



# PMI BLACKMAXX™ SEMI-AUTO .68 CALIBER SEMI AUTOMATIC PAINTBALL MARKER INSTRUCTION MANUAL

Paintball is a recreational and competitive sport played worldwide. Special equipment used in paintball includes paintball markers, which are airguns; and paintballs, which are liquid-filled gelatin capsules that mark with a bright color. The object of the game is to capture the opposing team's flag; while on that quest, players try to mark their opponents to eliminate them from the game.

This owner's manual is provided with several models of the PMI BlackMaxx™ paintball marker. Pursuit Marketing, Inc. (PMI, Inc.), reserves the right to modify or change its markers without incurring any obligation to incorporate such modifications or changes in any of its products that were sold prior to the modification. The information in this owner's manual may be updated or changed without notice.

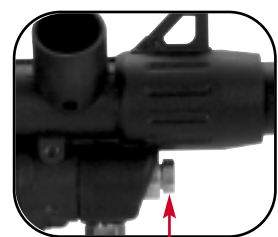
This owner's manual is intended to remain with the paintball marker upon any subsequent transfer of the marker, whether through sale, resale, or furnishing in any manner. An updated and replacement owner's manual may be obtained from: Pursuit Marketing, Inc., 55 Howard Ave, Des Plaines, IL 60018 USA; phone 800.579.1633; www.buypmi.com. Questions about the operation of the PMI BlackMaxx™ paintball marker may be directed to Pursuit Marketing, Inc. or visit www.buypmi.com for updates regarding your PMI BlackMaxx™ purchase.

## STATEMENT OF LIABILITY

This PMI BlackMaxx™ semi-automatic paintball marker is surrendered by Pursuit Marketing, Inc. (PMI, Inc.), with the express understanding that the purchaser assumes all liability arising out of any unsafe handling of this marker or any action that violates any applicable laws or regulations. PMI, Inc., assumes no liability for, and shall not be responsible for, any personal injury or loss of property or life resulting from the use of this paintball marker under any circumstances, including but not limited to those resulting from intentional, reckless, negligent or accidental discharges.



## WARNING



Safety Device Figure A.

Your PMI Marker has a specially designed pressure release system installed. See Figure A. **DO NOT REMOVE OR ALTER THIS SAFETY DEVICE!** This safety device will not allow pressures in excess of 3000 psi to enter your marker. If the output pressure of your air system exceeds 3000 psi the safety release disc will vent, preventing damage to your marker. Should this occur, replace the rupture disc using only PMI Replacement Kit #41022 rated at 3000 PSI. Contact your local paintball dealer to perform this maintenance or contact PMI at 1.800.579.1633 for further information.



## WARNING

THE PMI BLACKMAXX™ PAINTBALL MARKER IS NOT A TOY. MISUSE MAY CAUSE SERIOUS INJURY OR DEATH. EYE PROTECTION DESIGNED FOR PAINTBALL USE MUST BE WORN BY THE USER AND ANY PERSON WITHIN RANGE. READ THIS OWNER'S MANUAL COMPLETELY BEFORE LOADING, PRESSURIZING, OR OPERATING THE PMI BLACKMAXX™ PAINTBALL MARKER.

## PMI BLACKMAXX™ SPECIFICATIONS

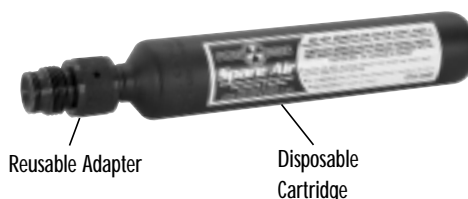
Action:	semi-automatic, open bolt blow-back
Length:	17 in. overall (with 9 in. barrel and without attachments)
Weight:	1 lb. 7 oz. (PMI BlackMaxx™)
	all weights are without attached air source or loader
Height:	8 in. (without attached loader)
Barrel:	threaded and polished aluminum
Barrel Length:	9 in.
Feed Port:	7/8 in. outside diameter; fits standard elbow adapters
Paintballs:	for use only with standard ".68 caliber" (.68-in. diameter) paintballs
Power source:	accepts standard connections for CO <sub>2</sub> , regulated N <sub>2</sub> or regulated compressed air
Operating pressure:	recommended 650 p.s.i. to 1000 p.s.i.
Input pressure:	1000 p.s.i. Do not exceed recommended input on operating pressure
Power source input:	bottom line adapter; accepts standard threading
Grip:	molded .45 style
Safety:	rotating mechanical

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## REFILLABLE SPARE AIR INSTALLATION



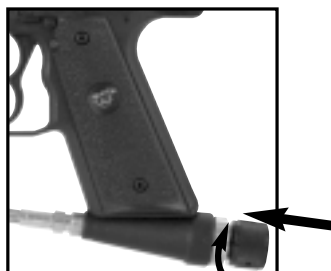
1. Unthread reusable adapter from Spare Air Cartridge.



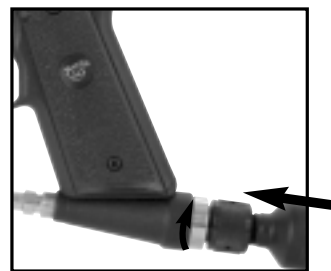
Reusable Adapter

Disposable Cartridge

2. Screw adapter into marker. Be sure it is securely tightened.

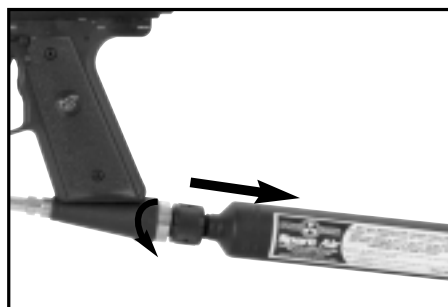


3. Thread cartridge into adapter until completely pierced.

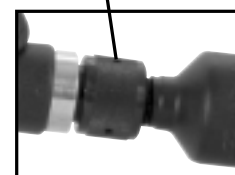


DO NOT REMOVE CARTRIDGE UNTIL EMPTY

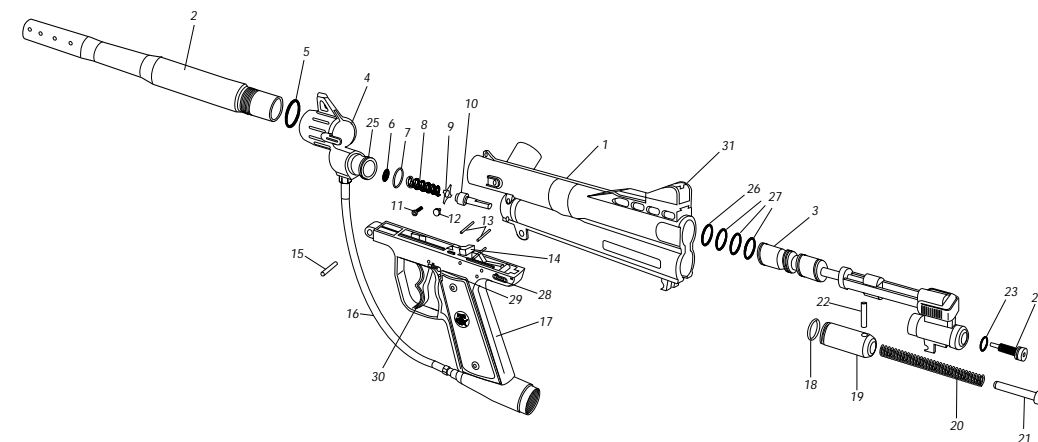
4. When done playing, slowly unthread cartridge from adapter.



Do not block holes on adapter. Leftover CO<sub>2</sub> will be exhausted from cartridge.



## PMI BLACKMAXX™ PARTS LOCATION



1. Receiver	77101	12. Ball Detent	10160	23. Velocity Adjust O-ring	10460
2. Barrel	10124	13. Cowl Pins	77150	24. Velocity Adjust Screw	10026
3. Bolt	77110	14. Sear	77120	25. Brass Valve Base	77108
4. Front Cowl	77102	15. Front Pivot Pin	77151	26. Front Bolt O-ring	77109
5. Barrel O-ring	10161	16. 7 in. Hose	47015	27. Bolt O-rings	77106
6. Screen Filter	10623	17. Grip Frame	10301	28. Elliptical Locking Switch	77107
7. Tank O-ring	41010	18. Hammer O-ring	10129	29. Safety Switch	77130
8. Valve spring	10550	19. Hammer	10310	30. Trigger	77104
9. Valve Guide	10520	20. Hammer Spring	10351	31. Sight Housing	77105
10. Cup Seal	10127	21. Spring Guide	10301		
11. Sight Screw	77160	22. Bolt Pin	10291		

## OPERATING THE PMI BLACKMAXX™ PAINTBALL MARKER

1. Attach threaded barrel firmly to marker.
2. At this time, do not attach power source or loader and do not load paintballs into marker.
3. Insert barrel plug firmly into barrel.
4. Pull the cocking knob straight back from the rear of the marker until the cocking mechanism locks back in the cocked position. Push cocking knob back into original position. Figures 1 and 2. Push the Safety Switch forward into the Shoot Position. Figures 3 and 4.
5. Squeeze the trigger with an even pressure. You will hear the hammer snap forward. Return the Safety Switch to the No Shoot Position.
6. Attach feed tube elbow and empty loader. If the feed tube elbow is difficult to attach, run hot water over the elbow or soak it in hot water for one minute, which will help the elbow expand for easier attachment. When the elbow cools, the snug fit will help the loader remain in position.
7. Cock the marker.
8. Attach CO<sub>2</sub> source to bottom line adapter, ensure safety is in No Shoot position (see Figure 3 below).
9. Load paintballs into the hopper.

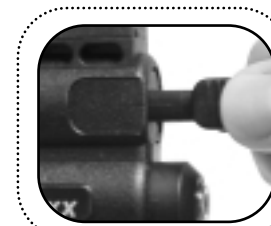


FIGURE 1 PULL BACK



FIGURE 2 FULLY COCKED



FIGURE 3 NO SHOOT POSITION



FIGURE 4 SHOOT POSITION

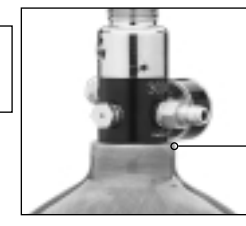


## WARNING

DO NOT EXCEED RECOMMENDED INPUT OR OPERATING PRESSURE OF 1000 PSI.

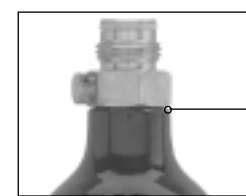
### VALVE-CYLINDER CONNECTION

The valve on a cylinder is to remain screwed into the cylinder. Should it loosen, the cylinder may detach from the valve with extremely dangerous force. Call manufacturer or take to qualified personnel for inspection.



Valve-cylinder connection.

Every time a cylinder is filled, the connection between the valve and cylinder must be inspected. If any looseness or leak is detected between the valve and the cylinder, do not fill. Drain cylinder and call manufacturer or take to qualified personnel for inspection.



Valve-cylinder connection.

During filling, if any looseness or leak is detected between the valve and the cylinder, filling must stop immediately. Drain cylinder and call manufacturer or take to qualified personnel for inspection.

# WARNING

ALL PAINTBALL MARKERS MUST BE CHRONOGRAPHED REGULARLY. ADJUST MARKER TO SHOOT PAINTBALLS AT A VELOCITY THAT IS LESS THAN 300 FEET PER SECOND (FPS) AND THAT DOES NOT EXCEED THE VELOCITY LIMIT SET BY THE PAINTBALL PARK WHERE THE MARKER IS IN USE. CHRONOGRAPH THE MARKER AT REGULAR INTERVALS DURING THE DAY, AS WELL AS ANY TIME THE POWER SOURCE IS REFILLED OR CHANGED, ANY TIME THE BARREL OR ANY PART IN THE POWER SYSTEM IS CHANGED, AND UPON REQUEST OF ANY PLAYER OR GAME OFFICIAL.

## VELOCITY ADJUSTMENT OF THE PMI BLACKMAXX™

1. Chronograph the marker using standard chronograph procedures and following safety rules. Shooting velocity will vary based upon many factors.
2. Adjust velocity by using a 3/16 in. allen wrench to turn the velocity adjuster. Turn adjuster clockwise to raise velocity. Turn adjuster counterclockwise to lower velocity. Turning the velocity adjuster changes the amount of tension on the hammer spring. The hammer spring may be changed for additional velocity adjustment; insert stiffer spring to raise velocity and less stiff spring to lower velocity. Extra springs may be purchased from your local paintball retailer.

The hammer spring assembled with the PMI BlackMaxx™ paintball marker is intended to provide appropriate shooting velocity for most outdoor paintball game situations and will provide a range of velocities suitable for most conditions. Shooting velocity will vary based upon form of regulated compressed gas or air used to power the marker, outside temperature, and other factors. Additional hammer springs of varying spring stiffness are available for further velocity adjustment. **DO NOT EXCEED 300 FEET PER SECOND (fps) VELOCITY.**

## DISASSEMBLY PROCEDURE AND CLEANING

1. Before disassembling the marker, first remove the power source; then remove all paintballs from the marker and loader. Leave barrel plug firmly inserted in barrel and pointed in a safe direction. Marker must be un-cocked to disassemble marker.
2. To remove bolt/hammer assembly, first rotate downward the elliptical switch located on the rear of the grip frame (Figure A). After rotating the switch 180 degrees the grip frame will unlock from the body at the rear of the gun. This will allow you to separate the grip frame and the marker body at the rear only, as they are hinged together at the front. (Figure B)
3. After separating the body and grip frame about one inch apart you must grip the cocking knob with one hand and pull it firmly toward the rear of the gun. (Figure C) The bolt/hammer assembly (Figure D) should easily slide out as one unit.
4. The bolt/hammer assembly can be cleaned with a damp cloth to remove any remaining paintball material.
5. The barrel of the marker can be unscrewed in a counter clockwise direction and removed from the marker body. After removing the barrel the barrel plug may be removed to allow cleaning of the barrel with a paintball squeegee.
6. The outside of the marker can be cleaned with a damp cloth.
7. To reassemble follow directions in reverse order. Lubricate the bolt/hammer assembly with PMI Paintball Marker Oil or any 100% synthetic paintball gun oil.



FIGURE A



FIGURE B



FIGURE C



FIGURE D

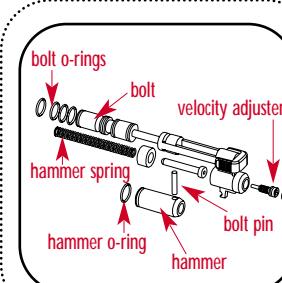


FIGURE E



FIGURE F

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READ THIS OWNER'S MANUAL COMPLETELY BEFORE LOADING, PRESSURIZING, OR OPERATING THE PMI BLACKMAXX™ PAINTBALL MARKER.

- Always wear protective goggles and headgear specifically designed for paintball when shooting this or any paintball marker.
- Every person within range of an area where a paintball marker is in use must wear protective goggles and headgear specifically designed for paintball.
- Operate a paintball marker only in areas where it is safe and lawful to do so.
- Misuse of this paintball marker can result in criminal penalties, including jail time.
- This marker is intended for sale to adults 18 years of age or older only. Adult supervision is recommended at all times whenever a minor is handling this marker in any manner.

# WARNING

DO NOT ATTEMPT TO PERFORM MAINTENANCE PROCEDURES UNLESS QUALIFIED TO DO SO. CONTACT PMI INC., FOR REPAIR ASSISTANCE AND INFORMATION REGARDING AUTHORIZED PMI BLACKMAXX™ REPAIR FACILITIES. BEFORE DISASSEMBLY OF THE MARKER, REMOVE ALL PAINTBALLS FROM THE MARKER, BARREL AND LOADER; REMOVE POWER SOURCE; AND REMOVE ALL GAS OR AIR FROM THE POWER SYSTEM. INSERT BARREL PLUG AND PUT MECHANICAL SAFETY IN "NO SHOOT" POSITION. SEE FIGURE 3. RULES FOR SAFE HANDLING OF COMPRESSED GAS OR AIR MUST BE FOLLOWED AT ALL TIMES.

PAINTBALL MARKER POWER SYSTEMS MUST BE REPAIRED OR REPLACED WITH THE CORRECT PRESSURE RATED COMPONENTS BY QUALIFIED PERSONNEL.

DO NOT ATTEMPT TO UNLOCK THE ELLIPTICAL LOCK SWITCH WHILE THE PMI BLACKMAXX™ MARKER IS PRESSURIZED WITH GAS OR COMPRESSED AIR.

DO NOT ATTEMPT TO REMOVE THE INTERNAL VALVE BODY FROM THE BLACKMAXX™ PAINTBALL MARKER.

DO NOT ATTEMPT TO ADD AN AFTER MARKET GAS-THRU GRIP OR EXPANSION CHAMBER TO THE FRONT OF THE MARKER.

NEVER EXPOSE THIS OR ANY PAINTBALL MARKER TO PRESSURE SOURCES OR DEVICES THAT MAY EXCEED 1800 PSI.

OVERFILLING OR EXPOSING ANY GAS TANK OR PRESSURIZED PAINTBALL MARKER TO PROLONGED DIRECT SUNLIGHT OR HEAT SOURCE IS UNSAFE AND WILL CAUSE PRESSURE EXCEEDING 1800 PSI WHICH IS UNSAFE AND DANGEROUS.

## TROUBLESHOOTING

### OIL

Before you try anything else make sure you have put several drops of 100% synthetic paintball marker oil on the bolt and hammer rings. A PMI BlackMaxx™ without oil will not work properly.

### AIR LEAK

Leak in pressure source between valve and cylinder	Do not fill cylinder. Immediately take to qualified personnel for inspection. Cylinder must be drained.
Leaks when power system is aired up	Cock marker before powering up system.
Leaks at connection between ASA and tank	Check O-ring at connection on tank or on remote hose connector.
Leaks at connection between braided air hose and fitting	Requires disassembly of air hose assembly for repairs. Contact factory or factory authorized repair center.

### TRIGGER AND SHOOTING

Trigger pulls back, marker will not shoot	Check that the safety lever is forward and the red dot is visible. Check that the marker is cocked, air source is correctly attached and air source is properly filled.
Trigger action does not feel smooth	Check pin at top of trigger near trigger frame. If it catches on the edge of the frame, use center punch to tap pin back into place
Marker runs on (partially cycles more than once)	Check that air source is correctly attached to marker. Check that air source is adequately filled. Check sear for wear. Check hammer O-ring for wear and replace hammer O-ring if needed, using factory O-ring only. Use of other than factory O-ring can cause run on. A hammer O-ring cannot be replaced with a bottle O-ring.

### VELOCITY

Low	Check that air source is adequately filled. Adjust clockwise using velocity adjuster. Remove bolt/hammer assembly and clean it. Clean inside receiver area where bolt/hammer assembly is located and oil bolt and hammer. Change to a stiffer hammer spring.
High	Adjust counterclockwise using velocity adjuster. Change to a less stiff hammer spring.

CHRONOGRAPH THE MARKER AT REGULAR INTERVALS DURING THE DAY, AS WELL AS ANY TIME THE POWER SOURCE IS REFILLED OR CHANGED, ANY TIME THE BARREL OR ANY PART IN THE POWER SYSTEM IS CHANGED, AND UPON REQUEST OF ANY PLAYER OR GAME OFFICIAL. DO NOT EXCEED 300 FPS VELOCITY.

### PAINTBALLS

Not flying straight	Check for oil or broken paint in barrel, loader, feed tube, chamber, and bolt/hammer assembly area. Disassemble and clean.
Break in barrel	Check ball retainer and replace if necessary.
Balls do not drop into feed tube	Shake loader; check loader and feed tube for broken paint.
Two shoot at a time	Check ball retainer and replace if necessary.

- During game play, follow referee's instructions and all field safety rules. Avoid shooting at a player's head, neck, or groin area.
- Play paintball only where the rules of safe paintball play are followed.
- All paintball markers must be chronographed regularly. Adjust marker to shoot paintballs at a velocity less than 300 feet per second (fps) and/or that does not exceed the velocity limit set by the paintball park where the marker is in use. Chronograph the marker at regular intervals during the day, as well as any time the air source is refilled or changed, any time the barrel is changed, and upon request of any player or game official.
- There is always a chance that a paintball is lodged in the barrel of the marker even when it is not visible in the chamber. To check if the marker is unloaded: remove air system and shoot marker in a safe direction. Remove hopper, visually inspect chamber for a paintball, remove and inspect barrel for the presence of a paintball. Never look down the barrel of any paintball marker once the barrel is screwed into the marker.
- Markers with regulators hold pressure even after tank is removed. Shoot marker in a safe direction after tank is removed to de-gas it completely.
- This paintball marker operates using compressed gas or air at specified pressure ranges. Follow safety procedures when handling compressed gas or air. All filling of compressed gas or air cylinders must be done by qualified persons.
- Always cock marker before attaching air or gas source to it. Failure to always cock marker before attaching air to it may cause accidental firing or discharge of paintballs.
- Follow the rules of safe marker handling: Keep finger off trigger until ready to shoot. Keep muzzle pointed in a safe direction. In addition, firmly insert a barrel plug or barrel bag into the muzzle and push the electronic or mechanical safety "on" when the marker is not in use and when in any non-shooting area.

## TROUBLESHOOTING CONT'D

### BARRELS

Barrel comes loose	Check barrel o-ring; firmly tighten barrel.
Aftermarket barrel does not tighten	Check to see that the threads on the barrel match the threading on your stock barrel; if threading is mismatched, barrel is not designed for use with the PMI BlackMaxx™. Figure F.

## WARRANTY

Pursuit Marketing, Inc. (PMI, Inc.), extends a warranty to the original purchaser of the PMI BlackMaxx™ paintball marker that the product is free from defects in materials and workmanship for a period of six months from the date of purchase. PMI, Inc.'s obligation under this warranty shall be limited to repairing or replacing any part of the product which is defective. Service for this replacement or repair will be done free of charge upon delivery of the product to Pursuit Marketing, Inc. (PMI, Inc.), 55 Howard Ave, Des Plaines, IL 60018; accompanied by proof of the date of purchase in the form of a sales receipt or packing slip, customer pays shipping charges. Please call PMI, Inc., at 1.800.579.1633.

### WARRANTY EXCLUSIONS AND LIMITATIONS

This warranty does not apply in the event of misuse or abuse of the product, use of any parts other than original factory parts, or unauthorized repairs, modifications, or alterations, and does not apply to any parts that are made defective by modification, misuse, abuse, or accident. This warranty does not apply to O-rings, cup seals, or springs, or to normal fading of anodized finish, scratches, or other cosmetic wear, or to any items or parts not manufactured by PMI, Inc. PMI has the right to void the warranty on any parts of the BlackMaxx™ that have been tampered with or incorrectly disassembled.

Other than as expressly stated herein, PMI, Inc., does not make any warranties, express or implied, including but not limited to implied warranties of merchantability or fitness, for any purpose other than that for which the PMI BlackMaxx™ was designed. This warranty gives you specific legal rights. You may have other rights which may vary from state to state. PMI, Inc., is not liable for any consequential damages or incidental damages which may arise from the use or operation of the PMI BlackMaxx™ or from any breach of the warranty herein set forth.

### WARRANTY REGISTRATION FORM

Please fill out entirely the enclosed PMI BlackMaxx™ Warranty Registration form and mail it to: Pursuit Marketing, Inc., 55 Howard Ave, Des Plaines, IL 60018 USA.

## REPAIR PROCEDURE

### ORIGINAL SALES PURCHASE RECEIPT OR PACKING SLIP

Save your original sales purchase receipt or packing slip. A copy must accompany the marker when warranty repairs are sought.

PMI, Inc., takes pride in manufacturing high quality paintball products for many years of trouble free enjoyment. Should you experience any difficulty in operating or maintaining this PMI BlackMaxx™ paintball marker, please re-read the owner's manual carefully. If further assistance is needed, contact PMI, Inc., at 1.800.579.1633.

### WARRANTY REPAIR RETURN PROCEDURE

A returned product must be accompanied by a Return Authorization (RA) number; please call PMI, Inc., at 1.800.579.1633 to obtain an RA number before shipping product to PMI, Inc. All warranty returns must be accompanied by a copy of the sales receipt or packing slip, the owner's name, address, and telephone number. Include owner's fax and e-mail if possible. Owner must remove all paintballs and completely drain power system before shipping, and must pack product securely to avoid damage during shipping. Include a brief description of what does not appear to work correctly. Ship to: PMI, Inc., 55 Howard Ave, Des Plaines, IL 60018.

### OUT OF WARRANTY REPAIRS

Should repairs be needed on a PMI BlackMaxx™ that is out of warranty, contact PMI for information regarding authorized PMI BlackMaxx™ repair facilities.

Any PMI BlackMaxx™ marker returned to PMI for out of warranty repairs must be accompanied by an RA number, description of what does not appear to work correctly, and owner's information requested in "Warranty Repair Return Procedure" above. Including sales purchase receipt or packing slip is optional for out of warranty repairs. Please note that there will be a minimum labor charge and may be additional charges for parts to repair an item/product that is not covered by warranty. An estimate of repair cost will be provided to the customer and authorization to complete the repairs will be obtained prior to repairs being done.

- Never shoot at domestic animals or wildlife.
- Never mark objects outside the confines of the game or authorized shooting areas.
- Never look down the barrel of the marker.
- Never aim or shoot a paintball marker (loaded or unloaded) toward any person who is not wearing protective goggles and headgear specifically designed for paintball.
- Before disassembly, storage, or transport of the marker, remove all paintballs from the marker, barrel, and loader; remove air source; and remove all gas or air from the marker. Insert barrel plug and put mechanical safety in "no shoot" position.
- Carry marker in case or sturdy bag when in public.
- Safely and securely store marker to prevent access to it by unauthorized persons.

Safety standards information is available from the American Society for Testing and Materials, 100 Barr Harbor Drive, West Conshohocken, PA 19428-2959; phone 1.610.832.9500; www.astm.org. "Standard Practice for Paintball Field Operation" is publication F1777-97, and "Standard Specification for Eye Protective Devices for Paintball Sports" is publication F1776-97; inquire about additional publications which may be available at the time your request is made.