Chassisvorks

Custom-Fit Frames & Suspensions

g-Machine

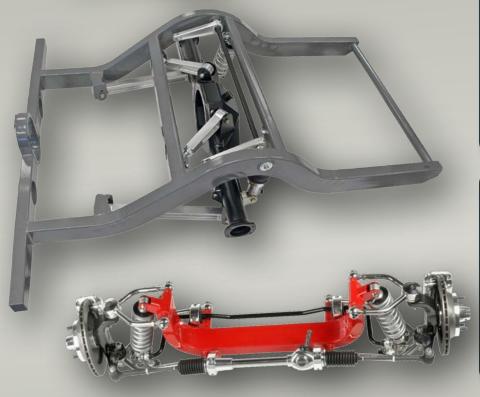
Pro Touring

Restomod

Pro Street

Street/Strip

Versatile, Custom-Fit Frame Solution for Nearly Any Application!





- 11-3/4" thru 14" e-Coated Rotors
- Rear Discs with Parking Brakes
- Brake System Accessories



SHOCKS





BRAKES

New Large Rotor Brake Kits

Coil-Over or Air-Suspension

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Custom-Fit, 4 x 2" Frame Systems

The custom-fit frame design system is an extremely versatile engineering and construction approach, which enables Chassisworks to expertly prepare a sub-assembled kit or complete factory-welded frame, built precisely to your project requirements. Front hub-to-hub width, ground clearance, wheelbase, and rear frame width can each be varied independently to create a correct fitting frame and vehicle stance for projects including g-machine and pro-touring muscle cars, custom street trucks, pro-street classics, and more.

The heart of the custom-fit frame system is Chassisworks

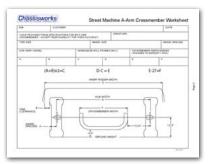
g-Machine front crossmember, featuring rack and pinion steering, and double A-arm suspension with anti-roll bar. The crossmember and frame rails are made from 4x2x.120"-wall box tube, mandrel-bent on a computer-controlled tube bender for precision fit and wrinkle-free bends. One of four rear suspension configurations can be selected, each with its own list of options. Chassisworks flexible manufacturing approach enables frames to be built for the broadest performance range of any manufacturer.

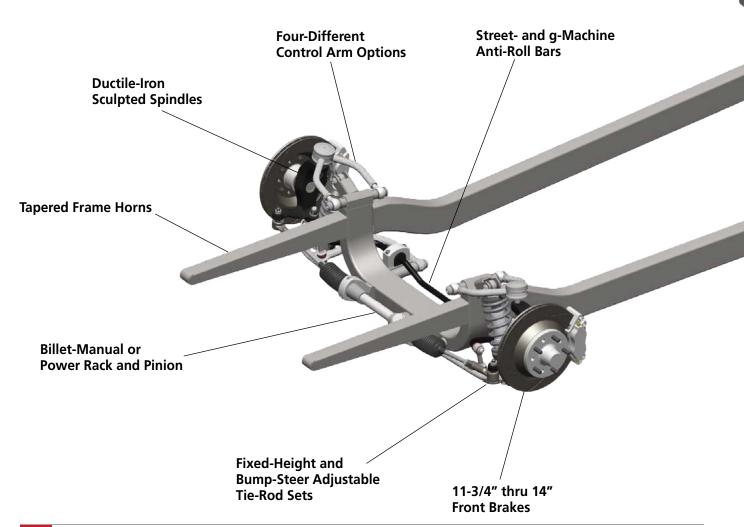
Front Hub Width

Our exclusive crossmember design is available in fifteen different widths, allowing the front hub-to-hub width to vary between 51" and 65" in one inch increments. The crossmember, rack and pinion, and anti-roll bar are built specific to the each hub width to maintain correct suspension and steering geometry.

Using measurements taken from the vehicle and actual tire and wheel combination, the correct hub-to-hub and crossmember width can be determined. Dimensions are simply filled in on the crossmember worksheet and submitted along with your order. Worksheets available at

CAChassisworks.com/cac worksheets.html





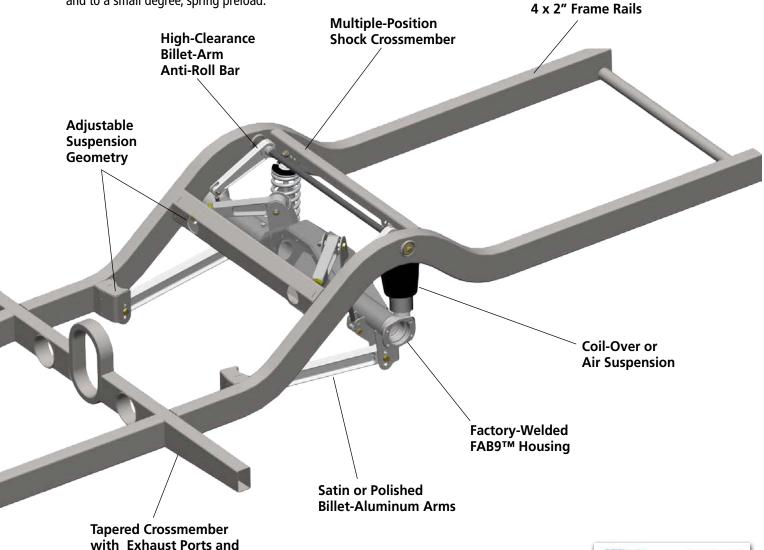
Custom-Fit, 4 x 2" Frame Systems

Ground Clearance

Frames are available in two different ground clearance heights of 4-1/2" and 6" measured at the lowest point of the frame rail. This dimension is based on a 25" rolling radius tire. Further adjustments to ride height can be made using different tire and wheel combinations, optional extended-eye shocks, and to a small degree, spring preload.

Wheelbase Length

Factory-welded frame wheelbases are made in one-inch increments and can accommodate nearly any type of vehicle. When shipped as an unassembled kit the front frame rails are left intentionally long and are trimmed to the desired length by the builder.

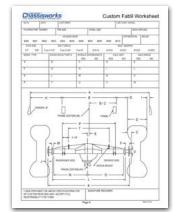


Rear Frame Width

The rear frame width is based on tire size and clearance between the fender and frame rail. This information also determines the proper width of the rearend housing and placement of the suspension brackets.

Driveshaft Oval (optional)

Our custom rearend worksheet helps calculate all the dimensions needed to accurately build the rear frame and rearend housing to correctly fit your project. Worksheets available at CAChassisworks.com/cac worksheets.html



g-Machine Crossmember System

Multiple Ways to Use a Chassisworks g-Machine Crossmember in Your Project

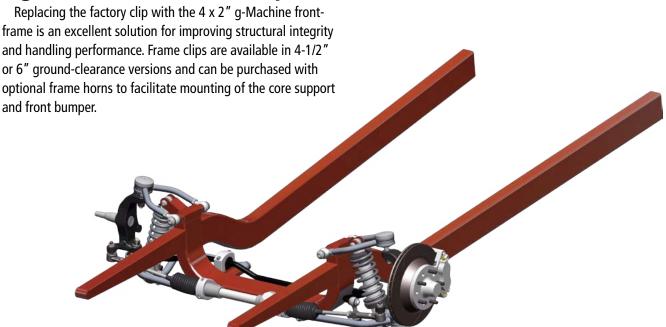
g-Machine Crossmember

The g-Machine front crossmember and suspension system can be purchased separately to easily add the handling benefits of rack-and-pinion steering and double-A-arm suspension to your vehicle. The crossmember is available in

fifteen different hub-to-hub widths, ranging from 51 to 65 inches, and applicable to anything from compacts to full-size pickups. Installation requires notching of the existing frame rails to accommodate the single-piece 4 x 2" crossmember.



g-Machine Front-Frame Clip



78X943	G-MACHINE FACTORY-WELDED CROSSMEMBER, 4-1/2" GROUND CLEARANCE 4 X 2" FRONT FRAME RAILS, UNASSEMBLED
78X943W	G-MACHINE FACTORY-WELDED CROSSMEMBER, 4-1/2" GROUND CLEARANCE 4 X 2" FRONT FRAME RAILS, FACTORY-WELDED
78Y943	G-MACHINE FACTORY-WELDED CROSSMEMBER, 6" GROUND CLEARANCE 4 X 2" FRONT FRAME RAILS, UNASSEMBLED
78Y943W	G-MACHINE FACTORY-WELDED CROSSMEMBER, 6" GROUND CLEARANCE 4 X 2" FRONT FRAME RAILS, FACTORY-WELDED
7190	TAPERED FRAME HORNS (PAIR)

g-Machine 4x2" Full Frames

■ Canted Billet 4-Link, 4 x 2" Full Frames





Unassembled Frame Kits

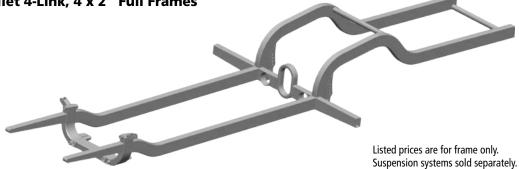
7530	4-1/2" GROUND CLEARANCE
7535	6" GROUND CLEARANCE
OPTIONS	EXHAUST PORTS, 4-1/2 OD X .25 WALL X 2" LONG (PAIR)
	TAPERED FRAME HORNS (PAIR)

Factory-Welded Frames

7530W	4-1/2" GROUND CLEARANCE
7535W	6" GROUND CLEARANCE
OPTIONS	EXHAUST PORTS, 4-1/2 OD X .25 WALL X 2" LONG (PAIR), FACTORY-WELDED
	EXHAUST PORTS, 4-1/2 OD X .25 WALL X 2" LONG (PAIR), TAPERED REAR CROSSMEMBER, FACTORY-WELDED

■ Traditional Parallel Billet 4-Link, 4 x 2" Full Frames





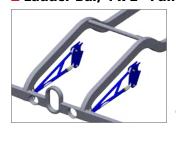
Unassembled Frame Kits

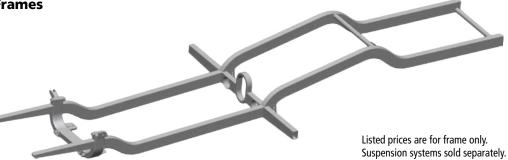
7520	4-1/2" GROUND CLEARANCE
7525	6" GROUND CLEARANCE
OPTIONS	EXHAUST PORTS, 4-1/2 OD X .25 WALL X 2" LONG (PAIR)
	TAPERED FRAME HORNS (PAIR)

Factory-Welded Frames

-	
7520W	4-1/2" GROUND CLEARANCE
7525W	6" GROUND CLEARANCE
OPTIONS	EXHAUST PORTS, 4-1/2 OD X .25 WALL X 2" LONG (PAIR), FACTORY-WELDED
	EXHAUST PORTS, 4-1/2 OD X .25 WALL X 2" LONG (PAIR), TAPERED REAR
	CROSSMEMBER, FACTORY-WELDED

■ Ladder Bar, 4 x 2" Full Frames





Unassembled Frame Kits

7500	32" BARS, 4-1/2" GROUND CLEARANCE
7505	32" BARS, 6" GROUND CLEARANCE
7510	36" BARS, 4-1/2" GROUND CLEARANCE
7515	36" BARS, 6" GROUND CLEARANCE
OPTIONS	EXHAUST PORTS, 4-1/2 OD X .25 WALL X 2" LONG (PAIR)
	TAPERED FRAME HORNS (PAIR)

Factory-Welded Frames

7500W	32" BARS, 4-1/2" GROUND CLEARANCE
7505W	32" BARS, 6" GROUND CLEARANCE
7510W	36" BARS, 4-1/2" GROUND CLEARANCE
7515W	36" BARS, 6" GROUND CLEARANCE
OPTIONS	EXHAUST PORTS, 4-1/2 OD X .25 WALL X 2" LONG (PAIR), FACTORY-WELDED
	EXHAUST PORTS, 4-1/2 OD X .25 WALL X 2" LONG (PAIR), TAPERED REAR CROSSMEMBER, FACTORY-WELDED

Options Overview

Front Suspension



g-Machine (Black)

The only choice when handling performance is a top priority. g-Machine suspension features double-adjustable upper arms for rapid and repeatable caster/camber adjustments, and reinforced construction to increase arm ridgidity.



Street Machine (Polished)

TIG-welded stainless-steel control arm with mirror-polished show-ready finish. Supporting hardware is also available in polished stainless steel to complete the package.



Street Machine (Black)

A popular choice for well-rounded performance with a low-maintenance finish. Black powder-coated arms can be matched with polished-stainless or clear zinc plated hardware.



Street Machine (Bare)

Bare steel control arms will save you time and money when black or polished just won't work for your project. Arms ship ready for paint prep and final assembly.

■ Rack and Pinion Steering



Power Rack and Pinions

Available in popular widths, 21.5" thru 24.5", in both left- and right-hand drive, and black or chrome finish. Performance matched power steering pump kits also available.



Billet Manual Rack and Pinion

Manufactured in 15-different widths to correctly fit your vehicle. Racks feature a billet-aluminum pinion housing and rack body, with satin or polished finish.

Front Anti-Roll Bars



g-Machine Anti-Roll Bar

The larger 1" and 1-1/4" diameters and spherical-bearing endlinks substantially increase front end stiffness and promote flatter cornering. Available for all crossmembers.



Street Machine Anti-Roll Bar

Urethane-bushing endlinks matched with a 3/4"-diameter bar create a kit better suited for street-driven vehicles when ride quality is of more concern.

Engine/Drivetrain Mounts



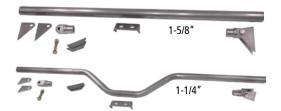
Billet Side Mounts and Crossmember

Urethane-bushed, billet-aluminum motor mounts enable bolt-on installation when used with the weld-in 2 x 2" engine crossmember or welded engine frame adapters. Mounts are available in standard Chevrolet three-bolt pattern, for small- and big-block engines, and four-bolt pattern for modern LS-series engines.



Frame Mounts

Welded engine frame adapters facilitate use of our billet side mounts into your custom frame project. For use with inside frame widths of up to 29".



Transmission Crossmembers

Trim-to-fit, bolt-in tubular transmission crossmembers are available in 1-5/8" and 1-1/4" diameters, and drop ranges from zero to 8" in two-inch increments. Billet weld-eyes bolt to welded frame tabs, allowing easy transmission installation and removal.

Options Overview

Shocks



VariShock Coil-Overs

Traditional coil-overs allow changeable spring rates, spring preload adjustment and shock valving adjustments with predictable results.



VariShock Air-Springs

Air suspension enables instantly changeable ride-height with adjustable shock valving to tune ride quality.

■ Rear Suspensions



Canted Billet-4-Bar

The most versatile and well rounded of the rear suspension options, the triangulated arm layout and adjustable geometry make the Canted Billet-4-Bar an excellent choice for builds focused on great handling.



Parallel Billet-4-Bar

A parallel link configuration allows the use of extremely narrow rearends with the adjustability and performance of a traditional 4-link, while retaining the high-end billet appearance.



Traditional 4-Link

Better suited for high-horsepower builds, the tubular steel links can be equipped with mild-steel or 4130 rod ends, or urethane bushings.



32" or 36" Ladder Bar

The simplest of the suspensions, ladders bars are good choice for street/strip or ProStreet cars. Sacrifices adjustabliltiy and ride quality for simple straight-line performance.

Rear Anti-Roll Bars



Ball-End Anti-Roll Bar (for Canted Billet-4-Bar)

Provides maximum exhaust clearance by placing the bar close against the vehicle under-body. Features billet-aluminum arms and low-friction pivot bearings.



Bolt-On Anti-Roll Bar (for other than Canted Billet-4-Bar)

The bolt-on installation method utilizes weld-in chassis tabs that enable quick installation and removal from below; helpful when side-access space is limited.

■ Disc Brake Systems



Offered with 11-3/4", 13", and 14" vented rotors, g-Street™ front brakes are comprised of a bolttogether billet-aluminum hubs/hat/rotor assembly, with Wilwood forged- or billet-aluminum calipers.



Rear brake packages include an integrated parking brake mechanism and are available in 12.19", 13", and 14" versions, with Wilwood forged- or billet-aluminum calipers; depending upon selected kit.





Red Calipers

Standard caliper anodized finish is black for all brake kits, but can be upgraded to an eyecatching red powdercoat finish.

■ Direct-Fit FAB9[™] Housings



Chassisworks' FAB9™ housings offer superior strength from fabricated center-section panels, internal tube gussets, folded back braces, and consistent robotic spray-arc-welded seams. Factory-welded direct-fit housings are available for each of the rear suspension system options, along with axle and third-member packages.

Frame Accessories

■ Tapered Frame Horns

Frame horns are welded to the front of the suspension crossmember, creating a structure on which to mount the radiator, front end, and bumper. Factory-welded assemblies measure 24" in length, begin at 2" wide by 3" tall and taper down to a 3/4"-radius tip.







■ Running Board Dropped Mounts

Save time mounting your running boards with our pre-bent $1 \times 2 \times .120$ "-wall, 6"-drop mounts. The mounts feature a 90-degree mandrel bend and extend 18" outward.

4517 RUNNING BOARD DROPS, 18" X 6" DROP (PAIR)



Driveshaft Ovals

The 1x2", box-tube driveshaft loop allows the use of a straight frame crossmember to increase ground clearance. Our 1x2" driveshaft loop is available in two versions: U-bend or oval. The U-bend style can be used as a replacement for any driveshaft loop. The 360-degree-oval, full loop is available in three inside lengths: 6-1/2" inside height for use near the front U-joint; 9" inside height for use by the rear U-joint with 5"-travel shocks; or 11" inside height for use with 7"-travel shocks.



6037	DRIVESHAFT OVAL, 1X2"; 6-1/2" INSIDE HEIGHT
6038	DRIVESHAFT OVAL, 1X2"; 9" INSIDE HEIGHT
6039	DRIVESHAFT OVAL, 1X2"; 11" INSIDE HEIGHT
6040	DRIVESHAFT LOOP, 1X2"; 10-1/2" INSIDE HEIGHT

■ Frame Exhaust Port

Our 4-1/2"-OD x 2"-wide x .250"-wall, mildsteel, round exhaust ports can be welded into any crossmember, providing a clean installation appearance and more easily packaged exhaust system. The 4" ID allows ample room for up to 3"-diameter exhaust.







Engine and Transmission Mounts

2 x 2 Engine Crossmember

Constructed of .120"-wall, 2x2" tube, this mandrelbent crossmember is 42" wide (can easily be shortened if necessary); fits small- and big-block, and LS-series Chevy engines; and provides 6" of oil-pan clearance from the bottom of the engine block to the top of the crossmember drop. Passenger side of crossmember has an adjustment slot in the motor-mount tabs to facilitate engine installation. Uses Number-6055 or 6007 billet side mounts and optional Number-3046 spuds.



6060 2 X 2 ENGINE CROSSMEMBER

■ Engine Frame Adapters

Welded engine frame adapters facilitate incorporating Chassisworks GM billet side motor mounts into your custom frame project. For a cleaner appearance, welded seams are hidden on the bottom side of the boxed, 7-gauge assembly.



Engine adapters can be used on inside frame widths up to 29", but can easily be trimmed to fit narrower frames. To make final engine installation easier, the passenger side bracket holes have been slotted.



5322 DRIVER-SIDE ENGINE FRAME ADAPTER 5323 PASSENGER-SIDE ENGINE FRAME ADAPTER, SLOTTED

■ Transmission Crossmembers

We now manufacture heavy-duty, Pro Street-style transmission crossmembers for straight or 2"-, 4"-, 6"-, and 8"-drop applications. Available in 1-5/8x.134" wall or 1-1/4x.120" wall material. Shipped 40" long for easy modification to any width frame. Kit includes weld eyes and brackets (much more sophisticated than tube sleeves used by others) for easy installation and convenient removal.







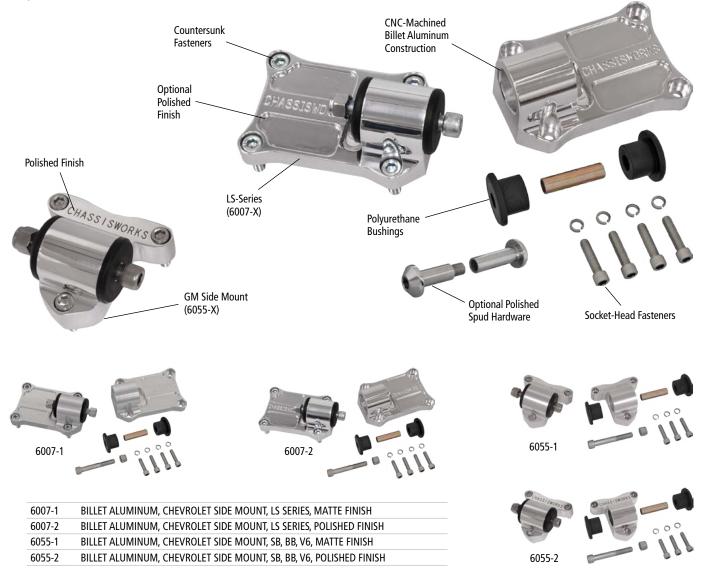


6050	STRAIGHT CROSSMEMBER, 1-5/8 OD X .134" WALL, 46" WIDTH
6051	2"-DROP CROSSMEMBER, 1-5/8 OD X .134" WALL, 46" WIDTH
6052	4"-DROP CROSSMEMBER, 1-5/8 OD X .134" WALL, 46" WIDTH
6053	6"-DROP CROSSMEMBER, 1-5/8 OD X .134" WALL, 46" WIDTH
6054	8"-DROP CROSSMEMBER, 1-5/8 OD X .134" WALL, 46" WIDTH
6075	STRAIGHT CROSSMEMBER, 1-1/4 OD X .120" WALL, 46" WIDTH
6076	2"-DROP CROSSMEMBER, 1-1/4 OD X .120" WALL, 46" WIDTH
6077	4"-DROP CROSSMEMBER, 1-1/4 OD X .120" WALL, 46" WIDTH
6078	6"-DROP CROSSMEMBER, 1-1/4 OD X .120" WALL, 46" WIDTH
6079	8"-DROP CROSSMEMBER, 1-1/4 OD X .120" WALL, 46" WIDTH

Billet Side Motor Mounts

CNC-machined, billet aluminum side motor mounts enable bolt-on installation when used with our g-Machine crossmember, direct-fit subframes, or 2 x 2" mandrel-bent crossmember. Mounts are available with standard three-bolt pattern for Chevrolet V8 small-blocks and big-blocks and 4.3L V6s; or four-bolt version to accommodate the modern LS-series

of GM engines. The steel-sleeved, urethane bushing with 1/2" through-bolt design creates an inseparable mount with significant vibration reduction compared to solid mounts. Mount kits include all hardware and are available with matte-anodized or polished finish.



■ Motor-Mount Spud Hardware (Optional)

Specially designed, CNC-machined, polished-stainless-steel mounting hardware is optionally available for use with our billet aluminum side motor mounts. Male and female fasteners feature matching Allendrive, beveled heads for simple installation and excellent appearance. Once tightened against each other, fasteners form a full-length shank with no external threads, providing higher shear strength than standard bolts and correct bushing preload.



3046 SPUD HARDWARE SET, CHEVROLET SIDE MOUNT, POLISHED

The single largest problem with any front suspension conversion is getting the correct hub-to-hub width to match the vehicle's tire clearance requirements. By design, the q-Machine crossmember hub width can be sized from 51 to 65 inches, in 1-inch increments, without affecting wheel rates, ride quality, steering effort, or turning radius. This enables use with vehicles ranging from compacts to full-size pickups. To accomplish this we manufacture the rack and pinion, 4 x 2" suspension crossmember, and anti-roll bars in 15 different widths.

We are the only builder that can do this because we actually manufacture our own rack and pinions. The same A-arm and spindle components are used with different-width crossmembers to provide a track width that best suits your project's performance or design needs, such as wider for enhanced handling or narrower to fit deep-dish wheels. The q-Machine system greatly increases an installation shop's potential customer base by familiarizing their staff with one system that is applicable to many vehicles.

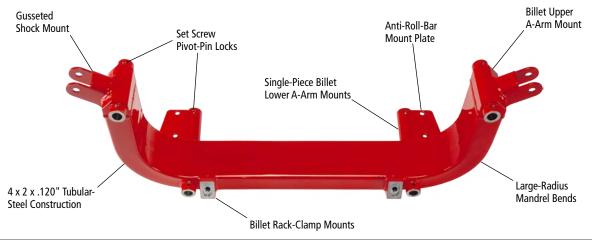


Single-Piece 4 x 2 x .120" g-Machine Crossmember

Bent-tube, billet-component crossmembers are a completely closed rigid structure with greater strength and resistance to bending and twisting than other designs. Formed from a single piece of 4 x 2 x .120" steel tubing, large-radius mandrel bends are placed at each end to distribute loads throughout the crossmember, eliminating

fatigue points at critical areas. Slots for the billet-mount tabs are machined in a large horizontal machining center with dedicated fixturing to guarantee correct component geometry, ensuring the suspension moves as designed.

78W943 G-MACHINE CROSSMEMBER ASSEMBLY (SPECIFY WIDTH)



13

Clean-Sheet Design, Not Revised OEM Geometry

Chassisworks' q-Machine front end is a truly versatile high-performance suspension solution, suitable for g-Machines, street rods, muscle cars, or any project in need of optimized handling. State-of-the-art engineering workstations with Pro/ENGINEER software—combined with our advanced, automated factory—enabled Chassisworks' engineers to create a current-technology, competitively priced, handling performance front suspension system. Chassisworks' new g-Machine design, developed with the aid of finite element analysis (FEA) software, is far superior in performance, reliability, and ease of installation than components made to directly replace 40-year-old '60s muscle-car geometry and variants of the 30- year-old Mustang II suspension. Although late-model- Corvettebased systems offer similar performance, your choice of wheels is extremely limited to flat-face, high-negative-offset wheels. The complete suspension and steering system is



factory-welded directly to the bent-tube billet-component crossmember, ensuring perfect geometry and eliminating the need to weld multiple pieces or make complicated measurements while installing the system.

Precision-Fit Quality Through Advanced Technology

One of the key pieces of advanced technical equipment used in development of our vehicle-retrofit component systems is the FaroArm portable coordinate-measuring machine. The FaroArm is an articulating, multi-segmented arm that enables precise three-dimensional digitization of vehicle surfaces and mounting points, accurate to within .003". To begin, multiple identical vehicles are extensively measured to find the OEM tolerance range we must accommodate in our final design. From these scans, an exact model of the vehicle chassis is created in our Pro/ENGINEER software. Engineers can then accurately and efficiently design systems, simulate movement or conditions, and conduct finite element analysis (FEA) testing

to optimize performance and durability before physically making any parts. Manufacturing fixtures and tooling are also based on the original vehicle scans, avoiding loose tolerances of transferred prototype dimensions and ensuring the quality and ease of fit of the final product.



Suspension and Steering Components

A broad range of suspension and steering components enables the system to be custom-outfitted to match your performance requirements. Options include manual or power rack-and-pinion, Street- or g-Machine control arms, behind-crossmember— or forward-of-rack—mounted anti-

roll bars, fabricated or sculpted spindles, and 11-3/4"-rotor street brakes or 13"- or 14"-rotor high-performance brakes. Bolt-on installation with perfect geometry and tailored performance make the g-Machine system an excellent choice for your next project.



The Chassisworks' Design Is Superior in These Key Areas:

- Single piece, 4 x 2 x .120" crossmember with large-radius mandrel bends to distribute loads throughout the crossmember, eliminating fatigue points at critical areas.
- By making our own billet rack-andpinion assembly, we are able to offer perfect front-suspension geometry at the correct hub-to-hub width.



- Rack and pinion is placed forward of the axle centerline (front steer) for better oil-pan clearance and rotates to eliminate sharp universal-joint angles and improve exhaust clearance.
- With nearly zero bumpsteer in 6" of suspension travel, vehicle handling is predictable regardless of the chassis' changing pitch or roll state.
- Broad lower control arm increases load capacity and stability during braking and cornering.
- Longer lower control arm length reduces track-width change and roll-center movement during suspension travel for smoother transitions entering and exiting turns.
- Lower shock mount is located very close to the balljoint for better shock-motion ratio. A higher shock-motion ratio allows use of lighter, lower-rate springs for better suspension control without degrading ride quality.
- Our g-Machine spindle is taller than OEM spindles and therefore increases camber gain during body roll, keeping tires in better contact with road surface.
- Spindles specifically designed to lower ride height and center of gravity. Marked improvement to vehicle handling. (Optional shock mounts are available to raise car to "near stock" ride height.)
- Short/long arm (SLA) suspension layout is a compact, low-profile suspension design that leaves plenty of room around the engine.
- Traditional hub-style spindle accepts up to 14" brakes and allows more wheel choices compared to Corvette-style spindles.



Interlocking-Slot-Tab Technology

Self-fixturing female slots used with machined male tabs provide an interlocking assembly method that enables A-arm, rack and pinion, and shock mounts to be accurately positioned in all axes. This guarantees the suspension will

The component receiving slots are machined into the mandrel bent crossmembers.

perform as designed. Non-interlocking designs are not nearly as accurate after welding. Superior spray-arc welding process produces the best weld penetration with excellent appearance.



Billet rack-and-pinion mount inserts into machined slot on crossmember.

Billet Steel A-Arm Mounts with Pivot Pins

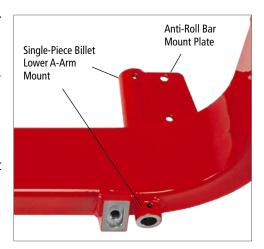
Billet steel, CNC machining allows us to create A-arm mounts with specific areas of increased thickness for added strength not possible with other designs. Unlike slot- or eccentric-mounted A-arms, Chassisworks' exclusive fixed-axis pivot-pin design eliminates the possibility of shifting pivot shafts, provides greater shear strength, and increases bending resistance. Threaded bosses at each end of the mount enable use of set

screws to lock A-arm pivot pins into position. Using slot-tab technology, billet upper A-arm mounts snap and weld into place providing anti-dive geometry and capping the open ends of the 4 x 2" crossmember to better distribute forces, decrease flex throughout the structure, and provide a solid location for the upper shock mount. The lower A-arm mount is a single-piece component passing directly through the crossmember and supported by the anti-roll-bar mounting plate to distribute bending forces throughout the crossmember. This increases rigidity and geometric accuracy of the control arm for more predictable handling.



Our g-Machine upper shock mount has a 1-5/16"-wide, formed clevis that accepts 1/2" mounting hardware and provides adequate clearance for use with VariShock coil-overs or air-spring suspension. Our one-piece design—with an integrated gusset across the top and sides—bridges the billet upper A-arm mount to the 4 x 2" crossmember. This provides a larger, more stable mount base, with better appearance than welded designs, and eliminates bending fatigue possible with common sheet metal- or tubing-mounted designs of other manufacturers.



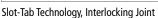


Billet Rack Mounts and Clamps

Billet steel rack mounts using dual slot-tab technology form an interlocking bridge between the 4 x 2" crossmember and billet aluminum rack brackets. The angled mount fixture welds to the 4 x 2" crossmember, attaching to the rack body at the widest points. This allows positioning of the rack above the bottom of the crossmember, safe from road hazards. Billet

aluminum rack clamps attach into interlocking grooves in the rack gearbox, preventing flex in hard cornering unlike rubbermounted designs. This also allows rotation of the input shaft to aid steering-shaft installation around engine obstacles and the exhaust system.







Pinion Rotated **Up**



Pinion Rotated **Down**

Four Installation Methods

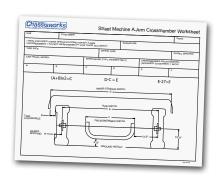
Chassisworks' g-Machine crossmember measures 4-1/2" from the ground with a 12"-rolling-radius tire, allowing a low ride height with enough clearance for street driving. The rear of the g-Machine crossmember is 1-3/4" behind the front axle centerline providing more oil-pan clearance than most stock frames. Optional 4 x 2" front frame rails are available in 4-1/2" or 6" ground clearance at the firewall to allow additional clearance if needed. Optional frame horns attach to the front of the crossmember. Crossmembers ship with an extremely thorough, 57-page, photo-illustrated manual, making assembly and installation less intimidating and more easily accomplished.



Crossmember Worksheet

One of Chassisworks' best developed specialities is our ability to quickly and accurately build custom parts for your specific project. To ensure that you get exactly what you need a detailed custom part worksheet must be correctly filled out. Detailed worksheet instructions are included,

explaining specific measurements and any necessary calculations. Worksheets are required for custom roll cages, FAB9™ rearend housings, and g-Machine front suspension crossmember conversions.



A-Arm Suspension 2x4" Crossmember

Versatile Suspension Solution

The most versatile high-performance suspension solution, suitable for q-Machines, street rods, muscle cars, or any project in need of optimized handling. Chassisworks' crossmember design, developed with the aid of finite element analysis (FEA) software, is far superior in performance, reliability, and ease of installation than current market offerings. Suspension geometry and construction is unique to our design and has very little in common with Mustang II based products.

Versatile Installation - The 2x4" crossmember ships factory-welded in one of fifteen widths, ranging from 51 to 65 inches hub-to-hub. All suspension and steering components mount directly to the bent-tube billet-component crossmember, ensuring perfect geometry and eliminating the need to weld multiple pieces or make complicated measurements while installing the system. In many cases installation is as simple as notching the existing framerail and welding in the new crossmember.



78W943 4X2" A-ARM SUSPENSION CROSSMEMBER ONLY NOTE

15 WIDTHS - 24" TO 38", 1" INCREMENTS - 51" TO 65" HUB-TO-HUB



Versatile Performance - The same basic

2x4" crossmember can be outfitted with a broad variety of suspension and steering components, including anything from an air-suspension steet rod, lightweight drag race front end, a performance-handling machine, or anything in between.

Street Machine A-Arm Suspension System

780943	STREET-MACHINE A-ARM SUSPENSION FOR 2X4" CROSSMEMBER, FRONT CLIPS, AND FRAMES
A-ARM	STREET MACHINE ARMS, MILD STEEL, BARE FINISH, WITH CLEAR ZINC PIVOT ENDS
OPTIONS	STREET MACHINE ARMS, MILD STEEL, BLACK FINISH, WITH CLEAR ZINC PIVOT ENDS
	STREET MACHINE ARMS, MILD STEEL, BLACK FINISH, WITH POLISHED STAINLESS PIVOT ENDS AND BALLJOINT CAPS
	STREET MACHINE ARMS, STAINLESS STEEL, POLISHED FINISH, WITH POLISHED STAINLESS PIVOT ENDS AND BALLJOINT CAPS
	G-MACHINE ARMS, MILD STEEL, BLACK FINISH, WITH POLISHED STAINLESS PIVOT ENDS
	G-MACHINE ARMS, MILD STEEL, BLACK FINISH, WITH POLISHED STAINLESS PIVOT ENDS AND BALLJOINT CAPS
SPINDLES/	SCULPTED SPINDLE (BARE OR BLACK POWDER COAT FINISH) WITH OEM-STYLE TIE RODS
TIE-RODS	BUMP-STEER TIE-ROD ENDS
RACK AND	BILLET MANUAL RACK AND PINION (SATIN ANODIZED OR POLISHED FINISH) (15 WIDTHS - 24" TO 38", 1" INCREMENTS)
PINION	POWER RACK AND PINION, BLACK PAINTED (2 WIDTHS - 30" AND 33")
OPTIONS	POWER RACK AND PINION, CHROME FINISH (2 WIDTHS - 30" AND 33")
	RIGHT-HAND DRIVE (AUSTRALIA) POWER RACK & PINION, BLACK (2 WIDTHS - 30" AND 33")
ANTI-	STREET MACHINE 3/4" SOLID ANTI-ROLL BAR (15 WIDTHS - 24" TO 38", 1" INCREMENTS)
ROLL BAR	G-MACHINE 1" TUBULAR ANTI-ROLL BAR (15 WIDTHS - 24" TO 38", 1" INCREMENTS)
OPTIONS	G-MACHINE 1-1/4" TUBULAR ANTI-ROLL BAR (4 WIDTHS - 24", 28", 30", AND 33")
SHOCK	SENSISET FACTORY-VALVED POLY-EYE COIL-OVER SHOCKS
OPTIONS	QUICKSET 1 COIL-OVER SHOCKS, SINGLE-ADJUSTABLE, POLY EYE
	QUICKSET 2 COIL-OVER SHOCKS, DOUBLE-ADJUSTABLE POLY EYE
	QUICKSET 2 COIL-OVER SHOCKS, DOUBLE-ADJUSTABLE COM-8 EYE
	QUICKSET 4 REMOTE-RESERVOIR COIL-OVER SHOCKS, 4-WAY ADJUSTABLE, COM-8 EYE
	QUICKSET 1 AIR-SPRING SHOCKS, SINGLE-ADJUSTABLE, POLY EYE
	QUICKSET 2 AIR-SPRING SHOCKS, DOUBLE-ADJUSTABLE, POLY EYE
	POLISHED STAINLESS STEEL BEVELED SPUD HARDWARE
SPRINGS	500, 550, 600, 675, OR 750 LB/IN RATE SPRINGS
BRAKES	11-3/4" BARE VENTED ROTORS WITH BLACK 4-PISTON FORGED CALIPERS, SATIN OR POLISHED HUBS
	13" BLACK VENTED/DRILLED ROTORS WITH BLACK 4-PISTON BILLET CALIPERS, SATIN OR POLISHED HUBS
	14" BLACK VENTED/DRILLED ROTORS WITH BLACK 6-PISTON BILLET CALIPERS, SATIN OR POLISHED HUBS
NOTE	COMPONENT WIDTH RANGES ARE GIVEN IN REFERENCE TO AVAILABLE CROSSMEMBER WIDTHS

Street-Machine A-Arm Suspension System

Street Machine Suspension Options



Arm Options: Street Machine (bare, black, stainless), g-Machine (double-adjustable)



Spindle/Tie Rod Options: Sculpted spindle (bare, black) / OEM-style or bump steer



Rack Options: Manual (satin, polished), Power (chrome, black), right-hand drive



Brake Options: 11-3/4", 13", or 14" kits



Shock Options: Coil-Overs (fixed, single, double, or 4-way adjustable with remote reservoir), Air-Springs (single or double adjustable)



Anti-Roll Bar Options: Street Machine (3/4" solid bar with poly endlinks), g-Machine (1" or 1-1/4" tubular bar with bearing endlinks)

Ultimate Pro-Touring A-Arm Suspension System

With simple integration into any vehicle build utilizing Chassisworks' 2x4 A-arm crossmember, the Ultimate Pro-Touring A-Arm Suspension performance improves performance through reduced weight, finer tuning adjustments, and increased reliability.

Billet-Aluminum Upright - Engineered to work with Chassisworks bolt-on clips and 4x2" weld-in suspension crossmembers, the billet-aluminum unit-bearing upright again raises the pro-touring bar. The lightweight upright features a heavy-duty, sealed unit bearing that is both larger in diameter and considerably more reliable than the commonly used and frequently replaced Corvette components.

Bump-Steer Kit - The latest innovation from the mind of Chris Alston is our infinitely adjustable bump-steer kit with Teflon®-lined 4130 rod end. Utilizing a unique 3/4" threaded stud with locknut, the height of the pivot point can be quickly adjusted without disassembly or hasseling with shim stacks. No other adjustment mechanism is this precise.

Disc Brake Kit - Continuing down the path of bigger wheels and tires leading to better performance, Chassisworks offers a specially developed brake kit, featuring 14" or massive 15" x 1.25" rotors with radial-mount, Wilwood or Baer, 6-piston calipers in a variety of finishes and optional pad compounds.



78W943 4X2" A-ARM SUSPENSION CROSSMEMBER ONLY
NOTE 15 WIDTHS - 24" TO 38", 1" INCREMENTS - 51" TO 65" HUB-TO-HUB

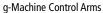


780953	ULTIMATE PRO-TOURING A-ARM SUSPENSION FOR 2X4" CROSSMEMBER, FRONT CLIPS, AND FRAMES
A-ARM OPTIONS	G-MACHINE WIDE-TRACK ARMS, MILD STEEL, BLACK FINISH, WITH STAINLESS PIVOTS
SPINDLES/ TIE-RODS	BILLET-ALUMINUM UNIT-BEARING UPRIGHT, SATIN ANODIZED FINISH
	THREADED HEIGHT ADJUSTMENT BUMP-STEER TIE-ROD ENDS
RACK AND	BILLET MANUAL RACK AND PINION (SATIN ANODIZED OR POLISHED FINISH) (15 WIDTHS - 24" TO 38", 1" INCREMENTS)
PINION	POWER RACK AND PINION, BLACK PAINTED (2 WIDTHS - 30" AND 33")
OPTIONS	POWER RACK AND PINION, CHROME FINISH (2 WIDTHS - 30" AND 33")
	RIGHT-HAND DRIVE (AUSTRALIA) POWER RACK & PINION, BLACK (2 WIDTHS - 30" AND 33")
ANTI-	SPLINED TUBULAR ANTI-ROLL BAR, ADJUSTABLE RATE (2 WIDTHS - 30" AND 33")
ROLL BAR	G-MACHINE 1" TUBULAR ANTI-ROLL BAR (15 WIDTHS - 24" TO 38", 1" INCREMENTS)
OPTIONS	G-MACHINE 1-1/4" TUBULAR ANTI-ROLL BAR (4 WIDTHS - 24", 28", 30", AND 33")
SHOCK	QUICKSET 1 COIL-OVER SHOCKS, SINGLE-ADJUSTABLE, COM-8 EYE
OPTIONS	QUICKSET 2 COIL-OVER SHOCKS, DOUBLE-ADJUSTABLE COM-8 EYE
	QUICKSET 4 REMOTE-RESERVOIR COIL-OVER SHOCKS, 4-WAY ADJUSTABLE, COM-8 EYE
	QUICKSET 1 AIR-SPRING SHOCKS, SINGLE-ADJUSTABLE, POLY EYE
	QUICKSET 2 AIR-SPRING SHOCKS, DOUBLE-ADJUSTABLE, POLY EYE
	POLISHED STAINLESS STEEL BEVELED SPUD HARDWARE
SPRINGS	500, 550, 600, 675, OR 750 LB/IN RATE SPRINGS
BRAKES	14" BLACK VENTED/DRILLED ROTORS WITH 6-PISTON BILLET CALIPERS (BLACK OR RED FINISH)
	15" BLACK VENTED/DRILLED ROTORS WITH 6-PISTON BILLET CALIPERS (BLACK OR RED FINISH)
	UPGRADE TO THERMLOC 6-PISTON BILLET CALIPERS (NICKLE FINISH)
NOTE	COMPONENT WIDTH RANGES ARE GIVEN IN REFERENCE TO AVAILABLE CROSSMEMBER WIDTHS

Ultimate Pro-Touring A-Arm Suspension System

Ultimate Pro-Touring Suspension Options







Shock Options: Coil-Overs (single, double, or 4-way adjustable with remote reservoir), Air-Springs (single or double adjustable)



Billet-Aluminum Upright with unit-bearing hub and radial-mount caliper bracket



Billet-Aluminum Upright with unit-bearing hub and radial-mount caliper bracket



Rack Options: Manual (satin, polished), Power (chrome, black), right-hand drive



Anti-Roll Bars: g-Machine (1" or 1-1/4") or Splined-End Adjustable Bar (1-1/4")



Brake Options: 14" or 15" vented and crossdrilled rotors with radial-mount 4-piston or 6-piston calipers, Thermlock™ (heat-barrier) pistons upgrade available

Drag Race A-Arm Suspension System

With simple integration into any vehicle build utilizing Chassisworks' 2x4 A-arm crossmember, the Drag Race A-Arm Suspension features lightweight suspension and brake options with increased suspension extension travel to improve weight transfer characteristics during launches.

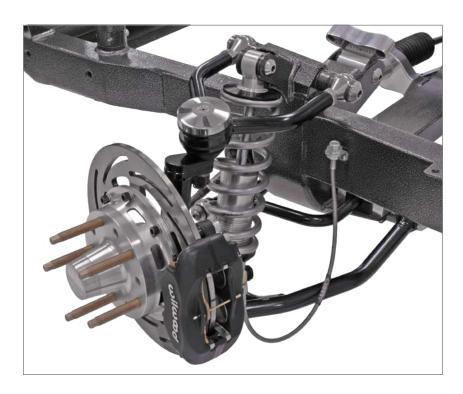
Increased Suspension Travel - To facilitate suspension tuning for drag race launches specially valved, 5.15" travel, short-base coil-overs were developed. The additional shock extension combined with lower spring rate permits more power to be applied at launch without 'overshocking' the tires.

Lightweight Configuration - Drag race vehicles below 2900 lbs (3100 lbs with parachute) may choose our lightweight 11-3/4" x .31" slotted rotor with lightened aluminum hub and fabricated spindle. Brake clamping force is similar to the heavy-duty brake kit, however heavier vehicles require the increased heat dissipation of a vented rotor.

Heavy-Duty Configuration - Vehicles over 2900 lbs (3100 lbs with parachute) require our heavy-duty sculpted spindles, 11-3/4" x .81" vented rotor with solid-wall aluminum hub. This system is also suitable for use on street-strip vehicles.



78W943	4X2" A-ARM SUSPENSION CROSSMEMBER ONLY	
NOTE	15 WIDTHS - 24" TO 38", 1" INCREMENTS - 51" TO 65" HUB-TO-HUB	



780963	DRAG RACE A-ARM SUSPENSION FOR 2X4" CROSSMEMBER, FRONT CLIPS, AND FRAMES
	· · · · · · · · · · · · · · · · · · ·
SPINDLE/	HEAVY-DUTY SCULPTED SPINDLES WITH STREET MACHINE ARMS, MILD STEEL, BARE FINISH, AND CLEAR ZINC PIVOT ENDS
A-ARM OPTIONS	HEAVY-DUTY SCULPTED SPINDLES WITH STREET MACHINE ARMS, MILD STEEL, BLACK FINISH, AND CLEAR ZINC PIVOT ENDS
OPTIONS	LIGHTWEIGHT FABRICATED SPINDLES WITH STREET MACHINE ARMS, MILD STEEL, BARE FINISH, AND CLEAR ZINC PIVOT ENDS
	LIGHTWEIGHT FABRICATED SPINDLES WITH STREET MACHINE ARMS, MILD STEEL, BLACK FINISH, AND CLEAR ZINC PIVOT ENDS
RACK AND	BILLET MANUAL RACK AND PINION, SATIN ANODIZED FINISH (15 WIDTHS - 24" TO 38", 1" INCREMENTS)
PINION	BILLET MANUAL RACK AND PINION, POLISHED FINISH (15 WIDTHS - 24" TO 38", 1" INCREMENTS)
SHOCKS	QUICKSET 1 COIL-OVER DRAG RACE SHOCKS, SINGLE-ADJUSTABLE, COM-8 EYE, 5" TRAVEL
	QUICKSET 2 COIL-OVER DRAG RACE SHOCKS, DOUBLE-ADJUSTABLE, COM-8 EYE, 5" TRAVEL
SPRINGS	250, 300, 350, 400, 450, OR 500 LB/IN RATE SPRINGS
BRAKES	MEDIUM-DUTY 11-3/4" X .35" SLOTTED ROTORS WITH BLACK 4-PISTON FORGED CALIPERS
	HEAVY-DUTY 11-3/4" X .81" VENTED ROTORS WITH BLACK 4-PISTON FORGED CALIPERS
NOTE	COMPONENT WIDTH RANGES ARE GIVEN IN REFERENCE TO AVAILABLE CROSSMEMBER WIDTHS

Drag Race A-Arm Suspension System

Drag Race Suspension Options



Street Machine Control Arms in bare steel or black powder coat finish



5"-travel VariShock Coil-Overs (single or double adjustable)



Sculpted spindle (bare or black powder coat finish) or fabricated spindle



Bump Steer Tie Rod Sets feature tapered or threaded stud with 4130 rod ends



Rack Options: Manual rack in satin anodized or polished finish (15 widths)



Light-duty or heavy-duty brake kits

2x4" Crossmember Shock-System Options

VARISHOCK COIL-OVER SHOCKS

VariShock coil-overs provide an advanced level of tuning for both performance and street vehicles. Variable shock valving gives you up to 256 different combinations of "instant adjustment" by simply turning the adjustment knobs to one of 16 detents. The threaded lower spring enables fine tuning of ride height, shock-travel balance, and corner weighting without affecting spring rate.



■ Poly-Eye Coil-Over Shocks, 4.25" Travel (Street, Pro-Touring)

VAS 11022-425	VARISHOCK POLY-EYE COIL-OVER, SENSISET FACTORY-VALVED, 4.25" TRAVEL (PAIR)
VAS 11122-425	VARISHOCK POLY-EYE COIL-OVER, QUICKSET 1 SINGLE-ADJUSTABLE, 4.25" TRAVEL (PAIR)
VAS 11222-425	VARISHOCK POLY-EYE COIL-OVER, QUICKSET 2 DOUBLE-ADJUSTABLE, 4.25" TRAVEL (PAIR)
NOTE	USES 9" COIL SPRINGS



■ Bearing-Eye Coil-Over Shocks, 4.25" Travel (Street, Pro-Touring, Open Track)

VAS 11011-425	VARISHOCK BEARING-EYE COIL-OVER, SENSISET FACTORY-VALVED, 4.25" TRAVEL (PAIR)
VAS 11111-425	VARISHOCK BEARING-EYE COIL-OVER, QUICKSET 1 SINGLE-ADJUSTABLE, 4.25" TRAVEL (PAIR)
VAS 11211-425	VARISHOCK BEARING-EYE COIL-OVER, QUICKSET 2 DOUBLE-ADJUSTABLE, 4.25" TRAVEL (PAIR)
VAS 11411-43	VARISHOCK BEARING-EYE REMOTE- RESERVOIR COIL-OVER, QUICKSET 4 4-WAY-ADJUSTABLE, 4.25" TRAVEL (PAIR)
NOTE	USES 9" COIL SPRINGS



■ Bearing-Eye Coil-Over Shocks, 5.15" Travel (Street/Strip, Drag Race)

VAS 1111R-52	VARISHOCK BEARING-EYE COIL-OVER (DRAG RACE) QUICKSET 1 SINGLE-ADJUSTABLE, 5.15" TRAVEL (PAIR)
VAS 1121R-52	VARISHOCK BEARING-EYE COIL-OVER (DRAG RACE) QUICKSET 1 SINGLE-ADJUSTABLE, 5.15" TRAVEL (PAIR)
NOTE	USES 12" COIL SPRINGS



2x4" Crossmember Shock-System Options

■ 12" Coil-Springs

VARISPRING COIL-SPRINGS

VariSprings are manufactured using a new high-tensile wire, which is stronger than the chrome-silicon wire used by other manufacturers. Since this wire can flex more than conventional chrome-silicon wire, we can wind VariSprings with a coarser pitch that reduces weight and

increases the spring's travel.

	9" Coil-S	prings
١	VAS 21-09200	9" LENGTH, 200 LB/IN
١	VAS 21-09240	9" LENGTH, 240 LB/IN
١	VAS 21-09275	9" LENGTH, 275 LB/IN
١	VAS 21-09300	9" LENGTH, 300 LB/IN
١	VAS 21-09350	9" LENGTH, 350 LB/IN
١	VAS 21-09400	9" LENGTH, 400 LB/IN
١	VAS 21-09450	9" LENGTH, 450 LB/IN
١	VAS 21-09500	9" LENGTH, 500 LB/IN
١	VAS 21-09550	9" LENGTH, 550 LB/IN
١	VAS 21-09600	9" LENGTH, 600 LB/IN
١	VAS 21-09675	9" LENGTH, 675 LB/IN
١	VAS 21-09750	9" LENGTH, 750 LB/IN

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VAS 21-12080	12" LENGTH, 80 LB/IN
VAS 21-12095	12" LENGTH, 80 LB/IN
VAS 21-12110	12" LENGTH, 110 LB/IN
VAS 21-12130	12" LENGTH, 130 LB/IN
VAS 21-12150	12" LENGTH, 150 LB/IN
VAS 21-12175	12" LENGTH, 175 LB/IN
VAS 21-12200	12" LENGTH, 200 LB/IN
VAS 21-12250	12" LENGTH, 250 LB/IN
VAS 21-12300	12" LENGTH, 300 LB/IN
VAS 21-12350	12" LENGTH, 350 LB/IN
VAS 21-12400	12" LENGTH, 400 LB/IN
VAS 21-12450	12" LENGTH, 450 LB/IN
VAS 21-12500	12" LENGTH, 500 LB/IN
VAS 21-12550	12" LENGTH, 550 LB/IN
VAS 21-12600	12" LENGTH, 600 LB/IN
VAS 21-12650	12" LENGTH, 650 LB/IN



VARISHOCK AIR-SPRING SHOCKS

The VariShock air-spring suspension enables rapid changes in ride height when used with one of the various compressor control systems — perfect for street rods. Air suspension provides smooth, comfortable ride quality, but the VariShock's built-in adjustable valving allows the system to be tuned for enhanced performance.

VAS 131H2-425	VARISHOCK AIR SPRING, QUICKSET 1 SINGLE- ADJUSTABLE, POLY EYES (PAIR)
VAS 132H2-425	VARISHOCK AIR SPRING, QUICKSET 2 DOUBLE- ADJUSTABLE, POLY EYES (PAIR)
NOTE	AIR-MANAGEMENT SYSTEM REQUIRED FOR OPERATION





Street-Machine A-Arms

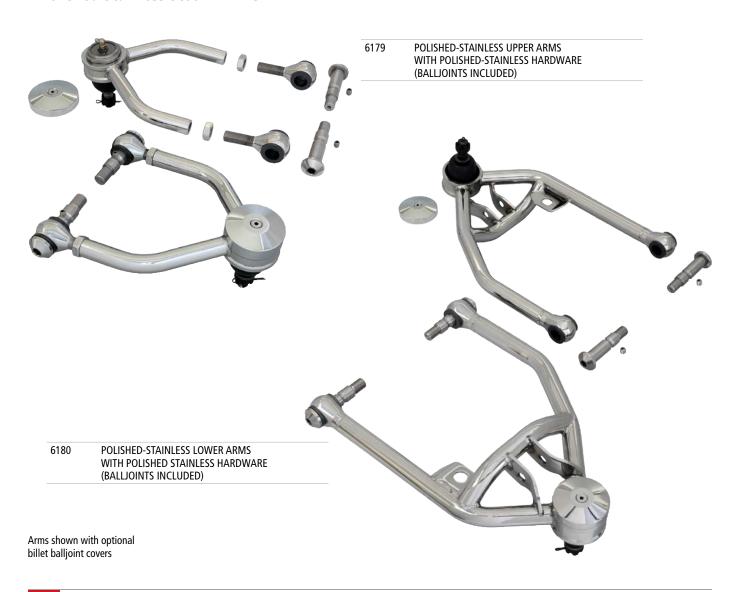
■ Street-Machine A-Arms

Chassisworks' Street-Machine A-arms are designed for performance street vehicles using our g-Machine crossmember system with VariShock coil-overs or air-spring suspension. Self-lubricated polymer pivot bearings enable predictable handling and effective suspension tuning with very little maintenance, thanks to linear resistance, minimal deflection, and extremely low rate of wear. Press-fit pivot bearings and heavy-duty screw-in balljoints allow the A-arm to be easily rebuilt if ever needed. Street-Machine A-arms are constructed from mandrel-bent, 7/8 or 1 x .156"-wall, mild- or stainless-steel round tubing, creating a lightweight component durable enough for regular performance street use. With the aid of a fixture, tubes are seated into recessed faces along the billet balljoint housing to provide a high-strength,

interlocking, TIG-welded joint that angles the balljoint and ensures bind-free operation. Billet balljoint housings feature an exterior groove to enhance appearance and reduce weight. Three material finish combinations are available: paintable mild steel, black powder-coated mild steel, or polished stainless steel for show-quality appearance that outlasts chrome.

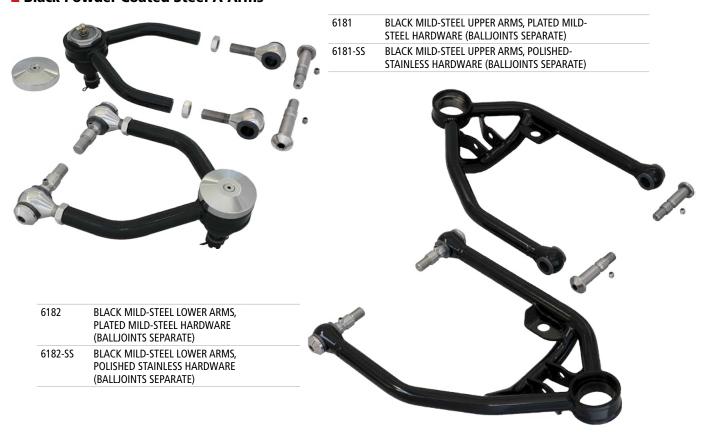
- TIG-welded, .156"-wall, tubular construction
- Available in mild- and stainless-steel versions
- Allows use of VariShock coil-over or air-spring suspension
- Easily replaceable, heavy-duty, screw-in ballioint

■ Polished Stainless-Steel A-Arms

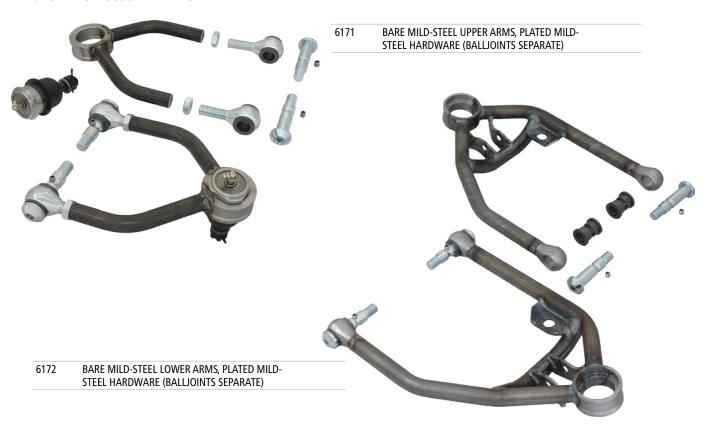


Street-Machine A-Arms

■ Black Powder-Coated Steel A-Arms



■ Bare-Finish Steel A-Arms



g-Machine Adjustable A-Arms

g-Machine A-Arms

Chassisworks' g-Machine A-arms are designed for ultimate-performance-handling vehicles using our g-Machine crossmember system with VariShock coil-overs or air-spring suspension.

Self-lubricated polymer pivot bearings and cross-braced tubular design enable predictable handling and effective suspension tuning with very little maintenance, thanks to minimal linear resistance, zero deflection, and extremely low rate of wear.

Press-fit pivot bearings and heavy-duty screw-in balljoints allow the A-arm to be easily rebuilt if ever needed. g-Machine A-arms feature massive 1 or 1-1/4 x .156"-wall legs with 7/8 x .156"-wall cross braces. Tubes are mandrel-bent, are made of mild-steel round tubing, and create an extremely rigid, triangulated

component durable enough for regular track use. With the aid of a fixture, tubes are seated into recessed faces along the billet balljoint housing to create a high-strength, interlocking, TIG-welded joint that angles the balljoint and ensures bind-free operation. Billet balljoint housings feature an exterior groove to enhance appearance and reduce weight.

- Large-diameter, tubular cross-braced design
- TIG-welded, .156"-wall, mild-steel construction
- Allows use of VariShock coil-overs or air-spring suspension
- Easily replaceable, heavy-duty, screw-in balljoint



g-Machine Suspension Accessories

■ Shock-Mount Fasteners

We have three styles of shock-mount fasteners for our street-machine front suspension. The shock spuds are CNC-machined from stainless-steel billet. The male-and-female design allows the two halves to be tightened completely, providing the correct amount of crush on the shock's urethane bushings and sleeves. The internal hex machined into the end makes tightening easy. Polished finish assures a great, long-lasting appearance. Also available are stainless-steel Allen bolts or Grade-8 hex bolts.

3043	SHOCK MOUNTING HARDWARE, GRADE 8 HEX-HEAD CAP SCREWS, YELLOW ZINC	
3044	SHOCK MOUNTING HARDWARE, SOCKET-HEAD CAP SCREWS, STAINLESS STEEL	
3045	SHOCK MOUNTING HARDWARE, BEVELED- HEAD SPUD SET, POLISHED STAINLESS STEEL	





■ Shock Simulators

Chassisworks' shock simulators take the guesswork out of aligning your g-Machine front suspension system. The laser-cut steel links bolt in place of the VariShock coil-over or air spring. Simulators feature holes spaced at three different lengths to quickly secure the suspension at full compression, at ride height, and at full extension. This tool is not designed to carry the weight of the vehicle.

6712-12 12" RIDE-HEIGHT SHOCK SIMULATORS, STEEL (PAIR)



■ Billet Balljoint Covers

Polished, stainless-steel balljoint covers are available to add a show-quality finished look to any of our Street-Machine or g-Machine A-arms. Covers mount in place of the zerk fitting using flat-head stainless hardware and meet seamlessly with the A-arms' machined balljoint housing.

6173 BILLET BALLJOINT COVERS, POLISHED STAINLESS STEEL (PAIR)



■ Heavy-Duty Screw-In Balljoints

Sold in pairs, these premium screw-in balljoints are compatible with all Chassisworks upper and lower A-arms. Kit includes balljoints, rubber dust boots, and hardware.





Fits Street-Machine and g-Machine arms

6104 SCREW-IN BALLJOINTS WITH BOOTS AND HARDWARE (PAIR)

■ Balljoint Wrench

Our zinc-plated, laser-cut steel balljoint wrench takes the hassle out of dealing with the uncommon OEM square-drive feature of screw-in balljoints.

6711 SCREW-IN BALLJOINT WRENCH, ZINC-PLATED STEEL



g-Machine Spindle Options

g-Machine Sculpted Spindles

Designed for Chassisworks' q-Machine crossmember system, our sculpted, two-piece spindle provides reliable and predictable performance for everyday street or road-handling use. Spindles feature a 2"-dropped ride height and are taller than commonly used OEM spindles, providing a lower center of gravity and a quicker camber curve for improved cornering traction. High-strength ductile iron, cast exclusively for Chassisworks by a foundry with over 50 years of spindlemaking experience, enables excellent strength-to-weight ratio through design flexibility and efficiency not possible with machined or welded designs. Specifically curved surface transitions throughout the integrated steering arm, caliper mount, and upright body were designed using state-of-theart finite element analysis (FEA) software to eliminate stress concentrations while significantly improving strength and durability. Mounting bosses and tapered bores are machined into the raw spindle castings using our fully automated, CNC horizontal machining center to ensure spindle geometry is absolutely correct. Spindle axles are machined from special high-strength alloy steel (Tensile 150,000 psi), then inserted into the machined upright forming an inseparable shrink-fit pressed assembly. Recommended brakes for use with sculpted



spindles are the unvented 11-3/4" mediumduty (8336), vented 11-3/4" heavy-duty (8320), and g-Street 13" (8322) or g-Street 14" (8323) directional-vane-rotor brake kits. Spindles accept large 1.378"-inner and 0.866"-outer wheel bearings and ship with bare or blackpowder-coat finish and necessary hardware.



6174	SCULPTED SPINDLES, G-MACHINE CROSSMEMBER SYSTEM, PLAIN FINISH (PAIR)
6186	SCULPTED SPINDLES, G-MACHINE CROSSMEMBER

■ Fabricated Drag Race Spindles

Chassisworks offers an extremely lightweight (6.56 lb), fabricated, chrome-moly spindle for weight-sensitive, drag race g-Machines with a crossmember and skinny tires (not recommended for street use). The use of finite element analysis (FEA) software enabled selective removal of excess material to reduce weight without decreasing strength or reliability. Our final design was first computer stress-tested for durability, then thoroughly physically tested prior to production. Components are CNC-machined with interlocking features, then fixture TIGwelded to ensure broad stable contact surfaces, consistent quality welds, and correct spindle geometry. Spindle uprights are 1-1/2" x .250"-wall chrome-moly tubing and provide an extremely rigid and lightweight structural base for the remaining components. Balljoint-boss material thickness is increased at the overhanging end to establish a deeper bore with a larger taper contact area. Steering arms are a stout 1/2" thick with large machined pockets and 1/2" threaded outer-tie-rod hole for use with our threadedstud bump-steer kit (6167). The brake caliper mount is integrated into the welded spindle assembly, simplifying installation and eliminating any additional weight from adapter brackets or hardware. Geometry is borrowed from our performance-bred



for proven, responsive, and predictable steering characteristics. Recommended brakes for use with

fabricated spindles are unvented 11-3/4" medium-duty (8336) or vented 11-3/4" heavy-duty (8337) kits. Spindles accept large 1.378"-inner and 0.866"-outer wheel bearings and ship with black-powder-coat finish and necessary hardware.

6166	FABRICATED DRAG-RACE SPINDLES, G-MACHINE CROSSMEMBER SYSTEM, BLACK-POWDER-COAT FINISH (PAIR)
6167	BUMP-STEER-OUTER TIE-ROD SET FOR FABRICATED SPINDLE

g-Street[™] - 11-3/4" - 4-Piston

Chassisworks' designed and manufactured front disc brake kit features fixed, four-piston, forged-aluminum Wilwood calipers and 11.75 x .81" vented rotors with integrated hats and billet aluminum hubs. The bolt-together hub and rotor assembly allows worn or damaged components to be replaced easily and economically. Rotors are uncoated and feature a slot-grooved abrasion surface to wipe the pads free of debris, reduce pad float if overheated, and enhance appearance. Our enhanced-friction ceramic-

> life, with low noise and brake-dust levels for performance driving applications. The kit is designed for use with q-Machine fabricated or sculpted spindles, or applications listed

formula brake pads provide smooth engagement and long service

below and requires 15" or larger wheels.



Wilwood's Forged Dynalite (FDL) four-piston, aluminum, lug-mount caliper is used for its light weight (4.06 lb), superior rigidity, and enhanced braking performance and pedal feel. The calipers use a closed-end, internal fluid passage design that is further strengthened by four steel bridge bolts extending through

the caliper body. Stress flow forging and smooth surface

transitions help eliminate stress points and reduce overall caliper deflection. FDL calipers use one-piece, 1.75"-diameter, stainless-steel pistons and high-temperature, square-faced bore seals. Stainless steel slows heat transfer to the brake fluid and improves the system's resistance to heat-induced pedal fade. This reduction in heat also increases the service life of the fluid and seals. The four individual pistons apply pressure against both sides of the rotor. Caliper fluid requirements are matched to the output capabilities of commonly used factory master cylinders, ensuring comfortable performance in a wide range of applications. The Dynalite calipers are troublefree and service-friendly. Vibration-dampening stainless-steel bridge-plate inserts protect the caliper body from wear caused by pad movement, greatly extending service life. Two-piece bleed screws are easily accessed at each corner of the caliper body and eliminate direct wear to the aluminum body. Brake pads are also easily changed by simply removing the retaining pin and sliding the pads out.

High-Performance Rotors

The kit comes standard with vented, slot-grooved-surface rotors measuring 11.75 x .81". Rotors are available bare uncoated or with black E-coat finish and feature an integrated raised hat, increasing heat capacity to withstand extreme operating temperatures for extended periods of time; ideal for highperformance applications. To maximize cooling surface area, 32 individual air passages are cast internally into each rotor. Air passages or vents offer increased airflow and cooling capability over standard unvented rotor

designs. The slotted surface grooves improve padtorotor contact by wiping the pad clean of debris and allowing brake dust and gases to be easily exhausted if the pads are overheated.

Billet Aluminum Hub

Billet aluminum hubs reduce unnecessary weight and allow components to be easily replaced if damaged or worn. Hubs are silveranodized machine finished with matching screwon, O-ringed cap to prevent oxidation and resist scratching. Assemblies include both 4-1/2" and 4-3/4" five-lug bolt patterns with 1/2 x 2-1/4" wheel studs or optional 1/2 x 3" studs. Wheel bearings and seals also included.

8320	11-3/4" FRONT BRAKES FOR G-MACHINE SCULPTED SPINDLES
8327	11-3/4" FRONT BRAKES FOR '71-80 PINTO/MUSTANG II SPINDLES
83321, 2	11-3/4" Front Brakes for '67-69 Camaro, '64-72 Chevelle, AND '64-72 Chevy II/Nova
8337	11-3/4" FRONT BRAKES FOR FABRICATED SPINDLES
8362 ²	11-3/4" FRONT BRAKES FOR '65-66 IMPALA/BISCAYNE SPINDLES
OPTIONS	BLACK E-COAT FINISHED ROTORS
	RED-FINISH CALIPERS
	POLISHED-FINISH CALIPERS
	POLISHED-FINISH HUBS
	3"-LONG WHEEL STUDS
WW 150-8850K	REPLACEMENT PAD SET, STREET/STRIP STANDARD, BP-10 COMPOUND, 100-1000 F°
NOTES	INCLUDES BARE ROTOR, MATTE-BLACK CALIPERS, AND CLEAR-ANODIZED HUBS
	1 - 1964 SPINDLE REQUIRES SIMPLE MODIFICATION.
	2 - HUB INCREASES TRACK WIDTH 3/4" PER SIDE.

g-Street™ 13" - 4-Piston

g-Street™ 13 features rear-mounted, fixed, four-piston calipers and 13" directional vaned, slotted, cross-drilled, black e-coated rotors with billet aluminum hats and hubs. The bolt-together hat/hub-rotor assembly allows worn or damaged components to be replaced easily and economically. Our enhanced-friction ceramic-formula brake pads provide smooth engagement, long service life, and low noise and light brake dust levels for performance driving applications. The kit is designed for use with Chassisworks' exclusive Street-Machine spindles and is an excellent upgrade for vehicles equipped with 17" or larger wheels.

Billet DynaPro Radial-Mount Caliper

g-Street™ 13 uses Wilwood's DynaPro four-piston, billet aluminum, radial-mount caliper for its superior rigidity, and enhanced braking performance and pedal feel. These calipers use a closed end, internal fluid passage design that is further strengthened by four steel bridge bolts extending through the caliper body. Smooth surface transitions help eliminate stress points and reduce overall caliper deflection. The DynaPro caliper uses lightweight, coated aluminum pistons and high-temperature rubber boots to seal out debris from the piston bores. The total seal

design reduces unnecessary wear, increasing the service life of the pistons. The four individual pistons apply pressure against both sides

of the rotor. Caliper fluid requirements are matched to the output capabilities of commonly used factory master cylinders, ensuring comfortable performance in a wide range of applications. The DynaPro calipers are trouble-free and service-friendly. Vibration-

dampening stainless-steel bridge plate inserts protect the caliper body from wear caused by pad movement, greatly extending service

life. Two-piece bleed screws are easily accessed

at the top of each side of the caliper body and eliminate direct wear to the aluminum body. Brake

pads are also easily changed by simply removing the

center bridge bolt and sliding the pads out.



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g-Street™ 13 features a directional-vaned, cross-drilled, slotted, black e-coated rotor measuring 12.90 x 1". To maximize cooling surface area, forty-eight individual air passages are cast internally into the rotor. Air passages or vanes are directional and curved for increased airflow over standard straight vented rotor designs. The slotted surface and cross-drilled holes improve pad-to-rotor contact by wiping the pad clean and allowing brake dust and gases to be easily exhausted. Rotors are coated to prevent rust on internal and external rotor surfaces.

Billet Aluminum Hat and Hub

Separate billet aluminum hats and hubs reduce unnecessary weight and allow components to be easily replaced if damaged or worn. Hats use a solid-wall, concave design to improve rotor stability. Their black-anodized finish prevents oxidation and resists scratching. Rotors and hats are secured by aircraft quality typics point flagged helts and locking puts in a typics helt.

by aircraft-quality twelve-point flanged bolts and locking nuts in a twelve-bolt configuration. Hubs are available in silver anodized matte or polished finishes with matching screw-on cap with 0-ring seal. Assemblies include both 4-1/2" and 4-3/4" five-lug bolt patterns with 1/2 x 2-1/4" wheel studs or optional 1/2 x 3" studs. Timken® tapered wheel bearings also included.

8322	G-STREET 13 (COMPLETE KIT)
OPTIONS	POLISHED HUBS
	WITHOUT HUBS (UPGRADE KIT)
	RED POWDER-COATED CALIPERS

g-Street™ 14" - 6-Piston

g-Street™ 14 features rear-mounted, fixed, six-piston calipers and 14″ directional-vaned, slotted, cross-drilled, black e-coated rotors with billet aluminum hats and hubs. The bolt-together hat/hub-rotor assembly allows worn or damaged components to be replaced easily and economically. Our enhanced-friction ceramic formula brake pads provide smooth engagement, long service life, and low noise and light brake-dust levels for performance driving applications. The kit is designed for use with Chassisworks' exclusive Street-Machine spindles and is an excellent upgrade for vehicles equipped with 18″ or larger wheels.

Billet SL6R Radial-Mount Caliper

g-Street™ 14 uses Wilwood's SL6R six-piston, billet aluminum, radial-mount caliper for its superior rigidity and enhanced braking performance and pedal feel. These calipers use a closed-end design that is further strengthened by five steel bridge bolts extending through the caliper body and directly across the brake pads. Smooth surface transitions help eliminate stress points and reduce overall caliper deflection. The SL6R caliper uses one-piece stainless-steel pistons and high-temperature, square-faced bore seals. Stainless steel slows heat transfer to the brake fluid and improves the system's resistance to heat-induced pedal fade. This reduction in heat also increases the service life of the fluid and seals. The

six individual pistons apply even pressure against both sides of the rotor when in motion.

Trailing-edge piston bores are larger in diameter, correcting uneven pad wear. Caliper fluid requirements are matched to the output capabilities of commonly used factory master cylinders, ensuring comfortable performance in a wide range of applications. The SL6R calipers are trouble-free and service-friendly. Vibration-dampening stainless-steel bridge-plate inserts protect the caliper

body from wear caused by pad movement, greatly extending service life. Dampened external fluid tubes are

routed through recessed pockets to keep clear of debris and reduce the potential of vibration induced wear at the fittings. Two-piece bleed screws are easily accessed at the

top of each side of the caliper body and eliminate direct wear to the aluminum body. Brake pads are also changed easily by simply removing the center bridge bolt and sliding the pads out.

SRP Drilled Performance Rotors

g-Street™ 14 features a directional-vaned, cross-drilled, slotted, black e-coat rotor measuring 14 x 1.25″. To create more surface area and maximize cooling, thirty-six individual 'I'-shaped passages are cast internally into the rotor. Air passages or vanes are directional and curved for increased airflow over standard straight vented rotor designs. The slotted surface and cross-drilled holes improve pad-to-rotor contact by wiping the pad clean and allowing brake dust and gases to be easily exhausted. Rotors are coated to prevent rust on internal and external rotor surfaces.

Billet Aluminum Hat and Hub

Separate billet aluminum hats and hubs reduce unnecessary weight and allow components to be easily replaced if damaged or worn. Hats use a solid-wall, concave design to improve rotor stability. Their black-anodized finish prevents oxidation and resists scratching. Rotors and hats are secured by aircraft quality theoly a point flanged helts and locking puts in a twelve helt.

aircraft-quality twelve-point flanged bolts and locking nuts in a twelve-bolt configuration. Hubs are available in silver-anodized matte or polished finishes with matching screw-on cap with O-ring seal. Assemblies include both 4-1/2" and 4-3/4" five-lug bolt patterns with 1/2 x 2-1/4" wheel studs or optional 1/2 x 3" studs. Timken® tapered wheel bearings also included.

8323	G-STREET 14 (COMPLETE KIT)
OPTIONS	POLISHED HUBS
	WITHOUT HUBS (UPGRADE KIT)
	RED-POWDER-COATED CALIPERS

gStreet Pro-Touring Chassis System



FRONT SUSPENSION PACKAGE

Suspension

- g-Machine Adjustable Upper Control Arms with polymer pivot bushings
- g-Machine 1-1/4" Crossbraced Lower Control Arms with polymer pivot bushings
- Billet-Aluminum Upright
- Infinitely Adjustable Bump-Steer Kit



VariShock Shock Absorbers

- 4-Way Adjustable Remote Reservoir Shocks
- Double-Adjustable Coil-Over Shocks
- Single-Adjustable Coil-Over Shocks
- VariSpring Coil Springs with choice of rate



Anti-Roll Bar

- Adjustable-rate, billet steel arms
- Lightweight gun-drilled bar
- Billet-aluminum mounts with low-friction polymer bearings
- Adjustable-length spherical-bearing endlinks



NOTE: Refer to the Custom-Fit Chassis System section of this catalog for a closer look at individual suspension and steering components.

gStreet Pro-Touring Chassis System

■ NEW PRODUCT

FRONT SUSPENSION PACKAGE

Rack & Pinion

- Power Rack and Pinion with billet-aluminum mounts
- Left- or right-hand drive versions



Brake Options

- 15 x 1.25"-wide, cross-drilled rotors with black E-coat finish
- 14 x 1.25"-wide, cross-drilled rotors with black E-coat finish
- Wilwood Aero6 6-piston, radial-mount calipers (black, red, or nickel with Thermlock® pistons)
- Baer 6S 6-piston, forged-monoblock calipers (black, red, or silver powdercoat finish)







gStreet Wide Track Arms

gStreet A-Arms

Chassisworks' gStreet A-arms are designed for ultimate-performance-handling vehicles using our g-Machine or Street-Machine crossmember system with VariShock coil-over or air suspension. Polymer pivot bearings and cross-braced tubular design provide sharp handling and effective suspension tuning, thanks to minimal resistance and deflection. Mandrel-bent, 1" and 1-1/4" main tubes with 7/8" and 1" cross braces create an extremely rigid, triangulated arm durable enough for regular track use. With the aid of a fixture, tubes are seated into recessed faces along the billet receiver or balljoint housing to form a high-strength, interlocking, TIG-welded joint.

Wide Track Arms - The gStreet A-arm and spindle system utilizes the same chassis mounts as our Street-Machine and g-Machine arms. Arm length is increased 1-1/2" to provide more gradual geometry changes throughout suspension travel. To the skilled driver this means more direct tire feedback and more linear response to steering and braking inputs under various dynamic conditions. Specific geometry changes include vastly reduced scrub radius, improved camber gain, and increased caster (8.5 degrees at center of adjustment) without altering the wheelbase.



Upper Arm

- Low-friction polymer pivot bearing
- Caster/camber adjustment coupler
- 1"-diameter tubular arm body
- 7/8"-diameter cross brace
- Billet-steel A-arm pivot stud receiver
- Tension-adjustable spherical pivot (in upright)

Lower Arm

- Tension-adjustable spherical pivot (in arm)
- Billet pivot housing with integrated gussets
- 1-1/4"-diameter tubular arm body
- 1"-diameter cross brace
- Low-friction polymer pivot bearing
- Minimum 18"-19" wheel required, depending upon wheel style

gStreet Wide Track Arms





gStreet Billet Upright and Brake Kit



BILLET-ALUMINUM UNIT-BEARING UPRIGHT WITH GSTREET LARGE-ROTOR DISC BRAKE KIT



Billet-Aluminum Upright

Engineered to work with Chassisworks bolt-on clips and 4x2" weld-in suspension crossmembers, the billet-aluminum unit-bearing upright again raises the pro-touring bar. The lightweight upright features a heavy-duty, sealed unit bearing that is both larger in diameter and considerably more reliable than the commonly used and frequently replaced Corvette components.

Bump-Steer Kit

The latest innovation from the mind of Chris Alston is our infinitely adjustable bump-steer kit with Teflon®-lined 4130 rod end. Utilizing a unique 3/4" threaded stud with locknut, the height of the pivot point can be quickly adjusted without disassembly or hasseling with shim stacks. No other adjustment mechanism is this precise.

Disc Brake Kit

Continuing down the path of bigger wheels and tires leading to better performance, Chassisworks offers a specially developed brake kit, featuring 14" or massive 15" x 1.25" rotors with radial-mount, Wilwood or Baer, 6-piston calipers in a variety of finishes and optional pad compounds.

Features/Benefits:

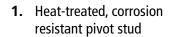
- Lightweight billet-aluminum upright with stainlesssteel tapered balljoint inserts
- Maintenance friendly, heavy-duty unit-bearing; larger and more reliable than Corvette bearing
- Unique threaded bump-steer adjustment stud with Teflon®-lined 4130 rod end
- Massive 14" and 15" x 1-1/4"-wide vented brake rotors
- Radial-mount 6-piston Wilwood calipers with optional Thermlock™ heat-barrier pistons
- Lightweight billet-aluminum hat



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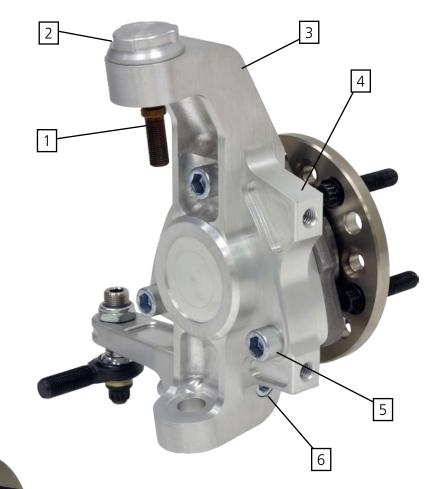
BILLET-ALUMINUM UNIT-BEARING UPRIGHT



- 2. Aluminum cap permits access to joint tension adjustment
- **3.** Lightweight billetaluminum upright
- **4.** Integrated caliper bracket mounts
- **5.** Unit-bearing hub mounting hardware

6. Steering arm cross bolt

10



- 7. Bolt Circles: 5 on 4-3/4", 5 on 4-1/2" with 1/2-20 x 2-1/4"-long wheel studs
- **8.** Cross-bolted steering arm with locating pin feature
- **9.** Infinitely adjustable bumpsteer outer tie-rod
- **10.** Heavy-duty, sealed, tapered roller bearing hub assembly with precision bearings

5737-SM1-1 UPRIGHT (5 ON 4-1/2" BOLT CIRCLE) RODEND ARM GM
CHASSISWORKS CLIPS, ALUMINUM BODY WITH UNIT-BEARING
SPINDLE INCLUDES STEERING ARM WITH THREADED BORE FOR 5/8"
RODEND-STYLE TIEROD END

5737-SM1-2 UPRIGHT (5 ON 4-3/4" BOLT CIRCLE) RODEND ARM GM
CHASSISWORKS CLIPS ALUMINUM PODY WITH UNIT BEARING

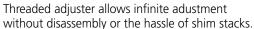
CHASSISWORKS CLIPS, ALUMINUM BODY WITH UNIT-BEARING
SPINDLE INCLUDES STEERING ARM WITH THREADED BORE FOR 5/8"
RODEND-STYLE TIEROD END

NOTE MINIMUM RIM SIZE 18" DIAMETER, DEPENDING ON WIDTH, TO ACCOMMODATE BRAKE ROTOR.

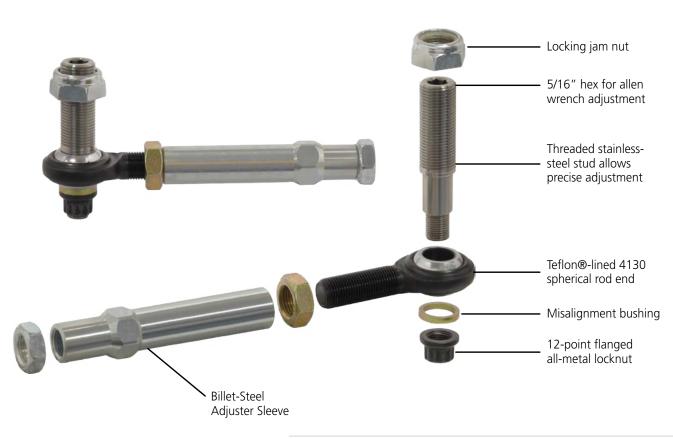
gStreet Threaded Bump-Steer Kit

■ INFINITE ADJUST BUMP-STEER KIT









5736-75-56 THREADED BUMPSTEER ADJUSTER AND ROD END TIEROD WITH BILLET ADJUSTING SLEEVE. FOR USE WITH CHASSISWORKS BILLET UPRIGHTS WITH 3/4-16 THREAD STEERING ARMS

gStreet 14" and 15" Front Brake Kits ■ NEW PRODUCT

gStreet brake kits for Chassisworks billet upright feature rear-mounted, radial mount, six-piston calipers and 14" or 15" directional-vaned rotors with billet aluminum hats. The bolt-together hat-rotor assembly allows worn or damaged components to be replaced easily and economically. Enhanced-friction ceramic-formula brake pads provide smooth engagement, long service life, low noise, and light brake-dust levels for performance driving applications; performance specific pads also available for autocross and road race applications. The kit is designed for use with Chassisworks' exclusive gStreet billet-aluminum uprights for vehicles equipped with Chassisworks' bolt-on front clips or weld-in 4 x 2" crossmembers, clips, and frames. Fourteen- and fifteeninch rotors require 18" and 19" wheels respectively. Includes SRP drilled (black e-coated) rotors, Wilwood calipers (black, red or nickle finish) with optional Thermlock[™] heat-barrier pistons, or Baer one-piece calipers.





Features/Benefits:

- 14" and 15" cross-drilled and vented rotors with black e-coat finish
- Wilwood Aero6 6-piston, radial-mount calipers; black, red or nickel finish with Thermlock® pistons
- Optional Wilwood brake pad compounds
- Baer 6S 6-piston, radial-mount calipers

8377	GSTREET 14" SRP ROTORS, 6-PISTON AERO6 CALIPERS (BLACK OR RED)	
8378	GSTREET 15" SRP ROTORS, 6-PISTON AERO6 CALIPERS (BLACK OR RED)	
OPTIONS	BLACK OR RED POWDER-COAT FINISH CALIPERS	
	NICKEL-COATED CALIPERS WITH THERMLOCK™ HEAT-BARRIER PISTONS	
	STREET AND PERFORMANCE SMART PAD (LOW NOISE, LIGHT DUST)	
	AUTOCROSS SPECIFIC PAD COMPOUND	
	ROAD RACE SPECIFIC PAD COMPOUND	
NOTES	FITS gSTREET BILLET-ALUMINUM UPRIGHT FOR CHASSISWORKS CROSSMEMBER SYSTEMS ONLY.	

gStreet 14" and 15" Front Brake Kits ■NEW PRODUCT

WILWOOD AERO6 6-PISTON CALIPERS

The Aero6 six-piston caliper delivers heavy duty stopping power for the road or track. The caliper incorporates race technology into a body design with widespread adaptability. Radial mounting and a rotor diameter range from 14.00" to 15.00" give this caliper the versatility necessary to suit all types of heavy weight braking requirements. Available in black or red powder coat finish, or optional nickel finish with Thermlock™ heat-barrier pistons.

Wilwood ThermLock® Pistons (Nickel-coated caliper only)

Thermlock® pistons block heat transfer from the pads and reduce temperatures in the caliper, fluid, and seals by up to 25% over standard stainless steel pistons. These are the go-to calipers for all types sustained hard braking on a wide range of autocross, rally and road course applications.



Brake Pad Compounds







The standard street and performance pads included with the gStreet brake kits are suitable for everyday use and occassional performance driving. We recommend upgrading pad compounds for regular autocross and road race use.



Brake Pad Compounds

STREET/PERFORMANCE	LOW NOISE AND DUST LEVELS
AUTOCROSS	AGGRESSIVE GRIP AT AMBIENT TEMPERATURE
ROAD RACE	AGGRESSIVE GRIP WITH HIGHER TEMPERATURE RANGE

BAER 6S 6-PISTON FORGED-MONOBLOCK CALIPERS

The Baer 6S is a forged-monoblock 6-piston caliper for pro-touring projects that need race car performance. To maximize strength the 6S caliper is machined from a single aluminum-alloy forging and utilizes an external crossover tube. Calipers feature stainless steel pistons, noise suppression springs, and staggered piston sizes to minimize pad wear. Available in red, black or silver powder-coat finish.





gStreet 14" and 15" Front Brake Kits ■ NEW PRODUCT

SRP DRILLED PERFORMANCE ROTORS

qStreet brake kits feature directionalvaned, cross-drilled rotors measuring 14" or 15" x 1.25"-wide. To create more surface area and maximize cooling, individual passages are cast internally into the rotor. Air passages or vanes are directional and curved for increased airflow over standard straight vented rotor designs. The slotted surface and cross-drilled holes improve pad-torotor contact by wiping the pad clean and allowing brake dust and gases to be easily exhausted. Rotors are black e-coated to prevent rust on internal and external rotor surfaces.



14" and 15" rotors for big-tire, high-performance **Pro-Touring builds**

gStreet 15"



15 x 1.25"

gStreet 14"



14 x 1.25"



The new 15" front brake kit for Chassisworks gStreet front clip systems.

g-Machine Anti-Roll Bars

■ Anti-Roll Bars for g-Machine A-Arms

Our street/track performance g-Machine anti-roll bar offers substantially increased stiffness and flatter cornering over our standard Street-Machine component. Kits are designed for Chassisworks direct-fit Camaro and Chevy II or custom 30" and 33" g-Machine crossmember systems equipped with g-Machine A-arms. Anti-roll bars are 24 to 38 x 1 x .188"-wall, 4130 chrome-moly tubing with relatively short lever arms to achieve comparable performance to solid 1-1/8" to 1-1/4" factory replacement bars at a fraction of the weight. Teflon® race, spherical-bearing, end-link assemblies create deflection-free pivot points with minimal-resistance and enable the anti-roll bar's effects to be immediate, more linear, and predictable. End-link

length is also adjustable to eliminate static preload and ensure balanced handling. Polished, billet aluminum clamps mount the anti-roll bar to the factory-welded crossmember mounts and are securely held by 3/8" sockethead bolts. Graphite-impregnated,



black-urethane chassis bushings improve lubrication and isolate the anti-roll bar at the frame mounts. g-Machine anti-roll bars ship as complete kits with matte-black, powder-coat finish; alloysteel zinc-plated hardware; and temperature-stable, chemicalresistant, Teflon® grease.



■ Anti-Roll Bars for Street-Machine A-Arms

Suitable for street/strip performance vehicles, our tubular anti-roll bars for g-Machine crossmember systems equipped with Street-Machine A-arms offer increased stiffness with less body roll than standard OEM suspensions. Anti-roll bars are constructed from 0.120"-wall, 4130 chrome-moly tubing with relatively short lever arms to provide large-diameter stiffness and performance in a much smaller, lighter-weight component. Threaded adapters are welded at each end to provide a positive stop for 3/8" button-head bolts and ensure bushings are correctly preloaded. Polished, billet aluminum clamps mount the anti-roll bar to the factory-welded crossmember mounts and are securely held by 3/8" socket-head

bolts. End links are a unique, billet steel component with an eye-style upper mount to allow unrestricted bar rotation and a stem-style lower end to better dampen vibration. Graphite-impregnated, black urethane bushings are used throughout to improve



lubrication and isolate the anti-roll bar at the frame mounts and end links. Street-Machine anti-roll bars ship as complete kits with gloss-black powder-coat finish; stainless-steel hardware; and temperature-stable, chemical-resistant, Teflon® grease.



Billet Gun-Drilled Anti-Roll Bar

■ NEW PRODUCT

■ Gun-Drilled Splined-End Anti-Roll

Our street/track performance gStreet anti-roll bar offers substantially increased stiffness and flatter cornering over our standard Street-Machine component. Kits are designed for Chassisworks direct-fit Camaro and Chevy II or custom 30" and 33" g-Machine crossmember systems equipped with g-Machine A-arms. Anti-roll bar manufacturing begins with 1.25"OD alloy steel bar, which is then gun-drilled to significantly reduce weight. The billet lever arms feature multiple endlink mounting holes for a total of six different spring rates and are secured by a single-split splined collar clamp integrated into the arm. Teflon® race, spherical-bearing, end-link assemblies create deflection-free pivot points with minimalresistance and enable the anti-roll bar's effects to be immediate, more linear, and predictable. End-link length is also adjustable to eliminate static preload and ensure balanced handling. Billet aluminum bearing housings mount the anti-roll bar to the factorywelded mounting blocks and are securely held by 3/8" socket-head bolts. Low-friction polymer bearings allow the bar to pivot freely without introducing off-axis free play. Anti-roll bars ship as complete

Features/Benefits:
ine A-arms.
teel bar,
The billet
a total of

Features/Benefits:

1-1/4"-OD heat treated, alloy steel bar
Billet-steel splined arms with multiple endlink positions
Six-different stiffness settings

Spherical bearing end links with Teflon lined races

Fits 1967-81 Camaro and 1962-72 Nova with Chassisworks q-Machine Clips

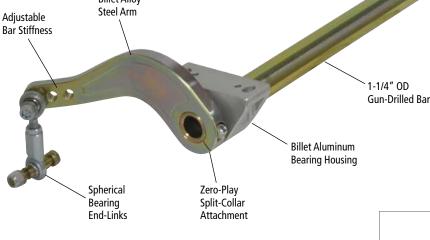
Billet-aluminum bearing housings

Low-friction polymer bearings

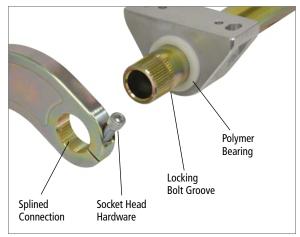
Zinc-plate or anodize finish











Billet Manual Rack and Pinion

A common issue with many custom steering and suspension conversions is achieving correct steering geometry using the limited selection of OEM and aftermarket rack and pinions. To solve this problem the g-Machine front-steer, manual rack and pinion can be sized from 15.5" to 29.5" (measured from

inner tie-rod pivots), in one-inch increments, without affecting rack travel, steering effort, or reliability. This enables correct steering geometry for vehicles ranging from compacts to full-size pickups and allows the assembly to serve as a direct-replacement upgrade for 24.5" Mustang II racks.



Note: "XXX" in rack-and-pinion part number specifies length (i.e., 155 = 15.5")

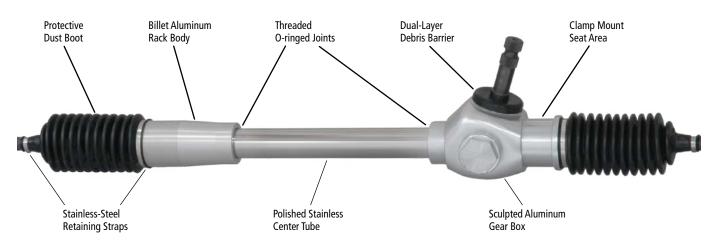
Rack-and-Pinion Body

Satin-Finish Rack

The rack-and-pinion main body is made up of three components threaded together at O-ring—sealed joints to create a rigid, lightweight structure. A sturdy, polished, stainless-steel center tube connects the gear box to the outer body and features a smaller diameter for additional harmonic-balancer clearance. The gear box and opposite-end rack body are CNC-machined from aluminum to increase wall thickness for added strength directly under the rack mounting clamps without excessive weight.

Unique Sculpted Gear Box

A sculpted-surface gear box shape was developed through the use of finite element analysis (FEA) software to eliminate fatigue points, minimize gear box deflection, and provide an attractive modernized appearance. Due to the complexity in engineering and machining this component, most manufacturers are limited to inferior cast or simple geometric designs. To attach the protective rubber boots at each end of the rack assembly, external grooves are present for slip-proof installation and easy replacement if ever necessary.



Billet Manual Rack and Pinion

Internal Components

The helical-cut pinion gear and rack shaft are supported by a combination of low-friction, polymer bushings and roller bearings for smooth gear engagement and extended service life. A spring-loaded gear-lash mechanism enables precise and predictable "zero-play" steering with no need for future adjustment. Tie-rods are screwed directly into the rack gear and locked using crush tabs to prevent loosening. During final assembly all internal components are thoroughly lubricated and the rack completely sealed to prevent contaminants from entering.

When used with Chassisworks sculpted or fabricated spindles, the complete system provides a comfortable balance of responsiveness and steering effort. The rack features four turns lock to lock with 5.25" of travel. To reduce wear, internal stops prevent unnecessarily loading the tie-rod pivots. Connecting the rack and pinion requires a 3/4" 36-spline universal joint and 9/16"-18 female-thread tie-rods or bumpsteer adjusting sleeves. For a high-quality appearance, center tubes are polished stainless steel with billet aluminum rack-body components available in anodized-satin or polished finishes.

■ Manual Rack-and-Pinion Billet Mounts, g-Machine

To aid rack-and-pinion installation into various projects, two styles of billet aluminum mounting brackets are available: the standard Chassisworks solid mount, which uses our slot-tab positioning method for perfect alignment with the factory-welded g-Machine crossmember, and the Mustang II urethane-bushing mount, which when used with our 24.50" rack mimics the OEM Mustang II rack-and-pinion enabling direct replacement, but also greatly simplifies custom installations. Mount bases and outer clamps are 1.20" wide and seat into mating grooves at the widest portion of the rack body, forming a broad, deflection-free mount assembly that completely prevents the rack from shifting. Mount sets include clamp hardware and are available in silver-anodized satin or polished finishes.

Rack-and-Pinion Specific Dimensions

<u>-</u>		
Feature	Specification/Dimension	
Inner-Tie-Rod Thread	9/16"-18 RH Male	
Inner-Tie-Rod Length ¹	10.135"	
Rack Travel	4 turns lock to lock, 1.31" per turn, 5.25" total travel	
Input Shaft	3/4"-36 Spline	
Tie-Rod Assembly Length ²	13.283"	
Overall Rack Width (no outer tie-rods)	Rack Size + 20.25" (i.e., 24.5" rack + 20.25" = 44.75")	
Overall Rack Width (with outer tie-rods)	Rack Size + 26.50" (i.e., 24.5" rack + 26.50" = 51.00")	
Mustang II Mount Width ³	Rack Size – 8.5" (i.e., 24.5" rack – 8.5" = 16.00")	
	n	

Notes:

- 1 Measured from tie-rod pivot center to end of threaded shaft.
- 2 Measured from center of inner- and outer-tie-rod pivots.
- 3 Measured from center of each mounting hole. Mounts are offset $0.75^{\prime\prime}$ toward driver's side.



g-Machine Mounts

6176-1	MOUNT SET FOR G-MACHINE CROSSMEMBER, SATIN FINISH
6176-2	MOUNT SET FOR G-MACHINE



■ Mustang II Mounts

6187-1	MOUNT SET FOR MUSTANG II
	CROSSMEMBER, SATIN FINISH
6187-2	MOUNT SET FOR MUSTANG II
	CROSSMEMBER, POLISHED FINISH



g-Machine Power Rack and Pinion

The g-Machine front-steer power rack and pinion provides responsive steering with excellent driver feedback as a direct bolt-on for Chassisworks g-Machine 30", 33", Chevy II, and Camaro crossmember systems. To increase durability, performance, and reduce deflection, the rack body, control

servo, and hard lines are constructed from steel. Hard lines are routed tightly against the rack body and low-profile, rotatable banjo fittings are used exclusively at the control servo to better package the rack for installation.

■ Left-Hand-Drive Racks



■ Right-Hand-Drive Rack



Common Specifications

F	eature	Specification/Dimension
Rack Trave	el .	3 turns lock to lock, 1.8" per turn, 5.375" total travel
Inner-Tie-F	Rod Thread	9/16-18 RH Male
Inner-Tie-F	Rod Length ¹	10.135"
Tie-Rod As	sembly Length ²	13.283"
Input Shaf	t	16.8-mm DD
Hydraulic	Fittings	-6 AN (pressure and return)
Pump Flow Rate		Recommended 1.0 - 1.5 gpm (3.8 - 5.7 lpm)
Notes	1 - Measured from tie-rod pivot center to end of threaded shaft.	
2 - Measured from center of inner- and outer-tie-rod pivots.		om center of inner- and outer-tie-rod pivots.

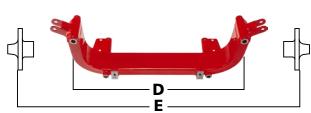
Specific Rack Dimensions

Callout	Feature	6140-215-X	6140-245-X
Α	Inner Pivot Width	21.50"	24.50"
В	Overall Rack Width (no outer tie-rods)	41.75"	44.75"
С	Overall Rack Width (with outer tie-rods)	48.00"	51.00"

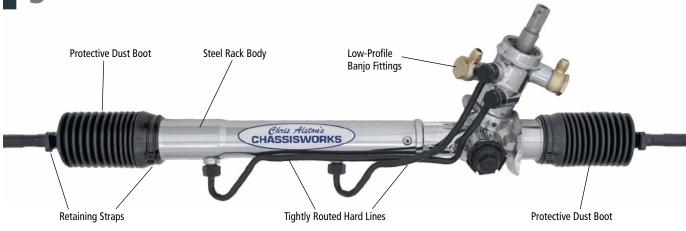
g-Machine Crossmember Dimensions

Callout	Feature	6140-215-X	6140-245-X
D	g-Machine Crossmember Width	30"	33"
E	Hub-to-Hub Width	57"	60"





g-Machine Power Rack and Pinion



Internal Components

For smooth gear engagement and extended service life, helical-cut rack-and-pinion gears are guided by a combination of low-friction, polymer bushings and roller bearings. A gearlash mechanism enables precise and predictable "zero-play" steering with no need for future adjustment. Tie-rods are screwed directly into the rack gear and locked using crush tabs to prevent loosening. During final assembly all internal components are thoroughly lubricated and durable rubber

boots attached to completely seal the rack and prevent contaminants from entering. Connecting the rack and pinion requires a 16.8-mm DD universal joint, 9/16"-18 female-thread tie-rods or bumpsteer adjusting sleeves, and -6 AN high-pressure hose ends. Kits are available with black-powder-coat-finished rack and anodized-satin-finished mounts or chrome-plated rack with polished mounts.

■ Power Rack-and-Pinion Billet Mounts

Our unique clamping installation method enables the rack to be rotated within its mounts to adjust steering-shaft clearance and universal-joint angles. The solid billet aluminum base-and-clamp assembly uses our slot-tab positioning

method for perfect alignment with the factory-welded g-Machine crossmember. Once tightened into mating grooves at the widest portion of the rack body, the deflection-free mount completely prevents the rack from shifting.



Slot-Tab Technology, Interlocking Joint



Pinion Rotated **Up**



Pinion Rotated **Down**

■ Billet Mounts for 21.5" Power Rack

6139-215-1	MOUNT SET FOR 21.5" RACK, SATIN FINISH
6139-215-2	MOUNT SET FOR 21.5" RACK, POLISHED FINISH





■ Billet Mounts for 24.5" Power Rack

6139-245-1	MOUNT SET FOR 24.5" RACK, SATIN FINISH
6139-245-2	MOUNT SET FOR 24.5" RACK, POLISHED FINISH





g-Machine-System Power Steering Pump

Built upon a lightweight, aluminum-bodied power-steering pump, Chassisworks g-Machine system offers versatility in a variety of engine and performance applications. The GM-style pump is a direct bolt-on for LS-series engines and can be easily installed on small-block or big-block Chevy engines using the included billet mounting bracket and spacers. Pumps are available with a compact integrated plastic reservoir or with a remote-mounted, polished billet-aluminum reservoir. V-belt or serpentine polished pulleys can also be selected with either pump style.

■ Remote-Reservoir Power-Steering Pump Kit

6138 REMOTE-RESERVIOR POWER STEERING PUMP INCLUDES PUMP WITH PULLEY, ENGINE MOUNTING
BRACKET AND BILLET REMOTE RESERVIOR

OPTIONS LS1 MOUNTING OPTION

SMALL-BLOCK CHEVY OR BIG-BLOCK CHEVY MOUNT
6 X 6" UNIVERSAL MOUNTING BRACKET BLANK
(REQUIRES MACHINING)
5" V-BELT PULLEY
4-7/8" SERPENTINE PULLEY

STAINLESS-TEFLON® HOSE KIT

5720-001 FITTING SET, 16MM AND 18MM O-RING TO -6 AN



5720-001 - O-ring to -6 AN adaters for use with steering boxes



■ Integrated-Reservoir Power-Steering Pump Kit

6137	INTEGRATED-RESERVOIR POWER STEERING PUMP - INCLUDES INTEGRAL PLASTIC RESERVIOR PUMP WITH PULLEY AND ENGINE MOUNTING BRACKET.
OPTIONS	LS1 MOUNTING OPTION
	SMALL-BLOCK CHEVY OR BIG-BLOCK CHEVY MOUNT
	6 X 6" UNIVERSAL MOUNTING BRACKET BLANK (REQUIRES MACHINING)
	5" V-BELT PULLEY
	4-7/8" SERPENTINE PULLEY
	STAINLESS-TEFLON® HOSE KIT
5720-001	FITTING SET, 16MM AND 18MM O-RING TO -6 AN



5720-001 - O-ring to -6 AN adaters for use with steering boxes



g-Machine-System Tie-Rod Sets

g-Machine Standard Tie-Rods

OEM-quality, outer tie-rod set connects the Chassisworks billet manual or power rack and pinion to the g-Machine sculpted or Mustang II-style spindles. The fixed-height pivot position is optimized for non-aggressive alignment settings of street-driven vehicles. Toe adjustments require detaching the tie-rod from the spindle's steering arm. Final setting is locked by a single, zinc-plated jam nut at each tie-rod. Tie-rods feature a paintable, bare-metal finish and ship with durable rubber boots, grease zerk fittings, and necessary hardware.

6177	OUTER TIE-ROD SET FOR CHASSISWORKS' SCULPTED SPINDLE, 5" LENGTH
6118	OUTER TIE-ROD SET FOR MUSTANG II STEERING-ARM TAPER, 3.4" LENGTH



g-Machine Bump-Steer Sets

Chassisworks' bump-steer kit replaces the standard outer tie-rod with an adjustable billet steel sleeve and a high-strength, Teflon®-lined, 4130-body rod end. The tapered or 1/2" Grade 8 stud, along with a selection of shims, enables vertical adjustment of the outer pivot point at the steering arm. This lets you correct unwanted toe-in changes during suspension travel when working with performance alignment settings, while maintaining steering predictability. The seamless sleeve features a 7/8" hex to facilitate precise toe adjustment and tightening of the zinc-plated jam nuts. Kits are for use with Chassisworks' billet manual or power rack and pinions with g-Machine sculpted or fabricated dropped spindles, and they ship with necessary hardware.

6151	BUMP-STEER-OUTER TIE-ROD SET FOR CHASSISWORKS SCULPTED SPINDLE	
6167	BUMP-STEER-OUTER TIE-ROD SET FOR CHASSISWORKS FABRICATED SPINDLE	





Steering Universal Joints



6101 MIL-SPEC U-JOINT, DUAL 3/4" BORES, 7/8" OD



6197	U-JOINT, 3/4" X 3/4" BORE, PIN & BLOCK
6198	U-JOINT, 9/16"-26 X 3/4" BORE, PIN & BLOCK



3128-ALS-0934	U-JOINT (42°), 9/16"-26 X 3/4"-36, ALUMINUM
3128-ALS-3434	U-JOINT (42°), 3/4"-36 X 3/4"-36, ALUMINUM
NOTE	ALUMINUM U-JOINTS ARE FOR DRAG-RACE VEHICLES ONLY



3128-CDS-3034	DUAL U-JOINT (70°), 3/4"-20 X 3/4"-36, STEEL
3128-CDS-3049	DUAL U-JOINT (70°), 3/4"-20 X 3/4"-DD, STEEL
3128-CDS-3409	DUAL U-JOINT (70°), 3/4"-36 X 9/16"-26, STEEL
3128-CDS-3434	DUAL U-JOINT (70°), 3/4"-36 X 3/4"-36, STEEL
3128-CDS-3449	DUAL U-JOINT (70°), 3/4"-36 X 3/4"-DD, STEEL
3128-CDS-4949	DUAL U-JOINT (70°), 3/4"-DD X 3/4"-DD, STEEL



3128-CVS-3409	ISOLATER 3/4"-36 X 9/16"-26, PLAIN STEEL
3128-CVS-3449	ISOLATER 3/4"-36 X 3/4"-DD, PLAIN STEEL
3128-CVS-4909	ISOLATER 3/4"-DD X 9/16"-26, PLAIN STEEL
3128-CVS-4930	ISOLATER 3/4"-DD X 3/4"-20, PLAIN STEEL
3128-CVS-4934	ISOLATER 3/4"-DD X 3/4"-36, PLAIN STEEL



3128-CNS-3409	U-JOINT (35°), 3/4"-36 X 9/16"-26, STEEL
3128-CNS-3418	U-JOINT (35°), 3/4"-36 X 5/8"-36, STEEL
3128-CNS-3431	U-JOINT (35°), 3/4"-36 X 3/4"-30, STEEL
3128-CNS-3434	U-JOINT (35°), 3/4"-36 X 3/4"-36, STEEL
3128-CNS-3446	U-JOINT (35°), 3/4"-36 X 17mm-DD, STEEL
3128-CNS-3449	U-JOINT (35°), 3/4"-36 X 3/4"-DD, STEEL
3128-CNS-3455	U-JOINT (35°), 3/4"-36 X TRI-LOBE, STEEL
3128-CNS-4034	U-JOINT (35°), 13/16"-36 X 3/4"-36, STEEL
3128-CNS-4334	U-JOINT (35°), 1"-48 X 3/4"-36, STEEL
3128-CNS-4349	U-JOINT (35°), 1"-48 X 3/4"-DD, STEEL
3128-CNS-4909	U-JOINT (35°), 3/4"-DD X 9/16"-26, STEEL
3128-CNS-4930	U-JOINT (35°), 3/4"-DD X 3/4"-20, STEEL
3128-CNS-4945	U-JOINT (35°), 3/4"-DD X 16.8mm-DD, STEEL
3128-CNS-4946	U-JOINT (35°), 3/4"-DD X 6-DD (17mm) STEEL
3128-CNS-4948	U-JOINT (35°), 3/4"-DD X 8-DD STEEL
3128-CNS-4949	U-JOINT (35°), 3/4"-DD X 3/4"-DD, STEEL
3128-CNS-5234	U-JOINT (35°), 1"-DD X 3/4"-36, STEEL
3128-CNS-5249	U-JOINT (35°), 1"-DD X 3/4"-DD, STEEL
3128-CNS-5252	U-JOINT (35°), 1"-DD X 1"-DD, STEEL
3128-SNS-3434	U-JOINT 3/4"-36 X 3/4"-36, STAINLESS
3128-SNS-3449	U-JOINT 3/4"-36 X 3/4"-DD, STAINLESS
3128-SNS-4930	U-JOINT 3/4"DD X 3/4"-20, STAINLESS
3128-SNS-4949	U-JOINT 3/4"-DD X 3/4"-DD, STAINLESS



3128-SNP-4945	U-JOINT 3/4"-DD X 16.8MM-DD, STAINLESS	
3128-SNP-4949	U-JOINT 3/4"-DD X 3/4"-DD, STAINLESS	
3128-SNP-5249	U-JOINT 1"-DD X 3/4"-DD, STAINLESS	



3128-SNS-9934 U-JOINT GM-RAGJOINT X 3/4"-36, STAINLESS
3128-SNS-9949 U-JOINT GM-RAGJOINT X 3/4"-DD, STAINLESS
3128-SNS-9952 U-JOINT GM-RAGJOINT X 1"-DD, STAINLESS

Custom-Fit Canted 4-Bar Suspension System



g-Link Suspension



■ Billet g-Link Suspension



Coil-Over Shocks



■ Air-Spring Shocks



Custom-Fit Canted Tubular 4-Bar Rear Frame Package



Tubular-steel, splined arm anti-roll bar in 7/8" or 1-1/4" diameter



Single-, double-, or 4-way-adjustable with remote reservoir coil-over shocks



Adjustable air-spring shocks

		Applications:
		Pro-Touring
		Muscle Car
		Pro Street
100	rebit	Street Rod
0	00	Road Race

78F313	CANTED 4-BAR REAR FRAME SYSTEM - INCLUDES 2X4" REAR FRAME, TUBULAR STEEL LOWER AND BILLET STEEL UPPER SUSPENSION LINKS WITH PIVOT-BALL ENDS, AND ADJUSTABLE COIL-OVER SHOCKS WITH SPRINGS
UNASSEMBLED FRAME KIT	NO FRONT CROSSMEMBER
	2X4" CROSSMEMBER WITH 1X2" DRIVESHAFT LOOP
OPTIONS	2X4" CROSSMEMBER WITH 1X2" DRIVESHAFT LOOP AND EXHAUST PORTS
	2X4" CROSSMEMBER WITH 1X2" DRIVESHAFT LOOP AND SUBFRAME CONNECTORS
	2X4" CROSSMEMBER WITH 1X2" DRIVESHAFT LOOP, EXHAUST PORTS, AND SUBFRAME CONNECTORS
WELDED	2X4" CROSSMEMBER WITH 1X2" DRIVESHAFT LOOP
FRAME	2X4" CROSSMEMBER WITH 1X2" DRIVESHAFT LOOP AND EXHAUST PORTS
OPTIONS	2X4" CROSSMEMBER WITH 1X2" DRIVESHAFT LOOP, EXHAUST PORTS, AND SUBFRAME CONNECTORS
AXLE BRACKET	UPPER AXLE BRACKET WELD FIXTURE
LINK BARS	SINGLE-ADJUSTABLE UPPER LINK BARS
	DOUBLE-ADJUSTABLE UPPER LINK BARS
SHOCK	QUICKSET 1 COIL-OVER SHOCKS, SINGLE-ADJUSTABLE, COM-8 EYE, 5.15" TRAVEL
OPTIONS	QUICKSET 2 COIL-OVER SHOCKS, DOUBLE-ADJUSTABLE, COM-8 EYE, 5.15" TRAVEL
	QUICKSET 4 REMOTE-RESERVOIR COIL-OVERS, 4-WAY ADJUSTABLE, COM-8 EYE, 5.15" TRAVEL
	QUICKSET 1 AIR-SPRING SHOCKS, SINGLE-ADJUSTABLE, POLY-EYE, 5.15" TRAVEL
	QUICKSET 2 AIR-SPRING SHOCKS, DOUBLE-ADJUSTABLE, POLY EYE, 5.15" TRAVEL
SPRING RATES	95, 110, 130, 150, 175, 200, 250, OR 300 LB/IN RATE SPRINGS
ANTI-ROLL	STREET AND PERFORMANCE 7/8" TUBULAR ANTI-ROLL BAR WITH SPLINED BILLET ARMS
BARS	DRAG RACE 1-1/4" TUBULAR ANTI-ROLL BAR WITH SPLINED BILLET-ALUMINUM ARMS

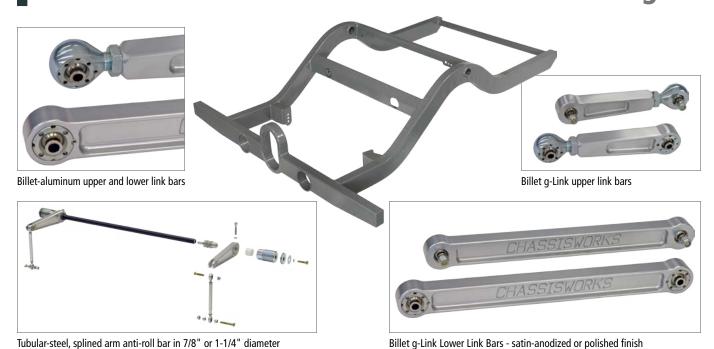


Adjustable lower shock mounts



Axle brackets with weld fixture

Custom-Fit Canted Billet 4-Bar Rear Frame Package







Applications:
Pro-Touring
Muscle Car
Pro Street

Street Rod

Adjustable air-spring shocks

Single-, double-, or 4-way-adjustable with remote reservoir coil-over shocks

78F303	BILLET CANTED 4-BAR REAR FRAME SYSTEM - INCLUDES 2X4" REAR FRAME, BILLET- ALUMINUM UPPER AND LOWER SUSPENSION LINKS WITH PIVOT-BALL ENDS, AND ADJUSTABLE COIL-OVER SHOCKS WITH SPRINGS
FRAME KIT	NO FRONT CROSSMEMBER
	2X4" CROSSMEMBER WITH 1X2" DRIVESHAFT LOOP
OPTIONS	2X4" CROSSMEMBER WITH 1X2" DRIVESHAFT LOOP AND EXHAUST PORTS
	2X4" CROSSMEMBER WITH 1X2" DRIVESHAFT LOOP AND SUBFRAME CONNECTORS
	2X4" CROSSMEMBER WITH 1X2" DRIVESHAFT LOOP, EXHAUST PORTS, AND SUBFRAME CONNECTORS
WELDED	2X4" CROSSMEMBER WITH 1X2" DRIVESHAFT LOOP
FRAME	2X4" CROSSMEMBER WITH 1X2" DRIVESHAFT LOOP AND EXHAUST PORTS
OPTIONS	2X4" CROSSMEMBER WITH 1X2" DRIVESHAFT LOOP, EXHAUST PORTS, AND SUBFRAME CONNECTORS
AXLE BRACKET	UPPER AXLE BRACKET WELD FIXTURE
LINK BARS	SATIN ANODIZED BILLET UPPER AND LOWER LINK BARS
	POLISHED BILLET UPPER AND LOWER LINK BARS
SHOCK	QUICKSET 1 COIL-OVER SHOCKS, SINGLE-ADJUSTABLE, COM-8 EYE, 5.15" TRAVEL
OPTIONS	QUICKSET 2 COIL-OVER SHOCKS, DOUBLE-ADJUSTABLE, COM-8 EYE, 5.15 " TRAVEL
	QUICKSET 4 REMOTE-RESERVOIR COIL-OVERS, 4-WAY ADJUSTABLE, COM-8 EYE, 5.15" TRAVEL
	QUICKSET 1 AIR-SPRING SHOCKS, SINGLE-ADJUSTABLE, POLY-EYE, 5.15" TRAVEL
	QUICKSET 2 AIR-SPRING SHOCKS, DOUBLE-ADJUSTABLE, POLY EYE, 5.15" TRAVEL
SPRING RATES	95, 110, 130, 150, 175, 200, 250, OR 300 LB/IN RATE SPRINGS
ANTI-ROLL BARS	STREET AND PERFORMANCE 7/8" TUBULAR ANTI-ROLL BAR WITH SPLINED BILLET ARMS
	DRAG RACE 1-1/4" TUBULAR ANTI-ROLL BAR WITH SPLINED BILLET-ALUMINUM ARMS



Adjustable lower shock mounts



Custom-Fit Canted 4-Bar FAB9 Housing

Chassisworks' FAB9 direct-fit, fabricated 9" housing offers exceptional performance, reliability, and adjustability. Housing mounts have been engineered to accept our billet aluminum 4-bar links and feature multiple mounting positions for instant-center adjustment. Additional shock mount and clevis kit (6252) also has the benefit of multiple mounting positions that enable a ride-height-adjustment range of 4-1/8" without sacrificing available shock travel. FAB9 offers superior strength from fabricated centersection panels, internal tube gussets, folded back braces, and consistent robotic spray-arc-welded seams. Selectable options include 4-link bracket width of 34" to 50" in 1/2"

increments; housing end-to-end width of 36" to 62-1/4" in 1/4" increments; housing-end type; centered, 1/2", or 1" pinion offset; installed axle vent; installed folded back brace; and adjustable shock mount



and clevis kit. (See pricing table for width ranges.) Complete correct-length axle packages and third members are also available. Ask our sales representatives for details.



8272	WELDED CANTED 4-BAR FAB9 HOUSING, MILD STEEL (36" TO 62-1/4" IN 1/4" INCREMENTS)
8273	WELDED CANTED 4-BAR FAB9 HOUSING, 4130 STEEL (36" TO 62-1/4" IN 1/4" INCREMENTS)
OPTIONS	LONGER THAN 41-3/4"
	ADJUSTABLE SHOCK MOUNT AND CLEVIS
	INSTALLED BACK BRACE
	4-BAR BRACKET WIDTH: 34" TO 50" IN 1/2" INCREMENTS
	PINION OFFSET: CENTERED, 1/2", OR 1" (OFFSET TOWARD PASSENGER SIDE)
	HOUSING-END TYPE: REFER TO CUSTOM- HOUSING WORKSHEET AND INSTRUCTIONS



Custom-Fit Canted 4-Bar Suspension

Your project vehicle can have the performance benefits of our Canted 4-Bar Suspension System without tackling a complete backhalf installation. The suspension link bars, chassis brackets and crossmember, and axle housing brackets are available as an unassembled kit for weld-in installation with existing factory or aftermarket frame rails. To ensure correct suspension geometry is maintained during installation a detailed assembly diagram is included. A simple to use axle bracket weld fixture is also available and can be used for multiple installations.





Folded, single-piece lower axle brackets feature multiple suspension link mounting positions and a two-hole mounting tabs to accommodate the anti-roll bar endlink. Upper brackets must be trimmed to fit the rearend center section and are shipped as three individual component plates. A bolt-on weld fixture is available to ensure accurate positioning.



The chassis bracket set includes the lower link bar brackets and the upper suspension crossmember. Lower mounts are welded against the inside wall of the frame. The upper crossmember feature laser-etched markings in 1/2" increments to simplify trimming to fit.



g-Link Tubular-Steel Bars - 1-1/4" diameter, adjustable length, tubular steel lower link bars with billet steel upper bars in single- and double-adjustable versions



Billet g-Link Aluminum Bars - fixed-length lower and single-adjustable upper link bars feature sperical pivot-ball ends



Adjustable shock mount welds against backside of lower link bar mount

6241	BILLET 4-BAR LINKS AND CHASSIS AND HOUSING MOUNTS (FOR USE WITH CUSTOMER FRAME AND HOUSING)
LINK BAR OPTIONS	BILLET-ALUMINUM LINK BAR SET, SATIN-ANODIZED FINISH
	BILLET-ALUMINUM LINK BAR SET, POLISHED FINISH
	G-LINK SINGLE-ADJUSTABLE TUBULAR LINK BAR SET, BLACK FINISH
	G-LINK DOUBLE-ADJUSTABLE TUBULAR LINK BAR SET, BLACK FINISH
BRACKET	OMIT FRONT FRAME BRACKETS
OPTIONS	OMIT AXLE HOUSING MOUNTS
	UPPER AXLE BRACKET WELD FIXTURE
6252	ADJUSTABLE SHOCK MOUNT AND CLEVIS (WELD-IN
6745	INSTALLATION WITH CUSTOMER HOUSING)
6715	UPPER HOUSING BRACKET WELDING FIXTURE (FOR USE WITH CUSTOMER HOUSING)

Custom-Fit Canted 4-Bar Rear Frame

bent, 4 x 2 x .120"-wall steel tubing and designed with minimal rise over the rearend housing to allow more room in the rear seat and trunk areas.

Optional 4 x 2" front crossmembers equipped with 1 x 2" tubular oval driveshaft loop are available with or without dual 4"-ID exhaust ports. Driveshaft loops measure 9" tall and 5" wide and are positioned as ordered to accommodate pinion offsets of 0", 1/2", or 1". Four-by-two forward frame connectors, 60" in length, can also be added to aid in tying the rear frame into your existing structure. Preassembled frames can be purchased in outside frame widths ranging from 34" to 50" in 1/2" increments. This ensures perfect geometry and fit with minimal effort while saving considerable installation time. Components

are professionally spray-arc-welded by Chassisworks' welding staff in a controlled environment using computer-designed fixtures and production-quality equipment. Alternately, frames can be ordered in subassembly kit form with lower-arm, shock, and anti-roll-bar mounts factory-welded to each frame rail. Crossmembers are then simply cut to desired length and welded into place by a qualified installer.

The rear frame is formed from CNC-mandrel-

7154	UNASSEMBLED 4 X 2" CANTED REAR-FRAME BASE KIT
OPTIONS	4 X 2 X 64" FRONT CROSSMEMBER WITH DRIVESHAFT LOOP
	4"-ID EXHAUST PORTS (PAIR)
	4 X 2 X 60" FORWARD FRAME CONNECTORS (DETACHED)
7154-W	FACTORY-WELDED 4 X 2" CANTED REAR FRAME, BASE
OPTIONS	4 X 2 X 60" FORWARD FRAME CONNECTORS (DETACHED)
	4 X 2" FRONT CROSSMEMBER WITH DRIVESHAFT LOOP
	4 X 2" FRONT CROSSMEMBER WITH DRIVESHAFT LOOP AND EXHAUST PORTS
NOTE	REAR FRAME IN SUBASSEMBLY KIT FORM INCLUDES REAR AND SHOCK CROSSMEMBERS
	WITH SUFFICIENT LENGTH FOR 50" OUTSIDE FRAME WIDTH. CROSSMEMBER MATERIAL
	MUST BE CUT TO DESIRED LENGTH PRIOR TO ASSEMBLY.

Custom-Fit Canted 4-Bar Anti-Roll Bar

The newest innovation in rear-suspension control is Chassisworks' ball-end anti-roll bar with integrated frame-rail mounts. It has been designed specifically to provide maximum exhaust clearance by placing the anti-roll bar closely against the vehicle's under-body, with no bulky mounts placed along the frame rail. The key to our tucked-away installation are the threaded mounting sleeves integrated directly into each frame rail. Billet bushing housings screw in from the outside of each frame rail to capture the ball-ends of the bar with low-friction polymer bearings.

The anti-roll-bar assembly includes a 7/8" road-handling or 1-1/4" drag-race, heat-treated torsion bar with splined ends and billet aluminum arms. Each arm is machined with a single split to ease installation fit and to clamp down upon the spline when tightened. A sockethead fastener applies pressure to the spline, creating a play-free joint while also fitting into

a groove machined at the end of the bar. This

locking joint prevents the arms from sliding, even under the most extreme force. Billet arms are connected to the chassis mounts by adjustable-length end-link assemblies. Steel end-link tubes feature left- and right-hand threads and a 1/2" hex for quick adjustment during installation. Adjuster links feature a 3/8"-shank



6259 OPTIONS

Optional Frame Sockets

(Part of 7154 assembly)

BALL-END ANTI-ROLL BAR FOR CANTED REAR SUSPENSION

FRAME SOCKETS (FOR CUSTOM APPLICATION OTHER THAN 7154 FRAME)

7/8"-DIAMETER ROAD-HANDLING BAR 1-1/4"-DIAMETER DRAG-RACE BAR

Custom-Fit Canted 4-Bar Shock-System Options

VARISHOCK COIL-OVER SHOCKS

VariShock coil-overs provide an advanced level of tuning for both performance and street vehicles. Variable shock valving gives you up to 256 different combinations of "instant adjustment" by simply turning the adjustment knobs to one of 16 detents. The threaded lower spring enables fine tuning of ride height, shock-travel balance, and corner weighting without affecting spring rate.



■ Poly-Eye Coil-Over Shocks, 5.15" Travel (Street, Pro-Touring)

VAS 11022-515	VARISHOCK POLY-EYE COIL-OVER, SENSISET FACTORY-VALVED, 5.15" TRAVEL (PAIR)
VAS 11122-515	VARISHOCK POLY-EYE COIL-OVER, QUICKSET 1 SINGLE-ADJUSTABLE, 5.15" TRAVEL (PAIR)
VAS 11222-515	VARISHOCK POLY-EYE COIL-OVER, QUICKSET 2 DOUBLE-ADJUSTABLE, 5.15" TRAVEL (PAIR)
NOTE	USES 12" COIL SPRINGS



■ Bearing-Eye Coil-Over Shocks, 5.15" Travel - (Street, Pro-Touring, Open Track)

VAS 11011-515 VARISHOCK BEARING-EYE COIL-OVER, SENSISET FACTORY-VALVED, 5.15" TRAVEL (PAIR)
VAS 11111-515 VARISHOCK BEARING-EYE COIL-OVER, QUICKSET 1 SINGLE-ADJUSTABLE, 5.15" TRAVEL (PAIR)
VAS 11211-515 VARISHOCK BEARING-EYE COIL-OVER, QUICKSET 2 DOUBLE-ADJUSTABLE, 5.15" TRAVEL (PAIR)
VAS 11411-50 VARISHOCK BEARING-EYE REMOTE-RESERVOIR COIL-OVER, QUICKSET 4 4-WAY-ADJUSTABLE, 5.00" TRAVEL (PAIR)
NOTE USES 12" COIL SPRINGS

Custom-Fit Canted 4-Bar Shock-System Options

■ VARISPRING 12" COIL-SPRINGS

VariSprings are manufactured using a new high-tensile wire, which is stronger than the chrome-silicon wire used by other manufacturers. Since this wire can flex more than conventional chrome-silicon wire, we can wind VariSprings with a coarser pitch that reduces weight and increases the spring's travel.



VAS 21-12080	12" LENGTH, 80 LB/IN
VAS 21-12095	12" LENGTH, 80 LB/IN
VAS 21-12110	12" LENGTH, 110 LB/IN
VAS 21-12130	12" LENGTH, 130 LB/IN
VAS 21-12150	12" LENGTH, 150 LB/IN
VAS 21-12175	12" LENGTH, 175 LB/IN
VAS 21-12200	12" LENGTH, 200 LB/IN
VAS 21-12250	12" LENGTH, 250 LB/IN
VAS 21-12300	12" LENGTH, 300 LB/IN
VAS 21-12350	12" LENGTH, 350 LB/IN
VAS 21-12400	12" LENGTH, 400 LB/IN
VAS 21-12450	12" LENGTH, 450 LB/IN
VAS 21-12500	12" LENGTH, 500 LB/IN
VAS 21-12550	12" LENGTH, 550 LB/IN
VAS 21-12600	12" LENGTH, 600 LB/IN
VAS 21-12650	12" LENGTH, 650 LB/IN

VARISHOCK AIR-SPRING SHOCKS

The VariShock air-spring suspension enables rapid changes in ride height when used with one of the various compressor control systems — perfect for street rods. Air suspension provides smooth, comfortable ride quality, but the VariShock's built-in adjustable valving allows the system to be tuned for enhanced performance.

VAS 131J2-515	VARISHOCK AIR SPRING, QUICKSET 1 SINGLE- ADJUSTABLE, POLY EYES (PAIR)
1/46 43313 545	, , ,
VAS 132J2-515	VARISHOCK AIR SPRING, QUICKSET 2 DOUBLE-
	ADJUSTABLE, POLY EYES (PAIR)
NOTE	AIR-MANAGEMENT SYSTEM REQUIRED FOR OPERATION





Custom-Fit Parallel Billet 4-Bar Rear Frame

Chassisworks' parallel billet 4-bar rear-frame system uses a welded installations using components other than Chassisworks'. traditional 4-link layout, suitable for Pro Street projects, street In addition, VariShock coil-overs or air-spring suspension can be rods, and muscle cars with high-horsepower requirements. To installed to meet the demands of both performance and street rod projects. Available components include the rear frame, billet accommodate extremely wide wheel and tire combinations, outside frame widths range from 48" down to 20", with factoryaluminum upper and lower suspension links, factory-welded welded mild-steel or 4130 FAB9 housings available from 24" to FAB9 housing, track locaters, panhard 62-1/4". Multiple-position, suspension-link mounts at the chassis bars, ball-end anti-roll bar, and housing, with a reversible-clevis, shock mount system, shock mounts, and selected shock provide an optimum traction setting for any vehicle. Billet aluminum 4-bar links, featuring our TrueCenter™ pivot-socket system. technology, can be purchased for use with our 7153 parallel rear frame and 8270 or 8271 FAB9 housing. They can also be purchased with detached mounts for Locater Options Shock Options

783253	BILLET-ALUMINUM PARALLEL 4-LINK REAR FRAME CLIP SYSTEM - CONTAINS 2X4" BOX-TUBE REAR FRAME, PARALLEL 4-LINK SUSPENSION (BILLET-ALUMINUM LINKS WITH PIVOT-BALL ENDS), COIL-OVER SHOCKS, ADJUSTABLE HEIGHT SHOCK MOUNTS, AND COIL SPRINGS
SUSPENSION OPTIONS	CLEAR-ANODIZED-SATIN OR POLISHED FINISHED SUSPENSION LINKS
UNWELDED FRAME OPTIONS	EXHAUST PORTS AND/OR SUBFRAME CONNECTORS
WELDED FRAME OPTIONS	FACTORY-WELDED FRAME CLIP ASSEMBLY
	FRAME OUTSIDE WIDTH (20" TO 50" IN 1/2" INCREMENTS)
	PINION OFFSET (CENTERED, 1/2" OR 1" OFFSET TO PASSENGER SIDE)
	EXHAUST PORTS AND/OR SUBFRAME CONNECTORS
LOCATER OPTIONS	PRO STREET LOCATER, OR SINGLE- OR DOUBLE-ADJUSTABLE PANHARD BAR
SHOCK OPTIONS	SENSISET, FACTORY-VALVED VARISHOCKS, POLY EYES
	QUICKSET 1, SINGLE-ADJUSTABLE VARISHOCKS, COM-8 EYES
	QUICKSET 2, DOUBLE-ADJUSTABLE VARISHOCKS, COM-8 EYES
SPRING OPTIONS	SELECT SPRING RATE (95, 110, 130, 150, 175, 200, 250, 300 LB/IN)
FLOOR AND TUB OPTIONS	REAR FLOOR KIT AND/OR WHEEL TUBS IN STEEL OR ALUMINUM
ROLL CAGE OPTIONS	NO CAGE, VEHICLE-SPECIFIC 10-POINT, OR CUSTOM CAGE
	FORWARD STRUTS, ROCKER TUBES, HELMET BAR, AND DASHBOARD BAR

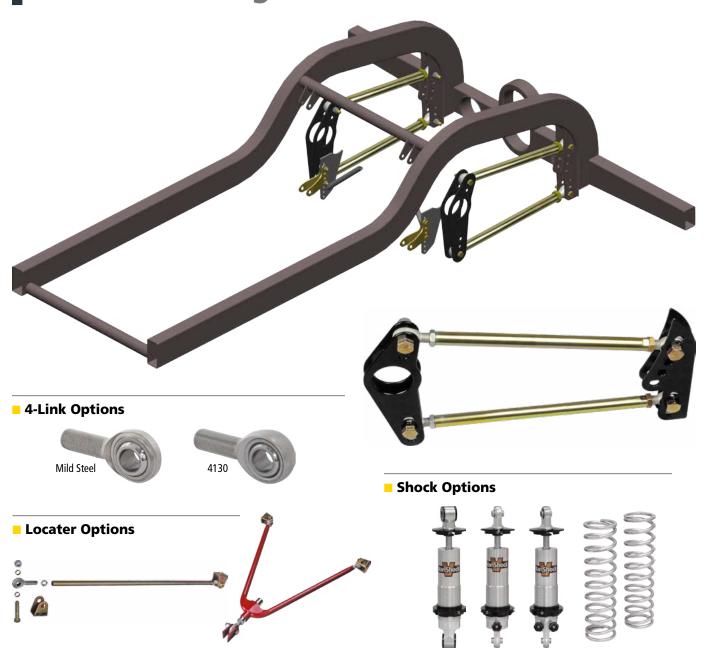
Custom-Fit Pro Street 4-Link Rear Frame



■ Pro Street 4-Link Rear Frame System

783213	PRO-STREET 4-LINK REAR CLIP - 4X2" FRAME RAILS - CONTAINS FRAME CLIP, 4-LINK WITH POLY ROD ENDS AND COIL-OVER SHOCKS
UNWELDED FRAME OPTIONS	EXHAUST PORTS AND/OR SUBFRAME CONNECTORS
WELDED FRAME OPTIONS	FACTORY-WELDED FRAME CLIP ASSEMBLY
	FRAME OUTSIDE WIDTH (20" TO 50" IN 1/2" INCREMENTS)
	PINION OFFSET (CENTERED, 1/2" OR 1" OFFSET TO PASSENGER SIDE)
	EXHAUST PORTS AND/OR SUBFRAME CONNECTORS
LOCATER OPTIONS	BOLT-ON LOCATER, OR SINGLE- OR DOUBLE-ADJUSTABLE PANHARD BAR
SHOCK OPTIONS	SENSISET VARISHOCKS, POLY EYES
	QUICKSET 1 VARISHOCKS, COM-8 EYES
	QUICKSET 2 VARISHOCKS, COM-8 EYES
SPRING OPTIONS	SELECT SPRING RATE (95, 110, 130, 150, 175, 200, 250, 300 LB/IN)
FLOOR AND TUB OPTIONS	REAR FLOOR KIT AND/OR WHEEL TUBS IN STEEL OR ALUMINUM
ROLL CAGE OPTIONS	NO CAGE, VEHICLE-SPECIFIC 10-POINT, OR CUSTOM CAGE
	FORWARD STRUTS, ROCKER TUBES, HELMET BAR, AND DASHBOARD BAR

Custom-Fit Drag Race 4-Link Rear Frame



■ Drag Race 4-Link Rear Frame System

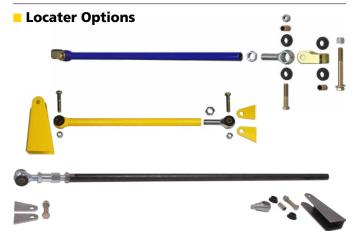
DRAG-RACE 4-LINK REAR CLIP - 4X2" FRAME RAILS - CONTAINS FRAME CLIP, LADDER BARS WITH SPHERICAL- BEARING ROD ENDS AND COIL-OVER SHOCKS
MILD-STEEL, 4130, AND/OR 4130 TEFLON® ROD END SETS
EXHAUST PORTS AND/OR SUBFRAME CONNECTORS
FACTORY-WELDED FRAME CLIP ASSEMBLY
FRAME OUTSIDE WIDTH (20" TO 50" IN 1/2" INCREMENTS)
PINION OFFSET (CENTERED, 1/2" OR 1" OFFSET TO PASSENGER SIDE)
EXHAUST PORTS AND/OR SUBFRAME CONNECTORS
BOLT-ON LOCATER OR WISHBONE
SENSISET VARISHOCKS, POLY EYES
QUICKSET 1 VARISHOCKS, COM-8 EYES
QUICKSET 2 VARISHOCKS, COM-8 EYES
SELECT SPRING RATE (95, 110, 130, 150, 175, 200, OR 250 LB/IN)
REAR FLOOR KIT AND/OR WHEEL TUBS IN STEEL OR ALUMINUM
NO CAGE, VEHICLE-SPECIFIC 10-POINT, OR CUSTOM CAGE
FORWARD STRUTS, ROCKER TUBES, HELMET BAR, AND DASHBOARD BAR

Custom-Fit Pro Street 32" Ladder Bar Rear Frame



Shock Options

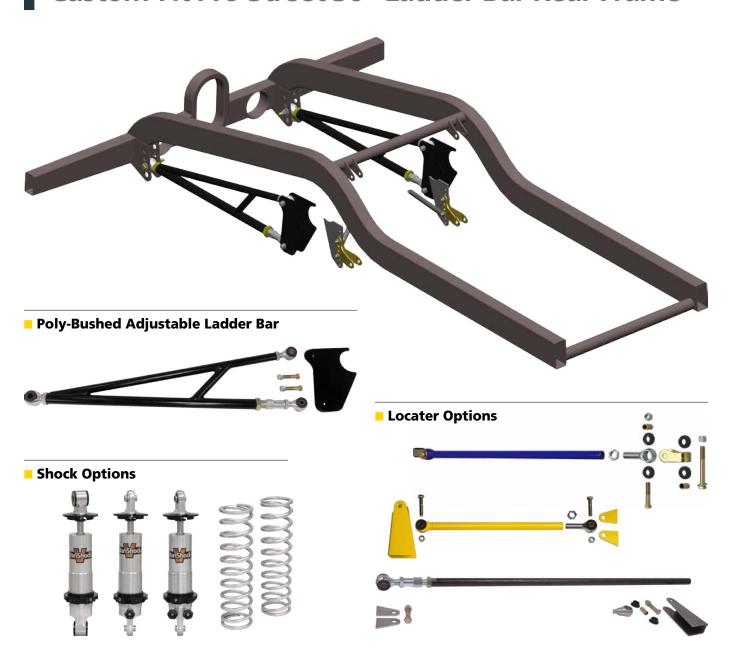




32" Pro Street Ladder Bar Rear Frame System783113 PRO-STREET 32" LADDER BAR REAR CLIP - 4X2

783113	PRO-STREET 32" LADDER BAR REAR CLIP - 4X2" FRAME RAILS - CONTAINS FRAME CLIP, LADDER BARS WITH POLY FRONT ROD ENDS AND COIL-OVER SHOCKS
LADDER BAR OPTIONS	ADJUSTABLE LADDER BARS AND SAFETY STRAP
UNWELDED FRAME OPTIONS	EXHAUST PORTS AND/OR SUBFRAME CONNECTORS
WELDED FRAME OPTIONS	FACTORY-WELDED FRAME CLIP ASSEMBLY
	FRAME OUTSIDE WIDTH (20" TO 50" IN 1/2" INCREMENTS)
	PINION OFFSET (CENTERED, 1/2" OR 1" OFFSET TO PASSENGER SIDE)
	EXHAUST PORTS AND/OR SUBFRAME CONNECTORS
LOCATER OPTIONS	BOLT-ON LOCATER, OR SINGLE- OR DOUBLE-ADJUSTABLE PANHARD BAR
SHOCK OPTIONS	SENSISET VARISHOCKS, POLY EYES
	QUICKSET 1 VARISHOCKS, COM-8 EYES
	QUICKSET 2 VARISHOCKS, COM-8 EYES
SPRING OPTIONS	SELECT SPRING RATE (95, 110, 130, 150, 175, 200, 250, OR 300 LB/IN)
FLOOR AND TUB OPTIONS	REAR FLOOR KIT AND/OR WHEEL TUBS IN STEEL OR ALUMINUM
ROLL CAGE OPTIONS	NO CAGE, VEHICLE-SPECIFIC 10-POINT, OR CUSTOM CAGE
	FORWARD STRUTS, ROCKER TUBES, HELMET BAR, AND DASHBOARD BAR

Custom-Fit Pro Street 36" Ladder Bar Rear Frame



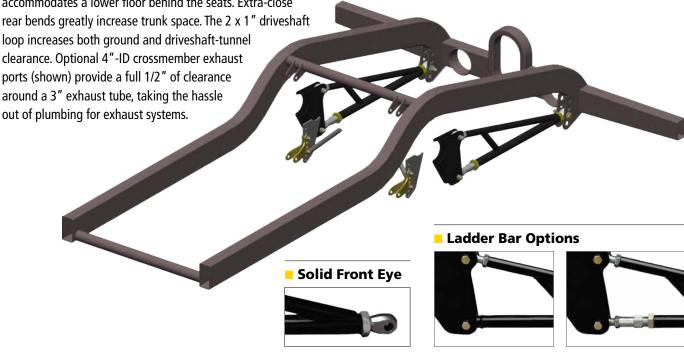
702422	DDG CTDEET 20" LADDED DAD DEAD CUD. AV2" EDAME DAUG. CONTAING FDAME CUD LADDED DADG MITH DOLV
783133	PRO-STREET 36" LADDER BAR REAR CLIP - 4X2" FRAME RAILS - CONTAINS FRAME CLIP, LADDER BARS WITH POLY
	FRONT ROD ENDS AND COIL-OVER SHOCKS
LADDER BAR OPTIONS	ADJUSTABLE LADDER BARS AND SAFETY STRAP
UNWELDED FRAME OPTIONS	EXHAUST PORTS AND/OR SUBFRAME CONNECTORS
WELDED FRAME OPTIONS	FACTORY-WELDED FRAME CLIP ASSEMBLY
	FRAME OUTSIDE WIDTH (20" TO 50" IN 1/2" INCREMENTS)
	PINION OFFSET (CENTERED, 1/2" OR 1" OFFSET TO PASSENGER SIDE)
	EXHAUST PORTS AND/OR SUBFRAME CONNECTORS
LOCATER OPTIONS	BOLT-ON LOCATER, OR SINGLE- OR DOUBLE-ADJUSTABLE PANHARD BAR
SHOCK OPTIONS	SENSISET VARISHOCKS, POLY EYES
	QUICKSET 1 VARISHOCKS, COM-8 EYES
	QUICKSET 2 VARISHOCKS, COM-8 EYES
SPRING OPTIONS	SELECT SPRING RATE (95, 110, 130, 150, 175, 200, 250, OR 300 LB/IN)
WHEEL TUB OPTIONS	24X40" OR 28X43" WHEEL TUBS IN STEEL OR ALUMINUM
ROLL CAGE OPTIONS	NO CAGE, VEHICLE-SPECIFIC 10-POINT, OR CUSTOM CAGE
	FORWARD STRUTS, ROCKER TUBES, HELMET BAR, AND DASHBOARD BAR

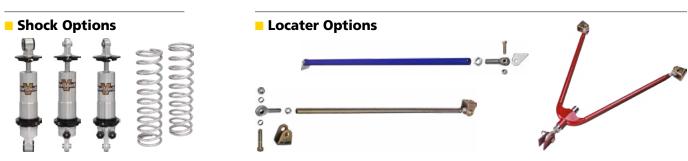
Custom-Fit Drag Race 32" Ladder Bar Rear Frame

These are completely new designs, engineered specifically for street machines (not the ill-fitting 4 x 2" versions of 3 x 2" dragrace clips sold elsewhere!). Mandrel-bent from 4 x 2 x .120"wall tube, frames are available for virtually any application. Rails can be assembled as narrow as 20", outside width, for use in compact cars. Our lower kickup (above the rearend) accommodates a lower floor behind the seats. Extra-close rear bends greatly increase trunk space. The 2 x 1" driveshaft loop increases both ground and driveshaft-tunnel

clearance. Optional 4"-ID crossmember exhaust ports (shown) provide a full 1/2" of clearance around a 3" exhaust tube, taking the hassle

The included 4 x 2" crossmember can be taper-cut (as shown) to attach to existing frames. The provided upper shock mounts accept Chassisworks' coil-spring kit and either VariShock or Koni coil-overs. For ultimate fit and function, install our FAB9 rearend housing and other Chassiswork's accessories! Available either unassembled in kit form or factory-welded to your specifications.

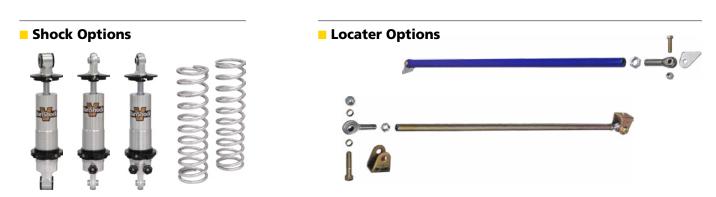




783103	DRAG-RACE 32" LADDER BAR REAR CLIP - 4X2" FRAME RAILS - CONTAINS FRAME CLIP, LADDER BARS WITH SOLID
LARRED DAR ORTIONS	ROD ENDS AND COIL-OVER SHOCKS
LADDER BAR OPTIONS	STANDARD OR ADJUSTABLE LADDER BARS, SAFETY STRAP
UNWELDED FRAME OPTIONS	EXHAUST PORTS AND/OR SUBFRAME CONNECTORS
WELDED FRAME OPTIONS	FACTORY-WELDED FRAME CLIP ASSEMBLY
	FRAME OUTSIDE WIDTH (20" TO 50" IN 1/2" INCREMENTS)
	PINION OFFSET (CENTERED, 1/2" OR 1" OFFSET TO PASSENGER SIDE)
	EXHAUST PORTS AND/OR SUBFRAME CONNECTORS
LOCATER OPTIONS	WELD-ON OR BOLT-ON LOCATER, OR WISHBONE
SHOCK OPTIONS	SENSISET VARISHOCKS, POLY EYES
	QUICKSET 1 VARISHOCKS, COM-8 EYES
	QUICKSET 2 VARISHOCKS, COM-8 EYES
SPRING OPTIONS	SELECT SPRING RATE (95, 110, 130, 150, 175, 200, 250, OR 300 LB/IN)
FLOOR AND TUB OPTIONS	REAR FLOOR KIT AND/OR WHEEL TUBS IN STEEL OR ALUMINUM
ROLL CAGE OPTIONS	NO CAGE, VEHICLE-SPECIFIC 10-POINT, OR CUSTOM CAGE
	FORWARD STRUTS, ROCKER TUBES, HELMET BAR, AND DASHBOARD BAR

Custom-Fit Drag Race 36" Ladder Bar Rear Frame





■ 36" Drag Race La	ndder Bar Rear Frame System
783123	DRAG-RACE 36" LADDER BAR REAR CLIP - 4X2" FRAME RAILS - CONTAINS FRAME CLIP, LADDER BARS WITH SOLID ROD ENDS AND COIL-OVER SHOCKS
LADDER BAR OPTIONS	ADJUSTABLE LADDER BARS, SAFETY STRAP
UNWELDED FRAME OPTIONS	EXHAUST PORTS AND/OR SUBFRAME CONNECTORS
WELDED FRAME OPTIONS	FACTORY-WELDED FRAME CLIP ASSEMBLY
	FRAME OUTSIDE WIDTH (20" TO 50" IN 1/2" INCREMENTS)
	PINION OFFSET (CENTERED, 1/2" OR 1" OFFSET TO PASSENGER SIDE)
	EXHAUST PORTS AND/OR SUBFRAME CONNECTORS
LOCATER OPTIONS	WELD-ON OR BOLT-ON LOCATER
SHOCK OPTIONS	SENSISET VARISHOCKS, POLY EYES
	QUICKSET 1 VARISHOCKS, COM-8 EYES
	QUICKSET 2 VARISHOCKS, COM-8 EYES
SPRING OPTIONS	SELECT SPRING RATE (95, 110, 130, 150, 175, 200, 250, OR 300 LB/IN)
WHEEL TUB OPTIONS	24X40" OR 28X43" WHEEL TUBS IN STEEL OR ALUMINUM
ROLL CAGE OPTIONS	NO CAGE, VEHICLE-SPECIFIC 10-POINT, OR CUSTOM CAGE
	FORWARD STRUTS, ROCKER TUBES, HELMET BAR, AND DASHBOARD BAR

Sheet Metal

■ Wheel Tubs

Special packaging allows all Chassisworks tubs to be shipped via UPS! Available in three sizes: 24x36" (fits all tires under 31" tall); 24x40" (for tires over 31"); 28x43" (tires over 33"). All tubs come with square beads, and feature Pittsburgh seams for easy assembly. Steel tubs are made of 22-gauge



steel. Top-quality, .032"-thick-aluminum material is covered with PVC sheet (easily removed after installation) to protect the finish against scratching. Our exclusive contour tool and photo-illustrated instructions are provided. All tubs are shipped unassembled for low freight and ease of installation — except for our preformed truck tubs (Numbers 6613 and 6619). Specially engineered to fit truck floors, they feature thicker steel for weld-in installation, and come assembled specifically for truck applications. All prices are for one pair of tubs.

6600	STEEL TUBS, 24x36"
6601	ALUMINUM TUBS, 24x36"
6602	STEEL TUBS, 24x40"
6603	ALUMINUM TUBS, 24x40"
6614	STEEL TUBS, 28x43"
6608	ALUMINUM TUBS, 28x43"
6613	TRUCK STEEL TUBS, 43", ASSEMBLED
6619	TRUCK STEEL TUBS, 35", ASSEMBLED

■ Front Firewall

Trim this universal kit to fit any car! Our firewalls are 20-gauge steel or .050"-thick aluminum with protective PVC coating. The firewall is 24" tall and 60" wide, and features a 3/4" flange to seal it to the transmission tunnel. Package includes steel cowl cap and A-pillar caps for welding to car body.



6628	FRONT FIREWALL, STEEL
6605	FRONT FIREWALL, ALUMINUM

Driveshaft Tunnel

This weld-in driveshaft tunnel is constructed of 18-gauge steel. Universal size is shipped 7" wide, 10" high, and 48" long. Great for use with rear-subframe kits. Allows you to raise the driveshaft tunnel into your car, allowing the vehicle to sit lower.



6606	DRIVESHAFT TUNNEL, ALUMINUM
6627	DRIVESHAFT TUNNEL, STEEL

Flanges

Chassisworks manufactures the finest laser-cut header flanges and mandrel bends to build your own headers. Each price is for one item.

2806	SB CHEVY, 1-1/2" TUBE, STOCK HEAD
2807	SB CHEVY, 1-5/8" TUBE, STOCK HEAD
2808	SB CHEVY, 1-3/4" TUBE, STOCK HEAD
2809	SB CHEVY, SUBFLANGE, STOCK HEAD
2810	SB CHEVY, 1-7/8" TUBE WITH SUBFLANGE
2811	SB CHEVY, 2" TUBE WITH SUBFLANGE
2812	SB CHEVY, 2-1/8" TUBE WITH SUBFLANGE
2813	SB CHEVY, 2-1/4" TUBE WITH SUBFLANGE
2814	BB CHEVY, 1-3/4" TUBE, STOCK HEAD
2815	BB CHEVY, 1-7/8" TUBE, STOCK HEAD
2816	BB CHEVY, 2" TUBE, STOCK HEAD
2817	BB CHEVY, 2-1/8" TUBE, STOCK HEAD
2818	BB CHEVY, 2-1/4" TUBE, STOCK HEAD
2819	BB CHEVY, 2-3/8" TUBE, STOCK HEAD
2820	BB CHEVY, 2-1/2" TUBE, STOCK HEAD
2821	FORD 429/460, 2" TUBE
2822	FORD 429/460, 2-1/8" TUBE
2823	FORD 429/460, 2-1/4" TUBE
2824	MOPAR 383/440, 2" TUBE
2825	MOPAR 383/440, 2-1/8" TUBE
2826	MOPAR 383/440, 2-1/4" TUBE
2827	BRODIX SB CHEVY SPREAD PORT, 1-7/8" TUBE
2828	BRODIX SB CHEVY SPREAD PORT, 2" TUBE
2829	BRODIX SB CHEVY SPREAD PORT, 2-1/8" TUBE
2830	BRODIX SB CHEVY SPREAD PORT, 2-1/4" TUBE
2831	3-BOLT, 3" COLLECTOR FLANGE; 3/8" THICK
2832	3-BOLT, 3-1/2" COLLECTOR FLANGE
2833	FORD 4.6L /5.7L, 1-7/8" TUBE
2835	CHEVY LT-1/LT-4, 1-3/4" TUBE, D-PORT AND FAST BURN
5127	3-BOLT COLLECTOR REDUCER; 3"-TO-2-1/4" TUBE
5128	3-BOLT COLLECTOR REDUCER; 3-1/2"-TO-2-1/2" TUBE



J-bends are available in several different ODs. Each price is for one item.



1000-020-36	J BEND, 1-1/2" X 16-GA.; 180°; 2.5" RAD.
1000-025-36	J BEND, 1-5/8" X 16-GA.; 180°; 3" RAD.
1000-030-36	J BEND, 1-3/4" X 16-GA.; 180°; 3" RAD.
1000-035-36	J BEND, 1-7/8" X 16-GA.; 180°; 3" RAD.
1000-040-36	J BEND, 2" X 16-GA.; 180°; 3" RAD.
1000-045-36	J BEND, 2-1/8" X 16-GA.; 180°; 3.5"RAD.
1000-050-36	J BEND, 2-1/4" X 16-GA.; 180°; 3.5" RAD.
1000-055-36	J BEND, 2-3/8" X 16-GA.; 180°; 3.5" RAD.
1000-060-36	J BEND, 2-1/2" X 16-GA.; 180°; 4" RAD.
1000-065-36	J BEND, 3" X 16-GA.; 180°; 4.5" RAD.





Many sizes of four-intoone collectors are available. Each price is for one item.



1000-212-07	2-1/2" COLLECTOR; 1-1/2" TUBE
1000-212-08	2-1/2" COLLECTOR; 1-5/8" TUBE
1000-212-09	2-1/2" COLLECTOR; 1-3/4" TUBE
1000-222-08	3" COLLECTOR; 1-5/8" TUBE
1000-222-09	3" COLLECTOR; 1-3/4" TUBE
1000-222-10	3" COLLECTOR; 1-7/8" TUBE
1000-232-09	3-1/2" COLLECTOR; 1-3/4" TUBE
1000-232-10	3-1/2" COLLECTOR; 1-7/8" TUBE
1000-232-11	3-1/2" COLLECTOR; 2" TUBE
1000-232-12	3-1/2" COLLECTOR; 2-1/8" TUBE
1000-242-12	4" COLLECTOR; 2-1/8" TUBE
1000-242-13	4" COLLECTOR; 2-1/4" TUBE
1000-242-14	4" COLLECTOR; 2-3/8" TUBE
1000-252-13	4-1/2" COLLECTOR; 2-1/4" TUBE
1000-252-14	4-1/2" COLLECTOR; 2-3/8" TUBE
1000-262-14	5" COLLECTOR; 2-3/8" TUBE
1000-262-15	5" COLLECTOR; 2-1/2" TUBE

Header Kits

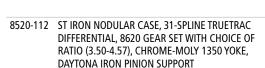
Complete, weld-up header kit consists of a pair of exhaust flanges; 14 J-bends; and a pair of collectors! Two- and three-step header kits also available.

FLANGES, TUBES, AND COLLECTORS (PAIR)
SB CHEVY; 1-3/4" TUBES; 3" COLLECTORS
SB CHEVY; 1-7/8" TUBES; 3-1/2" COLLECTORS
SB CHEVY; 2" TUBES; 3-1/2" COLLECTORS
SB CHEVY; 2-1/8" TUBES; 3-1/2" COLLECTORS
BB CHEVY; 2" TUBES; 3-1/2" COLLECTORS
BB CHEVY; 2-1/8" TUBES; 3-1/2" COLLECTORS
BB CHEVY; 2-1/4" TUBES; 4" COLLECTORS

9" Third-Member Packages

■ ST Iron Trutrac Package (Up to 700 hp, Case - 26.70 lb)

The ST Iron package is a completely assembled Ford 9" third member shipped ready to install. Cases are constructed from high-grade nodular iron and feature a radial ribbed design providing more uniform support for the pinion and carrier bearings. The caps, also nodular iron, are designed with increased thickness for added strength and ring-gear stability. Third members are equipped with Truetrac worm-gear differentials, with proven acceleration performance in both strip and handling applications. A Daytona-style iron pinion support is included and features a larger than stock rear tapered pinion bearing and improved oil porting. Ring-and-pinion gear selections include: 3.50, 3.70, 3.89, 4.11, 4.30 and 4.57.



8520-122 ST IRON NODULAR CASE, 35-SPLINE TRUETRAC DIFFERENTIAL, 8620 GEAR SET WITH CHOICE OF RATIO (3.50-4.57), CHROME-MOLY 1350 YOKE, DAYTONA IRON PINION SUPPORT

- ST Iron Case (Nodular Iron)
- Dayton Pinion Support
- 1350 Chrome-moly Yoke
- Truetrac Differential (31- or 35-spline)

■ Pro-Iron 35-Spline Spool Package (700 hp & up, Case - 33.50 lb)

The Pro-Iron package is a completely assembled Ford 9" third member shipped ready to install. Cases are constructed from high-grade nodular iron and feature a heavy-wall, crossribbed design providing more uniform support for the pinion and carrier bearings. The caps, also nodular iron, are designed with increased thickness for added strength and ring-gear stability. Third members are equipped with 35-spline spools, for reliable acceleration performance in high-horsepower drag race applications. Ring and pinion sets are manufactured from high-nickel 9310 steel to endure the high-impact shock loads of drag racing. Gear ratio selections include: 3.40, 3.50, 3.60, 3.70, 3.89, 4.11, 4.29, 4.57, 4.71, and 4.86.



8520-256 PRO-IRON NODULAR CASE, 35-SPLINE SPOOL, 9310
GEAR SET WITH CHOICE OF RATIO (3.40-4.86),
CHROME-MOLY 1350 YOKE, LARGE-STEM IRON

PINION SUPPORT

- Pro-Iron Case (Nodular Iron)
- Chrome-moly 1350 Yoke
- Large Stem Pinion Support

9" Third-Member Packages

■ Pro HD Aluminum Truetrac Package (Up to 1000 hp, Case - 31.50 lb)

206-T4 heat treated aluminum and feature a radial ribbed design providing more uniform support for the pinion and carrier bearings. Billet aluminum caps are retained with 9/16" studs and are fully machined. The cap design provides the utmost support for the carrier bearings and significantly reduces ring gear deflection. Third members are equipped with Truetrac worm-gear differentials, with proven acceleration performance in both strip and handling applications. The billet aluminum pinion support has a unique oil channel that is machined 360 degrees into the support to maximize oil flow to the pinion bearings thru optimized porting holes, as well as a large slot milled into the front of the support to further boost oil circulation. Ring-and-pinion gear selections include: 3.50, 3.60, 3.70, 3.89, 4.11, 4.30, 4.57, 4.71 and 4.86.

The Pro HD package is a completely assembled Ford 9" third member shipped ready to install. Cases are constructed from

8520-319 PRO HD ALUMINUM CASE, 31-SPLINE TRUETRAC DIFFERENTIAL, 8620 GEAR SET WITH CHOICE OF RATIO (3.50-4.57), CHROME-MOLY 1350 YOKE, BILLET ALUMINUM PINION SUPPORT

8520-329 PRO HD ALUMINUM CASE, 35-SPLINE TRUETRAC
DIFFERENTIAL, 8620 GEAR SET WITH CHOICE OF
RATIO (3.50-4.57), CHROME-MOLY 1350 YOKE, BILLET
ALUMINUM PINION SUPPORT

- Pro HD Aluminum Thru-Bolt Case
- Billet Aluminum Pinion Support
- 1350 Chrome-moly Yoke
- Truetrac Differential (31- or 35-spline)

Ultra Case 40-Spline Spool Package (450 hp & up, spool only)

The Ultra Case package is a completely assembled Ford 9" third member shipped ready to install. The heavy-duty aluminum 9" Ultra Case is engineered to provide better lubrication to the pinion bearings and incorporates a uniquely designed pinion support that connects with the case to provide superior ring-and-pinion life. Four chrome-moly studs are encapsulated by billet caps, allowing for shorter and stronger studs. The tail bearing is larger than factory, allowing it to withstand greater rpm speeds, and is secured by a special retainer plate. Third members are equipped with 40-spline spools. Ring and pinion sets are manufactured from high-nickel 9310 steel to endure the high-impact shock loads of drag racing. Gear ratio selections include: 3.40, 3.50, 3.60, 3.70, 3.89, 4.11, 4.29, 4.57, 4.71, and 4.86.

8520-968 ULTRA CASE (ALUMINUM), 40-SPLINE SPOOL, 9310
GEAR SET WITH CHOICE OF RATIO (3.40-4.86),
CHROME-MOLY 1350 YOKE, LARGE-STEM IRON
PINION SUPPORT



- Ultra Case (Aluminum)
- Large Stem Pinion Support
- Chrome-moly 1350 Yoke

Custom Axle Packages

We are proud to offer high-quality axle packages from the performance industry leader, Strange Engineering. Kits come with everything needed for a complete axle installation into your new aftermarket or existing factory housing and third member. Two series of axles are available. S-Series, induction-hardened axles are suitable for a wide variety of performance applications including street, strip or track use. For dedicated-drag-racing applications, the Thru-hardened, ProRace series can withstand power levels beyond 1000 horsepower. Allow 1-4 weeks for



■ Induction-Hardened Axles (S/S,ST)

Each axle begins as a SAE 1550 modified steel forging, which then undergoes spline hobbing and CNC machining to meet exact required specifications. To improve resistance against bending loads and wear, a post-machining process of electric-coil-induction hardening is performed. Induction hardening increases the hardness of the outer surface while maintaining a more-ductile axle core, necessary for reliable street use. Both S/S and S/T axles feature precisely machined, 1.5635" bearing and special radius ring seats. The press-fit radius ring minimizes stress concentrations along the bearing shoulder and improves axle-flange stability. Bolt-on, billet-aluminum brake registers are machined to size, based on your particular brake and wheel requirements.



S/S 28- and 31-Spline Axles (28-spline up to 400 hp; 31-spline up to 500 hp)

For street and handling performance applications, 31-spline S/S axles are recommended. S/S axles can be used with factory 2.891"-or aftermarket 3.0625"-bore cases with appropriate differential (posi-traction, torque-sensing, locker or spool).

S/T 35-Spline Axles (up to 800 hp)

For street/strip applications, the S/T axles feature a larger, 1.50"-diameter, 35-spline end that is better suited for the extreme levels of torque during launches. Requires 3.250"-bore case with appropriate gear carrier (locker or spool only).

■ Thru-Hardened Axles (ProRace)

Strange's ProRace series of axles are constructed from Hy-Tuf steel, a high-nickel, ultra-strength steel alloy originally developed for military use.

Axle forgings are machined to required specifications, then heat treated in a vertical furnace to achieve a uniform hardness level from surface through to the center of the shaft. Because of their Thru-Hardened quality, these axles, while torsionally superior to withstand the abusive nature of drag racing, are not suited for high bending loads common with everyday street use. ProRace axles feature precisely machined 1.5635" bearing seats and special radius ring seats. The press-fit radius ring minimizes stress concentrations along the bearing shoulder and improves axle-flange stability. Raised brake registers are machined to size, based on your particular brake and wheel requirements.



Recommended for drag-race-only use, 31- and 33-spline ProRace axles must be used with a 3.0625"-bore case with appropriate differential (posi, locker or spool; 33-spline axles for spool only).

ProRace 35-Spline Axles (up to 1000 hp)

Recommended for drag-race-only use. Requires 3.250"-bore case with appropriate gear carrier (locker or spool only).

ProRace 40-Spline Axles (1000 hp and up)

Recommended for drag-race-only use. Requires 3.250"-or-larger-bore case with appropriate gear carrier (spool only).

Note: Horsepower ratings provide a guideline based on drag-race launches and adequate traction. Vehicles equipped with street tires and/or performance applications without drag-style launches (e.g., road racing/track days) can exceed listed power levels by a fair amount.

Custom Axle Packages

Wheel-Stud Options

There are two types of wheel studs available in a variety of lengths.

Screw-In Studs (1/2")

The standard, 1/2" screw-in stud uses a headed fastener threaded through the axle flange from the back side. The wheel is centered by the raised "brake register" of the axle and driven by the lug-nut-contact surfaces. In the case of a tapered (acorn) lug nut, the driving surface is at the unsupported end of the wheel stud. Available lengths: 2", 3."



Drive Studs (5/8" only)

Chrome-moly drive studs are threaded through the flange from the outside and secured on the back by a locking nut. The front-side installation allows quick replacement if ever required. The 11/16" diameter shaft of the stud increases the contact surface with the wheel's bolt hole, to more effectively drive the wheel with reduced stud flex and without the need for shoulder-style lug nuts. Aluminum washers and lug nuts are provided. This upgrade is suitable for high-horsepower drag-racing-performance applications. Available lengths (given as 11/16" shaft length and overall length from flange): .875"/ 2.063"; 1.187"/ 2.375"; 1.500"/ 2.688"; 1.875"/ 3.125".

■ Axle-Package Pricing

Specific information regarding the vehicle application is required. Visit our Website or call to obtain technical

data sheet with ordering requirements.

Includes: axles, radius rings, billet brake registers, bearings, wheel studs



S/S	28-, AND 31-SPLINE, 1/2" STUDS
	28-, AND 31-SPLINE, 5/8" STUDS
S/T	35-SPLINE, 1/2" STUDS
	35-SPLINE, 5/8" STUDS
PRORACE	28-, 31-, 33- OR 35-SPLINE, 1/2" STUDS
	28-, 31-, 33- OR 35-SPLINE, 5/8" STUDS
	40-SPLINE, SOLID, 5/8" STUDS
	40-SPLINE, GUN-DRILLED, 5/8" STUDS

Refer to page 73 for complete group of housing end diagrams.

■ Floating Axle Kits

The Strange Engineering full-floater axle kit eliminates bending loads on the axles caused by the regular vehicle weight and by the wheels trying to accelerate the vehicle. The 40-spline floating axle shaft now only has to handle torque and can take the abuse from high-horsepower Pro Mod, Outlaw, and forced-induction classes. Billet aluminum hubs are available in dual-bolt-circle and scalloped single-bolt-circle versions. Floater axle shafts can be ordered with solid or gun-drilled cores. Calipers and pads also sold separately.

SE F2209	ALUMINUM FULL-HUB KIT FOR 8.5" SPINDLES AND 40-SPLINE AXLE SHAFTS, 5 X 4.75" AND 5 X 5.00" BOLT CIRCLES
SE F2200	ALUMINUM SCALLOPED-HUB KIT FOR 8.5" SPINDLES AND 40-SPLINE AXLE SHAFTS, 5 X 5.50" BOLT CIRCLE
SE B1855	BILLET CALIPER KIT WITH METALLIC PADS
SE A2140	SOLID FLOATER SHAFT, 40-SPLINE (EACH)
SE A2040	GUN-DRILLED FLOATER SHAFT, 40-SPLINE (EACH)







■ FLOATER AXLE SYSTEM AND RADIAL-MOUNT CALIPER WITH DRUM-STYLE PARKING BRAKE SYSTEM

Today's top pro-touring vehicles often feature some of the largest sectionwidth tires available matched with rapidly increasing levels of horsepower and torque. These drivetrain combos frequently push the reliability and safety limits of the standard flange-style axles that are common place on most muscle cars. Chassisworks solution to raising the reliability and safety limit is a complete floater-axle and brake system designed specifically for the leadingedge pro-touring market. This system features a tapered-roller unit-bearing; larger, stronger, and more reliable than the Corvette ZR1 bearing, which bolts to a specially designed housing end to remove all weight and bending load from the axles. The axle is left with the sole purpose of transferring torque to the wheels and can then be designed as

a simple axle shaft with splines at both ends. Axles are for 35-spline differentials for increased strength over 31-spline axles. To provide ample braking force for sometimes 14" and wider tires, brake kits are offered with 14" or 15" x 1.25" vented and cross-drilled rotors, with 4-piston Wilwood or Baer radial-mount calipers. An optional internal (drumstyle) parking brake is also available to complete the system.

INCREASED SAFETY: Floating axle systems are required by many racing organizations for their greater reliability and safety. An extremely important benefit of a floater axle is the ability to keep the wheel attached to the vehicle and operational in the event of a broken axle, preventing additional damage to the body, suspension, and possibly others.

Features/Benefits:

- Heavy-duty billet housing end with integrated caliper bracket bosses
- Heavy-duty wheel hub assembly; larger, stronger, more reliable than Corvette ZR1 hub
- 35-spline differential
- Internal drum-style parking brake; separates from rotor
- 14" or 15" rear disc brakes with Wilwood or Baer radialmount calipers



■ NEW PRODUCT

Floater axles are 35-spline and available in ten different lengths to accommodate Ford 9" housing widths ranging from 50 to 61 inches. Axle shafts are machined from Hy-Tuf alloy steel specifically selected for its high strength and fatigue resistance properties.





Chassisworks Stocks 10-Different Lengths - Axles are shipped in lengths ranging from 23" to 32" for housings ranging from 50" to 61". The splined area of each shaft is excessively long to allow shortening of the axle for specific lengths.



Larger diameter and spline count for significant strength increase over 31-spline axles.

■ NEW PRODUCT

TAPERED UNIT-BEARING HUB

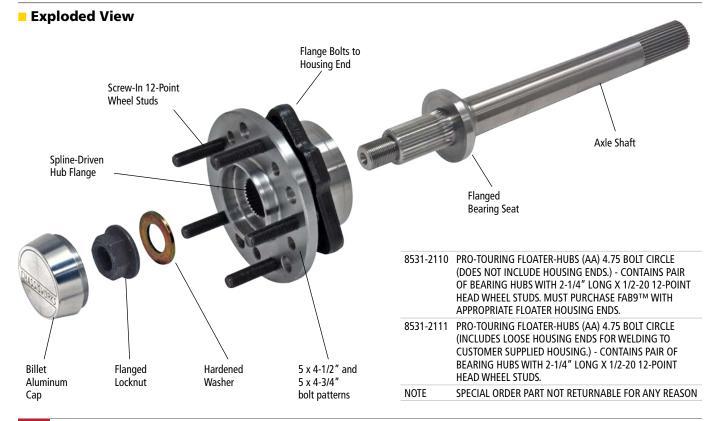
The heavy-duty bearing hub featured in Chassisworks floater axle system out performs the Corvette ZR1 hub as a result of it larger size and higher load capacity. Its opposing tapered-roller-bearing design is better suited for extreme side loads, minimizing brake pad 'knock-back' and improving brake pedal consistency in high-performance applications.





Bearing Hub Comparison



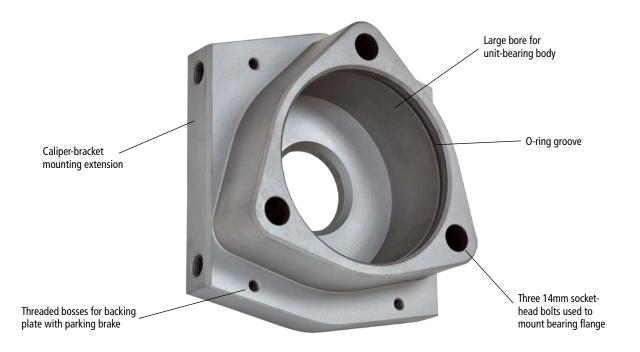




FLOATER HOUSING END

Each floater package includes a pair of billet-steel housing ends for installation with an existing housing or as part of a factory-welded FAB9 housing. Floater housing ends feature an O-ring sealed mounting bore for the unit-bearing as well as caliper mounting-bracket extensions along both edges.

 Housing ends available unassembled or factorywelded with FAB9 housing





Housing end with backing plate and parking brake assembly.



Backing plate, parking brake, and hub mounted on housing end.



■ GSTREET BRAKES FOR FLOATER HOUSING END

gStreet brake kits for Chassisworks floater housing end feature radial-mount, four-piston calipers, and 14" or 15" directional-vaned rotors with billet aluminum hats. The complete brake kit features an optional internal, drum-style, parking brake mechanism, which can be omitted from the kit in race or track only applications. The bolt-together hat-rotor-drum assembly allows worn or damaged components to be replaced easily and economically.

Enhanced-friction ceramic-formula brake pads provide smooth engagement, long service life, low noise, and light brake-dust levels for performance driving applications; performance specific pads are also available for autocross and road race applications. The kit is designed for use with rearend housing using Chassisworks' gStreet floater axle system and housing end. Fourteen- and fifteen-inch rotors require 18" and 19" wheels respectively. Includes SRP drilled (black e-coated) rotors, Wilwood calipers (black, red or nickel finish with optional Thermlock™ heat-barrier pistons), or Baer one-piece calipers.



Shown with W4A calipers



8380	GSTREET 14" SRP ROTORS, 4-PISTON AERO4 CALIPERS, NO PARKING BRAKE (BLACK OR RED)
8381	GSTREET 15" SRP ROTORS, 4-PISTON AERO4 CALIPERS NO PARKING BRAKE (BLACK OR RED)
OPTIONS	BLACK OR RED POWDER-COAT FINISH CALIPERS
	NICKEL-COATED CALIPERS WITH THERMLOCK™ HEAT-BARRIER PISTONS
	STREET AND PERFORMANCE SMART PAD (LOW NOISE, LIGHT DUST)
	AUTOCROSS SPECIFIC PAD COMPOUND
	ROAD RACE SPECIFIC PAD COMPOUND
	BAER FORGED-MONOBLOCK CALIPERS
	PARKING BRAKE SYSTEM

Features/Benefits:

- 14" and 15" cross-drilled and vented rotors with black e-coat finish
- Internal, drum-style, parking brake option
- Wilwood Aero4 4-piston, radial-mount calipers; black, red or nickel finish with Thermlock® pistons
- Optional Wilwood brake pad compounds
- Baer 6S 6-piston, radial-mount calipers



WILWOOD AERO4 4-PISTON CALIPERS

The Aero4 four-piston rear caliper has been specifically matched with the Aero6 six-piston front caliper to deliver heavy-duty, balanced, stopping power for the road or track. The caliper incorporates race technology into a body design with widespread adaptability. Radial mounting and a rotor diameter range from 14.00″ to 15.00″ give this caliper the versatility necessary to suit all types of heavy weight braking requirements. Available in black or red powder coat finish, or optional nickel finish with Thermlock™ heat-barrier pistons.

■ Wilwood ThermLock® Pistons (Nickel-coated caliper only)

Thermlock® pistons block heat transfer from the pads and reduce temperatures in the caliper, fluid, and seals by up to 25% over standard stainless steel pistons. These are the go-to calipers for all types

sustained hard braking on a wide range of autocross, rally and road course applications.









Brake Pad Compounds

The standard street and performance pads included with the gStreet brake kits are suitable for everyday use and occassional performance driving. We recommend upgrading pad compounds for regular autocross and road race use.



Brake Pad Compounds

STREET/PERFORMANCE	LOW NOISE AND DUST LEVELS
AUTOCROSS	AGGRESSIVE GRIP AT AMBIENT TEMPERATURE
ROAD RACE	AGGRESSIVE GRIP WITH HIGHER TEMPERATURE RANGE

BAER 6S 6-PISTON FORGED-MONOBLOCK CALIPERS

The Baer 6S is a forged-monoblock 6-piston caliper for pro-touring projects that need race car performance. To maximize strength the 6S caliper is machined from a single aluminum-alloy forging and utilizes an external crossover tube. Calipers feature stainless steel pistons, noise suppression springs, and staggered piston sizes to minimize pad wear. Available in red, black or silver powder-coat finish.







SRP DRILLED PERFORMANCE ROTORS

gStreet brake kits feature directional-vaned, cross-drilled rotors measuring 14" or 15" x 1.25"-wide. To create more surface area and maximize cooling, individual passages are cast internally into the rotor. Air passages or vanes are directional and curved for increased airflow over standard straight vented rotor designs. The slotted surface and cross-drilled holes improve pad-to-rotor contact by wiping the pad clean and allowing brake dust and gases to be easily exhausted. Rotors are black e-coated to prevent rust on internal and external rotor surfaces.



14" and 15" rotors for big-tire, high-performance Pro-Touring builds

gStreet 15"



14 x 1.25"

gStreet 14"





The new 15" front brake kit for Chassisworks gStreet front clip systems.

15 x 1.25"

DRUM-STYLE PARKING BRAKE

A specially designed parking brake kit had to be developed to work with the floater system's larger unit-bearing hub. The drum is independent of the rotor and fits neatly inside. Purchase and installation of the parking brake and drum kit is optional.

...specifically designed to blend a street-friendly, parking-brake feature with a no-nonsense performance vehicle.





The Chassisworks drum-style parking brake assembly is unique to our floater axle system and was specifically designed to blend a street-friendly, parking-brake feature with a no-nonsense performance vehicle.



The lightweight, billet-steel brake drum is a separate component from the rotor-hat assembly.



A single-band brake pad maximizes pad to drum contact area, requiring less pressure to effectively lock the wheel.



The complete parking brake assembly fits neatly within the brake rotor with ample room for air to flow freely through the rotor vents.

14" and 13" Rear Discs with Parking Brake

Billet SL4R Radial Mount Caliper

The Performance 14" and 13" kits use Wilwood's SL4R four-piston, billet aluminum, radial mount caliper for its superior rigidity, enhanced braking performance and pedal feel. These calipers use a closed end design that is further strengthened by five steel bridge bolts extending through the caliper body and directly across the brake pads. Smooth surface transitions help to eliminate stress points and reduce overall caliper deflection. The SL4R caliper uses lightweight, coated aluminum pistons and high temperature rubber boots to seal out debris from the piston bores. The total seal design reduces unnecessary wear, increasing the service life of the pistons. Caliper

fluid requirements are matched to the output capabilities of commonly used factory master cylinders ensuring comfortable performance in a wide range of applications. Vibration

dampening stainless steel bridge plate inserts protect the caliper body from wear caused by pad movement, greatly extending

service life. Dampened external fluid tubes are routed

through recessed pockets to keep clear of debris and reduce the

potential of vibration induced wear at the fittings. Two-piece bleed screws are easily accessed at the top of each side of the caliper body and eliminate direct wear to the aluminum body. Brake pads are also changed easily by simply removing the center bridge bolt and sliding the pads out.



SRP Rotor

High Performance Vented Disc Rotors

The kit comes standard with HP series, vented, smooth surface, rotors with integrated drum and measure 14" x 1.10", or 13" x .81". The HP rotors come uncoated and can withstand extreme operating temperatures for extended periods of time; ideal for high performance applications. For more eye-catching high-end street performance, rotors can be upgraded to a SRP series vented, cross-drilled, slotted and zinc washed rotor. To maximize cooling surface area, individual air passages are cast internally into each rotor. Air passages or vents offer increased airflow and cooling capability over standard solid rotor designs. The optional SRP rotor with slotted surface and cross-drilled holes improve pad to rotor contact by wiping the pad clean and allowing brake dust and gases to be easily exhausted.

2-piece Steel Hat Drum

Red caliper

option

wilwo

Separate machine finished, cast steel hats provide the holding drum for the parking brake shoes and allow components to be easily

replaced if damaged or worn. Rotors and hats are secured in a 12-bolt configuration to provide additional stability to the rotor. Hats are drilled for multiple five-lug bolt patterns and accept 1/2" wheel studs.

Billet Aluminum Bracket Assembly

The parking-brake, and caliper-bracket assembly is machined from high-strength billet aluminum. Structural mounting points on each bracket receive spline-threaded steel inserts, reducing the mounting hardware and simplifying installation. All components are anodized, painted, or plated for corrosion resistance and extended service life.

■ Performance 14"			
HOUSING STYLE	AXLE	HP ROTOR	SRP ROTOR
11003ING 31 TEE	OFFSET		
BIG FORD (LATE/TORINO)	2.50"	WW 140-10012	WW 140-10012-D
OPTION: RED POWDER-COATED	CALIPERS		

■ Performance 13"			
HOUSING STYLE	AXLE	HP ROTOR	SRP ROTOR
HOUSING STILE	OFFSET		
SMALL FORD (EARLY MUSTANG)	2.66"	WW 140-9216	WW 140-9216-D
BIG FORD (EARLY)	2.36"	WW 140-9217	WW 140-9217-D
BIG FORD (LATE)	2.36"	WW 140-9218	WW 140-9218-D
BIG FORD (LATE/TORINO)	2.50"	WW 140-9219	WW 140-9219-D
8.8" FORD (5-LUG NO ABS/TRACTION CONTROL)	2.50"	WW 140-9223	WW 140-9223-D
8.8" FORD (5-LUG 2005-PRESENT)	2.66"	WW 140-9221	WW 140-9221-D
SMALL GM W/ C-CLIPS	2.81"	WW 140-9213	WW 140-9213-D
SMALL GM SPECIAL	2.81"	WW 140-9215	WW 140-9215-D
MOPAR/DANA (GREEN BEARING W/ SNAP RING)	2.36"	WW 140-9222	WW 140-9222-D
OLDS/PONTIAC	2.81"	WW 140-9224	WW 140-9224-D
OPTION: RED POWDER-COATED CALIPERS			

Street 12.19" Rear Discs with Parking Brake

Forged Dynalite Caliper

The Wilwood rear disc brake kit uses Forged Dynalite (FDL) four-piston, aluminum, lug mount caliper for its superior rigidity, enhanced braking performance and pedal feel. The calipers use a closed end, internal fluid passage design that is further strengthened by four steel bridge bolts extending through the caliper body. Stress flow forging and smooth surface transitions help to eliminate stress points and reduce overall caliper deflection. FDL calipers use one-piece, 1.38"-bore, stainless-steel pistons and high-temperature, square-faced bore seals. Stainless steel slows heat transfer to the brake fluid and improves the systems resistance to heat induced pedal

fade. This reduction in heat also increases the service
life of the fluid and seals. The four individual pistons
apply pressure against both sides of the rotor. Caliper fluid
requirements are matched to the output capabilities of

commonly used factory master cylinders ensuring comfortable

performance in a wide range of applications. The Dynalite calipers are trouble-free and service friendly. Vibration-dampening, stainless-steel bridge plate inserts protect the caliper body from wear caused by pad movement, greatly extending service life. Two-piece bleed screws are easily accessed at each corner of the caliper body and eliminate direct wear to the aluminum body.

Brake pads are also easily changed by simply removing the retaining pin and sliding the pads out.



High Performance Disc/Drum Rotors

The kit comes standard with HP series, vented, smooth surface, rotors with integrated drum and measure 12.19" x .81". The HP rotors come uncoated and can withstand extreme operating temperatures for extended periods of time; ideal for high performance applications. For more eye-catching high-end street performance, rotors can be upgraded to a SRP series vented, cross-drilled, slotted and e-coated rotor. To maximize cooling surface area, 32 individual air passages are cast internally into each rotor. Air passages or vents offer increased airflow and cooling capability over standard solid rotor designs. The optional SRP rotor with slotted surface and cross-drilled holes improve pad to rotor contact by wiping the pad clean and allowing brake dust and gases to be easily exhausted.





HP Rotor

SRP Rotor

Billet Aluminum Bracket Assembly

The parking brake and caliper mounting bracket assembly is machined from lightweight, high-strength billet aluminum. Structural mounting points on each bracket receive spline-threaded steel inserts, reducing the mounting hardware and simplifying installation.

All components are anodized, painted, or plated for corrosion resistance and extended service life. Brackets are available for all standard housing ends.



HOUSING STYLE	AXLE	HP ROTOR	SRP ROTOR
HOUSING STILE	OFFSET		
SMALL FORD (EARLY MUSTANG)	2.66"	WW 140-7143	WW 140-7143-D
BIG FORD (EARLY)	2.36"	WW 140-7139	WW 140-7139-D
BIG FORD (LATE)	2.36"	WW 140-7582	WW 140-7582-D
BIG FORD (LATE/TORINO)	2.50"	WW 140-7140	WW 140-7140-D
8.8" FORD (5-LUG NO ABS/TRACTION CONTROL)	2.50"	WW 140-7146	WW 140-7146-D
8.8" FORD (5-LUG 2005-PRESENT)	2.66"	WW 140-9228	WW 140-9228-D
CAMARO/FIREBIRD 93-02	2.75"	WW 140-7148	WW 140-7148-D
SMALL GM W/ C-CLIPS	2.81"	WW 140-7141	WW 140-7141-D
SMALL GM W/ C-CLIPS	2.75"	WW 140-7149	WW 140-7149-D
SMALL GM SPECIAL	2.81"	WW 140-7578	WW 140-7578-D
SMALL GM (STAGGERED SHOCK MOUNT)	2.75"	WW 140-9315	WW 140-9315-D
MOPAR/DANA (GREEN BEARING W/ SNAP RING)	2.36"	WW 140-7144	WW 140-7144-D
OLDS/PONTIAC	2.81"	WW 140-7147	WW 140-7147-D
OPTION: RED POWDER-COATED CALIPERS			

Rear Brake Guide

Applications - Rear Disc Brake Parking Brakes

HOUSING STYLE	AXLE	PERFOR	MANCE 13"	STREET	12.19"
HOOSING STILE	OFFSET	HP ROTOR	SRP ROTOR	HP ROTOR	SRP ROTOR
SMALL FORD (EARLY MUSTANG)	2.66"	WW 140-9216	WW 140-9216-D	WW 140-7143	WW 140-7143-D
BIG FORD (EARLY)	2.36"	WW 140-9217	WW 140-9217-D	WW 140-7139	WW 140-7139-D
BIG FORD (LATE)	2.36"	WW 140-9218	WW 140-9218-D	WW 140-7582	WW 140-7582-D
BIG FORD (LATE/TORINO)	2.50"	WW 140-9219	WW 140-9219-D	WW 140-7140	WW 140-7140-D
8.8" FORD (5-LUG NO ABS/TRACTION CONTROL)	2.50"	WW 140-9223	WW 140-9223-D	WW 140-7146	WW 140-7146-D
8.8" FORD (5-LUG 2005-PRESENT)	2.66"	WW 140-9221	WW 140-9221-D	WW 140-9228	WW 140-9228-D
CAMARO/FIREBIRD 93-02	2.75"	-	-	WW 140-7148	WW 140-7148-D
SMALL GM W/ C-CLIPS	2.81"	WW 140-9213	WW 140-9213-D	WW 140-7141	WW 140-7141-D
SMALL GM W/ C-CLIPS	2.75"	-	-	WW 140-7149	WW 140-7149-D
SMALL GM SPECIAL	2.81"	WW 140-9215	WW 140-9215-D	WW 140-7578	WW 140-7578-D
SMALL GM (STAGGERED SHOCK MOUNT)	2.75"	-	-	WW 140-9315	WW 140-9315
MOPAR/DANA (GREEN BEARING W/ SNAP RING)	2.36"	WW 140-9222	WW 140-9222-D	WW 140-7144	WW 140-7144-D
OLDS/PONTIAC	2.81"	WW 140-9224	WW 140-9224-D	WW 140-7147	WW 140-7147-D

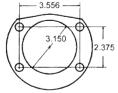
Applications - Drag Race Rear Disc Brakes

HOUSING STYLE	AXLE	DRAG	11.44"
HOUSING STILE	OFFSET	SOLID ROTOR	DRILLED ROTOR
SMALL GM W/ C-CLIPS	2.81"	WW 140-0263	WW 140-0263-D
SMALL GM W/ C-CLIP ELIMINATORS	2.81"	WW 140-4545	WW 140-4545-D
SMALL GM SPECIAL	2.81"	WW 140-5771	WW 140-5771-D
SMALL FORD (EARLY MUSTANG)	2.66"	WW 140-0262	WW 140-0262-D
BIG FORD (EARLY)	2.36"	WW 140-0261	WW 140-0261-D
BIG FORD (EARLY)	2.50"	WW 140-3623	WW 140-3623-D
BIG FORD (LATE/TORINO)	2.50"	WW 140-2119	WW 140-2119-D
SYMMETRICAL (LAMB / MARK WILLIAMS)	2.81"	WW 140-0265	WW 140-0265-D
SYMMETRICAL (LAMB / MARK WILLIAMS69" STUDS)	2.81"	WW 140-5348	WW 140-5348-D
MOPAR/DANA GREEN BEARING	2.36"	WW 140-0260	WW 140-0260-D
MOPAR/DANA GREEN BEARING W/ SNAP RING	2.36"	WW 140-5255	WW 140-5255-D
MOPAR/DANA GREEN BEARING W/ SNAP RING	2.50"	WW 140-8853	WW 140-8853-D
OLDS/PONTIAC	2.81"	WW 140-0264	WW 140-0264-D
OLDS/PONTIAC (.69" STUDS)	2.81"	WW 140-5349	WW 140-5349-D

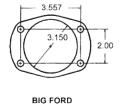
Housing End Diagrams

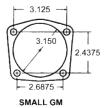
Axle Offset:

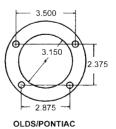
Measured from face of housing end to outside face of axle flange.

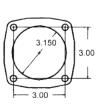


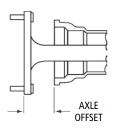
BIG FORD

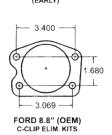


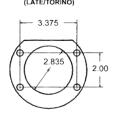








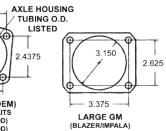


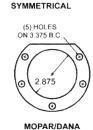


SMALL FORD

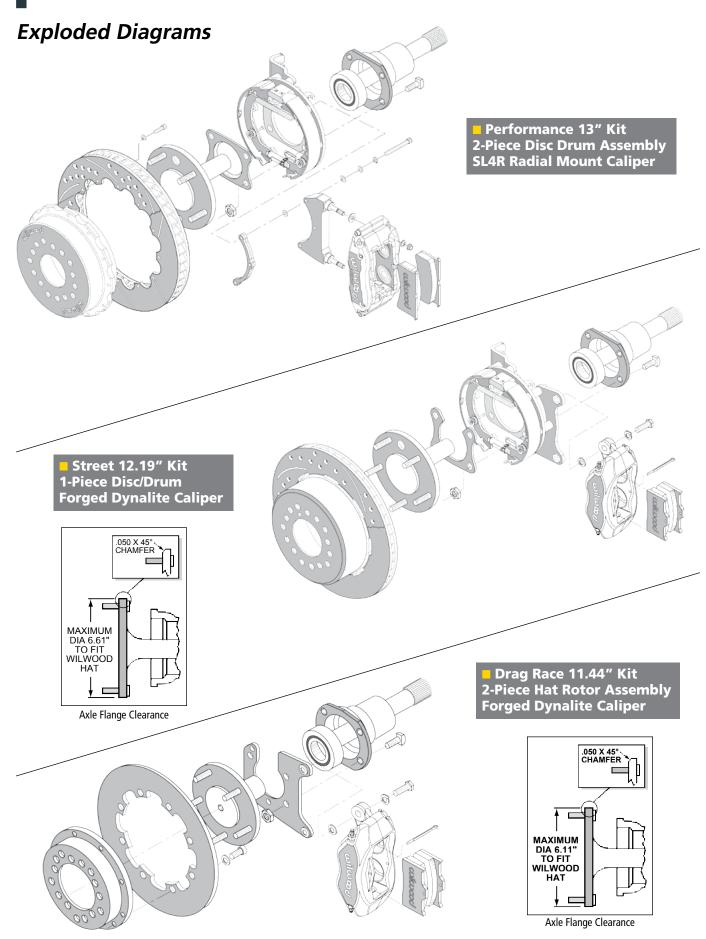


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Rear Brake Guide



Tandem Chamber Master Cylinders

The Wilwood master cylinder is a direct-mount, high-quality upgrade designed for use with aftermarket brake systems.

Master-cylinder bodies are die cast using premium aluminum

alloy for increased durability with minimal weight. Exterior finishes are available "ascast" or "bright finished," using a mediaburnishing technique. Caps are black-anodized, machined aluminum and secured by four fasteners to provide a leakproof seal. Units are available with .88", 1.00" (manual) and 1.13" (power) bore sizes and feature a 2:1 volume ratio between the primary and secondary chambers. Includes tube-adapter set.



Die-Cast Construction

High-pressure die casting of a premium alloy produces a high-capacity body that is lightweight, looks great, and has the durability for competition. Die casting has the benefit of producing detailed components with excellent dimensional tolerance and surface finish without the need for expensive machine time of an equivalent billet part. The result is a lightweight, great-looking part that performs, and at a fraction of the cost. Available for those wanting a show-car look is a brightfinish, media-burnished version (pictured), guaranteed to catch the eye of the most-discriminating enthusiasts.

100%-Fluid Seal

A black-anodized, machined-billet lid captures a pressure-balanced bellows gasket for 100% sealing against moisture invasion or fluid leakage. The aluminum lid is vented, allowing the bellows to react to chamber vacuum independently, without disruption of the seal.



Fluid Volumes

A total piston stroke of 1.10" is distributed at a 2:1 volume ratio between the primary and secondary chambers. A choice of either .88", 1.00" or 1.13" bore sizes provides the necessary options to match the volume and pressure requirements of nearly any application. Generally, the .88" and 1.00" bores are used for manual brakes, and 1.13" for power brakes.

Bolt-On Installation

The mounting flange is slotted to accommodate installation on bolt centers between 3.22" and 3.40". It directly bolts on to many OE mounts, including the popular Ford Mustang, Chrysler, GM and Corvette master-cylinder bolt patterns. The body also features two through-hole mounts on 6.40" centers for side mounting to frame members or other secure elements of the chassis.



Plumbing Versatility

Each master cylinder is configured with full separation between the front and rear reservoir chambers and fluid outlets. There is pressure access on both sides of the piston bore for right- or left-hand plumbing (based on mount location). Included with the master cylinder are fittings, for various installation configurations. They include one tube adapter measuring 1/2-20x9/16-18 IF (P/N 220-8575); one tube adapter measuring 1/2-20x1/2-20 IF (P/N 220-8574); and two tube adapters measuring 1/2-20x3/8-24 IF. (IF = Inverted Flare)

PART NUMBER	BORE SIZE	APPLICATION	FINISH
WW 260-9439	0.88"	MANUAL	STANDARD
WW 260-8555	1.00"	MANUAL	STANDARD
WW 260-8556	1.13"	POWER	STANDARD
OPTIONS	BLACK E-COA	AT FINISH (ADD "B	K" P/N SUFFIX)
	BRIGHT FINIS	SH (ADD "P" P/N S	UFFIX

Brake System Accessories

To complement our line of brake kits and components, these additional items will enable you to fine-tune your brake system for improved performance. The proportioning valve provides brake-bias adjustment to optimize available traction and heavy-braking stability. Residual pressure valves maintain line pressure at the caliper or wheel

cylinder to provide a firmer pedal and more-immediate braking response. The caliper-pressure gauge allows precise measurement of line pressure to ensure the system is working correctly as well as establishing an adjustment from which to begin.

■ Braided-Stainless Flex-line Kit

Our braided-stainless, flex-line kit reduces line flex, common with OEM brake lines, to improve brake system response, and pedal feel. Teflon® hoses, hose ends, and mounting brackets are included.





■ Proportioning Valve

The Wilwood proportioning valve uses a compact, lightweight (5.2 oz.), forged-billet design and is an essential component for fine-tuning your brake system. Pressure adjustments range from 100-1000 psi and provide for a maximum decrease of 57% in line pressure, the most of any valve. The valve is typically installed inline to adjust rear brake-line pressure, but can also be installed to reduce front brake-line pressure in skinny-tire Pro Street or drag-racing vehicles.



■ Residual Pressure Valves

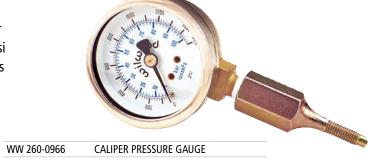
The Wilwood inline pressure valves retain a minimum brake-line pressure to help eliminate excessive pedal travel in disc- and drum-brake systems. Vehicles equipped with drum brakes require a 10-psi residual-pressure valve to counteract spring tension. The 2-psi valve is used on disc-brake systems with master cylinder mounted below the calipers. Valves are available individually or packaged with fittings.



WW 260-1874	2 PSI DISC BRAKE RESIDUAL VALVE ONLY
WW 260-1876	10 PSI DRUM BRAKE RESIDUAL VALVE ONLY
WW 260-3278	2 PSI DISC BRAKE RESIDUAL VALVE WITH FITTINGS
WW 260-3279	10 PSI DRUM BRAKE RESIDUAL VALVE WITH FITTINGS

Caliper Pressure Gauge

The easy-to-read, 2"-diameter, non-hazing face allows for quick brake-line-pressure checks from 0-1500 psi. Twenty-psi graduations and accuracy to 1.5% permit reliable brake-bias setup and brake-system troubleshooting. Gauge threads directly in place of bleeder valve.



VariShock Technology

VariShock Design

The VariShock product line offers an affordable and versatile, high-end performance improvement over OEM replacements and traditional twin-tube shock absorbers. Our updated design overcomes the major shortcomings of traditional gas shocks and low-end twin-tube shocks. Varishocks provide a more usable adjustment range and response curve, improved heat dissipation, and lightweight billet-aluminum construction.

Improved Heat Dissipation

Traditional twin-tube shocks provide damping force by moving fluid back and forth between the inner compression tube and the surrounding reservoir. This rapidly heats the fluid that remains trapped inside the compression tube, causing outgassing and shock fade. VariShock's system of internal valves circulates fluid in a single direction through the shock absorber body, utilizing the entire volume of fluid to absorb heat. Thermally conductive materials are used internally to further help equalize fluid temperature. Heat energy is then dissipated through the shock base and body. Coil-over threaded bodies provide additional surface area for more rapid cooling.

Fluid Control

A shocks purpose is to limit the rate at which the suspension moves, whether induced by road irregularities or by chassis movement. By carefully controlling the rate of fluid flow into the different areas of the shock we can better manage the suspension's ability to keep the tire in contact with the road. VariShocks operate with zero bleed, meaning that absolutely all fluid flow is purposely directed and metered. By contrast, many manufacturers skimp on sealing the shocks internals to lower manufacturing costs. The allowed internal leakage makes valving adjustments less effective and lacking in precision. The VariShock total-seal design gives you improved control over the entire range of damping and enhances adjustment effectiveness at the slower range of piston speeds (0-4 in/sec) that control small chassis movement and vehicle ride quality.

A combination of fatigue-resistant deflective-disk and adjustable poppet valves focus damping forces at a range useful to the widest variety of vehicle types and performance applications. Damping-force ranges differ depending upon the adjustment features and mounting configuration of the shock. Custom valve sets are also available to alter the adjustment range of compression or rebound independently. VariShocks provide digressive damping to permit finer adjustment at the higher range of piston speeds (6-12 in/sec) that control rapid suspension movement and ride harshness. To give better control of vehicle-handling without rapidly increasing ride harshness, rebound (extension) valving is purposely stiffer with a broader adjustment range.

VariShock Quality

Delivering a finished product that is of excellent quality and value is the primary focus throughout the VariShock product line. Unlike other brands in this price range, VariShocks are engineered, manufactured, and assembled in America using state-of-the-art engineering workstations and computer-numeric-controlled (CNC) manufacturing equipment. Each component, including valves, adjusters, and internal shaft seals is designed and manufactured



VariShock Technology

specifically for use in VariShock products. This level of clean-sheet engineering is the first step to producing longer lasting seals that keep dirt out of the shock absorber and extend service life between rebuilds.

Assembly of the components is equally important to delivering a quality product. To avoid the possibility of manufacturing debris contaminating the shock fluid and seals, the VariShock-assembly clean room is housed in a completely separate facility. After assembly, each shock is thoroughly dyno-tested and calibrated to meet Varishock's strict performance goals. This ensures virtually

identical performance from every pair throughout their entire range of travel. By carefully controlling engineering, manufacturing, assembly, and final testing, VariShock can confidently deliver the highest-quality product with the most value for

our customers.

Adjustable QuickSet Series



The VariShock QuickSet series allows you to easily tune your suspension for improved cornering and acceleration traction, or to quickly adapt to current track conditions. Adjustment takes only a few seconds and is made with the

VariShock installed on the vehicle. Readily accessible, 16-position adjustment knobs can be operated by hand or with the aid of a common allen wrench.

The QuickSet 1 valve system features a single adjustment knob that controls overall damping stiffness of the shock. Knobs are clearly etched indicating the correct direction of rotation to decrease (-), or increase (+) damping stiffness. There are a total of 16 specific adjustment positions.

The QuickSet 2 valve system features dual adjustment knobs that independently control bump- and rebound-damping stiffness of the shock.

Dual-arrow symbols engraved into the shock body demonstrate the function of each knob. Arrows pointing toward each other designate bump (compression) adjustment; the shock collapsing. Arrows pointing away from each other represent rebound (extension) adjustment; the shock extending. There are 16 specific adjustment positions for each knob, with a total of 256 unique combinations possible. Each adjustment position is indicated by a detent that can be felt when turning the knob, and an audible click as the knob gently locks into position. Only very light force is necessary to rotate the knob past each detent.

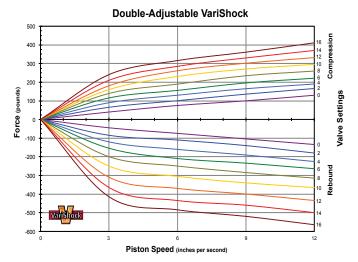
The Truth About 16- vs. 24-Clicks

Don't be fooled by shocks offering more adjustment clicks. They are actually 1/2-click adjustments. The manufacturer merely added more detents to the mechanism without increasing the range of adjustment. This practice gives more clicks, but the

adjustment is so slight that your vehicle will not respond to the change. A 16-position VariShock actually has a broader range of adjustable force with the added benefit of a more manageable number of adjustments to try.

VariShock Dyno Graph

A shock dyno graph displays how much force is required to compress or extend the shock over a range of piston speeds (Force vs. Absolute Velocity). For readability purposes, the following graph only plots response curves for every other adjustment setting of the Bolt-In QuickSet 2 VariShock. The shock's digressive valving curve can be easily identified by the steeper incline in the slowest piston speeds and more level response as piston speed increases. Each setting provides an even increase of stiffness in relatively even increments across the entire range without deviation from the general response curve. This consistency can be found throughout the VariShock product line and makes suspension tuning simple and intuitive. VariShock compression and rebound adjustments are completely independent from each other. Adjustment of one direction of shock travel does not inadvertently affect the other, enabling you to find the correct settings for your vehicle in less time.



Graph displays valving curve of QuickSet 2 double-adjustable shock. Valving curves of VariStruts and QuickSet 1 products will differ.

■ NEW PRODUCT

■ QUICKSET 4 REMOTE RESERVOIR (Q4R)

Our gas-pressurized remote reservoir QuickSet 4 system offers excellent performance with increased travel range at an affordable price when compared to shocks offered by other manufacturers with similar features.

Four 16-position knobs provide high- and low-speed adjustment of bump and rebound independently. The Q4R 4-way valve system is VariShock's most versatile and flexible tuning option with thousands of shock-force-curve variations possible. To support this level of tuning sophistication VariShock provides detailed technical guides to assist you throughout the tuning process.

VariShocks are engineered, manufactured, and assembled in America using state-of-the-art engineering workstations and computer-numeric-controlled 5-axis (CNC) manufacturing equipment. Each component, including valves, adjusters, and internal shaft seals is designed and manufactured specifically for use in VariShock products. This level of clean-sheet engineering was the first step to producing an excellent product that can be adjusted to your exact needs.

Separate 16-Position
High- and Low-Speed
Adjustment of
Bump and Rebound

Why settle for a 3-Way adjustable... ...when you can have a 4-Way?



PART NUMBER	DESCRIPTION	USAGE	SPRING	COMPRESSED	EXTENDED	TRAVEL
AS 11411-35	QUICKSET 4 REMOTE RESERVIOR	FRONT	7"	9.31"	12.81"	3.50"
AS 11411-43	QUICKSET 4 REMOTE RESERVIOR	BOTH	9″	10.06"	14.31"	4.25"
AS 11411-50	QUICKSET 4 REMOTE RESERVIOR	REAR	12"	10.81"	15.81"	5.00"
AS 11411-60	QUICKSET 4 REMOTE RESERVIOR	REAR	12"	11.81"	17.81"	6.00"
AS 11411-70	QUICKSET 4 REMOTE RESERVIOR	REAR	14"	12.81"	19.81"	7.00"
AS 114V1-43*	QUICKSET 4 REMOTE RESERVIOR	FRONT	9"	12.06"	16.31"	4.25"

NOTE: Sold only in pairs. Springs sold separately.

(*) 2" Extended base fits Total Control Products front coil-over conversion TCP FCOC-FD

4-Way Adjustable Valve System

The VariShock Q4R remote reservoir shock separates the bump and rebound valve mechanisms between the two units to free up valuable space within the main shock body. The benefit is a shorter shock length that provides greater flexibility when mounting without sacrificing shock travel. Each adjustment knob can be set to one of sixteen different positions and clearly marked to illustrate the effect it has on the shock's performance.

Bump Adjustment Independent High- and Low-Speed

Located at the base of the remote reservoir are the bump valve adjustment knobs. The facing arrows represent the shock coming together (bump/compression) with the letters "L" and "H" labeling the low-speed and high-speed knobs respectively. "Plus" and "minus" signs etched into each knob show the rotation direction to increase or decrease valve stiffness.



Rebound Adjustment Independent High- and Low-Speed

The rebound valve adjustment knobs are located on the base of the shock. The opposing arrows represent the shock separating (rebound/extension) with the letters "L" and "H" labeling the low-speed and high-speed knobs respectively. "Plus" and "minus" signs etched into each knob show the rotation direction to increase or decrease valve stiffness.





Double-Swivel Banjo ...can be rotated 360-degrees for hose clearance. Plus the hose can rotate 360-degrees to position the reservoir without kinking the hose.



■ NEW PRODUCT

High-Travel VariSprings

VariSpring's line of coil springs was designed to complement the VariShock family. A new high-tensile wire is used that is stronger than the chrome-silicon wire used by other manufacturers. The improved material allows VariSprings to compress until the coils touch without damaging the springs or causing them to take a set, which adversely affects handling and randomly changes the spring height. This additional range of usable flex gives VariSprings greater travel than competitors' chrome-silicon springs of the same rate and permits the use of a more aggressive coil angle, reducing material used and overall weight. VariSprings can improve suspension control and available traction by allowing your shock to operate throughout its entire travel range.

VariSprings are available for front and rear applications in four lengths and a broad range of spring rates to suit a variety of shock and performance applications. Lengths range from 7 to 14 inches and rates from 80 to 850 pounds per inch, depending upon spring length. The steps between rates are sufficiently close to make very fine adjustments.

VAS 21-07XXX	7" TRAVEL VARISPRINGS - 210-650 LB/IN RATES (PAIR)
VAS 21-09XXX	9" TRAVEL VARISPRINGS - 185-950 LB/IN RATES (PAIR)
VAS 21-12XXX	12" TRAVEL VARISPRINGS - 80-650 LB/IN RATES (PAIR)



Billet Spring Seat Hardware

To mount the spring over the shock, VariShock billet aluminum upper and lower spring seats are required. Spring seats utilize inset shoulders and application specific bores to perfectly align the top mount, spring, and shock body.

Upper Spring Seats – Coil-over-shock upper seats feature an open slot that allows the spring to be easily installed or replaced without removing the upper mounting eye.

Lower Spring Seat – The one-piece lower spring seat rides on the shock-body ACME threads and is used to adjust spring preload. Each seat features two spring-loaded, ball-lock mechanisms to securely hold the adjusted setting. When rotated, the ball-locks and shock-body grooves provide positive-click stops to audibly and physically notify you of every half-turn. The lock mechanism is easily operated using a common 5/32" allen wrench to tighten (lock) or loosen (unlock) the spring seat's two set screws. The lower spring seat also features six individual notches that enable the VariShock four-tang spanner wrench to interlock with the spring seat for slip-free adjustment. Upper and lower spring seats are anodized for surface hardening and improved appearance.





Reservoirs can be mounted to the forward strut bars with the optional 1-5/8"-round billet clamps. Flat-base clamps are also available for mounting against flat surfaces or panels.



Adjusting the shock preload and dampening can be done without removing the shock.



An optional shock mount inset is available with the trunk-area floor kit to cleanly display the reservoirs in the trunk.



Various hardware is available to assist in safely routing the reservoir hose. The rubberized clamp and bracket set, shown above, fits against the jam nut of any 3/4" thread rod end or adjuster.



The passage bulkhead provides a clean and safe way of passing the remote reservoir through any accessible flat surface and securing the hose.

■ NEW PRODUCT

■ REMOTE RESERVOIR CLAMP MOUNTS

■ Remote Shock Reservoir Mount (2.225" ID), Clamp-Style - Flat Surface

Contains a pair of mounts to attach two 2.225" OD reservoir to a flat surface with 1/4" bolts on 2.00" spacing.

VAS 516-01-000

REMOTE SHOCK RESERVOIR MOUNT (2.225" ID), CLAMP-STYLE - FLAT SURFACE) (PAIR)

■ Remote Shock Reservoir Mount

(2.225" ID), Clamp-Style -1-5/8" Open

Contains a pair of mounts to attach two 2.225" OD reservoir to 1-5/8" tube.



VAS 516-01-163

REMOTE SHOCK RESERVOIR MOUNT (2.225" ID), CLAMP-STYLE - 1-5/8" OPEN (PAIR)



Contains: a pair of mounts to attach two 2.225" OD reserviour to 1" OD tube, pass thru style.

VAS 516-01-100P

REMOTE SHOCK RESERVOIR MOUNT (2.225" ID), CLAMP-STYLE - 1" PASS-THROUGH (PAIR)



■ REMOTE RESERVOIR CLAMP MOUNTS



VAS 517-RD-F REMOTE SHOCK RESERVOIR MOUNT, SILO-STYLE

(DUAL) - FLAT SURFACE) (EACH)

VAS 517-RS-F REMOTE SHOCK RESERVOIR MOUNT, SILO-STYLE

(SINGLE) - FLAT SURFACE (PAIR)



■ REMOTE RESERVOIR HOSE ACCESSORIES

■ Remote Shock Reservoir Passage Bulkhead (2.5" ID x ½" Hose) Flat Surface

Set of closeouts to seal two VariShock reservoir hoses in seperate locations to a flat surface requires 2-1/2" pass thru hole.

VAS 517-HS-F SINGLE HOSE FLAT SURFACE PASS THRU BULKHEAD (PAIR)

■ Hose Clamp with Bracket Set – 3/4"-Bore Mount with 1/2" Hose Clamp

Teardrop UCA clamp 3/4" hole attaches -5 hose to any upper control arm with 3/4" adjuster.



VAS 517-HS-H TEARDROP UPPER CONTROL ARM CLAMP 3/4" HOLE (ATTACHES TO UCA ADJUSTER) (PAIR)

■ COIL-OVER SHOCK ACCESSORIES

■ Coil-Over Spring Seat Extended

Billet-aluminum upper spring seat with 3/4"-offset seat for 2-1/2" ID spring.

899-002-204

899-002-204 COIL-OVER SPRING SEAT EXTENDED (SOLD INDIVIDUALLY)

■ Spring-Seat Thrust Bearings

Thrust bearings are used at the lower spring seat to reduce friction when adjusting ride height. New stainless "cap-style" seats, a VariShock exclusive, enclose the thrust bearing to keep



VAS 513-100

VAS 513-100

dirt out.

SPRING-SEAT THRUST BEARINGS (PAIR)

■ Coil-Over Spring Compressor

The VariShock coil-over-spring compressor greatly eases lower-spring-collar adjustment on high-preload or high-rate applications. Heavy-duty plates at each end fit 2-1/2" inside-diameter coil springs of 130 lb., rate or greater, with a maximum spring height of 14".



VAS 200 COIL-OVER SPRING COMPRESSOR FOR 2-1/2" SPRINGS)

■ Spanner Wrench

Also available is an exclusive spanner wrench, incorporating four tangs, which will not slip off the lower spring seat because it engages the seat in four places (not one, like common spanners).



899-012-201 VARISHOCK SPANNER WRENCH, ZINC PLATED STEEL

VariShock Coil-Overs

Shock-System Options

The g-Machine suspension systems can be equipped with VariShock coil-over shocks and high-travel VariSprings. A traditional coil-over configuration features the ability to corner balance the vehicle by varying spring preload, and offers predictable suspension tuning results.

Premium Urethane Ends

The urethane end has up to 350% more urethane material than other brands, for superior load distribution, yet no less clearance around the eye. We also chose a premium urethane that has much higher load capacity for improved life than the poly bushings from other manufacturers.



Optional 1" Extended Top-Mount Eye: Raises vehicle ground clearance from 4-1/2" to 5-3/4", measured at the suspension crossmember.



Billet Spring Seat Hardware

VariShock billet aluminum upper and lower spring seats utilize inset shoulders and counterbores to perfectly align the top mount, spring, and shock body. Upper seats feature an open slot that allows the spring to be easily installed or replaced without removing the upper mounting eye. One-piece lower spring seats ride on the shock-body ACME threads and are used to adjust spring preload. Each lower seat features two spring-loaded, ball-lock mechanisms to securely hold the adjusted setting. When rotated, the ball-locks and shock-body grooves provide positive-click stops to audibly and physically notify you of every half-turn. The lock mechanism is easily operated using a common 5/32" allen wrench to tighten (lock) or loosen (unlock) the spring seat's two set screws. The lower spring seat also features six individual notches that enable the VariShock four-tang spanner wrench to interlock with the spring seat for slip-free adjustment. Upper and lower spring seats are anodized for surface hardening and improved appearance.



SensiSet uses ride-sensitive valving that is factory-set.



QuickSet 1

Single 16-position knob adjusts bump and rebound simultaneously.



QuickSet 2

Dual 16-position knobs adjust bump and rebound independently.





with billet base

Mount-eye counterbore

	SENSISET	QUICKSET 1	QUICKSET 2	MOUNT EYES	TOTAL TRAVEL	COLLAPSED LENGTH	EXTENDED LENGTH	RIDE-HEIGHT MINIMUM	RIDE-HEIGHT MAXIMUM	SPRING LENGTH
FRONT	VAS 11022-425	VAS 11122-425	VAS 11222-425	POLY	4.25"	10.05"	14.30"	11.75"	12.60"	9″
	WITH EXTENDED	D EYE>		POLY	4.25"	11.05"	15.30"	12.75"	13.60"	9"
REAR	VAS 11022-515	VAS 11122-515	VAS 11222-515	POLY	5.15"	10.95"	16.10"	13.01"	14.04"	12"
	WITH EXTENDED	D EYE>		POLY	5.15"	11.95"	17.10"	14.01"	15.04"	12"
NOTES	INCLUDES SHOC	KS, MOUNTING-EY	E HARDWARE, AND	SPRING-SE	AT SET; SPRIN	IGS SOLD SEPAR	ATELY UNLESS (OTHERWISE NOTE)	
	VARISHOCKS SO	LD ONLY IN PAIRS								

VariSpring Coil Springs



■ Front VariSprings, 9-inch

VAS 21-09210	210 LB/IN, TRAVEL = 5.64
VAS 21-09240	240 LB/IN, TRAVEL = 5.57
VAS 21-09275	275 LB/IN, TRAVEL = 5.46
VAS 21-09310	310 LB/IN, TRAVEL = 5.57
VAS 21-09350	350 LB/IN, TRAVEL = 5.17
VAS 21-09400	400 LB/IN, TRAVEL = 5.07
VAS 21-09450	450 LB/IN, TRAVEL = 4.90
VAS 21-09500	500 LB/IN, TRAVEL = 4.77
VAS 21-09550	550 LB/IN, TRAVEL = 5.06
VAS 21-09600	600 LB/IN, TRAVEL = 4.41
VAS 21-09675	675 LB/IN, TRAVEL = 4.80
VAS 21-09750	750 I B/IN. TRAVFI = 4.24

■ Rear VariSprings, 12-inch

VAS 21-12080	80 LB/IN, TRAVEL = 8.63
VAS 21-12095	95 LB/IN, TRAVEL = 8.28
VAS 21-12110	110 LB/IN, TRAVEL = 7.91
VAS 21-12130	130 LB/IN, TRAVEL = 8.43
VAS 21-12150	150 LB/IN, TRAVEL = 7.61
VAS 21-12175	175 LB/IN, TRAVEL = 7.60
VAS 21-12200	200 LB/IN, TRAVEL = 7.45
VAS 21-12250	250 LB/IN, TRAVEL = 7.00
VAS 21-12300	300 LB/IN, TRAVEL = 7.07
VAS 21-12350	350 LB/IN, TRAVEL = 7.00
VAS 21-12400	400 LB/IN, TRAVEL = 6.35
VAS 21-12450*	450 LB/IN, TRAVEL = 5.86
VAS 21-12500*	500 LB/IN, TRAVEL = 5.06
VAS 21-12550*	550 LB/IN, TRAVEL = 5.50
VAS 21-12600*	600 LB/IN, TRAVEL = 5.17
VAS 21-12650*	650 LB/IN, TRAVEL = 5.76

The new VariSpring line of springs was designed to complement the VariShock family. Once again, we used higher technology to resolve application limitations. These springs are manufactured using a new chrome-silicon, high-tensile wire. This allows the springs to "set solid." The springs can compress until the coils touch without damaging the spring or causing it to take a set, which ultimately changes the ride height. Since this

wire can flex more than conventional wire, these springs have greater travel than our competitors' springs of the same rate. These springs will allow your shocks to travel their full range of motion without going solid. This gives you greater traction and control at full bump, and additional suspension travel to work with. If you are ready to take advantage of higher technology with greater travel and lighter, stronger springs, step up to VariSprings.

VariSprings have a silver-powder-coat finish. They are individually labeled with our part number and spring rate on the outside of the coils for easy reference. VariSprings are available for front and rear applications in four lengths and a broad range of rates. All VariSprings are +3% on rate. The steps between rates are sufficiently close to make very fine adjustments. Sold in pairs.

VariShock Accessories

■ Spring-Seat Thrust Bearings

Thrust bearings are used at the lower spring seat to reduce friction when adjusting ride height. New stainless "cap-style" seats, a VariShock exclusive, enclose the thrust bearing to keep dirt out.



VAS 513-101 SPRING SEAT THRUST BEARING SET, ORIGINAL STYLE
VAS 513-100 SPRING SEAT THRUST BEARING SET, DUST-SHIELD STYLE

Shock Extended Eye

Our direct-replacement, billet-aluminum shock mounts feature a 1" extended body, and reuse your existing VariShock polyurethane bushings. Extended eyes can be used with any VariShock coil-over shock to raise ride height. Proper suspension travel and clearance must be verified prior to installation.



VAS 512-2-2 1"-EXTENDED TOP SHOCK EYE, POLY (PAIR)

■ Coil-Over Spring Compressor

The VariShock coil-over-spring compressor greatly eases lower-spring-collar adjustment on high-preload or high-rate applications. Heavy-duty plates at each end fit 2-1/2" inside- diameter coil springs of 130 lb., rate or greater, with a maximum spring height of 14".

VAS 200 COIL-OVER SPRING COMPRESSOR FOR 2-1/2" SPRINGS

Spanner Wrench

VariShock's exclusive spanner wrench, incorporates four tangs, which engage the lower spring seat in four places, preventing accidental slips.



899-012-201 SPANNER WRENCH, PLATED STEEL

VariShock Air Springs

VariShock air springs are a unique product line that combines VariShock shocks with air-bag springs built around the VariShock QuickSet aluminum-bodied, adjustable-shock family. Our double-

adjustable shock unit gives you complete ride control as well as adjustable ground clearance. For the ultimate in driving performance and ride-height adjustability, we recommend the VariShock air springs.

We even designed-in trouble-free installation! We made the diameter of the upper-air-bellows mount significantly smaller. We also extended the mounting eyes and machined them both to increase clearance and to incorporate the air-inlet fitting. A full range of travel lengths covers front- and rear-suspension applications. Choose from single-adjustable QuickSet 1 or double-adjustable QuickSet 2 models. Urethane bushings are standard, top and bottom.







■ Front - Dual Poly-Eye, 6-1/2" Double-Convoluted with Eye Port

- Upper Mount: Poly-urethane eye, 1/2" or 5/8" hardware with 1-1/4" clevis
- Lower Mount: Poly-urethane eye, 1/2" or 5/8" hardware with 1-1/4" clevis
- Heavy Capacity: Recommended to support engine weight

PART NUMBER	VALVING	TRAVEL	COLLAPSED LENGTH	EXTENDED LENGTH	RIDE-HEIGHT MINIMUM	RIDE-HEIGHT MAXIMUM	
VAS 131H2-425	SINGLE	4.10"	10.45"	14.55"	11.27"	13.73"	
VAS 132H2-425	DOUBLE	4.10"	10.45"	14.55"	11.27"	13.73"	
WITH EXTENDED	EYE>	4.10"	11.45"	15.55"	12.27"	14.73"	



■ Rear - Dual Poly-Eye, 5" Tapered Sleeve with Cap Port

- Upper Mount: Poly-urethane eye, 1/2" or 5/8" hardware with 1-1/4" clevis
- Lower Mount: Poly-urethane eye, 1/2" or 5/8" hardware with 1-1/4" clevis
- Medium Capacity: Recommended as rear shock for heavy vehicles

PART NUMBER	VALVING	TRAVEL	COLLAPSED LENGTH	EXTENDED LENGTH	RIDE-HEIGHT MINIMUM	RIDE-HEIGHT MAXIMUM	
VAS 131J2-515	SINGLE	5.00"	11.56"	16.56"	12.56"	15.56"	
VAS 132J2-515	DOUBLE	5.00"	11.56"	16.56"	12.56"	15.56"	
WITH EXTENDED	EYE>	5.00"	12.56"	17.56"	13.56"	16.56"	

Air Management

Air Tanks and Mounts

Two styles of air tanks are available, each featuring multiple inlet/outlet ports as well as a drain. The legmount version is a simple bolt-on, and can be easily secured to easily to any suitable flat surface. The end-mount tank can be mounted between the frame rails, but requires welding to the install the two frame brackets. Once the brackets are installed the end-mount tank is bolted into place.









3462-05-6 5-GALLON AIR TANK, 8" X 25", (2) 1/2" PORTS OPPOSITE ENDS, (1) 1/4" TOP PORT, (1) 1/4" BOTTOM PORT, LEGS: 1-1/8" X 5-1/2", 4-1/4" X 16" PATTERN 3462-05L-6 5-GALLON AIR TANK, 7" X 33", (2) 1/2" PORTS OPPOSITE ENDS, (1) 1/4" TOP PORT, (1) 1/4" BOTTOM PORT, LEGS: 1-1/8" X 5-1/2", 4-1/4" X 16" PATTERN 3462-07-5 7-GALLON AIR TANK, 8" X 33", (2) 1/2" PORTS OPPOSITE SIDES, (2) 3/8" PORTS OPPOSITE ENDS, (1) 1/4" DRAIN, END MOUNTS: 2-1/4" X 32" PATTERN KPC ATM-U01 MOUNTING KIT FOR 7-GALLON TANK, WELD ON		
(1) 1/4" BOTTOM PORT, LEGS: 1-1/8" X 5-1/2", 4-1/4" X 16" PATTERN 3462-07-5 7-GALLON AIR TANK, 8" X 33", (2) 1/2" PORTS OPPOSITE SIDES, (2) 3/8" PORTS OPPOSTIE ENDS, (1) 1/4" DRAIN, END MOUNTS: 2-1/4" X 32" PATTERN	3462-05-6	
OPPOSTIE ENDS, (1) 1/4" DRAIN, END MOUNTS: 2-1/4" X 32" PATTERN	3462-05L-6	
KPC ATM-U01 MOUNTING KIT FOR 7-GALLON TANK, WELD ON	3462-07-5	. , , , , , , , , , , , , , , , , , , ,
	KPC ATM-U01	MOUNTING KIT FOR 7-GALLON TANK, WELD ON

Compressors

- Gearless, direct-drive electric motors
- Oil-less design requires no maintenance (beside filter inspection/replacement)
- Anodized piston cylinder for decreased wear
- Precision, high speed, durable bearings
- Efficient, oversized heat sink head assembly
- Vibration isolators for safe & quiet operation
- Thermal overload protection that protect compressor in event of overheating/over duty cycle operation (where applicable)







SINGLE-COMPRESSOR KITS					
3447-380C	VIAIR 380C COMPRESSOR - CHROME - 55% - 100% DUTY CYCLE - 200 PSI - 1/4 NPT LEADER HOSE, CHECK VALVE, 1.49 CFM				
3447-400C	VIAIR 400C COMPRESSOR - CHROME - 33% DUTY CYCLE - 150 PSI - 1/4 NPT LEADER HOSE, CHECK VALVE, 2.54 CFM				
3447-460C	VIAIR 460C COMPRESSOR - CHROME - 100% DUTY CYCLE - 150 PSI -3/8 NPT LEADER HOSE, CHECK VALVE, 1.66 CFM				
3447-480C	VIAIR 480C COMPRESSOR - CHROME - 50% - 100% DUTY CYCLE - 200 PSI - 3/8 NPT LEADER HOSE, CHECK VAVLE, 1.76 CFM				
DUAL COMPDEC	COD VITE (MITH DEFCLIBE CMITCH AND DELAYE)				

DUAL-COMPRES	SOR KITS (WITH PRESSURE SWITCH AND RELAYS)
3447-380C-DC	VIAIR 380C DUAL COMPRESSOR PACK - CHROME
3447-400C-DC	VIAIR 400C DUAL COMPRESSOR PACK - CHROME
3447-480C-DC	VIAIR 480C DUAL COMPRESSOR PACK - CHROME

Air Management

■ AirPod[™] Self-Contained Compressor Systems

A completely self-contained compressor system, AirPod™ by Air Ride Technologies, conveniently mounts the tank, compressor(s), and valve set on one easily installed plate, eliminating tedious wiring and plumbing. AirPods™ are available in single-compressor 3-gallontank, or dual-compressor 5-gallon-tank versions with RidePro or LevelPro control systems.

- Factory wired, plumbed, and tested
- Four simple air-line connections
- Three electrical connections
- Saves 10 15 hours of installation time
- Compact size for easy installation
- Light weight aluminum tank
- Entire unit mounts with only four bolts







CALL FOR INFO

Notes

Notes

Terms and Conditions

ORDERING

Business Hours: We are open from 7:00 a.m. to 5:30 p.m., Pacific Time, Monday through Friday, and 8:00 a.m. to 1:00 p.m. Saturday. Call (800) 722-2269 for ordering only; tech support by email only: tech@CAChassisworks.com. Our 24-hour fax number is (916) 388-0295.

Mail Orders: When submitting your order by mail, please provide the following information: name, billing address, shipping address, phone numbers, e-mail address, complete part numbers, quantities, and any special instructions.

Credit Card Orders: We accept Visa, MasterCard, Discover Card and American Express. Please have your credit card and the billing address available. In order to protect you and us from credit-card fraud, all credit-card orders must be shipped to the credit-card billing address or creditor authorized shipping address. Many credit card companies allow multiple shipping addresses. If necessary, you may need to call your Issuing Bank and establish your "ship-to" address. All freight charges will be added to your shipment (except for truck shipments). Customer is responsible for all costs due to refused or missed shipments.

Foreign Orders: All foreign orders must be fully prepaid (including freight) in U.S. funds. Required duties and taxes are not the responsibility of Chassisworks and must be paid by the customer to the appropriate parties.

SHIPPING

All of our roll bars, roll cages, chassis, and welded clips are shipped by LTL truck, freight collect. Most other shipments can be sent by a small-package carrier — ground service. Available air-delivery options include: next-day service, 2-day service, 3-day service, or deferred air service to Alaska, Hawaii & Puerto Rico (combination of air and ground). You must inform us if you want your shipment by air service. Additional shipping fees will be applied to your order.

Truck: All truck shipments must be 100-percent prepaid. The shipment will go collect for the freight charges only. When receiving freight via truck, it is the customer's responsibility to verify that he/she is receiving all parts listed on the bill of lading and that all parts received are in good condition. If you sign for something you do not receive, neither the freight company nor Chassisworks/KP Components/Total Control Products/VariShock will be responsible for replacing the item.

■ RETURNS AND CLAIMS

No claims or returns accepted after 30 days from date of invoice. We will only accept a return on a part that has not been modified, is still in its original package, and is in like-new condition. You will be charged a 25-percent restocking fee on any returned goods. And you will be issued a credit with us for the balance of the price you paid for the returned part. Before returning a part, you must call us. You will be given a "Return Authorization Number" (RA#), which you must write on the outside of the box being returned. A copy of the original invoice must be included. All shipping charges on return packages must be prepaid; we will not accept a C.O.D. If, upon examination, all parts are returned and all parts are in a like-new condition, a credit will be issued less the 25-percent restocking fee. No returns on special-order parts (including, but not limited to, axles, FAB9 housings, fiberglass, chassis, welded frames, any part made or ordered to customer specs, etc.). Springs are a tuning item and cannot be returned unless defective.

Back Orders: If any parts are back-ordered, they will be so noted on the invoice. Unless notified otherwise, we will ship the back-ordered parts as soon as they become available.

FREIGHT CLAIMS

All claims for damages, shortage, or loss must be made immediately with the carrier (i.e., UPS or the freight line). You must note any substantial damage to a package upon receipt of the shipment with the carrier. You may reorder any missing pieces from us. We will send you an invoice for the reordered parts, and you can use this invoice as proof to the carrier of replacement costs. Unfortunately, we cannot make these freight claims for you; however, if we can be of any assistance, please feel free to give us a call.

Missing Pieces: Although every effort is made to ensure that each part is packaged complete, inevitably, a component may be missing. You must check each kit as soon as you receive it against the parts list which is enclosed with each part. Any shortage must be reported immediately upon receipt of the product. Claims made after 10 days will not be honored.

■ WARRANTY NOTICE

There are NO WARRANTIES, either expressed or implied. Neither the seller nor manufacturer will be liable for any loss, damage or injury, either direct or indirect, arising from the use or inability to determine the appropriate use of any product. Before any attempt at installation, all drawings and/or instruction sheets should be completely reviewed to determine the suitability of the product for its intended use. In this connection, the user assumes all responsibility and risk. We reserve the right to change specification without notice. Further, Chris Alston's Chassisworks, Inc., makes NO GUARANTEE in reference to any specific class legality of any component. ALL PRODUCTS ARE INTENDED FOR RACING AND OFF-ROAD USE AND MAY NOT BE LEGALLY USED ON THE HIGHWAY. The products offered for sale are true race-car components and, in all cases, require some fabrication skill. NO PRODUCT OR SERVICE IS DESIGNED OR INTENDED TO PREVENT INJURY OR DEATH.

■ PRODUCT COLORS

Many of the items herein are colored for display purposes only. Your merchandise may arrive as bare metal, or in some finish other than that displayed in this catalog. Please read individual product descriptions for specifics on available finishes and/or discuss with your sales representative.

ALL PRICES ARE SUBJECT TO CHANGE.

Revised: 04/01/13

The most current version of our terms can be viewed at the Chassisworks website — www.CAChassisworks.com/cac_terms.html.



Chassis-Builder Discounts!

Yes, your shop could qualify for special Builder-Program pricing on popular Chassisworks, KP Components, Total Control, and VariShock products! For details and price quotes, please contact Carl Robinson at (888) 388-0201, Ext. 7612 or crobinson@cachassisworks.com

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- Customer Service and International: (916) 388-0288
- **24-Hour Fax: (916) 388-0295**

- Tech Support: tech@cachassisworks.com
- Website: www.CAChassisworks.com









■ Product information for each of the Chris Alston's Chassisworks brands is available through its respective Website:

www.CAChassisworks.com www.KPcomponents.com www.TotalControlProducts.com www.VariShock.com





