AISIN Aftermarket Line-Up

Explore AISIN's line-up of OE Matched quality parts including, cooling, drivetrain and engine products - All are produced to the same exacting standards that the original equipment manufacturers use in building a vehicle.

Download additional information and sales sheets for each product group.





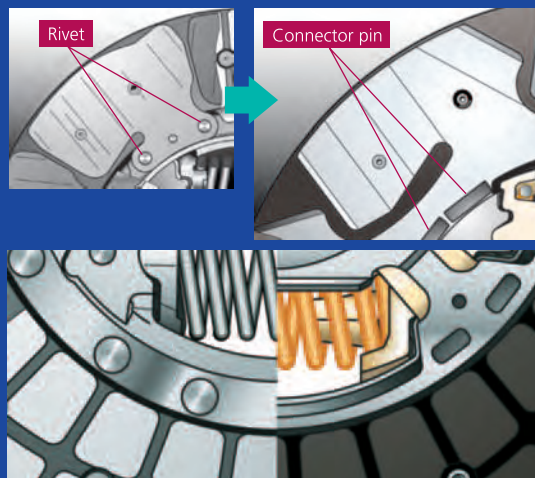
# 5 NVR Clutch System

## Greatly improved performance and environmentally friendly

### NVR vs. Conventional type - Component Comparison

#### Employs single-unit disc spring assembly

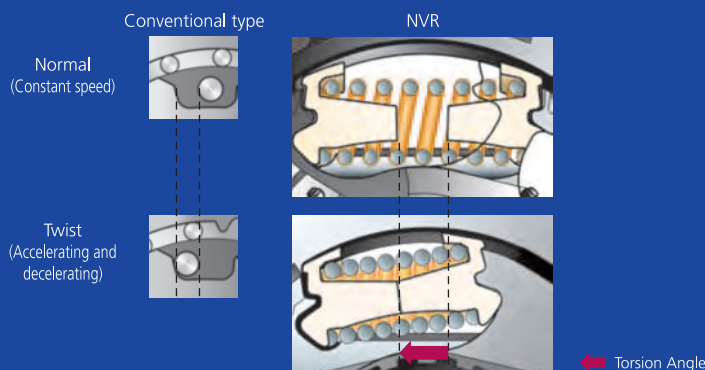
NVR performance is greatly increased by positioning the coil springs at the outermost edge of the disc plate.



Conventional type

#### Use of seat stopper

Torque angle is increased by the addition of spring stoppers on the torsion seat.



### NVR Features

#### Improved ride comfort

Ability to apply torque with less force improves vibration and sound absorption, enabling a quiet and stable ride.

#### Improved part coverage

Greater product coverage and part number consolidation is achieved by increasing the torque range.

#### Improved shift feel

Lower inertia moment by decreasing disc weight, reduces sticking and gear noise.

#### Improved durability

Addition of seat stoppers to the torsion spring reduces spring wear, increasing durability.

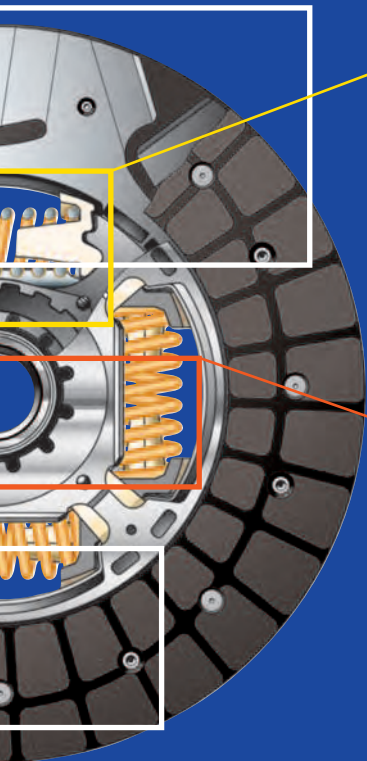
#### Improved pedal feel

Increased strength and easier half-clutching is achieved through improvements in cover design.

## Clutch Disc & Cover

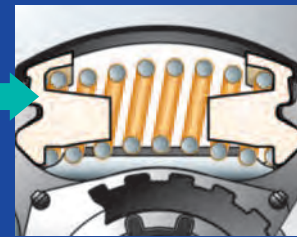
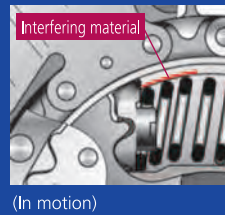
Improvements throughout the NVR clutch disc and cover increases fuel economy, provides a stable ride, and extends product life. Part number consolidations increase coverage with fewer parts.

NVR



### Addition of spring retainer to torsion seat

New coil spring design eliminates contact with the metal plate.



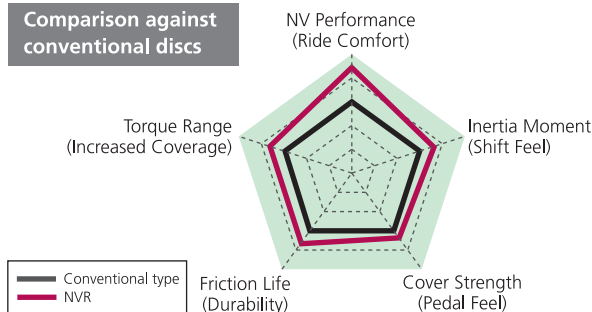
### Use of large capacity coil springs

Large capacity coil springs enable expanded torque range.



## User Benefits

Comparison against conventional discs

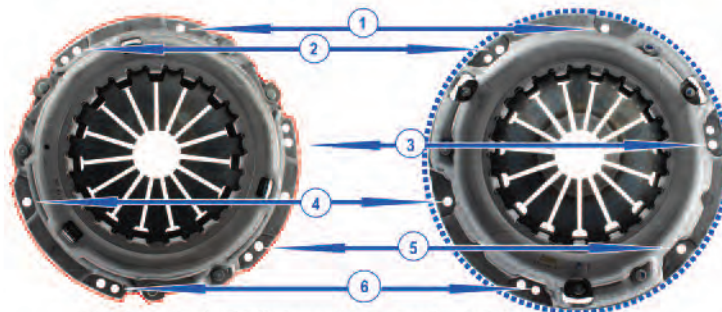
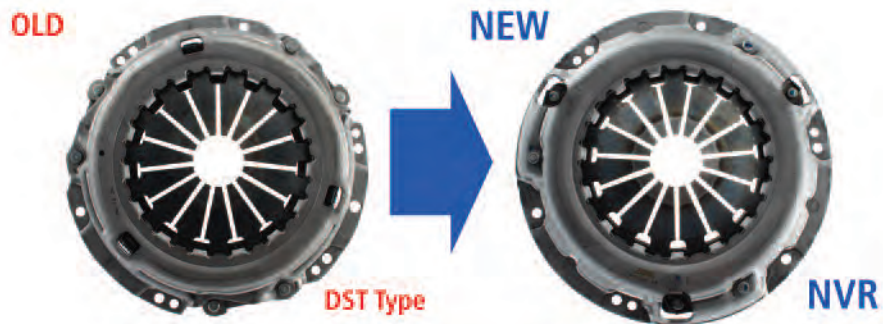




# 7 Technical Bulletin

## DST Type vs. New NVR Technology

AISIN is converting the older Diaphragm Spring Type (DST) Clutch Cover into the newest Noise Vibration Reduction Type (NVR) Technology. Since the Original Equipment Clutch Systems that AISIN supplies for the Automotive Manufacturers are being converted to the new technology, AISIN Aftermarket is following their lead. Although they may look physically different, it is just an illusion. The NVR Cover fitment is identical to the older DST Type, except with technological improvements in function, durability and driveability.



NVR Cover is physically larger, but Mounting Points are identical.



Release Bearing installation location is the same.



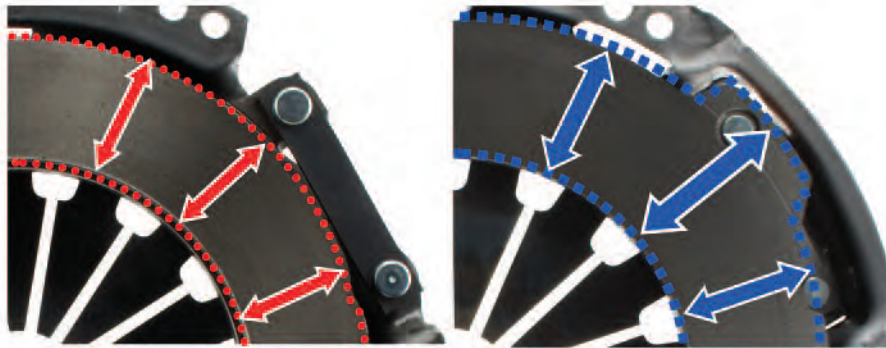
Pressure Plate inner diameter is the same.



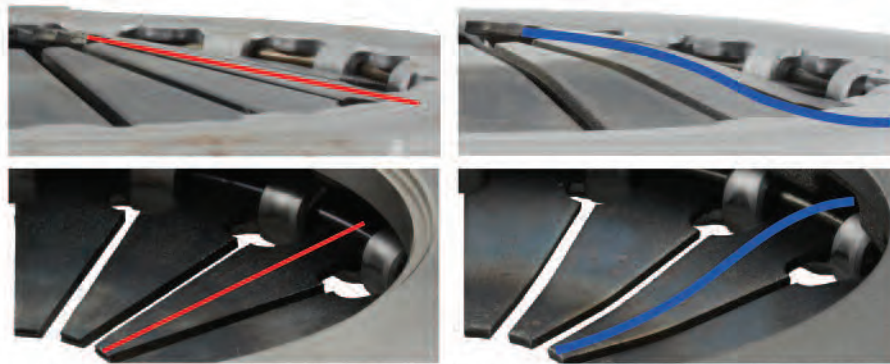
Pressure Plate outer diameter is different, but it does not effect installation or performance.



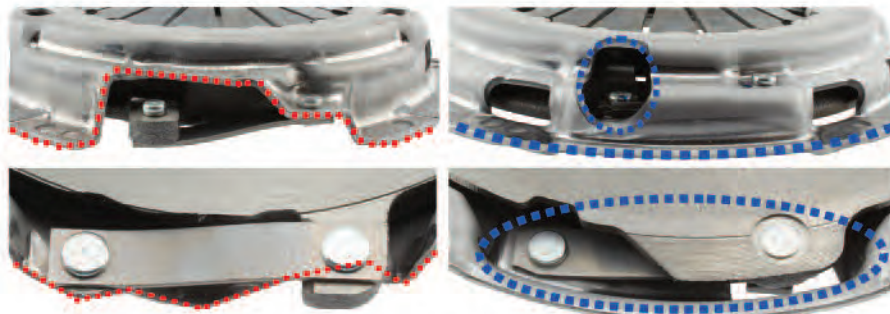
## DST Type vs. New NVR Technology



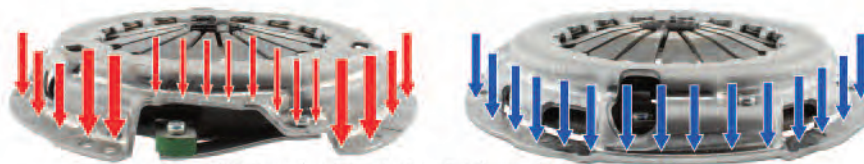
Larger Pressure Plate Surface Area enables better heat dissipation.



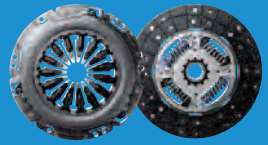
Curved Spring enables better clutch release and engagement, resulting in better clutch control.



Straps and Levers are enclosed, increasing the cover rigidity.



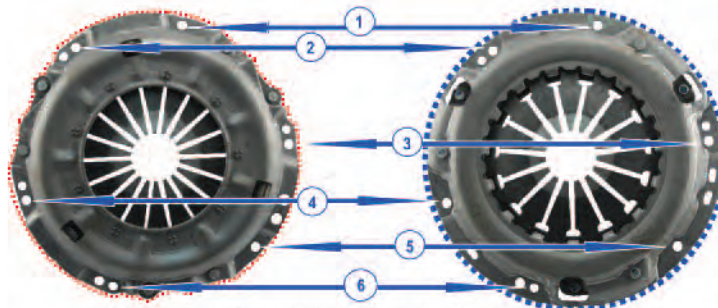
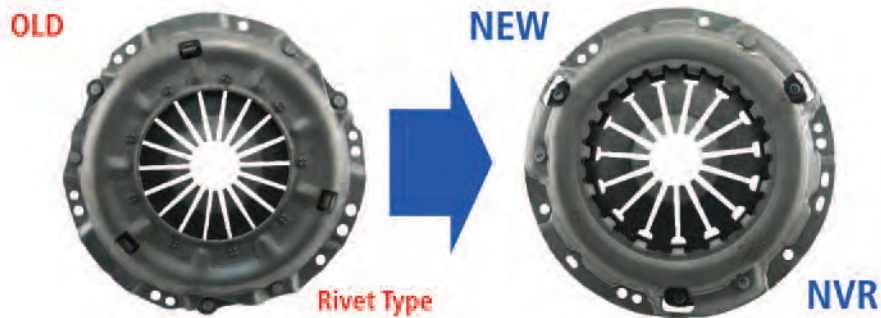
NVR Cover's robust design distributes forces evenly.



# 9 Technical Bulletin

## Rivet Type vs. New NVR Technology

AISIN is converting the older Rivet Type Clutch Cover into the newest Noise Vibration Reduction Type (NVR) Technology. Since the Original Equipment Clutch Systems that AISIN supplies for the Automotive Manufacturers are being converted to the new technology, AISIN Aftermarket is following their lead. Although they may look physically different, it is just an illusion. The NVR Cover fitment is identical to the older Rivet Type, except with technological improvements in function, durability and driveability.



NVR Cover is physically larger, but Mounting Points are identical.



Release Bearing installation location is the same.

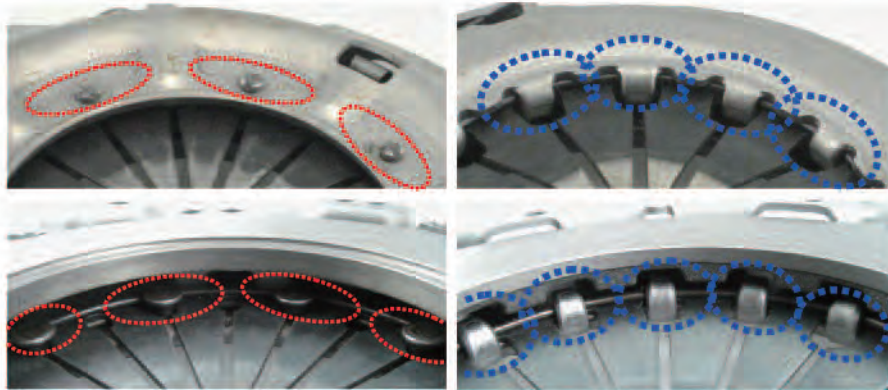


Pressure Plate inner diameter is the same.

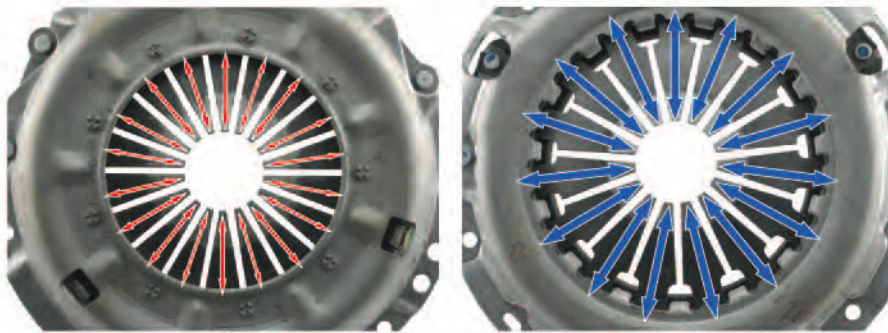


Pressure Plate outer diameter is different, but it does not effect installation or performance.

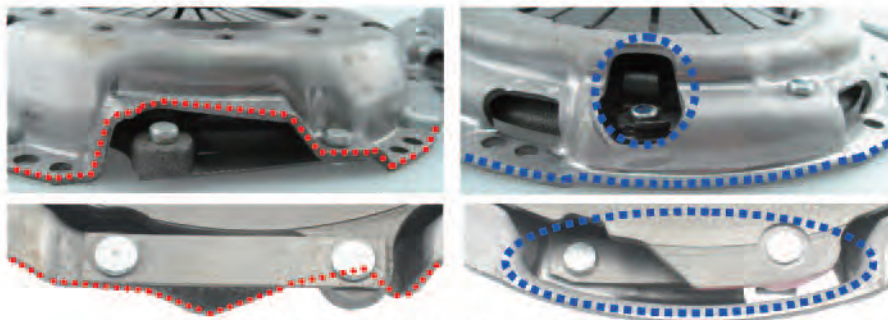
## Rivet Type vs. New NVR Technology



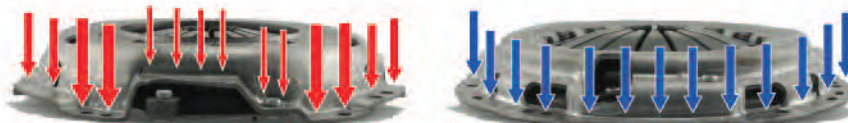
NVR Technology enables stronger spring support, resulting in better clutch control.



NVR Covers have fewer Fingers, but the Diaphragm Spring Fingers are thicker and stronger.



Straps and Levers are enclosed, increasing the cover rigidity.






NVR Cover's robust design distributes forces evenly.



## Clutch Disc Characteristics

- [Extended Product Life] ● Improved product life by adopting facings with excellent heat and wear resistance.
- [Improved Clutch Release Performance] ● Clutch drag prevented by using circumferential grooves in the facings and ensuring sufficient groove depth.
- Improved spline sliding properties by using nickel coated splines.
- [Smoother Engagement] ● Smoother clutch engagement by adopting facings with excellent anti-shudder properties.
- [Reduced Vibration/Noise] ● Reduced drive system vibration and noise through the use of a rigid clutch disc structure and reduced deflection of immobile cushion rubbers.

### <Clutch Disc Types>




Torsion Type	Rubber Torsion	Coil torsion	
Hysteresis Structure	Standard Type	Standard Type	Variable Hysteresis Type
Clutch Hub Structure	Integral Hub	Integral Hub	Dual Hub
Characteristics	 <ol style="list-style-type: none"> <li>1. Drive system for medium to high torque ranges. Reduced vibration/noise.</li> <li>2. Lightweight and low-inertia.</li> <li>3. Long torsion component life.</li> </ol>	 <ol style="list-style-type: none"> <li>1. Drive system for medium to high torque ranges. Reduced vibration/noise.</li> <li>2. Lightweight and low-inertia.</li> <li>3. Long product life for torsion component.</li> </ol>	 <ol style="list-style-type: none"> <li>1. Reduced vibration/noise for all drive systems from low to high torque ranges.</li> <li>2. Superior performance compared to integral hub.</li> </ol>
Applicable Vehicle	FF gasoline vehicle	FR gasoline vehicle	Diesel vehicle

\* Some features may not be applicable.

## Clutch Cover Characteristics

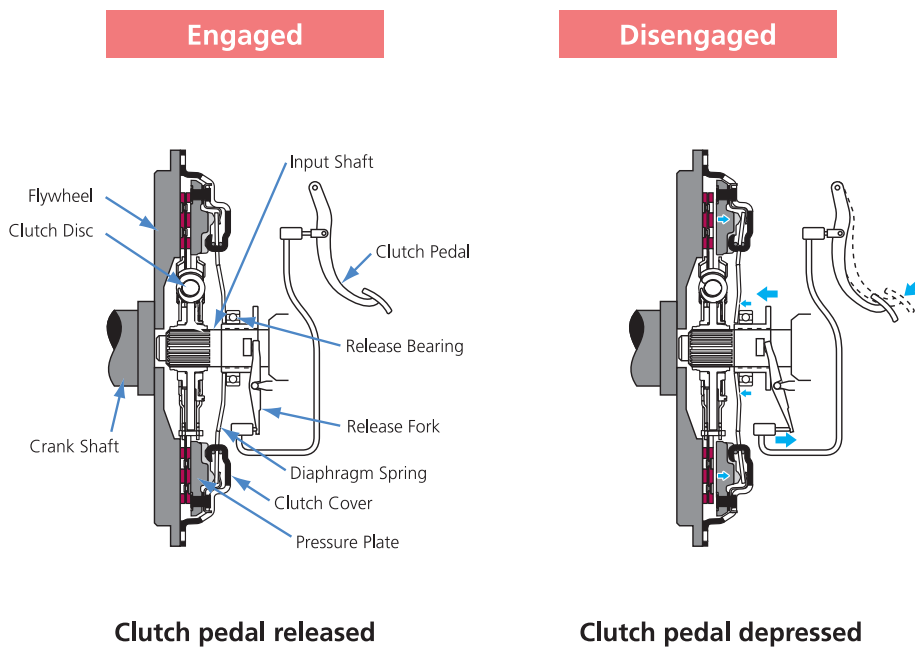
- [Extended Product Life] ● Reduced lever wear by heat treated diaphragm spring.
- Reduced load fatigue by performing the hot-setting process on the diaphragm spring.
- [Improved Clutch Release Performance] ● Improved clutch-release performance by using a ribbed diaphragm spring.
- Improved clutch-release performance by using a DST (Diaphragm Spring Turnover) type clutch cover.
- [Smoother Engagement] ● Improved shudder resistance by enhanced accuracy in both the bearing adherence strength and pressure plates movement.

### <Clutch Cover Types>

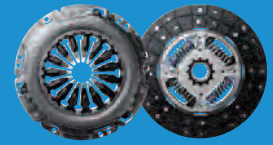
Spring Type	Diaphragm Spring		Coil Spring
Clutch Release Method	Push Method	Pull Method	Push Method
Characteristics	 <ol style="list-style-type: none"> <li>1. Long lasting DST type of clutch cover provides excellent clutch-release performance.</li> <li>2. Lightweight and compact.</li> </ol>	 <ol style="list-style-type: none"> <li>1. Superior clutch-release efficiency.</li> <li>2. Reduced clutch pedal pressure.</li> </ol>	 <ol style="list-style-type: none"> <li>1. Superior clutch-release efficiency.</li> <li>2. Easy replacement.</li> </ol>
Applicable Vehicle	Applicable in a broad range of vehicle types from sub-compact vehicles to medium size trucks.	Applicable in high-output vehicles (high performance vehicles, etc.).	Applicable in small and medium-sized trucks. Ideal for diesel applications.

\* Some features may not be applicable.

The most common clutch type is the dry-plate friction clutch. A single friction plate (clutch disc assembly) is placed between the flywheel and pressure plate (located inside the clutch cover assembly). The pressure plate is pressed against or lifted away from the disc to transmit or cut off engine power.

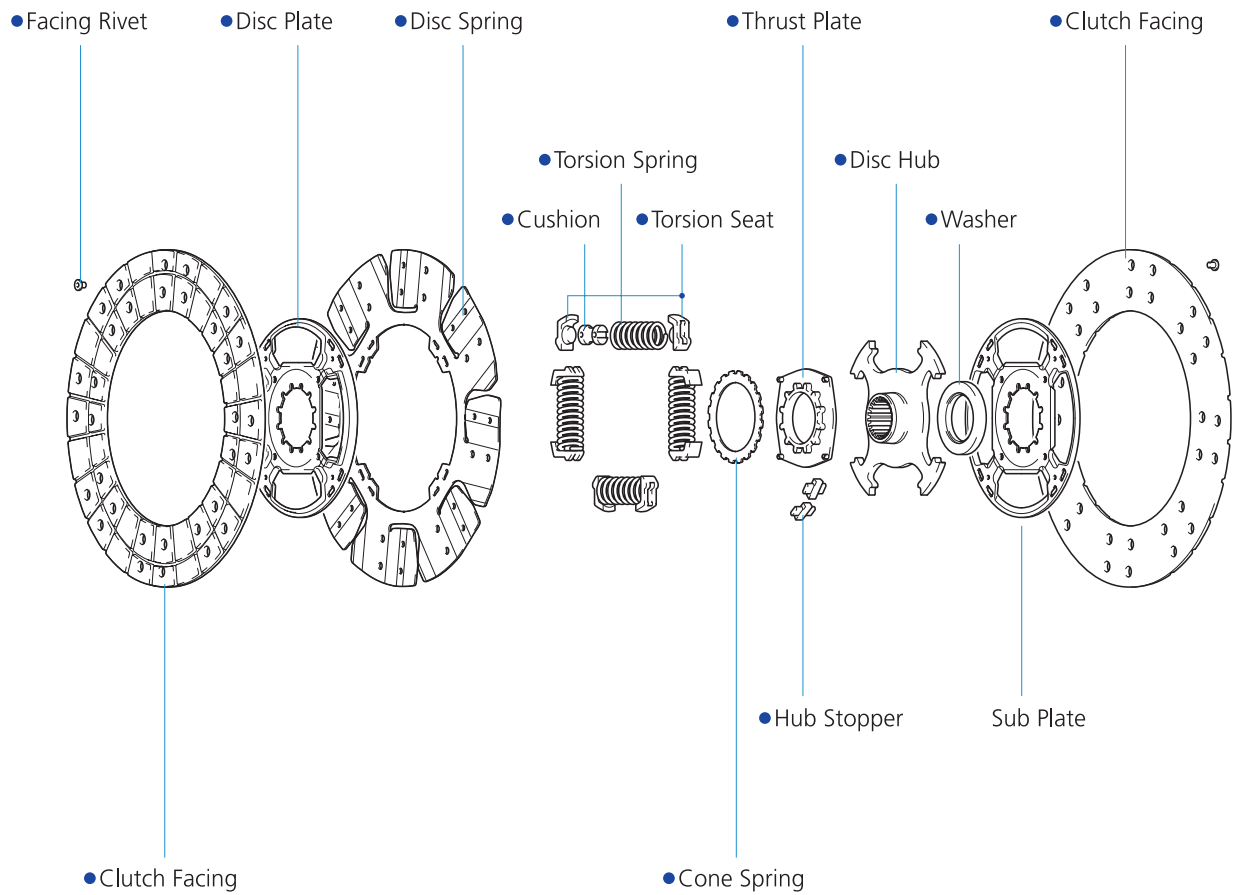


The basic components of a clutch system includes the clutch cover assembly (pressure plate, diaphragm spring, cover, etc.), clutch disc assembly, flywheel, release bearing, and release fork. The clutch disc is located between the flywheel and pressure plates and is connected to the transmission gears by the main drive shaft (input shaft).

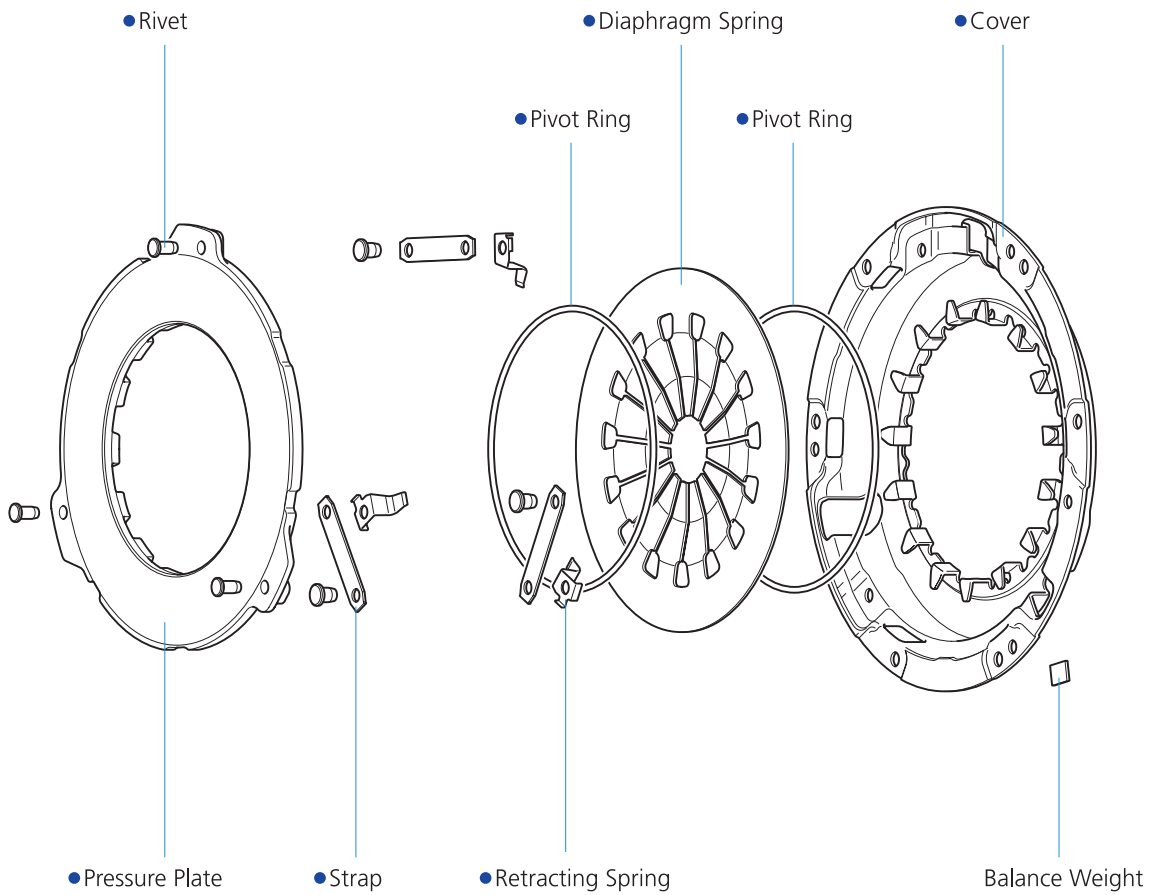


# 13 Structure and Components

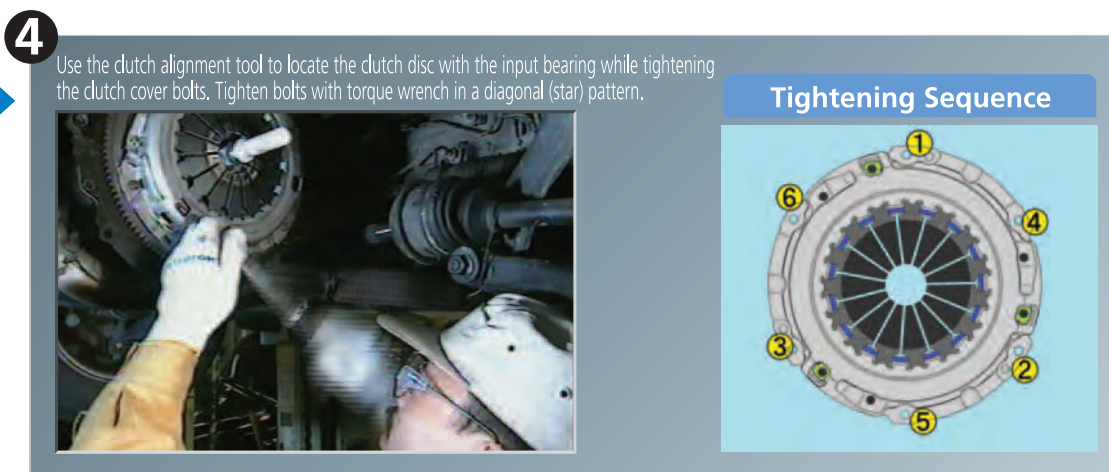
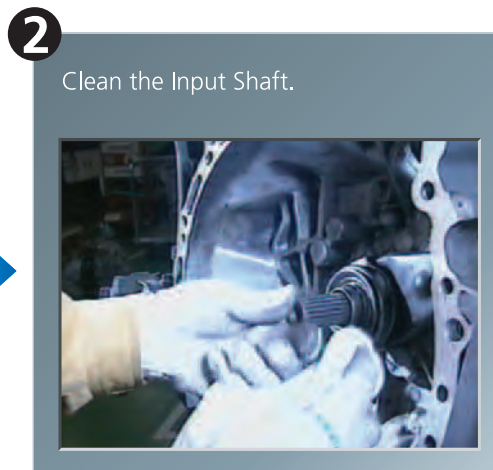
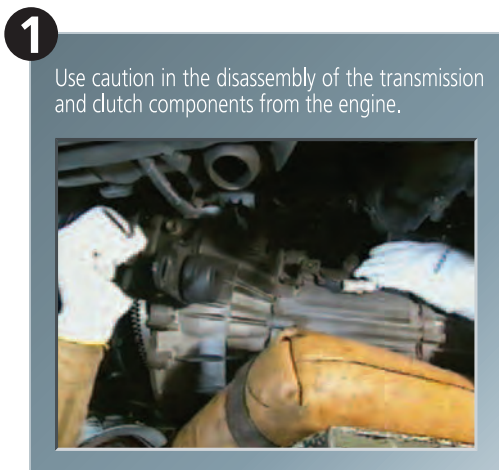
## Clutch Disc Assembly



## Clutch Cover Assembly



# 15 Installation Procedure

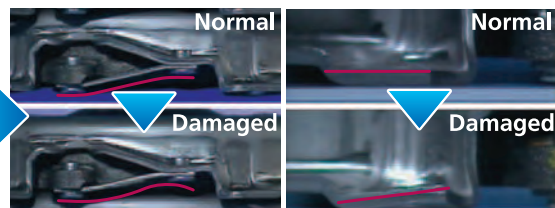


## Operation Precautions

Do not drop clutch components.



Deformation of the strap or cover will cause failure of the clutch.





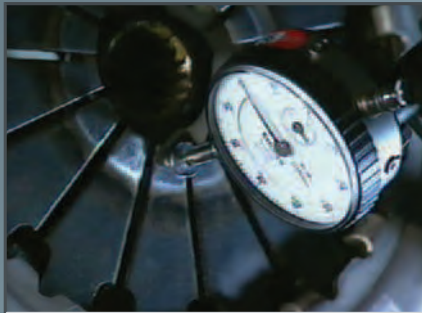
3

Apply appropriate amount of grease on the input shaft and disc spline.



5

Confirm evenness of the diaphragm springs (within 0.5mm or 0.02inch).



**Align the input shaft correctly with the clutch disc.**

Incorrect installation will cause problems such as damage to the clutch disc.

## — Key Points for Preventing Failure —

1. Refer to instructions and specifications in the Manufacturer's Service Manual.
2. Do not force or drop parts.

***Always follow instructions to prevent clutch failure.***

# Precautions in Handling


**Caution:**

Failure to observe the following precautions could lead to clutch failure, accidents, and injury.

## 1. Stacking

**Precaution**

Do not place more than four boxes in one stack.  
If there are different box sizes, place the largest on the bottom.

**Reason**

Inappropriate stacking can cause boxes to crush and cause clutch damage.



## 2. Product handling

**Precaution**

Do not use a clutch that has been dropped.

**Reason**

The parts that sustained the impact could be damaged and cause problems (e.g. clutch drag).



## 3. Product handling

**Precaution**

Do not use a clutch that was contaminated with water or oil.

**Reason**

Oil on the friction surface or rust caused by water could lead to problems (e.g. clutch drag or slipping).



## 4. Disc Installation

**Precaution**

Remove excess grease when installing disc.

**Reason**

Excess grease on the friction surface can cause slipping or shuddering.



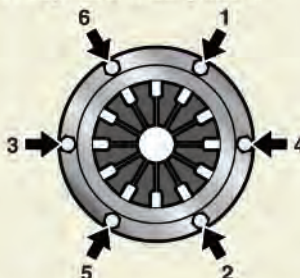
## 5. Cover Installation

**Precaution**

Tighten cover bolts in a diagonal (star) pattern. Never use an impact wrench.

**Reason**

If bolts are torqued in one step, an impact wrench is used, or if bolts are tightened in a circular pattern (not diagonally), it can cause clutch drag or shuddering through lever misalignment.



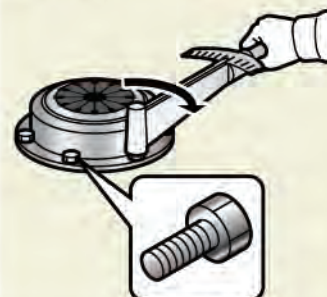
## 6. Cover Installation

**Precaution**

When tightening the cover, use bolts and torque specified from the vehicle manufacturer, using a torque wrench.

**Reason**

Bolts can break if the vehicle manufacturer's specified bolts are not used or not tightened to torque specifications.



## 1 Slipping Related Problems

**Condition:** Oil or similar substance is on the friction surface of the facings.

	Disc Related Causes	Cover Related Causes	Other Causes
<b>Cause:</b>	<ol style="list-style-type: none"> <li>1. Transmission oil or engine oil has leaked onto the facings.</li> <li>2. Insufficient verification at the time of installation.</li> <li>3. Problem with vehicle.</li> </ol>		
<b>Cure:</b>	<ol style="list-style-type: none"> <li>1. Inspect and repair transmission and/or engine.</li> <li>2. Replace disc with new part.</li> </ol>		

**Condition:** Facings are worn.

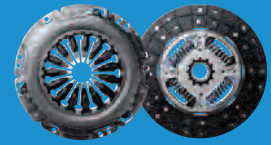


	Disc Related Causes	Cover Related Causes	Other Causes
<b>Cause:</b>	<ol style="list-style-type: none"> <li>1. Facings have reached the end of its wear life.</li> <li>2. Facings have been scorched due to excessive partial clutch engagement, excessive 2nd gear starts, or excessive downshifting, etc.</li> <li>3. Improper driving method.</li> </ol>		
<b>Cure:</b>	<ol style="list-style-type: none"> <li>1. Improve driving method.</li> <li>2. Replace disc and cover with new parts.</li> </ol>		

**Condition:** Facings have broken.



	Disc Related Causes	Cover Related Causes	Other Causes
<b>Cause:</b>	<ol style="list-style-type: none"> <li>1. Facings have burst due to rapid change in torque (i.e.: mis-shifting or speed shifting).</li> <li>2. Vehicle was driven with scorched facings.</li> <li>3. Improper driving method.</li> </ol>		
<b>Cure:</b>	<ol style="list-style-type: none"> <li>1. Improve driving method.</li> <li>2. Replace disc and cover with new parts.</li> </ol>		



# 19 Troubleshooting

**Condition:** Pressure of the diaphragm spring is weak.



Disc Related Causes

Cover Related Causes

Other Causes

**Cause:**

1. Spring function of the diaphragm spring has degraded due to heat fatigue.
2. Wrong part was installed.
3. Improper driving method.

**Cure:**

1. Improve driving method.
2. Replace cover with correct part.
3. Replace disc and cover with new parts.

**Condition:** Misalignment or malfunction in the release mechanism.

Disc Related Causes

Cover Related Causes

Other Causes

**Cause:**

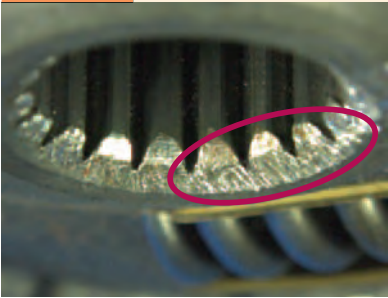
1. Release bearing remains connected to the diaphragm spring (partial engagement).  
(Cable tension changes with use, making the clutch more susceptible to slipping.)
2. Misalignment at time of installation.

**Cure:**

Readjust the release mechanism.

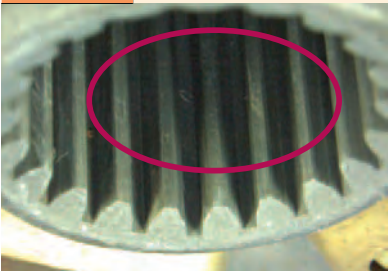
## 2 Clutch Drag Related Problems

**Condition:** Splines are scratched, dented, or damaged.



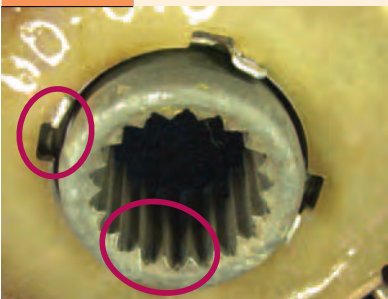
	Disc Related Causes	Cover Related Cause	Other Causes
<b>Cause:</b>	1. Input shaft was scratched or other damage occurred to the splines when installing the transmission, resulting in sliding problems or a deformed disc plate, causing significant run-out. 2. Installation error.		
<b>Cure:</b>	1. Replace disc and cover with new parts. 2. Ensure centering when installing transmission.		

**Condition:** No grease on splines.

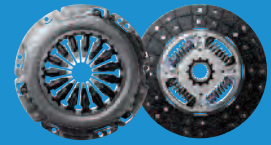


	Disc Related Causes	Cover Related Cause	Other Causes
<b>Cause:</b>	1. Grease was not applied or insufficiently applied when installing the clutch disc, resulting in sliding problems. 2. Installation error.		
<b>Cure:</b>	Apply grease to the disc splines.		

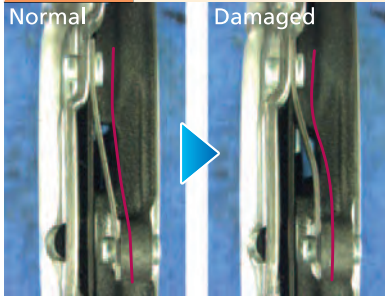
**Condition:** Deformed clutch disc.



	Disc Related Causes	Cover Related Cause	Other Cause
<b>Cause:</b>	1. Misalignment of the crankshaft and input shaft caused a wobble in the rotation (figure-8 rotation), deforming the disc so that power is transmitted even when disengaged. 2. Installation error.		
<b>Cure:</b>	1. Replace disc and cover with new parts. 2. Ensure centering when installing transmission.		



**Condition:** Straps or other components are deformed.



Disc Related Causes

Cover Related Causes

Other Causes

**Cause:**

1. Strap has been deformed or the retractable spring has been broken due to dropping the part.
2. Damaged in shipping.
3. Mishandling or installation error.

**Cure:**

Replace cover with new part.

**Condition:** Release mechanism misaligned or failed.

Disc Related Causes

Cover Related Causes

Other Causes

**Cause:**

1. Insufficient fluid (leaks, etc.) in clutch hydraulic parts.
2. Incorrect cable adjustment.
3. Release fork was installed incorrectly.
4. Misalignment at time of installation.

**Cure:**

Readjust the release mechanism.

**Condition:** Excessive run-out on flywheel.

Disc Related Causes

Cover Related Causes

Other Causes

**Cause:**

Installation error.

**Cure:**

Realign or replace the flywheel.

### 3 Shuddering and Chattering Problems (Clutch Mechanism Failure and Abnormal Friction Surface)

**Condition:** Oil or similar substance is on the friction surface of the facings.



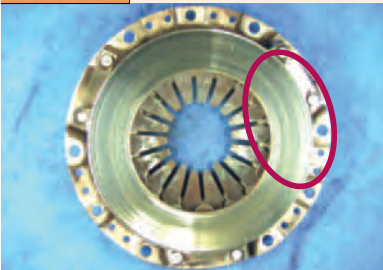
	Disc Related Causes	Cover Related Causes	Other Causes
<b>Cause:</b>	<ol style="list-style-type: none"> <li>1. Facing was touched with oily hands when replacing the part.</li> <li>2. Excess spline grease was thrown onto the facing due to centrifugal force.</li> <li>3. Improper installation.</li> </ol>		
<b>Cure:</b>	<ol style="list-style-type: none"> <li>1. Replace disc with new part.</li> <li>2. Do not contaminate facing with oil.</li> </ol>		

**Condition:** The friction surface of the facings is showing heat degradation.

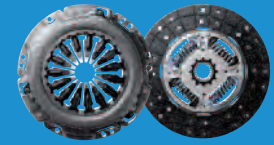


	Disc Related Causes	Cover Related Causes	Other Causes
<b>Cause:</b>	<ol style="list-style-type: none"> <li>1. Facing has reached the end of its wear life.</li> <li>2. Facing has been scorched due to excessive partial clutch engagement, excessive 2nd gear starts, or excessive downshifting, etc.</li> <li>3. Improper driving method.</li> </ol>		
<b>Cure:</b>	<ol style="list-style-type: none"> <li>1. Replace disc and cover with new parts.</li> <li>2. Improve driving method.</li> </ol>		

**Condition:** Abnormality seen in the friction surface of the pressure plate.



	Disc Related Causes	Cover Related Causes	Other Causes
<b>Cause:</b>	<ol style="list-style-type: none"> <li>1. Friction surface of the pressure plate has become glazed.</li> <li>2. Installation error.</li> <li>3. Improper driving method.</li> </ol>		
<b>Cure:</b>	<ol style="list-style-type: none"> <li>1. Replace cover with new part.</li> <li>2. Replace clutch cover when replacing disc.</li> <li>3. Improve driving method.</li> </ol>		

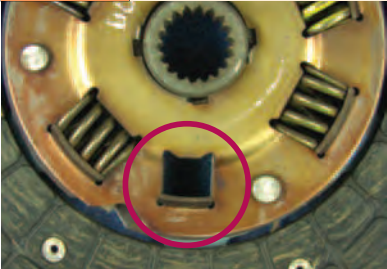


<b>Condition:</b>	Abnormality seen in the friction surface of the flywheel.
	<div style="display: flex; justify-content: space-around; margin-bottom: 5px;"> <span>Disc Related Causes</span> <span>Cover Related Causes</span> <span style="background-color: #4a697d; color: white; padding: 2px 5px;">Other Causes</span> </div>
<b>Cause:</b>	<ol style="list-style-type: none"> <li>1. Friction surface of the flywheel has become glazed.</li> <li>2. Installation error.</li> <li>3. Improper driving method.</li> </ol>
<b>Cure:</b>	<ol style="list-style-type: none"> <li>1. Replace flywheel.</li> <li>2. Inspect and service flywheel when necessary.</li> <li>3. Improve driving method</li> </ol>




## 4 Abnormal Noises and Inability to Drive (Broken Clutch)

**Condition:** 1. Broken disc component.



	Disc Related Causes	Cover Related Causes	Other Causes
<b>Cause:</b>	1. Misalignment of the crankshaft and input shaft or other problem caused disc breakage, ejecting springs and other components. 2. Installation error.		
<b>Cure:</b>	1. Replace disc and cover with new parts. 2. Ensure centering when installing the transmission.		

**Condition:** 2. Broken disc component.



	Disc Related Causes	Cover Related Causes	Other Causes
<b>Cause:</b>	1. Misalignment caused disc to break and engine power is not being transmitted. 2. Installation error.		
<b>Cure:</b>	Replace disc and cover with new parts.		

**Condition:** 3. Broken disc component.

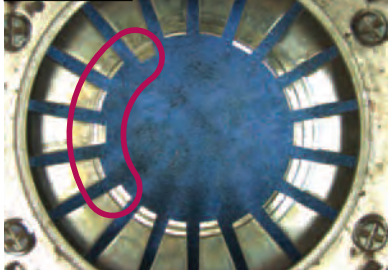
	Disc Related Causes	Cover Related Causes	Other Causes
<b>Cause:</b>	1. Excessive partial clutch engagement or mis-shifting caused the facing to burst. 2. Improper driving method.		
<b>Cure:</b>	Improve driving method.		

**Condition:** A cover component has broken.

	Disc Related Causes	Cover Related Causes	Other Causes
<b>Cause:</b>		1. Significant run-out on the flywheel broke the cover's retracting spring. 2. Improper installation.	
<b>Cure:</b>		Replace flywheel with new part.	



**Condition:** The edge of the diaphragm spring shows abnormal wear.



	Disc Related Causes	Cover Related Causes	Other Causes
<b>Cause:</b>		<ol style="list-style-type: none"> <li>Misalignment of the crankshaft and input shaft or the bearing caused the edge of the diaphragm spring to wear, preventing smooth rotation of the bearing.</li> <li>Installation error.</li> </ol>	
<b>Cure:</b>		<ol style="list-style-type: none"> <li>Replace cover with new part.</li> <li>Ensure centering of the bearing.</li> </ol>	

## 5 Clutch Cover Selection Errors and Clutch Mechanism Operation Failures

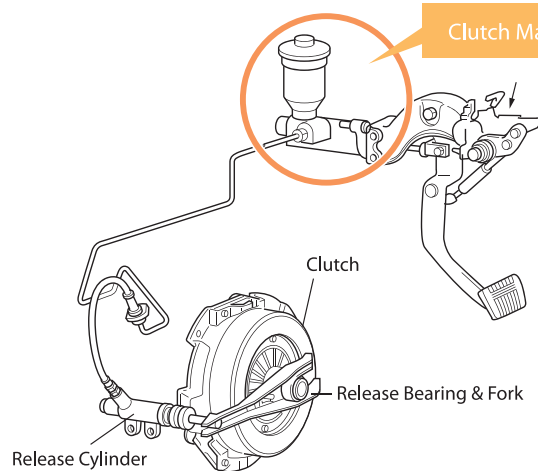
**Condition:** Incorrect part number was installed.

	Disc Related Causes	Cover Related Causes	Other Causes
<b>Cause:</b>		<ol style="list-style-type: none"> <li>Wrong part was installed.</li> <li>Incorrect part number selection.</li> </ol>	
<b>Cure:</b>		Replace cover with the correct part.	

**Condition:** Malfunction of the release mechanism is causing sliding resistance.

	Disc Related Causes	Cover Related Causes	Other Causes
<b>Cause:</b>			<ol style="list-style-type: none"> <li>Resistance is causing rough movement of the release fork, installation rod, or cable.</li> <li>Installation error.</li> </ol>
<b>Cure:</b>			Readjust the release mechanism.

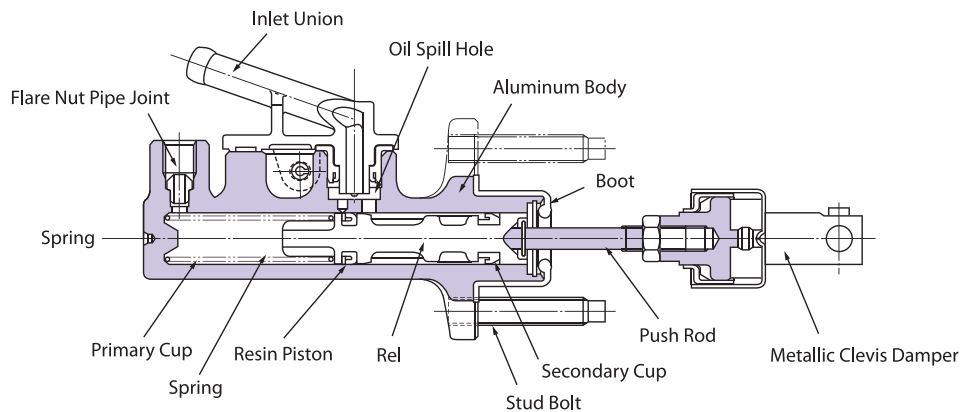
## Function



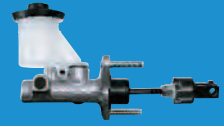
The clutch master cylinder is a device that transforms mechanical force into hydraulic pressure. As the driver presses the clutch pedal, the pedal lever applies force to the clutch master cylinder which transmits hydraulic pressure to the clutch release (slave) cylinder that disconnects engine power to the transmission.

## Structure and Components

[Conventional Type]



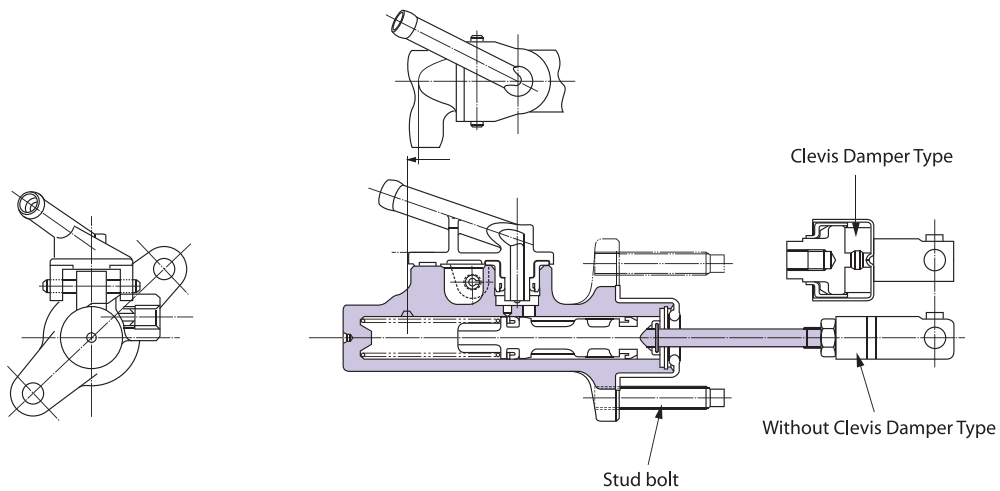
The clutch master cylinder structure consists of the piston, cups, and springs, built within a precision machined body. The primary cup, positioned on the leading side of the body, functions to create hydraulic pressure when fluid is forced inside by the piston. Located on the trailing side is the secondary cup, which guides the piston and prevents fluid from leaking. When the clutch pedal is pressed, the primary cup is blocked away by the piston from the oil spill port leading to the reservoir tank, pressure in the cylinder rises as the fluid is fed through the pipeline. When the clutch pedal is released, the hydraulic pressure and the force of the return spring pulls back the piston to relieve fluid back into the reservoir. The clutch master cylinder is what provides the necessary force to control the application of drivetrain power.



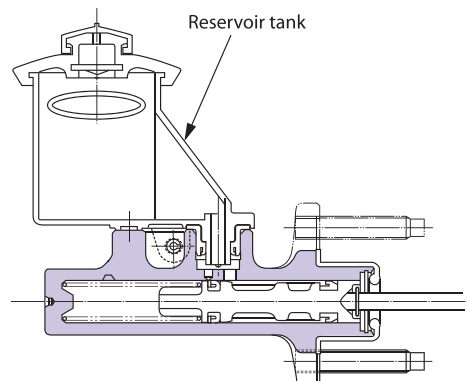
## Clutch Master Cylinder Variations

- Conventional Port-less Type
- Stand Alone / Integrated Reservoir Type
- Types With and Without Stud Bolts
- Types With and Without Clevis Damper
- Types With and Without Clutch Booster

### [Stand Alone Reservoir Type]



### [Integrated Reservoir Type]

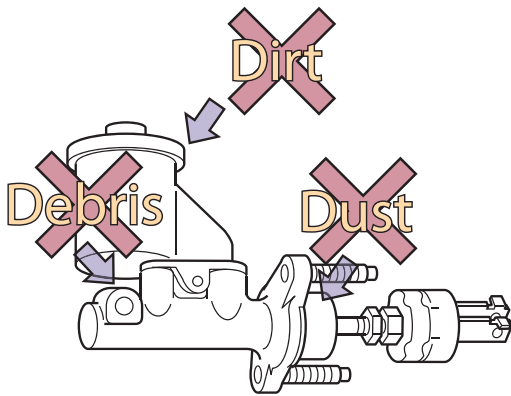


## CAUTION!

Failure to follow recommended procedures may cause clutch failure and injury. Always consult the manufacturer's vehicle specific service manual for reference.

1

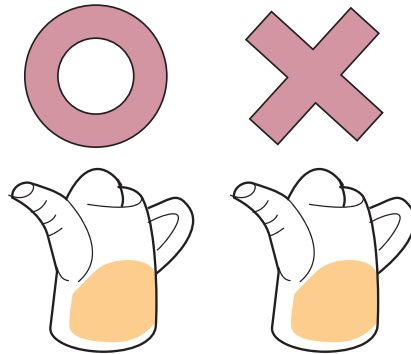
Do not allow dust, dirt, and debris to enter the cylinder or reservoir tank.



Internal damage may occur, resulting in fluid leakage and improper hydraulic pressure.

2

Always use vehicle manufacturer specified fluid.

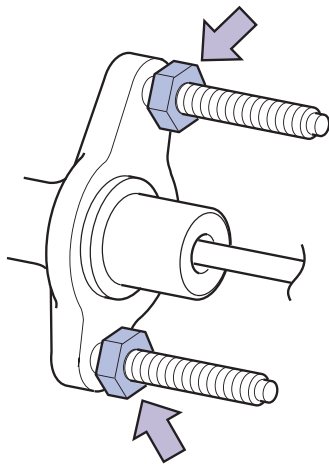


Specified brake fluid    Other brake fluids

Sealing can be impaired if mineral additives are mixed with fluid which can cause clutch failure.

3

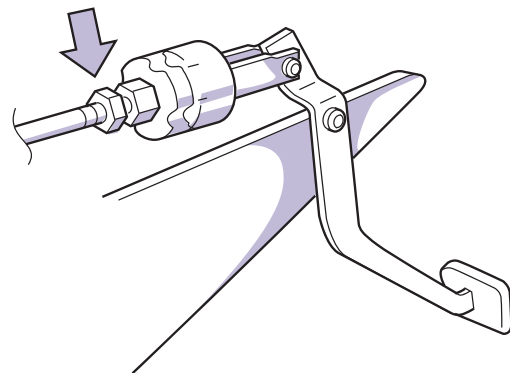
Tighten bolts, nuts, and screws as specified by the manufacturer's vehicle specific manual.



Damage of screws and threads may cause improper function.

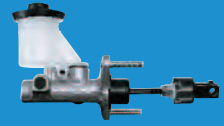
4

Adjust the clutch pedal lever according to the method specified by the manufacturer's vehicle specific manual.



Improper adjustment will cause poor clutch engagement and release.

# 29 Installation Procedure

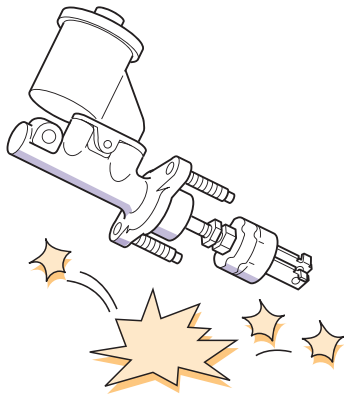


## CAUTION!

Failure to follow recommended procedures may cause clutch failure and injury. Always consult the manufacturer's vehicle specific service manual for reference.

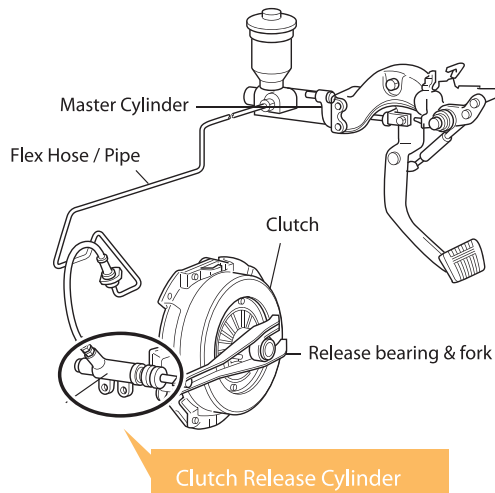
### 5

Handle with care. Clutch master cylinders are precision manufactured. Do not drop or deform. Never use a damaged unit.



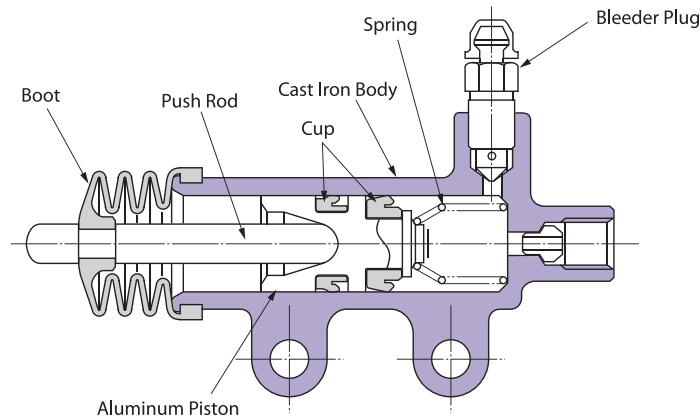
Optimal hydraulic pressure may not be achieved due to damaged internal parts, resulting in incorrect operation and injury.

## Function



The clutch release cylinder (also known as the clutch slave cylinder) is the component that transfers hydraulic pressure, achieved through the clutch master cylinder, into a mechanical force to control the clutch fork. The force from the release cylinder engages and releases engine power to the transmission.

## Structure and Components



The clutch release cylinder is composed of the piston, cups, spring, and push rod, built within a precision machined body and covered with a boot. The boot provides protection from dirt, dust and debris from contaminating the push rod and piston. When the clutch pedal is pressed and the fluid pressure reaches the release cylinder, the piston moves the push rod out to apply force onto the clutch fork which releases the clutch. When the clutch pedal is released, the hydraulic pressure and the force of the return spring pulls back the push rod and sends back the fluid to the master cylinder, therefore engaging the clutch.

# 31 Installation Procedure

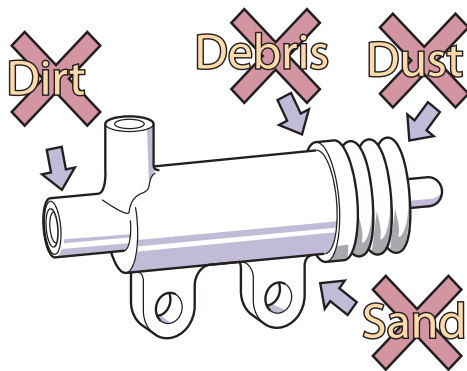


## CAUTION!

Failure to follow recommended procedures may cause clutch failure and injury. Always consult the manufacturer's vehicle specific service manual for reference.

### 1

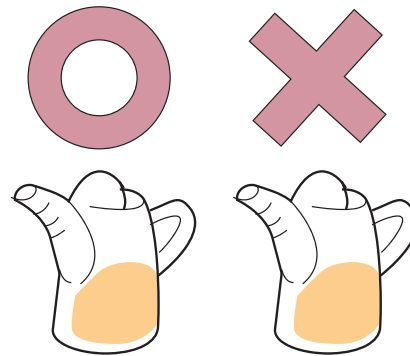
Do not allow dust, dirt, and debris to enter the cylinder or reservoir tank.



Internal damage may occur, resulting in fluid leakage and improper hydraulic pressure

### 2

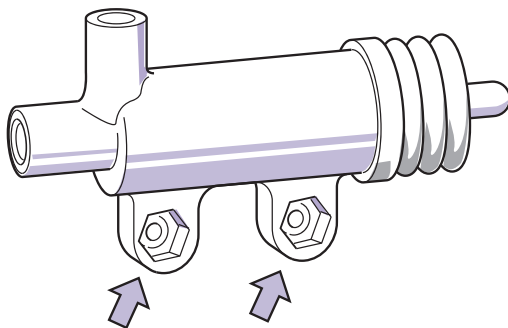
Always use vehicle manufacturer specified fluid.



Sealing can be impaired if mineral additives are mixed with fluid which can cause clutch failure.

### 3

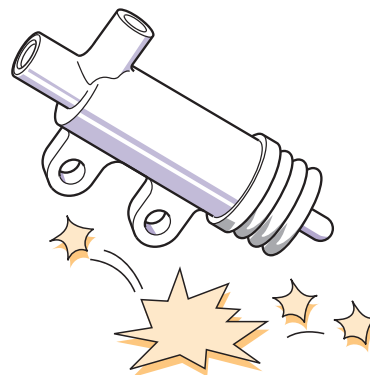
Tighten bolts, nuts, and screws as specified by the manufacturer's vehicle specific manual.



Damage of screws and threads may cause improper function.

### 4

Handle with care. Clutch release cylinders are precision manufactured. Do not drop or deform. Never use a damaged unit.

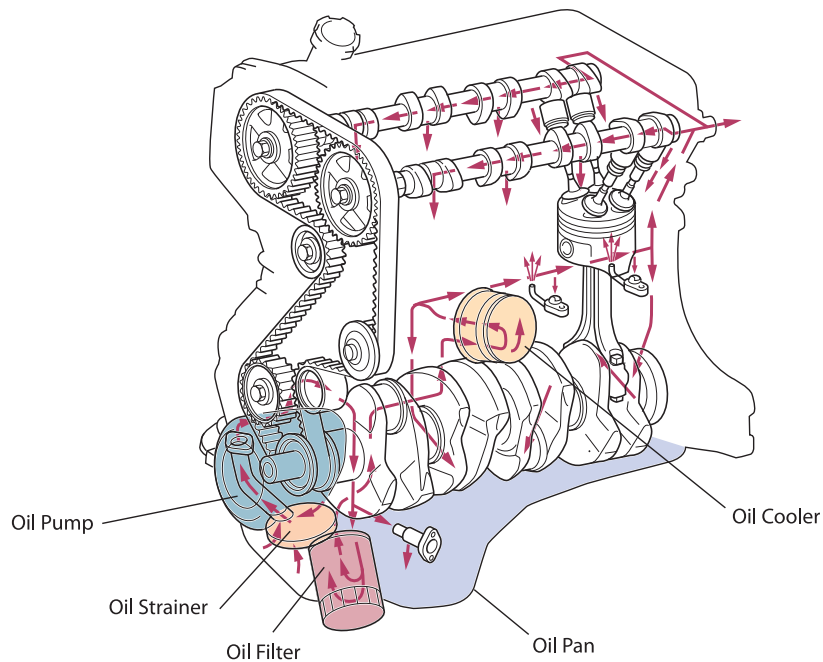


Optimal hydraulic pressure may not be achieved due to damaged internal parts, resulting in incorrect operation.



## Operation Diagram

The oil pump is the vital component that provides the circulation of oil which cools, cleans and lubricates internal engine components. In some engines, the oil pump also provides hydraulic power to valve lifters and valve timing components. Driven by crankshaft power, the pump creates suction to draw oil from the oil pan through the strainer. The suction by the pump creates the pressure where oil is driven through the oil filter, oil cooler, internal moving parts, provide hydraulic power, then collected back into the oil pan.



## Drive Systems

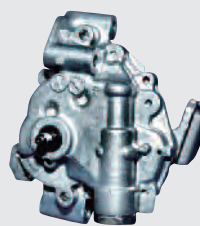
Various systems are utilized to transfer power from the crankshaft to the oil pump. The type of drive system influences the configuration and location of the oil pump.



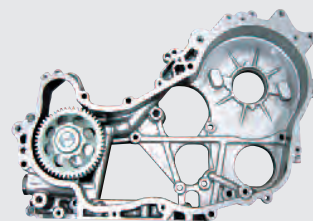
Direct Crankshaft Drive



Integral Unit with W/P  
(Front Module)



Chain Drive



Gear Drive  
(Integral Unit with Gear Case)



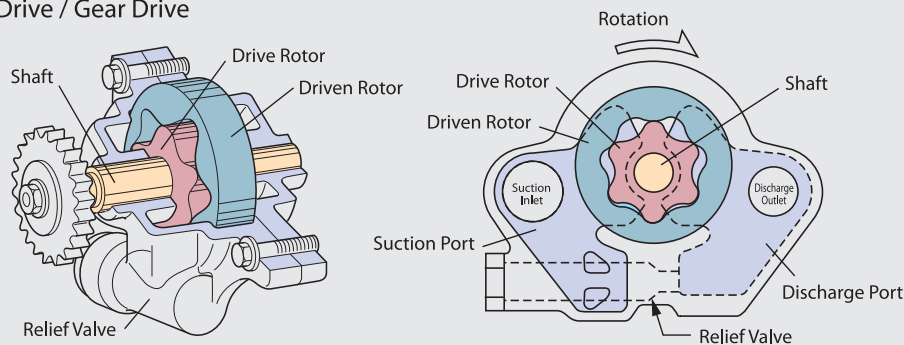
# 33 Operation Diagram

## Structure and Components

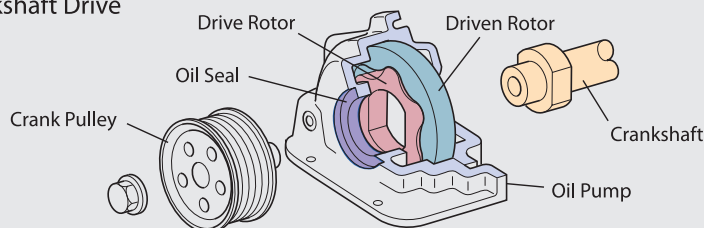
The basic structure of the oil pump consists of a sprocket (drive rotor) which revolves within a housing (driven rotor). The complex geometry of the rotor and the housing creates suction. Depending on the type of oil pump drive system, the rotor can receive power through a shaft that is connected to a pulley, a gear, a sprocket or directly into the crankshaft. When the rotor is revolved, oil is drawn in from the suction port and expelled into the discharge port. This process creates oil pressure to supply oil to the moving components of the engine. A relief valve is strategically configured in between the ports to prevent excessive pressure build-up and maintain optimal operating oil pressure.

### Oil Pump Configuration

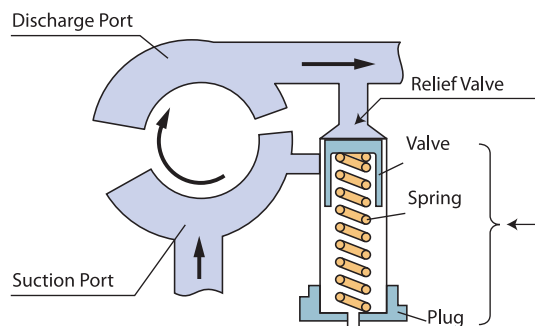
#### Chain Drive / Gear Drive



#### Direct Crankshaft Drive



### Relief Valve Configuration



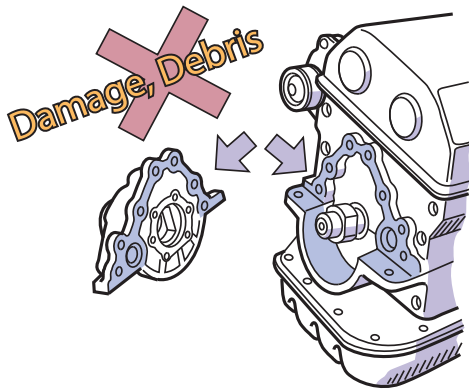
The relief valve is configured to prevent excessive oil pressure. The excess pressure along the discharge port compresses the relief valve spring to open the valve, relieving pressure by re-circulating the oil back into the suction port.

## CAUTION!

Failure to follow recommended procedures may cause engine failure and injury. Always consult the manufacturer's vehicle specific service manual for reference.

### 1

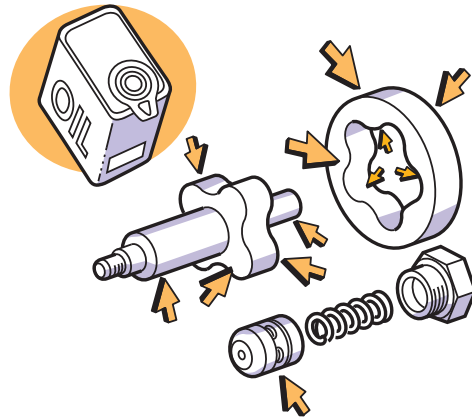
Remove old pump, gaskets and foreign materials left on the mounting surface. Thoroughly clean with non-abrasive solvent. Confirm that the mounting surfaces are free of damage, deformation, and debris.



Damage, deformation, and debris on mounting surfaces may cause seal malfunction which will create oil leakage and lower oil pressure.

### 2

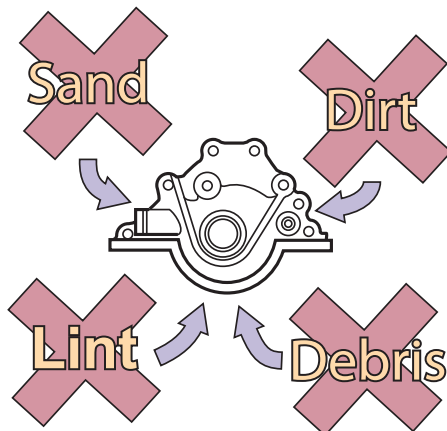
Always use engine oil to lubricate the sliding and rotating components of the oil pump when installing, disassembling, or cleaning.



Lubricating surfaces will prevent pump seizure and suction failure.

### 3

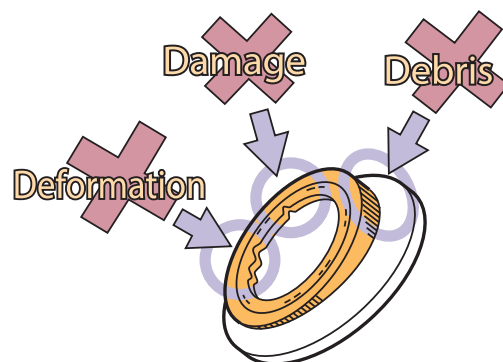
Ensure that there are no contaminants or debris in the pump before installation.



Contaminants and debris will cause damage to rotors. Consequently, improper valve operations and abnormal pressure may occur.

### 4

Check for damage, deformation, and debris along the oil seal mounting areas. Install oil seal and confirm proper seating.



Improper seating will cause oil leakage and loss of oil pressure.



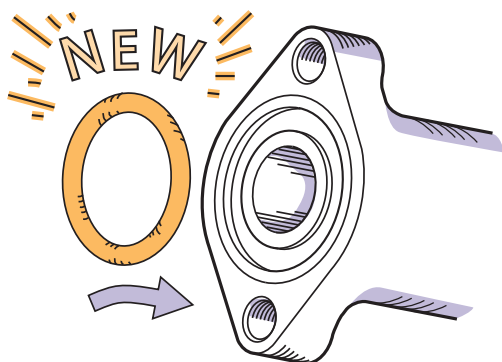
# 35 Operation Diagram

## CAUTION!

Failure to follow recommended procedures may cause engine failure and injury. Always consult the manufacturer's vehicle specific service manual for reference.

### 5

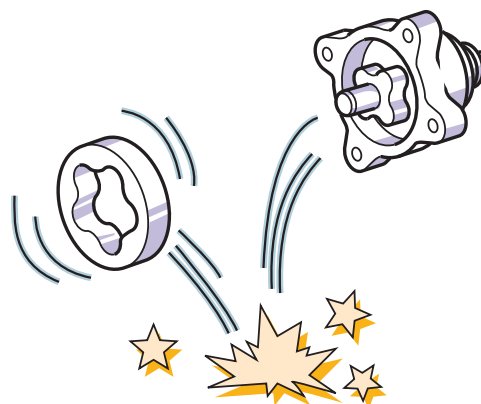
Always use new O-rings and gaskets when installing an oil pump. Ensure the O-ring does not pinch between mounting surfaces during installation.



Pinched oil rings will cause oil leaks and lower oil pressure.

### 6

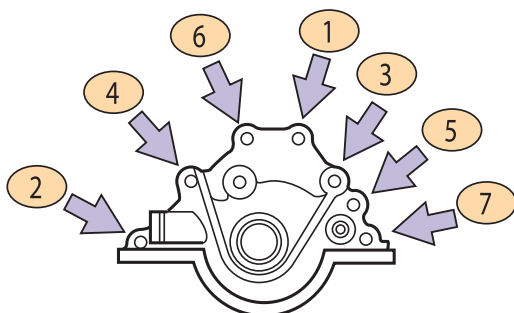
Oil pump rotors are precision components that require care in handling. Take extreme caution when inspecting and installing.



Damaged rotors will cause improper rotation and incorrect oil pressure.

### 7

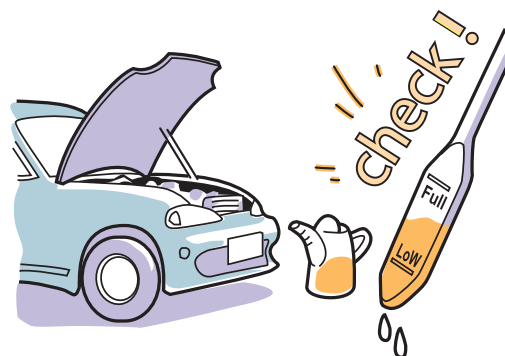
Install the oil pump in a diagonal (star) pattern. Always follow the manufacturer's vehicle specific recommended torque tools, procedures, and specifications.



Following correct procedures prevents leakage from the mounting surface, oil pump body, and body fractures caused by over-torque.

### 8

After the installation of the oil pump, start and idle the engine until operating temperature has been reached. Stop the engine and check the oil level. Add oil to proper level.



Circulating the oil after replacing the pump bleeds trapped air within the engine. Adding oil to the proper level prevents engine damage and ensures optimal performance.

# **AISIN**

## *Part Number Legend*

*The first two letters of the AISIN Part Number reflect the product category.  
The third letter reflects the make and model.*

### **PRODUCT**

- CK - Clutch Kit**
- CM - Clutch Master Cylinder**
- CR - Clutch Release Cylinder**
- FH - Free Wheel Hub**
- OP - Oil Pump**
- TC - Timing Chain Cover**
- ATF - Automatic Transmission Fluid**
- VS - Vacuum Switching Value**

### **MAKE**

- C - CHRYSLER - Dodge, Plymouth**
- D - DAIHATSU**
- F - SUBARU - Saab**
- G - ISUZU - Acura, Chevrolet, GMC, Honda**
- H - HONDA - Acura, Isuzu, Sterling, Saturn**
- K - KIA**
- M - MITSUBISHI - Chrysler, Dodge, Eagle,  
Hyundai, Plymouth**
- N - NISSAN - Infiniti, Mercury**
- S - SUZUKI - Chevrolet, Geo**
- T - TOYOTA - Lexus, Scion, Chevrolet, Geo**
- V - VOLVO**
- Y - HYUNDAI**
- Z - MAZDA - Ford, Kia**



# Clutch Kit



Engineered to exacting OE Specifications, AISIN Clutch Kits combines ideal clutch components to deliver optimal drivetrain efficiency. Providing ideal power transfer with precise pedal feel, AISIN Clutch Kits are always OE Matched.

**Kit Includes:** AISIN Clutch Cover & Disc, Release Bearing, Pilot Bearing (if required), & Alignment Tool.

- Premium quality AISIN Clutch Cover and Disc conveniently packaged in one box.
- OE quality bearing(s) and vehicle specific alignment tool included for trouble-free installation.
- Innovative packaging with dual layer inserts, patented CLEARPAK for easy viewing and support (no cutting required), and hologram sticker for authenticity.







# Clutch Kit Applications

Clutch Kit

Make/Model	Year	Engine	Attributes	Drive System	Notes	Part #
<b>Lexus</b>						
ES250	1990-1991	2.5L V6 2508cc	2VZFE	FWD	From 06/89; Thru 06/91	CKT-042
ES300	1992-1993	3.0L V6 2959cc	3VZFE	FWD	From 07/91; Thru 06/93	CKT-029
IS250	2006-2011	2.5L V6 2499cc	4GRFSE	RWD		CKT-064
IS300	2002-2005	3.0L L6 2997cc	2JZGE	RWD		CKT-039
SC300	1992	3.0L L6 2997cc	2JZGE	RWD		CKT-038
	1993-1997	3.0L L6 2997cc	2JZGE	RWD	From 05/93; Thru 09/97	CKT-038
<b>Scion</b>						
tC	2010	2.4L L4 2362cc	2AZFE	FWD		CKT-063
	2005-2006	2.4L L4 2398cc	2AZFE	FWD	From 05/04; Thru 04/06	CKT-044
	2007-2009	2.4L L4 2398cc	2AZFE	FWD		CKT-063
xA	2004-2006	1.5L L4 1497cc	1NZFE	FWD	From 03/04; Thru 12/06	CKT-045
xB	2004-2006	1.5L L4 1497cc	1NZFE	FWD	From 03/04; Thru 12/06	CKT-045
	2008-2010	2.4L L4 2362cc	2AZFE	FWD		CKT-063
xD	2008-2010	1.8L L4 1798cc	2ZRFE	FWD	From 06/07	CKT-062
<b>Toyota</b>						
4Runner	1984	2.4L L4 2366cc	22R	RWD	From 08/83; Thru 07/84	CKT-023
	1984	2.4L L4 2366cc	22R	RWD	From 08/84; Thru 01/88	CKT-024
	1985-1988	2.4L L4 2366cc	22REC	RWD	From 08/84; Thru 01/88	CKT-024
			22RTEC	4WD	From 08/85; Thru 03/89	CKT-037
	1990-1992	2.4L L4 2366cc	22RE	RWD	224mm Disc	CKT-022
	1993-1995	2.4L L4 2366cc	22RE	4WD	239mm Disc; From 08/92; Thru 11/95	CKT-049
	1996-2000	2.7L L4 2694cc	3RZFE	4WD	From 11/95; Thru 08/00	CKT-051
	1988-1995	3.0L V6 2959cc	3VZE	4WD	From 11/87; Thru 11/95	CKT-016
1996-2002	3.4L V6 3378cc	5VZFE	RWD	From 11/95; Thru 08/02	CKT-040	
Camry	1984-1986	1.8L L4 1839cc	1CTLG	FWD	Thru 5/86	CKT-030
	1986	2.0L L4 1974cc	2CTLG	FWD	Thru 5/86	CKT-030
	1983-1986	2.0L L4 1995cc	2SELC	FWD	From 01/83; Thru 08/86	CKT-030
	1990	2.0L L4 1998cc	3SFE	FWD	To 04/90	CKT-030
	1990-1991	2.0L L4 1998cc	3SFE	FWD	From 05/90	CKT-031
	1987-1988	2.0L L4 1998cc	3SFE	FWD	From 08/86; Thru 08/88	CKT-030
	1988-1990	2.0L L4 1998cc	3SFE	4WD	From 10/87; Thru 05/90	CKT-015
	1992-2001	2.2L L4 2164cc	5SFE	FWD	From 09/91; Thru 07/01	CKT-027
	2002-2006	2.4L L4 2362cc	2AZFE	FWD	From 07/01; Thru 02/06; Stamped Steel Release Fork	CKT-044
	2007-2008	2.4L L4 2362cc	2AZFE	FWD	From 07/06; Thru 03/08; Cast Iron Release Fork	CKT-044A
	2009	2.4L L4 2362cc	2AZFE; LE	FWD	Note: Cast Iron Release Fork.	CKT-044A
	1988-1991	2.5L V6 2508cc	2VZFE	FWD	From 02/88; Thru 06/91	CKT-042
	1992-1993	3.0L V6 2959cc	3VZFE	FWD	From 06/91; Thru 09/93	CKT-029
	1996-2001	3.0L V6 2995cc	1MZFE	FWD	From 07/96; Thru 07/01	CKT-029
Celica	1990-1991	1.6L L4 1587cc	4AFE; ST	FWD	From 09/89; Thru 05/91	CKT-046
	1991-1993	1.6L L4 1587cc	4AFE; ST	FWD	From 08/91; Thru 09/93	CKT-047
	1994-1997	1.8L L4 1762cc	7AFE; ST	FWD	From 09/93; Thru 12/97	CKT-034A
	2000-2005	1.8L L4 1794cc	1ZZFE; GT	FWD	From 08/99; Thru 07/05	CKT-034A
	1986	2.0L L4 1995cc	2SELC	FWD	From 08/85; Thru 08/86	CKT-030
	1987-1989	2.0L L4 1998cc	3SFE	FWD	From 08/86; Thru 08/89	CKT-030
	1986-1989	2.0L L4 1998cc	3SGELC; GTS	FWD	From 08/85; Thru 08/89	CKT-028
	1989-1990	2.0L L4 1998cc	3SGTE; Turbocharged	AWD	From 10/89; Thru 05/90	CKT-029
	1990-1993	2.0L L4 1998cc	3SGTE; Turbocharged	FWD	From 06/90; Thru 09/93	CKT-069



**Make/Model    Year    Engine    Attributes    Drive System    Notes    Part #**

**Toyota**

Celica	1990	2.2L L4 2164cc	5SFE	FWD	From 09/89; Thru 05/90	CKT-028
	1990-1992	2.2L L4 2164cc	5SFE	FWD	From 05/90; Thru 09/93	CKT-027
	1993	2.2L L4 2164cc	5SFE	FWD	From 05/90; Thru 12/98	CKT-027
	1994-1999	2.2L L4 2164cc	5SFE	FWD	From 01/93; Thru 12/98	CKT-027
	1981-1983	2.4L L4 2366cc	22R	RWD	From 08/82; Thru 06/85	CKT-018
	1983-1985	2.4L L4 2366cc	22REC	RWD	From 08/82; Thru 06/85	CKT-018
	1982-1985	2.8L L6 2754cc	5MGE; Supra	RWD	From 08/81; Thru 12/85	CKT-048
Corolla	1983-1987	1.6L L4 1587cc	4AC	RWD	From 08/83; Thru 07/87	CKT-009
	1988-1989	1.6L L4 1587cc	4AF	FWD	From 08/87; Thru 06/91	CKT-006
	1988-1992	1.6L L4 1587cc	4AFE	AWD	From 02/88; Thru 08/92	CKT-012
	1990-1991	1.6L L4 1587cc	4AFE	FWD	From 08/87; Thru 06/91	CKT-006
	1991-1992	1.6L L4 1587cc	4AFE	FWD	From 05/91; Thru 08/92	CKT-013
	1992-1997	1.6L L4 1587cc	4AFE	FWD	From 06/92; Thru 08/97	CKT-047
	1988-1989	1.6L L4 1587cc	4AGE; GTS	FWD	From 08/87; Thru 08/89	CKT-002
	1989-1991	1.6L L4 1587cc	4AGE; GTS	FWD	From 08/89; Thru 06/91	CKT-035
	1986-1987	1.6L L4 1587cc	4AGEC; Sport GTS	RWD	From 08/84; Thru 07/87	CKT-001
	1987-1988	1.6L L4 1587cc	4AGELC; FX16	FWD	From 09/86; Thru 08/88	CKT-002
			4AGELC; FX16 GTS	FWD	From 08/87; Thru 08/89	CKT-002
	1984-1987	1.6L L4 1587cc	4ALC	FWD	From 08/83; Thru 07/87	CKT-007
	1987-1988	1.6L L4 1587cc	4ALC	FWD	From 02/87; Thru 08/88	CKT-008
	1985	1.6L L4 1587cc	4AGEC; Sport GTS	RWD	From 08/84; Thru 07/87	CKT-001
	1993-1997	1.8L L4 1762cc	7AFE	FWD	From 06/92; Thru 08/97	CKT-034A
	1998-2006	1.8L L4 1794cc	1ZZFE	FWD	From 08/97; Thru 12/07	CKT-034A
	2007-2008	1.8L L4 1794cc	1ZZFE	FWD	From 08/97; Thru 01/08	CKT-034A
	2005-2006	1.8L L4 1795cc	2ZZGE	FWD	From 05/04; Thru 07/06	CKT-070
	1984-1985	1.8L L4 1839cc	1CLC; DIESEL	FWD	From 08/83; Thru 08/85	CKT-011
	2009	2.4L L4 2362cc	2AZFE	FWD	Note: Stamped Steel Release Fork	CKT-044
2010	2.4L L4 2362cc	2AZFE; XRS	FWD	Note: Stamped Steel Release Fork	CKT-044	
Cressida	1983-1987	2.8L L6 2754cc	5MGE	RWD	From 08/84; Thru 08/87	CKT-048
Echo	2000	1.5L L4 1497cc	1N2FE	FWD	From 04/00; Thru 11/05	CKT-045
	2001-2005	1.5L L4 1497cc	1N2FE	FWD	From 09/01; Thru 11/05	CKT-045
FJ Cruiser	2007-2010	4.0L V6 3956cc	1GRFE; 6 spd	RWD	From 01/2006; To 11/2010	CKT-057
Land Cruiser	1981-1987	4.2L L6 4227cc	2F	4WD	From 08/80; To 08/1987	CKT-032
Matrix	2003-2007	1.8L L4 1794cc	1ZZFE	FWD	From 01/02; Thru 12/07	CKT-034B
	2003-2005	1.8L L4 1795cc	2ZZGE	FWD	From 01/02; Thru 11/05	CKT-070
	2009-2010	2.4L L4 2362cc	2AZFE	FWD	Note: Stamped Steel Release Fork	CKT-044
MR2	1985	1.6L L4 1587cc	4AGELC	RWD	From 12/84; Thru 06/85	CKT-002
	1985-1989	1.6L L4 1587cc	4AGELC	RWD	From 06/85; Thru 12/89	CKT-035
	1988-1989	1.6L L4 1587cc	4AGZE; Supercharged	RWD	From 08/87; Thru 12/89	CKT-014
	1991-1995	2.0L L4 1998cc	3SGTE; Turbocharged	RWD	From 01/92; Thru 06/95	CKT-029
	1991-1995	2.2L L4 2164cc	5SFE	RWD	From 06/90; Thru 06/95	CKT-027
MR2 Spyder	2000-2005	1.8L L4 1794cc	1ZZFE	RWD	Including Sequential Shift	CKT-034B
Paseo	1992-1999	1.5L L4 1497cc	5EFE	FWD	From 04/91; Thru 12/99	CKT-008
Pickup	1984-1986	2.4L L4 2366cc	22R	RWD	From 08/84; Thru 01/88	CKT-024
	1985-1988	2.4L L4 2366cc	22R	RWD	From 08/85; Thru 08/88	CKT-019
	1987-1988	2.4L L4 2366cc	22R	4WD	From 08/84; Thru 01/88	CKT-024
	1991	2.4L L4 2366cc	22RE	RWD	224mm Disc; From 08/88; Thru 08/92	CKT-022
	1992-1995	2.4L L4 2366cc	22RE	4WD	239mm Disc; From 08/92; Thru 11/95	CKT-049
	1984-1986	2.4L L4 2366cc	22REC	RWD	From 08/84; Thru 01/88	CKT-024
	1987-1988	2.4L L4 2366cc	22REC	4WD	From 08/84; Thru 01/88	CKT-024
	1985-1987	2.4L L4 2366cc	22RTEC; Turbocharged	RWD	From 03/85; To 04/87	CKT-037
	1986-1987	2.4L L4 2366cc	22RTEC; Turbocharged	4WD	From 03/85; To 04/87	CKT-037
	1987-1988	2.4L L4 2366cc	22RTEC; Turbocharged	RWD	From 05/87; Thru 08/88	CKT-066
	1989-1993	2.4L L4 2366cc	22RE	RWD	224mm Disc; From 08/88; Thru 08/92	CKT-022



**Make/Model Year Engine Attributes Drive System Notes Part #**

**Toyota**

Pickup	1984-1985	2.4L L4 2446cc	22R; DLX	RWD		CKT-017
	1985	2.4L L4 2446cc	2LT; DLX; DIESEL; Turbocharged	RWD		CKT-020
	1988-1995	3.0L V6 2959cc	3VZE	4WD	From 08/88; Thru 11/95	CKT-016
Previa	1991-1993	2.4L L4 2438cc	2TZFE	RWD	From 01/90; Thru 08/93	CKT-050
RAV4	2001-2003	2.0L L4 1998cc	1AZFE	FWD	From 08/00; Thru 07/03	CKT-043
	1996-2000	2.0L L4 1998cc	3SFE	FWD	From 11/95; Thru 08/00	CKT-041
	2004-2005	2.4L L4 2362cc	2AZFE	FWD	From 07/03; Thru 11/05; Stamped Steel Release Fork	CKT-044
Solara	1999-2001	2.2L L4 2164cc	5SFE	FWD	From 06/98; Thru 07/01	CKT-027
	2002	2.4L L4 2362cc	2AZFE	FWD	From 07/01; Thru 05/06; Cast Iron Release Fork	CKT-044
	2003-2006	2.4L L4 2362cc	2AZFE	FWD	From 07/01; Thru 05/06; Stamped Steel Release Fork	CKT-044
	2007-2008	2.4L L4 2362cc	2AZFE	FWD	From 07/06; Thru 03/08; Cast Iron Release Fork	CKT-044A
	1999-2002	3.0L V6 2995cc	1MZFE	FWD	From 06/98; Thru 07/02	CKT-029
Supra	1986-1992	3.0L L6 2954cc	7MGE	RWD	From 01/86; Thru 05/93	CKT-036
	1988-1992	3.0L L6 2954cc	7MGTE; Turbocharged	RWD	From 08/88; Thru 05/93	CKT-052
	1993-1998	3.0L L6 2997cc	2JZGE; 5 spd	RWD	From 05/93; Thru 09/97	CKT-038
	1993-1998	3.0L L6 2997cc	2JZGTE; Twin Turbo	RWD	From 05/93; Thru 08/98	CKT-053
T100	1994-1998	2.7L L4 2694cc	3RZFE	RWD	From 10/93; Thru 07/98	CKT-051
	1993-1994	3.0L V6 2959cc	3VZE	RWD	From 08/92; Thru 08/94	CKT-016
	1993-1994	3.0L V6 2959cc	3VZE	4WD	From 08/92; Thru 08/94	CKT-056
	1995-1998	3.4L V6 3378cc	5VZFE	RWD	From 08/94; Thru 07/98	CKT-040
Tacoma	1995-2004	2.4L L4 2438cc	2RZFE	RWD	From 01/95; Thru 09/04	CKT-050
	2005-2008	2.7L L4 2694cc	2TRFE	RWD	From 09/04; Thru 03/08	CKT-056
	1995-2004	2.7L L4 2694cc	3RZFE	4WD	From 01/95; Thru 09/94	CKT-051
	1995-2004	3.4L V6 3378cc	5VZFE	RWD	From 01/95; Thru 09/04	CKT-040
	2005-2008	4.0L V6 3956cc	1GRFE; 5 spd	RWD	From 09/04; Thru 03/08	CKT-056
						CKT-065
Tercel	2005-2009	4.0L V6 3956cc	1GRFE; 6 spd	RWD	From 09/04; Thru 01/09	CKT-055
	1988	1.5L L4 1452cc	3AC	FWD		CKT-010
	1983-1986	1.5L L4 1452cc	3AC	FWD	From 02/83; Thru 02/86	CKT-010
	1987	1.5L L4 1452cc	3AC; SR5	4WD		CKT-010
	1987-1988	1.5L L4 1456cc	3E	FWD	Axle Trans Code 682; From 08/86; Thru 08/88	CKT-067
	1989	1.5L L4 1456cc	3E; EZ	FWD	From 08/88; Thru 09/90	CKT-004
	1990-1994	1.5L L4 1456cc	3EE; 4 spd	FWD	From 09/90; Thru 09/94	CKT-008
	1990-1994	1.5L L4 1456cc	3EE; 5 spd	FWD	From 09/90; Thru 09/94	CKT-068
	1990	1.5L L4 1456cc	3EE; EZ	FWD	From 08/88; Thru 09/90	CKT-004
	1987-1988	1.5L L4 1456cc	3E; DLX	FWD	From 08/86; Thru 08/88	CKT-003
	1988	1.5L L4 1456cc	3E; EZ	FWD	From 08/88; Thru 09/90	CKT-004
	1987-1988	1.5L L4 1456cc	3E; Std	FWD	From 08/86; Thru 08/88	CKT-003
Tundra	1995-1998	1.5L L4 1497cc	5EFE	FWD	From 09/94; Thru 12/98	CKT-008
	2000-2004	3.4L V6 3378cc	5VZFE	RWD	From 02/99; Thru 08/04	CKT-040
	2005-2006	4.0L V6 3956cc	1GRFE	RWD	From 08/04; Thru 10/06	CKT-055
Van	2006-2010	4.0L V6 3956cc	1GRFE; 6 spd	RWD	To 11/2010	CKT-057
	1984-1985	2.0L L4 1998cc	3YEC	RWD	From 08/83; Thru 08/85	CKT-018
	1986-1988	2.2L L4 2237cc	4YEC	RWD	From 08/85; Thru 08/88	CKT-025
Yaris	1988-1989	2.2L L4 2237cc	4YEC	RWD	From 09/88; Thru 01/90	CKT-026
	2006-2010	1.5L L4 1497cc	1NZFE	FWD	From 02/06	CKT-058

Clutch Kit



# Clutch Kit Images

Clutch Kit





# Clutch Kit Images

Clutch Kit



CKT-014



CKT-015



CKT-016



CKT-017



CKT-018



CKT-019



CKT-020



CKT-022



CKT-023



CKT-024



CKT-025



CKT-026



# Clutch Kit Images



CKT-027



CKT-028



CKT-029



CKT-030



CKT-031



CKT-032



CKT-034A



CKT-034B



CKT-035



CKT-036



CKT-037



CKT-038



# Clutch Kit Images

Clutch Kit



CKT-039



CKT-040



CKT-041



CKT-042



CKT-043



CKT-044



CKT-044A



CKT-045



CKT-046



CKT-047



CKT-048



CKT-049



# Clutch Kit Images

Clutch Kit









# Buyer's Guide

Clutch Kit

## Clutch Kit

Part #	Year	Application	Part #	Year	Application
CKT-001	1985-1987	Toyota Corolla	CKT-034A	1994-1997, 2000-2005	Toyota Celica
CKT-002	1985-1985	Toyota MR2	CKT-034B	2000-2005	Toyota MR2 Spyder
CKT-002	1987-1989	Toyota Corolla	CKT-034B	2003-2007	Toyota Matrix
CKT-003	1987-1988	Toyota Tercel	CKT-035	1985-1989	Toyota MR2
CKT-004	1988-1990	Toyota Tercel	CKT-035	1989-1991	Toyota Corolla
CKT-006	1988-1991	Toyota Corolla	CKT-036	1986-1992	Toyota Supra
CKT-007	1984-1987	Toyota Corolla	CKT-037	1985-1987	Toyota Pickup
CKT-008	1987-1988	Toyota Corolla	CKT-037	1985-1988	Toyota 4Runner
CKT-008	1990-1998	Toyota Tercel	CKT-038	1992-1997	Lexus SC300
CKT-008	1992-1999	Toyota Paseo	CKT-038	1993-1998	Toyota Supra
CKT-009	1983-1987	Toyota Corolla	CKT-039	2002-2005	Lexus IS300
CKT-010	1983-1988	Toyota Tercel	CKT-040	1995-1998	Toyota T100
CKT-011	1984-1985	Toyota Corolla	CKT-040	1995-2004	Toyota Tacoma
CKT-012	1988-1992	Toyota Corolla	CKT-040	1996-2002	Toyota 4Runner
CKT-013	1991-1992	Toyota Corolla	CKT-040	2000-2004	Toyota Tundra
CKT-014	1988-1989	Toyota MR2	CKT-041	1996-2000	Toyota RAV4
CKT-015	1988-1990	Toyota Camry	CKT-042	1988-1991	Toyota Camry
CKT-016	1988-1995	Toyota 4Runner	CKT-042	1990-1991	Lexus ES250
CKT-016	1988-1995	Toyota Pickup	CKT-043	2001-2003	Toyota RAV4
CKT-016	1993-1994	Toyota T100	CKT-044	2002-2006	Toyota Camry
CKT-017	1984-1985	Toyota Pickup	CKT-044	2002-2006	Toyota Solara
CKT-018	1981-1985	Toyota Celica	CKT-044	2004-2005	Toyota RAV4
CKT-018	1984-1985	Toyota Van	CKT-044	2005-2006	Scion tC
CKT-019	1985-1988	Toyota Pickup	CKT-044	2009-2010	Toyota Corolla
CKT-020	1985-1985	Toyota Pickup	CKT-044	2009-2010	Toyota Matrix
CKT-022	1989-1993	Toyota Pickup	CKT-044A	2007-2008	Toyota Solara
CKT-022	1990-1992	Toyota 4Runner	CKT-044A	2007-2009	Toyota Camry
CKT-023	1984-1984	Toyota 4Runner	CKT-045	2000-2005	Toyota Echo
CKT-024	1984-1988	Toyota 4Runner	CKT-045	2004-2006	Scion xA
CKT-024	1984-1988	Toyota Pickup	CKT-045	2004-2006	Scion xB
CKT-025	1986-1988	Toyota Van	CKT-046	1990-1991	Toyota Celica
CKT-026	1988-1989	Toyota Van	CKT-047	1991-1993	Toyota Celica
CKT-027	1990-1999	Toyota Celica	CKT-047	1992-1997	Toyota Corolla
CKT-027	1991-1995	Toyota MR2	CKT-048	1982-1985	Toyota Celica
CKT-027	1992-2001	Toyota Camry	CKT-048	1983-1987	Toyota Cressida
CKT-027	1999-2001	Toyota Solara	CKT-049	1992-1995	Toyota Pickup
CKT-028	1986-1990	Toyota Celica	CKT-049	1993-1995	Toyota 4Runner
CKT-029	1989-1990	Toyota Celica	CKT-050	1991-1993	Toyota Previa
CKT-029	1991-1995	Toyota MR2	CKT-050	1995-2004	Toyota Tacoma
CKT-029	1992-1993	Lexus ES300	CKT-051	1994-1998	Toyota T100
CKT-029	1992-1993, 1996-2001	Toyota Camry	CKT-051	1995-2004	Toyota Tacoma
CKT-029	1999-2002	Toyota Solara	CKT-051	1996-2000	Toyota 4Runner
CKT-030	1983-1988, 1990	Toyota Camry	CKT-052	1988-1992	Toyota Supra
CKT-030	1986-1989	Toyota Celica	CKT-053	1993-1998	Toyota Supra
CKT-031	1990-1991	Toyota Camry	CKT-055	2005-2006	Toyota Tundra
CKT-032	1981-1987	Toyota Land Cruiser	CKT-055	2005-2009	Toyota Tacoma
CKT-034A	1993-2008	Toyota Corolla	CKT-056	1993-1994	Toyota T100
CKT-034A	1994-1997	Toyota Celica	CKT-056	2005-2008	Toyota Tacoma







# Clutch Kit Components

AISIN Kit #	Cover	Disc	Release Bearing	Pilot Bearing	Clutch Tool
-------------	-------	------	-----------------	---------------	-------------

CKT-001	CTX-005	DT-123V	YES	YES	YES
CKT-002	CTX-005	DT-123V	YES	N/A	YES
CKT-003	CTX-011	DT-009	YES	N/A	YES
CKT-004	CTX-066	DT-124V	YES	N/A	YES
CKT-006	CTX-014	DT-123V	YES	N/A	YES
CKT-007	CTX-014	DT-123V	YES	YES	YES
CKT-008	CTX-014	DT-123V	YES	N/A	YES
CKT-009	CTX-014	DT-123V	YES	YES	YES
CKT-010	CT-018	DT-009	YES	YES	YES
CKT-011	CTX-041	DTX-030L	YES	N/A	YES
CKT-012	CT-055	DTX-058	YES	N/A	YES
CKT-013	CT-055	DTX-058	YES	N/A	YES
CKT-014	CT-056	DTX-058	YES	N/A	YES
CKT-015	CTX-118	DT-068	YES	N/A	YES
CKT-016	CTX-094	DTX-099L	YES	YES	YES
CKT-017	CTX-061	DTX-106L	YES	YES	YES
CKT-018	CTX-061	DT-129V	YES	YES	YES
CKT-019	CTX-062	DT-036	YES	YES	YES
CKT-022	CTX-062	DTX-106L	YES	YES	YES
CKT-023	CTX-061	DTX-117	YES	YES	YES
CKT-024	CTX-062	DTX-117	YES	YES	YES
CKT-026	CTX-061	DT-129V	YES	YES	YES
CKT-027	CTX-067	DT-100V	YES	N/A	YES
CKT-028	CTX-067	DT-100V	YES	N/A	YES
CKT-029	CTX-130	DT-068	YES	N/A	YES
CKT-030	CTX-071	DT-100V	YES	N/A	YES
CKT-031	CTX-071	DT-100V	YES	N/A	YES
CKT-032	CTX-084	DT-075	YES	YES	YES
CKT-034A	CTX-088	DT-031V	YES	N/A	YES
CKT-034B	CTX-088	DT-031V	YES	N/A	YES
CKT-035	CTX-088	DT-031V	YES	N/A	YES
CKT-036	CTX-097	DT-064	YES	YES	YES
CKT-037	CTX-097	DT-064	YES	YES	YES
CKT-038	CTX-097	DT-088	YES	YES	YES
CKT-039	CTX-097	DT-156	YES	YES	YES
CKT-040	CTX-107	DTX-136	YES	YES	YES
CKT-041	CTX-118	DT-068	YES	N/A	YES
CKT-042	CTX-123	DT-068	YES	N/A	YES
CKT-043	CTX-123	DTX-154	YES	N/A	YES
CKT-044	CTX-123	DTX-154	YES	N/A	YES
CKT-044A	CTX-123	DTX-188	YES	N/A	YES
CKT-045	CTX-066	DT-031V	YES	N/A	YES
CKT-046	CTX-066	DT-124V	YES	N/A	YES
CKT-047	CTX-066	DT-124V	YES	N/A	YES
CKT-048	CTX-076	DT-064	YES	YES	YES
CKT-049	CTX-076	DTX-099L	YES	YES	YES
CKT-050	CTX-076	DTX-099L	YES	YES	YES
CKT-051	CTX-106	DTX-137	YES	YES	YES
CKT-052	CT-150	DT-105	YES	YES	YES

Clutch Kit



# Clutch Hydraulics



AISIN's original equipment technology and know-how is applied to design and engineer hydraulics. Each part is manufactured vehicle specific, ensuring product quality and reliability.

- Precision honing of hydraulic cylinders are monitored under OE quality control standards.
- Anodizing and "Kanigen®" plating of cylinder bodies strengthens surface, ensuring smooth operation of the piston, and resists corrosion.
- Heat resistant and extended life Ethylene Propylene Rubber (EPDM) seals prevent leakage.







# Clutch Master Cylinder Applications

Make/Model	Year	Engine	Attributes	Notes	Part #
<b>Lexus</b>					
ES250	1990-1991	2.5L V6 2508cc	2VZFE		CMT-031
ES300	1992-1993	3.0L V6 2959cc	3VZFE		CMT-023
SC300	1992-1997	3.0L L6 2997cc	2JZGE		CMT-116
SC400	1992-1994	4.0L V8 3967cc	1UZFE		CMT-116
<b>Scion</b>					
tC	2010	2.4L L4 2362cc	2AZFE		CMT-141
	2005-2009	2.4L L4 2398cc	2AZFE		CMT-141
xA	2004-2006	1.5L L4 1497cc	1NZFE		CMT-055
xB	2008-2010	2.4L L4 2362cc	2AZFE		CMT-138
xD	2008-2010	1.8L L4 1798cc	2ZRFE		CMT-150
<b>Toyota</b>					
4Runner	1984	2.4L L4 2366cc	22R		CMT-003
	1985-1989	2.4L L4 2366cc	22REC		CMT-003
	1996-2000	2.7L L4 2694cc	3RZFE		CMT-093
	1990-1994	3.0L V6 2959cc	3VZE		CMT-005
	1989	3.0L V6 2959cc	22REC		CMT-005
	1988	3.0L V6 2959cc	3VZE		CMT-011
	1996-2000	3.4L V6 3378cc	5VZFE		CMT-093
Camry	1984	1.8L L4 1839cc	1CTLC; DIESEL		CMT-031
	1984-1986	2.0L L4 1995cc	2SELC		CMT-031
	1987-1991	2.0L L4 1998cc	3SFE		CMT-031
	1992-1996	2.2L L4 2164cc	5SFE		CMT-023
	1997-2001	2.2L L4 2164cc	5SFE		CMT-020
	2002-2006	2.4L L4 2362cc	2AZFE		CMT-141
	1988-1991	2.5L V6 2508cc	2VZFE		CMT-031
	1992-1993	3.0L V6 2959cc	3VZFE		CMT-023
1997-2001	3.0L V6 2995cc	1MZFE		CMT-020	
Carina	1972-1973	1.6L L4 1588cc	2TC		CMT-047
Celica	1990-1993	1.6L L4 1587cc	4AFE; ST		CMT-009
	1972-1973	1.6L L4 1588cc	2TC		CMT-047
	1994-1997	1.8L L4 1762cc	7AFE; ST		CMT-091
	2000-2005	1.8L L4 1794cc	1ZZFE; GT		CMT-141
			2ZZGE; GTS		CMT-141
	1971	1.9L L4 1898cc	8RC		CMT-047
	1974	2.0L L4 1968cc	18RC		CMT-047
	1990-1993	2.0L L4 1998cc	3SGTE; Turbocharged; AWD		CMT-009
	1994-1999	2.2L L4 2164cc	5SFE; GT		CMT-091
	1990-1993	2.2L L4 2164cc	5SFE; GT; GTS		CMT-009
	1975	2.2L L4 2189cc	20R		CMT-047
	1982-1983	2.4L L4 2366cc	22R		CMT-007
	1984-1985	2.4L L4 2366cc	22REC		CMT-007
	Corolla	1984-1985	1.6L L4 1587cc	4AC; Sport DLX; RWD	
4AC; Sport SR5; RWD					CMT-038
1988		1.6L L4 1587cc	4AF; DLX		CMT-013
1988-1989		1.6L L4 1587cc	4AF; LE		CMT-013
			4AF; SR5		CMT-013
		4AFE; DLX All Trac		CMT-013	



**Make/Model      Year      Engine      Attributes      Notes      Part #**

<b>Toyota</b>					
Corolla	1988-1989	1.6L L4 1587cc	4AFE; SR5 All Trac		CMT-013
	1988	1.6L L4 1587cc	4AGE; GTS		CMT-013
	1985	1.6L L4 1587cc	4AGEC; Sport GTS; RWD		CMT-038
	1987-1988	1.6L L4 1587cc	4AGELC		CMT-007
	1984-1988	1.6L L4 1587cc	4ALC		CMT-007
	1976-1979	1.6L L4 1588cc	2TC		CMT-047
	1975	1.6L L4 1588cc	2TC; DLX		CMT-047
	1993-1997	1.8L L4 1762cc	7AFE; DX		CMT-004
	1980-1982	1.8L L4 1770cc	3TC		CMT-047
	1999-2002	1.8L L4 1794cc	1ZZFE		CMT-004
	2003-2008	1.8L L4 1794cc	1ZZFE		CMT-141
	2005-2006	1.8L L4 1795cc	2ZZGE		CMT-141
	2009-2010	1.8L L4 1798cc	2ZRFE		CMT-138
	2009-2010	2.4L L4 2362cc	2AZFE		CMT-138
Cressida	1985-1987	2.8L L6 2754cc	5MGE		CMT-003
Echo	2000-2004	1.5L L4 1497cc	1NZFE		CMT-055
FJ Cruiser	2007-2010	4.0L V6 3956cc	1GRFE	From 01/2006; To 11/2010	CMT-156
Land Cruiser	1987	2.4L L4 2366cc	2F; HJ60	5-Speed Floor Shift; From 01/83; To 08/87	CMT-016
	1985	3.4L L4 3431cc	3B; BJ60	5-Speed Floor Shift; From 01/83; To 08/87	CMT-016
	1973-1974	3.9L L6 3878cc	F	From 7/70; To 1/75	CMT-041
	1970-1972	3.9L L6 3878cc	FJ	From 7/70; To 1/75	CMT-041
	1975	4.2L L6 4227cc	2F	From 7/70; To 1/75	CMT-041
	1975-1980	4.2L L6 4227cc	2F	From 02/75; To 07/80	CMT-014
	1984-1985	4.2L L6 4227cc	2F	From 08/1980; To 10/1984	CMT-012
	1985-1987	4.2L L6 4227cc	2F	From 11/1984; To 08/1987	CMT-032
	1981-1983	4.2L L6 4227cc	2F	From 08/1980; To 10/1984	CMT-012
	1983-1984	4.2L L6 4228cc	2F; BJ60	5-Speed Floor Shift; From 01/83; To 08/87	CMT-016
1986	4.2L L6 4228cc	2F; HJ60		CMT-016	
Matrix	2003-2008	1.8L L4 1794cc	1ZZFE		CMT-141
	2003-2006	1.8L L4 1795cc	2ZZGE		CMT-141
	2009-2010	1.8L L4 1798cc	2ZRFE		CMT-138
	2009-2010	2.4L L4 2362cc	2AZFE		CMT-138
MR2	1985-1989	1.6L L4 1587cc	4AGELC		CMT-084
	1988-1989	1.6L L4 1587cc	4AGZE		CMT-084
	1991-1995	2.0L L4 1998cc	3SGTE; Turbocharged		CMT-060
	1991-1995	2.2L L4 2164cc	5SFE; Naturally Aspirated		CMT-060
Paseo	1992-1999	1.5L L4 1497cc	5EFE		CMT-008
Pickup	1979-1980	2.2L L4 2189cc	20R		CMT-010
	1981-1983	2.4L L4 2366cc	22R		CMT-010
	1989	2.4L L4 2366cc	22RE		CMT-003
	1990-1995	2.4L L4 2366cc	22RE		CMT-006
	1985-1988	2.4L L4 2366cc	22REC		CMT-003
	1984	2.4L L4 2366cc	2L		CMT-003
	1984-1985	2.4L L4 2446cc	2L; DIESEL		CMT-011
	1988-1989	3.0L V6 2959cc	3VZE		CMT-011
	1990-1995	3.0L V6 2959cc	3VZE		CMT-005
Previa	1991-1993	2.4L L4 2438cc	2TZFE		CMT-049
RAV4	2001-2003	2.0L L4 1998cc	1AZFE		CMT-145
	1996-2000	2.0L L4 1998cc	3SFE		CMT-112
	2004-2005	2.4L L4 2362cc	2AZFE		CMT-145
Solara	1999-2001	2.2L L4 2164cc	5SFE		CMT-020
	2002-2003	2.4L L4 2362cc	2AZFE		CMT-020
	2004-2008	2.4L L4 2362cc	2AZFE		CMT-141
	1999-2003	3.0L V6 2995cc	1MZFE		CMT-020





# Clutch Master Cylinder Images

Clutch Master Cylinder



CMT-003



CMT-004



CMT-005



CMT-006



CMT-007



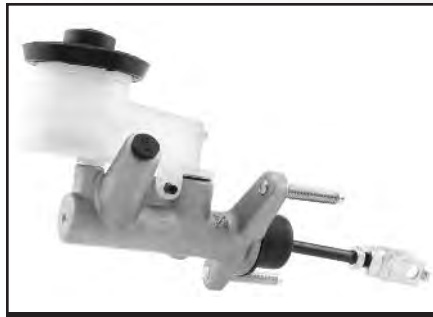
CMT-008





# Clutch Master Cylinder Images

Clutch Master Cylinder



CMT-009



CMT-010



CMT-011



Image not Available

CMT-012



CMT-013



CMT-014

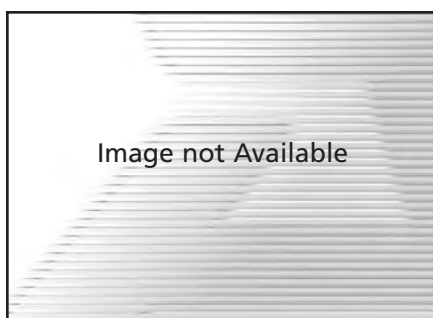


Image not Available





# Clutch Master Cylinder Images

Clutch Master Cylinder



CMT-016



CMT-020



CMT-023



CMT-030



CMT-031



CMT-032





# Clutch Master Cylinder Images

Clutch Master Cylinder



CMT-038



CMT-041



CMT-043



CMT-047



CMT-049



CMT-054





# Clutch Master Cylinder Images

Clutch Master Cylinder



Image not Available

CMT-055



CMT-058



CMT-059



Image not Available



CMT-060

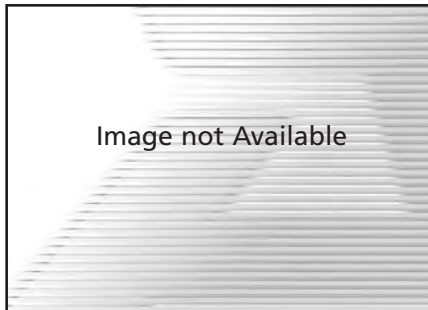


Image not Available

CMT-084

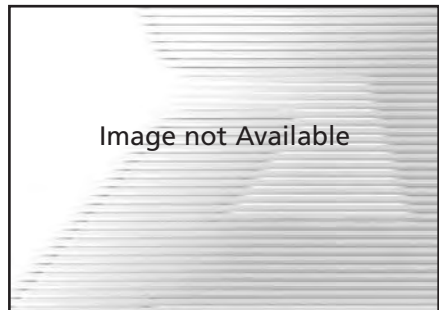


Image not Available

CMT-091

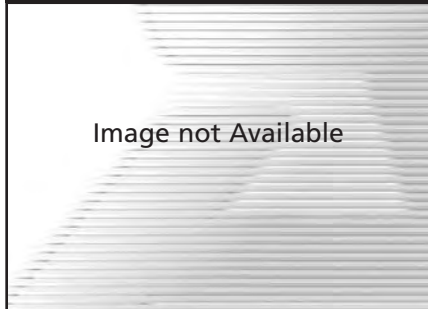


Image not Available

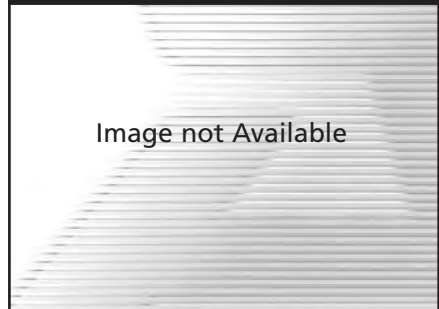


Image not Available





# Clutch Master Cylinder Images

Clutch Master Cylinder



CMT-093

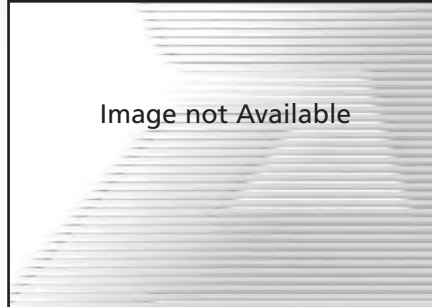


Image not Available

CMT-112

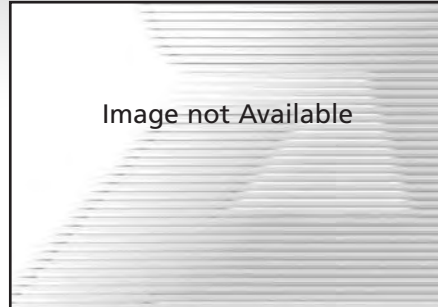


Image not Available

CMT-116



CMT-121

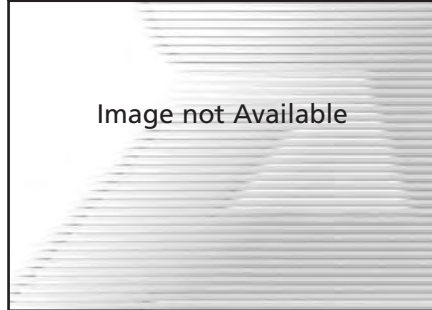


Image not Available

CMT-138

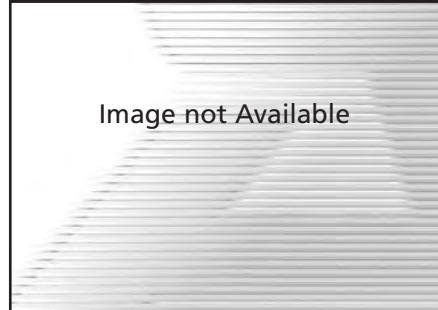


Image not Available

CMT-141







# Buyer's Guide

## Clutch Master Cylinder

Part #	Year	Application	Part #	Year	Application
CMT-003	1984-1989	Toyota 4Runner	CMT-047	1972-1973	Toyota Carina
CMT-003	1985-1987	Toyota Cressida	CMT-047	1971-1975	Toyota Celica
CMT-003	1984-1989	Toyota Pickup	CMT-047	1975-1982	Toyota Corolla
CMT-004	1993-2002	Toyota Corolla	CMT-049	1991-1993	Toyota Previa
CMT-005	1989-1994	Toyota 4Runner	CMT-054	1984-1989	Toyota Van
CMT-005	1990-1995	Toyota Pickup	CMT-055	2004-2006	Scion xA
CMT-006	1990-1995	Toyota Pickup	CMT-055	2000-2004	Toyota Echo
CMT-007	1982-1985	Toyota Celica	CMT-058	1987-1989	Toyota Tercel
CMT-007	1984-1988	Toyota Corolla	CMT-059	1986-1990	Toyota Supra
CMT-008	1992-1999	Toyota Paseo	CMT-060	1991-1995	Toyota MR2
CMT-008	1991-1998	Toyota Tercel	CMT-084	1985-1989	Toyota MR2
CMT-009	1990-1993	Toyota Celica	CMT-091	1994-1999	Toyota Celica
CMT-010	1979-1983	Toyota Pickup	CMT-093	1996-2000	Toyota 4Runner
CMT-011	1988-1988	Toyota 4Runner	CMT-112	1996-2000	Toyota RAV4
CMT-011	1984-1989	Toyota Pickup	CMT-116	1992-1997	Lexus SC300
CMT-012	1981-1985	Toyota Land Cruiser	CMT-116	1992-1994	Lexus SC400
CMT-013	1988-1989	Toyota Corolla	CMT-116	1993-1998	Toyota Supra
CMT-014	1975-1980	Toyota Land Cruiser	CMT-121	2000-2004	Toyota Tundra
CMT-016	1983-1987	Toyota Land Cruiser	CMT-138	2008-2010	Scion xB
CMT-020	1997-2001	Toyota Camry	CMT-138	2009-2010	Toyota Corolla
CMT-020	1999-2003	Toyota Solara	CMT-138	2009-2010	Toyota Matrix
CMT-023	1992-1993	Lexus ES300	CMT-141	2005-2010	Scion tC
CMT-023	1992-1996	Toyota Camry	CMT-141	2002-2006	Toyota Camry
CMT-030	1993-1998	Toyota T100	CMT-141	2000-2005	Toyota Celica
CMT-030	1995-2004	Toyota Tacoma	CMT-141	2003-2008	Toyota Corolla
CMT-031	1990-1991	Lexus ES250	CMT-141	2003-2008	Toyota Matrix
CMT-031	1984-1991	Toyota Camry	CMT-141	2004-2008	Toyota Solara
CMT-032	1985-1987	Toyota Land Cruiser	CMT-145	2001-2005	Toyota RAV4
CMT-038	1984-1985	Toyota Corolla	CMT-150	2008-2010	Scion xD
CMT-041	1970-1975	Toyota Land Cruiser	CMT-150	2007-2010	Toyota Yaris
CMT-043	1989-1990	Toyota Tercel	CMT-156	2007-2010	Toyota FJ Cruiser

Clutch Master Cylinder

### Section Notes

---

---

---

---

---

---

---

---

---

---





# Clutch Release Cylinder Applications

Clutch Release Cylinder

Make/Model	Year	Engine	Attributes	Notes	Part #
<b>Dodge</b>					
Stealth	1992-1996	3.0L V6 2972cc	6G72; R/T Turbo; AWD		CRM-002
	1993	3.0L V6 2972cc	G54B; R/T Turbo; AWD		CRM-002
<b>Geo</b>					
Prizm	1991-1992	1.6L L4 1587cc	4AFE		CRT-005
	1993-1997	1.6L L4 1588cc	G10		CRT-005
	1993-1997	1.8L L4 1788cc	4XC1T		CRT-005
<b>Lexus</b>					
ES250	1990-1991	2.5L V6 2508cc	2VZFE		CRT-010
ES300	1992-1993	3.0L V6 2959cc	3VZFE		CRT-026
IS300	2003-2005	3.0L L6 2997cc	2JZGE		CRT-104
<b>Mitsubishi</b>					
3000GT	1991-1999	3.0L V6 2972cc	6G72		CRM-018
	1991-1999	3.0L V6 2972cc	6G72-T; Turbocharged; VR-4; AWD		CRM-002
	1995-1996	3.0L V6 2972cc	6G72-T; Turbocharged; Spyder VR-4		CRM-002
Eclipse	1990-1992	1.8L L4 1755cc	4G37; Naturally Aspirated		CRM-012
	1993-1994	1.8L L4 1755cc	4G63; Naturally Aspirated		CRM-012
	1992	2.0L L4 1997cc	420A; Naturally Aspirated; GS		CRM-012
	1990-1994	2.0L L4 1997cc	4G63; Naturally Aspirated; GS		CRM-012
			4G63; Turbocharged; GST		CRM-017
			4G63; Turbocharged; GSX		CRM-017
			4G63; Turbocharged; Spyder GST		CRM-017
	1990-1994	2.0L L4 1997cc	4G63T; Turbocharged; GS		CRM-014
	1999	2.0L L4 1997cc	4G63T; Turbocharged; GST		CRM-017
	1990-1994	2.0L L4 1997cc	4G63T; Turbocharged; GSX		CRM-005
	1999	2.0L L4 1997cc	4G63T; Turbocharged; GSX		CRM-017
	1996-1999	2.4L L4 2351cc	4G63T; Turbocharged; Spyder GST		CRM-017
			4G64; Spyder GS		CRM-016
2001-2004	3.0L V6 2972cc	6G72		CRM-029	
Expo	1992-1995	2.4L L4 2351cc	4G64		CRM-016
Expo LRV	1992-1994	1.8L L4 1834cc	4G93		CRM-016
Galant	1992	2.0L L4 1997cc	4G63T; Turbocharged; VR-4		CRM-005
	1994-1998	2.4L L4 2351cc	4G64		CRM-016
Lancer	2005-2006	2.0L L4 1997cc	4G63; Turbocharged; Evolution		CRM-029
	2008-2010	2.0L L4 1998cc	4B11; Turbocharged; Evolution GSR		CRM-029
	2005-2006	2.0L L4 1999cc	4G94; Naturally Aspirated		CRM-025
	2003-2004	2.0L L4 2000cc	4G63T; Turbocharged; Evolution		CRM-029
	2004	2.0L L4 2000cc	4G94; Naturally Aspirated		CRM-025
2005-2006	2.4L L4 2378cc	4G69; Naturally Aspirated		CRM-025	
Mighty Max	1984-1985	2.3L L4 2346cc	4D55		CRM-008
	1984-1985	2.6L L4 2555cc	G54B		CRM-008
	1990-1994	3.0L V6 2972cc	6G72		CRM-013
Mirage	1997-2002	1.5L L4 1468cc	4G15		CRM-020
	2002	1.5L L4 1468cc	4G15; Naturally Aspirated		CRM-025
	1997-2002	1.8L L4 1834cc	4G93		CRM-020
Montero	1984-1985	2.6L L4 2555cc	G54B		CRM-008
	1986-1989	2.6L L4 2555cc	G54B		CRM-009



Make/Model	Year	Engine	Attributes	Notes	Part #
<b>Mitsubishi</b>					
Montero	1992-1996	3.0L V6 2972cc	6G72		CRM-001
Montero Sport	1997-1999	2.4L L4 2351cc	4G64		CRM-009
	1997	3.0L V6 2972cc	6G72		CRM-001
	1998-1999	3.0L V6 2972cc	6G72		CRM-022
Outlander	2005-2006	2.4L L4 2378cc	4G69; Naturally Aspirated		CRM-025
<b>Scion</b>					
tC	2010	2.4L L4 2362cc	2AZFE		CRT-082
	2005-2009	2.4L L4 2398cc	2AZFE		CRT-082
xA	2004-2006	1.5L L4 1497cc	1NZFE		CRT-052
xB	2004-2006	1.5L L4 1497cc	1NZFE		CRT-052
<b>Toyota</b>					
4Runner	1984	2.4L L4 2366cc	22R		CRT-001
	1990-1991	2.4L L4 2366cc	22RE		CRT-001
	1992-1995	2.4L L4 2366cc	22RE		CRT-028
	1985-1989	2.4L L4 2366cc	22REC		CRT-001
	1985-1988	2.4L L4 2366cc	22RTEC; Turbocharged		CRT-001
	1996-2000	2.7L L4 2694cc	3RZFE		CRT-029
	1989-1995	3.0L V6 2959cc	3VZE		CRT-004
	1996-2000	3.4L V6 3378cc	5VZFE		CRT-014
Camry	1987-1991	2.0L L4 1998cc	3SFE		CRT-010
	1993-1996	2.2L L4 2164cc	5SFE		CRT-026
	1997-2001	2.2L L4 2164cc	5SFE		CRT-010
	2002-2004	2.4L L4 2362cc	2AZFE		CRT-097
	2005-2009	2.4L L4 2362cc	2AZFE		CRT-082
	1988-1991	2.5L V6 2508cc	2VZFE		CRT-010
	1992-1996	3.0L V6 2959cc	3VZFE		CRT-026
	1994-2001	3.0L V6 2995cc	1MZFE		CRT-010
Celica	1997-1999	3.0L V6 2995cc	1MZFE		CRT-050
	1990-1993	1.6L L4 1587cc	4AFE; ST		CRT-005
	1994-1997	1.8L L4 1762cc	7AFE; ST		CRT-005
	1974	2.0L L4 1968cc	18RC		CRT-044
	1987-1989	2.0L L4 1998cc	3SFE; GT		CRT-010
	1987-1989	2.0L L4 1998cc	3SFE; ST		CRT-010
	1988-1989	2.0L L4 1998cc	3SGELC		CRT-085
			3SGTE; All Trac		CRT-010
	1990-1993	2.0L L4 1998cc	3SGTE; Turbocharged		CRT-050
	1999	2.2L L4 2164cc	5SFE		CRT-010
	1990-1998	2.2L L4 2164cc	5SFE; GT		CRT-010
	1990-1993	2.2L L4 2164cc	5SFE; GTS		CRT-010
	1978-1980	2.2L L4 2189cc	20R		CRT-020
	1981-1982	2.4L L4 2366cc	22R		CRT-020
	1983-1985	2.4L L4 2366cc	22REC		CRT-020
	1979-1980	2.6L L6 2563cc	4ME		CRT-041
	1982-1985	2.8L L6 2754cc	5MGE		CRT-007
	1981	2.8L L6 2759cc	5ME		CRT-041
Corolla	1985	1.6L L4 1587cc	4AC		CRT-039
	1988-1997	1.6L L4 1587cc	4AFE		CRT-005
	1985-1987	1.6L L4 1587cc	4AGEC; Sport GTS		CRT-039
	1987-1988	1.6L L4 1587cc	4AGELC		CRT-011
	1984-1988	1.6L L4 1587cc	4ALC		CRT-011
	1978-1979	1.6L L4 1588cc	2TC		CRT-020
	1993-1997	1.8L L4 1762cc	7AFE		CRT-005



**Make/Model      Year      Engine      Attributes      Notes      Part #**

**Toyota**

Corolla	1980-1982	1.8L L4 1770cc	3TC	From 08/80; To 08/82	CRT-033
	1980-1982	1.8L L4 1770cc	3TC		CRT-020
	1998-2002	1.8L L4 1794cc	1ZZFE		CRT-034
	2003-2008	1.8L L4 1794cc	1ZZFE		CRT-086
	2005-2006	1.8L L4 1795cc	2ZZGE		CRT-049
	2009-2010	1.8L L4 1798cc	2ZRFE		CRT-113
Corona	1974	2.0L L4 1968cc	18RC		CRT-044
	1975-1976	2.2L L4 2189cc	20R		CRT-044
	1979-1982	2.2L L4 2189cc	20R		CRT-020
	1977	2.2L L4 2189cc	20R		CRT-044
Cressida	1984-1987	2.8L L6 2754cc	5MGE		CRT-007
Echo	2000-2005	1.5L L4 1497cc	1NZFE		CRT-052
Land Cruiser	1974	3.9L L6 3878cc	F	From 08/74; To 07/80	CRT-012
	1975-1980	4.2L L6 4227cc	2F	From 08/74; To 07/80	CRT-012
	1981-1984	4.2L L6 4227cc	2F	From 10/81; To 10/84 From 08/80; To 09/83	CRT-030 CRT-019
	1985-1987	4.2L L6 4227cc	2F	From 04/85; To 08/87	CRT-021
Matrix	2003-2008	1.8L L4 1794cc	1ZZFE		CRT-086
	2003-2006	1.8L L4 1795cc	2ZZGE		CRT-049
	2009-2010	1.8L L4 1798cc	2ZRFE		CRT-113
MR2	1985-1989	1.6L L4 1587cc	4AGELC		CRT-009
	1988-1989	1.6L L4 1587cc	4AGZE; Supercharged		CRT-089
	1991	2.0L L4 1998cc	3SGTE; Turbocharged		CRT-031
	1992	2.0L L4 1998cc	3SGTE; Turbocharged	To 01/92	CRT-031
	1992-1995	2.0L L4 1998cc	3SGTE; Turbocharged	From 2/92	CRT-090
	1991-1992	2.2L L4 2164cc	5SFE	To 01/92	CRT-031
Paseo	1992-1995	1.5L L4 1497cc	5EFE		CRT-002
	1996-1998	1.5L L4 1497cc	5EFE	From 09/95	CRT-047
	1996	1.5L L4 1497cc	5EFE	Thru 8/95	CRT-002
Pickup	1974	2.0L L4 1968cc	18RC		CRT-044
	1975	2.2L L4 2189cc	20R		CRT-044
	1976-1978	2.2L L4 2189cc	20R		CRT-044
	1979	2.2L L4 2189cc	20R		CRT-017
	1980	2.2L L4 2189cc	20R; Base		CRT-017
			20R; DLX; 4WD		CRT-044
			20R; DLX; SR5; RWD		CRT-017
	1984-1990	2.4L L4 2366cc	22R		CRT-001
	1989-1991	2.4L L4 2366cc	22RE		CRT-001
	1992-1995	2.4L L4 2366cc	22RE		CRT-028
	1984-1988	2.4L L4 2366cc	22REC		CRT-001
	1985-1988	2.4L L4 2366cc	22RTEC		CRT-001
	1984-1985	2.4L L4 2446cc	2L		CRT-007
1989-1995	3.0L V6 2959cc	3VZE		CRT-004	
Previa	1991-1993	2.4L L4 2438cc	2TZFE		CRT-013
RAV4	2001-2003	2.0L L4 1998cc	1AZFE		CRT-082
	1996	2.0L L4 1998cc	3SFE		CRT-050
	1997-2000	2.0L L4 1998cc	3SFE		CRT-022
	2004-2005	2.4L L4 2362cc	2AZFE		CRT-082
Solara	1999-2001	2.2L L4 2164cc	5SFE		CRT-010
	2002-2008	2.4L L4 2362cc	2AZFE		CRT-082
	1999	3.0L V6 2995cc	1MZFE		CRT-050
	2000-2002	3.0L V6 2995cc	1MZFE		CRT-010
Supra	1986-1989	3.0L L6 2954cc	7MGE		CRT-015
	1988-1991	3.0L L6 2954cc	7MGE		CRT-007

Clutch Release Cylinder







# Clutch Release Cylinder Images



CRM-001



CRM-002



CRM-005



Clutch Release Cylinder

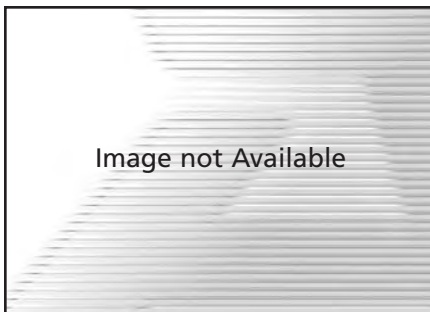


Image not Available

CRM-008



CRM-009



CRM-012

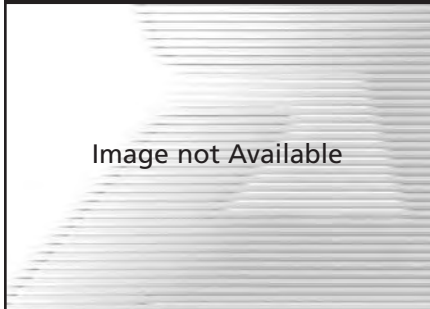


Image not Available





# Clutch Release Cylinder Images

Clutch Release Cylinder



CRM-013



CRM-014



CRM-016



CRM-017



CRM-018



CRM-020





# Clutch Release Cylinder Images

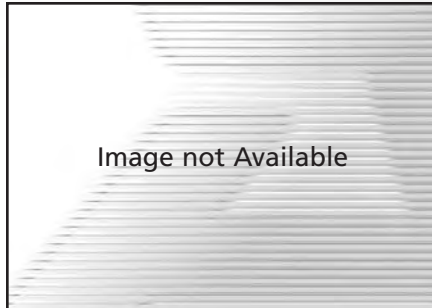


Image not Available

**CRM-022**

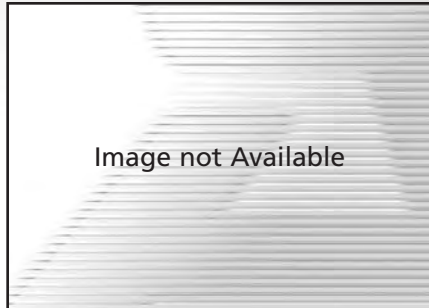


Image not Available

**CRM-025**

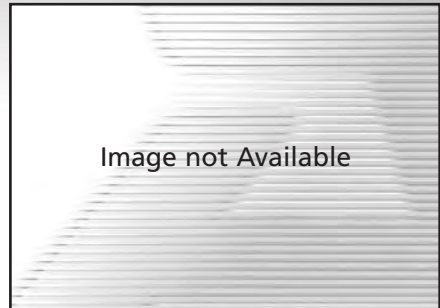


Image not Available

**CRM-029**

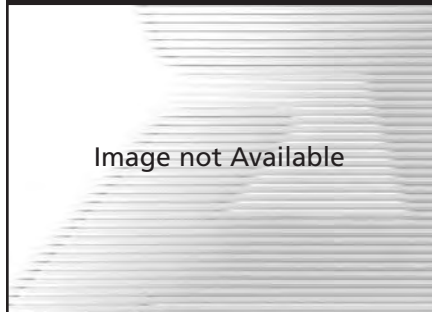


Image not Available

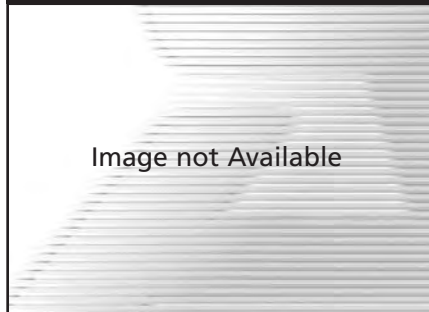


Image not Available



Image not Available

Clutch Release Cylinder



**CRT-001**



**CRT-002**



**CRT-003**





# Clutch Release Cylinder Images

Clutch Release Cylinder



CRT-004



CRT-005



CRT-007



CRT-009



CRT-010



CRT-011





# Clutch Release Cylinder Images



CRT-012



CRT-013



CRT-014



CRT-015



CRT-017



CRT-019



Clutch Release Cylinder



# Clutch Release Cylinder Images

Clutch Release Cylinder



CRT-020



CRT-021



CRT-022



CRT-024



CRT-026



CRT-028





# Clutch Release Cylinder Images



CRT-029



CRT-030



CRT-031



CRT-033



CRT-034



CRT-039



Clutch Release Cylinder



# Clutch Release Cylinder Images

Clutch Release Cylinder



CRT-040



CRT-041



CRT-043



CRT-044



CRT-047



CRT-049







# Clutch Release Cylinder Images



CRT-050



CRT-052



CRT-082



CRT-085



CRT-086

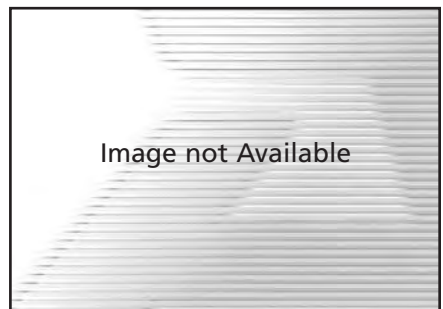


Image not Available

CRT-088

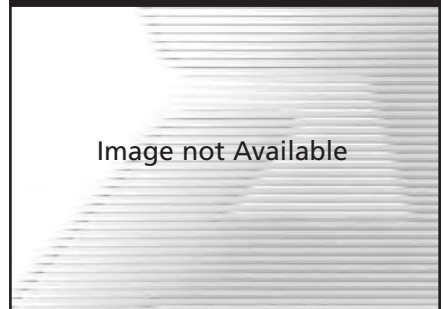


Image not Available

Clutch Release Cylinder



# Clutch Release Cylinder Images

Image not Available

CRT-089

Image not Available

CRT-090



CRT-097

Image not Available

Image not Available



CRT-104



CRT-111

Image not Available

CRT-113



Image not Available





# Buyer's Guide

## Clutch Release Cylinder

Clutch Release Cylinder

Part #	Year	Application	Part #	Year	Application
CRM-001	1997	Mitsubishi Montero	CRT-013	1991-1993	Toyota Previa
CRM-001	1992-1996	Mitsubishi Montero Sport	CRT-014	1995-1998	Toyota T100
CRM-002	1991-1999	Dodge Stealth	CRT-014	1995-2004	Toyota 4Runner
CRM-002	1992-1996	Mitsubishi 3000GT	CRT-014	1996-2000	Toyota Tacoma
CRM-005	1992	Mitsubishi Galant	CRT-014	2000-2004	Toyota Tundra
CRM-005	1990-1994	Mitsubishi Eclipse	CRT-015	1986-1987, 1989	Toyota Supra
CRM-008	1984-1985	Mitsubishi Mighty Max	CRT-017	1979-1980	Toyota Pickup
CRM-008	1984-1985	Mitsubishi Montero	CRT-019	1981-1984	Toyota Land Cruiser
CRM-009	1986-1989	Mitsubishi Montero	CRT-020	1978-1982	Toyota Corolla
CRM-009	1997-1999	Mitsubishi Montero Sport	CRT-020	1978-1985	Toyota Corona
CRM-012	1990-1994	Mitsubishi Eclipse	CRT-020	1979-1982	Toyota Celica
CRM-013	1990-1994	Mitsubishi Mighty Max	CRT-021	1985-1987	Toyota Land Cruiser
CRM-014	1990-1994	Mitsubishi Eclipse	CRT-022	1997-2000	Toyota RAV4
CRM-016	1992-1994	Mitsubishi Expo LRV	CRT-024	1987-1992	Toyota Supra
CRM-016	1992-1995	Mitsubishi Expo	CRT-026	1992-1993	Lexus ES300
CRM-016	1994-1998	Mitsubishi Galant	CRT-026	1992-1996	Toyota Camry
CRM-016	1996-1999	Mitsubishi Eclipse	CRT-028	1992-1995	Toyota 4Runner
CRM-017	1996-1999	Mitsubishi Eclipse	CRT-028	1992-1995	Toyota Pickup
CRM-018	1991-1999	Mitsubishi 3000GT	CRT-029	1995-2004	Toyota 4Runner
CRM-020	1997-2002	Mitsubishi Mirage	CRT-029	1996-2000	Toyota Tacoma
CRM-022	1998-1999	Mitsubishi Montero Sport	CRT-030	1981-1984	Toyota Land Cruiser
CRM-025	2002	Mitsubishi Mirage	CRT-031	1991-1992	Toyota MR2
CRM-025	2004-2006	Mitsubishi Lancer	CRT-033	1980-1982	Toyota Corolla
CRM-025	2005-2006	Mitsubishi Outlander	CRT-034	1998-2002	Toyota Corolla
CRM-029	2001-2004	Mitsubishi Eclipse	CRT-039	1985-1987	Toyota Corolla
CRM-029	2003-2006, 2008, 2010	Mitsubishi Lancer	CRT-040	1995-1998	Toyota T100
CRT-001	1984-1991	Toyota 4Runner	CRT-041	1979-1981	Toyota Celica
CRT-001	1984-1991	Toyota Pickup	CRT-043	1988	Toyota Van Wagon
CRT-002	1987-1996	Toyota Tercel	CRT-043	1984-1989	Toyota Van
CRT-002	1992-1996	Toyota Paseo	CRT-044	1974	Toyota Celica
CRT-003	1994-1995	Toyota T100	CRT-044	1974-1977	Toyota Corona
CRT-004	1994	Toyota T100	CRT-044	1974-1978, 1980	Toyota Pickup
CRT-004	1987-1986, 1995-1989	Toyota 4Runner	CRT-047	1996-1998	Toyota Paseo
CRT-004	1989-1995	Toyota Pickup	CRT-047	1996-1998	Toyota Tercel
CRT-005	1988-1997	Toyota Corolla	CRT-049	2003-2006	Toyota Matrix
CRT-005	1990-1997	Toyota Celica	CRT-049	2005-2006	Toyota Corolla
CRT-005	1991-1997	Geo Prizm	CRT-050	1996	Toyota Celica
CRT-007	1982-1985	Toyota Celica	CRT-050	1999	Toyota RAV4
CRT-007	1984-1985	Toyota Pickup	CRT-050	1990-1993	Toyota Solara
CRT-007	1984-1987	Toyota Cressida	CRT-050	1997-1999	Toyota Camry
CRT-007	1988, 1990-1994	Toyota Supra	CRT-052	2000-2005	Toyota Echo
CRT-009	1985-1989	Toyota MR2	CRT-052	2004-2006	Scion xA
CRT-010	1987-1992, 1994-2001	Lexus ES250	CRT-052	2004-2006	Scion xB
CRT-010	1987-1999	Toyota Celica	CRT-082	2001-2005	Toyota RAV4
CRT-010	1990-1991	Toyota Camry	CRT-082	2002-2008	Toyota Solara
CRT-010	1999-2002	Toyota Solara	CRT-082	2005-2009	Toyota Camry
CRT-011	1984-1988	Toyota Corolla	CRT-082	2005-2010	Scion tC
CRT-012	1974-1980	Toyota Land Cruiser	CRT-085	1988-1989	Toyota Celica





# Free Wheel Hub



AISIN Free Wheel Hubs efficiently transfers and disconnects drivetrain power to part time 4 Wheel Drive applications. AISIN Free Wheel Hubs are manufactured to the highest standards and are always OE Matched.

- Compact and durable design withstands the same rugged terrain tests performed by the vehicle manufacturers.
- Robust locking mechanism provides reliable connection of the drivetrain power to the wheels in 4 Wheel Drive mode.
- Large manual dial allows the user to effortlessly change from 2 Wheel Drive to 4 Wheel Drive mode.









# Free Wheel Hub Images



FHG-001



FHM-002



FHS-002



Image not Available

FHT-005



FHT-013



FHT-019

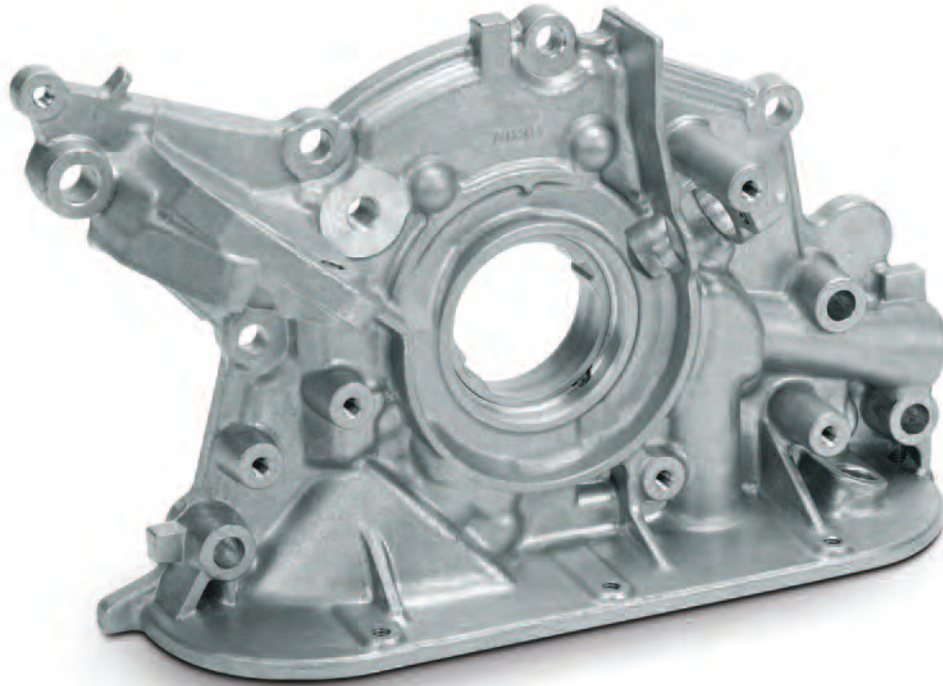
Image not Available







# Oil Pump



AISIN Oil Pumps deliver maximum oil pressure to the engine without creating excess load. AISIN Oil Pumps are always OE Matched.

- AISIN aluminum die-casting technology allows for size and weight reduction.
- Lubricates critical components to maximize the life of the engine.





# Oil Pump Applications

Oil Pump

Make/Model	Year	Engine	Attributes	Notes	Part #
<b>Acura</b>					
RL	2005-2008	3.5L V6 3471cc	J35A8		OPH-800
SLX	1996-1997	3.2L V6 3165cc	6VD1		OPG-008
	1998-1999	3.5L V6 3494cc	6VE1	Includes Timing Cover	OPG-009
TL	2005-2007	3.2L V6 3210cc	J32A3		OPH-800
	2007	3.5L V6 3471cc	J35A8; Type-S		OPH-800
<b>Honda</b>					
Accord	2004	3.0L V6 2977cc	J30A4; EX J30A4; LX		OPH-800 OPH-800
	2005-2007	3.0L V6 2997cc	JNA1		OPH-800
Odyssey	2005-2007	3.5L V6 3471cc	J35A6; EX J35A6; LX		OPH-800 OPH-800
	2006-2007	3.5L V6 3471cc	J35A7; EX		OPH-800
	2005-2007	3.5L V6 3471cc	J35A7; Touring		OPH-800
Passport	1994-1997	3.2L V6 3165cc	6VD1; EX		OPG-008
	1998-2002	3.2L V6 3165cc	6VD1; EX	Includes Timing Cover	OPG-009
	1994-1997	3.2L V6 3165cc	6VD1; LX		OPG-008
	1998-2002	3.2L V6 3165cc	6VD1; LX	Includes Timing Cover	OPG-009
Pilot	2005	3.5L V6 3471cc	J35A6; EX J35A6; LX		OPH-800 OPH-800
	2006-2008	3.5L V6 3471cc	J35A9; EX		OPH-800
	2008	3.5L V6 3471cc	J35A9; EX-L		OPH-800
	2006-2008	3.5L V6 3471cc	J35A9; LX		OPH-800
			J35A9; Special Edition J35A9; Value Package		OPH-800 OPH-800
	2006-2008	3.5L V6 3471cc	J35Z1; EX		OPH-800
	2008	3.5L V6 3471cc	J35Z1; EX-L		OPH-800
	2006-2008	3.5L V6 3471cc	J35Z1; LX		OPH-800
	2008	3.5L V6 3471cc	J35Z1; Special Edition J35Z1; Value Package		OPH-800 OPH-800
Ridgeline	2006	3.5L V6 3471cc	J35A9; RT		OPH-800
			J35A9; RTL		OPH-800
			J35A9; RTS		OPH-800
<b>Isuzu</b>					
QX56	2004-2009	5.6L V8 5552cc	VK56DE		OPN-707
Amigo	1998-2000	3.2L V6 3165cc	6VD1	Includes Timing Cover	OPG-009
Axiom	2002	3.5L V6 3475cc	6VE1	Includes Timing Cover	OPG-009
	2003	3.5L V6 3491cc	6VE1	Includes Timing Cover	OPG-009
	2004	3.5L V6 3491cc	6VE1		OPG-012
I-Mark	1986-1988	1.5L L4 1471cc	VIN: 7		OPG-001
	1989	1.5L L4 1471cc	VIN: 7; XS		OPG-001
	1987-1988	1.5L L4 1471cc	VIN: 9; Turbocharged		OPG-001
	1989	1.5L L4 1471cc	VIN: 9; Turbocharged; LS		OPG-001
	1985	1.5L L4 1471cc	VIN: K		OPG-001
	1989	1.6L L4 1588cc	VIN: 5; RS		OPG-001
	1985	1.8L L4 1817cc	VIN: B		OPG-001
Impulse	1990	1.6L L4 1588cc	VIN: 5		OPG-003
	1991-1992	1.6L L4 1588cc	VIN: 4; Turbocharged; RS		OPG-006



Make/Model	Year	Engine	Attributes	Notes	Part #
<b>Isuzu</b>					
Impulse	1992	1.8L L4 1817cc	VIN: 8; XS		OPG-006
	1985-1987	2.0L L4 1994cc	VIN: F; Turbocharged		OPG-005
Pickup	1985-1987	1.9L L4 1949cc	VIN: A		OPG-005
Rodeo	1998-2004	3.2L V6 3165cc	6VD1	Includes Timing Cover	OPG-009
	2001-2003	3.2L V6 3165cc	6VD1; S V6	Includes Timing Cover	OPG-009
	1993-1997	3.2L V6 3165cc	VIN: V		OPG-008
	2004	3.5L V6 3494cc	6VE1		OPG-012
Rodeo Sport	2001-2003	3.2L V6 3165cc	6VD1; S V6	Includes Timing Cover	OPG-009
Stylus	1991	1.6L L4 1588cc	VIN: 5; XS		OPG-003
	1993	1.6L L4 1588cc	VIN: 6		OPG-004
	1991-1992	1.6L L4 1588cc	VIN: 6; S		OPG-004
Trooper	1985	1.9L L4 1949cc	VIN: A		OPG-005
	1997	3.2L V6 3165cc	VIN: V; LS		OPG-008
			VIN: V; Ltd		OPG-008
	1992-1997	3.2L V6 3165cc	VIN: V; S		OPG-008
	1992-1995	3.2L V6 3165cc	VIN: W; LS		OPG-008
	1993-1995	3.2L V6 3165cc	VIN: W; RS		OPG-008
1998-2002	3.5L V6 3475cc	6VE1	Includes Timing Cover	OPG-009	
VehiCROSS	1999-2001	3.5L V6 3475cc	6VE1	Includes Timing Cover	OPG-009
<b>Lexus</b>					
ES250	1990-1991	2.5L V6 2508cc	2VZFE		OPT-019
ES300	1996-1998	3.0L V6 2959cc	1MZFE		OPT-037
	1992-1993	3.0L V6 2959cc	3VZFE		OPT-020
	1999	3.0L V6 2995cc	1MZFE		OPT-801
	1994-1995	3.0L V6 2995cc	1MZFE		OPT-037
	2000-2001	3.0L V6 2995cc	1MZFE	Exc. Variable Valve Timing	OPT-037
				Variable Valve Timing	OPT-801
2002-2003	3.0L V6 2995cc	1MZFE		OPT-804	
ES330	2004-2006	3.3L V6 3300cc	3MZFE		OPT-804
GS300	1993-1995	3.0L L6 2997cc	2JZGE		OPT-070
	1996-2005	3.0L L6 2997cc	2JZGE		OPT-071
GS400	1998-2000	4.0L V8 3969cc	1UZFE		OPT-103
GS430	2001-2007	4.3L V8 4293cc	3UZFE		OPT-103
GX470	2003-2004	4.7L V8 4663cc	2UZFE		OPT-012
	2005	4.7L V8 4663cc	2UZFE	From 11/04	OPT-103
				To 11/04	OPT-012
	2006-2009	4.7L V8 4663cc	2UZFE		OPT-103
IS300	2001-2005	3.0L L6 2997cc	2JZGE		OPT-071
	2002-2005	3.0L L6 2997cc	2JZGE; Sportcross		OPT-071
LS400	1995	4.0L V8 3967cc	1UZFE		OPT-011
	1996-1997	4.0L V8 3969cc	1UZFE		OPT-011
	1998-2000	4.0L V8 3969cc	1UZFE		OPT-103
LS430	2001-2006	4.3L V8 4293cc	3UZFE		OPT-103
LX470	2005	4.7L V8 4663cc	2UZFE	From 05/05	OPT-103
				To 05/05	OPT-012
	1998-2004	4.7L V8 4663cc	2UZFE		OPT-012
RX300	2006-2007	4.7L V8 4663cc	2UZFE		OPT-103
	1999-2001	3.0L V6 2995cc	1MZFE		OPT-801
RX330	2002-2003	3.0L V6 2995cc	1MZFE		OPT-801
	2004-2006	3.3L V6 3300cc	3MZFE		OPT-804
RX400h	2006-2008	3.3L V6 3300cc	3MZFE		OPT-804
SC300	1992-1995	3.0L L6 2997cc	2JZGE		OPT-070
	1996-2000	3.0L L6 2997cc	2JZGE		OPT-071





**Make/Model      Year      Engine      Attributes      Notes      Part #**

**Lexus**

SC400	1995	4.0L V8 3967cc	1UZFE		OPT-011
	1996-1997	4.0L V8 3969cc	1UZFE		OPT-011
	1998-2000	4.0L V8 3969cc	1UZFE		OPT-103
SC430	2002-2009	4.3L V8 4293cc	3UZFE		OPT-103

**Nissan**

Altima	2004-2006	2.5L L4 2500cc	QR25DE	Includes Timing Cover	OPN-705
	2007-2009	2.5L L4 2500cc	QR25DE	Includes Timing Cover	OPN-710
			QR25DE; Hybrid	Includes Timing Cover	OPN-710
	2006	2.5L L4 2500cc	QR25DE; S	Includes Timing Cover	OPN-705
	2007-2009	2.5L L4 2500cc	QR25DE; S	Includes Timing Cover	OPN-710
	2002-2006	2.5L L4 2500cc	QR25DE; SL	Includes Timing Cover	OPN-705
	2003	3.5L V6 3498cc	VQ35DE		OPN-704
	2004-2007	3.5L V6 3498cc	VQ35DE; SE		OPN-704
Armada	2005-2009	5.6L V8 5552cc	VK56DE; LE		OPN-707
			VK56DE; SE		OPN-707
Frontier	2005-2006	5.6L V8 5552cc	VK56DE; SE Off-Road		OPN-707
	2000	3.3L V6 3275cc	VG33E		OPN-708
	1999	3.3L V6 3275cc	VG33E; SE		OPN-708
	1999-2004	3.3L V6 3275cc	VG33E; XE		OPN-708
	2001-2004	3.3L V6 3275cc	VG33ER; Supercharged; SC		OPN-708
Maxima	2002-2003	3.3L V6 3275cc	VG33ER; Supercharged; SVE		OPN-708
	2004	3.5L V6 3498cc	VQ35DE		OPN-704
			VQ35DE; SE		OPN-704
NX	2005-2008	3.5L V6 3498cc	VQ35DE; SL		OPN-704
			GA16DE	Includes Timing Cover	OPN-701
Pathfinder	1991-1993	1.6L L4 1597cc	GA16DE	Includes Timing Cover	OPN-701
	2004	5.6L V8 5552cc	VK56DE; Armada SE		OPN-707
			VK56DE; LE		OPN-707
Quest	2008-2009	5.6L V8 5552cc	VK56DE; SE		OPN-707
			VG30E; GXE		OPN-703
	1998	3.0L V6 2960cc	VG30E; XE		OPN-703
			VG33E		OPN-703
	1999-2002	3.3L V6 3275cc	VG33E		OPN-703
	2004-2007	3.5L V6 3498cc	VQ35DE		OPN-704
	2005-2007	3.5L V6 3498cc	VQ35DE; S		OPN-704
			VQ35DE; SE		OPN-704
VQ35DE; SL				OPN-704	
Sentra	1995-1997	1.6L L4 1597cc	GA16DE	Includes Timing Cover; Mexico Built Vehicle	OPN-702
	1993	1.6L L4 1597cc	GA16DE; E	Includes Timing Cover	OPN-701
	1994	1.6L L4 1597cc	GA16DE; E	Includes Timing Cover; Mexico Built Vehicle	OPN-702
	1995-1997	1.6L L4 1597cc	GA16DE; GLE	Includes Timing Cover; Mexico Built Vehicle	OPN-702
	1993	1.6L L4 1597cc	GA16DE; GXE	Includes Timing Cover	OPN-701
	1994-1997	1.6L L4 1597cc	GA16DE; GXE	Includes Timing Cover; Mexico Built Vehicle	OPN-702
	1994	1.6L L4 1597cc	GA16DE; Limited Edition	Includes Timing Cover; Mexico Built Vehicle	OPN-702
	1993	1.6L L4 1597cc	GA16DE; SE	Includes Timing Cover	OPN-701
	1994	1.6L L4 1597cc	GA16DE; SE	Includes Timing Cover; Mexico Built Vehicle	OPN-702
	1999	1.6L L4 1597cc	GA16DE; XE	Includes Timing Cover; Standard	OPN-702
	1991-1993	1.6L L4 1597cc	GA16DE; XE	Includes Timing Cover	OPN-701
	1994-1998	1.6L L4 1597cc	GA16DE; XE	Includes Timing Cover; Mexico Built Vehicle	OPN-702
	2005-2006	1.8L L4 1809cc	QG18DE	Includes Timing Cover	OPN-706
	2002-2003	1.8L L4 1809cc	QG18DE; GXE	Includes Timing Cover	OPN-706
	2004-2006	1.8L L4 1809cc	QG18DE; S	Includes Timing Cover	OPN-706
	2000-2003	1.8L L4 1809cc	QG18DE; XE	Includes Timing Cover; Exc. Clean Air Vehicle (Exc. CA Series)	OPN-706
	2003	2.5L L4 2500cc	QR25DE; Limited Edition	Includes Timing Cover	OPN-705

**Oil Pump**



Make/Model	Year	Engine	Attributes	Notes	Part #
------------	------	--------	------------	-------	--------

**Nissan**

Sentra	2004	2.5L L4 2500cc	QR25DE; S	Includes Timing Cover	OPN-705
	2002-2006	2.5L L4 2500cc	QR25DE; SE-R	Includes Timing Cover	OPN-705
QR25DE; SE-R Spec V			Includes Timing Cover	OPN-705	
Titan	2004	5.6L V8 5552cc	VK56DE	Includes Timing Cover	OPN-707
	2005-2009	5.6L V8 5552cc	VK56DE; LE		OPN-707
	2008-2009	5.6L V8 5552cc	VK56DE; PRO-4X		OPN-707
	2005-2009	5.6L V8 5552cc	VK56DE; SE		OPN-707
			VK56DE; XE		OPN-707
Versa	2007-2010	1.8L L4 1798cc	MR18DE		OPN-709
Xterra	2000-2002	3.3L V6 3275cc	VG33E		OPN-708
	2003-2004	3.3L V6 3275cc	VG33E; XE		OPN-708
	2002	3.3L V6 3275cc	VG33ER; Supercharged		OPN-708
	2003-2004	3.3L V6 3275cc	VG33ER; Supercharged; SE		OPN-708

**Scion**

tC	2005-2009	2.4L L4 2398cc	2AZFE		OPT-803
	2007-2008	2.4L L4 2398cc	2AZFE; Special		OPT-803
xA	2004-2006	1.5L L4 1497cc	1NZFE	Includes Timing Cover	OPT-115
xB	2004-2006	1.5L L4 1497cc	1NZFE	Includes Timing Cover	OPT-115
	2008-2009	2.4L L4 2362cc	2AZFE	Assy.(Japan Built Part)	OPT-803

**Suzuki**

Samurai	1990-1995	1.3L L4 1298cc	G13BA		OPS-001
	1991-1993	1.3L L4 1298cc	G13BA; JA		OPS-001
	1991	1.3L L4 1298cc	G13BA; JL		OPS-001
			G13BA; JS		OPS-001
	1986-1989	1.3L L4 1325cc	G13A		OPS-001
Sidekick	1989	1.3L L4 1325cc	G13BAVIN: 5; JA		OPS-001
Swift	1995	1.3L L4 1298cc	G13K		OPS-001
	1990-1991	1.3L L4 1298cc	G13K; GA		OPS-001
	1990	1.3L L4 1298cc	G13K; GL		OPS-001
	1989	1.3L L4 1298cc	G13K; GLX		OPS-001
	1990-1991	1.3L L4 1298cc	G13K; GS		OPS-001
	1990	1.3L L4 1298cc	G13K; L		OPS-001
			G13K; S		OPS-001
	1992-1994	1.3L L4 1298cc	G13K; VIN: 3; GA		OPS-001
G13K; VIN: 3; GS				OPS-001	

**Toyota**

4Runner	1990-1995	2.4L L4 2366cc	22RE		OPT-054
	1985-1989	2.4L L4 2366cc	22REC; DLX		OPT-054
	1986-1989	2.4L L4 2366cc	22REC; SR5		OPT-054
	1990-1995	3.0L V6 2959cc	3VZE		OPT-027
	1989	3.0L V6 2959cc	3VZE; DLX		OPT-027
	1988-1989	3.0L V6 2959cc	3VZE; SR5		OPT-027
	2001-2002	3.4L V6 3378cc	5VZFE		OPT-022
	1996-1997	3.4L V6 3378cc	5VZFE; Limited		OPT-022
	1996-2000	3.4L V6 3378cc	5VZFE; SR5		OPT-022
	2003-2004	4.7L V8 4663cc	2UZFE		OPT-012
	2005	4.7L V8 4663cc	2UZFE; Limited	From 11/04	OPT-103
				To 11/04	OPT-012
	2006-2009	4.7L V8 4663cc	2UZFE; Limited		OPT-103
	2005	4.7L V8 4663cc	2UZFE; Sport	From 11/04	OPT-103
				To 11/04	OPT-012
	2006-2009	4.7L V8 4663cc	2UZFE; Sport		OPT-103



**Make/Model      Year      Engine      Attributes      Notes      Part #**

**Toyota**

4Runner	2005	4.7L V8 4663cc	2UZFE; SR5	From 11/04	OPT-103
				To 11/04	OPT-012
	2006-2009	4.7L V8 4663cc	2UZFE; SR5		OPT-103
Avalon	1998-1999	3.0L V6 2995cc	1MZFE		OPT-037
	2000-2001	3.0L V6 2995cc	1MZFE		OPT-801
	1995-1997	3.0L V6 2995cc	1MZFE; XL		OPT-037
	2002-2004	3.0L V6 2995cc	1MZFE; XL		OPT-801
	1995-1997	3.0L V6 2995cc	1MZFE; XLS		OPT-037
	2002-2004	3.0L V6 2995cc	1MZFE; XLS		OPT-801
Camry	1985-1986	1.8L L4 1839cc	1CTLC; Turbocharged; DLX		OPT-025
	1986	2.0L L4 1974cc	2CTLC; Turbocharged; DLX		OPT-025
	1985-1986	2.0L L4 1995cc	2SELC; DLX		OPT-023
			2SELC; LE		OPT-023
	1988-1991	2.0L L4 1998cc	3SFE		OPT-074
	1987-1991	2.0L L4 1998cc	3SFE; DLX		OPT-074
	1988-1991	2.0L L4 1998cc	3SFE; DLX All Trac		OPT-074
	1987-1991	2.0L L4 1998cc	3SFE; LE		OPT-074
	1988-1991	2.0L L4 1998cc	3SFE; LE All Trac		OPT-074
	1998-1999	2.2L L4 2164cc	5SFE		OPT-073
	1997	2.2L L4 2164cc	5SFE; CE		OPT-073
	1992	2.2L L4 2164cc	5SFE; DLX		OPT-073
	1993-1996	2.2L L4 2164cc	5SFE; DX		OPT-073
	1992-1997	2.2L L4 2164cc	5SFE; LE		OPT-073
	1992-2001	2.2L L4 2164cc	5SFE; XLE		OPT-073
	2000-2001	2.2L L4 2164cc	5SFNE; LE		OPT-073
	2002-2009	2.4L L4 2362cc	2AZFE		OPT-803
	2007-2008	2.4L L4 2362cc	2AZFE; CE		OPT-803
	2007-2009	2.4L L4 2362cc	2AZFE; LE		OPT-803
			2AZFE; SE		OPT-803
			2AZFE; XLE		OPT-803
			2AZFXE; Hybrid		OPT-803
	1988-1991	2.5L V6 2508cc	2VZFE; DLX		OPT-019
			2VZFE; LE		OPT-019
	1992	3.0L V6 2959cc	3VZFE; DLX		OPT-020
	1993	3.0L V6 2959cc	3VZFE; DX		OPT-020
	1992-1993	3.0L V6 2959cc	3VZFE; LE		OPT-020
			3VZFE; SE		OPT-020
			3VZFE; XLE		OPT-020
	1998	3.0L V6 2995cc	1MZFE		OPT-037
	2002	3.0L V6 2995cc	1MZFE		OPT-805
	2003	3.0L V6 2995cc	1MZFE	From 01/01/03	OPT-804
				To 01/01/03	OPT-805
	1997	3.0L V6 2995cc	1MZFE; CE		OPT-037
	2005-2006	3.0L V6 2995cc	1MZFE; LE		OPT-804
	1994-1997	3.0L V6 2995cc	1MZFE; LE		OPT-037
	1994-1996	3.0L V6 2995cc	1MZFE; SE		OPT-037
	2004	3.0L V6 2995cc	1MZFE; XLE		OPT-804
	2006	3.0L V6 2995cc	1MZFE; XLE		OPT-804
1994-2001	3.0L V6 2995cc	1MZFE; XLE		OPT-037	
2000-2001	3.0L V6 2995cc	1MZFE; XLE	Assy.(Japan Built Part)	OPT-801	
			Assy.(Exc.Japan Built Part)	OPT-037	
2004-2006	3.3L V6 3300cc	3MZFE; SE		OPT-804	
Celica	1990-1993	1.6L L4 1587cc	4AFE; ST		OPT-097
	1994-1995	1.8L L4 1762cc	7AFE; ST		OPT-034
	1996-1997	1.8L L4 1762cc	7AFE; ST		OPT-035

Oil Pump



**Make/Model      Year      Engine      Attributes      Notes      Part #**

**Toyota**

Celica	2000-2005	1.8L L4 1794cc	1ZZFE; GT		OPT-044
	2001	1.8L L4 1794cc	1ZZFE; VIN: R; GT		OPT-044
	1986	2.0L L4 1995cc	2SELC; ST		OPT-023
	1987-1989	2.0L L4 1998cc	3SFE; GT		OPT-074
			3SFE; ST		OPT-074
			3SGELC; GTS		OPT-078
	1992	2.0L L4 1998cc	3SGTE; Turbocharged; All Trac		OPT-080
	1988-1991	2.0L L4 1998cc	3SGTE; Turbocharged; All Trac		OPT-079
	1993	2.0L L4 1998cc	3SGTE; Turbocharged; GTS All Trac		OPT-080
	1986	2.0L L4 1998cc	2SELC; GT		OPT-023
			3SGELC; GTS		OPT-078
	1998-1999	2.2L L4 2164cc	5SFE		OPT-075
	1996	2.2L L4 2164cc	5SFE; GT		OPT-076
	1990-1995	2.2L L4 2164cc	5SFE; GT		OPT-074
	1996-1997	2.2L L4 2164cc	5SFE; GT		OPT-075
	1990-1993	2.2L L4 2164cc	5SFE; GTS		OPT-074
	1985	2.4L L4 2366cc	22REC; GT		OPT-054
			22REC; GTS		OPT-054
			22REC; ST		OPT-054
	1985	2.8L L6 2754cc	5MGE; Supra		OPT-063
Corolla	1985-1987	1.6L L4 1587cc	4AC; Sport DLX		OPT-031
			4AC; Sport SR5		OPT-031
	1988-1989	1.6L L4 1587cc	4AF; DLX		OPT-097
			4AF; LE		OPT-097
			4AF; SR5		OPT-097
	1990-1992	1.6L L4 1587cc	4AFE		OPT-097
	1993-1995	1.6L L4 1587cc	4AFE		OPT-032
	1996-1997	1.6L L4 1587cc	4AFE		OPT-033
	1990-1992	1.6L L4 1587cc	4AFE; DLX		OPT-097
	1988-1992	1.6L L4 1587cc	4AFE; DLX All Trac		OPT-097
	1990-1992	1.6L L4 1587cc	4AFE; LE		OPT-097
	1990-1991	1.6L L4 1587cc	4AFE; SR5		OPT-097
	1988-1990	1.6L L4 1587cc	4AFE; SR5 All Trac		OPT-097
	1988-1989	1.6L L4 1587cc	4AGE; GTS		OPT-036
	1990-1991	1.6L L4 1587cc	4AGE; GTS		OPT-097
	1985-1987	1.6L L4 1587cc	4AGEC; Sport GTS		OPT-036
	1987-1988	1.6L L4 1587cc	4AGELC; FX16		OPT-036
			4AGELC; FX16 GTS		OPT-036
	1985-1987	1.6L L4 1587cc	4ALC; DLX		OPT-031
	1987-1988	1.6L L4 1587cc	4ALC; FX		OPT-001
	1985-1987	1.6L L4 1587cc	4ALC; LE		OPT-031
	1985-1986	1.6L L4 1587cc	4ALC; LE Limited		OPT-031
	1993-1994	1.8L L4 1762cc	7AFE; DX		OPT-034
	1995-1997	1.8L L4 1762cc	7AFE; DX		OPT-035
	1993-1994	1.8L L4 1762cc	7AFE; LE		OPT-034
	1995-1997	1.8L L4 1762cc	7AFE; LE		OPT-035
	1998-2004	1.8L L4 1794cc	1ZZFE		OPT-044
	2005-2008	1.8L L4 1794cc	1ZZFE; CE		OPT-044
	2006-2008	1.8L L4 1794cc	1ZZFE; LE		OPT-044
			1ZZFE; S		OPT-044
	2008	1.8L L4 1794cc	1ZZFE; Sport		OPT-044
	2009-2013	1.8L L4 1798cc	2ZRFE		OPT-807
	1985	1.8L L4 1839cc	1CLC; DLX		OPT-024

Oil Pump



**Make/Model      Year      Engine      Attributes      Notes      Part #**

**Toyota**

Corolla	2009	2.4L L4 2362cc	2AZFE; XRS		OPT-803
Cressida	1985-1988	2.8L L6 2754cc	5MGE		OPT-063
	1989-1992	3.0L L6 2954cc	7MGE; Luxury		OPT-061
Echo	2000-2005	1.5L L4 1497cc	1NZFE	Includes Timing Cover	OPT-115
Highlander	2001-2007	2.4L L4 2362cc	2AZFE		OPT-803
	2001-2003	3.0L V6 2995cc	1MZFE		OPT-804
	2004-2007	3.3L V6 3300cc	3MZFE		OPT-804
	2006-2009	3.3L V6 3300cc	3MZFE; Hybrid		OPT-804
			3MZFE; Hybrid Limited		OPT-804
	2006-2007	3.3L V6 3300cc	3MZFE; Limited		OPT-804
		3MZFE; Sport		OPT-804	
Land Cruiser	1988-1990	4.0L L6 3956cc	3FE		OPT-017
	1991-1992	4.0L L6 3956cc	3FE		OPT-018
	1985-1987	4.2L L6 4227cc	2F		OPT-017
	2005	4.7L V8 4663cc	2UZFE	From 05/05	OPT-103
				To 05/05	OPT-012
	1998-2004	4.7L V8 4663cc	2UZFE		OPT-012
	2006-2007	4.7L V8 4663cc	2UZFE		OPT-103
Matrix	2003-2008	1.8L L4 1794cc	1ZZFE		OPT-044
			1ZZFE; VIN: R; XR		OPT-044
	2009-2013	1.8L L4 1798cc	2ZRFE		OPT-807
	2009	2.4L L4 2362cc	2AZFE; S		OPT-803
			2AZFE; XRS		OPT-803
MR2	1985-1987	1.6L L4 1587cc	4AGELC		OPT-036
	1988-1989	1.6L L4 1587cc	4AGELC; GT		OPT-036
			4AGZE; Super Charged		OPT-036
	1991	2.0L L4 1998cc	3SGTE; Turbo	To 05/91	OPT-079
				From 05/91	OPT-080
	1992-1995	2.0L L4 1998cc	3SGTE; Turbo		OPT-080
1991-1995	2.2L L4 2164cc	5SFE		OPT-074	
MR2 Spyder	2000-2005	1.8L L4 1794cc	1ZZFE		OPT-044
Paseo	1995	1.5L L4 1497cc	5EFE	California	OPT-010
				Exc. California	OPT-008
	1992-1994	1.5L L4 1497cc	5EFE		OPT-007
	1996-1998	1.5L L4 1497cc	5EFE		OPT-010
	1997	1.5L L4 1497cc	5EFE; Convertible		OPT-010
Pickup	1985-1990	2.4L L4 2366cc	22R		OPT-054
			22R; DLX		OPT-054
	1989-1995	2.4L L4 2366cc	22RE		OPT-054
			22RE; DLX		OPT-054
	1989-1993	2.4L L4 2366cc	22RE; SR5		OPT-054
	1985-1988	2.4L L4 2366cc	22REC		OPT-054
	1987-1988	2.4L L4 2366cc	22REC; DLX		OPT-054
	1985-1988	2.4L L4 2366cc	22REC; SR5		OPT-054
	1985	2.4L L4 2366cc	2L; DLX	Includes Timing Cover	OPT-P033
			2LT; DLX Turbo		OPT-P033
	1988-1991	3.0L V6 2959cc	3VZE		OPT-027
	1988-1995	3.0L V6 2959cc	3VZE; DLX		OPT-027
			3VZE; SR5		OPT-027
	Prius	2001-2009	1.5L L4 1497cc	1NZFE	Includes Timing Cover
2007-2009		1.5L L4 1497cc	1NZFXE; Touring		OPT-117
RAV4	2001-2003	2.0L L4 1998cc	1AZFE		OPT-048
	1996-2000	2.0L L4 1998cc	3SFE		OPT-075
	2004-2008	2.4L L4 2362cc	2AZFE		OPT-803
	2006-2008	2.4L L4 2362cc	2AZFE; Limited		OPT-803

Oil Pump



**Make/Model      Year      Engine      Attributes      Notes      Part #**

**Toyota**

RAV4	2006-2008	2.4L L4 2362cc	2AZFE; Sport		OPT-803
Sequoia	2001-2004	4.7L V8 4663cc	2UZFE		OPT-012
	2004-2009	4.7L V8 4663cc	2UZFE	From 08/04; To 04/09	OPT-806
	2005-2007	4.7L V8 4663cc	2UZFE; Limited	Engine Serial # Starts With 0 OR 9	OPT-103
			2UZFE; SR5	Engine Serial # Starts With 0 OR 9	OPT-103
Sienna	1998-2000	3.0L V6 2995cc	1MZFE		OPT-037
	2001-2003	3.0L V6 2995cc	1MZFE		OPT-801
	2004	3.0L V6 2995cc	1MZFE		OPT-804
	2005-2006	3.3L V6 3300cc	3MZFE; CE		OPT-804
			3MZFE; LE		OPT-804
	2006	3.3L V6 3300cc	3MZFE; Limited		OPT-804
	2005-2006	3.3L V6 3300cc	3MZFE; XLE		OPT-804
	2005	3.3L V6 3300cc	3MZFE; XLE Limited		OPT-804
Solara	1999-2001	2.2L L4 2164cc	5SFE; SE		OPT-073
	2004	2.4L L4 2362cc	2AZFE		OPT-803
	2002-2008	2.4L L4 2362cc	2AZFE; SE		OPT-803
	2006	2.4L L4 2362cc	2AZFE; SE Sport		OPT-803
	2005-2008	2.4L L4 2362cc	2AZFE; SLE		OPT-803
	2007-2008	2.4L L4 2362cc	2AZFE; Sport		OPT-803
	1999-2003	3.0L V6 2995cc	1MZFE		OPT-037
	2004	3.3L V6 3300cc	3MZFE		OPT-804
	2005-2008	3.3L V6 3300cc	3MZFE; SE		OPT-804
	2006	3.3L V6 3300cc	3MZFE; SE Sport		OPT-804
	2005-2008	3.3L V6 3300cc	3MZFE; SLE		OPT-804
	2007-2008	3.3L V6 3300cc	3MZFE; Sport		OPT-804
	Supra	1986-1992	3.0L L6 2954cc	7MGE	
1991		3.0L L6 2954cc	7MGTE		OPT-059
1987-1992		3.0L L6 2954cc	7MGTE; Turbo		OPT-059
1993-1995		3.0L L6 2997cc	2JZGE		OPT-070
1996-1998		3.0L L6 2997cc	2JZGE		OPT-071
T100	1993	3.0L V6 2959cc	3VZE		OPT-027
			3VZE; One-Ton		OPT-027
	1993-1994	3.0L V6 2959cc	3VZE; SR5		OPT-027
	1995-1998	3.4L V6 3378cc	5VZFE		OPT-021
	1996-1997	3.4L V6 3378cc	5VZFE; DLX		OPT-021
	1995	3.4L V6 3378cc	5VZFE; One-Ton DLX		OPT-021
	1995-1997	3.4L V6 3378cc	5VZFE; SR5		OPT-021
Tacoma	1998-2004	3.4L V6 3378cc	5VZFE		OPT-022
	1995-1997	3.4L V6 3378cc	5VZFE; DLX		OPT-022
			5VZFE; SR5		OPT-022
Tercel	1986	1.5L L4 1452cc	3A; STD		OPT-031
	1985-1988	1.5L L4 1452cc	3AC; DLX		OPT-031
	1987	1.5L L4 1452cc	3AC; DX		OPT-031
	1985-1988	1.5L L4 1452cc	3AC; SR5		OPT-031
	1985	1.5L L4 1452cc	3AC; STD		OPT-031
	1989	1.5L L4 1456cc	3E		OPT-004
	1987-1988	1.5L L4 1456cc	3E; DLX		OPT-004
	1988	1.5L L4 1456cc	3E; EZ		OPT-004
	1987-1990	1.5L L4 1456cc	3E; STD		OPT-004
	1991-1994	1.5L L4 1456cc	3EE; DLX		OPT-004
	1990	1.5L L4 1456cc	3EE; DX		OPT-004
			3EE; EZ		OPT-004
	1991-1993	1.5L L4 1456cc	3EE; LE		OPT-004
	1991-1994	1.5L L4 1456cc	3EE; STD		OPT-004
	1997-1998	1.5L L4 1497cc	5EFE		OPT-010

Oil Pump





# Oil Pump Images



OPG-001



OPG-003



OPG-004



OPG-005



OPG-006



OPG-008







# Oil Pump Images



OPG-009



OPG-011



OPG-012



OPH-800



OPN-701



OPN-702



Oil Pump



# Oil Pump Images



OPN-703



OPN-704



OPN-705



OPN-706



OPN-707



OPN-708





# Oil Pump Images



OPN-709



OPN-710



OPS-001



OPT-001



OPT-004



OPT-007



Oil Pump



# Oil Pump Images



OPT-008



OPT-010



OPT-011



OPT-012



OPT-017



OPT-018





# Oil Pump Images



OPT-019



OPT-020



OPT-021



OPT-022



OPT-023



OPT-024



Oil Pump



# Oil Pump Images



OPT-025



OPT-027



OPT-030



OPT-031



OPT-032



OPT-033



Oil Pump



# Oil Pump Images



OPT-034



OPT-035



OPT-036



OPT-037



OPT-039



OPT-044



Oil Pump



# Oil Pump Images



OPT-048



OPT-054



OPT-059



Oil Pump



OPT-060



OPT-061



OPT-063







# Oil Pump Images



OPT-070



OPT-071



OPT-073



OPT-074



OPT-075



OPT-076



Oil Pump



# Oil Pump Images



OPT-078



OPT-079



OPT-080



OPT-097



OPT-103



OPT-108



Oil Pump



# Oil Pump Images



OPT-115



OPT-117

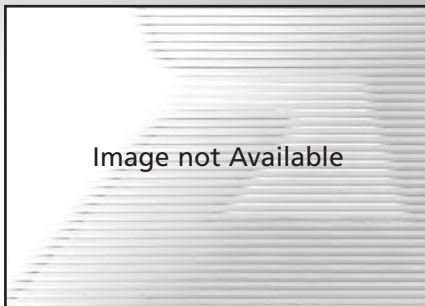


Image not Available

OPT-801

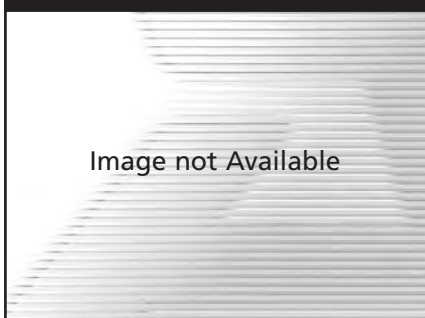


Image not Available

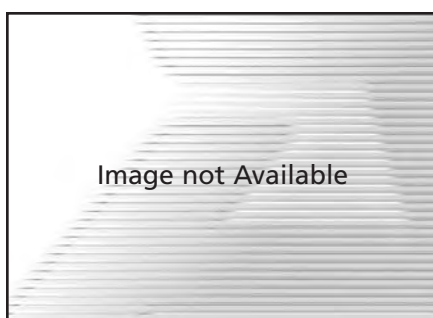


Image not Available

OPT-803



OPT-804



OPT-805

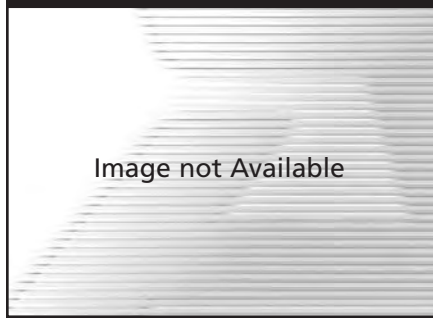
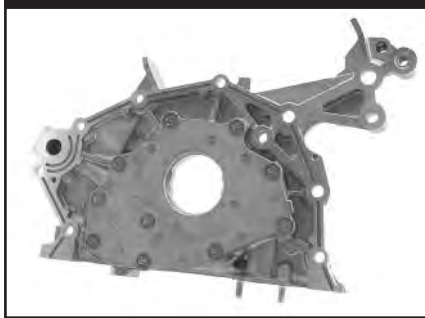


Image not Available



Oil Pump



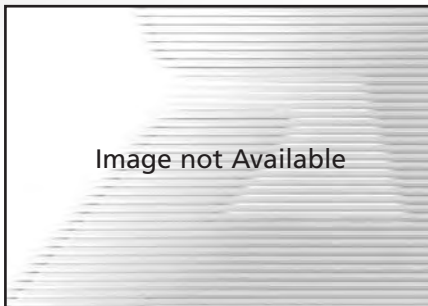
# Oil Pump Images



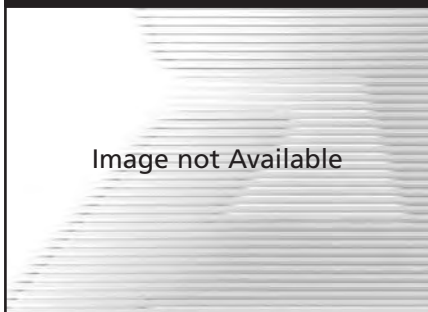
OPT-806



OPT-807



OPT-P033



Oil Pump



# Buyer's Guide

## Oil Pump

Part #	Year	Application	Part #	Year	Application
OPG-001	1985-1989	Isuzu I-Mark	OPS-001	1989-1995	Suzuki Swift
OPG-003	1990	Isuzu Impulse	OPT-001	1987-1988	Toyota Corolla
OPG-003	1991	Isuzu Stylus	OPT-004	1987-1994	Toyota Tercel
OPG-004	1991-1993	Isuzu Stylus	OPT-007	1992-1994	Toyota Paseo
OPG-005	1985	Isuzu Trooper	OPT-008	1995	Toyota Paseo
OPG-005	1985-1987	Isuzu Impulse	OPT-010	1995-1998	Toyota Paseo
OPG-005	1985-1987	Isuzu Pickup	OPT-010	1995-1998	Toyota Tercel
OPG-006	1991-1992	Isuzu Impulse	OPT-011	1995-1997	Lexus LS400
OPG-008	1992-1997	Isuzu Trooper	OPT-011	1995-1997	Lexus SC400
OPG-008	1993-1997	Isuzu Rodeo	OPT-012	2000-2004	Toyota Tundra
OPG-008	1994-1997	Honda Passport	OPT-012	2001-2004	Toyota Sequoia
OPG-008	1996-1997	Acura SLX	OPT-012	1998-2005	Lexus LX470
OPG-009	1998-1999	Acura SLX	OPT-012	1998-2005	Toyota Land Cruiser
OPG-009	1998-2000	Isuzu Amigo	OPT-012	2003-2005	Lexus GX470
OPG-009	1999-2001	Isuzu VehiCROSS	OPT-012	2003-2005	Toyota 4Runner
OPG-009	1998-2002	Honda Passport	OPT-017	1985-1990	Toyota Land Cruiser
OPG-009	1998-2002	Isuzu Trooper	OPT-018	1991-1992	Toyota Land Cruiser
OPG-009	2001-2003	Isuzu Rodeo Sport	OPT-019	1988-1991	Toyota Camry
OPG-009	2002-2003	Isuzu Axiom	OPT-019	1990-1991	Lexus ES250
OPG-009	1998-2004	Isuzu Rodeo	OPT-020	1992-1993	Lexus ES300
OPG-012	2004	Isuzu Axiom	OPT-020	1992-1993	Toyota Camry
OPG-012	2004	Isuzu Rodeo	OPT-021	1995-1998	Toyota T100
OPH-800	2006	Honda Ridgeline	OPT-022	1996-2002	Toyota 4Runner
OPH-800	2004-2007	Honda Accord	OPT-022	1995-2004	Toyota Tacoma
OPH-800	2005-2007	Acura TL	OPT-022	2000-2004	Toyota Tundra
OPH-800	2005-2007	Honda Odyssey	OPT-023	1986	Toyota Celica
OPH-800	2005-2008	Acura RL	OPT-023	1985-1986	Toyota Camry
OPH-800	2005-2008	Honda Pilot	OPT-024	1985	Toyota Corolla
OPN-701	1991-1993	Nissan NX	OPT-025	1985-1986	Toyota Camry
OPN-701	1991-1993	Nissan Sentra	OPT-027	1993-1994	Toyota T100
OPN-702	1994-1999	Nissan Sentra	OPT-027	1988-1995	Toyota 4Runner
OPN-703	1998-2002	Nissan Quest	OPT-027	1988-1995	Toyota Pickup
OPN-704	2003-2007	Nissan Altima	OPT-030	1985-1989	Toyota Van
OPN-704	2004-2007	Nissan Quest	OPT-031	1985-1987	Toyota Corolla
OPN-704	2004-2008	Nissan Maxima	OPT-031	1985-1988	Toyota Tercel
OPN-705	2002-2006	Nissan Altima	OPT-032	1993-1995	Toyota Corolla
OPN-705	2002-2006	Nissan Sentra	OPT-033	1996-1997	Toyota Corolla
OPN-706	2000-2006	Nissan Sentra	OPT-034	1993-1994	Toyota Corolla
OPN-707	2004-2009	Infiniti QX56	OPT-034	1994-1995	Toyota Celica
OPN-707	2004-2009	Nissan Titan	OPT-035	1995-1997	Toyota Corolla
OPN-707	2005-2009	Nissan Armada	OPT-035	1996-1997	Toyota Celica
OPN-707	2004-2009	Nissan Pathfinder	OPT-036	1985-1989	Toyota Corolla
OPN-708	1999-2004	Nissan Frontier	OPT-036	1985-1989	Toyota MR2
OPN-708	2000-2004	Nissan Xterra	OPT-037	1995-1999	Toyota Avalon
OPN-709	2007-2010	Nissan Versa	OPT-037	1998-2000	Toyota Sienna
OPN-710	2007-2009	Nissan Altima	OPT-037	1994-2001	Toyota Camry
OPS-001	1989	Suzuki Sidekick	OPT-037	1994-1998, 2000-2001	Lexus ES300
OPS-001	1986-1995	Suzuki Samurai	OPT-037	1999-2003	Toyota Solara



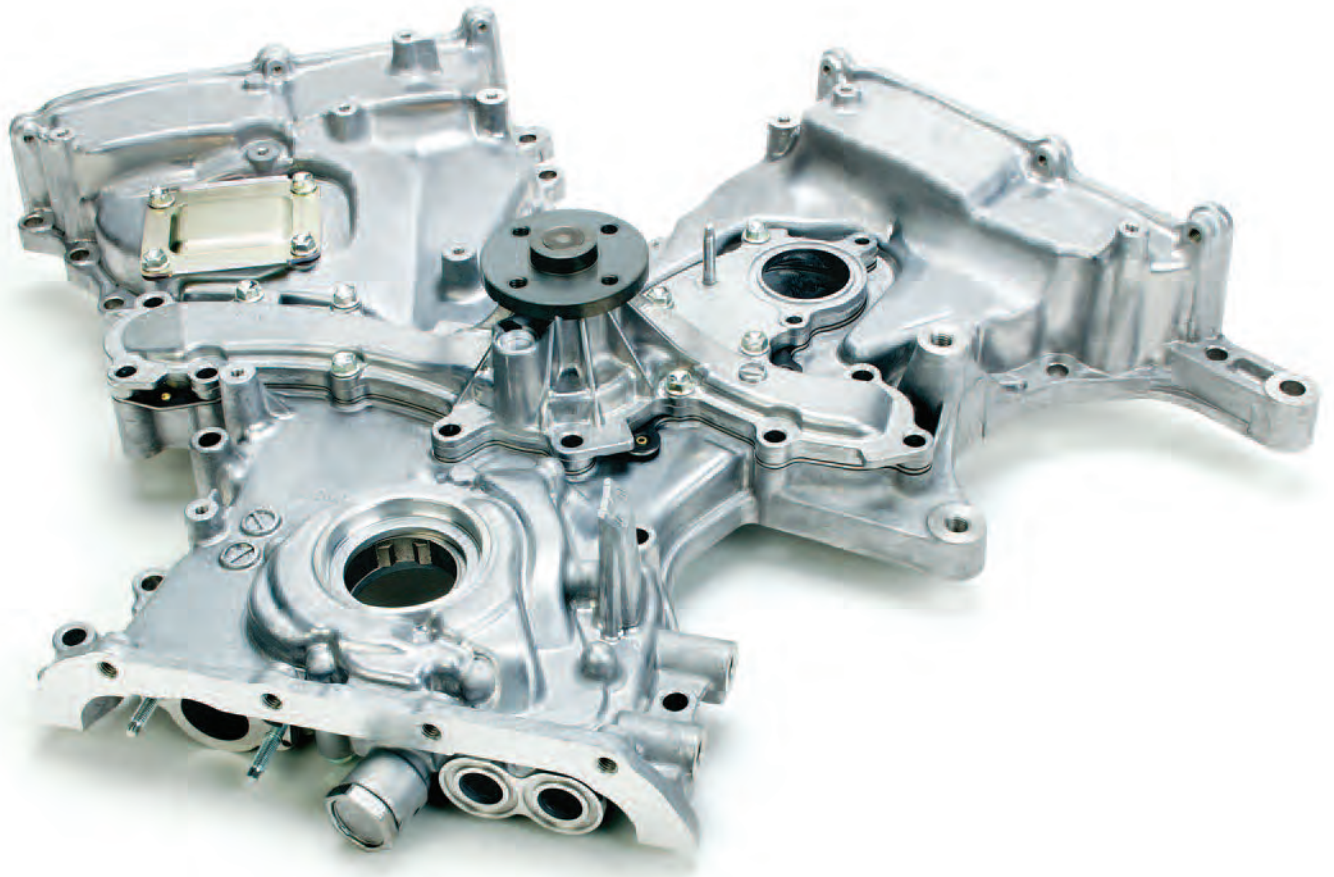
# Buyer's Guide

## Oil Pump

Oil Pump

Part #	Year	Application	Part #	Year	Application
OPT-117	2000-2005	Toyota Prius	OPT-103	2001-2006	Lexus SC400
OPT-044	2000-2005	Toyota Celica	OPT-103	2001-2007	Lexus LS430
OPT-044	1998-2008	Toyota MR2 Spyder	OPT-103	2005-2007	Lexus GS430
OPT-044	2003-2008	Toyota Corolla	OPT-103	2005-2007	Lexus LX470
OPT-044	2001-2003	Toyota Matrix	OPT-103	2005-2007	Toyota Land Cruiser
OPT-048	1985	Toyota RAV4	OPT-103	2002-2009	Toyota Sequoia
OPT-054	1985-1995	Toyota Celica	OPT-103	2005-2009	Lexus SC430
OPT-054	1985-1995	Toyota 4Runner	OPT-103	2005-2009	Lexus GX470
OPT-054	1985-1988	Toyota Pickup	OPT-103	2000-2005	Toyota 4Runner
OPT-055	1985-1988	Toyota 4Runner	OPT-115	2004-2006	Toyota Echo
OPT-055	1987-1992	Toyota Pickup	OPT-115	2004-2006	Scion xA
OPT-059	1986-1992	Toyota Supra	OPT-115	2007-2009	Scion xB
OPT-060	1989-1992	Toyota Supra	OPT-115	2001-2009	Toyota Yaris
OPT-061	1985	Toyota Cressida	OPT-801	1999-2001	Lexus ES300
OPT-063	1985-1988	Toyota Celica	OPT-801	2000-2001	Toyota Camry
OPT-063	1992-1995	Toyota Cressida	OPT-801	1999-2003	Lexus RX300
OPT-070	1993-1995	Lexus SC300	OPT-801	2001-2003	Toyota Sienna
OPT-070	1993-1995	Lexus GS300	OPT-801	2000-2004	Toyota Avalon
OPT-070	1996-1998	Toyota Supra	OPT-803	2009	Toyota Corolla
OPT-071	1996-2000	Toyota Supra	OPT-803	2009	Toyota Matrix
OPT-071	1996-2005	Lexus SC300	OPT-803	2001-2007	Toyota Highlander
OPT-071	2001-2005	Lexus GS300	OPT-803	2002-2008	Toyota Solara
OPT-071	1992-2001	Lexus IS300	OPT-803	2004-2008	Toyota RAV4
OPT-073	1999-2001	Toyota Camry	OPT-803	2002-2009	Toyota Camry
OPT-073	1987-1991	Toyota Solara	OPT-803	2005-2009	Scion tC
OPT-074	1987-1995	Toyota Camry	OPT-803	2008-2009	Scion xB
OPT-074	1991-1995	Toyota Celica	OPT-804	2002-2003	Lexus ES300
OPT-074	1996-1999	Toyota MR2	OPT-804	2003-2006	Toyota Camry
OPT-075	1996-2000	Toyota Celica	OPT-804	2004-2006	Lexus ES330
OPT-075	1996	Toyota RAV4	OPT-804	2004-2006	Lexus RX330
OPT-076	1986-1989	Toyota Celica	OPT-804	2004-2006	Toyota Sienna
OPT-078	1991	Toyota Celica	OPT-804	2004-2008	Toyota Solara
OPT-079	1988-1991	Toyota MR2	OPT-804	2006-2008	Lexus RX400h
OPT-079	1992-1993	Toyota Celica	OPT-804	2001-2009	Toyota Highlander
OPT-080	1991-1995	Toyota Celica	OPT-805	2002-2003	Toyota Camry
OPT-080	1988-1992	Toyota MR2	OPT-806	2004-2009	Toyota Sequoia
OPT-097	1990-1993	Toyota Corolla	OPT-806	2004-2009	Toyota Tundra
OPT-097	1998-2000	Toyota Celica	OPT-807	2009-2013	Toyota Corolla
OPT-103	1998-2000	Lexus GS400	OPT-807	2009-2013	Toyota Matrix
OPT-103	1998-2000	Lexus LS400	OPT-P033	1985	Toyota Pickup

# Timing Chain Cover



AISIN Timing Chain Cover Assemblies, equipped with an AISIN brand Water Pump, and Oil Pump, offers precise fitment, optimal cooling and lubrication, providing protection for vital moving parts.

- Module-Oriented assembly allow for easy, one step replacement of the timing chain cover, water pump and oil pump.
- Precision fitment to protect the timing chain and gears from debris.







# Timing Chain Cover Applications

Make/Model	Year	Engine	Attributes	Notes	Part #
<b>Lexus</b>					
LX450	1996-1997	4.5L L6 4477cc	1FZFE		TCT-073
RX350	2007	3.5L V6 3456cc	2GRFE		TCT-800
<b>Toyota</b>					
4Runner	1984	2.4L L4 2366cc	22R	From 08/84	TCT-072
	1990-1995	2.4L L4 2366cc	22RE		TCT-072
	1985-1989	2.4L L4 2366cc	22REC		TCT-072
	1996-2000	2.7L L4 2694cc	3RZFE		TCT-069
Avalon	2005-2010	3.5L V6 3456cc	2GRFE		TCT-800
Camry	2007-2010	3.5L V6 3456cc	2GRFE		TCT-800
Celica	1984-1985	2.4L L4 2366cc	22REC		TCT-072
Highlander	2008-2010	3.5L V6 3456cc	2GRFE		TCT-800
Land Cruiser	1993-1997	4.5L L6 4477cc	1FZFE		TCT-073
Pickup	1984	2.4L L4 2366cc	22R	From 08/84	TCT-072
	1985-1990	2.4L L4 2366cc	22R		TCT-072
	1989-1995	2.4L L4 2366cc	22RE		TCT-072
	1984-1988	2.4L L4 2366cc	22REC		TCT-072
	1984-1985	2.4L L4 2446cc	2L		TCT-074
	1985	2.4L L4 2446cc	2LT		TCT-074
Previa	1991-1993	2.4L L4 2438cc	2TZFE		TCT-071
	1994	2.4L L4 2438cc	2TZFE	To 01/94	TCT-071
			2TZFZE	To 01/94	TCT-071
	2006-2010	3.5L V6 3456cc	2GRFE		TCT-800
Sienna	2007-2010	3.5L V6 3456cc	2GRFE		TCT-800
T100	1994-1998	2.7L L4 2694cc	3RZFE		TCT-069
Tacoma	2005-2007	2.7L L4 2694cc	2TRFE		TCT-076
	1995-2004	2.7L L4 2694cc	3RZFE		TCT-069
Venza	2009-2010	3.5L V6 3456cc	2GRFE		TCT-800

## Section Notes

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

Timing Chain Cover



# Timing Chain Cover Images



TCT-069



TCT-071



TCT-072



TCT-073



TCT-074



TCT-076



Timing Chain Cover



# Timing Chain Cover Images



TCT-800



## Section Notes

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

Timing Chain Cover



# Automatic Transmission Fluid



AISIN is the largest manufacturer of Automatic Transmissions in the world. By applying decades of knowledge, experience, and development in cooperation with vehicle manufacturers, AISIN has developed a state of the art ATF that will maximize performance and longevity of automotive transmissions.

- Aisin's specific formula developed by the #1 manufacturer of Japanese ATF's is engineered and designed specifically for Aisin transmissions.
- Excellent flow and temperature characteristics ensure smooth engagement in any weather condition.
- Optimally engineered for smooth shifting without shift shock. Fluid friction coefficient reduces drivetrain power loss, which enables better start and acceleration.
- ATF-0T4 specifically engineered for Toyota, Lexus, Scion and many other domestic and import vehicles.
- ATF-0WS specifically engineered for Toyota, Lexus and Scion. Low viscosity formula for increased fuel economy.





# Automatic Transmission Fluid Applications

Make/Model	Year	Engine	Attributes	Transmission Code	Notes	Part #
<b>Audi</b>						
Q7	2009-2010	3.0L V6 2967cc		09D		ATF-0T4
	2007-2010	3.6L V6 3597cc		09D		ATF-0T4
	2007-2010	4.2L V8 4163cc		09D		ATF-0T4
TT	2003-2006	1.8L L4 1781cc		09G		ATF-0T4
<b>Chevrolet</b>						
Aveo	2009-2011	1.6L L4 1598cc		AW81-40LE		ATF-0T4
	2004-2008	1.6L L4 1598cc		N/A		ATF-0T4
Aveo5	2009-2011	1.6L L4 1598cc		AW81-40LE		ATF-0T4
	2007-2008	1.6L L4 1598cc		N/A		ATF-0T4
Equinox	2005-2009	3.4L V6 207 CID		AF33		ATF-0T4
<b>Ford</b>						
Five Hundred	2005-2007	3.0L V6 183 CID		F21		ATF-0T4
Fusion	2006-2009	2.3L L4 140 CID		F21		ATF-0T4
	2010-2012	2.5L L4 2488cc		6F35		ATF-0T4
	2010-2012	3.0L V6 183 CID		6F35		ATF-0T4
	2006-2009	3.0L V6 183 CID		F21		ATF-0T4
	2010-2012	3.5L V6 3496cc		6F50		ATF-0T4
<b>Hyundai</b>						
Genesis	2009-2011	3.8L V6 3778cc		TB-60N		ATF-0WS
Veracruz	2007-2012	3.8L V6 3778cc		F21		ATF-0T4
<b>Land Rover</b>						
LR2	2008-2011	3.2L L6 3192cc		AWF21		ATF-0T4
<b>Lexus</b>						
CT200h	2011-2013	1.8L L4 1798cc	2ZRFXE	P410		ATF-0WS
ES300	1999-2001	3.0L V6 2995cc	1MZFE	A541E		ATF-0T4
				U140E		ATF-0T4
	2002-2003	3.0L V6 2995cc	1MZFE	U150E		ATF-0T4
ES330	2004-2006	3.3L V6 3300cc	3MZFE	U151E		ATF-0T4
ES350	2007-2013	3.5L V6 3456cc	2GRFE	U660E		ATF-0WS
GS300	1993-1995	3.0L L6 2997cc	2JZGE	A340E		ATF-0T4
	1996-1997	3.0L L6 2997cc	2JZGE	A350E		ATF-0T4
	1998-2005	3.0L L6 2997cc	2JZGE	A650E		ATF-0T4
	2006	3.0L V6 2994cc	3GRFSE	A760H		ATF-0WS
				A960E		ATF-0WS
GS350	2007-2013	3.5L V6 3456cc	2GRFSE	A760H		ATF-0WS
	2007-2011	3.5L V6 3456cc	2GRFSE	A960E		ATF-0WS
	2013	3.5L V6 3456cc	2GRFSE	A760E		ATF-0WS
GS400	1998-2000	4.0L V8 3969cc	1UZFE	A650E		ATF-0T4
GS430	2001-2005	4.3L V8 4293cc	3UZFE	A650E		ATF-0T4
	2006-2007	4.3L V8 4293cc	3UZFE	A761E		ATF-0WS
GS450h	2007-2011	3.5L V6 3456cc	2GRFSE	L110		ATF-0WS
	2013	3.5L V6 3456cc	2GRFXE	L110		ATF-0WS
GS460	2008-2011	4.6L V8 4608cc	1URFSE	AA80E		ATF-0WS
GX460	2010-2013	4.6L V8 4608cc	1URFE	A760F		ATF-0WS

Automatic  
Transmission Fluid



**Make/Model      Year      Engine      Attributes      Transmission Code      Notes      Part #**

**Lexus**

GX470	2003-2005	4.7L V8 4663cc	2UZFE	A750F		ATF-0T4
	2006-2009	4.7L V8 4663cc	2UZFE	A750F		ATF-0WS
HS250h	2010-2012	2.4L L4 2362cc	2AZFXE	P311		ATF-0WS
IS F	2008-2013	5.0L V8 4969cc	2URGSE	AA80E		ATF-0WS
IS250	2006-2013	2.5L V6 2499cc	4GRFSE	A760H		ATF-0WS
	2009-2013	2.5L V6 2499cc	4GRFSE	A960E		ATF-0WS
IS300	2001-2005	3.0L L6 2997cc	2JZGE	A650E		ATF-0T4
IS350	2006	3.5L V6 3456cc	2GRFSE	A760E		ATF-0T4
	2007-2013	3.5L V6 3456cc	2GRFSE	A760E		ATF-0WS
	2011-2013	3.5L V6 3456cc	2GRFSE	A760H		ATF-0WS
LS400	1990-1994	4.0L V8 3967cc	1UZFE	A341E		ATF-0T4
	1995	4.0L V8 3967cc	1UZFE	A340E		ATF-0T4
	1996-1997	4.0L V8 3969cc	1UZFE	A340E		ATF-0T4
	1998-2000	4.0L V8 3969cc	1UZFE	A650E		ATF-0T4
LS430	2001-2003	4.3L V8 4293cc	3UZFE	A650E		ATF-0T4
	2004-2006	4.3L V8 4293cc	3UZFE	A761E		ATF-0WS
LS460	2007-2013	4.6L V8 4608cc	1URFSE	AA80E		ATF-0WS
LX470	2003	4.7L V8 4663cc	2UZFE	A750F		ATF-0T4
	2004-2007	4.7L V8 4663cc	2UZFE	A750F		ATF-0WS
LX570	2008-2013	5.7L V8 5663cc	3URFE	AB60F		ATF-0WS
RX300	1999-2003	3.0L V6 2995cc	1MZFE	U140E		ATF-0T4
				U140F		ATF-0T4
RX330	2004-2006	3.3L V6 3300cc	3MZFE	U151E		ATF-0T4
				U151F		ATF-0T4
RX350	2007-2009	3.5L V6 3456cc	2GRFE	U151E		ATF-0WS
				U151F		ATF-0WS
	2010-2013	3.5L V6 3456cc	2GRFE	U660E		ATF-0WS
				U660F		ATF-0WS
RX400h	2006-2008	3.3L V6 3300cc	3MZFE	N/A		ATF-0WS
RX450h	2010-2012	3.5L V6 3456cc	2GRFXE	N/A		ATF-0WS
	2013	3.5L V6 3456cc	2GRFXE	P313		ATF-0WS
SC300	1998-2000	3.0L L6 2997cc	2JZGE	A340E		ATF-0T4
SC400	1992-1995	4.0L V8 3967cc	1UZFE	A340E		ATF-0T4
	1996-1997	4.0L V8 3969cc	1UZFE	A340E		ATF-0T4
	1998-2000	4.0L V8 3969cc	1UZFE	A650E		ATF-0T4
SC430	2002-2005	4.3L V8 4293cc	3UZFE	A650E		ATF-0T4
	2006-2007	4.3L V8 4293cc	3UZFE	A761E		ATF-0T4
	2008-2010	4.3L V8 4293cc	3UZFE	A761E		ATF-0WS

**Lincoln**

MKZ	2009-2010	3.5L V6 3490cc		N/A		ATF-0T4
	2007	3.5L V6 3496cc		F21		ATF-0T4
	2008	3.5L V6 3496cc		N/A		ATF-0T4
Zephyr	2006	3.0L V6 183 CID		F21		ATF-0T4

**Mazda**

6	2006-2008	3.0L V6 2968cc		F21		ATF-0T4
	2009-2013	3.7L V6 3726cc		AW6AEL		ATF-0T4
CX-7	2007-2012	2.3L L4 2260cc		N/A		ATF-0T4
	2010-2012	2.5L L4 2488cc		N/A		ATF-0T4
CX-9	2007	3.5L V6 3496cc		6F		ATF-0T4
	2008-2012	3.7L V6 3726cc		6F		ATF-0T4
	2010	3.7L V6 3726cc		N/A		ATF-0T4
MX-5 Miata	2006-2012	2.0L L4 2000cc		N/A		ATF-0T4
RX-8	2007-2011	1.3L R2 1308cc		N/A		ATF-0T4

**Automatic Transmission Fluid**





**Make/Model      Year      Engine      Attributes      Transmission Code      Notes      Part #**

**Mercury**

Milan	2006-2009	2.3L L4 140 CID		F21		ATF-0T4
	2006-2009	3.0L V6 183 CID		F21		ATF-0T4
	2007-2008	3.0L V6 183 CID		AWF21		ATF-0T4
Montego	2005-2007	3.0L V6 183 CID		F21		ATF-0T4

**Mini**

Cooper	2007-2012	1.6L L4 1598cc		GA6F21WA		ATF-0T4
	2005-2008	1.6L L4 1600cc		GA6F21WA		ATF-0T4
Cooper Countryman	2011-2012	1.6L L4 1598cc		GA6F21WA		ATF-0T4

**Pontiac**

G3	2009-2010	1.6L L4 1598cc		AW81-40LE		ATF-0T4
Torrent	2006-2009	3.4L V6 207 CID		AF33		ATF-0T4
Vibe	2003-2008	1.8L L4 1794cc	1ZZFE	N/A		ATF-0T4
				U250E		ATF-0WS
	2009-2010	1.8L L4 1798cc	U341E		ATF-0WS	
			U140F		ATF-0WS	
			U250E		ATF-0WS	
2009-2010	2.4L L4 2362cc	U341E		ATF-0WS		

**Porsche**

Cayenne	2004-2006	3.2L V6 3189cc		Tiptronic S		ATF-0T4
	2003-2006	4.5L V8 4511cc		Tiptronic S		ATF-0T4
Cayman	2007-2008	2.7L H6 2687cc		Tiptronic S		ATF-0T4
	2007-2008	3.4L H6 3387cc		Tiptronic S		ATF-0T4

**Saab**

9-3	2003-2011	2.0L L4 1985cc		AW55-50SN	Trans Type FA-57 AW55-50SN	ATF-0T4
9-5	2003-2011	2.3L L4 2290cc		AW55-50SN	Trans Type FA-57 AW55-50SN	ATF-0T4
	2010	2.8L V6 2792cc		AW55-50SN	Trans Type FA-57 AW55-50SN	ATF-0T4

**Saturn**

Astra	2008-2009	1.8L L4 1796cc	2H0	AF17		ATF-0T4
Ion	2004	2.0L L4 122 CID		AF23/M43		ATF-0T4
Vue	2002-2003	2.2L L4 134 CID		AF33/M45		ATF-0T4
	2002-2003	3.0L V6 3000cc		AF33/M45		ATF-0T4

**Scion**

FR-S	2013	2.0L H4 1998cc	FA20	TX6A		ATF-0WS
tC	2010	2.4L L4 2362cc	2AZFE	U241E		ATF-0WS
	2005-2006	2.4L L4 2398cc	2AZFE	U241E		ATF-0T4
	2007-2009	2.4L L4 2398cc	2AZFE	U241E		ATF-0WS
	2011-2012	2.5L L4 2494cc	2ARFE	U760E		ATF-0WS
	2004-2006	1.5L L4 1497cc	1NZFE	U340E		ATF-0T4
xB	2004-2006	1.5L L4 1497cc	1NZFE	U340E		ATF-0T4
	2008-2013	2.4L L4 2362cc	2AZFE	U241E		ATF-0WS
xD	2008-2013	1.8L L4 1798cc	2ZRFE	U341E		ATF-0WS

**Suzuki**

XL-7	2007-2008	3.6L V6 3564cc	N36A	AF33		ATF-0T4
------	-----------	----------------	------	------	--	---------

**Toyota**

4Runner	2010	2.7L L4 2694cc	2TRFE	A343E		ATF-0WS
				A750E		ATF-0WS
				A750F		ATF-0WS

**Automatic  
Transmission Fluid**



**Make/Model      Year      Engine      Attributes      Transmission Code      Notes      Part #**

**Toyota**

4Runner	2003-2004	4.0L V6 3956cc	1GRFE	A340E		ATF-0T4	
				A340F		ATF-0T4	
	2010	4.0L V6 3956cc	1GRFE	A343E		ATF-0WS	
	2003	4.0L V6 3956cc	1GRFE	A750E		ATF-0T4	
	2004-2013	4.0L V6 3956cc	1GRFE	A750E		ATF-0WS	
	2003	4.0L V6 3956cc	1GRFE	A750F		ATF-0T4	
	2004-2013	4.0L V6 3956cc	1GRFE	A750F		ATF-0WS	
	2003-2004	4.7L V8 4663cc		2UZFE	A340E		ATF-0T4
					A340F		ATF-0T4
	2003	4.7L V8 4663cc		2UZFE	A750E		ATF-0T4
	2004-2009	4.7L V8 4663cc		2UZFE	A750E		ATF-0WS
	2003	4.7L V8 4663cc		2UZFE	A750F		ATF-0T4
2004-2009	4.7L V8 4663cc		2UZFE	A750F		ATF-0WS	
Avalon	2006-2007	3.5L V6 3456cc	2GRFE	U151E		ATF-0WS	
	2008-2011	3.5L V6 3456cc	2GRFE	U660E		ATF-0WS	
	2012	3.5L V6 3456cc	2GRFE	U660E		ATF-0T4	
Camry	2002-2003	2.4L L4 2362cc	2AZFE	U140E		ATF-0T4	
	2002-2004	2.4L L4 2362cc	2AZFE	U241E		ATF-0T4	
	2003-2006	2.4L L4 2362cc	2AZFE	U151E		ATF-0T4	
	2005-2006	2.4L L4 2362cc	2AZFE	U250E		ATF-0T4	
	2007-2009	2.4L L4 2362cc		2AZFE	U250E		ATF-0WS
					U660E		ATF-0WS
	2010-2011	2.5L L4 2494cc		2ARFE	U660E		ATF-0WS
					U760E		ATF-0WS
	2002-2003	3.0L V6 2995cc	1MZFE	U140E		ATF-0T4	
	2003-2006	3.0L V6 2995cc	1MZFE	U151E		ATF-0T4	
	2002-2004	3.0L V6 2995cc	1MZFE	U241E		ATF-0T4	
	2005-2006	3.0L V6 2995cc	1MZFE	U250E		ATF-0T4	
	2004-2006	3.3L V6 3300cc	3MZFE	U151E		ATF-0T4	
	2004	3.3L V6 3300cc	3MZFE	U241E		ATF-0T4	
	2005-2006	3.3L V6 3300cc	3MZFE	U250E		ATF-0T4	
	2007-2009	3.5L V6 3456cc	2GRFE	U250E		ATF-0WS	
	2007-2011	3.5L V6 3456cc	2GRFE	U660E		ATF-0WS	
	2010-2011	3.5L V6 3456cc	2GRFE	U760E		ATF-0WS	
	Celica	2000-2005	1.8L L4 1794cc	1ZZFE	U341E		ATF-0T4
		2000-2005	1.8L L4 1795cc	2ZZGE	U240E		ATF-0T4
Corolla	2003-2008	1.8L L4 1794cc	1ZZFE	A245E		ATF-0T4	
	2009-2012	1.8L L4 1798cc	2ZRFE	U341E		ATF-0WS	
	2009-2010	2.4L L4 2362cc	2AZFE	U250E		ATF-0WS	
Echo	2000-2005	1.5L L4 1497cc	1NZFE	U340E		ATF-0T4	
FJ Cruiser	2007-2013	4.0L V6 3956cc	1GRFE	A750E		ATF-0WS	
				A750F		ATF-0WS	
Highlander	2001-2003	2.4L L4 2362cc	2AZFE	U140E		ATF-0T4	
	2001-2007	2.4L L4 2362cc	2AZFE	U140F		ATF-0T4	
				U241E		ATF-0T4	
				U151E		ATF-0T4	
	2004-2006	2.4L L4 2362cc	2AZFE	U151F		ATF-0T4	
				U151E		ATF-0WS	
	2007	2.4L L4 2362cc	2AZFE	U151F		ATF-0WS	
	2009-2012	2.7L L4 2672cc	1ARFE	U151E		ATF-0WS	
				U151F		ATF-0WS	
				U760E		ATF-0WS	
2001-2003	3.0L V6 2995cc	1MZFE	U140E		ATF-0T4		
			U140F		ATF-0T4		
			U241E		ATF-0T4		

**Automatic Transmission Fluid**



**Make/Model      Year      Engine      Attributes      Transmission Code      Notes      Part #**

**Toyota**

Highlander	2004-2006	3.3L V6 3300cc	3MZFE	U151E		ATF-0T4
				U151F		ATF-0T4
	2004-2007	3.3L V6 3300cc	3MZFE	U140F		ATF-0T4
				U241E		ATF-0T4
	2007	3.3L V6 3300cc	3MZFE	U151E		ATF-0WS
				U151F		ATF-0WS
2008-2012	3.5L V6 3456cc	2GRFE	U151E		ATF-0WS	
			U151F		ATF-0WS	
	2009-2012	3.5L V6 3456cc	2GRFE	U760E		ATF-0WS
Land Cruiser	2003	4.7L V8 4663cc	2UZFE	A750F		ATF-0T4
	2004-2007	4.7L V8 4663cc	2UZFE	A750F		ATF-0WS
	2008-2013	5.7L V8 5663cc	3URFE	AB60F		ATF-0WS
Matrix	2003-2008	1.8L L4 1794cc	1ZZFE	A246E		ATF-0T4
	2003-2006	1.8L L4 1794cc	1ZZFE	U341F		ATF-0T4
	2003	1.8L L4 1795cc	2ZZGE	U240E		ATF-0T4
	2009-2013	1.8L L4 1798cc	2ZRFE	U341E		ATF-0WS
	2009-2013	2.4L L4 2362cc		U140F		ATF-0WS
				U250E		ATF-0WS
Prius	2001-2003	1.5L L4 1497cc	1NZFXE	P111		ATF-0T4
	2004-2009	1.5L L4 1497cc	1NZFXE	N/A	Trans Code P112	ATF-0WS
	2010-2012	1.8L L4 1798cc	2ZR-FXE	N/A		ATF-0WS
Prius C	2012-2013	1.5L L4 1497cc	1NZFXE	P510		ATF-0WS
RAV4	2001-2003	2.0L L4 1998cc	1AZFE	U140F		ATF-0T4
				U241E		ATF-0T4
	1996-2000	2.0L L4 1998cc	3SFE	A540H		ATF-0T4
	2004-2005	2.4L L4 2362cc	2AZFE	U140F		ATF-0T4
	2006-2008	2.4L L4 2362cc	2AZFE	U140F		ATF-0WS
				U151E		ATF-0WS
				U151F		ATF-0WS
	2004-2005	2.4L L4 2362cc	2AZFE	U241E		ATF-0T4
	2006-2008	2.4L L4 2362cc	2AZFE	U241E		ATF-0WS
	2009-2012	2.5L L4 2494cc	2ARFE	U140F		ATF-0WS
				U151E		ATF-0WS
				U151F		ATF-0WS
				U241E		ATF-0WS
2006-2012	3.5L V6 3456cc	2GRFE	U140F		ATF-0WS	
			U151E		ATF-0WS	
			U151F		ATF-0WS	
			U241E		ATF-0WS	
Sequoia	2010-2012	4.6L V8 4608cc	1URFE	A760E		ATF-0WS
				A760F		ATF-0WS
				AB60E		ATF-0WS
				AB60F		ATF-0WS
	2003-2004	4.7L V8 4663cc	2UZFE	A340E		ATF-0T4
				A340F		ATF-0T4
	2005-2009	4.7L V8 4663cc	2UZFE	A750E		ATF-0WS
				A750F		ATF-0WS
	2008-2009	4.7L V8 4663cc	2UZFE	AB60E		ATF-0WS
				AB60F		ATF-0WS
	2009	5.7L V8 5663cc	3URFBE	A750E		ATF-0WS
				A750F		ATF-0WS
	2010-2012	5.7L V8 5663cc	3URFBE	A760E		ATF-0WS
				A760F		ATF-0WS
2009-2012	5.7L V8 5663cc	3URFBE	AB60E		ATF-0WS	
			AB60F		ATF-0WS	

**Automatic  
Transmission Fluid**



**Make/Model      Year      Engine      Attributes      Transmission Code      Notes      Part #**

**Toyota**

Sequoia	2008-2009	5.7L V8 5663cc	3URFE	A750E		ATF-0WS
				A750F		ATF-0WS
	2010-2012	5.7L V8 5663cc	3URFE	A760E		ATF-0WS
				A760F		ATF-0WS
	2008-2012	5.7L V8 5663cc	3URFE	AB60E		ATF-0WS
AB60F					ATF-0WS	
Sienna	2011-2012	2.7L L4 2672cc	1ARFE	U660E		ATF-0WS
				U660F		ATF-0WS
	2012	2.7L L4 2672cc	1ARFE	U760E		ATF-0WS
	2004-2006	3.3L V6 3300cc	3MZFE	U151E		ATF-0T4
				U151F		ATF-0T4
	2007-2010	3.5L V6 3456cc	2GRFE	U151E		ATF-0WS
				U151F		ATF-0WS
2011-2013	3.5L V6 3456cc	2GRFE	U660E		ATF-0WS	
			U660F		ATF-0WS	
2012	3.5L V6 3456cc	2GRFE	U760E		ATF-0WS	
Solara	2004-2008	2.4L L4 2362cc	2AZFE	U151E		ATF-0T4
	2002-2005	2.4L L4 2362cc	2AZFE	U241E		ATF-0T4
	2006	2.4L L4 2362cc	2AZFE	U250E		ATF-0T4
	2007-2008	2.4L L4 2362cc	2AZFE	U250E		ATF-0WS
	2002-2003	3.0L V6 2995cc	1MZFE	U241E		ATF-0T4
	2004-2008	3.3L V6 3300cc	3MZFE	U151E		ATF-0T4
	2004-2005	3.3L V6 3300cc	3MZFE	U241E		ATF-0T4
	2006-2008	3.3L V6 3300cc	3MZFE	U250E		ATF-0T4
Supra	1993-1998	3.0L L6 2997cc	2JZGE	A340E		ATF-0T4
			2JZGTE	A340E		ATF-0T4
Tacoma	2003-2004	2.4L L4 2438cc	2RZFE	A340E		ATF-0T4
				A340F		ATF-0T4
	2005-2013	2.7L L4 2694cc	2TRFE	A340E		ATF-0T4
				A750E		ATF-0WS
				A750F		ATF-0WS
	2003-2004	2.7L L4 2694cc	3RZFE	A340E		ATF-0T4
				A340F		ATF-0T4
	2003-2004	3.4L V6 3378cc	5VZFE	A340E		ATF-0T4
				A340F		ATF-0T4
	2005-2013	4.0L V6 3956cc	1GRFE	A340E		ATF-0T4
A750E					ATF-0WS	
A750F					ATF-0WS	
Tundra	2003-2004	3.4L V6 3378cc	5VZFE	A340E		ATF-0T4
				A340F		ATF-0T4
	2005-2013	4.0L V6 3956cc	1GRFE	A750E		ATF-0WS
				A750F		ATF-0WS
	2010-2013	4.0L V6 3956cc	1GRFE	A760E		ATF-0WS
				A760F		ATF-0WS
	2007-2013	4.0L V6 3956cc	1GRFE	AB60E		ATF-0WS
				AB60F		ATF-0WS
	2010-2013	4.6L V8 4608cc	1URFE	A750E		ATF-0WS
				A750F		ATF-0WS
				A760E		ATF-0WS
A760F					ATF-0WS	
AB60E					ATF-0WS	
2003-2004	4.7L V8 4663cc	2UZFE	A340E		ATF-0T4	
			A340F		ATF-0T4	
2005-2009	4.7L V8 4663cc	2UZFE	A750E		ATF-0WS	

**Automatic  
Transmission Fluid**



**Make/Model      Year      Engine      Attributes      Transmission Code      Notes      Part #**

**Toyota**

Tundra	2005-2009	4.7L V8 4663cc	2UZFE	A750F		ATF-0WS
	2007-2009	4.7L V8 4663cc	2UZFE	AB60E		ATF-0WS
				AB60F		ATF-0WS
	2009-2013	5.7L V8 5663cc	3URFBE	A750E		ATF-0WS
				A750F		ATF-0WS
	2010-2013	5.7L V8 5663cc	3URFBE	A760E		ATF-0WS
				A760F		ATF-0WS
	2009-2013	5.7L V8 5663cc	3URFBE	AB60E		ATF-0WS
				AB60F		ATF-0WS
	2007-2013	5.7L V8 5663cc	3URFE	A750E		ATF-0WS
A750F					ATF-0WS	
2010-2013	5.7L V8 5663cc	3URFE	A760E		ATF-0WS	
			A760F		ATF-0WS	
2007-2013	5.7L V8 5663cc	3URFE	AB60E		ATF-0WS	
			AB60F		ATF-0WS	
Venza	2009-2013	2.7L L4 2672cc		U660E		ATF-0WS
				U660F		ATF-0WS
	2010-2013	2.7L L4 2672cc		U760E		ATF-0WS
				U760F		ATF-0WS
	2009-2013	3.5L V6 3456cc		U660E		ATF-0WS
				U660F		ATF-0WS
2010-2013	3.5L V6 3456cc		U760E		ATF-0WS	
			U760F		ATF-0WS	
Yaris	2006-2013	1.5L L4 1497cc	1NZFE	U340E		ATF-0WS

**Volkswagen**

Beetle	2003-2005	1.8L L4 1781cc		09G		ATF-0T4
	2003-2004	1.9L L4 1896cc		09G		ATF-0T4
	2003-2005	2.0L L4 1984cc		09G		ATF-0T4
	2006-2013	2.5L L5 2480cc		09G		ATF-0T4
CC	2009	2.0L L4 1984cc		09G		ATF-0T4
	2013	2.0L L4 1984cc		09M		ATF-0T4
	2009-2011	3.6L V6 3597cc		09G		ATF-0T4
	2012-2013	3.6L V6 3597cc		09M		ATF-0T4
Golf	2010-2013	2.5L L5 2480cc		09G		ATF-0T4
Jetta	2005-2006	1.9L L4 1896cc		09G		ATF-0T4
	2009-2013	2.0L L4 1984cc		09G		ATF-0T4
	2011	2.0L L4 1968cc		09G		ATF-0T4
	2005-2013	2.5L L5 2480cc		09G		ATF-0T4
Passat	2006-2010	2.0L L4 1984cc		09G		ATF-0T4
	2012-2013	2.5L L5 2480cc		09G		ATF-0T4
	2006-2013	3.6L V6 3597cc		09G		ATF-0T4
	2006-2007	3.6L V6 3597cc		09M		ATF-0T4
Rabbit	2006-2009	2.5L L5 2480cc		09G		ATF-0T4
Tiguan	2009-2012	2.0L L4 1984cc		09M		ATF-0T4
Touareg	2009-2010	3.0L V6 2967cc		09D		ATF-0T4
	2005-2006	3.2L V6 3189cc		09D		ATF-0T4
	2004-2005	3.2L V6 3200cc		09D		ATF-0T4
	2007-2010	3.6L V6 3597cc		09D		ATF-0T4
	2007-2009	4.2L V8 4163cc		09D		ATF-0T4
	2004-2007	4.2L V8 4172cc		09D		ATF-0T4
	2004	4.9L V10 4921cc		09D		ATF-0T4
	2005-2008	5.0L V10 4921cc		09D		ATF-0T4

**Automatic  
Transmission Fluid**



**Make/Model      Year      Engine      Attributes      Transmission Code      Notes      Part #**

**Volvo**

C30	2008-2013	2.5L L5 2521cc	B5254T7		AW55-50SN		ATF-0T4
C70	2001-2002	2.3L L5 2319cc	B5234T3		AW55-50SN		ATF-0T4
	2003-2004	2.3L L5 2319cc	B5234T9		AW55-50SN		ATF-0T4
	2001-2002	2.4L L5 2435cc	B5244T		AW55-50SN		ATF-0T4
	2003-2004	2.4L L5 2435cc	B5244T7		AW55-50SN		ATF-0T4
	2006-2007	2.5L L5 2521cc	B5254T3		AW55-51		ATF-0T4
	2008-2012	2.5L L5 2521cc	B5254T7		AW55-51		ATF-0T4
S40	2001-2003	1.9L L4 1948cc	B4204T3		AW55-50SN		ATF-0T4
	2003-2004	1.9L L4 1948cc	B4204T4		AW55-50SN		ATF-0T4
	2004-2010	2.4L L5 2435cc	B5244S4		AW55-51		ATF-0T4
	2005-2010	2.4L L5 2435cc	B5244S7		AW55-51		ATF-0T4
	2004-2007	2.5L L5 2521cc	B5254T3		AW55-51		ATF-0T4
	2008-2011	2.5L L5 2521cc	B5254T7		AW55-51		ATF-0T4
S60	2001-2004	2.3L L5 2319cc	B5234T3		AW55-50SN		ATF-0T4
	2001-2005	2.4L L5 2435cc	B5244S		AW55-50SN		ATF-0T4
	2003-2005	2.4L L5 2435cc	B5244S6		AW55-50SN		ATF-0T4
	2002	2.4L L5 2435cc	B5244T3		AW50AWD		ATF-0T4
	2001-2003	2.4L L5 2435cc	B5244T3		AW55-50SN		ATF-0T4
	2005	2.4L L5 2435cc	B5244T5		AW55-50SN		ATF-0T4
	2006-2009	2.4L L5 2435cc	B5244T5		AW55-51		ATF-0T4
	2003-2005	2.5L L5 2521cc	B5254T2		AW50AWD		ATF-0T4
	2004-2005	2.5L L5 2521cc	B5254T2		AW55-50SN		ATF-0T4
	2006-2009	2.5L L5 2521cc	B5254T2		AW55-51		ATF-0T4
	2005	2.5L L5 2521cc	B5254T2; 2.5T AWD		AW50AWD		ATF-0T4
			B5254T4		AW50AWD		ATF-0T4
	2004	2.5L L5 2521cc	B5254T4		AW55-50SN		ATF-0T4
	2005	2.5L L5 2521cc	B5254T4; R		AW50AWD		ATF-0T4
2006-2007	2.5L L5 2521cc	B5254T4; R		AWF21		ATF-0T4	
S70	2000	2.3L L5 2319cc	B5234T3		AW55-50SN		ATF-0T4
	2000	2.4L L5 2435cc	B5244S B5244T		AW55-50SN AW55-50SN		ATF-0T4 ATF-0T4
S80	2004-2005	2.5L L5 2521cc	B5254T2		AW50AWD AW55-50SN		ATF-0T4 ATF-0T4
	2006	2.5L L5 2521cc	B5254T2		AW55-51		ATF-0T4
	2008-2010	3.0L L6 2953cc	B6304T2		AWF21		ATF-0T4
	2010-2011	3.0L L6 2953cc	B6304T2		AWTF-80SC		ATF-0T4
	2011-2013	3.0L L6 2953cc	B6304T4		AWF21		ATF-0T4
	2007-2010	3.2L L6 3192cc	B6324S		AWF21		ATF-0T4
	2010	3.2L L6 3192cc	B6324S2		AWF21		ATF-0T4
	2011-2013	3.2L L6 3192cc	B6324S4		AWF21		ATF-0T4
			B6324S5		AWF21		ATF-0T4
	2007-2010	4.4L V8 4414cc	B8444S		AWF21		ATF-0T4
2010	4.4L V8 4414cc	B8444S		AWTF-80SC		ATF-0T4	
V40	2001-2003	1.9L L4 1948cc	B4204T3		AW55-50SN		ATF-0T4
	2003-2004	1.9L L4 1948cc	B4204T4		AW55-50SN		ATF-0T4
V50	2005-2010	2.4L L5 2435cc	B5244S4		AW55-51		ATF-0T4
			B5244S7		AW55-51		ATF-0T4
	2005-2007	2.5L L5 2521cc	B5254T3		AW55-51		ATF-0T4
2008-2011	2.5L L5 2521cc	B5254T7		AW55-51		ATF-0T4	
V70	2000-2004	2.3L L5 2319cc	B5234T3		AW55-50SN		ATF-0T4
	2000	2.4L L5 2435cc	B5244T		AW55-50SN		ATF-0T4
	2000-2004	2.4L L5 2435cc	B5244S		AW55-50SN		ATF-0T4
	2003	2.4L L5 2435cc	B5244S6		AW55-50SN		ATF-0T4
	2006	2.4L L5 2435cc	B5244S6		AW55-51		ATF-0T4
	2006-2007	2.4L L5 2435cc	B5244S		AW55-51		ATF-0T4

Automatic Transmission Fluid









# Buyer's Guide

## Automatic Transmission Fluid

Part #	Year	Application	Part #	Year	Application
ATF-0T4	2007-2010	Audi Q7	ATF-0T4	2004-2006	Scion xB
ATF-0T4	2003-2006	Audi TT	ATF-0T4	2007-2008	Suzuki XL-7
ATF-0T4	2004-2011	Chevrolet Aveo	ATF-0T4	2003-2004	Toyota 4Runner
ATF-0T4	2007-2011	Chevrolet Aveo5	ATF-0T4	2012	Toyota Avalon
ATF-0T4	2005-2009	Chevrolet Equinox	ATF-0T4	2002-2006	Toyota Camry
ATF-0T4	2005-2007	Ford Five Hundred	ATF-0T4	2000-2005	Toyota Celica
ATF-0T4	2006-2012	Ford Fusion	ATF-0T4	2003-2008	Toyota Corolla
ATF-0T4	2007-2012	Hyundai Veracruz	ATF-0T4	2000-2005	Toyota Echo
ATF-0T4	2008-2011	Land Rover LR2	ATF-0T4	2001-2007	Toyota Highlander
ATF-0T4	1999-2003	Lexus ES300	ATF-0T4	2003	Toyota Land Cruiser
ATF-0T4	2004-2006	Lexus ES330	ATF-0T4	2003-2008	Toyota Matrix
ATF-0T4	1993-2005	Lexus GS300	ATF-0T4	2001-2003	Toyota Prius
ATF-0T4	1998-2000	Lexus GS400	ATF-0T4	1996-2005	Toyota RAV4
ATF-0T4	2001-2005	Lexus GS430	ATF-0T4	2003-2004	Toyota Sequoia
ATF-0T4	2003-2005	Lexus GX470	ATF-0T4	2004-2006	Toyota Sienna
ATF-0T4	2001-2005	Lexus IS300	ATF-0T4	2002-2008	Toyota Solara
ATF-0T4	2006	Lexus IS350	ATF-0T4	1993-1998	Toyota Supra
ATF-0T4	1990-2000	Lexus LS400	ATF-0T4	2003-2013	Toyota Tacoma
ATF-0T4	2001-2003	Lexus LS430	ATF-0T4	2003-2004	Toyota Tundra
ATF-0T4	2003	Lexus LX470	ATF-0T4	2003-2010, 2012-2013	Volkswagen Beetle
ATF-0T4	1999-2003	Lexus RX300	ATF-0T4	2009-2013	Volkswagen CC
ATF-0T4	2004-2006	Lexus RX330	ATF-0T4	2010-2013	Volkswagen Golf
ATF-0T4	1998-2000	Lexus SC300	ATF-0T4	2005-2013	Volkswagen Jetta
ATF-0T4	1992-2000	Lexus SC400	ATF-0T4	2006-2010, 2012-2013	Volkswagen Passat
ATF-0T4	2002-2007	Lexus SC430	ATF-0T4	2006-2009	Volkswagen Rabbit
ATF-0T4	2007-2010	Lincoln MKZ	ATF-0T4	2009-2012	Volkswagen Tiguan
ATF-0T4	2006	Lincoln Zephyr	ATF-0T4	2004-2010	Volkswagen Touareg
ATF-0T4	2006-2013	Mazda 6	ATF-0T4	2008-2013	Volvo C30
ATF-0T4	2007-2012	Mazda CX-7	ATF-0T4	2001-2004, 2006-2012	Volvo C70
ATF-0T4	2007-2012	Mazda CX-9	ATF-0T4	2001-2011	Volvo S40
ATF-0T4	2006-2012	Mazda MX-5 Miata	ATF-0T4	2001-2009	Volvo S60
ATF-0T4	2007-2011	Mazda RX-8	ATF-0T4	2000	Volvo S70
ATF-0T4	2006-2009	Mercury Milan	ATF-0T4	2004-2013	Volvo S80
ATF-0T4	2005-2007	Mercury Montego	ATF-0T4	2001-2004	Volvo V40
ATF-0T4	2005-2012	Mini Cooper	ATF-0T4	2005-2011	Volvo V50
ATF-0T4	2011-2012	Mini Cooper Countryman	ATF-0T4	2000-2010	Volvo V70
ATF-0T4	2009-2010	Pontiac G3	ATF-0T4	2010-2013	Volvo XC60
ATF-0T4	2006-2009	Pontiac Torrent	ATF-0T4	2003-2010	Volvo XC70
ATF-0T4	2003-2008	Pontiac Vibe	ATF-0T4	2003-2013	Volvo XC90
ATF-0T4	2003-2006	Porsche Cayenne	ATF-0WS	2009-2011	Hyundai Genesis
ATF-0T4	2007-2008	Porsche Cayman	ATF-0WS	2011-2013	Lexus CT200h
ATF-0T4	2003-2011	Saab 9-3	ATF-0WS	2007-2013	Lexus ES350
ATF-0T4	2003-2011	Saab 9-5	ATF-0WS	2006	Lexus GS300
ATF-0T4	2008-2009	Saturn Astra	ATF-0WS	2007-2011, 2013	Lexus GS350
ATF-0T4	2004	Saturn Ion	ATF-0WS	2006-2007	Lexus GS430
ATF-0T4	2002-2003	Saturn Vue	ATF-0WS	2007-2011, 2013	Lexus GS450h
ATF-0T4	2005-2006	Scion tC	ATF-0WS	2008-2011	Lexus GS460
ATF-0T4	2004-2006	Scion xA	ATF-0WS	2010-2013	Lexus GX460

Automatic  
Transmission Fluid



# Buyer's Guide

## Automatic Transmission Fluid

Part #	Year	Application	Part #	Year	Application
ATF-0WS	2006-2009	Lexus GX470	ATF-0WS	2004-2013	Toyota 4Runner
ATF-0WS	2010-2012	Lexus HS250h	ATF-0WS	2006-2011	Toyota Avalon
ATF-0WS	2008-2013	Lexus IS F	ATF-0WS	2007-2011	Toyota Camry
ATF-0WS	2006-2013	Lexus IS250	ATF-0WS	2009-2012	Toyota Corolla
ATF-0WS	2007-2013	Lexus IS350	ATF-0WS	2007-2013	Toyota FJ Cruiser
ATF-0WS	2004-2006	Lexus LS430	ATF-0WS	2007-2012	Toyota Highlander
ATF-0WS	2007-2013	Lexus LS460	ATF-0WS	2004-2011, 2013	Toyota Land Cruiser
ATF-0WS	2004-2007	Lexus LX470	ATF-0WS	2009-2013	Toyota Matrix
ATF-0WS	2008-2011, 2013	Lexus LX570	ATF-0WS	2004-2012	Toyota Prius
ATF-0WS	2007-2013	Lexus RX350	ATF-0WS	2012-2013	Toyota Prius C
ATF-0WS	2006-2008	Lexus RX400h	ATF-0WS	2006-2012	Toyota RAV4
ATF-0WS	2010-2013	Lexus RX450h	ATF-0WS	2005-2012	Toyota Sequoia
ATF-0WS	2008-2010	Lexus SC430	ATF-0WS	2007-2013	Toyota Sienna
ATF-0WS	2009-2010	Pontiac Vibe	ATF-0WS	2007-2008	Toyota Solara
ATF-0WS	2013	Scion FR-S	ATF-0WS	2005-2013	Toyota Tacoma
ATF-0WS	2007-2012	Scion tC	ATF-0WS	2005-2013	Toyota Tundra
ATF-0WS	2008-2013	Scion xB	ATF-0WS	2009-2013	Toyota Venza
ATF-0WS	2008-2013	Scion xD	ATF-0WS	2006-2013	Toyota Yaris

### Section Notes

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

Automatic  
Transmission Fluid

# Vacuum Switching Valve



AISIN's high quality Vacuum Switching Valves are technologically designed using magnetic field analysis simulation and tested using bench evaluation technology.

- Resin material allows for light-weight and compact product.
- Fluorine rubber makes the valve heat and chemical-resistant.
- Design ensures vibration resistance and durability.





# Vacuum Switching Valve Applications

Make/Model	Year	Engine	Attributes	Notes	Part #
<b>Lexus</b>					
ES300	1996-1997	3.0L V6 2959cc	1MZFE	Brown; STD. TYPE #1; From 08/93; Thru 08/97	VST-026
	1993	3.0L V6 2959cc	3VZFE	Brown; STD. TYPE #1; From 08/93; Thru 08/97	VST-026
	1994-1995	3.0L V6 2995cc	1MZFE	Blue; California Spec #2; From 08/93; Thru 08/96	VST-006
				Brown; STD. TYPE #1; From 08/93; Thru 08/97	VST-026
1999-2001	3.0L V6 2995cc	1MZFE	From 08/99; Thru 07/01	VST-043	
GS300	2000-2005	3.0L L6 2997cc	2JZGE	From 07/00; Thru 01/05	VST-024
GS430	2001-2005	4.3L V8 4293cc	3UZFE	From 07/00; Thru 01/05	VST-024
IS300	2001-2005	3.0L L6 2997cc	2JZGE	From 07/01	VST-024
RX300	1999-2000	3.0L V6 2995cc	1MZFE	From 08/99; Thru 07/00	VST-043
SC430	2002-2005	4.3L V8 4293cc	3UZFE	From 01/01; Thru 08/05	VST-024
<b>Toyota</b>					
4Runner	1996-2000	2.7L L4 2694cc	3RZFE		VST-001
	1988-1992	3.0L V6 2959cc	3VZE	From 11/87; Thru 01/95	VST-007
	1988-1995	3.0L V6 2959cc	3VZE	Brown; STD. TYPE #1; From 11/87; Thru 11/95	VST-026
Avalon	1995-1996	3.0L V6 2995cc	1MZFE	Blue; California Spec #2; From 09/94; Thru 08/96	VST-006
	1999-2004	3.0L V6 2995cc	1MZFE	Brown; STD. TYPE #1; From 09/94; Thru 08/96	VST-026
				From 08/99; Thru 01/05	VST-043
Camry	1996-1999	2.2L L4 2164cc	5SFE	From 07/96; Thru 08/99	VST-012
	1993-1993	3.0L V6 2959cc	3VZFE	Brown; STD. TYPE #1; From 08/93; Thru 08/96	VST-026
	1994-1996	3.0L V6 2995cc	1MZFE	Blue; California Spec #2; From 09/94; Thru 07/96	VST-006
				Brown; STD. TYPE #1; From 08/93; Thru 08/96	VST-026
	1993	3.0L V6 2995cc	1MZFE	From 08/96; Thru 08/99	VST-012
	1996-1999	3.0L V6 2995cc	1MZFE	From 08/96; Thru 08/98	VST-012
1999-2001	3.0L V6 2995cc	1MZFE	From 08/99; Thru 07/01	VST-043	
Celica	1990-1991	2.2L L4 2164cc	5SFE	Blue; From 08/89; Thru 09/91	VST-034
MR2	1991-1992	2.2L L4 2164cc	5SFE	Blue; From 01/90; Thru 01/92	VST-034
Pickup	1988-1995	3.0L V6 2959cc	3VZE	From 11/87; Thru 01/95	VST-007
RAV4	1996-2000	2.0L L4 1998cc	3SFE	Brown; STD. TYPE #1; From 11/87; Thru 11/95	VST-026
				Blue; From 11/95; Thru 08/00	VST-034
				From 11/95; Thru 11/00	VST-012
Solara	1999	2.2L L4 2164cc	5SFE	From 06/98; Thru 08/99	VST-012
	1999	3.0L V6 2995cc	1MZFE	From 06/98; Thru 08/99	VST-012
	1999-2002	3.0L V6 2995cc	1MZFE	From 08/99; Thru 07/02	VST-043
T100	1994-1998	2.7L L4 2694cc	3RZFE		VST-001
	1996-1997	2.7L L4 2694cc	3RZFE	Thru 08/96	VST-001
				From 09/96	VST-012
				From 08/92; Thru 08/94	VST-007
	1993-1994	3.0L V6 2959cc	3VZE	Brown; STD. TYPE #1; From 08/92; Thru 08/94	VST-026
	1995-1996	3.4L V6 3378cc	5VZFE	Brown; STD. TYPE #1; From 08/94; Thru 07/96	VST-026
	1995-1998	3.4L V6 3378cc	5VZFE	From 08/94; Thru 12/98	VST-007
	1996-1997	3.4L V6 3378cc	5VZFE	From 08/96; Thru 08/97	VST-012
Tacoma	1995-2004	2.4L L4 2438cc	2RZFE		VST-001
	1995-2004	2.7L L4 2694cc	3RZFE		VST-001
	1995-1996	3.4L V6 3378cc	5VZFE	Brown; STD. TYPE #1; From 01/95; Thru 09/96	VST-026
	1995-1999	3.4L V6 3378cc	5VZFE	From 01/95; Thru 08/99	VST-007

Vacuum Switching Valve



# Vacuum Switching Valve Images



VST-001



VST-006



VST-007



VST-012



VST-024



VST-026



Vacuum Switching Valve





# Buyer's Guide

## Vacuum Switching Valve

Part #	Year	Application	Part #	Year	Application
VST-001	1994-1998	Toyota T100	VST-024	2002-2005	Lexus SC430
VST-001	1996-2000	Toyota 4Runner	VST-026	1988-1995	Toyota 4Runner
VST-001	1995-2004	Toyota Tacoma	VST-026	1988-1995	Toyota Pickup
VST-006	1994-1995	Lexus ES300	VST-026	1993-1996	Toyota Camry
VST-006	1994-1996	Toyota Camry	VST-026	1993-1996	Toyota T100
VST-006	1995-1996	Toyota Avalon	VST-026	1995-1996	Toyota Avalon
VST-007	1988-1992	Toyota 4Runner	VST-026	1995-1996	Toyota Tacoma
VST-007	1988-1995	Toyota Pickup	VST-026	1993-1997	Lexus ES300
VST-007	1993-1998	Toyota T100	VST-034	1990-1991	Toyota Celica
VST-007	1995-1999	Toyota Tacoma	VST-034	1991-1992	Toyota MR2
VST-012	1996-1997	Toyota T100	VST-034	1996-2000	Toyota RAV4
VST-012	1999	Toyota Solara	VST-043	1999-2000	Lexus RX300
VST-012	1996-1999	Toyota Camry	VST-043	1999-2001	Lexus ES300
VST-012	1996-2000	Toyota RAV4	VST-043	1999-2001	Toyota Camry
VST-024	2000-2005	Lexus GS300	VST-043	1999-2002	Toyota Solara
VST-024	2001-2005	Lexus GS430	VST-043	1999-2004	Toyota Avalon
VST-024	2001-2005	Lexus IS300			

### Section Notes

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

Vacuum Switching Valve







# Clutch Release Cylinder OEM Interchange

O.E. Part #	Manufacturer	AISIN Part #	O.E. Part #	Manufacturer	AISIN Part #
MB670211	Mitsubishi	CRM-001	31470-20191	Toyota/Lexus/Scion	CRT-020
MB670290	Mitsubishi	CRM-002	31470-20210	Toyota/Lexus/Scion	CRT-050
MD711471	Mitsubishi	CRM-008	31470-22090	Toyota/Lexus/Scion	CRT-015
MD712383	Mitsubishi	CRM-009	31470-22150	Toyota/Lexus/Scion	CRT-028
MD733228	Mitsubishi	CRM-012	31470-26020	Toyota/Lexus/Scion	CRT-044
MD733339	Mitsubishi	CRM-013	31470-26090	Toyota/Lexus/Scion	CRT-040
MD733620	Mitsubishi	CRM-014	31470-26110	Toyota/Lexus/Scion	CRT-040
MD733623	Mitsubishi	CRM-005	31470-28040	Toyota/Lexus/Scion	CRT-003
MD749822	Mitsubishi	CRM-016	31470-28051	Toyota/Lexus/Scion	CRT-013
MD749823	Mitsubishi	CRM-017	31470-28080	Toyota/Lexus/Scion	CRT-097
MD770482	Mitsubishi	CRM-018	31470-28081	Toyota/Lexus/Scion	CRT-097
MD770676	Mitsubishi	CRM-020	31470-30221	Toyota/Lexus/Scion	CRT-007
MR165177	Mitsubishi	CRM-022	31470-30222	Toyota/Lexus/Scion	CRT-007
MR470217	Mitsubishi	CRM-036	31470-30222	Toyota/Lexus/Scion	CRT-015
13470-17030	Toyota/Lexus/Scion	CRT-090	31470-30230	Toyota/Lexus/Scion	CRT-043
13470-20150	Toyota/Lexus/Scion	CRT-033	31470-30260	Toyota/Lexus/Scion	CRT-001
13470-20151	Toyota/Lexus/Scion	CRT-033	31470-32022	Toyota/Lexus/Scion	CRT-085
31470-10011	Toyota/Lexus/Scion	CRT-002	31470-32023	Toyota/Lexus/Scion	CRT-085
31470-10012	Toyota/Lexus/Scion	CRT-002	31470-32030	Toyota/Lexus/Scion	CRT-010
31470-10040	Toyota/Lexus/Scion	CRT-047	31470-32032	Toyota/Lexus/Scion	CRT-010
31470-12041	Toyota/Lexus/Scion	CRT-011	31470-33020	Toyota/Lexus/Scion	CRT-026
31470-12042	Toyota/Lexus/Scion	CRT-011	31470-35100	Toyota/Lexus/Scion	CRT-004
31470-12043	Toyota/Lexus/Scion	CRT-011	31470-35120	Toyota/Lexus/Scion	CRT-014
31470-12050	Toyota/Lexus/Scion	CRT-039	31470-35130	Toyota/Lexus/Scion	CRT-029
31470-12092	Toyota/Lexus/Scion	CRT-005	31470-35190	Toyota/Lexus/Scion	CRT-111
31470-12093	Toyota/Lexus/Scion	CRT-005	31470-35191	Toyota/Lexus/Scion	CRT-111
31470-12100	Toyota/Lexus/Scion	CRT-034	31470-42010	Toyota/Lexus/Scion	CRT-022
31470-12111	Toyota/Lexus/Scion	CRT-049	31470-42020	Toyota/Lexus/Scion	CRT-022
31470-12130	Toyota/Lexus/Scion	CRT-086	31470-42030	Toyota/Lexus/Scion	CRT-082
31470-12140	Toyota/Lexus/Scion	CRT-049	31470-42031	Toyota/Lexus/Scion	CRT-082
31470-12160	Toyota/Lexus/Scion	CRT-113	31470-43010	Toyota/Lexus/Scion	CRT-029
31470-12200	Toyota/Lexus/Scion	CRT-052	31470-52011	Toyota/Lexus/Scion	CRT-052
31470-14050	Toyota/Lexus/Scion	CRT-024	31470-52121	Toyota/Lexus/Scion	CRT-115
31470-14060	Toyota/Lexus/Scion	CRT-088	31470-53032	Toyota/Lexus/Scion	CRT-104
31470-17011	Toyota/Lexus/Scion	CRT-009	31470-60071	Toyota/Lexus/Scion	CRT-012
31470-17020	Toyota/Lexus/Scion	CRT-089	31470-60081	Toyota/Lexus/Scion	CRT-019
31470-17021	Toyota/Lexus/Scion	CRT-089	31470-60101	Toyota/Lexus/Scion	CRT-021
31470-17022	Toyota/Lexus/Scion	CRT-089	31470-60102	Toyota/Lexus/Scion	CRT-021
31470-17040	Toyota/Lexus/Scion	CRT-031	31470-60110	Toyota/Lexus/Scion	CRT-030
31470-20190	Toyota/Lexus/Scion	CRT-020			





# Oil Pump OEM Interchange

O.E. Part #	Manufacturer	AISIN Part #	O.E. Part #	Manufacturer	AISIN Part #
15100-RCA-A02	Honda/Acura	OPH-800	16100-82842	Suzuki	OPS-001
15100-RCA-A03	Honda/Acura	OPH-800	16100-82843	Suzuki	OPS-001
8-94133-286-4	Isuzu	OPG-001	16100-86820	Suzuki	OPS-001
8-94215-637-0	Isuzu	OPG-005	16100-86821	Suzuki	OPS-001
8-94310-719-0	Isuzu	OPG-001	16100-86822	Suzuki	OPS-001
8-94310-719-1	Isuzu	OPG-001	16100-86823	Suzuki	OPS-001
8-94327-008-0	Isuzu	OPG-003	16131-86000	Suzuki	OPS-001
8-94331-475-0	Isuzu	OPG-006	11311-54022	Toyota/Lexus/Scion	OPT-P033
8-94366-091-0	Isuzu	OPG-004	11328-65011	Toyota/Lexus/Scion	OPT-027
8-94374-510-2	Isuzu	OPG-008	11348-0C010	Toyota/Lexus/Scion	OPT-011
8-94374-510-3	Isuzu	OPG-008	15100-03020	Toyota/Lexus/Scion	OPT-074
8-94374-510-4	Isuzu	OPG-008	15100-09010	Toyota/Lexus/Scion	OPT-001
8-97103-864-0	Isuzu	OPG-008	15100-09030	Toyota/Lexus/Scion	OPT-001
8-9710-386-40	Isuzu	OPG-008	15100-0A010	Toyota/Lexus/Scion	OPT-037
8-97136-463-0	Isuzu	OPG-011	15100-0A020	Toyota/Lexus/Scion	OPT-801
8-97136-464-0	Isuzu	OPG-009	15100-0A030	Toyota/Lexus/Scion	OPT-805
8-97288-755-1	Isuzu	OPG-012	15100-0A040	Toyota/Lexus/Scion	OPT-804
8-97288-756-1	Isuzu	OPG-010	15100-0D010	Toyota/Lexus/Scion	OPT-042
MD001400	Mitsubishi	OPM-001	15100-0D020	Toyota/Lexus/Scion	OPT-044
13500-53Y02	Nissan/Infiniti	OPN-701	15100-0D020	Toyota/Lexus/Scion	OPT-800
13500-53Y03	Nissan/Infiniti	OPN-701	15100-0D021	Toyota/Lexus/Scion	OPT-044
13500-5M000	Nissan/Infiniti	OPN-706	15100-0D021	Toyota/Lexus/Scion	OPT-800
13500-8J002	Nissan/Infiniti	OPN-705	15100-0F010	Toyota/Lexus/Scion	OPT-012
13500-F4300	Nissan/Infiniti	OPN-702	15100-0F020	Toyota/Lexus/Scion	OPT-806
13500-JA00A	Nissan/Infiniti	OPN-710	15100-0H010	Toyota/Lexus/Scion	OPT-803
13500-JA00B	Nissan/Infiniti	OPN-710	15100-0T010	Toyota/Lexus/Scion	OPT-807
15010-4S100	Nissan/Infiniti	OPN-708	15100-11021	Toyota/Lexus/Scion	OPT-004
15010-7B000	Nissan/Infiniti	OPN-703	15100-11070	Toyota/Lexus/Scion	OPT-007
15010-7S000	Nissan/Infiniti	OPN-707	15100-11071	Toyota/Lexus/Scion	OPT-008
15010-7S00A	Nissan/Infiniti	OPN-707	15100-11081	Toyota/Lexus/Scion	OPT-008
15010-7Y000	Nissan/Infiniti	OPN-704	15100-11110	Toyota/Lexus/Scion	OPT-010
15010-EM30A	Nissan/Infiniti	OPN-709	15100-15020	Toyota/Lexus/Scion	OPT-031
15010-EM31A	Nissan/Infiniti	OPN-709	15100-15040	Toyota/Lexus/Scion	OPT-097
16100-82811	Suzuki	OPS-001	15100-15050	Toyota/Lexus/Scion	OPT-097
16100-82812	Suzuki	OPS-001	15100-15060	Toyota/Lexus/Scion	OPT-032
16100-82820	Suzuki	OPS-001	15100-15080	Toyota/Lexus/Scion	OPT-033
16100-82821	Suzuki	OPS-001	15100-16040	Toyota/Lexus/Scion	OPT-034
16100-82822	Suzuki	OPS-001	15100-16070	Toyota/Lexus/Scion	OPT-035
16100-82823	Suzuki	OPS-001	15100-19015	Toyota/Lexus/Scion	OPT-031
16100-82824	Suzuki	OPS-001	15100-19025	Toyota/Lexus/Scion	OPT-036
16100-82825	Suzuki	OPS-001	15100-19026	Toyota/Lexus/Scion	OPT-036
16100-82826	Suzuki	OPS-001	15100-19035	Toyota/Lexus/Scion	OPT-036
16100-82827	Suzuki	OPS-001	15100-19036	Toyota/Lexus/Scion	OPT-036
16100-82828	Suzuki	OPS-001	15100-20020	Toyota/Lexus/Scion	OPT-037
16100-82829	Suzuki	OPS-001	15100-20040	Toyota/Lexus/Scion	OPT-801
16100-82830H17	Suzuki	OPS-001	15100-20050	Toyota/Lexus/Scion	OPT-804
16100-82831H17	Suzuki	OPS-001	15100-21040	Toyota/Lexus/Scion	OPT-115
16100-82840	Suzuki	OPS-001	15100-21042	Toyota/Lexus/Scion	OPT-115
16100-82841	Suzuki	OPS-001	15100-21050	Toyota/Lexus/Scion	OPT-117



# Oil Pump OEM Interchange

O.E. Part #	Manufacturer	AISIN Part #	O.E. Part #	Manufacturer	AISIN Part #
15100-22020	Toyota/Lexus/Scion	OPT-042	15100-62020	Toyota/Lexus/Scion	OPT-019
15100-22021	Toyota/Lexus/Scion	OPT-042	15100-62030	Toyota/Lexus/Scion	OPT-020
15100-22040	Toyota/Lexus/Scion	OPT-044	15100-62040	Toyota/Lexus/Scion	OPT-021
15100-22040	Toyota/Lexus/Scion	OPT-800	15100-62050	Toyota/Lexus/Scion	OPT-022
15100-22041	Toyota/Lexus/Scion	OPT-044	15100-63010	Toyota/Lexus/Scion	OPT-023
15100-22041	Toyota/Lexus/Scion	OPT-800	15100-64011	Toyota/Lexus/Scion	OPT-024
15100-28020	Toyota/Lexus/Scion	OPT-803	15100-64012	Toyota/Lexus/Scion	OPT-024
15100-28030	Toyota/Lexus/Scion	OPT-048	15100-64020	Toyota/Lexus/Scion	OPT-025
15100-35020	Toyota/Lexus/Scion	OPT-054	15100-64021	Toyota/Lexus/Scion	OPT-025
15100-35030	Toyota/Lexus/Scion	OPT-055	15100-64030	Toyota/Lexus/Scion	OPT-024
15100-42020	Toyota/Lexus/Scion	OPT-059	15100-64031	Toyota/Lexus/Scion	OPT-024
15100-42021	Toyota/Lexus/Scion	OPT-059	15100-64032	Toyota/Lexus/Scion	OPT-024
15100-42030	Toyota/Lexus/Scion	OPT-060	15100-64040	Toyota/Lexus/Scion	OPT-025
15100-42031	Toyota/Lexus/Scion	OPT-060	15100-64041	Toyota/Lexus/Scion	OPT-025
15100-42040	Toyota/Lexus/Scion	OPT-061	15100-64042	Toyota/Lexus/Scion	OPT-025
15100-42060	Toyota/Lexus/Scion	OPT-061	15100-65010	Toyota/Lexus/Scion	OPT-027
15100-43020	Toyota/Lexus/Scion	OPT-063	15100-65011	Toyota/Lexus/Scion	OPT-027
15100-46040	Toyota/Lexus/Scion	OPT-070	15100-65020	Toyota/Lexus/Scion	OPT-027
15100-46041	Toyota/Lexus/Scion	OPT-070	15100-71010	Toyota/Lexus/Scion	OPT-030
15100-46042	Toyota/Lexus/Scion	OPT-070	15100-74010	Toyota/Lexus/Scion	OPT-076
15100-46060	Toyota/Lexus/Scion	OPT-071	15100-74020	Toyota/Lexus/Scion	OPT-074
15100-46090	Toyota/Lexus/Scion	OPT-071	15100-74030	Toyota/Lexus/Scion	OPT-073
15100-46091	Toyota/Lexus/Scion	OPT-071	15100-74040	Toyota/Lexus/Scion	OPT-074
15100-50020	Toyota/Lexus/Scion	OPT-011	15100-74050	Toyota/Lexus/Scion	OPT-075
15100-50021	Toyota/Lexus/Scion	OPT-011	15100-74060	Toyota/Lexus/Scion	OPT-076
15100-50022	Toyota/Lexus/Scion	OPT-011	15100-76007	Toyota/Lexus/Scion	OPT-017
15100-50040	Toyota/Lexus/Scion	OPT-103	15100-76008	Toyota/Lexus/Scion	OPT-017
15100-50050	Toyota/Lexus/Scion	OPT-012	15100-88360	Toyota/Lexus/Scion	OPT-078
15100-60014	Toyota/Lexus/Scion	OPT-017	15100-88380	Toyota/Lexus/Scion	OPT-079
15100-61010	Toyota/Lexus/Scion	OPT-017	15100-88381	Toyota/Lexus/Scion	OPT-079
15100-61011	Toyota/Lexus/Scion	OPT-017	15100-88382	Toyota/Lexus/Scion	OPT-080
15100-61020	Toyota/Lexus/Scion	OPT-018	15101-62020	Toyota/Lexus/Scion	OPT-019











# Clutch Kit Competitive Cross Reference

ACDELCO	AISIN	AMS Automotive	AISIN	BECK ARNLEY	AISIN	CENTRIC PARTS	AISIN	EXEDY	AISIN
381056	CKT-002	16-069	CKT-066	061-9319	CKT-014	200-44037	CKT-051	16085	CKT-038
381056	CKT-006	AUTOZONE	AISIN	061-9347	CKT-040	200-44038	CKT-040	16087	CKT-040
381056	CKT-007			13045	CKT-066	061-9349	CKT-051	200-44039	CKT-055
381056	CKT-008	BECK ARNLEY	AISIN	061-9355	CKT-053	200-44039	CKT-065	16090	CKT-056
381057	CKT-013			061-9451	CKT-034A	200-44041	CKT-056	16093	CKT-053
381058	CKT-001	061-9058	CKT-002	061-9451	CKT-070	200-44042	CKT-044	KTY02	CKT-026
381303	CKT-038	061-9058	CKT-006	061-9458	CKT-056	200-44042	CKT-044A	KTY03	CKT-047
381303	CKT-050	061-9058	CKT-007	061-9473	CKT-039	200-44043	CKT-003	KTY11	CKT-069
381304	CKT-036	061-9058	CKT-008	061-9475	CKT-055	200-44044	CKT-010	KTY13	CKT-050
381304	CKT-037	061-9137	CKT-032	061-9475	CKT-057	200-44045	CKT-004	KTY14	CKT-034A
381304	CKT-048	061-9138	CKT-050	CENTRIC PARTS	AISIN	200-44045	CKT-067	KTY14	CKT-070
381305	CKT-049	061-9140	CKT-015			200-44048	CKT-058	200-44048	CKT-058
381307	CKT-027	061-9140	CKT-029	200.44008	CKT-019	200-44049	CKT-045	TYK1502	CKT-041
381320	CKT-034A	061-9140	CKT-041	200.44017	CKT-066	EXEDY	AISIN	TYK1502	CKT-043
381320	CKT-034B	061-9140	CKT-042	200.44043	CKT-068			16039	CKT-010
381320	CKT-047	061-9140	CKT-043	200-44001	CKT-015	16006	CKT-032	TYK1503	CKT-057
381321	CKT-035	061-9140	CKT-044	200-44001	CKT-030	16018	CKT-036	TYK1504	CKT-058
381321	CKT-046	061-9140	CKT-063	200-44002	CKT-031	16018	CKT-037	TYK1505	CKT-044
381322	CKT-058	061-9140	CKT-069	200-44003	CKT-027	16018	CKT-048	LUK Automotive	AISIN
381323	CKT-009	061-9140	CKT-027	200-44006	CKT-069	16029	CKT-001		
381346	CKT-051	061-9141	CKT-031	200-44008	CKT-018	16029	CKT-002	04-061	CKT-006
381372	CKT-053	061-9141	CKT-052	200-44008	CKT-023	16029	CKT-008	04-061	CKT-007
381399	CKT-040	061-9143	CKT-010	200-44008	CKT-024	16029	CKT-009	04-061	CKT-008
381662	CKT-032	061-9144	CKT-003	200-44008	CKT-025	16042	CKT-009	04-152	CKT-013
381689	CKT-010	061-9145	CKT-068	200-44012	CKT-006	16046	CKT-018	16-006	CKT-032
381690	CKT-028	061-9145	CKT-022	200-44012	CKT-013	16046	CKT-025	16-018	CKT-036
381690	CKT-030	061-9146	CKT-004	200-44013	CKT-009	16047	CKT-030	16-018	CKT-037
381692	CKT-031	061-9149	CKT-035	200-44017	CKT-020	16054	CKT-011	16-018	CKT-048
381704	CKT-018	061-9149	CKT-046	200-44017	CKT-036	16057	CKT-019	16-039	CKT-010
381704	CKT-019	061-9149	CKT-067	200-44017	CKT-037	16057	CKT-020	16-042	CKT-001
381704	CKT-023	061-9150	CKT-009	200-44017	CKT-048	16057	CKT-024	16-042	CKT-009
381704	CKT-024	061-9151	CKT-001	200-44018	CKT-041	16058	CKT-022	16-055	CKT-003
381704	CKT-025	061-9152	CKT-036	200-44018	CKT-042	16060	CKT-003	16-055	CKT-004
381705	CKT-022	061-9152	CKT-037	200-44019	CKT-029	16060	CKT-004	16-055	CKT-035
381764	CKT-015	061-9152	CKT-048	200-44021	CKT-039	16060	CKT-068	16-055	CKT-046
381764	CKT-041	061-9152	CKT-028	200-44022	CKT-032	16063	CKT-052	16-055	CKT-067
381764	CKT-042	061-9154	CKT-030	200-44024	CKT-014	16064	CKT-035	16-057	CKT-018
381769	CKT-003	061-9154	CKT-018	200-44025	CKT-001	16064	CKT-046	16-057	CKT-019
381770	CKT-052	061-9158	CKT-019	200-44025	CKT-007	16064	CKT-067	16-057	CKT-020
381772	CKT-029	061-9158	CKT-020	200-44025	CKT-008	16065	CKT-012	16-057	CKT-023
381774	CKT-012	061-9158	CKT-024	200-44026	CKT-022	16069	CKT-049	16-057	CKT-024
381785	CKT-014	061-9158	CKT-025	200-44027	CKT-049	16069	CKT-066	16-057	CKT-025
381914	CKT-004	061-9158	CKT-034B	200-44029	CKT-050	16070	CKT-006	16-058	CKT-022
381914	CKT-067	061-9190	CKT-045	200-44030	CKT-035	16070	CKT-007	16-060	CKT-068
381945	CKT-045	061-9190	CKT-047	200-44030	CKT-046	16072	CKT-028	16-061	CKT-015
381956	CKT-044	061-9190	CKT-058	200-44031	CKT-034A	16073	CKT-027	16-061	CKT-041
381957	CKT-043	061-9190	CKT-038	200-44031	CKT-034B	16073	CKT-031	16-061	CKT-042
381991	CKT-056	061-9192	CKT-012	200-44031	CKT-047	16075	CKT-014	16-061	CKT-043
381997	CKT-055	061-9209	CKT-013	200-44032	CKT-043	16082	CKT-015	16-062	CKT-029
382026	CKT-039	061-9209	CKT-049	200-44033	CKT-038	16082	CKT-029	16-062	CKT-044
38C31196-1	CKT-026	061-9256	CKT-066	200-44034	CKT-053	16082	CKT-042	16-062	CKT-044A
381769	CKT-068			200-44035	CKT-052	16084	CKT-023		



# Clutch Kit Competitive Cross Reference

LUK Automotive	AISIN	PERFECTION CLUTCH	AISIN	PERFECTION CLUTCH	AISIN	SACHS	AISIN	VALEO	AISIN
16-062	CKT-063	MU47617-1A	CKT-001	MU72445-1	CKT-063	KF628-01	CKT-018	52125204	CKT-009
16-062	CKT-069	MU47617-1A	CKT-002	<b>SACHS</b>	<b>AISIN</b>	KF628-01	CKT-019	52125206	CKT-011
16-063	CKT-052	MU47617-1A	CKT-006			KF628-01	CKT-020	52125209	CKT-058
16-065	CKT-012	MU47617-1A	CKT-007	K0076-01	CKT-002	KF628-01	CKT-023	52245202	CKT-018
16-069	CKT-049	MU47617-1A	CKT-008	K0076-01	CKT-007	KF628-01	CKT-024	52245202	CKT-019
16-069	CKT-066	MU47628-1	CKT-018	K0076-01	CKT-008	KF628-01	CKT-025	52245202	CKT-020
16-072	CKT-028	MU47628-1	CKT-019	K0076-05	CKT-006	KF628-02	CKT-022	52245202	CKT-023
16-072	CKT-030	MU47628-1	CKT-020	K0076-05	CKT-013	KF628-03	CKT-026	52245202	CKT-024
16-073	CKT-027	MU47628-1	CKT-023	K0076-06	CKT-001	KF684-01	CKT-011	52245202	CKT-025
16-073	CKT-031	MU47628-1	CKT-024	K70062-01	CKT-038	KF709-01	CKT-041	52245203	CKT-022
16-075	CKT-014	MU47628-1	CKT-025	K70062-01	CKT-050	KF709-01	CKT-043	52245208	CKT-027
16-079	CKT-034A	MU47628-1A	CKT-022	K70062-02	CKT-036	KF716-04	CKT-003	52245211	CKT-026
16-079	CKT-034B	MU47709-1	CKT-015	K70062-02	CKT-037	KF716-04	CKT-068	52255201	CKT-015
16-079	CKT-045	MU47709-1	CKT-041	K70062-02	CKT-048	KF717-01	CKT-052	52255201	CKT-028
16-079	CKT-047	MU47709-1	CKT-042	K70062-03	CKT-049	KF718-02	CKT-029	52255201	CKT-030
16-079	CKT-058	MU47716-1	CKT-003	K70062-03	CKT-066	KF718-02	CKT-042	52255203	CKT-031
16-079	CKT-070	MU47718-1A	CKT-029	K70062-04	CKT-039	KF718-02	CKT-044	52255204	CKT-012
16-081	CKT-026	MU47720-1	CKT-069	K70064-02	CKT-027	KF718-03	CKT-044A	52255205	CKT-014
16-085	CKT-038	MU47722-1	CKT-012	K70064-02	CKT-031	KF718-03	CKT-063	52355202	CKT-037
16-086	CKT-050	MU47763-1	CKT-009	K70079-02	CKT-004	KF720-03	CKT-069	52355202	CKT-048
16-087	CKT-040	MU47763-1A	CKT-004	K70079-02	CKT-035	KF722-01	CKT-012	52355202	CKT-050
16-088	CKT-056	MU47763-1A	CKT-067	K70079-02	CKT-046	KF749-01	CKT-014	52365203	CKT-049
16-090	CKT-051	MU47873-1	CKT-014	K70079-02	CKT-067	<b>VALEO</b>	<b>AISIN</b>	52365203	CKT-056
16-093	CKT-053	MU70062-1	CKT-050	K70079-03	CKT-034A			51905202	CKT-010
16-109	CKT-039	MU70064-1	CKT-027	K70079-03	CKT-034B	51905203	CKT-003	52365205	CKT-041
16-112	CKT-055	MU70078-1	CKT-034A	K70079-03	CKT-045	52002204	CKT-013	52365205	CKT-042
16-114	CKT-064	MU70078-1	CKT-034B	K70079-03	CKT-047	52005201	CKT-001	52365205	CKT-043
<b>PERFECTION CLUTCH</b>	<b>AISIN</b>	MU70078-1	CKT-047	K70079-03	CKT-058	52005202	CKT-002	52365206	CKT-029
		MU70078-1A	CKT-035	K70079-03	CKT-070	52005202	CKT-006	52365210	CKT-069
MU2025-1A	CKT-013	MU70116-1A	CKT-051	K70079-04	CKT-009	52005202	CKT-007	52365214	CKT-039
MU2091-1	CKT-052	MU70141-1	CKT-053	K70116-01	CKT-056	52005202	CKT-008	52365215	CKT-044A
MU47593-1	CKT-032	MU70165-1	CKT-040	K70116-02	CKT-051	52125201	CKT-004	52405201	CKT-036
MU47607-1	CKT-036	MU72105-1	CKT-045	K70141-01	CKT-053	52125201	CKT-035	52405201	CKT-052
MU47607-1	CKT-037	MU72127-1	CKT-058	K70165-01	CKT-040	52125201	CKT-046	52505201	CKT-051
MU47607-1	CKT-048	MU72144-1	CKT-044	K70610-01	CKT-064	52125201	CKT-067	52505202	CKT-040
MU47607-1A	CKT-049	MU72145-1	CKT-043	K70611-01	CKT-062	52125203	CKT-034A	52505203	CKT-053
MU47607-1B	CKT-038	MU72208-1	CKT-055	KF593-01	CKT-032	52125203	CKT-034B	52755201	CKT-032
MU47613-1A	CKT-010	MU72208-1	CKT-057	KF613-02	CKT-010	52125203	CKT-045	52755204	CKT-055
MU47614-1A	CKT-028	MU72208-1	CKT-065	KF614-01	CKT-028	52125203	CKT-047	52755204	CKT-057
MU47614-1A	CKT-030	MU72209-1	CKT-056	KF614-04	CKT-015	52125203	CKT-070	52755204	CKT-065
MU47614-1C	CKT-031	MU72286-1	CKT-039	KF614-04	CKT-030				



# Clutch Master Cylinder Competitive Cross Reference

ACDELCO	AISIN	BECK ARNLEY	AISIN	CENTRIC PARTS	AISIN	EXEDY	AISIN	LUK Automotive	AISIN
385295	CMT-038	072-9295	CMT-020	136.44407	CMT-011	MC521	CMT-145	LMC334	CMT-012
385321	CMT-054	072-9298	CMT-091	136.44414	CMT-012	MC246	CMT-031	LMC389	CMT-055
385324	CMT-059	072-9369	CMT-093	136.44415	CMT-032	MC256	CMT-007	LMC483	CMT-047
385330	CMT-058	072-9370	CMT-121	136.44500	CMT-058	MC257	CMT-059	SC212	CMT-023
385333	CMT-012	072-9397	CMT-141	136.44501	CMT-043	MC258	CMT-009	<b>PERFECTION CLUTCH</b>	<b>AISIN</b>
385347	CMT-013	072-9563	CMT-055	136.44502	CMT-008	MC263	CMT-038		
385348	CMT-084	072-9713	CMT-138	136.44600	CMT-054	MC265	CMT-004	39179	CMT-003
385350	CMT-003	072-9714	CMT-150	136.44903	CMT-145	MC272	CMT-011	39315	CMT-007
385373	CMT-011	<b>BENDIX</b>	<b>AISIN</b>	137.44306	CMT-005	MC272	CMT-005	39614	CMT-059
385400	CMT-008			11841	CMT-047	138.44001	CMT-023	MC272	CMT-006
385419	CMT-030	12003	CMT-038	136.44005	CMT-055	MC274	CMT-003	39685	CMT-012
385427	CMT-006	12036	CMT-003	136.44310	CMT-121	MC275	CMT-030	39747	CMT-013
385429	CMT-049	12036	CMT-003	136.44800	CMT-049	MC276	CMT-093	39749	CMT-084
385431	CMT-009	12036	CMT-010	136.44900	CMT-084	MC284	CMT-043	39752	CMT-031
385432	CMT-005	12127	CMT-013	136.44901	CMT-060	MC285	CMT-008	39819	CMT-011
385434	CMT-043	12253	CMT-031	136.44902	CMT-112	MC287	CMT-049	39906	CMT-008
385470	CMT-116	12422	CMT-005	<b>DORMAN</b>	<b>AISIN</b>	MC289	CMT-084	39930	CMT-004
385478	CMT-091	12427	CMT-011			CM350011	CMT-043	MC298	CMT-032
385498	CMT-093	12673	CMT-008	CM350012	CMT-059	MC523	CMT-112	350004	CMT-006
385503	CMT-020	12949	CMT-009	CM350096	CMT-145	MC524	CMT-141	350006	CMT-049
385522	CMT-055	12969	CMT-030	CM39749	CMT-084	MC535	CMT-055	350008	CMT-009
385560	CMT-121	12972	CMT-049	CM350004	CMT-006	MC572	CMT-150	350009	CMT-005
386404	CMT-023	13239	CMT-112	CM350006	CMT-049	MC573	CMT-138	350063	CMT-116
385325	CMT-032	13409	CMT-032	CM350008	CMT-009	SC654	CMT-023	350101	CMT-093
385416	CMT-004	13502	CMT-020	CM350009	CMT-005	<b>LUK Automotive</b>	<b>AISIN</b>	350109	CMT-020
385433	CMT-060	12129	CMT-084	CM350003	CMT-005			350096	CMT-112
385494	CMT-112	12206	CMT-054	CM350063	CMT-116	LMC270	CMT-084	360022	CMT-023
<b>BECK ARNLEY</b>	<b>AISIN</b>	12252	CMT-058	CM350076	CMT-091	LMC275	CMT-043	800026	CMT-121
		13226	CMT-060	CM350096	CMT-112	LMC287	CMT-054	350010	CMT-060
072-8443	CMT-084	13970	CMT-121	CM350101	CMT-093	LMC318	CMT-112	350011	CMT-043
072-8615	CMT-043	13971	CMT-145	CM39179	CMT-003	LMC331	CMT-091	350076	CMT-091
072-8615	CMT-058	13973	CMT-141	CM39315	CMT-007	LMC396	CMT-141	350096	CMT-145
072-8833	CMT-060	13977	CMT-055	CM39315	CMT-038	LMC119	CMT-007	39315	CMT-038
072-9511	CMT-145	<b>CENTRIC PARTS</b>	<b>AISIN</b>	CM39610	CMT-054	LMC267	CMT-031	39610	CMT-054
072-4625	CMT-047			136.44000	CMT-031	CM39681	CMT-058	LMC268	CMT-038
072-8212	CMT-012	136.44003	CMT-020	CM39685	CMT-012	LMC272	CMT-010	<b>SACHS</b>	<b>AISIN</b>
072-8217	CMT-038	136.44004	CMT-141	CM39747	CMT-013	LMC272	CMT-011		
072-8220	CMT-011	136.44004	CMT-141	CM39752	CMT-031	LMC272	CMT-003	SH5350	CMT-145
072-8227	CMT-007	136.44010	CMT-150	CM39819	CMT-011	LMC274	CMT-058	SH5461	CMT-093
072-8317	CMT-031	136.44013	CMT-138	CM39906	CMT-008	LMC276	CMT-008	SH5463	CMT-049
072-8355	CMT-054	136.44100	CMT-047	CM39931	CMT-004	LMC276	CMT-008	SH5497	CMT-138
072-8357	CMT-003	136.44101	CMT-013	CM39934	CMT-030	LMC278	CMT-059	SH5497	CMT-138
072-8357	CMT-010	136.44107	CMT-007	CM39934	CMT-121	LMC279	CMT-009	SH5001	CMT-003
072-8648	CMT-059	136.44109	CMT-059	CM640012	CMT-020	LMC285	CMT-006	SH5001	CMT-010
072-8657	CMT-032	136.44110	CMT-009	CM640022	CMT-141	LMC286	CMT-005	SH5008	CMT-038
072-8834	CMT-004	136.44112	CMT-091	CM640063	CMT-055	LMC288	CMT-049	SH5008	CMT-007
072-8836	CMT-005	136.44203	CMT-038	CS360022	CMT-023	LMC289	CMT-030	SH5029	CMT-043
072-8836	CMT-006	136.44208	CMT-004	<b>EXEDY</b>	<b>AISIN</b>	LMC289	CMT-121	SH5030	CMT-005
072-8855	CMT-049	136.44210	CMT-116			MC268	CMT-116	LMC316	CMT-004
072-8894	CMT-008	136.44306	CMT-006	MC275	CMT-121	LMC318	CMT-145	SH5030	CMT-006
072-8925	CMT-030	136.44308	CMT-010	MC283	CMT-058	LMC319	CMT-020	SH5031	CMT-058
072-9038	CMT-023	136.44308	CMT-003	MC469	CMT-054	LMC330	CMT-032	SH5037	CMT-031
072-9155	CMT-112	136.44310	CMT-030			LMC332	CMT-060	SH5089	CMT-047





# Clutch Release Cylinder Competitive Cross Reference

ACDELCO	AISIN	BECK ARNLEY	AISIN	BENDIX	AISIN	CENTRIC PARTS	AISIN	DORMAN	AISIN
381704	CRT-017	072-9543	CRM-025	12321	CRM-014	138.44406	CRT-014	CS37682	CRT-085
385508	CRM-001	072-9622	CRM-022	12418	CRT-002	138.44407	CRT-029	CS37701	CRT-011
386272	CRT-020	061-9158	CRT-017	12658	CRM-002	138.44409	CRT-111	CS37702	CRT-009
386281	CRT-004	072-6034	CRT-020	13096	CRM-016	138.44413	CRT-019	CS37703	CRT-015
386281	CRT-028	072-7917	CRT-001	13114	CRT-003	138.44500	CRT-002	CS37817	CRM-012
386287	CRT-007	072-7917	CRT-028	13131	CRT-013	138.44501	CRT-047	CS37817	CRM-014
386294	CRT-039	072-8195	CRT-007	13133	CRT-001	138.44600	CRT-043	CS37826	CRM-009
386295	CRT-043	072-8211	CRT-019	13133	CRT-028	138.44800	CRT-013	CS37918	CRM-005
386298	CRT-085	072-8232	CRT-085	13141	CRT-088	138.44900	CRT-009	CS37920	CRM-018
386300	CRT-050	072-8353	CRT-043	13143	CRT-026	138.44901	CRT-089	CS37921	CRM-013
386302	CRT-019	072-8354	CRT-011	13228	CRT-090	138.44903	CRT-031	CS37924	CRT-005
386303	CRT-011	072-8444	CRT-009	13229	CRT-031	138.44903	CRT-090	CS37925	CRT-013
386304	CRT-009	072-8489	CRM-018	13231	CRT-040	138.46000	CRM-008	CS37926	CRT-089
386305	CRT-015	072-8499	CRT-039	13232	CRT-029	138.46000	CRM-009	CS37927	CRT-031
386329	CRM-014	072-8627	CRT-024	13399	CRM-013	138.46003	CRM-012	CS650041	CRT-034
386337	CRM-009	072-8628	CRT-002	13400	CRT-047	138.46004	CRM-018	CS650045	CRT-022
386338	CRM-008	072-8631	CRT-005	13504	CRT-022	138.46006	CRM-005	CS650046	CRT-082
386370	CRM-005	072-8716	CRT-015	13505	CRT-034	138.46007	CRM-013	CS650047	CRT-052
386372	CRM-018	072-8720	CRT-010	13619	CRM-020	138.46008	CRM-014	CS650076	CRM-022
386373	CRM-013	072-8820	CRT-031	13994	CRM-001	138.46010	CRM-002	CS650097	CRT-049
386376	CRT-013	072-8822	CRT-050	13996	CRT-052	138.46011	CRM-016	CS650101	CRT-111
386378	CRT-031	072-8824	CRT-013	13997	CRM-036	138.46016	CRM-025	CS650120	CRM-020
386393	CRM-002	072-8832	CRM-014	14015	CRT-086	138.46017	CRM-022	CS650122	CRM-036
386403	CRT-090	072-8858	CRM-013	14016	CRT-049	138.46020	CRM-029		
386404	CRT-026	072-8862	CRM-017	12257	CRT-005	138.46021	CRM-036	<b>EXEDY</b>	<b>AISIN</b>
386430	CRT-014	072-8864	CRM-012	12321	CRM-012	138.62028	CRT-113	16032	CRT-017
386434	CRT-040	072-9031	CRT-003	14013	CRM-022	200.44008	CRT-017	SC580	CRM-012
386440	CRT-047	072-9038	CRT-026	<b>CENTRIC PARTS</b>	<b>AISIN</b>	<b>DORMAN</b>	<b>AISIN</b>	SC585	CRM-013
386441	CRT-029	072-9153	CRT-014	136.46016	CRM-001	CS360006	CRM-002	SC588	CRM-002
386443	CRT-022	072-9176	CRT-040	138.44000	CRT-010	CS360007	CRM-017	SC593	CRM-020
386444	CRT-034	072-9179	CRT-047	138.44001	CRT-026	CS37699	CRT-002	SC593	CRM-025
386445	CRM-022	072-9188	CRT-022	138.44002	CRT-082	CS37826	CRM-008	SC818	CRT-005
386446	CRM-020	072-9239	CRM-020	138.44004	CRT-086	CS650074	CRM-029	MC505	CRM-001
386486	CRT-024	072-9279	CRT-034	138.44005	CRT-049	CS103740	CRT-050	SC579	CRM-008
386499	CRT-052	072-9491	CRT-052	138.44006	CRT-052	CS103751	CRT-024	SC579	CRM-009
386509	CRT-086	072-9512	CRT-082	138.44006	CRT-052	CS360007	CRM-016	SC581	CRM-014
386510	CRT-049	072-9541	CRM-029	138.44010	CRT-115	CS360007	CRM-016	SC584	CRM-005
386520	CRM-036	072-9564	CRT-086	138.44106	CRT-020	CS360021	CRT-090	SC589	CRM-016
386281	CRT-001	072-9591	CRT-111	138.44107	CRT-005	CS360022	CRT-026	SC591	CRM-022
386300	CRT-010	072-9600	CRM-036	138.44108	CRT-050	CS360055	CRT-014	SC593	CRM-036
386301	CRT-002	072-9621	CRT-049	138.44109	CRT-022	CS360059	CRT-003	SC653	CRT-010
386329	CRM-012	072-9726	CRT-115	138.44110	CRT-034	CS360059	CRT-040	SC654	CRT-026
386383	CRT-005	<b>BENDIX</b>	<b>AISIN</b>	138.44201	CRT-007	CS360067	CRT-047	SC659	CRT-020
386394	CRM-016	11833	CRT-020	138.44205	CRT-011	CS360067	CRT-088	SC660	CRT-034
386394	CRM-017	12023	CRT-043	138.44206	CRT-085	CS360068	CRT-029	SC661	CRT-022
386431	CRT-003	12084	CRT-011	138.44208	CRT-039	CS37487	CRT-020	SC661	CRT-050
386534	CRT-111	12135	CRT-085	138.44209	CRT-015	CS37525	CRT-001	SC666	CRT-007
<b>BECK ARNLEY</b>	<b>AISIN</b>	12136	CRT-009	138.44210	CRT-024	CS37525	CRT-004	SC669	CRT-011
072-7917	CRT-004	12136	CRT-089	138.44212	CRT-088	CS37525	CRT-028	SC669	CRT-039
072-8456	CRM-009	12136	CRT-039	138.44404	CRT-004	CS37606	CRT-007	SC670	CRT-085
072-8865	CRM-002	12137	CRT-039	138.44404	CRT-028	CS37676	CRT-043	SC672	CRT-015
072-9254	CRM-001	12248	CRT-010	138.44404	CRT-001	CS37682	CRT-010	SC673	CRT-024
		12248	CRT-050	138.44405	CRT-040	CS37682	CRT-039	SC675	CRT-088



# Clutch Release Cylinder Competitive Cross Reference

EXEDY	AI SIN	LUK Automotive	AI SIN	PERFECTION CLUTCH	AI SIN	SACHS	AI SIN	VALEO	AI SIN
SC677	CRT-001	LSC213	CRT-020	37925	CRT-013	SH6036	CRT-010	5575010	CRM-008
SC677	CRT-004	LSC217	CRT-015	37927	CRT-031	SH6037	CRT-005	5575070	CRM-012
SC677	CRT-028	LSC219	CRT-024	350115	CRM-001	SH6037	CRT-034	5575150	CRM-013
SC681	CRT-003	LSC223	CRT-039	360006	CRM-002	SH6038	CRT-007	5575160	CRM-018
SC681	CRT-040	LSC225	CRT-009	360007	CRM-016	SH6038	CRT-015	5575180	CRM-005
SC682	CRT-014	LSC227	CRT-031	360021	CRT-090	SH6039	CRT-011	5575190	CRM-017
SC683	CRT-029	LSC228	CRT-090	360022	CRT-026	SH6039	CRT-039	5575190	CRM-020
SC684	CRT-002	LSC232	CRT-028	360055	CRT-014	SH6045	CRM-008	5575220	CRM-002
SC685	CRT-047	LSC233	CRT-013	360056	CRT-003	SH6045	CRM-009	5575240	CRM-014
SC685	CRT-089	LSC234	CRT-043	360059	CRT-040	SH6046	CRM-005	5575270	CRM-016
SC687	CRT-013	LSC257	CRT-014	360067	CRT-047	SH6046	CRM-016	5575290	CRM-022
SC688	CRT-009	LSC258	CRT-029	360068	CRT-029	SH6046	CRM-017	5575300	CRM-029
SC691	CRT-031	LSC259	CRT-005	360070	CRT-022	SH6048	CRM-012	5575310	CRM-036
SC691	CRT-090	LSC262	CRT-040	360071	CRT-034	SH6048	CRM-014	5579330	CRT-010
SC697	CRT-019	LSC289	CRT-003	360072	CRM-022	SH6074	CRM-013	5579200	CRT-020
SC837	CRM-018	LSC297	CRT-022	360073	CRM-020	SH6081	CRT-026	5579210	CRT-001
SC841	CRT-052	LSC298	CRT-019	360073	CRM-029	SH6081	CRT-082	5579210	CRT-028
SC854	CRM-029	LSC301	CRM-022	900031	CRT-024	SH6086	CRT-014	5579230	CRT-007
SC861	CRT-082	LSC308	CRT-034	900044	CRT-052	SH6112	CRM-002	5579230	CRT-015
SC874	CRT-086	LSC321	CRM-020	900054	CRT-086	SH6112	CRM-018	5579240	CRT-039
SC879	CRT-111	LSC371	CRT-049	900055	CRT-049	SH6114	CRT-050	5579260	CRT-004
SC905	CRT-115	LSC403	CRT-086	900066	CRM-036	SH6175	CRM-036	5579280	CRT-043
<b>LUK Automotive</b>	<b>AI SIN</b>	LSC404	CRT-082	360007	CRM-017	SH6176	CRM-025	5579300	CRT-009
LSC129	CRM-016	LSC423	CRT-111	37525	CRT-001	SH6176	CRM-029	5579310	CRT-024
LSC130	CRM-009	LSC446	CRT-050	37525	CRT-028	SH6208	CRM-020	5579330	CRT-085
LSC133	CRM-002	LSC518	CRT-047	37689	CRT-010	SH6216	CRT-049	5579350	CRT-002
LSC144	CRM-012	<b>PERFECTION CLUTCH</b>	<b>AI SIN</b>	37817	CRM-012	SH6216	CRT-086	5579350	CRT-047
LSC211	CRT-010	37487	CRT-020	37826	CRM-009	SH6222	CRT-019	5579380	CRT-005
LSC215	CRT-007	37525	CRT-004	37933	CRT-005	SH6222	CRT-052	5579380	CRT-011
LSC224	CRT-002	37606	CRT-007	900089	CRT-111	SH6228	CRT-029	5579410	CRT-022
LSC232	CRT-001	37675	CRT-039	MU47628-1	CRT-017	SH6320	CRT-111	5579410	CRT-050
LSC232	CRT-004	37676	CRT-043	<b>SACHS</b>	<b>AI SIN</b>	SH6390	CRM-022	5579420	CRT-013
LSC365	CRM-036	37682	CRT-085	KF628-01	CRT-017	SH6393	CRT-013	5579440	CRT-031
16-016	CRT-017	37689	CRT-050	SH5377	CRM-001	SH6394	CRT-031	5579440	CRT-090
LMC368	CRM-001	37699	CRT-002	SH6003	CRM-004	SH6394	CRT-090	5579450	CRT-026
LSC112	CRT-011	37700	CRT-019	SH6003	CRT-028	SH6427	CRT-003	5579460	CRT-088
LSC129	CRM-017	37701	CRT-011	SH6003	CRT-001	SH6429	CRT-022	5579470	CRT-014
LSC131	CRM-008	37702	CRT-009	SH6003	CRT-040	SH6430	CRT-088	5579480	CRT-040
LSC132	CRM-018	37703	CRT-015	SH6003	CRT-043	SH6431	CRT-024	5579490	CRT-111
LSC137	CRM-013	37817	CRM-014	SH6006	CRT-020	SH6516	CRT-113	5579510	CRT-034
LSC145	CRM-014	37827	CRM-008	SH6014	CRT-085	SH6517	CRT-115	5579530	CRT-052
LSC146	CRM-005	37918	CRM-005	SH6022	CRT-009	<b>VALEO</b>	<b>AI SIN</b>	5579570	CRT-049
LSC211	CRT-085	37920	CRM-018	SH6027	CRT-002	5475260	CRM-001	5579570	CRT-086
LSC212	CRT-026	37921	CRM-013	SH6027	CRT-047	5575010	CRM-009	72245204	CRT-017



# Oil Pump Competitive Cross Reference

BECK ARNLEY	AISIN	ITM	AISIN	MELLING	AISIN	PIONEER	AISIN	SEALED POWER	AISIN
028-0099	OPG-005	057-1258	OPT-020	M158	OPS-001	OP-204	OPT-019	224-43577	OPT-076
028-0265	OPT-001	057-1259	OPT-007	M159	OPT-030	OP-206	OPT-020	224-43579	OPN-701
028-0265	OPT-031	057-1259	OPT-008	M160	OPT-004	OP-216	OPT-075	224-43579	OPN-702
028-0316	OPT-054	057-1263	OPN-701	M183	OPT-073	OP-216	OPT-076	224-43607	OPT-033
028-0317	OPT-063	057-1281	OPG-006	M183	OPT-079	OP-217	OPT-033	224-43608	OPT-034
028-0318	OPT-023	057-1283	OPG-008	M183	OPT-080	OP-218	OPT-035	224-43608	OPT-035
028-0318	OPT-078	057-1285	OPG-004	M184	OPT-027	OP-219	OPT-037	224-43610	OPT-008
028-0319	OPT-097	057-1287	OPT-070	M185	OPT-034	OP-219	OPT-801	224-43610	OPT-010
028-0333	OPT-004	057-1302	OPT-034	M200	OPT-033	OP-220	OPG-008	224-43611	OPT-037
028-0340	OPG-003	057-1303	OPT-035	M203	OPT-007	OP-237	OPN-703	224-43611	OPT-801
028-0341	OPG-004	057-1304	OPT-801	M203	OPT-008	OP-242	OPT-022	224-43611	OPT-805
028-0381	OPT-034	057-1304	OPT-805	M204	OPT-019	OP-259	OPN-708	224-43612	OPT-022
028-0382	OPT-008	057-1305	OPT-021	M204	OPT-020	OP-261	OPG-009	224-43613	OPT-021
028-0383	OPT-037	057-1305	OPT-022	M216	OPT-075	OP-419	OPT-115	224-43617	OPG-004
028-0383	OPT-801	057-1312	OPT-033	M216	OPT-076	OP-515	OPN-709	224-43619	OPG-008
028-0386	OPN-702	057-1313	OPT-010	M217	OPT-035	OP-527	OPT-010	224-43638	OPN-708
028-0392	OPT-019	057-1318	OPT-073	M218	OPG-004	OP-533	OPT-803	224-43639	OPG-009
028-0393	OPT-027	057-1351	OPT-071	M219	OPT-037	OP-539	OPT-044		
028-0394	OPT-074	057-1365	OPT-075	M219	OPT-801	OP-539	OPT-800		
028-0394	OPT-079	057-1365	OPT-076	M219	OPT-805	OP-540	OPT-044		
028-0394	OPT-080	057-1375	OPT-115	M220	OPG-008	OP-541	OPT-044		
028-0399	OPT-033	057-1376	OPT-044	M242	OPT-021	OP-542	OPT-044		
028-0400	OPT-032	057-1376	OPT-800	M242	OPT-022				
028-0402	OPT-075	057-1377	OPT-044	M259	OPN-708	<b>ROCK PRODUCTS</b>	<b>AISIN</b>		
028-0402	OPT-076	057-1378	OPT-044	M261	OPG-009	OP353	OPG-012		
028-0407	OPT-007	057-1379	OPT-117	M273	OPN-701	OP915	OPT-031		
028-0408	OPT-021	057-1379	OPT-044	M371	OPT-012	OP970A	OPT-011		
028-0408	OPT-022	057-1380	OPT-012	M373	OPT-803	OP971	OPT-103		
028-0409	OPT-035	057-1386	OPN-704	M374	OPN-706	<b>SEALED POWER</b>	<b>AISIN</b>		
028-0410	OPT-071	057-1397	OPG-009	M377	OPT-117	224-41340	OPT-054		
028-0412	OPG-009	057-1503	OPN-706	M379	OPN-707	224-41913	OPT-017		
	<b>ITM</b>	057-1505	OPN-705	M385	OPN-705	224-41929	OPT-031		
	<b>AISIN</b>	057-1513	OPT-048	M386	OPT-044	224-41929	OPT-097		
057-1089	OPT-004	057-1514	OPT-103	M386	OPT-800	224-41935	OPT-001		
057-1090	OPT-032	057-680	OPT-001	M387	OPT-044	224-41936	OPT-004		
057-1090	OPT-097	057-680	OPT-031	M388	OPT-044	224-41938	OPT-036		
057-1095	OPT-025	057-680	OPT-036	M389	OPT-044	224-41941	OPT-059		
057-1097	OPT-023	057-850	OPG-001			224-41942	OPT-060		
057-1098	OPT-074	057-970	OPT-019	<b>PIONEER</b>	<b>AISIN</b>	224-41944	OPT-023		
057-1098	OPT-078			OP-146	OPT-054	224-41947	OPT-030		
057-1100	OPT-079	<b>MELLING</b>	<b>AISIN</b>	OP-147	OPT-001	224-41948	OPT-074		
057-1101	OPT-030	M144	OPG-001	OP-147	OPT-031	224-41948	OPT-078		
057-1104	OPT-054	M146	OPT-054	OP-147	OPT-036	224-41980	OPT-027		
057-1109	OPT-063	M147	OPT-001	OP-148	OPT-023	224-41983	OPT-032		
057-1110	OPT-060	M147	OPT-031	OP-149	OPT-078	224-41984	OPT-019		
057-1111	OPT-059	M147	OPT-032	OP-159	OPT-030	224-41985	OPT-073		
057-1112	OPT-027	M147	OPT-036	OP-160	OPT-004	224-41986	OPT-007		
057-1113	OPT-017	M147	OPT-097	OP-183	OPT-073	224-41987	OPT-020		
057-1115	OPG-003	M148	OPT-023	OP-184	OPT-027	224-43413	OPG-005		
057-1117	OPG-005	M148	OPT-074	OP-185	OPT-034	224-43535	OPM-001		
057-1227	OPT-061	M148	OPT-078	OP-200	OPT-032	224-43553	OPG-001		
057-1254	OPT-080	M154	OPG-005	OP-203	OPT-007	224-43577	OPT-075		
057-1255	OPT-018	M156	OPT-063	OP-203	OPT-008				
								<b>TOPLINE</b>	<b>AISIN</b>
								OPD26QL	OPN-703
								OPD29	OPN-701
								OPD29	OPN-702
								OPD39	OPN-706
								OPD41	OPN-704
								OPD42	OPN-705
								OPIS10	OPG-004
								OPIS12	OPG-008
								OPIS13	OPG-009
								OPIS2	OPG-005
								OPIS3	OPG-001
								OPIS8	OPG-003
								OPSZ2	OPS-001
								OPTO14	OPT-023
								OPTO14	OPT-076
								OPTO14	OPT-078
								OPTO14	OPT-079
								OPTO14V	OPT-075
								OPTO18	OPT-001
								OPTO18	OPT-031
								OPTO18	OPT-032
								OPTO18	OPT-036
								OPTO18	OPT-097
								OPTO19L	OPT-063
								OPTO20C	OPT-061
								OPTO20S	OPT-059
								OPTO20S	OPT-060
								OPTO24	OPT-030
								OPTO25C	OPT-074
								OPTO25C	OPT-080
								OPTO25S	OPT-073
								OPTO26	OPT-004
								OPTO28S	OPT-033
								OPTO29	OPT-034







## WARRANTY

AISIN warrants AISIN product (Products) to be free from defects in material and workmanship for a period of three hundred and sixty five (365) days/12 months, from the date of purchase thereof and installation thereof on the consumer's vehicle, or 12,000 Miles, (20,000 kilometers) whichever occurs first, provided that in no events, AISIN warrants AISIN Products when not installed and used in strict conformity with specifications described in the most up to date AISIN catalog for such installation and operation, and Products which have been altered, improperly installed, maintained or repaired, or damaged by accident, negligence or misuse.

This limited warranty is expressly in lieu of all other warranties, expressed or implied and all other obligations or liabilities on Products.

This limited warranty excludes all labor charges or other incidental or consequential damages.

Any Products for warranty claim hereunder must be returned through the importer, agent, or the distributor from whom they were purchased, provided that such Products must be accompanied by an explanation of circumstances and conditions under which they failed. AISIN reserves the right to examine all Products returned to it for warranty claim to determine whether or not any such Products have failed because of a defect in material or workmanship. The obligation hereunder shall be limited to, at its option, repairing, replacing or crediting for the purchase price of Products, which proves to be defective during the warranty period.

Regardless of whether any Products are repaired, replaced or credited for the purchase price of Products hereunder, transportation charges on the return of such Products must be prepaid by the customer under this limited warranty.

## DISCONTINUED PARTS

Obsolete or Discontinued items will not be accepted for returns.

## GARANTIA

AISIN garantiza sus productos de estar libre de defectos en sus materiales así como en su ensamblaje original por un periodo de 365 días / 12 meses a partir de la fecha de la instalación del producto en el vehículo o 12,000 millas (20,000 Kilómetros), cuyo evento suceda primero. AISIN no garantizará bajo ninguna circunstancia productos que hayan sido instalados fuera de las normas estrictas específicas explicadas en el catálogo AISIN más reciente. Esto incluye por igual los siguientes casos tales como; productos alterados o modificados en su diseño original, mala instalación, reparación o mantenimiento, daños por accidente, negligencia o mal uso del producto en su manipulación u operación, etc.

Esta garantía limitada es totalmente independiente a otras garantías expresadas en lo que respecta a sus obligaciones y responsabilidades de producto.

Esta garantía limitada excluye todo gasto de mano de obra u otros incidentes y daños consecuentes que pudiesen ocurrir.

Productos devueltos por reclamos en garantía deben ser devueltos directamente al importador, agente o distribuidor a quien le fue comprada la pieza. Esta devolución deberá ser acompañada de una explicación por escrito de las fechas de instalación, circunstancias y condiciones por las cuales el producto ha fallado. AISIN se reservará el derecho de examinar el producto en conjunto con la explicación proporcionada por el instalador para determinar si en realidad el producto ha fallado por causas de fabricación original. La obligación por lo tanto, será limitada a las opciones de reparar, reemplazar o acreditar el precio de compra del o los productos implicados que prueben tener defectos durante la duración del periodo de la garantía.

Los cargos de devolución o flete de la mercancía devuelta serán cubiertos por el cliente quien esta haciendo el reclamo de dichos productos.

## PIEZAS DESCONTINUADAS

Partes descontinuadas u obsoletas no están cubiertas en garantía.

## GARANTIE

AISIN garantit les produits Aisin (produits) contre tout défaut de matériaux et de fabrication pour une période de 365 jours/12 mois à compter de la date d'achat ou d'installation sur le véhicule du consommateur, ou 20 000 kilomètres (12 000 milles), la première échéance prévalant. AISIN ne garantit pas les produits si ceux-ci ne sont pas installés et utilisés conformément aux spécifications d'une telle installation et d'une telle utilisation figurant dans la plus récente édition du catalogue AISIN, ainsi que les produits qui ont été modifiés ou installés, entretenus ou réparés de manière incorrecte, ou endommagés à la suite d'un accident, d'une négligence ou d'une utilisation abusive.

Cette garantie limitée remplace expressément toutes les autres garanties, expresses ou implicites, ainsi que toutes les autres obligations ou responsabilités quant aux produits.

Cette garantie limitée exclut tous les frais de main-d'œuvre ainsi que tous les autres dommages consécutifs ou indirects.

Tout produit faisant l'objet d'une réclamation au titre de la garantie doit être retourné au fabricant par l'importateur, l'agent ou le distributeur par l'entremise duquel il a été acheté, à condition que le produit soit accompagné d'une explication des circonstances et des conditions dans lesquelles le produit a présenté une défectuosité. AISIN se réserve le droit d'examiner tous les produits retournés pour réclamation au titre de la garantie, afin de déterminer si la défectuosité desdits produits est causée par un défaut de matériaux ou de main-d'œuvre. L'obligation du fabricant en vertu de cette garantie se limite, à sa discrétion, à la réparation, au remplacement ou au remboursement du prix d'achat du produit s'étant avéré défectueux au cours de la période de validité de la garantie.

Peu importe si les produits font l'objet d'une réparation, d'un remplacement ou d'un remboursement du prix d'achat, les frais de transport pour le retour des produits doivent être payés d'avance par le client en vertu de cette garantie limitée.

## PIÈCES DE FIN DE SÉRIE

Le retour d'articles désuets ou de fin de série n'est pas accepté.

**Part Number: AB1207B**

**OEM Cross Reference: Toyota 00295-00103**

**For Japanese Import Vehicles**

**Individual Packaging Information:**

- Tube Size: Net WT. 2.0 oz (57g)

Previously an Original Equipment Manufacturer and Automotive Dealer exclusive, AISIN offers this unique formula for sale in the Automotive Aftermarket.

**AISIN Part Number AB1207B (FIPG/Liquid Gasket) is highly resistant to:**

- Engine Oil
- High Temperatures
- Coolants
- High Pressures

**Uses Include:**

- Water Pumps
- Timing Chain Covers
- Oil Pans
- Valve Covers



## Section Notes

---

---

---

---

---

---

---

---

---

---

# **AISIN**

*Geared up for the future*



**AISIN WORLD CORP. OF AMERICA**  
24330 Garnier Street  
Torrance, CA 90505 USA  
TEL: (310) 326-8681  
FAX: (310) 539-9035



[www.aisinaftermarket.com](http://www.aisinaftermarket.com)