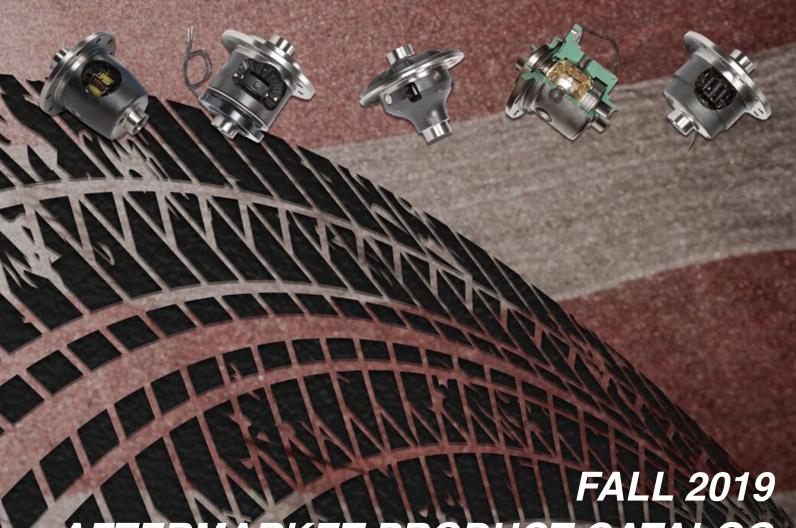
# Auburn Gear

PERFORMANCE DIFFERENTIVALS

AMERICA'S SUPERIOR PERFORMANCE DIFFERENTIALS & ELECTRONIC LOCKERS



FALL 2019 ERMARKET PRODUCT CATALOG

YOUR ONE STOP SHOP FOR AFTERMARKET PRODUCTS

# **Table of Contents**

SELECT-A-LOC 06 LIMITED-SLIP DIFFERENTIALS 08 12 AMC 13 **CHRYSLER** 17 **AUBURN** FORD 28 34 GM TOYOTA 43 46 NISSAN 47 **SERVICE KITS TIRE CHART** 49 50 **OPTIMAL GEAR RATIO CHART 52** FAQ WARRANTY 55



#### 400 E. AUBURN DRIVE AUBURN, IN 46706

# **OUR MISSION FOR QUALITY...**

Auburn Gear, LLC is dedicated to achieving total customer satisfaction by continuously improving our products & services.

# TO FIND A DISTRIBUTOR OR TO BECOME A QUALIFIED INSTALLER...

Visit aftermarket.auburngear.com or call us at 260.925.3200

ENHANCED PERFORMANCE.
QUALITY. RELIABILITY.





# AMERICAN MADE DIFFERENTIALS WITH A CAN DO ATTITUDE

#### TRACTION FOR EVERYTHING THAT MOVES

Through each curve, bump, burnout and obstacle, your vehicle will be guided by the traction and control that has been skillfully engineered by the minds and hands at Auburn Gear.

We design and build high-performance selectable lockers and limited-slip differentials for enthusiasts like you who remember what it means to be American made.

With more than 75 years of gear technology experience, Auburn Gear rolls on.

All of our knowledge and experience goes into ensuring you receive a reliable, performance traction control differential that will step up when you need it and take you where you want to go—street, strip, track, on or off road. That's command traction control designed for the adventure.



#### **Production:**

AUBURN, INDIANA I 250K SQ. FT. I FULLY INTEGRATED FOR OPTIMUM CONTROL OF QUALITY & VALUE

- · Application engineering and rapid prototyping
- · Development, gauge, gear and metallurgical laboratories
- Turning, gear cutting, spline rolling, heat treating, shot peening, and finished grinding

#### **Testing:**

IN DESIGN I IN THE LAB I IN THE REAL WORLD

- Finite Element Analysis (FEA)
- Axle dynamometer testing
- · Vehicle application stress tests in the field
- "Real World" tested by thousands of customers across the globe

#### THIS IS WHAT IT BOILS DOWN TO -WHERE THE TRACTION MEETS THE ROAD, TRACK, ROCKS, MUD AND DIRT

For more than 75 years, high-performance street and off-road enthusiasts have looked to Auburn Gear for enhanced traction capabilities beyond the OE standard.

True command traction courtesy of the Select-A-Loc<sup>™</sup>, two differentials in one, the world's only selectable locking differential with full-time limited-slip capabilities. Page 6.



Smooth, fast, high-bias torque-sensing power in a range of Auburn Gear limited-slip differentials. Page 8.



## NEW FROM AUBURN GEAR



#### 2-IN-1 AND BETTER THAN EVER!

The Auburn Gear Select-A-Loc™ Electronic Locking Differential has the very best aspects of our previous electronic locker design plus the improvements you've been waiting for.

#### Select-A-Loc<sup>™</sup> Advantages:

- Gearing is made from aircraft quality,
   9310 heat treated billet steel to make it tough, durable, and reliable.
- High strength military grade case design, essentially bullet proof.
- The Select-A-Loc<sup>™</sup> can be switched on and off at moderate road speeds (< 30mph) when traveling in a straight line (all wheels at the same speed).
- Lightning fast engagement and disengagement.

- Noisy lockers? Not here!
   Select-A-Loc™ is quiet, when using the recommended lubricants. See page 48.
- Select-A-Loc<sup>™</sup> can be used in front axle applications, with or without lockout hubs.
- King of the Hammers Race Proven and MOAB Proven.
- No Air Lines! No Problems!
- Made in the USA!

AUBURN GEAR OFFERS TWO TYPES OF PATENTED
SELECT-A-LOC™ ELECTRONIC LOCKING DIFFERENTIALS THAT FEATURE
TWO DIFFERENTIALS IN ONE ASSEMBLY.

#### **Limited Slip Differential to Full Lock:**

This Select-A-Loc<sup>™</sup> design features a "unique to the industry" electrically actuated, Limited Slip to Lock.

#### **Open Differential to Full Lock:**

This Select-A-Loc<sup>™</sup> design locks the axle shafts to the differential housing and thus transfers torque directly from the differential case, NOT through the gears!



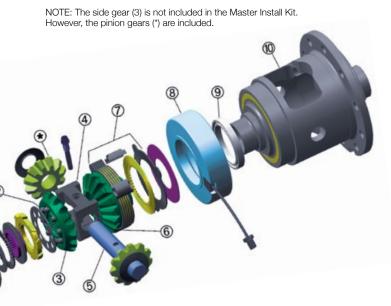
# EVERYTHING YOU NEED IN ONE BOX!

Select-A-Loc™ Electronic Locking Differential Wiring Harness
Auburn Gear Limited-Slip Additive Instructions

#### **HOW IT WORKS...**

Select-A-Loc<sup>™</sup> is a selectable traction device featuring an ON/OFF switch mounted near the driver. When OFF, the clutch pack (7), located behind the side gear (6), activates the limited-slip mode. As torque increases, the separating forces within the differential gears increases, causing the clutch pack to be compressed, providing bias torque to the high traction wheel. When selected on, current is sent to the electromagnetic coil (8). The coil is retained by a clip that fits over one of the bearing cap bolts, making it non-rotational. The coil rides on a ball bearing (9), and the ball bearings spin with the differential case (10). The coil creates a magnetic flux so that the pilot cone (1) is pulled into engagement with the differential case (10). This frictional engagement causes the bearing balls (2) to ride up on a ramp machined into the side

gear (3). This radial travel of the balls (2) also causes lateral movement of the side gear (3). The lateral movement of the side gear (3) applies a force onto the center block (4). The center block (4) has an elongated hole that the center pin (5) fits through, allowing it to float. The center block (4) also applies force to the opposite side gear (6) to compress the clutch pack (7) and provide the vehicle with a solid axle assembly and 100% transfer of torque to both wheels for maximum traction.





# **GET A GRIP**

# PERFORMANCE LIMITED-SLIP DIFFERENTIALS

More traction, lightningfast action. Unleash your vehicle's true performance. The Auburn Gear, High Performance Series, high-bias torque Pro Series, and Race Series limited-slip differentials out perform virtually every standard OEM differential.

To really see and feel what your vehicle can do, Auburn Gear differentials effectively and efficiently transfer your power to the wheels. Auburn Gear differentials deliver usable traction and faster engagement for controlled power transfer and lightning-fast reaction to changing road conditions.

No matter what your application performance or passenger, light or heavy, on or off road—Auburn Gear limited-slip differentials are engineered to provide smooth torque-sensing operation and durable, dependable performance.





Auburn Gear's flagship limitedslip differential gives you smooth torque-sensing operation with the correct bias ratios to out perform the competition.



The Pro Series turns your torque up another notch, offering an even higher bias ratio and faster sensing reaction than HP for the very best in controlled power transfer.



Auburn Gear has developed, tested and is making available a racing differential for the 7 <sup>5</sup>/<sub>8</sub> Firebird/ Camaro, original gear ratio of 3.23 and up, with 28 axle spline. We've also developed, tested and are making available a racing differential for Ford 8.8, all ratios, and 28-axle spline.

# Why Auburn Gear limited-slip differentials?

Auburn Gear Pro Series and High Performance Series differentials provide superior performance through a unique cone-clutch design that transfers more power to the high-traction wheel for quick acceleration and tight cornering.

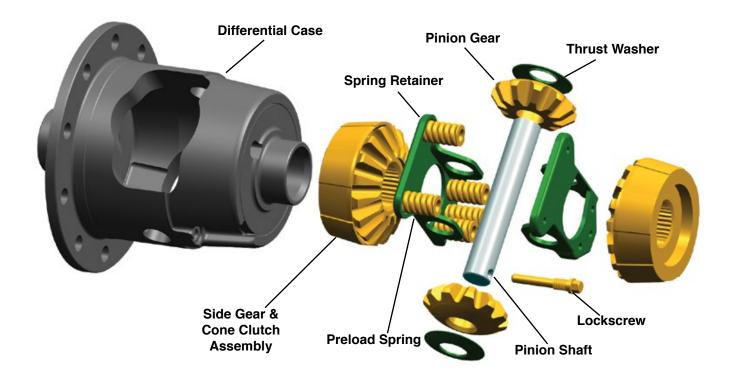


#### IT COMES DOWN TO THE CONE AND CUP DESIGN

The Auburn Gear limited-slip differential employs an integral cone clutch side gear unit that creates friction with the carrier to drive both tires. The highly efficient torque transfer capability of the Auburn Gear limited-slip differential is achieved through the use of cone clutches coupled

to beveled side gears. As torque is transmitted through the differential side gears to the axle shafts, the side gear separating forces and preload spring firmly seat the cones into the differential case. The cone design, along with the applied force, determines the torque transfer capability of the

differential. When torque levels decrease, as in a cornering maneuver, the gear separating forces also decrease, allowing the axle shafts to rotate independently. This divides the torque between the two wheels, delivering more torque (bias torque) to the wheel with the most traction.



# MAKING THE RIGHT SELECTION







- Made in the USA.
- Auburn Gear's flagship Limited Slip Differential gives you smooth torque-sensing operation with the correct bias ratios to outperform the competition.
- Provides maximum amount of torque transfer without compromising the performance requirements of a vehicle in situations where torque transfer is required.



- Made in the USA.
- Turn up your torque with our Pro Series differential for the very best in controlled power transfer.
- High Torque bias Cone Clutch design provides Maximized Torque Transfer, making it the Ultimate Limited Slip Differential for true performance.





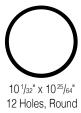
- Made in the USA.
- Performance Racing limited-slip differential developed specifically for road racing.
- A differential case designed to allow the center pin to float along with the axle shafts
- Race design features benefit drivers by, giving the racer an extremely "tight" rear axle when cornering.





- Made in the USA.
- 2 Differentials in 1.
- Aircraft quality 9310 heat treated billet steel gearing.
- With the flip of a switch, go from Limited Slip to a Full Locking mode that delivers 100% torque to both wheels!

# AMC 20, 12 Bolt



YEAR	PART #	RATIOS	SIDE GEAR SPLINE	BEARING CONE*	BEARING CUP*	DIFFERENTIAL TYPE
1966-Present	545006	2.73:1 & Down	29 Teeth	LM60304	LM603012	Select-A-Loc
1966–1986	545007	3.07:1 & Up	29 Teeth	LM603049	LM603012	Select-A-Loc
1966-1986	542081	3.07:1 & Up	29 Teeth	LM603049	LM603012	Pro Series

#### Applications:

All AMC 20 Axles.

**IMPORTANT NOTE:** Be certain that the axle shaft extends beyond the gear face. Some aftermarket one-piece axle shafts are shorter than the stock shaft. Using an axle shaft that is too short will promote failure to the axle shaft splines.

**SPECIAL NOTES:** Some AMC 20 applications require the use of an axle spacer, which is included with the unit. (542081 only)

Kit number: 541050.

Not used if axle bearing is updated on 1 pc. axles.

Part #545006 fits H1 Hummer.





Use Auburn Gear limited-slip additive for maximum performance. A 6 oz. bottle is included with your Auburn Gear differential.
Part #504102.

Make	Year
Jeep C101	1967-1972
Jeep CJ5 & CJ7	1967-1986
Jeep Wagoneer	1967-1986
Jeep J-10	1966-1986
Ambassador	1968-1974
AMX	1968–1979
Concord	1978–1979
Gremlin	1970–1978
Hornet	1972–1978
Javelin	1968-1974
Matador	1972-1978
Pacer V8	1978–1979
Rambler	1969-1972
Scrambler	1976–1978
Spirit V8	1979



**IMPORTANT NOTE:** Bearings not included unless specifically stated. Applications listed (make & year) are for reference only. Always verify axle/ring gear size, the ratio to be used and the number of axle splines prior to purchase and installation.



# Chrysler 81/4" & 83/8" 10 Bolt



YEAR	PART #	RATIOS	SIDE GEAR SPLINE	BEARING CONE*	BEARING CUP*	DIFFERENTIAL TYPE
1966–1996	542072	2.71:1 & Up	27 Teeth	LM603049	LM603012	High Performance
1997-Present	542074	2.71:1 & Un	29 Teeth	LM603049	LM603012	High Performance

#### Applications:

All Chrysler products with 8 1/4" & 8 3/s" ring gear. Accepts tone ring for ABS applications.

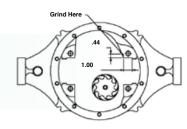




Use Auburn Gear limited-slip additive for maximum performance. A 6 oz. bottle is included with your Auburn Gear differential.
Part #504102.

#### Make Year Jeep Liberty 2002-Present Passenger Cars, Various 1973-1997 B100, 150, 200, 250 1969-Present B,D,W-100 1966-1997 B,D,W-200 1969-1997 B,D,W-300 1966-1997 Aspen/Volare 1976-1980 1970-1974 Barracuda/Challenger Charger/Coronet 1973-1976 Chrysler 300 1972-1979 Cordoba 1975-1983 Dakota 1987-Present Dart 1972-1976 Diplomat/LeBaron 1977-1983 Fifth Avenue/New Yorker 1972-1988 Imperial 1981-1983 1970-1981 Fury Mirada/Magnum 1978-1983 1972-1973 Newport Polara/Satellite 1970-1974 St. Regis 1979-1981 W100, 150 1986-Present

Chrysler 8 ¼" applications require modification to the axle housing as shown to provide clearance for the differential case. Clean housing after grinding.



# Chrysler 8 3/4" 10 Bolt



YEAR	PART #	RATIOS	SIDE GEAR SPLINE	BEARING CONE*	BEARING CUP*	DIFFERENTIAL TYPE
1957–1974	542051	All Ratios	30 Teeth	LM104949	LM104912	Pro Series

8 11/16" x 10 19/32" 10 Holes, Round

#### Applications:

All Chrysler products with 8 3/4" ring gear.





Use Auburn Gear limited-slip additive for maximum performance. A 6 oz. bottle is included with your Auburn Gear differential. Part #504102.

Make	Year
300	1957-1973
B200/B250	1965-1974
Barracuda	1964-1974
Belvedere	1957-1970
Challenger/Duster	1970-1974
Charger (Daytona)	1966-1974
Concord	1963-1968
Coronet	1969-1970
Dart/Swinger	1966–1972
Fury	1957–1974
Imperial	1957-1974
Monaco	1963-1974
Newport/New Yorker	1969-1974
Polara	1963–1974
Road Runner/Satellite	1967-1974
Super Bee	1968-1970
Town & Country	1957-1974
Vallant	1960-1974
W100/W150	1965–1974



1/2"	

12 <sup>3</sup>/<sub>8</sub>" x 11 12 Holes, Irregular

YEAR	PART #	RATIOS	SIDE GEAR SPLINE	BEARING CONE*	BEARING CUP*	DIFFERENTIAL TYPE
1968-1983	542071	2.71:1 & Up	31 Teeth	JLM706449	JLM704610	High Performance
1984-2009	542070	2.71:1 & Up	31 Teeth	JLM704649	JLM704610	High Performance

#### Applications:

Part #542071: All Chrysler products with 9 1/4" ring gear. Part #542070: All Chrysler products with 9 1/4" ring gear. Accepts tone ring for ABS applications.





Use Auburn Gear limited-slip additive for maximum performance. A 6 oz. bottle is included with your Auburn Gear differential. Part #504102.

Make	Year
B350	1984-Present
Bordoba	1975–1979
Charger	1974-1976
D200	1966-Present
D300/D350	1974-Present
Dakota V8	1998-Present
Durango	1997-Present
Fifth Avenue/Fury	1973-1981
Imperial	1974–1975
Monaco	1975–1985
Newport/New Yorker	1973–1981
Polara	1970–1974
Ramcharger/Trailduster	1974-Present
W100/W150/W200/W250	1966-Present

\*Bearing parts numbers are for reference and NOT included unless specifically noted.

# Chrysler 9 1/4"

## Ring & Pinion Rear Style

PART #	OEM REFERENCE #	TEETH	RATIO
342043	3837595	39-11	3.55:1
342049	N/A	47-12	3.92:1





#### Specifications:

Ring Gear Diameter 9.25" 12<sup>7</sup>/16" X 18 LH Threaded Bolts Pinion Diameter 1.876" 29 Splines Case Ratio: 2.71:1 & Numerically Higher 8620 Material—Heat Treated

# **Compatible Auburn Gear Differential Part Numbers**

542071 542070

Make	Year
B350	1984-Present
Charger	1974–1976
Cordoba	1975-1981
D300/D350	1974-Present
Dakota W/V8	1998-Present
Durango	1998-Present
Fifth Avenue	1980-1981
Fury	1973-1981
Imperial	1974-1975
Monoco	1975-1985
Newport	1973-1981
New Yorker	1972-1981
Polara	1970-1974
Ramcharger	1974-1993
Trailduster	1974-Present
Truck 1/2 Ton	1974-2009
Truck 3/4 Ton	1974-Present
Truck 1 Ton	1974-2000
W100/W150/ W200/W250	1974-Present

# Master Installation Kit Rear Style

PART #	DESCRIPTION	MODEL YEARS
541085	Chrysler 9.25" 12 Bolt	1969-2000
541086	Chrysler 9.25" 12 Bolt	2001-Present

<sup>\*</sup>Kit Contains Timken Bearings



#### **MASTER INSTALLATION KITS**

- Ring Gear Bolts Differential Bearings Silicone Sealant Pinion Bearings Crush Collar
- Brush Pinion Shims Differential Shims Gear Marking Compound
- Pinion Seal Pinion Nut Thread Adhesive



# M T S T T T

# Chrysler 9 1/4" 12 Bolt "ZF Rear"



YEAR	PART #	RATIOS	SIDE GEAR SPLINE	BEARING CONE*	BEARING CUP*	DIFFERENTIAL TYPE
2010-Present	5420142	2.71:1 & Up	31 Teeth	JLM704649	JLM704610	High Performance

12 Holes, Irregular

**Applications:** NEW Chrysler 9.25" 12 Bolt "ZF Rear." Works with OEM ABS Applications.





Use Auburn Gear limited-slip additive for maximum performance. A 6 oz. bottle is included with your Auburn Gear differential. Part #504102.

Make	Year
Dodge Durango Citadel	2011-Present
Dodge Durango Crew	2011–2013
Dodge Durango Express	2011
Dodge Durango Heat	2011
Dodge Durango Limited	2015
Dodge Durango R/T	2011–Present
Dodge Durango Rallye	2015
Dodge Durango Special	2010
Service	2012-Present
Dodge Durango SXT	2012–Present
Jeep Grand	2012-1103011
Cherokee Laredo	2010-Present
Jeep Grand	2010-1103011
Cherokee Limited	2010-Present
Jeep Grand	2010-11636111
Cherokee Overland	2011-Present
Jeep Grand Cherokee	2011 1100011
Overland Summit	2012
Jeep Grand	
Cherokee SRT	2015
Jeep Grand	
Cherokee SRT8	2012–2013
Jeep Grand	
Cherokee Summit	2015
RAM 1500 Big Horn	2012
RAM 1500 Big Horn	2015
RAM 1500 Express	2012-Present
RAM 1500 HFE	2013-Present
RAM 1500 Laramie	2011-Present
RAM 1500	2011-Present
Laramie Limited	2013-Present
RAM 1500	
Laramie Longhorn	2011-Present
RAM 1500 Lone Star	2015
RAM 1500	
Outdoorsman	2012
RAM 1500	
Outdoorsman	2015
RAM 1500 R/T	2013
RAM 1500 SLT	2011-Present
RAM 1500	
Special Service	2014
RAM 1500 Sport	2011-Present
RAM 1500 ST	2011-Present
RAM 1500 Tradesman	2011-Present
RAM 1500	2011-Present
Tradesman HD	2012

#### Auburn 30



YEAR	PART #	RATIOS	SIDE GEAR SPLINE	BEARING CONE*	BEARING CUP*	DIFFERENTIAL TYPE
1967-Present	545016	3.55:1 & Down	27 Teeth	LM501349	LM501314	Select-A-Loc
1967-Present	545017	3.73:1 & Up	27 Teeth	LM501349	LM501314	Select-A-Loc

Applications: All Dana 30 models without "C" clips. **IMPORTANT NOTE:**Model 30 setup bearing kit available, part number

541074.





Use Auburn Gear limited-slip additive for maximum performance. A 6 oz. bottle is included with your Auburn Gear differential. Part #504102.

Make	Year
Jeep C-101 Jeepster	1967–1972
Jeep Cherokee/	
Wagoneer Full Size	1971–1973
Jeep CJ	1971–1986
Jeep MJ Comanche	1984-mid 1991
Jeep TJ	1986-Present
Jeep XJ Cherokee	1984-2001
Jeep YJ	1987-1996
Jeep ZJ/	
WJ Grand Cherokee	1993-Present
Ford Aerostar (R)	1985–1989
Front Axle	
Courier * (F)	1979–1980
Ford Bronco (F)	1967-1971
International Scout (F)	1967-1978
Jeep JK (Non Rubicon)	2007-Present
Mazda * (F)	1979-1980
Nissan * (F)	1979-1980
Toyota * (F)	1979-1980
*Above vehicles that are ecconversion front ends	quipped with

# Auburn 30 Ring & Pinion



PART #	OEM REFERENCE # FRONT	OEM REFERENCE # REAR	TEETH	RATIO
342048*	N/A	N/A	39-8	4.88:1
342050^	N/A	N/A	39-8	4.88:1
342057•~	N/A	N/A	39-8	4.88:1

#### Specifications:

Ring Gear Diameter 7.20" 103/8" X 24 RH Threaded Bolts Pinion Diameter 1.376" 26 Splines Case Ratio: 3.55:1 & Numerically Lower Case Ratio: 3.73:1 & Numerically Higher 8620 Material—Heat Treated

# Compatible Auburn Gear Differential Part Numbers

545016 544901 545017

#### Master Installation Kit

	PART #	DESCRIPTION	MODEL YEARS
I	5410115	Bearing Master Kit Auburn 30 JK Front	2007–2016
	5410116	Bearing Master Kit Standard Auburn 30 TJ	1997–2006

\*Kit Contains Timken Bearings

#### Make Year AMC Eagle FRT 1987-1987^ Bronco & U100 1967-1971^ Explorer 2001-Present^ Ford Aerostar 1987-mid 1989 Grand Cherokee WJ 1999-Present^ Grand Cherokee ZJ 1992-1996^ IHC Scout F 1967-1975^ Jeepster 1972-1973^ Jeep C101 F&R 1967-1974 Jeep CJ5, CJ7F & CJ8 1974-1986 Jeep J10 F 1966-1971 Jeep Wagoneer F 1972-1973 Jeep Cherokee XJ 1984-Present Jeep TJ^ 1997-2006 Jeep JK Non Rubicon 2007-2016 Jeep Wrangler TJ 1997-Present Jeep Wrangler YJ 1987-1996 Liberty Truck 2002-Present



YEAR	PART #	RATIOS	SIDE GEAR SPLINE	BEARING CONE*	BEARING CUP*	DIFFERENTIAL TYPE
1987-Present	545012	3.31:1 & Down	27 Teeth	LM102949	LM102911	Select-A-Loc
1987-Present	545013	3.55:1 & Up	27 Teeth	LM102949	LM102911	Select-A-Loc
1987-Present	545014	3.31:1 & Down	30 Teeth^	LM102949	LM102911	Select-A-Loc
1987-Present	545015	3 55·1 & Un	30 Teeth^	LM102949	LM102911	Select-A-Loc

#### Applications:

All Dana 35 models.

#### **IMPORTANT NOTE:**

These are not stock bearings. Bearings are available from Auburn Gear. Bearing kit part number 541070.





Use Auburn Gear limited-slip additive for maximum performance. A 6 oz. bottle is included with your Auburn Gear differential.
Part #504102.

^30 teeth requires aftermarket axle shafts.

Make	Year
Jeep MJ Comanche Jeep TJ	1984-mid 1991 1997-Present
Jeep XJ Cherokee	1984–2001
Jeep YJ Jeep ZJ/	1987–1996
WJ Grand Cherokee	1993-Present

#### **Front Axle**

Ford Explorer/
Ford Ranger 4.0L \* (F) 1990–1997
Mazda B4000 \* (F) 1990–1997
Mountaineer 4.0L \* (F) 1990–mid 1995

\*Above units will work by adding coil spring in the right side axle slip yoke assembly.



#### Auburn 44



YEAR	PART #	RATIOS	SIDE GEAR SPLINE	BEARING CONE*	BEARING CUP*	DIFFERENTIAL TYPE
1971-Present	545018^*	3.73:1 & Down	30 Teeth (only)	25590	25523	Select-A-Loc
1971-Present	545019	3.92:1 & Up	30 Teeth (only)	25590	25523	Select-A-Loc
1971-Present	5420109	3.92:1 & Up	30 Teeth	25590	25523	High Performance
1987-Present	5420110*	3.73:1 & Down	30 Teeth	25590	25523	High Performance
1970 & Prior	5420111	3.92:1 & Up	19 Teeth	25590	25523	High Performance
1970 & Prior	5420112*	3.73:1 & Down	19 Teeth	25590	25523	High Performance
1971-Present	542082	3.92:1 & Up	30 Teeth	25590	25523	Pro Series
1971-Present	542083*	3.73:1 & Down	30 Teeth	25590	25523	Pro Series
1970 & Prior	542084	3.92:1 & Up	19 Teeth	25590	25523	Pro Series
1970 & Prior	542085*	3.73:1 & Down	19 Teeth	25590	25523	Pro Series
1971-Present	5420151	4:10 & Up	30 Teeth	25590	25523	4 Pinion Open
1971-Present	5420147	3.73 & Down	30 Teeth	25590	25523	4 Pinion Open

**Applications:** All Dana 44 models without "C" clips.

^For the 2003-2006 TJ Rubicon, all ratios, please specify part #545018.

\*Jeep JK & TJ always use 3.73:1 & Down regardless of ratio.

2007-Present JK: Ring gear bolts will need to be drilled out to 1/2".

**Front Axle** 

#### **IMPORTANT NOTES:**

Some Dana 44 applications (19 tooth axle splines) require the use of an axle spacer, which is included with the unit.

Auburn 44 units cannot be towed behind any recreational vehicles.

Auburn 44 differentials will not fit Dodge Viper or Corvette. Will not work w/ aluminum axle housing. There is a 1" difference in length of differential.

Model 44 setup bearing kit available, part #541075. This is for fit only. Setup prior to bearings being pressed on.

For models 2007 and newer, check your vehicle axle shaft spline before ordering. Some vehicles may have a 31 tooth configuration.

Will not fit in JKs with Tracklock installed "OE."

High Pinion 44 Aftermarket uses 545019.

\*\*\*Ring gear bolt holes on flange may or may not need to be drilled out for proper ring gear bolt fit and alignment.\*\*\*

Make	Year
Jeep Comanche	1986-1992
Jeep Cherokee	1976-1992
Jeep C101	1967-1972
Jeep CJ5	1967-1975
Jeep CJ7	1967-1975
Jeep CJ7	1985–1986
Jeep JK	
(Non Rubicon)	2007-Present
Jeep "TJ"	2001
Jeep Wagoneer	1967–1983
Chevrolet C10, 5	1960–1970
Cobra	1963–1967
Ford F100 F150 4x4	1967–1978
Thunderbird	1955–1956
IHC Scout	1967–1980
IHC 100, 150,	
200, 1100, 1110,	1005 1070
1200, 1210	1965–1970



A	12
	3
AuburnG	
PRODUCTS CONTROL (	Щ.

Jeep CJ5 1967-1975 Jeep CJ7 1967-1975 Jeep Grand Wagoneer 1984-1992 Jeep J10, 20 1974-1986 Jeep Wagoneer 1967-1983 Blazer 1975-1979 Chevrolet K10, 25 1960-1980 Chevrolet K30, 35 1967-1976 Chrysler W100,150 200, 300 & 350 1969-Present Dodge Ram 1500 1997-2001 Ford Bronco 1971-1997 Ford F100 1967-1997 Ford F150 1975-1997 Ford F250 1967-1997 U100 1971-1978 IHC Scout 1967-1980 IHC 100, 150, 200, 1100, 1110, 1200, 10 1965-1970

Use Auburn Gear limited-slip additive for maximum performance. A 6 oz. bottle is included with your Auburn Gear differential.
Part #504102.

\*Bearing parts numbers are for reference and NOT included unless specifically noted.

# **Auburn Super 44**



YEAR	PART #	RATIOS	SIDE GEAR SPLINE	BEARING CONE*	BEARING CUP*	DIFFERENTIAL TYPE
2007-Present	545021	All Ratios	35 Teeth	JLM704649	JLM704610	Select-A-Loc

#### Applications:

Rubicon Rear and Jeep JK Non-Rubicon.

\*\*\*Ring gear bolt holes on flange may or may not need to be drilled out for proper ring gear bolt fit and alignment.\*\*\*

#### **IMPORTANT NOTE:**

Auburn Super 44 will not fit Jeep WK.

Will not fit in JKs with Tracklock installed "OE."

Make	Year
Jeep JK, non-Rubicon Rubicon, Rear Only,	2007-Present
Non C-Clip	2007-Present

Check bearing size prior to purchase.





Use Auburn Gear limited-slip additive for maximum performance. A 6 oz. bottle is included with your Auburn Gear differential.
Part #504102.



# COMO WIN

#### **MASTER INSTALLATION KITS**

- Ring Gear Bolts Differential Bearings Silicone Sealant Pinion Bearings Crush Collar
- Brush Pinion Shims Differential Shims Gear Marking Compound
- Pinion Seal Pinion Nut Thread Adhesive

# Auburn 44 Ring & Pinion

PART #	OEM REFERENCE # FRONT	OEM REFERENCE # REAR	TEETH	RATIO
342038	706017-4X	706017-4X	41-11	3.73:1
342039 T	706017-5X	706017-5X	45-11	4.09:1
342040	706017-8X	706017-8X	43-8	5.38:1
342045	N/A	N/A	39-8	4.88:1
342046 RS*	N/A	N/A	39-8	4.88:1





\*RS Kits: Reverse Cut, Short Pinion

#### **IMPORTANT NOTE:**

Part #342039 is a thick gear & works with carrier ratio 3.73:1 & numerically lower.

#### Specifications:

Ring Gear Diameter 8.5" 103/8" X 24 RH Threaded Bolts Pinion Diameter 1.376" 26 Splines Case Ratio: 3.73:1 & Numerically Lower Case Ratio: 3.92:1 & Numerically Higher 8620 Material—Heat Treated

# Compatible Auburn Gear Differential Part Numbers

545018	5420112
545019	542082
545021	542083
5420109	542084
5420110	542085
5420111	544914

#### Master Installation Kit

PART #	DESCRIPTION	MODEL YEARS		
541087	Bearing Master Kit 1967 and Earlier	1967 & Earlier		
541088	Bearing Master Kit 1968 and Later	1968 & Later		
541089	541089 Bearing Master Kit 1994 and Later Dodge Ram 1500/2500			
541090	541090 Bearing Master Kit -JK Non Rubicon - Rear			
541091	541091 Bearing Master Kit - JK Rubicon - Rear			
541092	Bearing Master Kit - JK Rubicon - Front	2007–2015		
541093	Bearing Master Kit - TJ Rubicon F&R 2003–2006	2003–2006		

\*Kit Contains Timken Bearings

Make	Year
Bronco (F)	1967–1996
Bronco II (F)	1980–1982
Jeep Cherokee (F)	1978–1985
Jeep Cherokee (R)	1977–1980
Grand Cherokee WJ	
	1999 & Later
Chevrolet K10, 25 (F)	1960–1980
Chevrolet K30, 35 (F)	1967–1976
Chevrolet C10, 5 (R)	1960–1970
Chrysler W100, 150, 2000, 300, 350 (F)	1969 & Later
Chrysler 1/2 Ton (F)	1969–1993
Dodge 1/2 Ton Ram (F)	1994 & Later
Chrysler 3/4 Ton (F)	1969-1984
Dodge 3/4 Ton Ram (F)	1994 & Later
Cobra 63–67	1963–1967
Corvette 80–83	1980–1983
Corvette w/Manual	1985–1996
Transmission	1905-1990
Firebird 84–85	1984-1985
Firebird 92–94	1992-1994
Ford F100, F50, 4x4	1967-1978
Ford 1/2 Ton (F)	1967-1996
Ford 1/2 Ton	1967-1979
Ford 3/4 Ton (F)	1967–1988
Ford 1 Ton (F)	1981–1985
GM 1/2 Ton (F)	1969–1980
GM 1/2 Ton (R)	1965–1972
GM 3/4 Ton (F)	1968–1980
IHC Scout (F)	1972–1980
IHC Scout (R)	1968–1980
IHC 100, 150, 200, 1100,	.000 .000
1110, 12000, 1210 (F & R)	1965-1975
Jeep C101 (R)	1969-1972
Jeep J10, J20 (F)	1978-1987
Jeep CJ Series (R)	1982-1986
Jeep TJ	2001
Jeepster (R)	1972-1973
Jeep Cherokee (F)	1978-1985
Jeep Cherokee (R)	1977-1980
Jeep Comanche XJ (R)	1986-1993
Jeep Wagoneer (F)	1974-1984
Jeep Wagoneer (R)	1972-1979
Jeep Grand Wagoneer (F)	1985-1991
Thunderbird	1995-1996
Viper (R)	1993
JK Rubicon (F)	2007-2015
JK Rubicon (R)	2007-2015
Non-Rubicon (R)	2007-2015
` '	

# **Auburn Super 50**



11.98" x 11.15' 10 Holes

YEAR	PART #	RATIOS	SIDE GEAR SPLINE	BEARING CONE*	BEARING CUP*	DIFFERENTIAL TYPE	
1981–2004	545020	All Ratios	30 Teeth	JLM104948	LM104911A	Select-A-Loc	
2000-2005	545020	All Ratios	30 Teeth	JLM104948	LM104911A	Select-A-Loc	

# Applications:

Ford F-250. F-350 and Excursion front axles.

Make	Year
Excursion	2000–2005
F250/F350	1981–2004





Use Auburn Gear limited-slip additive for maximum performance. A 6 oz. bottle is included with your Auburn Gear differential. Part #504102.



#### **Select-A-Loc Features and Benefits**

- Made in the USA.
- 2 Differentials in 1.
- Aircraft quality 9310 heat treated billet steel gearing.
  - With the flip of a switch, go to a full locking mode that delivers 100% torque to both wheels!

# **Auburn Pro 60**



Applications:

Gear Ratios: 4.10:1 & Down, 4:56:1 & Up

Axle Spline Count: 30 & 35 Teeth Open to Lock

PART #	RATIOS	SIDE GEAR SPLINE	BEARING CONE*	BEARING CUP*	DIFFERENTIAL TYPE
545022	4.10:1 & Down	35 Teeth	387A	382S	Select-A-Loc (Open Rear To Locking Only)
545023	4.56:1 & Up	35 Teeth	387A	382S	Select-A-Loc (Open Rear To Locking Only)
545024	4.10:1 & Down	30 Teeth	387A	382S	Select-A-Loc (Open Rear To Locking Only)
545025	4.56:1 & Up	30 Teeth	387A	382S	Select-A-Loc



#### **IMPORTANT NOTES:**

All Auburn Pro 60 units with the "Reverse Cut-High Pinion" must use 4:10 & Down Case no matter what gear ratio is being used.

Does not work with C-Clip axles.

For Currie Housings, opposite ratio applies.



# GET EVERYTHING YOU NEED IN ONE BOX WITH NO AIR LINES & NO PROBLEMS!

OPEN-TO-LOCK ELECTRONIC OPERATION

100% LOCKING DIFFERENTIAL

LOCKS BOTH AXLES TO CENTER OF THE CARRIER

Make	Year
Studebaker E12 3/4t	
and E14 1t	1956–1964
Dodge Coronet & R/T	1966–1970
Dodge Charger & R/T	1966–1972
Dodge Super Bee	1968–1972
Challenger	1970–1971
Dodge RAM 2500/3500 Dodge RAM 2500	1963–1993
(V8 Only)	1994–2002
Dodge RAM SRT-10	2004–2006
Plymouth Belvedere	1966
Plymouth Satellite	1966
Plymouth Road Runner	1968–1972
Plymouth GTX	1967–1971
Plymouth 'Cuda	1970–1971
Ford 3/4 Ton Trucks	1955–1985
Ford 1 Ton Trucks	1955–1985
Ford E200/E250/E350	1980-1998
Ford UK A0406	
Truck (Option)	1973-1982
Chevrolet and GMC	
3/4 Ton Pickups	1964-1977
Chevrolet and GMC	
1 Ton Pickups	
and Suburbans	1975–1987
Chevrolet and GMC	
1 Ton Vans	1979–2012
Jeep J2600/J2700/	
J3600/J3700	1968–1970
Jeep J4000/4600/	
J4700	1971–1973
Front Axle	
Chevrolet 1 Ton K30/V30 Chevrolet Commercial	1977–1991
Utility Cargo Vehicle	1984–1988
Dodge 3/4 Ton D-600/W-250/2500	1975–2002
Dodge 1 Ton	
D-700/W-350/3500	1975–2002
Ford F250 (Optional)	1974–1979
Ford F250 (Optional)	1999–2011
Ford F350 (Optional)	1974–2011
F450/F550	2000–2004

# Auburn Pro 60 Ring & Pinion

PART #	OEM REFERENCE # FRONT	OEM REFERENCE # REAR	TEETH	RATIO
342041	706033-3X	706033-3X	41-10	4.10:1
342042	706033-4X	706033-4X	41-9	4.56:1
342051	706033-2X	706033-2X	41-11	3.73:1
342054*	N/A	N/A	39-08	4.88:1
342055	N/A	N/A	43-08	5.38:1
342065 (Rev. Cut)	N/A	N/A	43-08	5.38:1





#### Specifications:

Ring Gear Diameter 9.75" 121/2" X 18 RH Threaded Bolts Pinion Diameter 1.626" 29 Splines Case Ratio: 4.10:1 & Numerically Lower Case Ratio: 4.56:1 & Numerically Higher 8620 Material—Heat Treated

# **Compatible Auburn Gear Differential Part Numbers**

545022 545024545023 545025

#### **Master Installation Kit**

PART #	DESCRIPTION	MODEL YEARS
541094	Bearing Master Kit 1968–1991 Chevy, 1959–1998 Dodge, 1960–1998 Ford	1998 & Earlier
541095	Bearing Master Kit 1998 and Later	1998 & Later

#### \*Kit Contains Timken Bearings



Make	Year
Studebaker E12 3/4t	1956–1965, 1966–1970
and E14 1t	1956–1959
Dodge Coronet & R/T	1966–1970
Dodge Super Bee	1968-1972
Challenger	1970–1971
Dodge RAM 2500/3500 Dodge RAM 2500	1963–1993
(V8 Only)	1994–2002
Dodge RAM SRT-10	2004–2006
Plymouth Belvedere	1966
Plymouth Satellite	1966
Plymouth Road Runner	1968-1972
Plymouth GTX	1967–1971
Plymouth 'Cuda	1970–1971
Ford 3/4 Ton Trucks	1955–1985
Ford 1 Ton Trucks	1955–1976
Ford E200/E250/E350 Ford UK A0406	1980–1998
Truck (Option)	1973–1982
Chevrolet and GMC	
3/4 Ton Pickups	1964-1977
Chevrolet and GMC	
1 Ton Pickups	
and Suburbans	1975–1987
Chevrolet and GMC	
1 Ton Vans	1979–2012
Jeep J2600/J2700/	1000 1070
J3600/J3700 Jeep J4000/4600/	1968–1970
J4700	1971–1973
Chevrolet 1 Ton K30/V30 (F)	1977-1991
Chevrolet Commercial	
Utility Cargo Vehicle (F)	1984-1988
Dodge 3/4 Ton	
D-600/W-250/2500 (F)	1975–2002
Dodge 1 Ton	1075 0000
D-700/W-350/3500 (F) Ford F250 (Optional) (F)	1975–2002 1974–1979
Ford F250 (Optional) (F)	1974–1979
Ford F350 (Optional) (F)	1974–2011
F450/F550	2000–2004
,	

<sup>\*</sup>Rear only

#### **Auburn Pro 70**



#### Applications:

Gear Ratios: 4.10:1 & Down, 4:56:1 & Up Axle Spline Count: 35 & 40 Teeth Open to Lock



PART #	RATIOS	SIDE GEAR SPLINE	BEARING CONE*	BEARING CUP*	DIFFERENTIAL TYPE
545026	4.56:1 & Up	35 Teeth	N/A	N/A	Select-A-Loc (Open To Lock)
545027	4.10:1 & Down	35 Teeth	N/A	N/A	Select-A-Loc (Open To Lock)
545035	4.10:1 & Down	30 Teeth	N/A	N/A	Select-A-Loc (Open To Lock)

**IMPORTANT NOTE:** 

\*Auburn Pro 70 is compatible with Dana 70 model axle housings.

For Currie Axle Housings, always use 4.10:1 & Down case

Dana 70 Model uses 387A/382X carrier bearing & race.

Dana 70HD model uses 469.453X carrier bearing & race.



#### Make Year C30 1 Ton 2WD Rear 1974-1988 C3500 Rear 1989-1998 C35/3500 1 Ton 2WD Rear 1974-1998 D250 2WD 3/4 Ton Rear 1965-1984 D300 2WD 1 Ton Rear 1960-1980 D350 2WD 1 Ton Rear 1981-1993 E-350 Van 3500 1 Ton Rear 1975-2008 Ford E-450 Rear 2000-2010 Express Van 3500 1 Ton Rear 1996-2001 Ford F-350 1 Ton 1980-1997 Ford F-350 Super Duty 1999-2002 1 Ton Rear G35/G3500 1 Ton Rear 1973-1991 K30/3500 1 Ton 4WD Rear 1970-1989 K35/3500 1 Ton 4WD Rear 1977-2000 P30 1 Ton Van 1997-2001 P3500 Rear 1997-1999 Ram Van 3500 1 Ton Rear 1971-1984 Savana 3500 1 Ton Rear 1996-2001 W200 3/4 Ton 4x4 Front 1967-1975 W250 3/4 Ton Rear 1981-1984 W300 1 Ton 4x4 Front 1960-1978 W300 1 Ton 4x4 Rear 1968-1978 W350 1 Ton 4x4 Rear 1981-1984

# GET EVERYTHING YOU NEED IN ONE BOX WITH NO AIR LINES & NO PROBLEMS!

OPEN-TO-LOCK ELECTRONIC OPERATION

100% LOCKING DIFFERENTIAL

LOCKS BOTH AXLES TO CENTER OF THE CARRIER

# A C B C B C

# Auburn Pro 70 Ring & Pinion

PART #	OEM REFERENCE # FRONT	OEM REFERENCE # REAR	TEETH	RATIO
342044	N/A	N/A	41-10	4.10:1
342052* (Thick Gear)	N/A	N/A	41-09	4.56:1





9 <sup>3</sup>/<sub>8</sub>" x 10 <sup>1</sup>/<sub>4</sub>" 12 Holes, Irregular

\*Fits 4.10:1 & Numerically Lower Carrier Case Ratio Only

#### Specifications:

Ring Gear Diameter 10.50" 121/2" X 18 RH Threaded Bolts Pinion Diameter 1.750" 29 Splines Case Ratio: 4.10:1 & Numerically Lower 8620 Material—Heat Treated

# Compatible Auburn Gear Differential Part Numbers

545026 545027 545035

Make	Year
C30 1 Ton 2WD Rear	1974-1988
C3500 Rear	1989-1998
C35/3500 1 Ton	
2WD Rear	1974-1998
D250 2WD 3/4 Ton Rear	1965-1984
D300 2WD 1 Ton Rear	1960-1980
D350 2WD 1 Ton Rear	1981-1993
E-350 Van 3500	
1 Ton Rear	1975-2008
Ford E-450 Rear	2000-2010
Express Van 3500	
1 Ton Rear	1996-2001
Ford F-350 1 Ton	1980-1997
Ford F-350 Super Duty	
1 Ton Rear	1999-2002
G35/G3500 1 Ton Rear	1973-1991
K30/3500 1 Ton	
4WD Rear	1970-1989
K35/3500 1 Ton	1077 0000
4WD Rear	1977-2000
P30 1 Ton Van	1997-2001
P3500 Rear	1997-1999
Ram Van 3500	1071 1004
1 Ton Rear Savana 3500 1 Ton Rear	1971-1984 1996-2001
W200 3/4 Ton 4x4 Front	1967-1975
W250 3/4 Ton Rear	1981-1984
W300 1 Ton 4x4 Front	1960-1978
W300 1 Ton 4x4 Rear	1968-1978
W350 1 Ton 4x4 Rear	1981-1984
11000 1 1011 4A4 110a1	1001-1004



#### **Auburn Pro 80**



PART #	RATIOS	SIDE GEAR SPLINE	BEARING CONE*	BEARING CUP*	DIFFERENTIAL TYPE
545032	4.10:1 & Up	35 Teeth	N/A	N/A	Select-A-Loc (Open To Lock)
545033	3.73:1 & Down	35 Teeth	N/A	N/A	Select-A-Loc (Open To Lock)
545036	4.10:1 & Up	40 Teeth	N/A	N/A	Select-A-Loc (Open To Lock)
545037	3.73:1 & Down	40 Teeth	N/A	N/A	Select-A-Loc (Open To Lock)

#### IMPORTANT NOTE:

Dana 80 model uses 469/453X carrier bearing & race

\*Auburn Pro 80 is compatible with Dana 80 model axle housings.



Make	Year
Dodge 3500	1994-2002
Dodge 2500 (equipped	
w/ manual transmissions	1994–2002
& Diesel or V10 engines)	
Ford F350 (Select	1988–1998
chassis cabs & pick ups)	
Ford F350	1999–2016
Ford F450	1988–2004
Ford F450 (13,050 GVW)	2011-2014
GM (C3500 HD)	1991–2002

# Auburn 80 Ring & Pinion

PART #	OEM REFERENCE # FRONT	OEM REFERENCE # REAR	TEETH	RATIO
342047	N/A	73200-5X	41-10	4.10:1



#### Specifications:

Ring Gear Diameter 11.25" 121/2" X 20 RH Threaded Bolts Pinion Diameter 2" 37 Splines Case Ratio: 3.73:1 & Numerically Lower Case Ratio: 4.10:1 & Numerically Higher 8620 Material—Heat Treated **Compatible Auburn Gear Differential Part Numbers** 

545032 545033 545036 545037

#### **Master Installation Kit**

PART #	DESCRIPTION	MODEL YEARS
541096	Bearing Master Kit 1988–1997 Ford, 1994–2001 Dodge	1988–1997 Ford, 1994–2001 Dodge
541097	Bearing Master Kit 1998 & Later Ford	1998 & Later Ford

\*Kit Contains Timken Bearings

#### Make Year Chevrolet C3500 1992-2001 Chevrolet Express Van 1996-2007 3500 1 Ton Chevrolet G30 1 Ton 1992-1995 Chevrolet K30/K3500 1 1990-1998 Ton (4WD) Chevrolet P30 1 Ton Van 1997-2005 Chevrolet P3500 1997-1999 Dodge B3500 Dodge 1995-1998 Van 1 Ton Dodge Ram 2500 3/4 1994-2002 Dodge Ram 3500 1 Ton 1994-2002 Dodge Ram Van 2500 1999-2003 3/4 ton Ford E-350 1 Ton 1988-2010 Ford E-450 2000-2005 Ford F-350 1 Ton 1988-1998 Ford F-350 Super Duty 1998-2015 1 Ton Ford F-450 Super Duty 1990-2005 GMC C35/C3500 1 Ton 1992-2002 (2WD) GMC K35/K3500 1 Ton 1992-2000 (4WD)

# Ford 7 1/2" 10 Bolt



YEAR	PART #	RATIOS	SIDE GEAR SPLINE	BEARING CONE*	BEARING CUP*	DIFFERENTIAL TYPE
1978-Present	542023	All Ratios	28 Teeth	LM501349	LM501314	High Performance
1978-Present	545048	All Ratios	28 Teeth	LM501349	LM501314	Pro Series

Applications: All Ford products with 71/2" ring gear. Accepts tone ring for ABS applications.



**SPECIAL NOTE:** Ford 7.5" applications require special "C" washers, which are supplied with the differential (542035). Includes milled pinion shaft to accept

3.73-4.56 ratios.

Use Auburn Gear limited-slip additive for maximum performance. A 6 oz. bottle is included with your Auburn Gear differential. Part #504102.

Make	Year
Aerostar	1986-1996
Bobcat	1975-1980
Bronco II	1983-1990
Capri except 86 w/V8	1979–1986
Cougar	1980-1987
Fairmont	1978-1983
Ford Full Size	1979-1986
Granada	1979–1984
Mercury Full Size	1979–1985
Mustang 4 & 6 Cylinder	1979-Present
Ranger without 4.0L	1983-1999
Thunderbird	1980-1994
Zephyr	1979–1983

#### Ford 8" 10 Bolt



YEAR	PART #	RATIOS	SIDE GEAR SPLINE	BEARING CONE*	BEARING CUP*	DIFFERENTIAL TYPE
1960–1979	542059	3.0:1 & Up	28 Teeth	LM102949	LM102910	Pro Series
1960-1979	5420115	3.0:1 & Up	31 Teeth	LM102949	LM102910	Pro Series

Applications: All Ford products with 7 3/4" & 8" ring gear. Use Ford M-4216-B ring gear bolts for an open-type differential. Limited-slip type bolts are too long.





Use Auburn Gear limited-slip additive for maximum performance. A 6 oz. bottle is included with your Auburn Gear differential. Part #504102.

#### Ford 8.8" 10 Bolt



YEAR	PART #	RATIOS	SIDE GEAR SPLINE	BEARING CONE*	BEARING CUP*	DIFFERENTIAL TYPE
1978-2014	545001	All Ratios	28 Teeth	LM603049	LM603012	Select-A-Loc
1983–2014	545002	All Ratios	31 Teeth	LM603049	LM603012	Select-A-Loc
1983–2014	545005^	All Ratios	31 Teeth	LM603049	LM603012	Select-A-Loc
1979–2014	542079	All Ratios	28 Teeth	LM603049	LM603012	High Performance
1983–2014	542025	All Ratios	31 Teeth	LM603049	LM603012	High Performance
1979–2014	542080	All Ratios	28 Teeth	LM603049	LM603012	Pro Series
1983–2014	542054**	All Ratios	31 Teeth	LM603049	LM603012	Pro Series
1983–2014	5420116**	All Ratios	33 Teeth			Pro Series
2015-Present	5420153	All Ratios	34 Teeth			Pro Series

Applications for High Performance and Pro Series:

All Ford products with 8.8" ring gear including IRS (Independent Rear Suspension) applications. Accepts tone ring for ABS applications.

Applications for Select-A-Loc™:
Part #545001: All Ford products with
8.8" ring gear including IRS & IFS
applications. Accepts tone ring for
ABS applications.

Applications for Select-A-Loc<sup>™</sup>: Part #545002 & Part #545005: All Ford products with 8.8" ring gear. Accepts tone ring for ABS applications. ^ For IRS applications only
• • 9310 Gear Material



Use Auburn Gear limited-slip additive for maximum performance. A 6 oz. bottle is included with your Auburn Gear differential. Part #504102.

Make	Year
Aerostar with 4.0L	1990-1996
Bronco	1981-1994
Capri V8	1986–1997
Cougar	1988-2001
E150 - E250	1983–1999
Expedition Front	1997–2014
Explorer	1990-2014
F100	1981–1997
F150-250	1981–2014
F150 Front	1997–2014
Mercury Full Size	1982–2014
Mustang V8	1985–2014
Ranger with 4.0L	1990–2014
Raptor	2010-2014
Thunderbird	1987-1994



Part Number #5420153

Applications: Specifically designed for 2015-Present Mustang V8 models.

# Ford 8.8" Ring & Pinion

PART #	OEM REFERENCE # FRONT	OEM REFERENCE # REAR	TEETH	RATIO
342037	E3TZ4209J	M4 209G355	39-11	3.55:1
342059	N/A	N/A	41-11	3.73:1
342060	N/A	N/A	41-10	4.10:1





#### Specifications:

Ring Gear Diameter 8.80" 10<sup>7</sup>/16" X 20 LH Threaded Bolts Pinion Diameter 1.626" 30 Splines No Case Breaks 8620 Material - Heat Treated **Compatible Auburn Gear Differential Part Numbers** 

545001 542039 545002 542080 545005 542054 542079 5420116 542025 544921

Make	Year
Areostar with 4.0L	1990-1997
Bronco	1983-1996
Capri V8	1986
Cougar	1980-1997
E150-E250	1983–1999
Expedition	1997–2014
Explorer	1991–2014
F100	1981-1990
F150-F250	1981-2002
F150 Front	1999–2002
Ford 1/2 TON Rear	1997–2014
Ford 3/4 TON Rear	1983-1989
Full Size Car	1980-2014
Mustang V8	1986-2014
Ranger with 4.0L	1983-2014
Thunderbird	1983–1997

<sup>\*\*</sup>Starting 1997, production Model F150 comes with Factory Ford 8.8 IFS Style Reverse Cut Gears\*\*

#### Master Installation Kit

٠.			
	PART #	DESCRIPTION	MODEL YEARS
	5410104	Bearing Master Kit 1981–1997	1981–1997
	5410105	Bearing Master Kit 2010-Present	2010–2014
	5410106	Bearing Master Kit 1997–2014 IRS Application	1997–2014
	5410107	Bearing Master Kit 1997–2014 IFS Reverse Front End (F-150 & Expedition)	1997–2014

#### \*Kit Contains Timken Bearings

# MASTER INSTALLATION KITS

- COMO TINE
- Ring Gear Bolts Differential Bearings Silicone Sealant Pinion Bearings Crush Collar
- Brush Pinion Shims Differential Shims Gear Marking Compound
- Pinion Seal Pinion Nut Thread Adhesive

# Ford 9" 10 Bolt



YEAR	PART #	RATIOS	SIDE GEAR SPLINE	BEARING CONE*	BEARING CUP*	DIFFERENTIAL TYPE
1957–1987	542043	All Ratios	28 Teeth	LM102949	LM102910	Pro Series
1957–1987	542036	All Ratios	31 Teeth	LM603049	LM603011	Pro Series

11 3/4" 10 Holes, Oval

**Applications:** All Ford products with 8  $^3$ / $^4$ " & 9" ring gear. Use Ford M-4216-A210 ring gear bolts for an open-type differential. Limited-slip type bolts are too long.





Use Auburn Gear limited-slip additive for maximum performance. A 6 oz. bottle is included with your Auburn Gear differential.
Part #504102.

Make	Year
All Light Trucks	1957-1987
Bronco	1967-1986
Comet	1965–1967
Cougar	1965–1979
E100/150	1986–1987
E200	1968–1974
Fairlane	1962–1973
Ford	1957–1980
Granada	1975–1980
Ltd II	1971–1979
Mercury	1957–1973
Mustang	1965–1973
Monarch	1975–1980
Montego	1965–1976
Thunderbird	1957–1973
Torino	1971–1979
Versailles	1977–1980

# Ford 9 3/4" 12 Bolt



YEAR	PART #	RATIOS	SIDE GEAR SPLINE	BEARING CONE*	BEARING CUP*	DIFFERENTIAL TYPE
1997-Present	542090	All Ratios	34 Teeth	NP343847	NP372019	High Performance

12.46" x 11.45" 12 Holes, Irregular

**Applications:** All Ford products with 9 3/4" ring gear. Accepts tone ring for ABS applications. Fits IRS applications.





Use Auburn Gear limited-slip additive for maximum performance. A 6 oz. bottle is included with your Auburn Gear differential. Part #504102.

Make	Year
E150	1997-2014
E250	1997-2014
E350	1997-2014
Expedition	1997-2014
F150	1997-2014
Lightning	1999-2014
Navigator	1997-2014

# Ford 9" Ring & Pinion

PART #	OEM REFERENCE # FRONT	OEM REFERENCE # REAR	TEETH	RATIO
342036	N/A	N/A	37-10	3.70:1
342064	N/A	N/A	35-10	3.50:1
342066	N/A	N/A	41-10	4.10:1
342067	N/A	N/A	39-13	3.00:1
342068	N/A	N/A	39-12	3.25:1
342069	N/A	N/A	35-09	3.89:1



11 3/4" 10 Holes, Oval

#### Specifications:

Ring Gear Diameter 9" 10<sup>7</sup>/<sub>16</sub>" X 20 RH Threaded Bolts Pinion Diameter 1.313" 28 Splines No Case Breaks 8620 Material—Heat Treated Compatible Auburn Gear Differential Part Numbers 542043 544909 542036

#### **Master Installation Kit**

PART #	DESCRIPTION	MODEL YEARS
5410109	Bearing Master Kit 28 Spline 2.891 with LM102910 & LM102949	1970–1986
5410108	Bearing Master Kit 28 Spline 2.891 Late with LM501310 & LM501349	1957–1970
5410110	Bearing Master Kit 2.891 with LM102910 & LM102949 Rear Pinion Bushings	1970–1986
5410111	Bearing Master Kit 3.062 with LM603011 & LM603049 STD Rear Pinion Bearings	1957–1986
5410112	Bearing Master Kit 3.062 with LM603011 & LM603049 LG Rear Pinion Bearings	1957–1986
5410113	Bearing Master Kit 3.25 Bore with LM104910 & LM104949 STD Rear Pinion Bearings	1957–1986
5410114	Bearing Master Kit 3.25 Bore with LM104910 & LM104949 LG Rear Pinion Bearings	1957–1986

\*Kit Contains Timken Bearings

Make	Year
Austrailian Falcon GT,	1969–1974
WX, XY, XA, XB Austrailian Fairlane ZC, ZD	1969–1974
	1967–1970 1970–1986 1965–1967 1967–1970 1970–1979 1986–1987 1968–1974 1964–1986 1957–1970 1970–1971 1957–1970 1970–1986 1969–1970 1970–1974 1975–1980 1971–1979 1957–1970 1970–1979
Montego (31 Spline)	1970–1976
Monarch Mustang (28 Spline)	1975–1980 1965–1970
Mustang (31 Spline) Thunderbird (28 Spline)	1970–1973 1957–1970
Thunderbird (31 Spline)	1970–1979
Versallies	1977–1980

#### **MASTER INSTALLATION KITS**

- Ring Gear Bolts Differential Bearings Silicone Sealant Pinion Bearings Crush Collar
- Brush Pinion Shims Differential Shims Gear Marking Compound
- Pinion Seal Pinion Nut Thread Adhesive

# Ford 9 3/4" Ring & Pinion

PART #	OEM REFERENCE # FRONT	OEM REFERENCE # REAR	TEETH	RATIO
342053	N/A	N/A	41-10	4.10:1





12.46" x 11.45" 12 Holes, Irregular

Spe	cific	atio	ns:
	_	_	

Ring Gear Diameter 9.75" 12-12MM X 26 RH Threaded Bolts Pinion Diameter 1.970" 31 Splines No Case Breaks 8620 Material—Heat Treated Compatible Auburn Gear Differential Part Numbers

542090

Make	Year
Expedition	1997-2014
E150	1997-2014
E250	1997-2014
E350	1997-2014
F150	1997-2014
Ford 1/2 Ton	1997-2014
Ford 3/4 Ton	1997-2014
Navigator	1997-2014

#### **Master Installation Kit**

PART #	DESCRIPTION	MODEL YEARS
5410119	Bearing Master Kit 2011–Present	2011-Present

<sup>\*</sup>Kit Contains Timken Bearings

# Ford 10 1/4" & 10 1/2" 12 Bolt



12 <sup>1</sup>/<sub>8</sub>" x 13 <sup>5</sup>/<sub>16</sub>" 12 Holes, Irregular

YEAR	PART #	RATIOS	SIDE GEAR SPLINE	BEARING CONE*	BEARING CUP*	DIFFERENTIAL TYPE
1983-Present	542089	All Ratios	35 Teeth	469	453X	High Performance

**Applications:** All Ford products with 10 ¼" & 10 ½" ring gear. Accepts tone ring for ABS applications.

#### SPECIAL NOTE:

Works with both C-clips (semi-float) and full float axles.





Use Auburn Gear limited-slip additive for maximum performance. A 6 oz. bottle is included with your Auburn Gear differential.
Part #504102.

Make	Year
F250	1983-Present
F350	1983-Present
F450	1983-Present

## GM 7 1/2" & 7 5/8" 10 Bolt



YEAR	PART #	RATIOS	SIDE GEAR SPLINE	BEARING CONE*	BEARING CUP*	DIFFERENTIAL TYPE
1976-1988	542057	3.23:1 & Up	26 Teeth	LM501349	LM501314	High Performance
1976–1988	542058	3.08:1 & Down	26 Teeth	LM501349	LM501314	High Performance
1976–1988	542044	3.23:1 & Up	26 Teeth	LM501349	LM501314	Pro Series
1976–1988	542045	3.08:1 & Down	26 Teeth	LM501349	LM501314	Pro Series

**Applications:** All GM products with  $7^{1/2}$ " &  $7^{5/8}$ " ring gear.





Use Auburn Gear limited-slip additive for maximum performance. A 6 oz. bottle is included with your Auburn Gear differential. Part #504102.

Make	Year
Astro/Safari	1985–1988
Buick/Olds/Pontiac	
Camaro/Firebird	1982-1988
Century/Phoenix/Ventura	1978-1981
Chevrolet Full Size	1977–1988
Chevrolet Manza 26T	1975–1980
Cutlass/Grand Prix	1978–1987
El Camino	1977–1988
Full Size	1977–1988
Monte Carlo/Regal	1978–1987
Omega	1975–1979
S10/S15	1982–1988
Skylark	1976–1979



YEAR	PART #	RATIOS	SIDE GEAR SPLINE	BEARING CONE*	BEARING CUP*	DIFFERENTIAL TYPE
1988-Present	542040	3.23:1 & Up	28 Teeth	LM501349	LM501314	High Performance
1988-Present	542041	3.08:1 & Down	28 Teeth	LM501349	LM501314	High Performance
1988-Present	542046	3.23:1 & Up	28 Teeth	LM501349	LM501314	Pro Series
1988-Present	542047	3.08:1 & Down	28 Teeth	LM501349	LM501314	Pro Series

Applications: All GM products with 7 ½ & 7 5/s" ring gear. Accepts tone ring for ABS applications.

**SPECIAL NOTE:** GM 7 <sup>5</sup>/s<sup>II</sup> applications use (2) different tone wheels depending on the differential case series. 3.08:1 & down gear ratios—Series 2 Case 3.23:1 & up gear ratios—Series 3 Case.





Use Auburn Gear limited-slip additive for maximum performance. A 6 oz. bottle is included with your Auburn Gear differential.
Part #504102.

Make	Year
Astro/Safari	1988–2005
Buick/Olds/Pontiac Camaro/Firebird	1988–2002
Chevrolet Full Size	1988–1996
Full Size	1988–1990
Isuzu Rodeo	1989–1993
Olds Bravada	1991–2002
S10/S15	1988–2005

# GM 7 1/2" & 7 5/8" Ring & Pinion

PART #	OEM REFERENCE # FRONT	OEM REFERENCE # REAR	теетн	RATIO	
342035	N/A	26026782	41-12	3.42:1	
342034	N/A	26036813	41-11	3.73:1	





#### Specifications:

Ring Gear Diameter 7.50" 103/8" X 18 LH Threaded Bolts Pinion Diameter 1.438" 27 Splines Case Ratio: 3.08:1 & Numerically Lower Case Ratio: 3.23:1 & Numerically Higher 8620 Material - Heat Treated

#### Compatible Auburn Gear **Differential Part Numbers**

542057 542041 542058 542046 542044 542047 542045 544932 542040 544933

	10 Holes, Ov
lake	Year
stro	1985-2005
uick Full Size	1975-1986
uick Mid Size	1973-1987
amaro	1982-2002

# Master Installation Kit

PART #	DESCRIPTION	MODEL YEARS
541098	Bearing Master Kit 1977–1981	1977–1981
541099	Bearing Master Kit 1982–1998	1982–1998
5410100	Bearing Master Kit 1999 & Later	1999 & Later

<sup>\*</sup>Kit Contains Timken Bearings

Make	Year
Astro	1985-2005
Buick Full Size	1975-1986
Buick Mid Size	1973-1987
Camaro	1982-2002
Century/Phoenix	
Ventura	1978-1981
Chevy Full Size	1975-1996
Chevy Mid Size	1976-1980
Cutlass	1978-1988
Firebird	1982 & Later
Grand Prix	1978-1987
Isuzu Rodeo	1989-1993
Monte Carlo	1981-1988
Olds Full Size	1977-1985
Olds Bravada	1991-2002
Omega	1975-1979
Pontiac Full Size	1977-1986
Regal	1978-1983
Skylark	1976-1979
S10, S15	1982-2005
•	



SIDE GEAR **BEARING BEARING** DIFFERENTIAL YEAR PART # **RATIOS** SPLINE CONE\* CUP\* **TYPE** 1964-1972 5420108 3.08:1 & Up 28 Teeth LM501349 LM501314 High Performance 1964-1972 542061 3.08:1 & Up 28 Teeth LM501349 LM501314 Pro Series

Applications: Chevrolet with 8.2" ring gear. "C" lock axle. 25 tooth pinion spline.

#### **SPECIAL NOTE:**

Ring Gear bolts are included.





Use Auburn Gear limited-slip additive for maximum performance. A 6 oz. bottle is included with your Auburn Gear differential. Part #504102.



# GM 8.2" Ring & Pinion

PART #	OEM REFERENCE # FRONT	OEM REFERENCE # REAR	TEETH	RATIO
342056	N/A	N/A	41-11	3.73:1



11" Oval or 10  $\frac{5}{8}$ " Irregular, 10 Holes

Spe	cifica	tions
-----	--------	-------

Ring Gear Diameter 8.20" 103/8" X 24 RH Threaded Bolts Pinion Diameter 1.438" 25 Splines Case Ratio: 3.00:1 & Numerically Lower Case Ratio: 3.08:1 & Numerically Higher

8620 Material-Heat Treated

# **Compatible Auburn Gear Differential Part Numbers**

5420108 542061

Make	Year
Camaro	1967-1970
Caprice	1965-1971
Chevelle	1964-1972
Chevrolet	1965–1970
Chevy II	1964-1972
El Camino	1964-1971
Impala	1964-1971
Monte Carlo	1970–1972
Nova	1964–1972

#### **Master Installation Kit**

PART #	DESCRIPTION	MODEL YEARS
5410118	Bearing Master Kit 1964–1972	1964–1972

<sup>\*</sup>Kit Contains Timken Bearings

#### Buick - Olds - Pontiac 8.2" 10 Bolt



YEAR	PART #	RATIOS	SIDE GEAR SPLINE	BEARING CONE*	BEARING CUP*	DIFFERENTIAL TYPE
1964–1971	5420113	3.36:1 & Up	28 Teeth	LM501349	LM501314	High Performance
1964–1971	5420114	2.92:1 & 3.23:1	28 Teeth	LM501349	LM501314	High Performance
1964–1971	542060	3.36:1 & Up	28 Teeth	LM501349	LM501314	Pro Series
1964–1971	542099	2.92:1 & 3.23:1	28 Teeth	LM501349	LM501314	Pro Series

Applications: Buick, Olds, Pontiac with 8.2" ring gear. Non "C" lock axle–27 tooth pinion spline. Will not fit "O" axle with 12-bolt cover and 10-bolt ring gear.

**SPECIAL NOTE:** Differential bearings provided with 542099 and 5420114

SPECIAL NOTE: Stock bearings are usually LM603049/LM603012 for the ring gear side and LM501349/LM501314 for the opposite side. Some use LM501349/LM501314 for both sides. The Auburn Gear limited-slip differential will fit in either application. We supply 2 sets of LM102949/LM102911. Axles that have the LM603049/LM603012 bearing will still use that bearing, but the opposite side will require the LM102949/LM102911 that is included with the differential.





Use Auburn Gear limited-slip additive for maximum performance. A 6 oz. bottle is included with your Auburn Gear differential. Part #504102.

Make	Year
Firebird	1967-1971
Olds F85	1964–1970
Tempest/GTO	1964–1971

### GM 8.2"/8.4" 10 Bolt 1955-1964 Chevy



YEAR	PART #	RATIOS	SIDE GEAR SPLINE	BEARING CONE*	BEARING CUP*	DIFFERENTIAL TYPE
1955-1964	5420100	3.70:1 & Down^	17 Teeth	LM603049	LM603014	Pro Series

^3 Series Case

Irregular NOTE: Comes with longer Ring Gear Bolts.





Use Auburn Gear limited-slip additive for maximum performance. A 6 oz. bottle is included with your Auburn Gear differential.
Part #504102.

Make	Year
Bel Air	1955-1964
Biscayne	1955-1964
Corvette	1955-1962
Chevy II	1955–1964
El Camino	1955–1964
Impala	1955-1964
Series 150/210	1955–1964

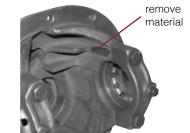
#### Housing modification for non-posi housings

Axle housings not originally equipped with a posi-traction will require modification to provide necessary clearance for the limited-slip differential. No modifications are required if using an original posi housing.

Modify the non-posi housing by removing a portion of the rib as shown below.









### Corvette 10 Bolt 1963-1979



 $10^{1/8}$ " x  $9^{29/32}$ " 12 Holes, Irregular

YEAR	PART #	RATIOS	SIDE GEAR SPLINE	BEARING CONE*	BEARING CUP*	DIFFERENTIAL TYPE
1963–1979	542062	2.41:1 to 3.70:1	17 Teeth	LM603049	LM603012	Pro Series
1963-1979	542063*	4.10:1 & Up	17 Teeth	LM603049	LM603012	Pro Series

\*Includes ring gear spacer.

Year

1963-1979

Make

Corvette

# **Applications:** Corvette





Use Auburn Gear limited-slip additive for maximum performance. A 6 oz. bottle is included with your Auburn Gear differential.
Part #504102.

### Gen 5 Camaro 218mm 10 Bolt



YEAR	PART #	RATIOS	SIDE GEAR SPLINE	BEARING CONE*	BEARING CUP*	DIFFERENTIAL TYPE
2010-Present	5420138	3.27:1, 3.45:1, 3.73:1, & 3.91:1	32 Teeth	TR100802A	STA5078	Pro Series

Applications:

Gen 5 Camaro V-8 218mm 10 Bolt

MakeYearCamaro SS2010–Present





Use Auburn Gear limited-slip additive for maximum performance. A 6 oz. bottle is included with your Auburn Gear differential. Part #504102.



front

11" 10 Holes, Irregular

rear

Irregular

YEAR	PART #	RATIOS	SIDE GEAR SPLINE	BEARING CONE*	BEARING CUP*	DIFFERENTIAL TYPE
1971–1988	545003°	2.73:1 & Up	28 Teeth	LM102949	LM102911	Select-A-Loc
1989–1998	545004	2.73:1 & Up	30 Teeth	LM102949	LM102911	Select-A-Loc
1999-Present	545004	2.73:1 & Up	30 Teeth	LM603049	LM603012	Select-A-Loc
1971–1988	542018	2.73:1 & Up	28 Teeth	LM501349	LM501314	High Performance
1989–1998	542022	2.73:1 & Up	30 Teeth	LM501349	LM501314	High Performance
1999-Present	542097	2.73:1 & Up	30 Teeth	LM603049	LM603012	High Performance
1971–1988	542050^	2.73:1 & Up	28 Teeth	LM102949	LM102911	Pro Series
1989–1998	542052^	2.73:1 & Up	30 Teeth	LM102949	LM102911	Pro Series
1999-Present	542052^	2.73:1 & Up	30 Teeth	LM603049	LM603012	Pro Series

Applications: All GM products with 8.5" & 8.6" ring gear.

SPECIAL NOTE: 542097 can be substituted for 542022 with a bearing change. Use LM102949, LM102911. The reverse case will not fit. 542022 cannot be substituted for the 542097.

541070 bearing kit contains: (2) LM102949 (2) LM102911. \*541070 bearing kit contains: Two (2) LM102949 and two (2) LM102911

^Large bearing hub—Bearings provided with 542050, Pro Series Unit
**Bearings provided in 542052, however if vehicle is '99 model year
or newer, bearings will not be used. Use bearings specified above.





Use Auburn Gear limited-slip additive for maximum performance. A 6 oz. bottle is included with your Auburn Gear differential. Part #504102.

Make	Year
Apollo/Regal/Century	1973-1977
Biscayne/Roadmaster	1971-1974
Blazer Front/Rear	1977-1991
Buick Full Size	1977-Present
Camaro	1977-1981
Chevelle	1970–1976
Chevy Full Size	1977–1996
Chevy II/Nova	1970–1979
Cutlass/Grand Prix/	
LeMans/GTO/Ventura/	
Phoenix	1971–1977
El Camino/Monte Carlo	1971–1977
Electra	1973–1978
G20/G25	1979-Present
Grand National	1984–1987
Grand Sport	1973–1984
GTO/Firebird/Trans Am	1970–1981
Hurst Olds	1985–1988
Impala/Roadmaster	1991–1996
K10/K15/K20/K26 Front	1977–1987
K10/K15 Rear	1982–Present
LeSabre	1973–1974
Olds F-85	1970–1976
Olds/Pontiac Full Size	1971–1989
Omega	1973–1975
Omega	1977–1979
Skylark/GS	1971–1975
Skylark/GS	1977–1979
Suburban	1079 Propert
C10/C15/G10/G15	1978–Present
Z-28	1972–1981

### GM 8.5" F&R/GM 8.6"

# Ring & Pinion Rear Style

PART #	OEM REFERENCE #	TEETH	RATIO
342030	26018279	41-11	3.73:1
342031	26037712	41-12	3.42:1
342032	3988515	39-7	4.11:1

#### Specifications:

Ring Gear Diameter 8.5" 10 <sup>7</sup>/<sub>16</sub>" X 20 RH Threaded Bolts Pinion Diameter 1.626" 30 Splines Case Ratio: 2.56:1 & Numerically Lower Case Ratio: 2.73:1 & Numerically Higher 8620 Material—Heat Treated

# **Compatible Auburn Gear Differential Part Numbers**

545003	542050
545004	542052
542018	544905
542022	544906
542097	



PART #	DESCRIPTION	MODEL YEARS
5410101	Bearing Master Kit 1970–1999 Non-IFS & Rear Car	1970–1999
5410102	Bearing Master Kit 1999–2008	1999–2008
5410103	Bearing Master Kit 2008 & Later GM 8.6	2009 & Later

#### \*Kit Contains Timken Bearings





Front: 11" 10 Holes, Irregular Rear: 10 5/8" 10 Holes, Irregular

Make Apollo/Regal Century Biscayne/Roadmaster BUICK FULL SIZE Camaro Chevelle CHEVY FULL SIZE Chevy II/Nova Cutlass/Grand Prix/ Lemans/GTO/Ventura/ Phoenix	Year 1973–1977 1971–1974 1971–1996 1970–1981 1970–1976 1971–1996 1970–1979 1971–1977
El Camino Electra GTO/Firebird/Trans Am Grand National Grand Sport Hurst Oldsmobile Impala Roadmaster Lesabre OLDSV Olds F-85 MONTE CARLO PONTIAC FULL SIZE SKYLARK/GS Z-28 Blazer Front/Rear C10/C15/G10/G15 G20/G25 GM 1/2 TON Front GM 1/2 TON with Posi Rear GM 3/4 TON Front GM 3/4 TON Front GM 3/4 TON Rear K10-K15-K20-K26 Front	1971–1977 1973–1978 1970–1981 1984–1987 1973–1984 1985–1988 1991–1996 1973–1974 1971–1992 1970–1976 1971–1983 1971–1989 1971–1979 1972–1981 1975–2002 1978–Present 1979–Present 1979–Present 1974–2011 1970–1999 1977–1999 1977–1995 1977–1987
K10-K15 Rear	1982-Present

### MASTER INSTALLATION KITS

- Ring Gear Bolts Differential Bearings Silicone Sealant Pinion Bearings Crush Collar
- Brush Pinion Shims Differential Shims Gear Marking Compound
- Pinion Seal Pinion Nut Thread Adhesive



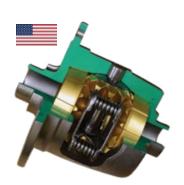
### GM 8 <sup>7</sup>/8" 12 Bolt—Car

10 7/8" 12 Holes, Oval

#### Applications:

Chevrolet passenger car with 8<sup>7</sup>/<sub>8</sub>" ring gear.

YEAR	PART #	RATIOS	SIDE GEAR SPLINE	BEARING CONE*	BEARING CUP*	DIFFERENTIAL TYPE
1964–1972	545008**	3.07:1 to 3.73:1	30 Teeth	LM603049	LM603012	Select-A-Loc
1964–1972	545010^	4.10:1 & Up	30 Teeth	LM603049	LM603012	Select-A-Loc
1964-1972	5420104^	4.10:1 & Up	30 Teeth	LM603049	LM603012	High Performance
1964–1972	5420106**	3.07:1 to 3.73:1	30 Teeth	LM603049	LM603012	High Performance
1964-1972	542031^	4.10:1 & Up	30 Teeth	LM603049	LM603012	Pro Series
1964–1972	5420117*^	4.10:1 & Up	33 Teeth	LM603049	LM603012	Pro Series
1964-1972	542033**	3.07:1 to 3.73:1	30 Teeth	LM603049	LM603012	Pro Series
1964–1972	5420118 <b>•</b> **	3.07:1 to 3.73:1	33 Teeth	LM603049	LM603012	Pro Series





Use Auburn Gear limited-slip additive for maximum performance. A 6 oz. bottle is included with your Auburn Gear differential. Part #504102.

Make	Year
Camaro	1964-1972
Chevelle	1964-1972
Chevrolet	1964-1972
Chevy II	1964-1972
El Camino	1965-1972
Firebird	1967-1972
Grand Prix	1970-1972
GTO/LeMans	1965-1972
Monte Carlo	1970-1972
Nova	1970-1972
Olds F85	1968–1970

# 8 7/8" Ring & Pinion

PART #	OEM REFERENCE #	TEETH	RATIO
342033		41-11	3.73:1

#### Specifications:

Ring Gear Diameter 8.875" 12 3/8" X 24 RH Threaded Bolts Pinion Diameter 1.625" 30 Splines Case Ratio: 2.73:1 & Numerically Higher 8620 Material-Heat Treated

### **Compatible Auburn Gear Differential Part Numbers**

545008 5420104 545010 5410106 542031 5420117 541033 5420118



10 7/8" 12 Holes, Oval

#### Make Year **Buick Centurion** 1971-1972 Buick Electra 1965-1972 Buick Estate Wagon 1971-1972 Buick GS 1970-1972 Buick GS 350/400 1968-1969 Buick GS 455 1970-1972 Buick Gran Sport 1965-1967 Buick LeSabre/Skylark 1971-1972 **Buick Special** 1965-1969 Buick Sportwagon 1964-1972 Cevrolet Bel Air 1965-1970 1967-1972 Camaro

Make	Year
Caprice	1966-1972
Chevelle	1964-1973
Chevy II	1965–1968
El Camino	1965–1972
Impala	1965–1972
Malibu	1965–1967
Monte Carlo	1970–1972
Nova	1969–1972
Ford Royal	1970–1972
GMC Sprint	1971–1972
Oldsmobile 442	1971
Olds 98	1965–1972
Cutlass/Cutlass Supreme	1971–1972
Delmont 88	1967–1968
Olds Delta 88 & F85	1965–1972
Jetstar 88	1965–1967
Vista Cruiser	1967–1972
Pontiac Acadian	1968–1971
Bonneville/Catalina	1965–1972
Firebird	1967–1972
GTO	1965–1972
Grand Prix	1970–1972
Grand Safari	1971–1972
Pontiac Grandville	1971–1972
LeMans	1965–1971
Star Chief	1955–1956
Pontiac Tempest	1970

### GM 8 7/8" 12 Bolt-Truck



Applications: Chevrolet truck with 8 7/8" ring gear.

YEAR	PART #	RATIOS	SIDE GEAR SPLINE	BEARING CONE*	BEARING CUP*	DIFFERENTIAL TYPE
1964-mid 1982	545009**	2.76:1 to 3.42:1	30 Teeth	LM603049	LM603012	Select-A-Loc
1964-mid 1982	545011^	3.73:1 & Up	30 Teeth	LM603049	LM603012	Select-A-Loc
1964-mid 1982	5420105^	3.73:1 & Up	30 Teeth	LM603049	LM603012	High Performance
1964-mid 1982	5420107**	2.76:1 to 3.42:1	30 Teeth	LM603049	LM603012	High Performance
1964-mid 1982	542032^	3.73:1 & Up	30 Teeth	LM603049	LM603012	Pro Series
1964-mid 1982	542034**	2.76:1 to 3.42:1	30 Teeth	LM603049	LM603012	Pro Series

 $^{\wedge}$  "C" axle–4 Series Case

\*\* "C" axle-3 Series Case





Use Auburn Gear limited-slip additive for maximum performance. A 6 oz. bottle is included with your Auburn Gear differential. Part #504102.

Make	Year
1/2 Ton Truck	1964-1982
3/4 Ton Truck	1964-1982
C10, C15	1964-1982
G10, G15	1969-1981
G20, G25	1969-1981
K10, K15	1964–1982

### GM 9 1/2" 14 Bolt



SIDE GEAR BEARING **BEARING** DIFFERENTIAL **YEAR** PART # **RATIOS SPLINE** CONE\* CUP\* TYPE 1981-Present 542087 **All Ratios** 33 Teeth Set 42 Set 42 High Performance

12 <sup>1</sup>/<sub>8</sub>" x 13 <sup>5</sup>/<sub>16</sub>" 14 Holes, Irregular

**Applications:** All GM products with 9 1/2" ring gear

SPECIAL NOTE: Model years 2014-2016 are 12 bolt. Model years 1981-2013 are 14 bolt. GM 9 1/2" posi will fit present year vehicles.





Use Auburn Gear limited-slip additive for maximum performance. A 6 oz. bottle is included with your Auburn Gear differential.
Part #504102.

Make	Year
C10, C15	1981-Present
C10, C15, C20	1988-Present
C30, C35	1983-Present
G10, G15	1981-Present
G20, G25	1988-Present
K10, K15	1989-Present

### **Toyota Land Cruiser 12 Bolt**



YEAR	PART #	RATIOS	SIDE GEAR SPLINE	BEARING CONE*	BEARING CUP*	DIFFERENTIAL TYPE
1968–1989	542030	All Ratios	30 Teeth	NTN17887	17831	Pro Series

\*or Timken Set KC11445Y (Contains one cup and one cone).

Applications: Land Cruiser

\*Also applicable: LM603049 & LM603014, however, these bearings have about .0005" more press fit than stock bearings.





Use Auburn Gear limited-slip additive for maximum performance. A 6 oz. bottle is included with your Auburn Gear differential.
Part #504102.

MakeYearLand Cruiser1968–1989

**SPECIAL NOTE:** 1967 & prior must update to 30 tooth axle shafts.

# Toyota 8.0" 10 Bolt



YEAR	PART #	RATIOS	SIDE GEAR SPLINE	BEARING CONE*	BEARING CUP*	DIFFERENTIAL TYPE
1974-Present	542031^	All Ratios	30 Teeth	LM104948	LM104912	Pro Series

^4-pinion design

**Applications:** Toyota 8.0" 10 Bolt, Housing Cover and 10 Bolt Ring Gear.





Use Auburn Gear limited-slip additive for maximum performance. A 6 oz. bottle is included with your Auburn Gear differential.
Part #504102.

Make	Year
FJ Cruiser	2005-Present
Land Cruiser	1998-Present
Land Cruiser II	1990-2007
Pickup	1986-1996
T-100	2004-Present
Tacoma	2004-Present
Tundra	2005-2007

### Toyota 8.4" 10 Bolt



YEAR	PART #	RATIOS	SIDE GEAR SPLINE	BEARING CONE*	BEARING CUP*	DIFFERENTIAL TYPE
1990-Present	5420132^	All Ratios	30 Teeth	ST5186-N Set	ST5186-N Set	Pro Series

^4-pinion design

Applications: Toyota 8.4" 10 Bolt, Housing Cover and 12 Bolt Ring Gear.

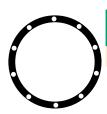




Use Auburn Gear limited-slip additive for maximum performance. A 6 oz. bottle is included with your Auburn Gear differential. Part #504102.

Make	Year
Lexus GX	1995-Present
Pickup	1986-1996
T-100	1995-2005
Tacoma	1995-2005
Tundra	1995–2005

# Toyota 9.5" 12 Bolt



YEAR	PART #	RATIOS	SIDE GEAR SPLINE	BEARING CONE*	BEARING CUP*	DIFFERENTIAL TYPE
2007-Present	545038*	All Ratios	32 Teeth			Select-A-Loc
2007-Present	5420133	All Ratios	32 Teeth	570064-1	32010J^	High Performance

Applications: Tundras with 4.7 liter V-8, T100 & 200 Land Cruisers 1998-present

and Lexus LX470.

Make	Year
200 Land Cruiser	1998-Present
Lexus LX470	2007-Present
T-100	1998-Present
Tundra	2007-Present

\*Open-to-Lock

^Koyo





Use Auburn Gear limited-slip additive for maximum performance. A 6 oz. bottle is included with your Auburn Gear differential. Part #504102.

#### Part # 545038:

The Auburn Gear Select-A-Loc Toyota 9.5" 12 Bolt has larger diameter cross pin shafts to better distribute the torque load at the differential case and larger locking teeth with nearly 2X the capacity (compared to competitor's differentials for the same application).

### Toyota 10.5" 12 Bolt



YEAR	PART #	RATIOS	SIDE GEAR SPLINE	BEARING CONE*	BEARING CUP*	DIFFERENTIAL TYPE
2007-Present	5420134	All Ratios	36 Teeth	HR32011Xja4	R55-34NSK	High Performance

Applications: Tundras with 5.7 liter V-8

Make	Year
Tundra	2007-Present





Use Auburn Gear limited-slip additive for maximum performance. A 6 oz. bottle is included with your Auburn Gear differential. Part #504102.

### Titan 10 Bolt



	YEAR	PART #	RATIOS	SIDE GEAR SPLINE	BEARING CONE*	BEARING CUP*	DIFFERENTIAL TYPE
200	04–2007	5420137	All Ratios	32 Teeth	JLM704649	JLF704610	Pro Series

Make

Titan

Frontier

Equator

Year

2004-2015

2005-2016

2009-2012

10.3" x 9.38" 12 Holes, Irregular

#### SPECIAL NOTE:

Replacement for factory open differential only. If replacing factory locker, new axle shafts are required.

Part #5420137 only works with axle shafts from an open differential.



Use Auburn Gear limited-slip additive for maximum performance. A 6 oz. bottle is included with your Auburn Gear differential. Part #504102.

ZISSAZ

### **Autocross Road Race Units**

Auburn Gear, LLC has developed a performance limited-slip differential designed specifically for road racing. It features a differential case designed to allow the center pin to float along with the axle shafts. This design aids in cornering; when turning, the outside wheel axle shaft will apply a force to the center pin causing the pinion gears to firmly seat inside the cone/side gear assembly. This gives the racer an extremely "tight" rear axle. The greater the G-force the more bite you get! If you are an avid road racer you'll want this unit.





YEAR	PART #	RATIOS	SIDE GEAR SPLINE	BEARING CONE*	BEARING CUP*	DIFFERENTIAL TYPE
1979-Present (Ford)	542039	All Ratios	28 Teeth	LM603049	LM603012	Race Series
1988-Present (GM)	542088	3.23:1 & Up	28 Teeth	LM501349	LM501314	Race Series

#### Applications:

Part #542039: All Ford products with 8.8" ring gear. Accepts tone ring for ABS applications.

Part #542088: All GM products with 7  $\frac{1}{2}$  % 7  $\frac{5}{8}$  ring gear. Accepts tone ring for ABS applications.





Use Auburn Gear limited-slip additive for maximum performance. A 6 oz. bottle is included with your Auburn Gear differential. Part #504102.

# **Differential Service Kits**

APPLICATION	AG DIFF. PART NUMBER	SPRING RETAINER SERVICE KIT	PINION GEAR SERVICE KIT	PINION SHAFT SERVICE KIT
GM 7.5" & 7 <sup>5</sup> /8"	542040, 41, 57, 58 542044, 45, 46, 47	541016 541017	541011 541011	541005 541005
GM 8.5" & 8.6"	542018, 22, 29, 97 542050, 52	541018 541019	541012 541012	541007 541007
GM 8.2"	542061, 108	541035	541036	541037
1963–79 Corvette	542062, 63	541035	541036	541037
GM 8 <sup>7</sup> /8" 12 Bolt, Car & Truck	542031, 32, 33, 34 5420104, 105, 106, 107	541022	541014	541024
GM 9.5"	542087	541043	541044	541042
Ford 7.5"* (C Washer Kit Available - 542035)	542023 542048	541016 541017	541011 541011	541006 541006
Ford 8.8", 28 Tooth	542024, 79 542053, 80	541018 541019	541012 541012	541007 541007
Ford 8.8", 31 Tooth	542025 542054	541020 541021	541013 541013	541008 541008
Ford 8" & 9"	542036, 43, 59	541023	541015	541010
Ford 9.75"	542090	541043	541044	541042
Ford 10 <sup>1</sup> / <sub>4</sub> "	542089	541045	541046	541047
Chrysler 91/4"	542070, 71	541038	541039	541040
Chrysler 81/4"	542072, 74	541041	541012	541007
Chrysler 83/4"	542051	541022	541014	541024
AMC Model 20	542081	541019	541012	541007
Toyota Landcruiser	542030	541022	541014	541024
Toyota 8.0" & 8.4"	5420131, 32	541079	541080	541081
Toyota 9.5"	5420133	541038	541039	54108
Toyota 10.5"	5420134	541045	541046	541083
Auburn (Dana) Model 44	542082, 83, 109,110 542060, 542099,	541019	541012	541007
Buick/Olds/Pontiac 8.2"	113, 114	541035	541036	541048
Chevy 8.4"	5420100	541041	541012	541049

#### NOTE:

For information regarding MAX Lock Locker Spring Service Kits, please contact Auburn Gear.



Pinion Gear Service Kit



Spring Retainer Service Kit



**Pinion Shaft Service Kit** 

NOTE: Also Available Additive 504102 Single = (1) 6 oz. Bottle Case = (24) 6 oz. Bottles—541084



Select-A-Loc Master Kit

**NOTE:** Select-A-Loc<sup>™</sup> Master Kit is only used for Select-A-Loc<sup>™</sup> Part Numbers 545001-545021.

### Select-A-Loc<sup>TM</sup> Service Kits

SELECT-A-LOC APPLICATION	SELECT-A-LOC PART NUMBER	WIRE HARNESS & SWITCH KIT	(8) COIL ASSEMBLY	(9) COIL BEARING	(7) СШТСН КІТ	(5) PINION SHAFT KIT	(1 THRU 7) MASTER KIT	AXLE SHAFT SPACER	DIFFERENTIAL BEARING KIT
Ford 8.8" with 28 Spline Axles Ford 8.8" with	545001	541051	541052	541053	541054	541055	541057	N/A	N/A
31 Spline Axles (C-clip only)	545002	541051	541052	541053	541054	541056	541059	N/A	N/A
GM 8.5" with 28 Spline Axles	545003	541051	541052	541053	541054	541055	541057	N/A	541070
GM 8.5" with 30 Spline Axles Ford 8.8" with 31	545004	541051	541052	541053	541054	541055	541058	N/A	(thru 1998) 541070
Spline Axles (IRS only)	545005	541051	541052	541053	541054	541056	541060	N/A	N/A
AMC 20	545006 & 07	541051	541052	541053	541054	541055	541061	N/A	N/A
Chevrolet 12 Bolt, Car & Truck, 30 Spline Axles	545008, 09, 10, 11	541051	541052	541053	541054	541055	541062	N/A	N/A
Auburn (Dana) 35, 27 Spline Axles	545012 & 13	541051	541063	541053	541064	541065	541066	N/A	541070
Auburn (Dana) 35, 30 Spline Axles	545014 & 15	541051	541063	541053	541064	541065	541067	N/A	541070
Auburn (Dana) 30, 27 Spline Axles	545016 & 17	541051	541063	541053	541069	541065	541068	N/A	N/A
Auburn (Dana) 44, 30 Spline Axles	545018 & 19	541051	541063	541053	541072	541071	541073	N/A	541075
Auburn (Dana) 50, 30 Spline Axles	545020	541051	541063	541053	541072	541071	541077	N/A	N/A

Note: 541070 Contains: (2)LM102949, (2)LM102911.

### Limited-Slip Additive & Gear Oil

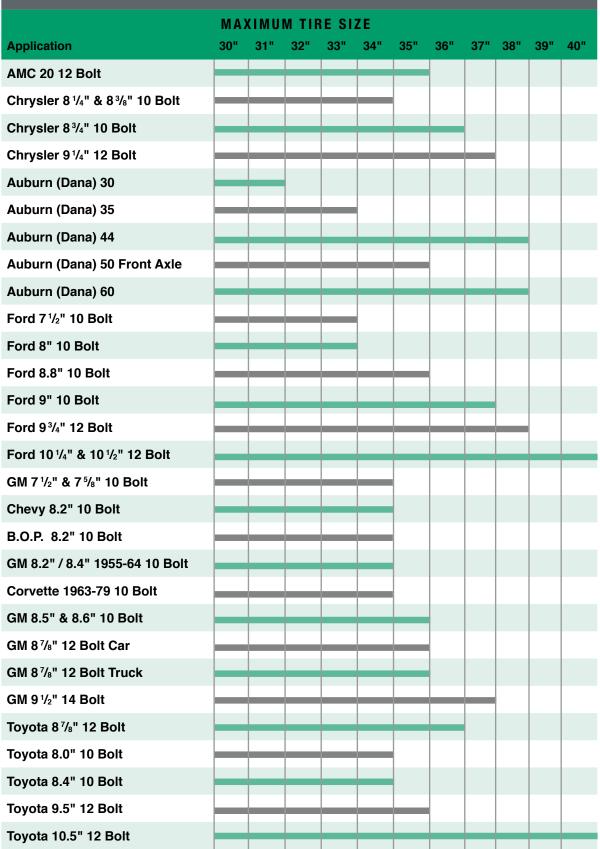


Use Auburn Gear limited-slip additive for maximum performance. A 6 oz. bottle is included with your Auburn Gear differential. Part #504102.

The Auburn Gear limited-slip differential and Select-A-Loc<sup>™</sup> Electronic Locking Differential designs have been extensively tested with high-quality Non-Synthetic 80W 90 hypoid oils treated with limited-slip friction additive. Three (3) oz. of Auburn Gear additive (part #504102) will treat one (1) quart of oil. *To avoid differential clutch chatter (noise) and for optimum performance, use the oil and additive described above.* Use of other additive and oil types may cause differential clutch chatter. We do not recommend synthetic oil. Auburn Gear limited-slip additive (a 6 oz. bottle) is packed in every box with the differential. Auburn Gear limited-slip additive is available at your local authorized Auburn Gear distributor.

Auburn Gear "The Gold Standard" High Performance 80W-90 GL-5 Multi-Purpose Gear Lubricant. Part # 504107.

# LISTED ARE THE MAXIMUM TIRE SIZES FOR THE AUBURN GEAR TRACTION DIFFERENTIAL APPLICATIONS



# CHOOSING THE OPTIMAL GEAR RATIO FOR YOUR VEHICLE

Improve Fuel Economy

This chart shows RPM (rotations per minute) calculations at 55 miles per hour for various combinations of final gear ratios.

Optimum Range (2,300-2,600 RPM) When selecting a gear ratio, consider the following:

1. Tire Size

Improve Power

2. Transmission Ratio

3. Final Gear Ratio

4. Engine RPM at cruise speed

0
F
<b>A</b>
4
Ш
M

50

	TIRE DIAMETER																
GEAR RATIO	24	25	26	27	28	29	30	31	32	33	34	35	36	38	40	42	44
2.56	1972	1892	1820	1752	1690	1631	1577	1526	1478	1434	1391	1352	1314	1245	1183	1126	1075
2.73	2102	2018	1940	1869	1802	1740	1682	1627	1577	1529	1484	1441	1401	1328	1261	1201	1147
2.94	2264	2173	2090	2012	1942	1874	1811	1753	1698	1646	1599	1552	1509	1429	1358	1294	1235
3.08	2372	2277	2189	2108	2033	1963	1897	1836	1779	1725	1674	1626	1581	1498	1423	1355	1294
3.21	2472	2373	2282	2197	2119	2046	1977	1914	1854	1798	1745	1695	1648	1561	1483	1412	1348
3.31	2549	2447	2353	2266	2185	2110	2039	1973	1912	1854	1799	1748	1699	1610	1529	1456	1390
3.42	2633	2528	2303	2341	2257	2179	2107	2039	1975	1915	1859	1806	1756	1663	1580	1505	1436
3.54	2726	2617	2516	2423	2336	2256	2181	2110	2044	1982	1924	1869	1817	1772	1635	1558	1487
3.73	2872	2757	2651	2553	2462	2377	2298	2224	2154	2089	2027	1969	1915	1814	1723	1641	1567
3.90	3003	2883	2772	2669	2574	2485	2402	2325	2252	2184	2120	2059	2002	1897	1802	1716	1638
4.10	3157	3031	2914	2806	2706	2613	2526	2444	2368	2296	2228	2165	2105	1994	1894	1804	1722
4.27	3288	3156	3035	2923	2818	2721	2630	2545	2466	2391	2321	2255	2192	2077	1973	1879	1793
4.56	3511	3371	3291	3121	3010	2906	2809	2718	2633	2554	2478	2408	2341	2218	2107	2006	1915
4.88	3758	3607	3469	3340	3221	3110	3006	2909	2818	2733	2652	2577	2505	2373	2255	2147	2050
5.29	4073	3910	3760	3621	3491	3371	3259	3154	3055	2962	2875	2793	2716	2573	2444	2328	2222
5.38	4143	3977	3824	3682	3551	3428	3314	3207	3107	3013	2924	2841	2762	2616	2486	2367	2260
5.71	4397	4221	4058	3908	3769	3639	3517	3404	3298	3198	3104	3015	2931	2777	2638	2512	2398
6.17	4751	4561	4385	4223	4072	3932	3801	3678	3563	3455	3354	3258	3167	3001	2851	2715	2591
7.17	5521	5300	5096	4907	4732	4569	4417	4274	4141	4015	3897	3786	3681	3487	3313	3155	3011

### **RING & PINION NEW GEAR BREAK-IN AND SET UP SPECIFICATIONS**

- Avoid heavy accelerating during the break-in processKeep the vehicle under 60MPH for the first 100 miles
- Drive 15 to 20 miles, stop, and let the differential cool before proceeding
  - 500 miles of break-in before towing
- First towing should be less than 15 miles, then let cool before proceeding
  - Fluid should be changed after the 500-mile break-in period

MODEL	SUGGESTED STARTING PINON DEPTH (IN)	PINION BEARING PRE-LOAD (INCH/LBS)	BACKL 5 CUT	ASH RANGE 2 CUT
		GM		
55P/55t	0.026	14-18	.006010	
7.5"-7.6"	0.035	12-15	.006010	
7.75"	0,025	12-15	.006010	
8.2"	0.03	12-15	.006010	
8.25" IFS	0.037	14-19	.006010	
8.5"-8.6"	0.037	14-19	.006010	.004007
9.5"	0.03	15-22	.006010	
10.5"	0.055	15-25	.006010	
11.5"	0.055	20-30	.006010	
12P	0.03	14-19	.006010	
	C	hrysler		
8.25"	0.03	12-15	.006010	
8.75"	0.03	14-19	.006010	
9.25"	0.032	14-19	.006010	
		AMC		
20	0.095	14-19	.006010	
	;	Suzuki		
Samurai	0.055	12-15	.006010	
		Dana		
D35	0.045	12-15	.006010	
D30	0.065	12-15	.006-0.10	
D30JK	0.065	12-15	.006-0.10	
D44	0.042	14-19	.006010	
D44JK	0.042	22-35	.006010	
D60	0.052	17-30	.006010	
D70	0.061	22-35	.006010	
D80	0.06	25-40	.004010	
		Ford		
8.8"	0.026	14-19	.006010	
9"	0.022	13-15	.006010	
9.75"	0.027	15-19	.006010	
10.25"/10.5"	0.025	20-35	.006010	
		Toyota		
7.5" F/R	0.095	12-15	.006010	
8" F/R	0.074	12-15	.006010	
8" IFS	0.07	9-14	.004008	
9.5" TLC	0.02	8-11	.006010	
		Nissan		
H233B	0.0984	15-23	.00608	

#### **GENERAL QUESTIONS**

#### What are the differences between the High Performance LSD, the Pro LSD, and Select-A-Loc™?

The Select-A-Loc is a limited-slip and a locker in one differential. The driver controls the mode with a switch inside the vehicle. The Select-A-Loc can be switched to lock mode, which allows 100% torque transfer to both wheels. The High Performance and Pro are limited-slip units. Any limited-slip differential can allow the low traction wheel to spin since the amount of torque that can be transferred to the opposite wheel is limited (hence the name limited-slip).

#### What is the difference between the Auburn Gear Pro Series and the Auburn Gear High Performance Series?

The High Performance Series is another option in the Auburn Gear traction enhancement products. The cone clutch design offers increased durability and performance in normal street use. The high bias cone clutch design of the Pro Series provides a higher torque and preload, making it the ultimate limited-slip differential for true performance. It is engineered to provide lightning-quick, torque-sensing traction when you need it. No buttons to push, no leavers to pull, it goes into action when you accelerate. It handles superbly—on and off road.

#### Is the Select-A-Loc™ and/or limited-slip only for Jeeps/trucks/SUVs, or can it be installed in a car?

Auburn Gear differentials are suitable for virtually all vehicle applications where additional traction is needed—for recreational, sport or work use. For example, installing an Auburn Gear differential in your performance car will give you spool-like performance when coming off the line, combined with full wheel differentiation when turning. Imagine two wheels gripping the pavement instead of one spinning effortlessly.

#### What differential should be used for Drag Racing?

For true street-strip performance, the Select-A-Loc™ is the best application. The Select-A-Loc™ is really two differentials in one. It is a full-time limited-slip differential, then with the flip of a switch, it converts to a full-locker. The best of both worlds and winning at the track. In the limited-slip product line, for both street and strip, the Pro Series is the choice; however, the High Performance limited-slip is effective in street and strip applications. For strictly drag racing (no street driving), a spool would be the choice.

### How much horsepower and torque will the High Performance LSD take? Is there a horsepower limitation? What is it?

Each size has it's own limitations, but it is more related to torque than to horsepower. Additionally, the transmission type, driving habits (snap starts) and tires (traction) play a role.

#### How can I determine if a traction device such as a positraction or locker is installed in my vehicle?

Put the transmission in neutral and jack up both tires. Rotate one tire. If the other tire spins in the opposite direction, you have an open differential. If it spins the same direction, you do have a traction device.

#### If only installing one traction differential, should I install in the front or rear?

A rear locker can greatly increase the mobility of the vehicle. In many scenarios, a 4 X 2 with a rear locker can outperform a 4 X 4 without a locker. For severe traction applications and extreme off-road, the Select-A-Loc electronic locker with limited-slip differential is an excellent choice.

#### What is clutch chatter?

Clutch chatter occurs when the clutch cone engages and disengages rapidly in the differential case. It causes no damage and can be cured by using the correct oil and friction modifies. Clutch chatter is caused by the difference between the static (non-slipping) friction coefficient and the dynamic (slipping) friction coefficient. When the difference becomes too great, the clutch cone cycles between the two (sticking and slipping), which creates the noise. Friction modifiers bring the static and dynamic friction coefficients closer together to minimize chatter. Auburn Gear recommends using Auburn Gear limited-slip additive (#504102) with a high-quality non-synthetic 80W 90 hypoid oil.

#### What is a cone clutch?

The Auburn Gear limited-slip differential employs an integral cone clutch side gear unit that creates friction with the carrier to drive both tires. The cone clutch design consists of two clutching members, one internal and one external (see image on page 9). The internal member is a unique single tapered part with lubrication grooves, attached to the side gear, creating the cone clutch assembly. The external member is also tapered with a matching angle. When the two are forced together, torque is transferred from one member to another. The cone clutch design allows for more clutch capacity in the same space and is less likely to chatter due to the reduced number of sliding surfaces. This means higher torque transfer for better traction, without the noise.

#### Can I use the stock bearings?

Yes. Exceptions are Ford 8", Ford 9" (some housings) and Dana 35. GM 8.5/8.6 may require special bearings when installing an Select-A-Loc in a pre-1999 vehicle. Bearings that should be used with the Auburn Gear Ford 8" and 9" differentials are determined by the bearing bore size. Small bearing bore 2.8 use bearings LM102949 & LM102910. Bore 3.062 use bearings LM603049 & LM603011. Bore 3.25 use spool only. Refer to the application pages for bearing part numbers.

#### Does Auburn Gear have a limited-slip additive?

Yes. Auburn Gear limited-slip additive, part #504102. Use for both Select-A-Loc and limited-slip differentials. It is available at your authorized Auburn Gear distributor.

#### **EFFECTS OF AUBURN DIFFERENTIALS**

#### Will the driving characteristics of my vehicle change?

For rear axle applications, any change will be minimal and usually unnoticeable. The operation of limited-slip differentials will be quiet, smooth and seamless. With front axle installations, there may be a slight addition to steering effort.

#### Are the Select-A-Loc<sup>™</sup> and limited-slip differentials noisy?

No. Operation is quiet and seamless with properly maintained lubricant and limited-slip additive. There is no clicking or banging.

#### How do Auburn Gear differentials handle on slippery roads?

Any traction can affect handling on slippery roads. If the traction is overpowered by the driver, both wheels have lost traction instead of just one, which could cause a loss of side-to-side stability.

#### Can I tow my vehicle if it has an Select-A-Loc™ and/or limited-slip?

Yes. If the unit is installed in the front, it is recommended to unlock the front wheel hubs and/or place the transfer case in 2-wheel drive.

#### What affect will Auburn Gear differentials have on my towing capability?

The Select-A-Loc and the limited-slip differentials will not negatively affect trailer towing. In fact, you will find major improvement in traction. It will be beneficial when pulling the boat up the ramp, towing a camper on unpaved roads or anytime where increased traction is important.

#### Does the Auburn Gear limited-slip differential affect gas mileage?

This would be negligible typically. However, an Auburn Gear limited-slip usually weighs more than an OE differential and since the clutches slip during turns, some energy loss does occur.

#### **TIRES**

#### Will tire pressure affect the operation of the differential?

Mismatched pressures mean different tire diameters and different wheel speeds. Keep the tire-rolling radius (with air pressure) within 1/4" for on-road vehicles and 1/2" for off-road vehicles.

#### What size tire (diameter) can I use with Auburn Gear differentials?

Refer to the recommended tire size on page 49 of the catalog.

#### Is tire wear affected by limited-slip differentials?

No. Auburn Gear differentials provide full wheel differentiation when turning so tire wear is minimized.

#### Will I get tire hop or chirp with the Select-A-Loc™ or limited-slip differential?

It depends on the vehicle set-up and the tires. Typically, both the High Performance Series and Pro Series will accommodate turns on clean, dry pavement without wheel hop or tire chirp. In the "off" or limited-slip mode, the Select-A-Loc will accommodate turns on clean, dry pavement without wheel hop or tire chirp. In the full-locker mode (which should be used for severe off-road or drag strip performance) you may experience some wheel hop.

#### MAINTENANCE AND WARRANTY

#### What maintenance is required after the installation of an Select-A-Loc™ and/or limited-slip?

We recommend you change the differential oil according to your vehicle manufacturer's specifications and treat with Auburn Gear limited-slip additive (part number #504102).

# What kind of oil should be used with an Auburn Gear limited-slip differential/Auburn Gear Select-A-Loc™ differential?

Non-synthetic 80w90 GL-5 oil treated with Auburn Gear friction additive, part #504102 (also known as a friction modifier). See Catalog page 48. Three (3) ounces of additive will treat one quart of oil. GM or Ford limited-slip additive may be used. We do not recommend synthetic oil. Auburn Gear limited-slip additive is packed in every box with the differential.

#### Is there a way to tell if I have weak springs in my limited-slip?

Auburn Gear limited-slip springs will not weaken. The springs are not subject to cyclic compression/expansion, which can cause load loss. However, the clutch capacity can be reduced due to wear or damage from misuse.

#### What is the life expectancy of Auburn Gear differentials?

As with all performance products, the application and driver skills dictate the life of the product. Long life can be expected with all Auburn Gear products when operated properly. Forcing one wheel to spin with respect to the other will greatly degrade the life of the differential.



#### INSTALLATION

#### Can I install an Auburn Gear differential myself?

Auburn Gear provides detailed differential installation instructions to allow an experienced mechanic to properly install the product. Visit aftermarket.auburngear.com for copies.

#### What kind of break-in is required?

All Auburn Gear differentials go through a break-in cycle at the factory, so no customer break-in procedure is required.

#### Should I install traction differentials in front and rear?

It's a matter of personal preference, money and traction requirements. A single traction differential will usually double the vehicles off-road ability. Installation of traction differentials in front and rear increases traction to the maximum. Always consider safety and your driving conditions when making your decision.

#### Can I install Auburn Gear Select-A-Loc™ and/or limited-slip differential in a 2-WD vehicle?

Yes. Traction improvement in a 2-WD vehicle provides the same traction improvement to the rear axle as installation in a 4-WD vehicle.

#### Can I install an Select-A-Loc™ and/or limited-slip differential in the front and rear of a 4-WD?

Yes, if the application is available. However, we do not recommend installing a unit in the front differential if the vehicle has a full-time 4-WD and is primarily used on the pavement.

#### SELECT-A-LOC™

#### Can I repair the Select-A-Loc<sup>™</sup> if I need to?

Yes. Depending upon your needs, several types of service kits are available. The gear service kit, locking mechanism kit, starter/amateur kit and the universal wiring kit.

#### Can I tow my Select-A-Loc™?

It is NOT recommended that an Select-A-Loc<sup>™</sup> be towed behind any vehicle unless the vehicle has hub lockouts or a trailer dolly or flatbed trailer is used. A trailer dolly is especially necessary if an Select-A-Loc has been installed in the front axle housing.

#### Can the Select-A-Loc<sup>™</sup> be used in the front axles?

Select-A-Loc<sup>TM</sup> should not be used in front axles that have an inter-axle disconnect. On manual hub applications, both hubs are to be locked or unlocked. Do not lock one side and not the other. Differential damage can occur.

#### Can the Select-A-Loc<sup>™</sup> be engaged on-the-fly?

Yes, at reasonable speeds. The wheel speed difference between the wheels should be below 50 RPM to prevent impact loads to the drivetrain. It is recommended that the Select-A-Loc™ not be engaged if one wheel is completely off the ground or pavement.

#### How is the Select-A-Loc<sup>™</sup> activated?

The Select-A-Loc<sup>™</sup> is activated by turning on the mounted switch inside the vehicle. When off, the limited-slip function responds automatically when torque is applied.

#### Is a relay necessary for Select-A-Loc™ operation?

The Select-A-Loc™ switch is more than capable of managing the current that the Select-A-Loc™ requires. No need for a relay.

#### Can I purchase the wiring harness for the Select-A-Loc<sup>™</sup>?

Yes, the wiring harness is universal to fit any vehicle, and can be purchased separately. Refer to catalog page 48 for Select-A-Loc™ service kits or visit aftermarket.auburngear.com.

#### Is the Select-A-Loc™ and/or limited-slip streetable?

All Auburn Gear differentials are very streetable. Both the Select-A-Loc<sup>™</sup> and the limited-slip provide smooth, quiet operation. In fact, Auburn Gear differentials were used as original equipment in the first muscle cars. Plus, they are aggressive enough to be used in other performance applications. When the Select-A-Loc<sup>™</sup> is in full-locker mode, you may experience some under or push steering.

### AUBURN GEAR, LLC PERFORMANCE DIFFERENTIAL LIMITED WARRANTY AND REMEDY

#### LIMITED WARRANTY

Auburn Gear, LLC ("Manufacturer") warrants that this product is free from defects in materials and workmanship for a period of one (1) year after purchase by the consumer, or 12,000 miles of normal use by the consumer, whichever is less; provided that this product:

- has been installed and maintained in accordance with the Manufacturer's instructions; and
- has been used in regular automotive driving and not in any off-road application; and
- has been used with the proper lubricant and additive, as specified in the installation instructions at all times; and
- has not been subject to modification, accident, or misuse.

This limited warranty is the sole express warranty provided by manufacturer to the ultimate user of the product. The manufacturer disclaims all other express warranties, and all implied warranties, including the implied warranties of merchantability and fitness for a particular purpose.

#### **EXCLUSIVE REMEDY**

In the event of a breach of this warranty, you shall return the product to the seller within thirty (30) days after the expiration of the limited warranty period, along with your proof of purchase and explanation of the defect\*. Seller or Manufacturer may investigate the claim of defect, and in the event of a defect in the product shall, at their election, either repair the defective product or replace the defective product. These remedies are your sole and exclusive remedies in the event of a breach of warranty.

\*Contact customer service BEFORE returning product for more information and a Return Goods Authorization number.

#### **LIMITATION OF LIABILITY FOR DAMAGES**

In no event shall Manufacturer be liable for consequential, special, indirect, or exemplary damages, whether based upon tort, contract, warranty, negligence, strict liability or other legal theory. Manufacturer's liability shall be limited to direct damages.

# EXCEPTIONS TO LIMITED WARRANTY AND REMEDY

The limited warranty and remedy gives you specific legal rights. You may have other statutory rights in states that do not allow the limitation on or exclusion of certain warranties or remedies.



400 East Auburn Drive Auburn, IN (USA) 46706-3499

260.925.3200 aftermarket.auburngear.com

# ENHANCED PERFORMANCE. QUALITY. RELIABILITY.











ISO 9001:2015 Certified Certification by SAI Global Certification Services. Every effort has been made to ensure accuracy of the contents of this catalog. However, we assume no responsibility for errors or omissions.