SHERWOOD

# BLIZZARD MMPRO

OWNER'S MANUAL

## **Blizzard Pro Regulator**

SRB9950





## Thank you for choosing Sherwood Regulators.

To get the most satisfying use of this product, please take time to read this entire manual to understand the use and limitations of the product before you attempt to use it. If you have any questions contact your Authorized Sherwood Scuba Dealer for immediate attention or you may contact us at www.SherwoodScuba.com.

This manual uses standard signal words and symbols to communicate the presence of possible hazards. The definitions of these indicators are as follows.



#### **DANGER**

Indicates a potentially hazardous condition or situation which, if not avoided, could result in serious personal injury or death.



#### WARNING

Indicates a potentially hazardous condition or situation which if not avoided may result in moderate or minor injury. It may also be used to alert against practices that may cause harm or permanent damage to equipment.



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#### PLEASE READ CAREFULLY BEFORE ATTEMPTING TO USE THIS EQUIPMENT



#### DANGER

- 1. Sherwood Scuba equipment is intended for use only by persons trained and certified by a nationally recognized scuba training agency. Diving without the specific training including safe diving practices and within the limits defined by the training agency exposes the user to extremely hazardous situations that could result in serious personal injury or death. This manual is not a substitute for the instruction needed to dive in a safe manner.
- 2. Sherwood regulators must not be serviced by anyone untrained. To perform the correct service or repair procedures, return your equipment to an Authorized Sherwood Dealer. Any time the equipment appears to be performing incorrectly or when recommended service is needed, return your equipment to an Authorized Sherwood Dealer.

Do not attempt to disassemble or modify the equipment. Equipment that is not properly serviced could lead to a malfunction during use with possible serious personal injury or death.

- 3. Nitrox use (Enriched Air Nitrox) Requires specialized training to avoid hazards that could lead to serious personal injury or death. Be certain to read the information in this manual concerning Nitrox use.
- 4. Cold water use Diving in water temperatures less than  $50^{\circ}F$  ( $10^{\circ}C$ ) can impose operational limits affecting the reliable operation of the equipment. Be certain to read the information concerning cold water diving before attempting to use the equipment under such conditions.



#### **ENRICHED AIR NITROX** (EAN)

Sherwood regulators sold outside of the EU are built using oxygen compatible components in a clean environment and can be used for gasses having oxygen content up to 40%.

Sherwood Regulators sold in the EU and intended for use with Nitrox or oxygen must be tested to assure that the components and lubricants are safe for use in 100% oxygen at high pressure and at elevated temperature. This testing is described in EN13949:2003; regulators that have passed this testing ore marked NITROX/02. In the EU, regulators that have passed this testing are supplied with an EN144-3 M26 inlet fitting, marked with its maximum rated working pressure.



### **WARNING**

Oxygen exposure can be toxic and can cause injury or death. Air contains 20.9% oxygen; a gas with more than 22% oxygen is considered to have a high percentage of oxygen and is called NITROX.

Safely diving with Nitrox requires additional specialized training from a recognized and accredited SCUBA training organization. Nitrox has different depth and time limits than air and these limits change with the percentage of oxygen in the Nitrox. Sherwood Nitrox dive computers can help monitor these safety limits.

Much of the information below is provided in compliance with EN13949 and EN1 44-3; this information documents best practices for using gasses with oxygen content above 22%.



Oxygen accelerates combustion. Use of Nitrox or oxygen introduces a risk of a catastrophic fire, the risk increases with the percentage of oxygen in the gas. Special care must be taken to reduce this risk.

- The regulator and all attached accessories must be prepared for use with high percentage oxygen gasses. This preparation involves special cleaning, the use of special oxygen safe components and lubricants.
- Air used in SCUBA diving may contain minute amounts of flammable hydrocarbons that are
  considered safe to breathe. Over time these hydrocarbons may accumulate and represent
  a fire risk if used with Nitrox or oxygen. Specially filtered air is available, called hyperfiltered air. Regulators to be used with Nitrox and oxygen must not be used with normal
  compressed air.
- Regulators used with Nitrox or oxygen must be cleaned at least annually or any time normal compressed air has been used.
- Regulators used with gasses having oxygen content exceeding 41% must be serviced by Sherwood Scuba trained personnel in a facility equipped to oxygen clean and assemble regulators for oxygen use.



#### **INITIAL SET UP**

Your Sherwood regulator provides options for the attachment of accessories such as the submersible pressure gauge or dive computer, the buoyancy compensator inflator air supply and the alternate air source (octo).

Sherwood recommends that you consult your Authorized Sherwood Dealer to install these accessories for you.

#### **BEFORE THE DIVE**

It is important to inspect the regulator before starting your dive trip and again just before you enter the water. The pre-dive check should consist of at least the following steps.

- 1. Carefully inspect all hoses for signs of damage. This may require you to retract the hose protectors at the ends of the hoses to examine the hose condition near the end fittings. If the hose is damaged have your Authorized Sherwood Dealer replace it before you dive.
- 2. Visually inspect the entire regulator for signs of damage. If in doubt ask your Authorized Sherwood Dealer to assist you in performing this examination.
- 3. Connect the regulator to a pressurized cylinder and press the purge button several times to confirm air flow. Take a few test breaths. The effort to breathe should be minimal. If there is an unusual breathing resistance, have your regulator checked by a professional instructor or by your Authorized Sherwood Dealer before attempting to enter the water.



- 4. Once pressurized do not attempt to reposition the regulator to achieve a different hose orientation. Further, do not attempt to carry the assembly by the hoses or by using the installed regulator as a handle for lifting the cylinder. This may damage components and compromise your dive.
- 5. The Sherwood Blizzard Pro provides the user with a switch for Pre-Dive (or on the surface) and Dive. When the switch is rotated clockwise toward the mouthpiece of the second stage, the regulator is in the Dive Mode. This is indicated on the switch with a "D". When the switch is rotated counterclockwise away from the mouthpiece of the second stage, the regulator is in Pre-Dive Mode. This is indicated on the switch with a "P". When the switch is in the Pre-Dive Mode the regulator will be more stable when the second stage is unattended. When the user is breathing the switch should be in Dive Mode.



#### DANGER DIVING WITH THE REGULATOR

You must be aware of and observe special measures for diving in cold water at temperatures below 50°F (10°C) in order to minimize the risk of regulator freezing. Training must include emergency measures for dealing with regulator free flow. Failure to obtain the necessary training and mastery of the skills needed before diving in cold water could lead to hazardous conditions with possibility of serious personal injury or death.



Your Sherwood regulator has been designed to provide an ample air supply with minimal resistance. This should provide you with many hours of comfortable diving. However, if you feel the breathing for any reason is labored or distressing do not continue to dive. Have the regulator evaluated by your Authorized Sherwood Dealer before continuing to dive with it. The initial opening effort required to start air flow with inhalation is intentionally set low to provide you with effortless breathing. You may also unintentionally start air flow if you impact the second stage upon entry or suddenly remove the regulator from your mouth during inhalation. Sometimes this will cause the regulator to continue to flow. If this occurs, simply cover the mouthpiece opening with your thumb or replace the regulator in your mouth. The flow should stop. If it does not, then you must terminate the dive and have the regulator examined.

#### AFTER THE DIVE

The best time to clean your regulator is as soon as possible after concluding diving activity for the day. Delayed rinsing of the equipment increases the opportunity for corrosion or deposits to form which eventually may degrade performance of the regulator.

If possible, you should rinse the regulator while it is still pressurized. This minimizes opportunities for contaminants to reach interior passages of the regulator.

If you are not able to leave the unit pressurized for rinsing, then be certain to replace the first stage inlet protector (Dust Cap) before rinsing. During the rinsing process do not depress the second stage purge as this will open the demand valve and provide an opportunity for contaminants to enter the valve sealing area. Dry the regulator before long term storage.



#### **STORAGE**

Once the regulator is dry, store the regulator in a container that will minimize exposure to dirt, chemicals, or ultraviolet light. Storage near electrical equipment such as motors, computers and other appliances exposes the regulator to ozone which can prematurely deteriorate certain seals and rubber parts.

#### **DEALER SERVICE**

It is strongly recommended that the regulator be inspected by an Authorized Sherwood Dealer at minimum annually or anytime you suspect that performance has decreased or damage may be present. This could reveal an issue that can be resolved before reaching a dive destination.

It is also recommended that your regulator receive a factory recommended service overhaul every other year or after 300 hours of use, whichever comes first. Your regulator may need service sooner depending on the severity of the environmental conditions or level of user care and cleaning.

With each service your Authorized Sherwood Dealer is required to register the service at www.SherwoodScuba.com. Ask your dealer to print a copy of the service registration to keep as a record of your service.

If the regulator is used for rental or training purposes, it will require complete overhaul and factory prescribed service every *three to six months*. Chlorinated swimming pool water is an especially damaging environment for SCUBA equipment, due to the high levels of chlorine and pH balancing chemicals that cause certain components to rapidly deteriorate.



#### LIMITED LIFETIME WARRANTY

In order to use this warranty, you must provide proof of purchase from an Authorized Sherwood Dealer. Save your receipts as proof of purchase. If you are unsure as to whether a dealer is authorized, contact us at www.SherwoodScuba.com for verification.

Sherwood Scuba warrants that the Sherwood regulator purchased from Authorized Sherwood Scuba Dealers shall be free of defects in workmanship and materials for the lifetime of the regulator to the original purchaser.

Under this warranty Sherwood will either repair or replace, at its sole option, any original parts that fail to perform as intended. This warranty excludes products subject to abuse, neglect, alterations or improper unauthorized service. Warranty also excludes parts subject to wear such as hoses, mouthpieces, seals and metal parts with mild corrosion from exposure to seawater.

Under this warranty plan Sherwood will replace warranted parts but the labor to replace parts is excluded and the responsibility of the owner. To maintain your Parts Warranty please have your Authorized Dealer register each Inspection and Service at www.SherwoodScuba.com.

#### PRODUCT REGISTRATION

Please register your regulator at www.SherwoodScuba.com.



#### RESTRICTIONS

- 1. This warranty does not cover normal wear. Factory prescribed service by an Authorized Sherwood Dealer is required at minimum annually.
- 2. This warranty does not extend to damages caused by improper use, improper maintenance, neglect, unauthorized repairs, modifications, accidents, fire or casualty.
- 3. Cosmetic damage, such as scratches, dents, and nicks are not covered by this warranty.
- 4. This warranty does not extend to equipment used for rental, commercial, or military purposes.
- 5. This warranty covers products purchased in the United States and Canada. For warranties that may apply elsewhere, please contact your local representative.
- 6. Failure to meet any of the above requirements will render the warranty null and void.

#### RETURNING YOUR REGULATOR FOR SERVICE

Whenever your regulator requires annual service or warranty repair, Sherwood requires that you bring it or send it to your nearest Authorized Sherwood Dealer.

If you need to return products covered by this warranty, please provide your dealer with photocopies of your original sales receipt, and ask them to print a copy of the service records that are maintained at www.SherwoodScuba.com.

#### CE INFORMATION

ISO9001:2008, the CE mark, EN250 A:2014, EN 13949:2003, EN 144-3, EN 12021 -what it all means.

Many products sold in the European Union (EU) are required to be certified under Article 10 to meet standards meeting the Basic Health and Safety Requirements of the European Personal Protective Equipment Directive 89/686/EEC. In addition, the manufacturing company must be certified under Article 11 of the Directive. Article 11B certification uses a quality management system approach which includes many of the clauses of ISO 9001.

All products sold by **SHERWOOD** in the EU meet these requirements. **SHERWOOD** works with an accredited agency, called a Notified Body, named SGS United Kingdom Limited. SGS audits our manufacturing processes and witnesses testing to the requirements of the standards and inspects product documentation and marking to assure full compliance with the standards.

So, it is with considerable pride that we say: EC Type examination conducted by: SGS United Kingdom Ltd, Weston - super- Mare, BS22 6WA, UK, Notified Body No. 0120.

EN250 A:2014 is the standard describing certain minimum performance requirements for SCUBA regulators sold in the EU. EN250 A:2014 testing is performed with air to a maximum depth of  $165 \, \text{FSW} \, \text{I} \, 50 \, \text{MSW}$ .

Components of Self Contained Underwater Breathing Apparatus as defined by EN250 A:2014 are:

- Cylinder(s) with cylinder valve(s);
- Demand regulator;
- Pressure indicator;
- Facepiece;
- Carrying system.

- · Auxiliary breathing system;
- Lifting harness:
- Depth/time measuring device;
- Additional safety device(s);
- Voice communication system.

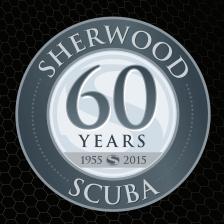
Scuba configured for use by more than one diver at the same time, an auxiliary breathing system, shall not be used deeper than 30 meters and in water temperatures colder than 4°C if marked "FN250 A" and less than 10°C if marked with "FN250 A >10°C"

EN 13949:2003 is the standard that describes special qualification testing for regulators that are to be used with gasses whose oxygen content is greater than 22%. Regulators that have passed testing are marked NITROX/02.

EN 144-3 describes the M26 regulator inlet fitting and M26 valve that must be used with gasses containing over 22% oxygen sold in the EU. These inlet fittings and valves are marked with the maximum rated working pressure.

EN 12021 is a standard that specifies the allowable contaminates and component gasses that make up compressed air. This standard is the equivalent of the USA Compressed Gas Association's Grade E air. Both standards allow very small amounts of contaminants that are not harmful to breathe, but can cause a problem if present in systems using gasses with a high percentage of oxygen.

SHERWOOD regulators are CE certified to a maximum operating depth of 50 M (165 FT).



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