

IMPERTECH
BY SUPERGUM



Impertech is a leading manufacturer of CBRN protective solutions including an innovative range of professional gas masks and respirators for different sectors. Our personal protective equipment (PPE) is relied upon by the defence & military sector, in many hazardous work environments, and by medical teams and first responders

OUR STRENGTHS

Ingenious R&D team and success-oriented shop floor

Our R&D team include engineers who specialize in materials, chemical, mechanical and aeronautical engineering. Our dynamic shop floor is always in change and evolution, as machines and assembly lines are constructed within days to supply the requested products and meet our clients' needs.

Global reach

Our clients include armies, defence departments and special combat units from all corners of the globe. Our logistic facilities in north america and europe help us meet strict delivery demands.

- **Over then 3 decades supplying CBRN equipment for the Israeli defense force, the US government and military and health institutions worldwide.**
- **Our products are protecting millions of civilians in Israel and worldwide.**
- **All our products meet international regulation and standards**
- **All our products are modular and can be tailored according to preferences and regulation needs**
- **Order directly from the manufacturer**

BE STRONG. BE BOLD. BE SAFE

Impertech is a leading manufacturer of CBRN protective solutions including an innovative range of professional gas masks and respirators for different sectors. Our personal protective equipment (PPE) is relied upon by the defence & military sector, in many hazardous work environments, and by medical teams and first responders

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Committed to quality

OUR FIELDS OF EXPERTISE

Military CBRN equipment

Impertech LTD. has been producing and supplying CBRN kits for over then 3 decades to the IDF Israeli army and other armies worldwide. These CBRN military kits are exclusively sold to selected militaries and exclusive defense forces and meet the most stringent requirements and standards.

The CBRN kit contains high-quality products which help protect individuals working in the military and defense sectors and global communities in times of chemical, biological, and radiological threats.

Civilian CBRN kits

The Survival CBRN Family Kit includes the sapphire CBRN system for parents. The Quartz protective hood for children and infants. The Pet Respiratory protection tent for family pets. All parts of the Super Safe systems in this kit are of the highest level of safety that meets the most stringent military standards.

Medical PPE

Our personal protective equipment (PPE) is relied upon by the defense & military sector, in many hazardous work environments, and by medical teams and other first responders. Since the start of the COVID-19 pandemic, Impertech has set up large-scale production facilities to mass-produce PPE products, including 3-ply surgical face masks and protective suits and hoods with filters and respirators for medical personnel.





Ultimate Safety

- Filtering and respiratory protection from CBRN materials
- 6 harnessing points keep the mask in place, stabilizing it on the head, allowing tighter and safer sealing.
- Advanced and patented panoramic visor system with ballistic + anti-fog + anti-glare + anti-flash visors. Internal optical visors for eye glasses users.

Maximum Comfort

- Modular filter assembly according to your needs: front, left or right side. You can also increase airflow from 2 sides together for even easier breathing and better ventilation.
- Anthropometric: the mask effortlessly fits and seals all facial structures and genders thus making it especially comfortable to wear and remove.
- Light, easy to wear and carry.



All in one multi featured platform

- Mouth-nose cup provides efficient breathing and ventilation without compromising clear vision
- A voice membrane interface allows communication with team members
- Communication system includes inner microphone unit and outgoing connector to communication devices (radio / electronic / cellular / Bluetooth)
- A drinking tube allows for safe refreshment without having to remove the mask
- An exhaust system to drain fluids (sweat and saliva) prevents body fluids from accumulating in the mask.

IM76 can be repaired or upgraded

- * Provided in 3 sizes: S/M/L



Facing the Future

The future of CBRN masks is here: the IM76 is designed to meet challenges and withstand extreme conditions like never before! With its patented panoramic visor, advanced multi feature interface platform and versatile filter attachments, the IM76 is the protection against CBRN threats you need for your fighters facing the future of defense.

Fully Equipped And Provided With Accessories

Tactical visor

Sunlight

Optical visor

• CBRN filter • Breathing tube • 45/90 Liter

Drinking bag

Carrying case

Textile harnessing



Tactical visor



Sunlight



Optical visor



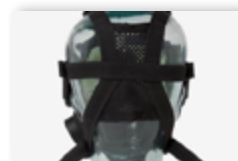
CBRN filter
Breathing tube
45/90 Liter blower



Drinking bag



Carrying case



Textile harnessing



CBRN MILITARY KIT

Impertech-Safety is a reliable producer and efficient supplier of CBRN Military kits to the Israeli Defense Forces and to armies worldwide. Our CBRN military kits are exclusively sold to elite military and defense forces and meet the most stringent requirements and standards.

The CBRN kits contain superior products which help protect individuals working in the military and defense sectors, as well as global communities in times of chemical, biological, and radiological threats.

The Aquamarine Type III Hazmat Suit

is made of durable fabric which offers excellent protection from an extensive range of chemicals. It shields personnel against a variety of toxic industrial organic chemicals, highly concentrated inorganic chemicals, particulates, biohazards and certain chemical warfare agents.

Originally developed for the IDF the Aquamarine Type III Hazmat Suit is also used for a broad range

emergency response, to military and petrochemical applications.

Coming soon - The IM76 is a Versatile and Modular mask for extra safety, comfort, and operational capabilities in various needs and environments.

The attachment of enhanced assistant blower (Onyx-90) supplies air up to 90 liters per minute for improved protection and physiological comfort. The large polycarbonate visor integrated into the hood allows clear optically-correct vision. The Sapphire hood is equipped with an internal mechanism for liquid consumption via drinking straw.

Kit includes the following:

1x Sapphire Military Gas Mask /IM76 Gas Mask

2x New Sealed NBC Filters

Onyx 90 Blower + Battery case + 8 Batteries

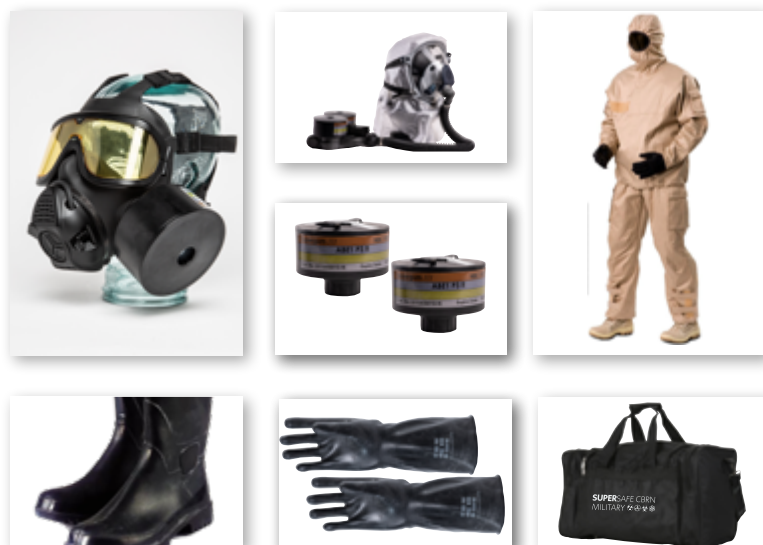
Aquamarine Type III - high performance CBRN suit

Rubber overboots

Butyl rubber gloves

Rugged water resistant black branded bag (fits all items)

Kit can be tailored to your preferences and specifications



Technical and certification standards info for Aquamarine Type III:

Chemical protective clothing, Category III	Type 3-B, 4-B, 5-B and 6-B
Certified according to regulation	(EU) 2016/425
EN 14126 (barrier to infective agents)	EN 1073-2 (protection against radioactive contamination)
Antistatic treatment	(EN 1149-5)
Double closure of zipper and flap closure system for higher protection	
EN 1073-2	Radiation and Contamination
EN 1149-1	Antistatic treatment
EN 13034	Liquid Chemicals
EN 14126 P	Infections Viruses and Bacteria
EN 14605	liquid chemicals
EN 374-1	Dangerous chemicals and micro-organisms

COMPATIBLE WITH INTERNATIONAL STANDARDS



CBRN PROTECTIVE SUIT

for Hot Climates HCS - Saratoga

This two piece suit is customized for the challenging operational conditions in hot and humid environments. The highly air permeable SARATOGA® system minimizes heat stress and maximizes wear time and mission capability maintaining the superior CBRN protective performance.



- Zip to connect jacket and trousers
- Sleeve closure with inner cuffs
- Leg closure with elastic filter fabric

Technical data: SARATOGA® CBRN protective suit for hot climates

Outer shell material

- 100 % Cotton,
- Oil and water repellent
- Flame retardant

Filter material

- Cotton/Polyester woven
- Spherical adsorbers
- Polyamide non-woven

The performance of both the shell and the filter materials has to be controlled thoroughly to ensure the perfect function of the entire material combination. 24 hour protection against 10 g/m² liquid HD, GD, at least six hours of protection against 4,000 mg · min/m³ gaseous HD.

Suit Sizes: S- 3XL in short, regular and long variants

Only SARATOGA® meets the requirement of 30 days of wear time. The suit can be stored in the original packaging for up to ten years and it can be washed up to ten times at 40°C without diminishing the required protective performance. The suit weighs 1.9 kg in size L.



SAPPHIRE PROTECTIVE MASK

Specially made to meet the latest challenges in CBRN, The Adult Sapphire Protective Hood provides superior protection and optimal comfort. Shaped for maximum seal, the hood protects regardless of facial structure or manual dexterity. Designed for individuals aged 13 years and above.

Main Features

Protection

- Protection factor of 10,000 PPM.
- Positive pressure system: an IMP 2005 blower supplies air up to 90 L/minute for improved protection and comfort.

Vision

- Panoramic polycarbonate visor.
- Clear optically correct vision.

User Comfort

- Made of soft silicon laminate, one-size fits all.
- Seals around the neck and is compatible with eye glasses, beards, etc.
- Easy to don and doff, comfortable for prolonged use.
- Nose-cup easily positioned with two diagonal straps fitted with quick release buckles.

Shelf Life

- 15 years in original packaging.

Ideal for

- Police and law enforcement
- First responders
- Medical teams



Sapphire Protective Mask+blower 90 liter

Certifications

Foreign Army Documents:

MIL STD 28 | MIL V 43511C | MIL C 83409

Testing processes:

ASTM D 62 4 | ASTM D 638 | ASTM D 882 | ASTM D 1938
ASTM D 2240 | ASTM D 2261 | ASTM D 2582

Compatible with international standards:

EN 166: 1995 | EN 167: 1995 | EN 168: 1995 | EN - 148- 1
| DIN 53508 | DIN 53512 | DIN 5350 | DIN 53504



THE ONYX-90

90 Liter Per Minute Respirator Blower

Main Features

User Comfort:

- Enhanced assistant blower made of polycarbonate.
- Enhances the comfort of standard rubber masks by making it easy to breath.
- Unlimited freedom of motion: fitted with loops and can be clipped on hip, back or leg.

Protection

- Overpressure within the mask prevents entry of chemical and biological agents.
- Equipped with a monitor lamp so that users can verify its proper operation at all times.
- Supplies approx. 90 liters of air per minute via 2 filters over 8 hrs of continuous operation.
-

Ideal for

- Designed for military forces, HLS, as well as civil uses





THE ONYX-45

45 Liter Per Minute Respirator Blower

Compact, easy to carry, fitted for field conditions. Onyx blowers draw filtered air from NBC filters, supplying it via a flexible hose to the NBC protective hood or mask. Overpressure prevents the entry of chemical and biological agents. Designed for professionals engaged in strenuous activity, like evacuation forces, first responders, and medical personnel.

Main Features

User Comfort:

- Enhanced assistant blower made of polycarbonate.
- Enhances the comfort of standard rubber masks by making it easy to breathe.
- Unlimited freedom of motion: fitted with loops and can be clipped on hip, back or leg.
- Fits all types of personal filter canisters with a standard NATO thread (40mm X 1/7").

Protection

- Overpressure within the mask prevents entry of chemical and biological agents.
- Equipped with a monitor lamp so that users can verify its proper operation at all times.
- Supplies approx. 45 liters of air per minute.

Ideal for

- Designed for evacuation of forces
- Medical personnel
- First responders
- Civil use

Specs

- Weight (including battery): Up to 550 gr.
- Power supply: 1 lithium sulphur/dioxide battery
- Operating voltage: 5.4 volts
- Air flow: 45/min
- Operating time (without replacing batteries): minimum 20 hours



HEMATITE CBRN FILTER

Rigid outer envelope and internal layers provide effective protection against CBRN. The filter structure combines low resistance breathing with high mechanical resistance and excellent shielding properties. Manufactured per specifications of the Israeli Defense Forces and the Ministry of Defense.

Main Features

Connectivity

- Standard thread connectable to protective systems made in accordance with CBRN standards.

Materials

- Construction material - Nuril + 10% GF
- Particulate Filter - HEPA H13

Dimensions

- Height: excluded thread: 63±1 mm
- Include thread: 82±1 mm
- Diameter: 114±1 mm
- Maximum Weight: 270gr

Ideal for

- Police and law enforcement
- Security forces
- Medical teams
- Emergency medical rescue forces
- Hospital and pharmacy staff
- Firefighters
- Production line employees who use masks frequently

EN Standard	EN14378:2004 +A1
Markings	EN143-2000+A1
Thread	EN148-1:1999
CE Approved	CE



NBC HAND & LEG COVERING

Hands & feet protection

Protective Overshoes

- Protective overshoes for type III Aquamarine Respiratory Suit.
- Adjustable lace for easy fitting. Designed for prolonged use by designated NBC forces.
- Manufactured and tested in accordance with Israeli Defense Forces specifications. Protective Overshoes Type I & Type III are available in several sizes.



Protective Boots

- Made of strong butyl rubber.
- Total impermeability to chemical and biological warfare agents for at least six hours.
- A supplement for maximum body protection. Worn instead of shoes. Intended mainly for strenuous work and prolonged walking.
- Designed for stable walking on all surface types.
- Available in several sizes.



Protective Gloves

- Set includes rubber gloves and cotton-fabric gloves.
- Rubber gloves made out of strong, resistant, flexible and especially thin butyl rubber.
- Offer both dexterity and protection.
- Impermeable to chemical and biological warfare agents for at least 6 hours. Manufactured in accordance with U.S.
- Military specification MIL-G-43976.
- Cotton-fabric gloves absorb perspiration and are designed to be worn beneath the rubber gloves.





QUARTZ

Powered Air Purifying Respirator for Infant & Child

The Infant and Child Shield Hood is a unique respiratory protection system, the only respiration system in the world engineered to keep children and infants safe from airborne threats.

The toy-like design appeals to children. The system is manufactured and tested according to the specifications of the Israel Defense Forces and the Ministry of Defense. It has been provided to every newborn in Israel.

Main Features

Protection

- Protection factor of 10,000 PPM.
- Positive pressure system: 45 liter/minute blower supplies three times the amount needed by a child.
- Hood-shaped for maximum seal.

Vision

- Panoramic polycarbonate visor for maximal field of vision.
- Clear optically-correct vision.

User Comfort

- Toy-like design for maximum appeal
- One size fits all: from toddlers to 8-13 years-old children.
- Easy to don and doff.
- Comfortable for prolonged use.
- Internal drinking mechanism: allows baby formula feeding and liquid consumption via straw.

Shelf Life

- Shelf life of 15 years in RT conditions.



Certifications

Foreign Army Documents:

MIL STD 282 | MIL V 43511C | MIL C 83409

Testing processes:

ASTM D 624 | ASTM D 638 | ASTM D 882 | ASTM D 1938
ASTM D 2240 | ASTM D 2261 | ASTM D 2582

Compatible with international standards::

EN 166: 1995 | EN 167: 1995 | EN 168: 1995 | EN - 148- 1 |
DIN 53508 | DIN 53512 | DIN 53505 | DIN 53504



PET RESPIRATORY TENT

Powered Air Purifying Respirator
for Pets

Features

Protection

- Powerful CBRN blower supplying approx.90 liters of air per minutes.
- Overpressure inside the tent prevents entry of contaminants.
- 5.8V lithium batteries with at least 15 hours of continuous operation.
- Tent is connected to a powerful military-type CBRN filter.

Durability

- Tent is made from resilient laminate-230.
- Filter has a sturdy military design and can be reused if not exposed to chemical/radioactive hazards.

User comfort:

Owner

- Easy to store (falls flat).
- Quick to assemble and connect to blower.
- Allows interaction with animals inside.

Pet

- Can contain more than one animal, weighing up to 10 Kg in total.
- 1 entrance with 4 transparent squares.
- Total length 1300 mm.
- Volume of 400 liters.
- Provides 13 air change cycles per hour.
- Comfortable mat of synthetic grass.

Vision

- Made of durable laminate-230 with transparent squares.
- Allows interaction with animals inside.

Special features

- 90 liters



* Warning - the products isn't intended for kids.





COMING SOON THE IB-76

The IB76 is a cutting-edge development by Impertech industries, designed to upgrade the primary concerns for every man or woman operating in hazardous chemical environments – better safety and enhanced comfort. With its innovative 3D flexible carrier and harnessing system, the IB76 is designed to adapt itself to body movements and shape. Its compact size can suit every need and activity.

Several harnessing constructions allow mounting in different ways as users can wear it on the back, on the thigh, or on the waists according to convenience or tactical preferences.

Unique features and accessories

Flexible structure

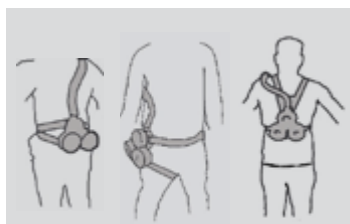
- Flexible 3D design allowing to adjust the blower to every curve, body structure, and the fluid following of body movement, as well as providing shock and impact absorption capabilities.

Ergonomic design

- Ergonomic structure – the weight of the blower is evenly distributed so it's easier to wear and keeps the blower closer to the body and shaking less.
- Removable battery box allowing external charging and the removal of box with empty battery and its replacement with a new box with a full battery.
- Frontal position makes for easier operation and allows new batteries to be easily and safely screwed on.

Compact modular carrier unit

- Three types of straps allow flexibility in wearing the blower for max user comfort – on the back, on the thigh, or on the waist.



Smart hose

- Smart air supply system that includes an integral on and off button located near the air inlet and allowing convenient control over blower's on and off functions.
- Air supply pipe is durable, flexible and long.

Quiet operation

- Patented rubber rings system embeded in the blower's body absorbs impact and allows quiet operation.
-

IB-76 Specifications

- Airflow Up to 120 l/min.
- Rechargeable battery pack providing up to 7 hours of working time in CBRN environment.
- Unique flexible 3d harnessing system.
- All connectors rd40 standard threads.
- Battery and air flow alarm.





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