# PARCHITO HI-VELOCITY

Our latest in-house design incorporates the cooling efficiency of an original VW head casting, while still offering amazing performance results!

CB Performance has been working directly on the **Panchito 044™** with the engineers of AutoLinea, an OEM supplier to many of the world's top automotive companies, and a tier 1 supplier with ISO9001:200e quality control standards. This insures that each **Panchito 044™** has passed very stringent metallurgy and machining inspections throughout the production process.

The **Panchito 044™** has dyno proven, horsepower making, ports cast right in. These port designs are race proven winners with years of use in engines around the globe. Countless hours were spent on our Superflow™ 600 flow bench designing the intake and exhaust ports. Our goals were to achieve the highest port velocity and air flow through a 40mm x 35.5mm size valve. The 40mm intake port has an extremely small port volume of 62cc and flows an incredible 162 CFM and over 300 ft. per second port velocity, right off the shelf! The 35.5mm exhaust port has a reduced bowl size and increased short turn radius creating phenomenal port velocity. This higher port velocity allows for improved low end and mid-range performance without sacrificing top end power.

We've also added extra material around the combustion chamber to give the **Panchito 044™** more strength and support for larger bore cylinders. The all new high quench combustion chamber has a volume of 54cc, a perfect size for small displacement engines. The **Panchito 044™** is designed to incorporate bore sizes from 85.5mm to 94mm. With the added combustion chamber material, we can machine your **Panchito 044™** heads to the depths necessary for high compression applications.

As an option, the **Panchito 044™** can be purchased with a CNC machined combustion chamber in bore sizes of 92mm and 94mm. The larger 61cc CNC'd chamber pushes the intake flow numbers to an amazing 171 CFM through a 40mm intake valve!



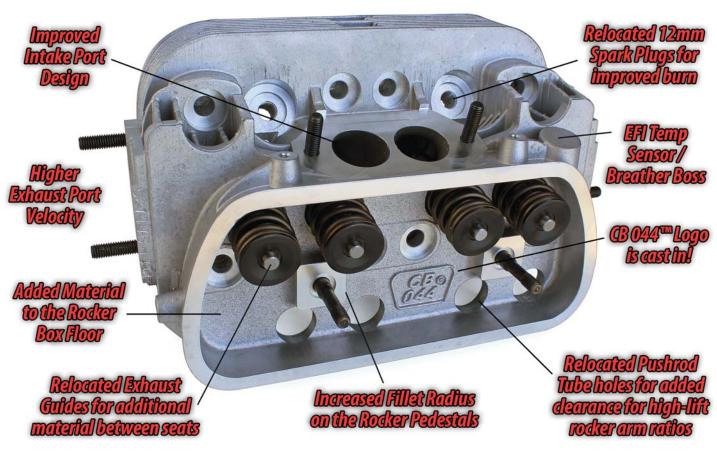
#### FEATURES:

- Standard features of the Panchito 044™:
- 12mm 3/4" Reach Spark Plug Holes
- 40 x 35.5 SUPERGRIP 214N Stainless Steel Valves w/Stellite Tips
- Supergrip Chromoly Valve Spring Retainers
- Supergrip Valve Locks
- Three Angle Performance Valve Job
- Manganese Bronze Racing Valve Guides
- Tungsten Carbide Alloy Valve Seats
- Single Hi-Rev Chrome Silicon Valve Springs

The Panchito 044™ comes complete and ready to run. Designed to fit 1600 based engines for the Type-1, Type-2, and Type-3 VW. Chamber Volume: 61cc Intake Port Volume: **62cc** 

- 1671 Panchito 044™ (40 x 35.5) Standard Bore (each)
- 1672 Panchito 044<sup>™</sup> (40 x 35.5) 90.5/92 Bore (each)
- 1673 Panchito 044™ (40 x 35.5) 94 Bore (each)
- Panchito 044™ BARE with Seats and Guides (40 x 35.5) Std. Bore (each)



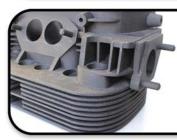




CB Performance has taken all of the necessary steps to design the best cooling, strongest, highest-flowing, street/strip 044™ head to date.



The 044<sup>™</sup> was initially designed on the computer, where we were able to make adjustments and improvements wherever we saw a need.



Before producing the permanent molds for the 044™, we sent CAD drawings to a 3D Printer, which allowed us to check and verify all the new features.



Extra material was added around the 044™ combustion chambers & intake/exhaust ports to allow for a greater variety of CNC Porting profiles.





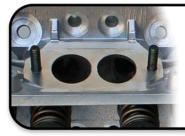




- 12mm 3/4" Reach Spark Plug Holes
- 40mm x 35.5mm SUPERGRIP™ 214N Single Groove S/S Valves With Stellite Tips
- SUPERGRIP™ Chromoly Valve Spring Retainers Tungsten Carbide Alloy Valve Seats
- SUPERGRIP™ Single Groove Valve Locks
- Performance 4 Angle Valve Job (30°, 45°, 60° & 75°) on seats
- Manganese Bronze Racing Valve Guides
- Single Hi-Rev Chrome Silicon Valve Springs
- Titanium Retainers
- Dual Hi-Rev Springs or VW650 Springs
- SUPERGRIP™ Snakeskin Valves



Relocated exhaust quides allow for additional material between the seats, improving head strength and allowing for valve sizes up to 46 x 37.5!



The ALL-NEW 044's <sup>™</sup> feature an improved intake port design with smaller volume and more velocity, without sacrificing flow.



With the 044<sup>™</sup> being used for all the CNC-ported heads in our lineup, it was important that the new design be as efficient, strong and versatile as possible.



CB offers in-house CNC Porting options on all of our 044™ Cylinder Heads. Each head can also be machined for larger cylinders.

044™ Magnum Cylinder Head

- 40 x 35.5mm or 42 x 37.5mm Stainless Steel Valves
- Dual Hi-Rev Springs
- Chromoly Retainers
- SUPERGRIP<sup>™</sup> Valve Locks
- Bronze Silicon Racing Valve Guides,
- 3/4" Long Reach Spark Plug Bosses,
- Double Thick Combustion Chamber Walls,
- Tapered Cooling Fins
- Factory Produced by an O.E.M supplier to Volkswagen
- Specify Camshaft & Rockers when ordering!
- Sold Individually

1440	044™ Magnum (40 x 35.5) Standard Bore
1442	044™ Magnum (40 x 35.5) 90.5/92 Bore
1443	044™ Magnum (40 x 35.5) 94 Bore
1448	044™ Magnum Plus (42 x 37.5) Mahle 90.5/92 Bore
1449	044™ Magnum Plus (42 x 37.5) Mahle 94 Bore



## STRONGER BY DESIGN with BIG FLOWING PORTS!

044's <sup>™</sup> are more powerful than ever with optional 42 x 37mm S/S valves!

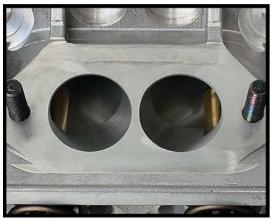
044™ Special Cylinder Head

- 40 x 35.5mm Stainless Steel Valves
- Single Hi-Rev Springs
- Chromoly Retainers
- SUPERGRIP<sup>™</sup> Valve Locks
- Bronze Silicon Racing Valve Guides,
- 3/4" Long Reach Spark Plug Bosses,
- Double Thick Combustion Chamber Walls,
- Tapered Cooling Fins
- Factory Produced by an O.E.M supplier to Volkswagen.
- Specify Camshaft & Rockers when ordering!
- Sold Individually

1444	044™ Special (40 x 35.5) Standard Bore
1446	044™ Special (40 x 35.5) 90.5/92 Bore
1447	044™ Special (40 x 35.5) 94 Bore
1435	044™ Special - BARE with Guides & Seats
	(40 x 35.5) Standard Bore (each)



Call Toll Free: 1-800-274-8337



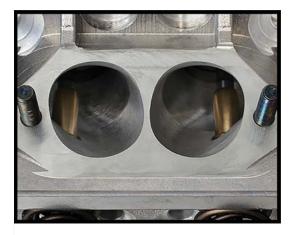
# 044™ CNC Super Mag Round Ports

Made for small to medium size engines, and based on the same 044<sup>™</sup> Castings as the rest of the 044<sup>™</sup> line up. Standard features include: 3 Angle Valve Job,  $40 \times 35.5$ mm S/S valves, silicon bronze valve guides, nickel chromium alloy valve seats,

Chamber Volume: **61cc**  Intake Port Volume: **63cc** 

- Stainless Steel Valves
- Chromoly Retainers
- SUPERGRIP™ Valve Locks
- CNC Porting
- Dual Hi-Rev Springs
- 94mm Bore

1396	044™ CNC Super Mag Round Ports (40 x 35.5) Standard Bore
1397	044™ CNC Super Mag Round Ports (40 x 35.5) 90.5/92 Bore
1398	044™ CNC Super Mag Round Ports (40 x 35.5) 94 Bore



# 044™ CNC Ultra Mag Plus

To handle the extra flow capabilities of the intake ports, the combustion chambers are also CNC machined for maximum power and flame travel. Spark plugs are secured in relocated 12mm spark plug bosses for increased strength and durability. The exhaust charge is accelerated through the CNC Machined exhaust ports. Race Ready, and offer maximum HP potential for ultra high performance engines right out of the box!

Chamber Volume: **62cc** 

Intake Port Volume: **75CC** 

- Stainless Steel Valves
- Chromoly Retainers
- SUPERGRIP™ Valve Locks
- CNC Porting
- Dual Hi-Rev Springs
- 90.5/92 or 94mm Bore

1450	044 <sup>™</sup> CNC Ultra Mag Plus (42 x 37.5) 90.5/92 Bore
1451	044™ CNC Ultra Mag Plus (42 x 37.5) 94 Bore

1457 044™ CNC Ultra Mag Plus (44 x 37.5) 90.5/92 Bore
 1458 044™ CNC Ultra Mag Plus (44 x 37.5) 94 Bore



# 044™ CNC Mini Wedge Ports

Designed for engines needing a smaller port than the regular Wedge Port and Ultra Wedge Port 044™ heads. Ideal for street and race applications on engines as small as 1776cc's and as big as 2400cc's. Capable of producing over 200 HP with a 43mm intake valve. Available with a 43x37.5 valve combination in 90.5/92mm bore and 94mm bore.

Chamber Volume: **64CC**  Intake Port Volume: **78cc** 

- Stainless Steel Valves
- Chromoly Retainers
- SUPERGRIP™ Valve Locks
- CNC Porting
- Dual Hi-Rev Springs
- 90.5/92 or 94mm Bore

1420 044™ CNC Mini Wedge Ports (43 x 37.5) 90.5/92 Bore
 1421 044™ CNC Mini Wedge Ports (43 x 37.5) 94 Bore



# 044™ CNC Wedge Ports

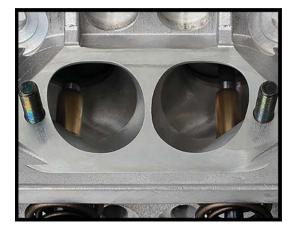
If you want the edge on the competition, these heads are just what you need! Maximum flow equals maximum horsepower! We have several engines running these heads that are making over 200 hp on the street! Available in 90.5/92mm or 94mm Bore. Also available Bare with Guides & Seats!

Chamber Volume: **67cc**  Intake Port Volume: **76CC** 

- Stainless Steel Valves
- CNC Porting
- Dual Hi-Rev Springs
- Chromoly Retainers
- SUPERGRIP™ Valve Locks
- 90.5/92 or 94mm Bore

1432	044™ CNC Wedge Ports (42 x 37.5) 90.5/92 Bore
1433	044 <sup>™</sup> CNC Wedge Ports (44 x 37.5) 90.5/92 Bore
1410	044™ CNC Wedge Ports (42 x 37 5) 94 Rore

1411	044™ CNC Wedge Ports (44 x 37.5) 94 Bore
1413	044™ CNC Wedge Ports - BARE (42 x 37.5) 94 Bore
1414	044 <sup>™</sup> CNC Wedge Ports - BARE (44 x 37.5) 94 Bore



## 044™ CNC Super Pro

This all-new port design focuses around high port velocity and smaller size. They have a 6cc smaller intake port than it's closest counterpart, the 044™ Wedge Port. This smaller intake port results in 35 fps improved port velocity. Higher port velocity results in greater drivability, with increased power and torque. The perfect choice for street cars, bracket race cars or turbo cars.

Chamber Volume: **67cc**  Intake Port Volume: **81cc** 

- Stainless Steel Valves
- CNC Porting
- Dual Hi-Rev Springs
- Chromoly Retainers
- SUPERGRIP™ Valve Locks
- 94mm Bore

1423 044™ CNC Super Pro (45 x 37.5) 94 Bore



# 044™ CNC Ultra Wedge Ports

The intake valve has been increased to 46mm, resulting in 10% more flow than the standard Wedge Port. The Ultra Wedge Port uses the exclusive CB VW650 Valve Spring along with SuperGrip Single Groove Valve combination, which allows lift of up to .630" with .050" left before coil bind! The combustion chamber has also been redesigned for better quench. Chamber volume is now 69cc, perfect for turbo use, if desired.

Chamber Volume: **69CC**  Intake Port Volume: **89cc** 

- 46 x 37.5mm S/S Valves
- SUPERGRIP™ Valve Locks
- VW650 Valve Springs
- Titanium Retainers
- CNC Porting
- 94mm Bore

1409 044™ CNC Ultra Wedge Ports - VW650 Valve Springs & Titanium Retainers (46 x 37.5) 94 Bore





Sold in Pairs, but also available individually if needed.

IDA Match Ported Big Beef Manifolds are also available.

## 044™ Pro-Gas Square Ports

The ALL NEW 044™ Pro-Gas Square Port will become the Spec Cylinder Head for the Bugorama Racing Series Heads Up Pro-Gas Class, starting in 2018!

The 044 Pro-Gas Square Port uses an 81cc intake port, just like its predecessor, the 044™ Wedge Port. Each 044™ Pro-Gas Square Port head comes standard with 67cc combustion chambers, VW-650 Springs and Titanium Retainers.

For ease of inspection at BRS events, each  $044^{m}$  Pro Gas Square Port is serial numbered and logged in our database. Flow numbers are listed below in two ways - a standard 67cc combustion chamber and also with a high compression .300" deep flycut chamber. Note that flycutting and CC'ing of combustion chambers is at an additional cost.

Chamber Volume: **67CC**  Intake Port Volume: **81cc** 

- 44 x 37.5 S/S Valves
- Titanium Retainers
- SUPERGRIP™ Valve Locks
- CNC Porting
- VW650 Springs
- 94mm Bore

1417 044™ CNC Pro-Gas Square Ports (44 x 37.5) 94 Bore

1434 044<sup>™</sup> CNC Square Ports (44 x 37.5) 94 Bore



#### ABOUT CB PERFORMANCE'S PRO-GAS CLASS.

This class is limited to Type 1, Type 3, and Karmann Ghia bodies, and must run the 044 CNC Wedgeport or Squareport Heads from CB Performance. PRO GAS starts on a .4 pro tree and runs in the high 10's to mid 11's.

See the complete list of up to date rules on our website: http://www.cbperformance.com/Pro-Gas-Rules-s/141.htm

## Street Eliminators



The all new Street Eliminators incorporate ultra clean castings from pure ingots, the latest process for heat treatment and aging, and toughest material for air-cooled applications. Combine that with precise machine work on all new tooling, backed up with a CMM to insure our exacting tolerances are met, and you have the best of the best! The CNC'd Street Eliminators feature All New CNC Intake and Exhaust Ports. These heads were designed on our SUPERFLOW SF-600 Flow Bench for Maximum Port Velocity and CFM.

Engineered to outlast modified or welded VW Factory Cylinder Heads that were designed to run on engines producing 55 to 60 hp, Street Eliminators were designed to produce 200 plus horsepower. Long reach 12mm spark plug threads assure improved heat dissipation resulting in longer plug life while reducing the danger of cracked spark plug bosses. Factory VW dual port tin, original and aftermarket dual port manifolds, original and aftermarket valve covers fit right on! You can also use stock or high ratio rocker arm assemblies on Street Eliminators.

Cylinder and combustion chamber scavenging in the Street Eliminator is more complete with than conventional ports. Squeeze exhaust ports improve power output through out the complete RPM range. Soot and deposits left over from incomplete chamber scavenging add to blow-by problems. Street Eliminators squeeze exhaust ports, to help eliminate this problem.

1540	CNC Street Eliminators - Complete (42 x 37.5) 92 Bore
1541	CNC Street Eliminators - Complete (42 x 37.5) 94 Bore
1542	CNC Street Eliminators - Complete (44 x 37.5) 92 Bore
1543	CNC Street Eliminators - Complete (44 x 37.5) 94 Bore
1544	CNC Street Elim. w/VW650 Springs (46 x 37.5) 94 bore
1483	Street Eliminators - Complete (42 x 37.5) 90.5 Bore
1485	Street Eliminators - Complete (42 x 37.5) 92 Bore



#### STREET ELIMINATOR FEATURES:

- 100% New Tooling & Molds
- New Heat treat processing to handle extreme conditions
- Close to 50% more material in the rocker box
- Double strength rocker supports to handle high lift rockers and high pressure valve springs
- Single groove, race proven, valves, locks and chromoly retainers
- Silicone Bronze racing valve guides
- Balanced flow intake and exhaust runners
- Valve Spring options available for all applications, street to strip
- Cast, machined, and assembled 100% in the USA!

1487	Street Eliminators - Complete (42 x 37.5) 94 Bore
1488	Street Eliminators - Complete (44 x 37.5) 92 Bore
1489	Street Eliminators - Complete (44 x 37.5) 94 Bore
1482	Street Eliminators - BARE with Guides and Seats - 92 Bore
1484	Street Eliminators - BARE with Guides and Seats - 94 Bore
1494	Street Eliminators - BARE, Castings Only - 92 Bore
1496	Street Eliminators - BARE, Castings Only - 94 Bore

# Super Street Eliminators

Perfect for turbo use, but also makes for a very powerful running naturally aspirated head. Intake port volume was kept low for increased driveability (76cc for the 42 & 44mm intake valve, 86cc for the 46mm intake valve).

1561	CNC Super Street Eliminators (42 x 37.5) 90.5/92 bore
1562	CNC Super Street Eliminators (44 x 37.5) 90.5/92 bore
1547	CNC Super Street Eliminators (42 x 37.5) 94 bore
1548	CNC Super Street Eliminators (44 x 37.5) 94 bore
1549	CNC Super Street Eliminators (46 x 37.5) 94 bore
	w/VW650 Springs & Titanium Retainers
	CNC Super Street Eliminators (46 x 37.5) 94 bore



# **Competition Eliminators**

# With 48mm intake valves, and Cosworth Style Ports, the RPM potential is over 9,000!

Our longer single groove valves make it a snap to set up the proper rocker arm geometry with big cams and high ratio rocker arms. We engineered these heads to use stock cylinder covers and VW style valve covers for ease of installation. With our intake manifolds, you can even fit the Competition Eliminators in a standard sedan engine compartment with the deck lid closed!

Competition Eliminators are the biggest, baddest, VW cylinder head ever designed and put into production. It's a factory ultra precision part produced from a high density 356A aluminum billet. The Competition Eliminator gives you everything that you have ever dreamed about in a VW high performance cylinder head.

Competition Eliminators are powerful and versatile. With just a little trimming of your stock cylinder covers, Competition Eliminators fit right in!

1431	CNC Comp Eliminators - Complete (44 x 38) 94 Bore
1426	CNC Comp Eliminators - Complete (46 x 38) 94 Bore
1427	CNC Comp Eliminators - Complete (46 x 40) 94 Bore
1428	CNC Comp Eliminators - Complete (48 x 38) 94 Bore
1429	CNC Comp Eliminators - Complete (48 x 40) 94 Bore



#### **COMP. ELIMINATOR FEATURES:**

- CNC Porting
- Race Master Valves (optional upgrade to Titanium Valves)
- Race Master Springs (optional upgrade to K-Motion Springs)
- Chromoly Retainers (optional upgrade to Titanium Retainers)
- Race Master Valve Locks

1461	Comp Eliminators - Complete (42 x 38) 90.5/92 Bore
1462	Comp Eliminators - Complete (44 x 38) 90.5/92 Bore
1463	Comp Eliminators - Complete (44 x 38) 94 Bore
1464	Comp Eliminators - Complete (46 x 38) 94 Bore
1425	Race Ready CNC Competition Eliminators (94 Bore)

# **BARE Competition Eliminators**

CB also offers the Competition Eliminator heads for the shops and qualified machinist that wants to have it their way. Available with seats and guides, ready for your own custom valve job, or bare castings machined for 42 x 38 valve seats. With the bare machined heads all of the major machine work is finished by CB Performance. You can you can port 'em up and machine the valve seat pockets to whatever size you need, then install the valve seats and guides of your choice.

If installing valve seats and guides is too much for you, order the bare Competition Eliminator heads with seats and guides installed by our in-house professionals. This allows you to install your own valves, springs, and retainers as well as cutting your own custom valve job.



1459	Comp Elim - BARE, Castings Only - 94 Bore
1460	Comp Elim - BARE, Castings Only - 90.5/92 Bore
1466	Comp Elim - BARE w/Guides & Seats (42 x 38) 92 Bore
1467	Comp Elim - BARE w/Guides & Seats (44 x 38) 92 Bore
1468	Comp Elim - BARE w/Guides & Seats (44 x 38) 94 Bore

1469	Comp Elim - BARE w/Guides & Seats (46 x 38) 94 Bore
1405	CNC Comp Elim - BARE w/Guides & Seats (46 x 38) 94 Bore
1406	CNC Comp Elim - BARE w/Guides & Seats (46 x 40) 94 Bore
1407	CNC Comp Elim - BARE w/Guides & Seats (48 x 38) 94 Bore
1408	CNC Comp Elim - BARE w/Guides & Seats (48 x 40) 94 Bore



# **Strip Dominator**

"Over 300 CFM, Off the Shelf!"

No more waiting 6 months to a year for a set of hand ported race heads and no more second mortgage to buy them!

100 PERCENT MADE IN THE USA from 356 aluminum heat treated to T6. Strip Dominator heads come standard with 50x38mm Titanium valves with hardened tips. The valve guide center-lines have been relocated on the Strip Dominator head in order to fit the large 50mm intake valve into a 94mm bore. Valves have a proprietary back angle and radius to improve flow and velocity. Intake and exhaust seats are made from beryllium copper. CB Performance does a 4-angle valve job to each head. Intake valves have 2 angles instead of the typical single 45 degree like most race heads. Valve guides are profiled to improve flow and are made from silicone bronze.

Each Strip Dominator head comes with 10 degree Titanium retainers, 10 degree locks and K-Motion K-800 valve springs. The Strip Dominator head will accept any conventional type rocker arrangement. Each head is also made to accept a brand new 4 bolt rocker arrangement made for CB Performance by Pauter Machine. This rocker arrangement is far superior to anything on the market. Available ratio's range from 1.3 to 1.5. All heads come standard with 5-axis CNC Porting. Combustion chambers are also reshaped using a 5-axis CNC. Chamber volume is 52cc's. Bore size is 94mm only.

1606	Strip Dominator Cylinder Heads (50 x 38) 94 Bore
1608	Strip Dominator Billet Valve Covers
1609	Strip Dominator Billet Valve Cover O-ring Gaskets (pair)
1614	Strip Dominator Manifolds (set of 2)
1615	Strip Dominator Manifolds - CNC Ported (set of 2)
1969	Extended Valve Cover Nuts - Black (set of 10)





Our CB Strip Dominator Heads will also fits the new-style Autocraft 910 Valve Covers (does not fit the old style.)

NOTE: Most aftermarket cylinders up to 96.9mm will fit into a 94mm bore.

#### Features:

- 50 x 38mm Titanium Valves
- 10 Degree Titanium Retainers
- Standard 5-Axis CNC Porting
- K-Motion K-800 Springs
- 4-Angle Valve Job
- 52cc Chamber Volume
- 94mm Bore Size



## Big Beef Match Ported Manifolds - IDF & DRLA

CB Performance offers custom Match-Ported Manifolds for an exact fit with our CNC Ported Cylinder Heads. Each manifold is hand ported to a perfect match, for a smooth transition between manifold and intake ports.

With Match-Ported Manifolds, you will have uninterrupted flow and a quicker throttle response.

3158	Ultra Mag Plus Match Ported Manifolds - IDF & DRLA
3162	Panchito 044 Match Ported Manifolds - IDF & DRLA
3164	Super Mag Match Ported Manifolds - IDF & DRLA
3165	Wedge Port Match Ported Manifolds - IDF & DRLA
3166	Ultra Wedge Port Match Ported Manifolds - IDF & DRLA
3174	Mini Wedge Port Match Ported Manifolds - IDF & DRLA
3177	Super Pro Match Ported Manifolds - IDF & DRLA
3181	CNC Street Elim. Match Ported Manifolds - IDF & DRLA

# Big Beef Match Ported Manifolds - IDA

CB Performance offers custom Match-Ported Manifolds for an exact fit with our CNC Ported Cylinder Heads. Each manifold is hand ported to a perfect match, for a smooth transition between manifold and intake ports. With Match-Ported Manifolds, you will have uninterrupted flow and a quicker throttle response.

3159	Ultra Mag Plus Match Ported Manifolds - IDA
3163	Wedge Port Match Ported Manifolds - IDA
3167	Ultra Wedge Port Match Ported Manifolds - IDA
3173	Mini Wedge Port Match Ported Manifolds - IDA
3176	Super Pro Match Ported Manifolds - IDA
3180	CNC Street Eliminator Match Ported Manifolds - IDA
3182	Square Port Match Ported Manifolds - IDA



## CB Billet Valve Covers

They start off as a solid piece of 6061-T6 aluminum. We have machined them to use an o-ring seal at the head flange and rocker stud for an easy leak free installation. Featuring a machined-in 1/2" NPT breather port for maximum crankcase ventilation.

#### Features:

- Rocker Stud Adapters and Hardware Included
- Fits Stock Heads, or Comp & Street Eliminator Heads
- Clears K-800 Valve Springs
- Clears Pauter Rockers (Requires shorting pedestal nut & drilling holes to 10mm)



1694 CB Billet Valve Covers - Black Anodized (set of 2)

1695 CB Billet Valve Covers - Polished (set of 2)

1693 O Ring Kit for 1694 and 1695 CB Billet Valve Covers

### Fil-Star Valve Covers

Cast from 356A aluminum, heat treated and machined to an exact fit.

Self-locking nuts and inner seals prevent oil loss around the mounting studs.



C-Channel Valve Covers

Manufactured from pressure cast aluminum with a ball burnished surface.

Designed with added clearance for high lift rockers.



1702 Fil-Star Valve Covers (fits all Type-1) Fully Polished

1704 Fil-Star Valve Covers - for use w/10mm rocker studs

**Fully Polished** 

1702d C Channel Valve Covers (set of 2)

1696 C Channel Valve Cover Gaskets (set of 2)

## **Type-4 Valve Covers**

The "C" channel gaskets help keep your engines critical oil supply inside where it belongs.

Add a new dimension in appearance and utility. The thicker walls of the castings help to reduce rocker arm noise and reduce engine heat. All hardware and "C" channel gaskets are supplied with each set.

1697 Valve Covers - 914 & Type-4 (set of 2)

1698 Replacement C-Channel Gaskets for Type-4 valve covers (set of 2)

## Clip-On Valve Covers

Brightly polished, deep finned and cool running!

Clip on valve covers have additional rocker arm clearance engineered right in. The specially designed gasket lip holds

the valve cover gasket in position and helps eliminate oil leaks. They fit all 1200, 40hp, 13, 15 and 1600cc engines.

1691 Clip On Valve Covers



## **MST Billet Valve Covers**

Are you tired of leaking and hard to install valve covers? Try these! Engineered to fit – designed to please.

These bolt-on covers come with a no-slip lip for the gasket, a smooth o-ring seal for the bolts, and proudly display the MST Logo across the face. Set includes all mounting hardware, o-rings, stock cork gaskets.

9200	MST Billet Valve Covers - Black
9201	MST Billet Valve Covers - Blue
9202	MST Billet Valve Covers - Silver
9203	MST Billet Valve Covers - Red



## Stock Valve Covers

Can be used on 40hp, 13, 15, and 1600cc engines.

For that original VW look, get a set of Stock Valve
Covers. Leaking valve covers are not only messy but can also result in oil loss and a destroyed engine.
Requires Valve Cover Clips for installation.

1657 Stock Valve Covers (pair)

1658 Valve Cover Clips (pair) OEM (also 311-101-487)

Chrome Plated Valve Covers

Can be used on 40hp, 13, 15, and 1600cc engines.



Chrome Valve Cover Clips (set of 2)

Valve Cover Gaskets

They fit all 40hp, 13, 15 and 1600 based engines using stock valve cover gaskets.



1977	Valve Cover Gasket - Type-1 (each)	
1978	Valve Cover Gaskets (set of 25) OEM	
1979	Valve Cover Gasket - Type 4 - 17-2000 (each)	

## Valve Cover Vent Tubes

1701

Big engines need lots of breathing room. You can easily improve your engines breathing by installing a set of Valve Cover Vents. Just drill a hole

and screw 'em in. Helps eliminate messy blow-by and oil loss. Can be used on all stock and after market VW and Porsche valve covers. Can be used to vent into air cleaners, breather box or remote located filter vents.

1772 Valve Cover Vent Tubes (pair)

## **Barrel Shims**

Barrel Shims are now available in different thickness' so that you can properly set your deck height. The thinner .010 shims make an excellent base gasket for normal installations of Big Bore Kits. Shims are packaged in sets of 4.

	.010"	.020"	.030"	.040"	.060"	.090"
1600cc	1292	1293	1294	1295	1283	1285
90.5/92mm	1296	1297	1298	1299	1300	1286
94mm	1261	1262	1263	1264	1280	1281



## **Aluminum Barrel Spacers**

For use with stroker cranks and B stroke pistons. Currently Available to fit 94mm barrels. Lazer cut from aluminum plate and precision ground on each side to assure proper alignment of barrels and heads. Cylinder sealing surface depth to centerline may not be consistent from engine case to engine case. Copperhead gaskets may be used to dial in the exact deck height and compression ratio.

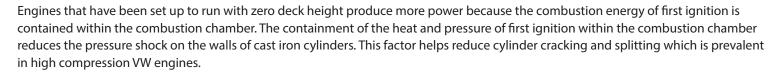
1094	Aluminum Barrel Spacers - 94mm x .145" (set of 4)
1095	Aluminum Barrel Spacers - 94mm x .200" (set of 4)
1096	Aluminum Barrel Spacers - 94mm x .240" (set of 4)



## **Copperhead Cylinder Head Gaskets**

They help eliminate the continual problem of combustion leakage between the barrels and the cylinder head. When installed on a fresh set of heads, resurfacing of the cylinder head is never required due to the durability and temperature resistance (2300° F) of the copper alloy gaskets.

The use of Copperhead Cylinder Head Gaskets allows the engine builder to set engine deck height at zero. The thickness of the Copperhead Gaskets provides the actual piston to cylinder head clearance.



1385	Copper Head Gaskets040" thick, 90.5mm (set of 4)
1386	Copper Head Gaskets060" thick, 90.5mm (set of 4)
1387	Copper Head Gaskets040" thick, 92mm (set of 4)

1388	Copper Head Gaskets060" thick, 92mm (set of 4)	
1389	Copper Head Gaskets040" thick, 94mm (set of 4)	
1390	Copper Head Gaskets060" thick, 94mm (set of 4)	

## **Chromoly Cylinder Head Studs**

Manufactured from special Mil spec 4130 F4 Chromoly to provide a uniform holding force. They are hardened, tempered, cold drawn and feature rolled threads.

Centerless grinding assures maximum strength and fatigue resistance. Rated at 145,000 psi tensile strength. Ultra 90 Black coated and packaged in complete sets with hardened washers and hex nuts. A special long stud is included for late model engine cases.

These studs are 1/2" longer than stock.

1223	Cylinder Head Studs - 10mm Chromoly - Dual Port
1229	Cylinder Head Studs - 8mm Chromoly - Dual Port



Shipped in full sets to fit single or dual port 8mm engines. Sets come complete with head nuts and washers.

Manufactured to the same quality as supplied on original engines.



1251	Cylinder Head Studs - 8mm - Single Port
1276	Cylinder Head Studs - 8mm - Dual Port

## **Cylinder Head Nut Sets**



1269	Cylinder Head Nut Sets - 10mm (w/special thick washers) (set of 16)
1270	Cylinder Head Nut Sets - 8mm (w/special thick washers) (set of 16)

## **Cylinder Head Lock Nuts**

16 Race Quality Shake-Proof Nylon Lock Nuts, for use with 10mm Cylinder Head Studs.

Torque it down, and forget it!



1922 Cylinder Head Lock Nuts - 10mm (16 nuts)