

GR16 | G4

For more product information
please visit our website

www.guay2.com

100% Made in Taiwan

Please consult your dealer or
G&G ARMAMENT for overhaul maintenance
and technical guidance.

INSTRUCTION MANUAL

Manufactured by G&G ARMAMENT

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G&G ARMAMENT
AIRSOFT GUNS & ACCESSORIES



G&G ARMAMENT
AIRSOFT GUNS & ACCESSORIES

INSTRUCTION MANUAL

GR16 | G4

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Introduction

M16 (more formally Rifle, Caliber 5.56 mm, M16) is the U.S. military designation for a family of rifles derived from the ArmaLite AR-15 and further developed by Colt starting in the mid-20th century.

The M16 rifle family including the M16/A1/A2/A3/A4 has been the primary infantry rifle of the United States military since the 1960s.

The M16A1 was simply the M16 with a forward assist feature requested by the Army. All early versions fired the M193/M196 cartridge in semi- or full-automatic modes. The M16A2 is a select fire rifle capable of semi-automatic or three-round bursts and incorporating design elements desired by the Marine Corps. The M16A3 was essentially an M16A2 with an M16A1 fire control group; this had only limited procurement by the United States Navy .

The M16A4 became standard issue for the United States Marine Corps during Operation Iraqi Freedom, increasingly replacing the earlier M16A2. In the United States Army, a combination of the M16A4 and M4 Carbine have replaced the A2 as frontline rifles.

The M16 is primarily manufactured by Colt and Fabrique Nationale de Herstal, with variants produced by numerous countries around the world.

GR16 series list

For more product information please visit our website
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GR16 Carbine

GR16 Series



GR16 A2

GR16 Series



GR16 A2 Carbine

GR16 Series



GR16 A3

GR16 Series



GR16 A3 Carbine

GR16 Series

GR16 series list



GR16 R4

GR16 Series



GR16 R4 Carbine

GR16 Series



GR16 R4 Commando

GR16 Series



GR16 R5

GR16 Series



GR16 CQW

GR16 Series



GR16 CRW Cannon

GR16 Series



GR16 CRW Viper

GR16 Series



GR16 CRW

GR16 Series

GR16 / G4 series list

For more product information please visit our website www.guay2.com



GR16 Carbine Plastic

GR16 Series



GR16 A2 Plastic

GR16 Series



GR16 R4 Plastic

GR16 Series



GR16 Light Carbine Plastic

GR16 Series



G4 CQB H

G4 Series



G4 CQB R

G4 Series



G4 CQB S

G4 Series

New Blow Back Pneumatic system

True to the faith of mimicking real life firearms, G&G is proud to present its new Pneumatic Blow Back system to its line of airsoft guns. Conventional airsoft blow back utilizes tow hook springs to mimic real life bolt actions, which often lead to excess wear, tear and poor reliability in the gear box. To alleviate the problem of conventional systems, G&G has independently developed the Pneumatic Blow Back system; a piston driven, gas operated mechanism to better mimic real life bolt actions.

This new technology utilizes received compressed air to move the bolt, which enables the action without adding extra stress to the gear box.

This class leading system represents a significant milestone in the airsoft industry.

■ Blow back version is available

For more product information please visit our website
www.guay2.com



G&G awarded New blow back pneumatic system patents all over the world



TAIWAN

Patent No : M300797



USA

Patent No : 11/488698



HONG KONG

Patent No : 06107627.0



JAPAN

Patent No : 實願2006-1459



EUROPEAN UNION

Patent No : 460191 814454



CHINA

Patent No : 200620122468.9



DENMARK

Patent No : BA2007 0069



U.K.

Patent No : 614422.4



- ▲ All products employ high precision 6.04mm barrel. Use with precision 5.95mm BB pellets is highly recommended. Damage to the product due by faulty BB pellets voids the warranty. Use with caution.
- ▲ The buyer and the user of this product shall adhere to all local laws regulating the usage and the ownership of airsoft guns.

- ▲ This product is intended for users 18 years or older.
- ▲ Read all instructions before using this product.
- ▲ Adult supervision required.
- ▲ Always wear safety goggles when using this product.
- ▲ Misuse or careless handling of this product may cause injury.
- ▲ May be hazardous up to 50 meters.

You may be liable for damaging public, personal property, no for !! injuring a person or an animal even if you only mean to shoot as a "practical joke." Always observe good manners and enjoy fun sport shooting.



Safety procedures:

1. Attach the safety cap to the muzzle.
2. Set the selector lever to the safety position.
3. Remove the magazine.
4. Remove the battery.



When shooting the air guns for target practice or in a game situation, you and all participants must wear safety goggles or other eye protective gear. Also, pay attention to ricochets. It is very important to pay attention to third parties other than the participants.



When you carry the air gun, attach the safety cap, set the selector lever to the safety position and always put the air gun in a case or bag.



Select a safe place for operating the air gun, avoid places where people and cars are around.



Always attach the safety cap to the muzzle, remove the battery and store the air gun in a case or bag and at a place that is out of reach by children.

Orange tip disclaimer :

- ▲ All G&G Airsoft products came with a permanent fixed orange tip required by law, which will grant Airsoft legal usage in the United States and complied with the United States laws.
- ▲ If you altering or removing the orange tip and or if the item is modified or abused, all warranty will be void.



For more product information please visit our website www.guay2.com



Never direct the muzzle towards a person, animal or in any direction. That may cause harm or damage to the third party.



Looking into the muzzle is extremely dangerous regardless of BB's having been loaded or not. If you get hit in the eye by a BB pellet, you may in worst case, lose your eye sight.



There may be cases where some BB's remain in the gun after the magazine has been removed. After removal of the magazine, direct the muzzle towards a safe direction and pull the trigger to confirm that there are no BB's remain in the gun, then attach the safety cap.



Make sure to put the barrel and safety cap on the muzzle, except when you are shooting. Do this to prevent accident, discharge of BB's and also for dust protection purpose. Never pull the trigger while the barrel and the safety cap is attached.

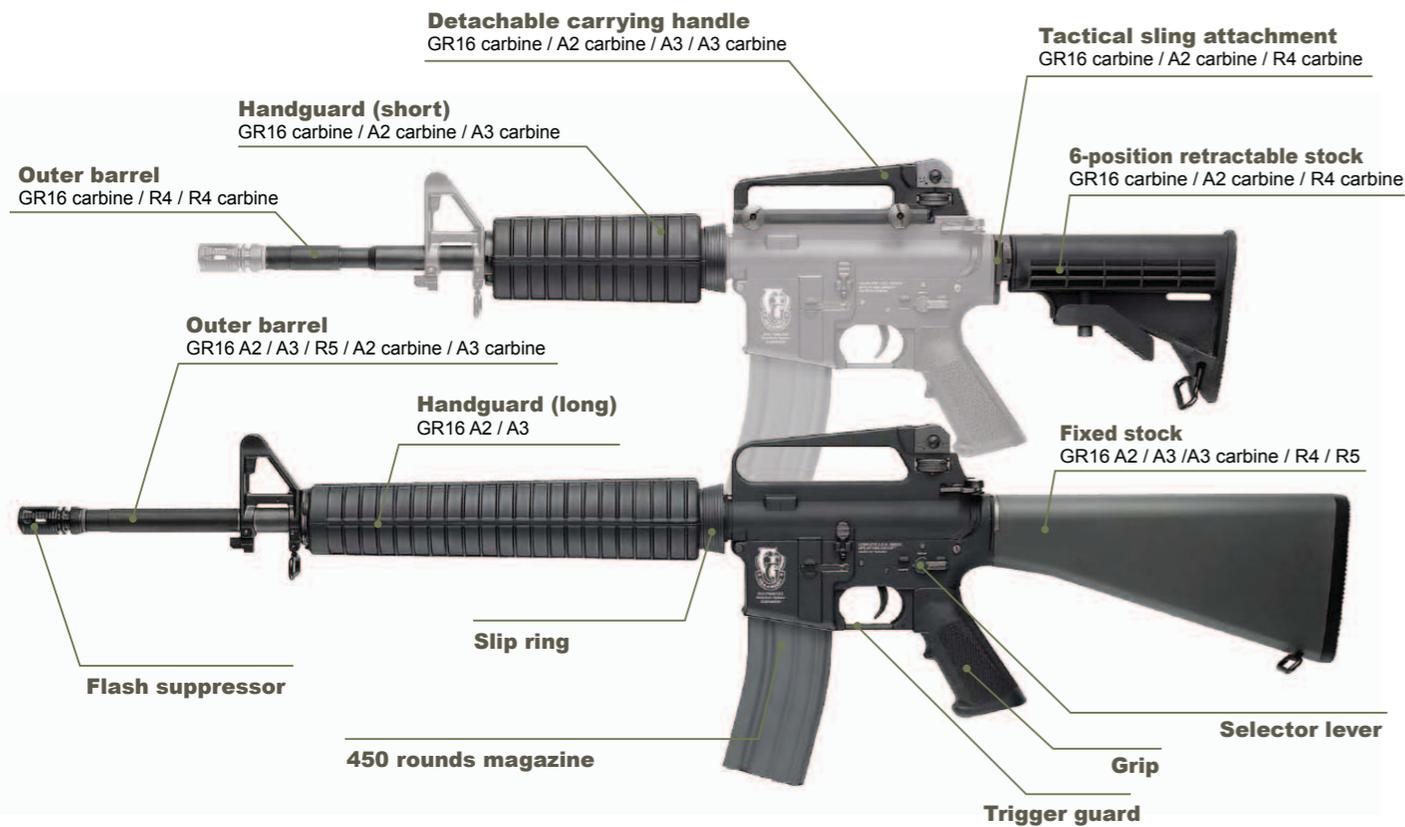


Activating the trigger carelessly is extremely dangerous. Never put your finger on the trigger unless the safety cap is removed and you are ready to shoot a target.



Disassembling or modifying the gun may adversely affect the performance and make it dangerous. It may be against the Law.

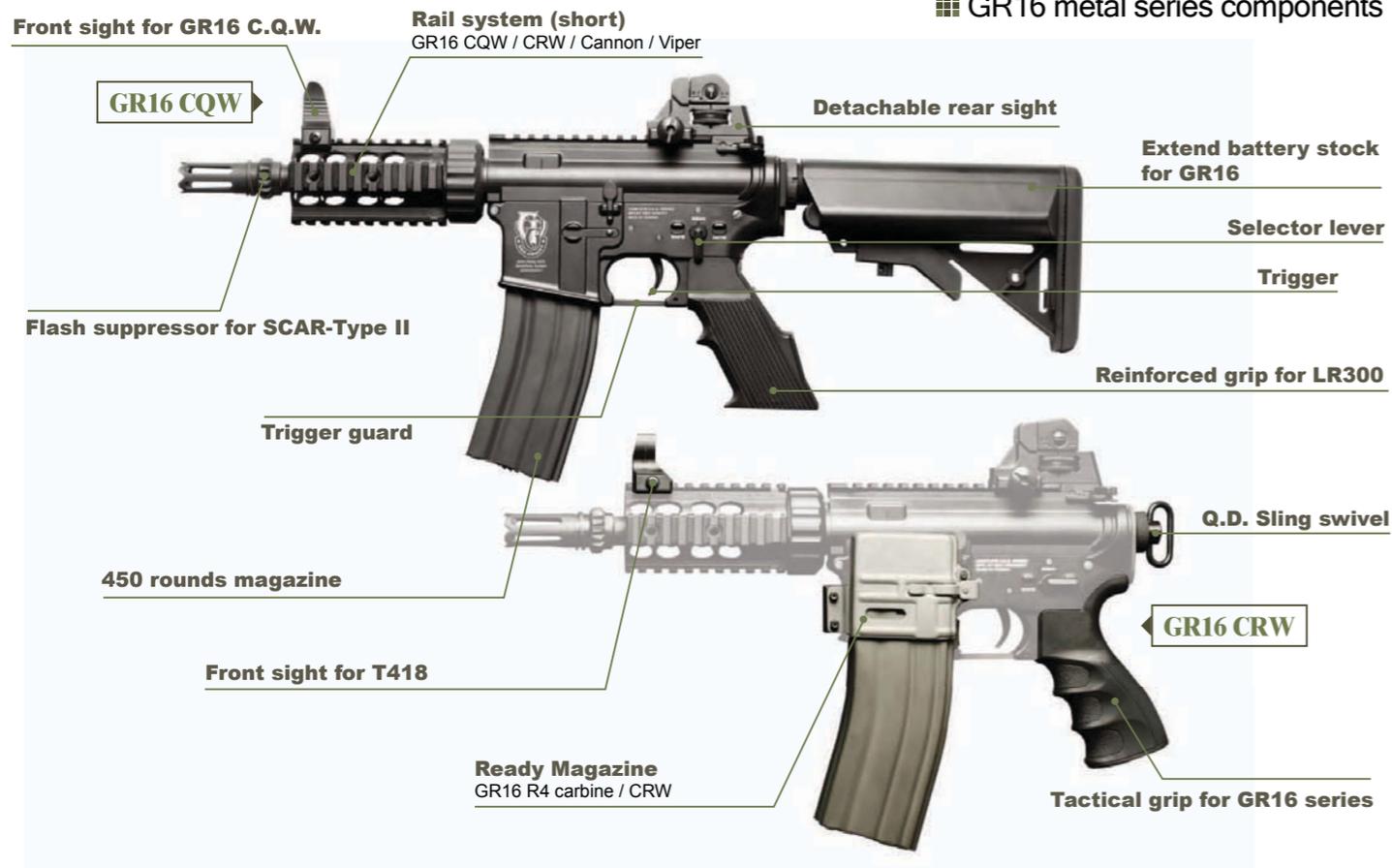
GR16 metal series components



GR16 metal series components



GR16 metal series components



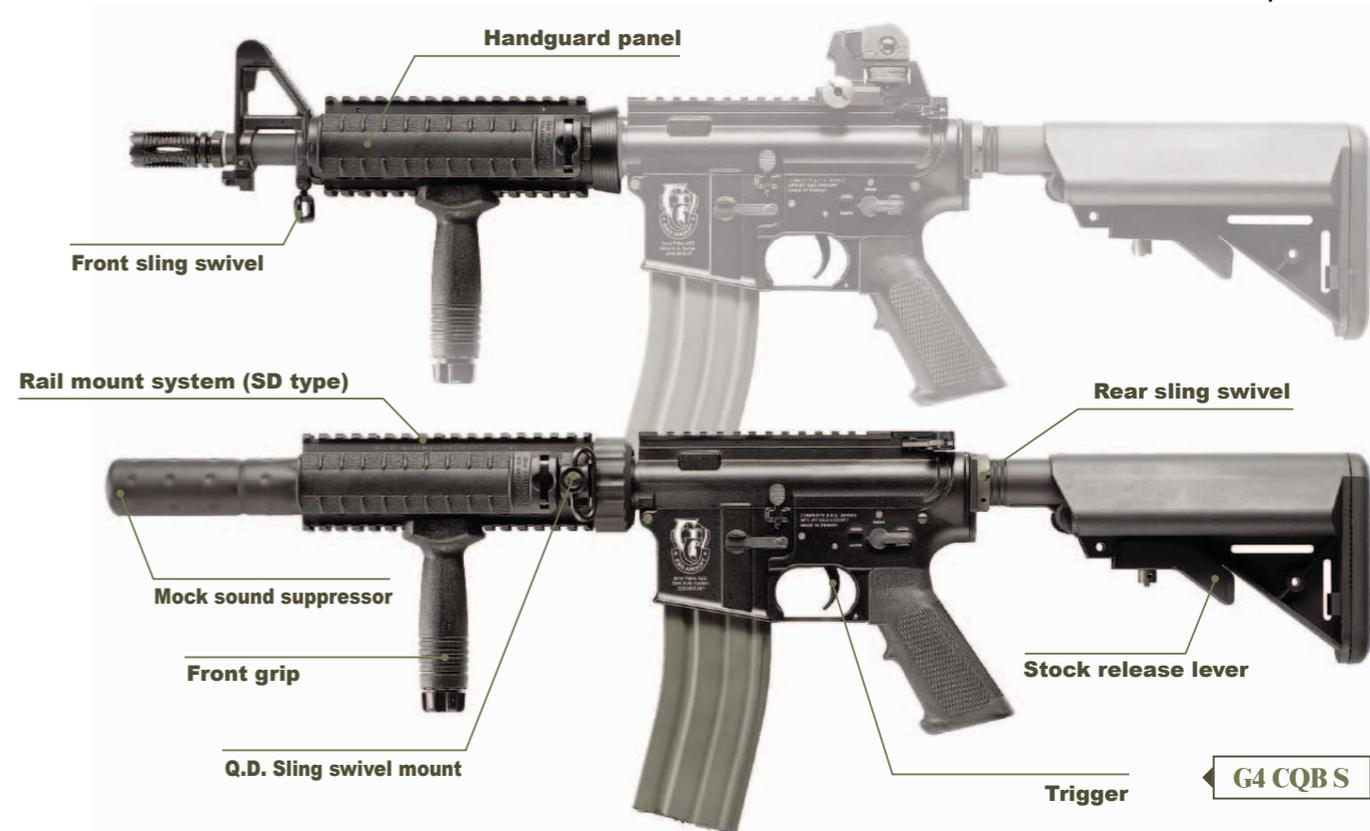
GR16 metal series components

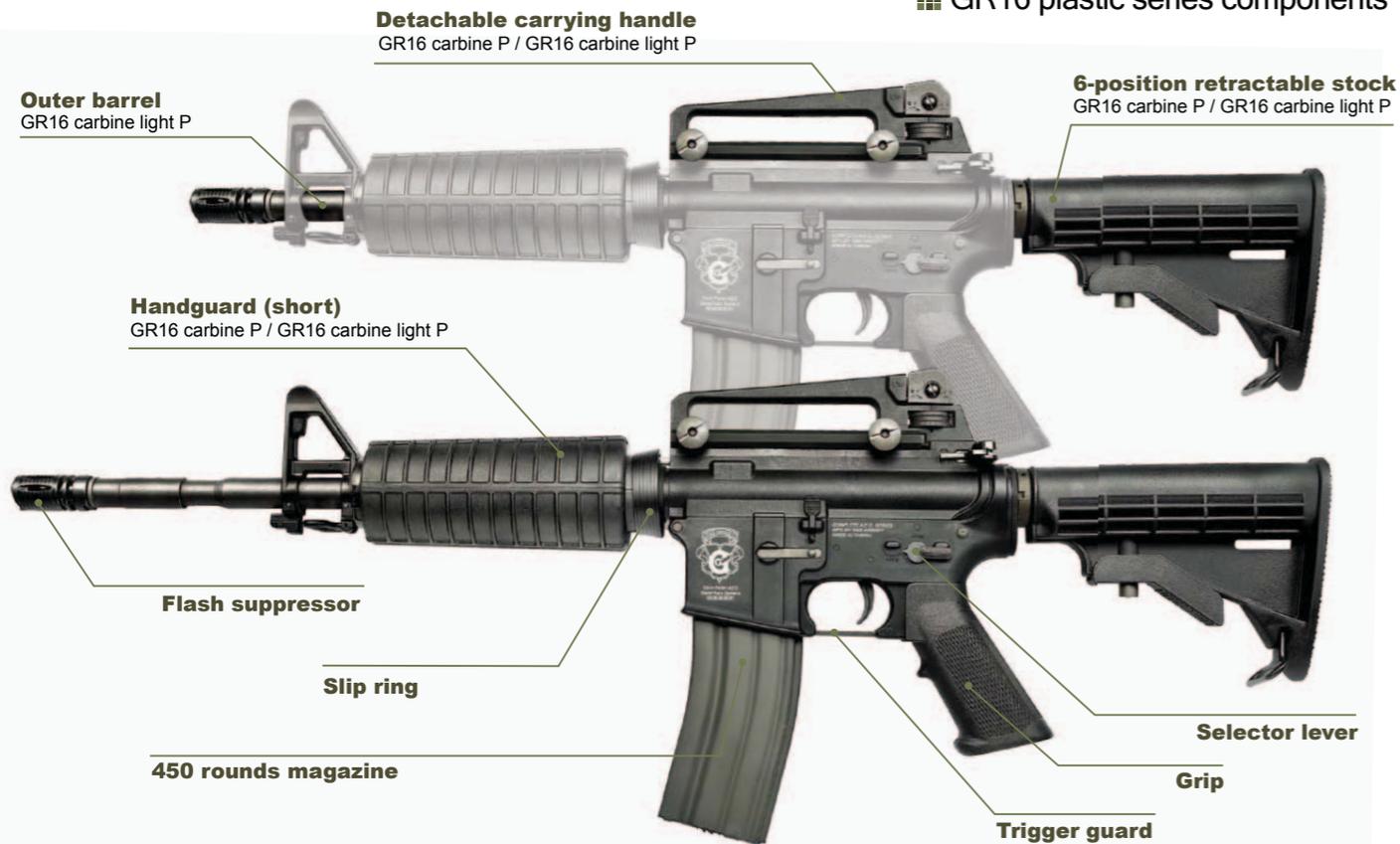


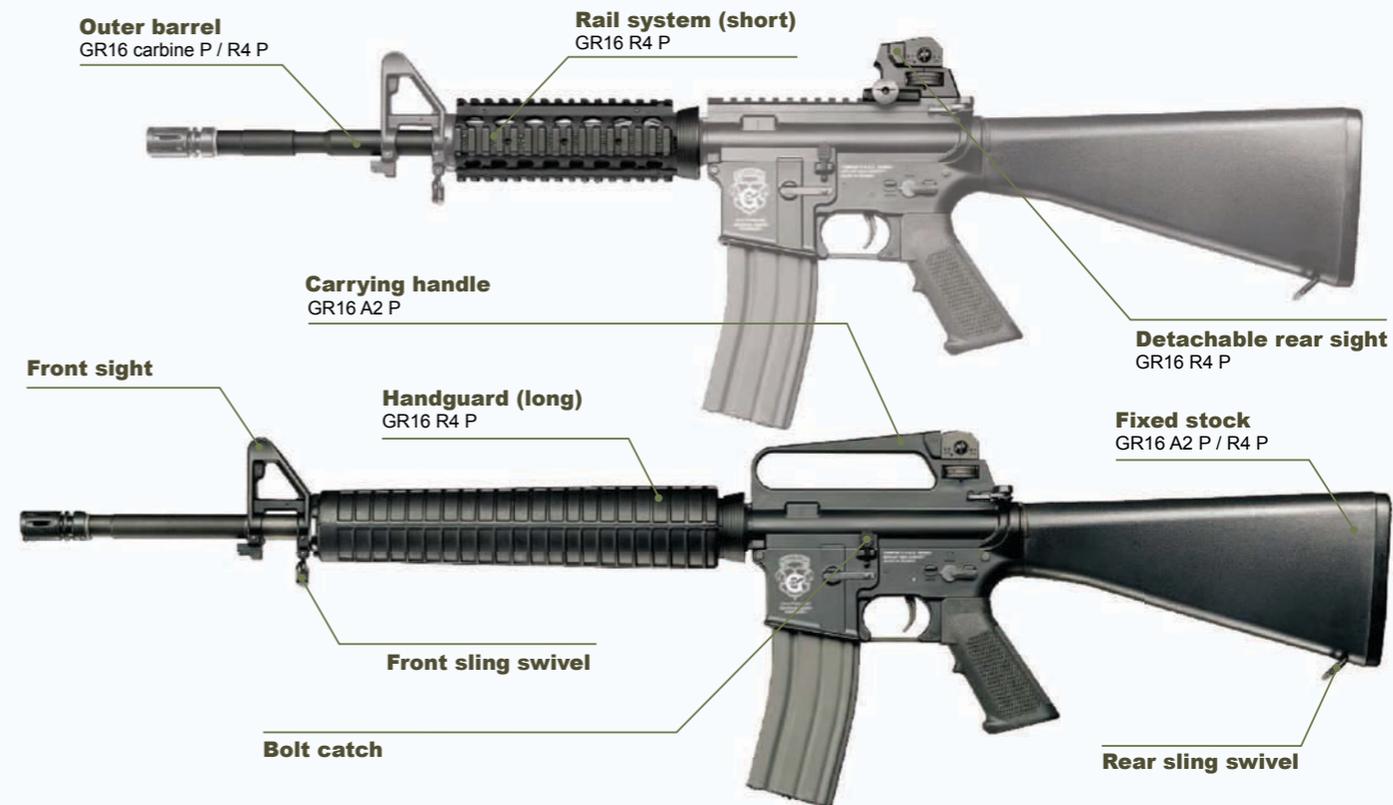
G4 CQB metal series components



G4 CQB metal series components



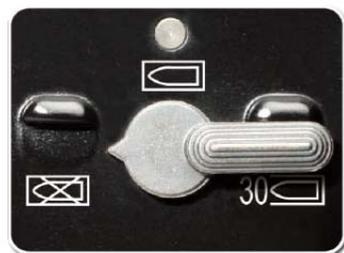


Selector and safety setting

Warning

- ▶ Never operate the Selector while pulling the trigger. Otherwise, malfunctions may occur.
- ▶ Pulling the trigger with the Selector being set at safe mode may damage the air gun.

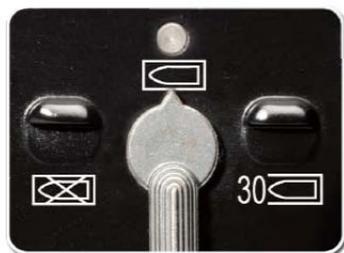
Always set the safety mode setting until immediately after firing



Safety setting mode

The trigger can not be pulled

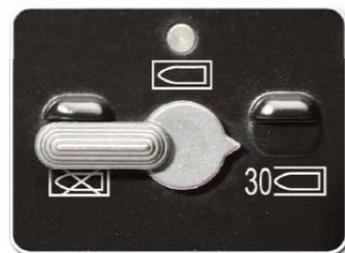
When you are not firing the gun or during storage. Always set the selector to the Safe position and attach the protective cap on the muzzle.



Semi mode

Single shot

The gun will fire one shot each time when pulling the trigger.



Fully automatic mode

Automatic firing

The gun will fire automatically while the trigger remains pulled.



Installing battery

Warning

- ▶ Use only the G&G battery purchased from your local dealer.

For fixed stock version

GR16 Metal A2 / A3 / A3 carbine / R4 / R5

GR16 A2 Plastic / R4 Plastic



Lower the stock plate nail and open the cover.



Connect the connector until you heard a click sound. Insert battery into the fixed stock.



Close battery cover.

For handguard version

GR16 Metal carbine / A2 carbine

GR16 carbine Plastic / GR16 Light carbine Plastic

G4 CQB H



Pull the slip ring and hold. Remove the lower handguard.



Set the battery beside the outer barrel. Connect battery plug with the connector until you heard a click sound.



Hold the battery and pull the slip ring. Remove the lower handguard.

Warning

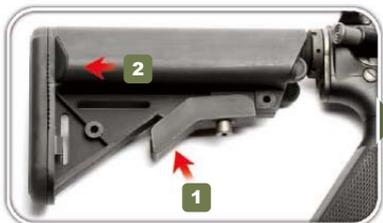
- Use only the G&G battery purchased from your local dealer.

Installing battery

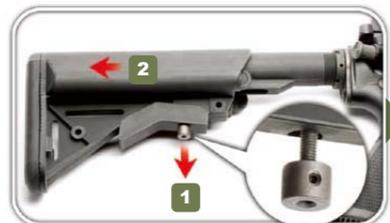
For Extend battery stock version

GR16 Metal CQW

G4 CQB R / G4 CQB S



1. Push the stock release lever.
2. Pull the stock to last position.



1. Pull and hold the stock release lever mount.
2. Pull out the stock.

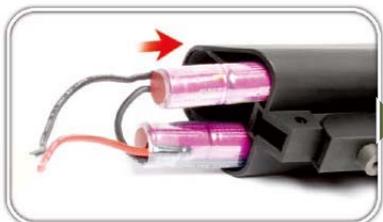


Turn and take off the battery cover.

For Extend battery stock version

GR16 Metal CQW

G4 CQB R / G4 CQB S



Insert battery into the stock.



Connect battery plug with the connector until you heard a click sound.



Reinstall the stock.

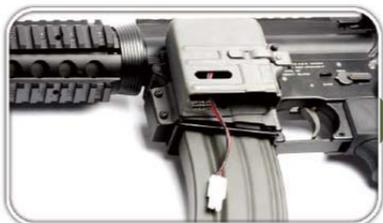
Warning

- Use only the G&G battery purchased from your local dealer.

Installing battery

For Ready magazine version

GR16 Metal R4 carbine / CRW



Pull out the connector.



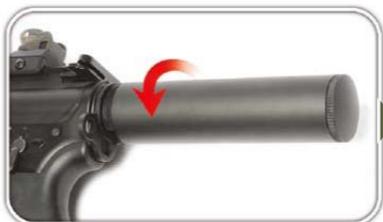
Connect battery plug with the connector until you heard a click sound.



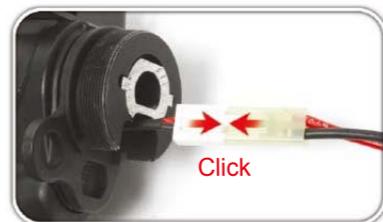
Insert into upper receiver and connect firmly until you heard a click sound.

For Patriot battery stock version

GR16 Metal CRW Cannon / CRW Viper



Release the battery stock.



Connect battery plug with the connector until you heard a click sound.



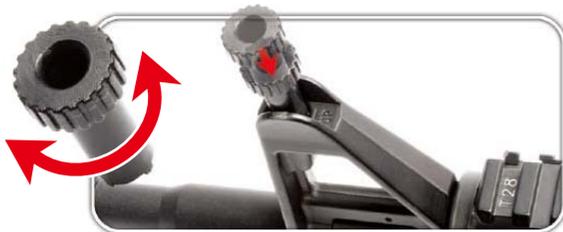
1. Insert battery into the stock.
2. Locking the stock.

Warning

- ▶ Make sure not to lose the adjustment tool.

Sight adjustment

Front sight adjustment



For front sight up-down adjustment.
 Turning clockwise : Raises the pellet hitting point.
 Turning counterclockwise : Lowers the pellet hitting point.

Windage adjustment knob

Turning the windage adjustment dial will move the pellet hitting point to the left or right.

For left-right adjustment.
 Turning clockwise : Shifts the pellet hitting point to the right.
 Turning counterclockwise : Shifts the pellet hitting point to the left.



Precision targeting



Battle sight
 (For common shooting)
 Used for full automatic firing.



Battle sight
 (For special shooting)
 Used for precision firing.

Up-down adjustment



Turning the dial UP will raise the pellet hitting point.



Turning the dial DOWN will lower the pellet hitting point.



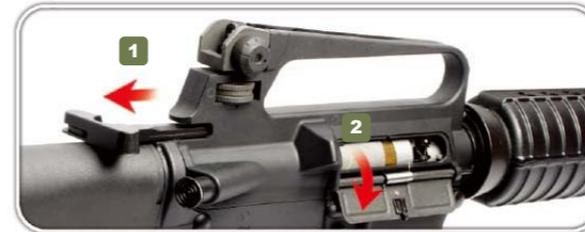
Raises the pellet hitting point.

Warning

- ▶ Be careful not to catch your fingers in the dummy bolt.

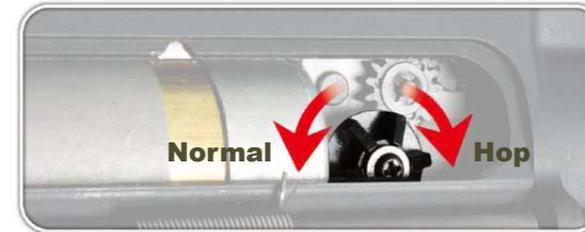
Charging handle & Hop-up adjustment

Open the port cover



1. The Charging handle can be pulled and the bolt will be fastened.
 2. Pulling the charging handle will take the bolt back and open the port cover. **This function only for Plastic / blow back version**

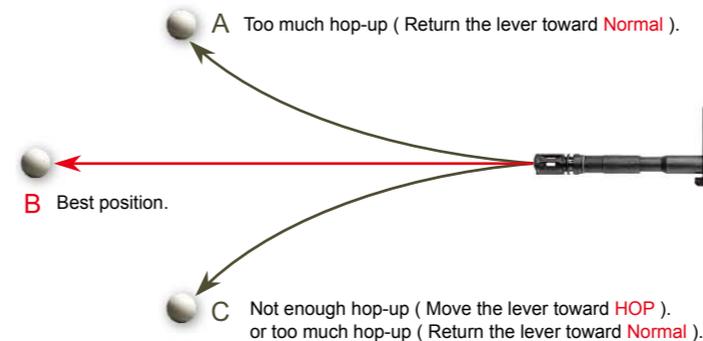
Hop-up adjustment



Turning hop-up dial for desired flight pattern of the BB pellet.
 The hop-up dial can be turned to a certain degree.
 Turning it too much will damage the unit.

Warning

- ▶ Never hold the gun sideways as the BB pellets will curve right or left.
- ▶ This is due to the HOP-UP system.



Warning

- Only adjust if the gear noise becomes shrilly.

Movable parts

Depress the trigger guard



Depress the trigger guard plunger with a proper tool and open the trigger guard.

Motor adjustment



The motor adjustable screw is at the bottom of the grip. Use a screwdriver to adjust.

Forward grip setting



Set the forward grip on the rail.



Move the forward grip to adjust position.



Fasten the knob.

Movable parts

Install carrying handle



Connect the detachable carrying handle with the upper receiver.



Fasten the interface knob.



Finish.

Install rear sight



Put on the detachable rear sight on the upper receiver.



Fasten the interface knob.



Finish.

 Movable parts
Q.D. sling swivel setting

Put on Q.D.sling swivel mount on the rail.
Fasten the screw.



Install the Q.D.sling swivel on the Q.D.sling swivel mount.



Install the Q.D. sling swivel on the sopmod tactical stock.

Rail handguard panels setting

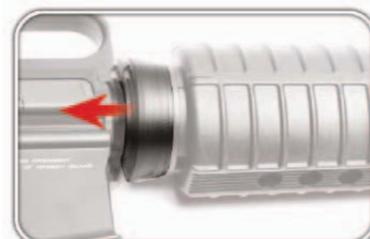
Set the forward grip on the rail.



Rail handguard panels setting.



Finish.

 Movable parts
Remove the handguard

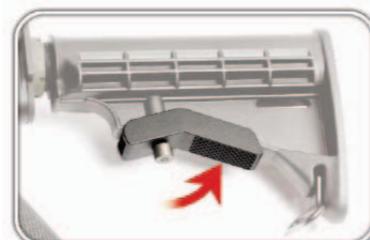
Pull the slip ring.



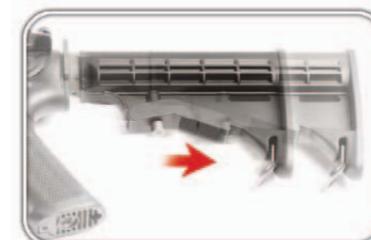
Remove the lower handguard.



Remove the upper handguard.

Retractable stock

Push the release lever to unlock.



Pull the stock.



Adjust the position of stock (6 position).

- Warning**
- ▶ Make sure to set the magazine upwards. It is securely installed when you heard a click sound.
 - ▶ Confirm that the safety lever is set to Safety position and do not place your finger on the trigger.

Setting the magazine

Setting the magazine



Open the cover of magazine.



Load G&G 5.95mm BB pellets into the magazine. The magazine is capable of holding approximately 450 pellets.



After the BB pellets had been loaded. Close cover and turn the gear on the bottom until the sound changes.

Setting the magazine



Insert the magazine into the body until you hear a click sound.

To release the magazine



Press the magazine release.



Pull the magazine out of receiver.

- Warning**
- ▶ Select a safe place for operating the air gun.
 - ▶ Never put your finger on the bolt when operating the air gun.

Firing

Firing



Make sure to install the magazine upwards and into the body. It is installed properly when you heard a click sound.



Remove the protective cap only when you are ready for firing the gun.



Set the Selector Lever to Semi or Full Auto.

After operation

1. Remove magazine, fire at a safe direction for 2-3 seconds, then push the forward assist knob to release the spring, and have the selector set into safety mode. Make sure that the barrel is empty.
2. Always disconnect the battery and attach the protective cap whenever you do not operate the air gun.



Cautions on motor and battery

1. Charge the battery if the firing cycle becomes slow.
2. Pausing using the air gun for about 5 to 10 minutes after firing about 500 rounds, in order to ensure long service lives of the motor and battery.

Maintenance



Maintenance when pellets speed becomes low

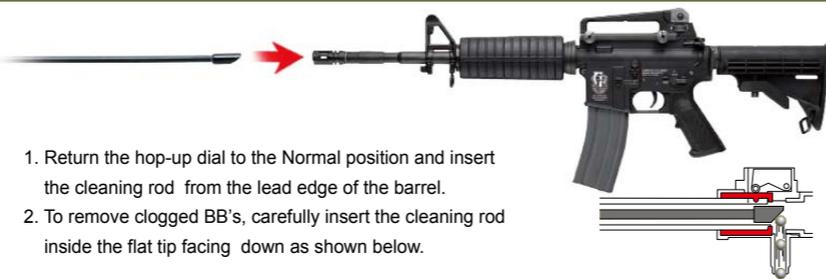


1. Drop a few drops of silicone oil or teflon oil into the pellet entrance. After inserting BB pellets into the magazine, fire the gun for up to 200~300 pellets.
2. To complete the cleaning, use the cleaning rod (with cotton) to remove excess oil.

Warning

- ▶ Do not jam the cleaning rod into the barrel by force.
- ▶ Should the BB's remain inside the barrel after following the instruction above, with the protection cap over the barrel, point the gun to a safe direction, and discharge any loosened BB's in semi-automatic mode.

Removing clogged pellets



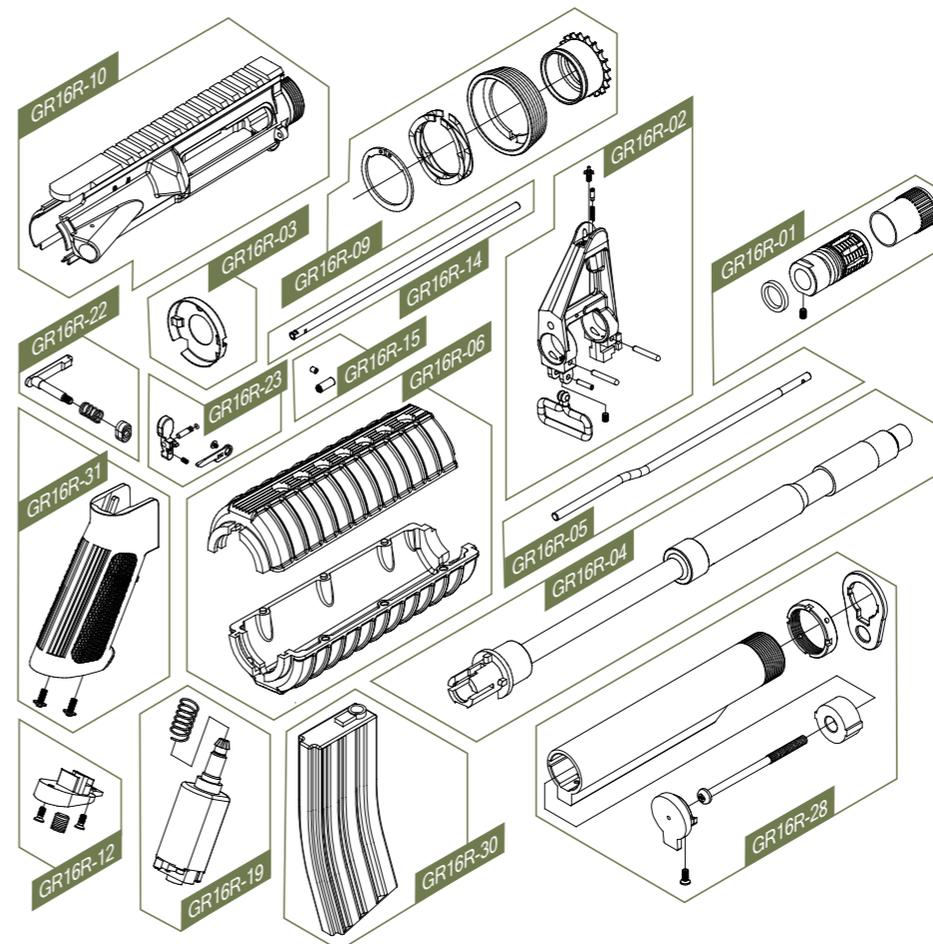
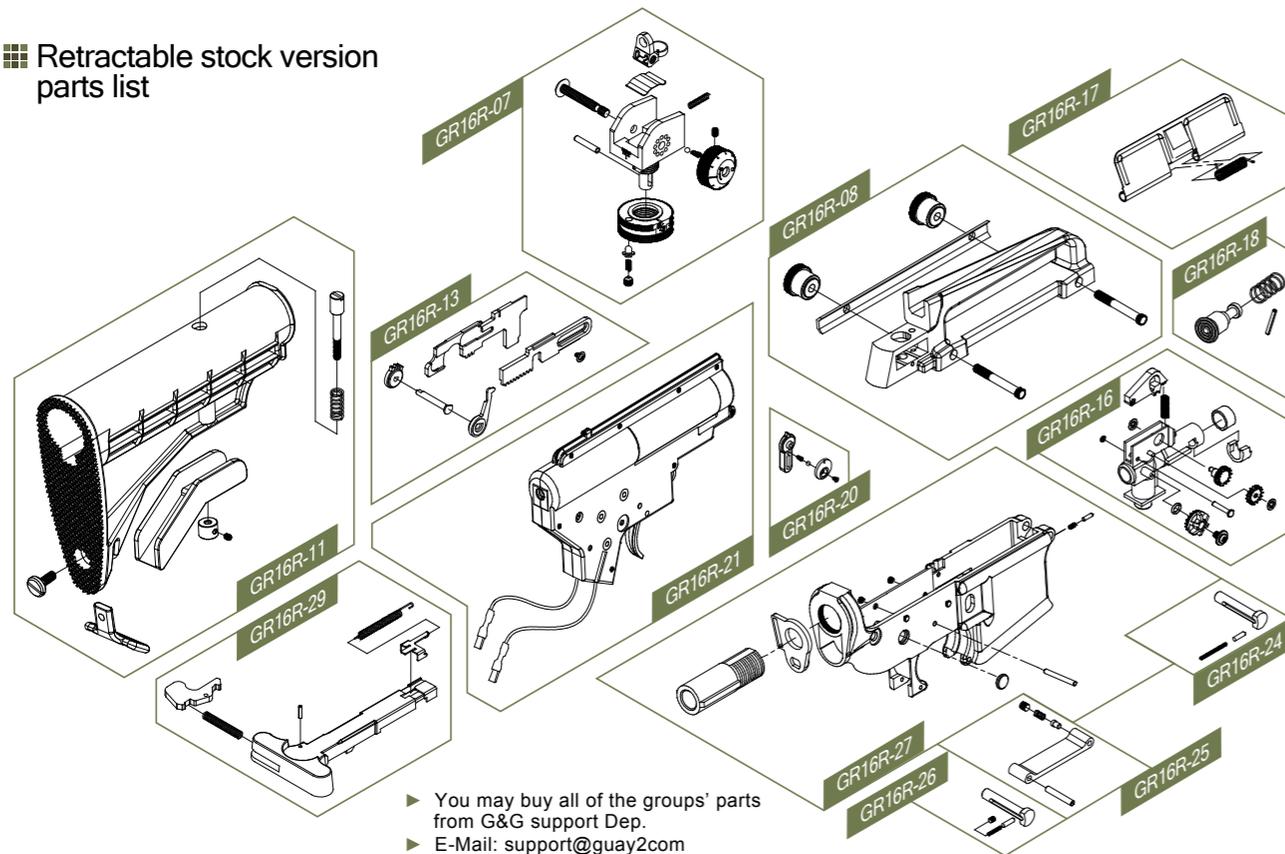
1. Return the hop-up dial to the Normal position and insert the cleaning rod from the lead edge of the barrel.
2. To remove clogged BB's, carefully insert the cleaning rod inside the flat tip facing down as shown below.

Warning

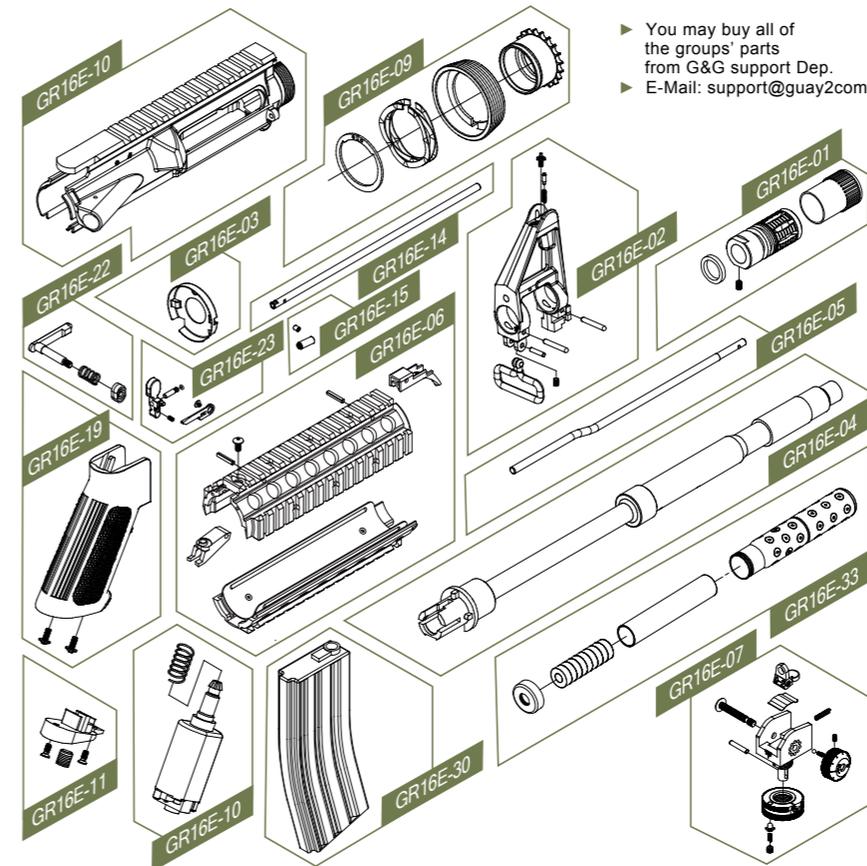
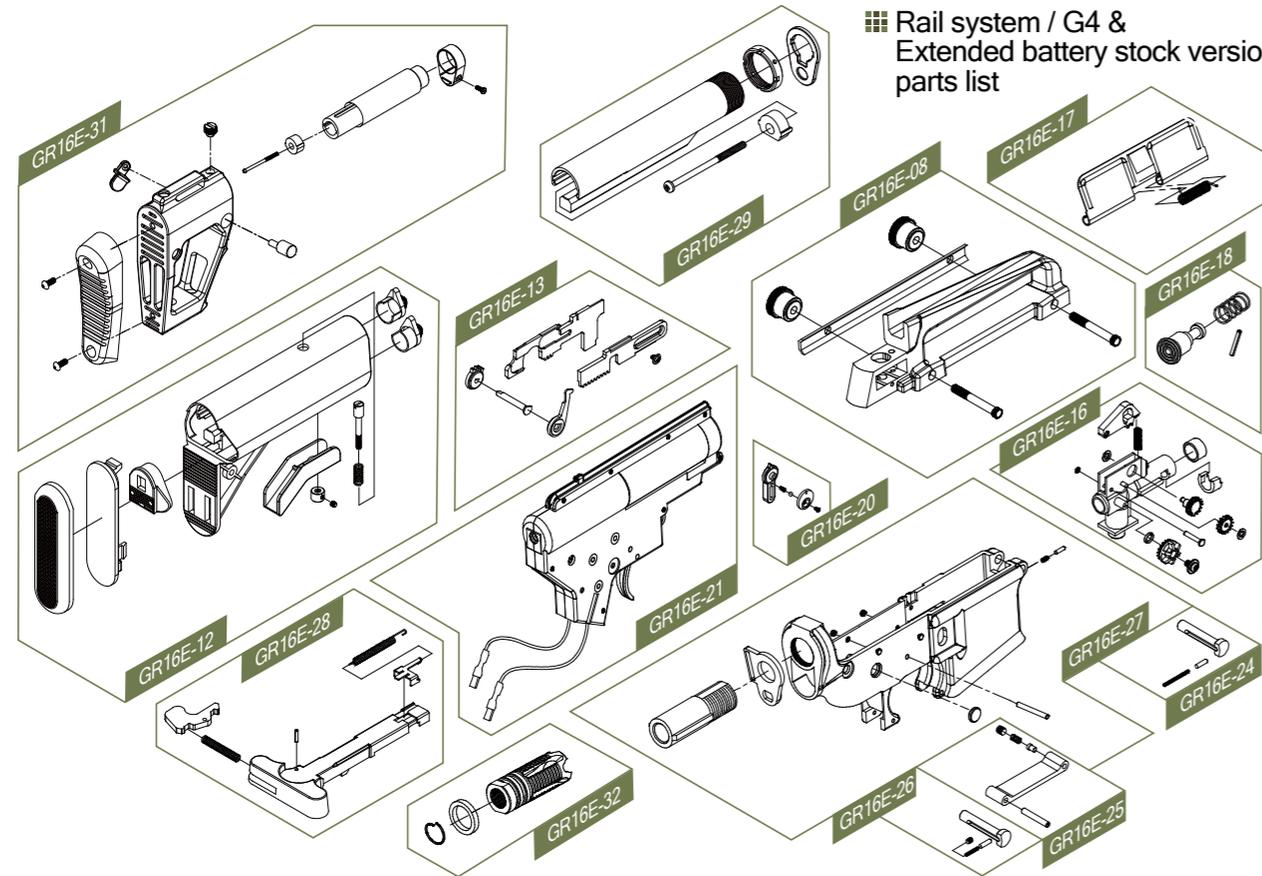
- ▶ Make sure no dirt gets into the chamber to avoid clogging of pellets.
- ▶ Hop-up may be unstable for 200 to 300 rounds after using silicone oil, this is the normal operation of the gun.
- ▶ Never use CRC-556, WD40 or other corrosive lubricant.

SYMPTOM	CAUSE	ACTION
No operation at all	Selector lever is set to safety.	Set the selector lever to Semi or Full Auto.
	Battery is not charged.	Change the battery.
	Battery connector is disconnected.	Connect the connector.
	The ⊖ and ⊕ of battery connector is reversed.	Connect the connector correctly(check the fuse).
Although motor is revolving, no pellet can be fired	Expired motor life(50,000 to 60,000 rounds) or poor electrical connection.	Replace the motor(purchasing from your dealer or us)or check and repair the contacts.
	Pellets are clogged inside the magazine.	Insert the charging rod into the magazine and move up and down a few times to remove clogged pellets.
Full-auto operation not functional (automatic firing)	Pellets are clogged in the chamber.	Remove clogged pellets using the cleaning rod.
	Faulty gear.	Purchase the replacement gear from your dealer or G&G and repair.
	Insufficient battery power.	Charge the battery.
Shooting distance becomes shorter	Magazine feed with faulty pellet .	Repair clogging of the magazine.
	Poor electrical connection.	Consult your dealer or us for overhaul maintenance or repair.
	Damaged or worn chamber set.	Replace the replacement parts.(Purchasing from your dealer or G&G)
	Damaged or worn piston set (O-ring,piston spring)	
	Something is jammed in the inner barrel	Use the cleaning rod and clean the inner barrel.
Faulty BB pellets (too small or heavy)	Use the genuine G&G Pellets.	
Too loud operating noise	Shortage of silicone oil	Drop a few drops of silicone oil from the chamber upper .
	Gear problem caused by too many blank firing	Consult your dealer or G&G for overhaul maintenance,part replacement (gear,etc.) or repair.
	Worn or damaged gear	
Pellets being fallen out from barrel end	Gear problem caused by too many blank firing	Turn the hop adjustment lever toward Hop. Use the G&G Pellets.
	Damaged or worn chamber set.	
Pellets flying upwards	No hop setting.	Gradually return adjustment lever towards Normal.
	Faulty BB Pellets (too small).	
Short flying distance of pellets (less hopping up effect)	Too much hop setting	Gradually return adjustment lever towards Normal.
	Hop packing contaminated by oil or dirt	
	Dirt inside the barrel	Fire pellets equivalent to 4 to 5 magazine or clean the chamber using cleaning rod. Purchase the replacement part from your dealer or G&G and replace it.
	Worn or damaged hop packing.	
Cannot adjust	Damaged adjustment lever or other parts	Purchase the replacement part from your dealer or G&G and replace it.
	Too much hop setting	Gradually return adjustment lever towards Normal.
Frequent pellet clogging	Improper or too large sized BB pellets.	Use the BB pellet supplied by G&G Armament.
	Dirty hop packing	Clean using the cleaning rod or consult your dealer or G&G for repair.
If gun gets wet	Stop operation immediately,disconnect the battery,wipe off water from inside the main body and the battery.After completely dried,carry out trial firing.If the unit is not operational,please contact your local dealer for repair	

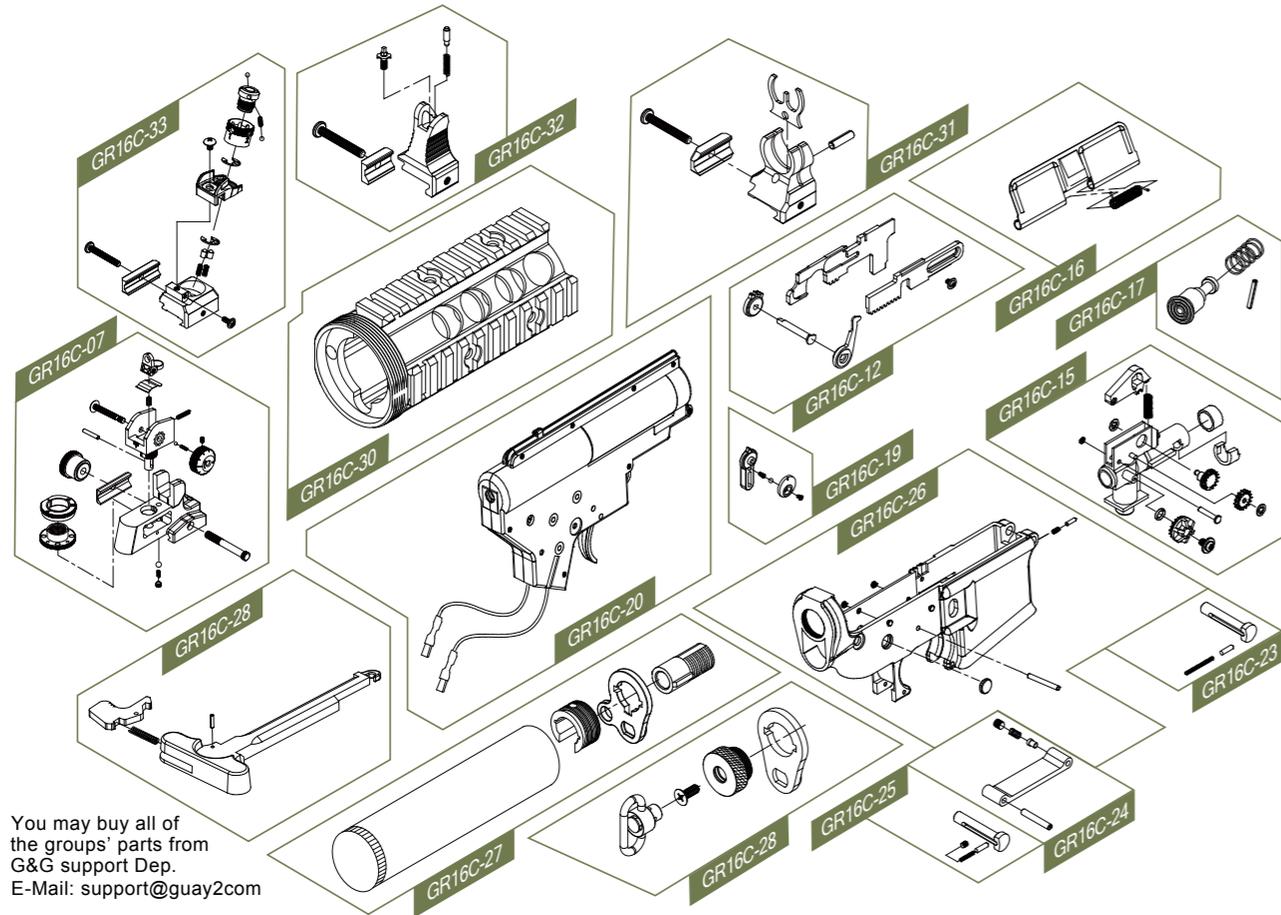
Retractable stock version parts list



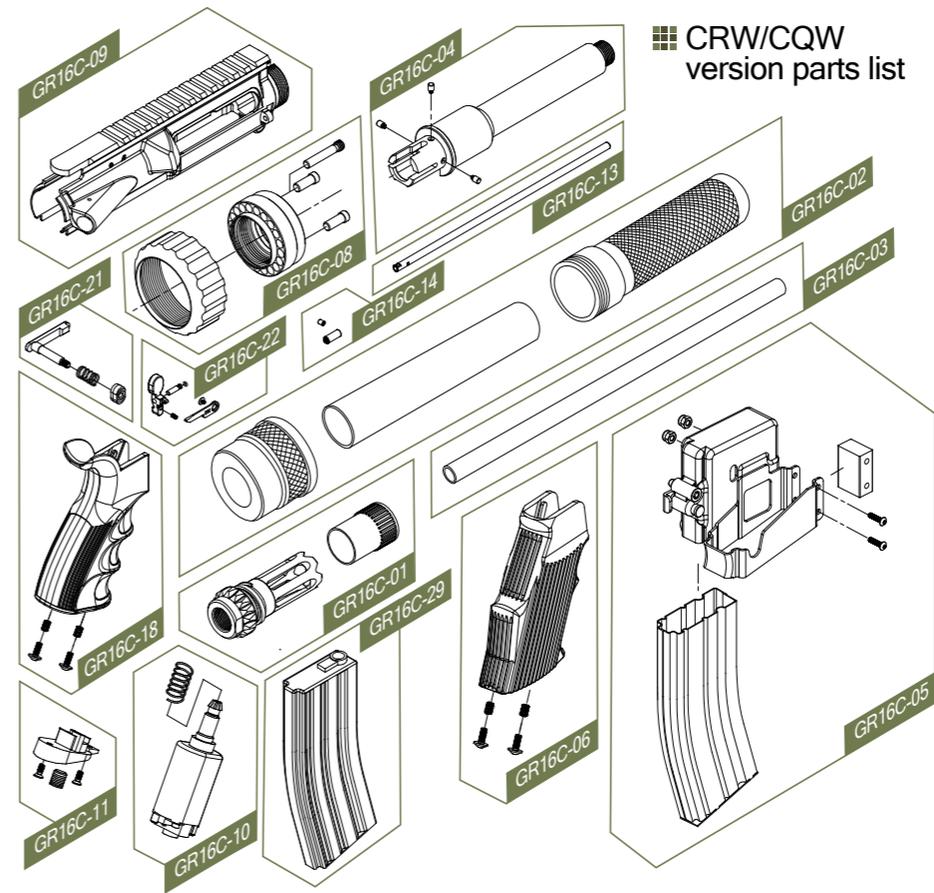
GR16R-01	Flash suppressor set
GR16R-02	Front sight set
GR16R-03	Handguard front fixed ring
GR16R-04	Outer barrel set
GR16R-05	Piston rod
GR16R-06	Handguard set
GR16R-07	Rear sight set
GR16R-08	Detachable carrying handle
GR16R-09	Slip ring
GR16R-10	Upper receiver set
GR16R-11	Retractable stock
GR16R-12	Grip bottom set
GR16R-13	Selector plate
GR16R-14	Inner barrel
GR16R-15	Hop-up rubber set
GR16R-16	Hop-up set
GR16R-17	Port cover set
GR16R-18	Assist knob set
GR16R-19	Motor set
GR16R-20	Selector lever set
GR16R-21	Gear box set
GR16R-22	Magazine catch set
GR16R-23	Bolt catch set
GR16R-24	Front frame lock pin set
GR16R-25	Trigger guard set
GR16R-26	Rear frame lock pin set
GR16R-27	Lower receiver
GR16R-28	Retractable stock set
GR16R-29	Charging handle
GR16R-30	Magazine
GR16R-31	Grip



GR16F-01	Flash suppressor set
GR16F-02	Front sight set
GR16F-03	Rail system front fixed ring
GR16F-04	Outer barrel set
GR16F-05	Piston rod
GR16F-06	Rail system set
GR16F-07	Detachable carrying handle
GR16F-08	Slip ring
GR16F-09	Upper receiver set
GR16F-10	Motor set
GR16F-11	Grip bottom set
GR16F-12	Extended battery stock
GR16F-13	Selector plate
GR16F-14	Inner barrel
GR16F-15	Hop-up rubber set
GR16F-16	Hop-up set
GR16F-17	Port cover set
GR16F-18	Assist knob set
GR16F-19	Grip
GR16F-20	Selector lever set
GR16F-21	Gear box set
GR16F-22	Magazine catch set
GR16F-23	Bolt catch set
GR16F-24	Front frame lock pin set
GR16F-25	Trigger guard set
GR16F-26	Rear frame lock pin set
GR16F-27	Lower receiver
GR16F-28	Charging handle
GR16F-29	Extended battery stock set
GR16F-30	Magazine
GR16F-31	G4 sopmod tactical stock
GR16F-32	Assault type flash suppressor
GR16F-33	G4 mock sound suppressor



- ▶ You may buy all of the groups' parts from G&G support Dep.
- ▶ E-Mail: support@guay2com



CRWC/QW version parts list

GR16C-01	CQW/CRW flash suppressor set
GR16C-02	Cannon mock suppressor set
GR16C-03	Viper mock suppressor set
GR16C-04	Outer barrel set
GR16C-05	Ready Magazine set
GR16C-06	CQW grip
GR16C-07	CQW/CRW rear sight set
GR16C-08	Slip ring
GR16C-09	Upper receiver set
GR16C-10	Motor set
GR16C-11	Grip bottom set
GR16C-12	Selector plate
GR16C-13	Inner barrel
GR16C-14	Hop-up rubber set
GR16C-15	Hop-up set
GR16C-16	Port cover set
GR16C-17	Assist knob set
GR16C-18	CRW/Cannon/Viper Grip
GR16C-19	Selector lever set
GR16C-20	Gear box set
GR16C-21	Magazine catch set
GR16C-22	Bolt catch set
GR16C-23	Front frame lock pin set
GR16C-24	Trigger guard set
GR16C-25	Rear frame lock pin set
GR16C-26	Lower receiver
GR16C-27	CRW Cannon/Viper stock
GR16C-28	Q.D. Sling swivel
GR16C-29	Magazine
GR16C-30	Rail system(short)
GR16C-31	CRW/Cannon/Viper front sight
GR16C-32	CQW front sight
GR16C-33	Cannon/Viper rear sight set