

Hyper S-Stage Bore Up Kit 138cc / 178cc SCUT

Z125 PRO



Hyper S-Stage Bore Up Kit

It is a bargain Kit including S-Stage Bore Up Kit (with camshaft), FI CON TYPE-e (injection controller) and a spark plug.

S-Stage Bore Up Kit (with camshaft)

It is a bore-up kit that makes larger displacement to 138cc or 178cc by replacing cylinder and piston.

Adopt the all-aluminum ceramic plated cylinder with excellent durability, tightness, heat dissipation.

As a stick thermosensor can be installed onto this cylinder, you can measure the cylinder temperature just by additionally purchasing a meter coming either an stick thermosensor.

Sports camshaft: The optimal profiles to maximize the performance of the stock cylinder head, the output performance will improve.

Built-in auto decompression mechanism are equipped same as stock.

Available displacement of 138 cc and 178 cc The 138cc, you can choose from two kinds of sports camshaft "N-10" and "N-20" for your riding purpose.

■ Compression ratio 138cc 12.3:1 / 178cc 11.5:1 ■ Bore 138cc 59mm / 178cc 67mm ■ Stroke 50.6mm (stock)

FI CON TYPE-e (Injection controller)

By installing our bore-up kit and exhaust parts, it will deviate considerably from the best air-fuel ratio, so it is necessary to correct the fuel injection time with our "FI CON" It can easily be installed only plug into the genuine ECU's coupler. "FI CON TYPE-e" has multiple pre-set mapping by our factory and you can easily select, change, and correct the mapping data for your engine specification with PC or smartphone.

Adjustment of maximum injection time can be increase 5000 μ s, and decrease 7500 μ s, which can be used widely from stock displacement to bore-up engine. It can be monitoring of engine speed, temperature, throttle opening angle and injector opening / closing rate by PC and smartphone, so you can use it very conveniently when you setting up. For details of this function, please refer to the attachment "FI CON TYPE-e".

※When using "FI CON TYPE-e" you must have PC or smart phone that meets the following requirement.

It is necessary to download software and applications (fee apply)

System requirement for "FI CON TYPE-e"	PC: Windows 7/8/10 (exclude RT/MOBILE)	You need down load our special software (free) Need built in Bluetooth or an external Bluetooth adapter.
	Smart phone: iOS8 and above. after iPhone4s, iPad 3rd generation,	Download and install from Apple store. (fee apply) Andoroid: 4.2.2 with Bluetooth. Download and install from Google play. (fee apply)



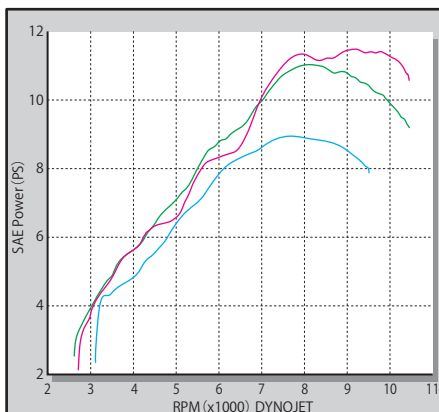
Hyper S-Stage Bore Up Kit 138cc



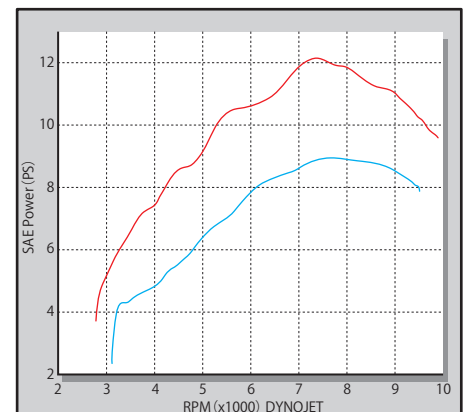
Hyper S-Stage Bore Up Kit 178cc SCUT

Name	Hyper S-Stage Bore Up Kit 138cc
Applicable model	Z125 PRO (BR125H-A02621~)
Item number	With sports camshaft (N-10) 01-05-5445 With N-20 camshaft 01-05-5446

Name	Hyper S-Stage Bore Up Kit 178cc SCUT (w/N-20 camshaft)
Applicable model	Z125 PRO (BR125H-A02621~)
Item number	01-05-5447



■ Hyper S-Stage Bore Up Kit 138cc (w/N-20 camshaft)
+ Stock throttle body + BOMBER exhaust system
■ Hyper S-Stage Bore Up Kit 138cc (w/N-10 camshaft)
+ Stock throttle body + BOMBER exhaust system
■ Stock Engine + Stock exhaust system



■ Hyper S-Stage Bore Up Kit 178cc (w/N-20 camshaft)
+ Stock throttle body + BOMBER exhaust system
■ Stock Engine + Stock exhaust system

■ S-Stage Bore Up Kit 138cc / 178cc SCUT

■ Sports Cam shaft

Z125 PRO

■ S-Stage Bore Up Kit

It is a bore-up kit that makes larger displacement to 138cc or 178cc by replacing cylinder and piston. Adopt the all-aluminum ceramic plated cylinder with excellent durability, tightness, heat dissipation.

As an stick thermosensor can be installed onto this cylinder, you can measure the cylinder temperature just by additionally purchasing a meter coming either an stick thermosensor.

Available displacement of 138 cc and 178 cc The 138cc, you can choose from two kinds of sports camshaft "N-10" and "N-20" for your riding purpose.

■ Compression ratio 138cc 12.3:1 / 178cc 11.5:1 ■ Bore 138cc 59mm / 178cc 67mm ■ Stroke 50.6mm (stock)

※FI CON TYPE-e is required simultaneously.

■ Sports camshaft(N-10) ※Sports camshaft (N-10) will be fit to stock engine or our "S-Stage Bore Up Kit 138cc"

The optimal profiles to maximize the performance of the stock cylinder head, the output performance will improve.

Built-in auto decompression mechanism are equipped same as stock.

■ If you have installed only our camshaft with the stock piston and the stock exhaust system, there is no need for FI CON TYPE e (Injection controller).

※If you have installed simultaneously our TAKEGAWA exhaust system and sports camshaft, the FI CON TYPE-e (Injection controller) is required.

※Sports camshaft (N-10) CAN NOT be installed with our "S stage 178cc SCUT".

■ FI CON TYPE-e(Injection controller)

By installing our bore-up kit and exhaust parts, it will deviate considerably from the best air-fuel ratio, so it is necessary to correct the fuel injection time with our "FI CON" It can easily be installed only plug into the genuine ECU's coupler. "FI CON TYPE-e" has multiple pre-set mapping by our factory and you can easily select, change, and correct the mapping data for your engine specification with PC or smartphone.

Adjustment of maximum injection time can be increase 5000 μ s, and decrease 7500 μ s, which can be used widely from stock displacement to bore-up engine. It can be monitoring of engine speed, temperature, throttle opening angle and injector opening / closing rate by PC and smartphone, so you can use it very conveniently when you setting up. For details of this function, please refer to the attachment "FI CON TYPE-e".

※When using "FI CON TYPE-e" you must have PC or smart phone that meets the following requirement.

It is necessary to download software and applications(fee apply)

System requirement for "FI CON TYPE-e"

PC: Windows 7/8/10
(exclude RT/MOBILE)

You need down load our special software (free)
Need built in Bluetooth or an external Bluetooth adapter.

Smart phone: iOS8 and above.
after iPhone4s, iPad 3rd generation,

Download and install from Apple store.(fee apply)
Andoroid:4.2.2 with Bluetooth. Download and install from Google play.(fee apply)



Sports camshaft (N-10)



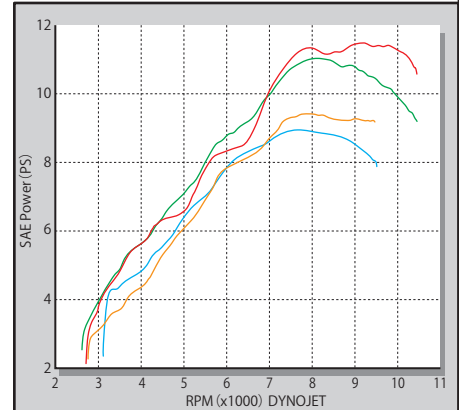
S-Stage Bore Up Kit 138cc



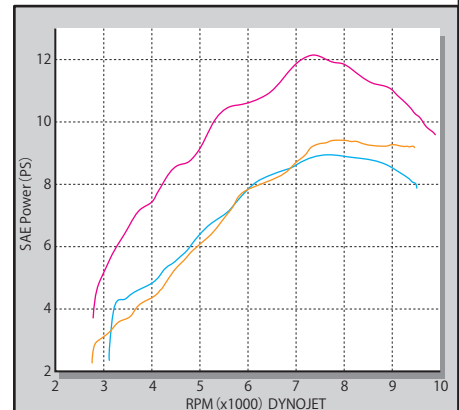
S-Stage Bore Up Kit 178cc SCUT



FI CON TYPE-e (Injection controller)



- S-Stage Bore Up Kit 138cc (N-20 camshaft) + FI CON TYPE-e + Stock throttle body + BOMBER exhaust system
- S-Stage Bore Up Kit 138cc (N-10 camshaft) + FI CON TYPE-e + Stock throttle body + BOMBER exhaust system
- Stock Engine + Sports camshaft (N-10) + Stock exhaust system
- Stock Engine + Stock exhaust system



- S-Stage Bore Up Kit 178cc (N-20 camshaft) + FI CON TYPE-e + Stock throttle body + BOMBER exhaust system
- Stock Engine + Sports camshaft (N-10) + Stock exhaust system
- Stock Engine + Stock exhaust system

Name	S-Stage Bore Up Kit 138cc		
Applicable model	Z125 PRO (BR125H-A02621~) ※FI CON TYPE-e is required simultaneously.		
Item number	With sports camshaft (N-10)	01-05-5440	
	With N-20 camshaft	01-05-5441	

Name	S-Stage Bore Up Kit 178cc SCUT (w/N-20 camshaft)		
Applicable model	Z125 PRO (BR125H-A02621~) ※FI CON TYPE-e is required simultaneously.		
Item number	01-05-5443		

Name	Sports camshaft (N-10)		
Applicable model	Z125 PRO (BR125H-A02621~)		
Item number	01-08-0065		

Name	FI CON TYPE-e (Injection controller)		
Applicable model	Z125 PRO (BR125H-A02621~)		
Item number	05-04-0101		

FI CON TYPE-e (Injection controller)

Z125 PRO

Injection controller can be simply coupler on to genuine ECU. You can easily select, modify, and modify with the Preset mapping using a PC or smartphone. By installing our own various functions, you can use it widely from beginners to experts enthusiasts.

FI CON TYPE-e(Injection controller)

Coupler on to the genuine ECU

It can be installed easy coupler on the genuine ECU not necessary to cut or modify wiring at all.

Original preset mapping is included for our custom engine kit parts

Using our exclusive application (need down load) on PC or smartphone, the fuel adjustment mapping can be set on your engine. To make the perfect setting, will need to use chassis dynamometer and O2 sensor.

"FI CON TYPE-e" Several preset fuel mapping is ideal and easy to use for , such as "stock engine with sport camshaft" or "138cc S stage bore-up kit"

When your engine is equipped with our custom engine kit, chose presetting "FI CON TYPE-e" mapping will complete the setting

Even when you use other manufacture exhaust or engine kit, you can choose preset mapping and make fine adjustment so that setting can proceed smoothly

※To make the perfect setting, will need to use chassis dynamometer and O2 sensor.

※DO NOT setting with smartphone while riding.

Fuel injection duration adjustment

Adjustable for every 5% of throttle opening and 500 rpm engine cycle, Maximum increase 5000 μs · Maximum 7500 μs

Simultaneous monitoring

Our special software (smartphone: application) installed on PC or smartphone has a real-time monitoring function which is very useful for setting

With the real-time monitoring function, tachometer, throttle opening graphic, engine temperature, and the fuel injection rate are digitally showing.

You can check the tachometer, TPS (throttle position sensor) opening monitor, engine temperature in real time while the engine is running.

Real search function

You can connect PC or smartphone while engine is running.The information of the running engine is reflected on the screen on the PC or smartphone in real time.

In the real search function, the engine rpm and the throttle opening are reflected in the e fuel map graphic, and that part glows to show clarify the adjustment area

It is very useful function when you setting.

Rev limiter control

You can set the maximum engine rpm.Because it is an independent function apart from the original limiter, it can be set even at lower rpm.

It is a function that can be used effectively when you do not want to raise the engine speed, such as avoid over rev, or break- in time.

Digital accelerator pump

"FI CON TYPE-e" captures the TPS (throttle position sensor) signal and monitors the throttle opening speed

When the throttle is opened quickly, the acceleration injection are engaged then it can injects fuel more than they originally set.

Pit lane speed limiter function

When you do not want to raise the speed at racetrack's pit lane (because of the speed limit regulation etc.) separately from the rev-limiter function,

they can engage the button-switch to pit lane speed limiter function. This function can be hock up easy (just connect wire to the switch and ground earth)

Tachometer output wire included

The purple wiring in the spiral tube of the main unit, this wire output 5V signal.By connecting this pulse line of the electric tachometer, you can measure the engine speed

※We don't have custom tachometer kit for Z125 PRO We have many general purpose tachometer kit available.

※When installing our general-purpose tachometer, it is necessary to use the attachment and modify the wiring harness and connect the meter power supply

General-purpose tachometer which confirmed operation.

Square LCD speed & tachometer (05-05-0027)

Medium DN tachometer (05-05-3210)

Φ48 small DN tachometer (orange) (05-05-0016)

Φ48 small DN tachometer (white) (05-05-0035)

Medium LCD speed & tachometer (05-05-0028)

Blue LED tachometer (05-05-0004)

Black & green tachometer (05-05-0014)

※General-purpose tachometer which is NOT work with this kit. ※It does not work properly

Super multi DN meter (05-05-0811) Large LCD α speed & tachometer (09-01-0057) Medium LCD α tachometer & thermometer (09-05-0144)

※When using "FI CON TYPE-e" you must have PC or smart phone that meets the following requirement.

It is necessary to download software and applications(fee apply)

System requirement for "FI CON TYPE-e"	PC:Windows 7/8/10 (exclude RT/MOBILE)	You need down load our special software (free) Need built in Bluetooth or an external Bluetooth adapter.
	Smart phone:iOS8 and above. after iPhone4s, iPad 3rd generation,	Download and install from Apple store.(fee apply) Andoroid:4.2.2 with Bluetooth. Download and install from Google play.(fee apply)



Name	FI CON TYPE-e (Injection controller)
Applicable model	Z125 PRO (BR125H-A02621~)
Item number	05-04-0101

FI CON TYPE-e Pre-set fuel adjustment mapping list

Engine spec								
Stock engine	+	Sports camshaft (N-10)	+	Stock throttle body	+	Stock Air cleaner BOX	+	BOMBER exhaust system
Stock engine	+	Sports camshaft (N-10)	+	Big throttle body	+	Air Filter	+	BOMBER exhaust system
S-Stage 138cc	+	Sports camshaft (N-10)	+	Stock throttle body	+	Stock Air cleaner BOX	+	BOMBER exhaust system
S-Stage 138cc	+	Sports camshaft (N-10)	+	Big throttle body	+	Air Filter	+	BOMBER exhaust system
S-Stage 138cc	+	N-20 camshaft	+	Stock throttle body	+	Stock Air cleaner BOX	+	BOMBER exhaust system
S-Stage 138cc	+	N-20 camshaft	+	Big throttle body	+	Air Filter	+	BOMBER exhaust system
S-Stage 178cc	+	N-20 camshaft	+	Stock throttle body	+	Stock Air cleaner BOX	+	BOMBER exhaust system
S-Stage 178cc	+	N-20 camshaft	+	Big throttle body	+	Air Filter	+	BOMBER exhaust system