# A62B

DEVICES, APPARATUS OR METHODS FOR LIFE-SAVING (valves specially adapted for medical use <u>A61M 39/00</u>; life-saving devices, apparatus or methods specially adapted for use in water <u>B63C 9/00</u>; divers' equipment <u>B63C 11/00</u>; specially adopted for use with aircraft, e.g. parachutes, ejector seats, {<u>B64D 17/00</u>, <u>B64D 25/10</u>}; rescue devices peculiar to mining <u>E21F 11/00</u>)

## **Definition statement**

This place covers:

Life-saving devices in the sense of rescuing persons in immediate and physical danger due to possibly harmful surroundings, e.g. fire, toxic gases, falling from heights.

## **Relationships with other classification places**

Life-saving in the medical sense is in A61M

Life-saving for use in water/on sea: B63C 9/00

# References

## Limiting references

This place does not cover:

Medical transport, e.g. stretchers	<u>A61G 1/00</u>
Rescue devices for use in water/on sea	<u>B63C 9/00</u>
Rescue devices specific for mining	E21F 11/00

#### Informative references

Attention is drawn to the following places, which may be of interest for search:

For belay-devices/mountaineering/climbing	<u>A63B 29/02</u>
Safety during construction of buildings(this includes anchors for safety- lines, lifelines and similar)	E04G 21/32

# Synonyms and Keywords

In patent documents, the following abbreviations are often used:

PAPR	Powered Air Purifying Respirator(Filter and Blower)
SC(U)BA	Self-Contained (Underwater) Breathing Apparatus(Breathing apparatus with compressed air, or closed circuit breathing apparatus)

# A62B 1/00

# Devices for lowering persons from buildings or the like

## **Definition statement**

This place covers:

Devices to lower persons from heights, e.g. high-rise buildings.

# **Relationships with other classification places**

Mountaineering : A63B 29/00

Climbing devices for poles, trees or similar: A63B 27/00

#### References

#### Limiting references

This place does not cover:

Emergency escape exits for airplanes (e.g. inflatable chutes)	<u>B64D 25/08</u>
Elevators	<u>B66B</u>
Karabiners / snap-hook devices	F16B 45/02

#### Informative references

Attention is drawn to the following places, which may be of interest for search:

Belay-devices/mountaineering/climbing devices	<u>A63B 29/02</u>
Chutes, slides or similar for amusement	<u>A63G 21/00</u>
Conveying of suspended loads	<u>B65G 9/00</u>
Rope, cable or chain winding mechanisms	<u>B66D 1/00</u>
Brakes for load-lifting or hoisting	<u>B66D 5/00</u>
Anchors for scaffolds	<u>E04G 5/04</u>
Safety nets	E04G 21/3261
Self-acting brakes	<u>F16D 59/00</u>

# **Special rules of classification**

A62B 1/06: also includes rope-lowering devices for mountaineering.

# A62B 3/00

Devices or single parts for facilitating escape from buildings or the like, e.g. protection shields, protection screens; Portable devices for preventing smoke penetrating into distinct parts of buildings (<u>A62B 1/00</u> takes precedence)

#### **Definition statement**

#### This place covers:

Devices to allow persons to find their way out of dangerous situations; e.g. emergency exit signs, cutting implements (e.g. hydraulic scissors), emergency hammers, ropes with feelable indicators towards the next exit.

## References

### Limiting references

This place does not cover:

Devices for lowering persons	<u>A62B 1/00</u>

## Informative references

Attention is drawn to the following places, which may be of interest for search:

Axes	<u>B26B 23/00</u>
Safety belt cutters in vehicles	<u>B60R 22/32</u>
Crowbars or levers	<u>B66F 15/00</u>
Construction of visible, audible or tactile signalling devices (e.g. emergency exit signs)	<u>G08B</u>

# **Special rules of classification**

<u>A62B 3/005</u>: Devices forcing an action, e.g. cutting implements, emergency hammers.

# A62B 5/00

# Other devices for rescuing from fire (ladders E06C)

## References

#### Informative references

Attention is drawn to the following places, which may be of interest for search:

Working platforms suspended from booms	<u>B66F 11/044</u>
Ladders in general	<u>E06C</u>
Platforms for use on ladders; liftable and lowerable platforms	E06C 7/00

# A62B 7/00

# Respiratory apparatus (for medical purposes A61M 16/00)

#### **Definition statement**

This place covers:

Breathing devices used in emergency cases, where breathing is otherwise not possible or potentially dangerous.

# **Relationships with other classification places**

Breathing devices for medical purposes: A61M 16/00

# References

#### **Limiting references**

Devices for storing, carrying or holding respiratory apparatus	A62B 25/00
--	------------

Breathing devices for medical purposes	<u>A61M 16/00</u>
Breathing devices for divers	B63C 11/12, B63C 11/18

# Informative references

Attention is drawn to the following places, which may be of interest for search:

Breathing masks and helmets	<u>A62B 18/00</u>
Filters for breathing-protection purposes	<u>A62B 23/00</u>
Filtering face masks	<u>A62B 23/025,</u> A41D 13/11
Air-treatment apparatus for aircraft crew or passengers	<u>B64D 13/00</u>

# A62B 9/00

Component parts for respiratory or breathing apparatus (<u>A62B 19/00</u>, <u>A62B 21/00</u>, <u>A62B 23/00</u> take precedence)

## **Definition statement**

This place covers:

Elements used for respiratory or breathing apparatuses not provided for elsewhere, e.g. valves, breathing demand regulators, couplings, supporting frames for breathing apparatus (e.g. backpacks.)

### **Relationships with other classification places**

Cartridges with absorbing substances (e.g. active carbon): A62B 19/00

Devices for producing oxygen by a chemical reaction: A62B 21/00

Filters: A62B 23/00

#### References

#### **Limiting references**

This place does not cover:

Cartridges with absorbing substances for respiratory apparatus	<u>A62B 19/00</u>
Devices producing oxygen from chemical substances for respiratory apparatus	<u>A62B 21/00</u>
Filters for breathing protection purposes	<u>A62B 23/00</u>
Breathing devices for medical purposes	<u>A61M 16/00</u>
Valves for use in medical breathing devices	<u>A61M 16/20</u>
Breathing devices for divers	B63C 11/12, B63C 11/18
Breathing demand valves for divers	B63C 11/22

## Informative references

Breathing masks and helmets	<u>A62B 18/00</u>
Valves in breathing masks or helmets	<u>A62B 18/10</u>

Filters for breathing-protection purposes	<u>A62B 23/00</u>
Valves in general	<u>F16K</u>

# A62B 11/00

Devices for reconditioning breathing air in sealed rooms (chemical purification, disinfection, or sterilisation of air <u>A61L</u>; in aircraft or submarines, insofar as they influence the construction of the vehicle or are influenced by its construction <u>B63B</u>, <u>B64D</u>, respectively; air-conditioning in general <u>F24F</u>)

# **Definition statement**

#### This place covers:

Devices for reconditioning breathing air in sealed rooms, e.g. air-raid shelters, high-security rooms, by filtering and reconditioning the air in the room (no outside air, no compressed air).

# References

#### Limiting references

This place does not cover:

Chemical purification, disinfection, or sterilisation of air	<u>A61L</u>
In aircraft or submarines, insofar as they influence the construction of the vehicle or are influenced by its construction	<u>B63B, B64D</u>
Air conditioning in general	<u>F24F</u>

# A62B 13/00

# Special devices for ventilating gasproof shelters (ventilating in general F24F)

# **Definition statement**

#### This place covers:

Special devices for ventilating gasproof shelters, e.g. air-raid shelters with provisions to filter chemical and/or biological and/or nuclear contaminants from outside air before delivering this air to the inside of the shelter (specifically if including provisions to protect the inside of the shelter agains shockwaves from explosions).

#### References

#### Limiting references

Ventilating in general	<u>F24F</u>
------------------------	-------------

# A62B 15/00

Installations affording protection against poisonous or injurious substances, e.g. with separate breathing apparatus ({preventing escape of dirt or fumes from the area where they are produced B08B 15/00}; building aspects E04H 9/00 {; use of air currents for screening F24F 9/00})

# **Definition statement**

This place covers:

Installed devices necessary to protect against poisonous or injurious substances.

#### References

#### Limiting references

This place does not cover:

Containers or portable cabins for affording breathing protection	<u>A62B 31/00</u>
Preventing escape of dirt or fumes from the area where they are produced	<u>B08B 15/00</u>
Building aspects	<u>E04H 9/00</u>
Use of air currents in for screening	<u>F24F 9/00</u>

# A62B 17/00

Protective clothing affording protection against heat or harmful chemical agents or for use at high altitudes (protective clothing or garments for work or sport A41D 13/00; {e.g. overalls A41D 13/02, surgical gowns A41D 13/12; materials for protecting clothing A41D 31/04}; protecting eyes or ears A61F 9/00; composition of materials for protective clothing A62D 5/00; life-saving garments for use at sea B63C; diving suits B63C 11/02; flight suits B64D 10/00; space suits B64G 6/00; bullet-proof clothing F41H 1/02)

#### **Definition statement**

#### This place covers:

Clothing which protects against high or low temperatures, this concerns especially adaptations to clothing which improve the suitability to use this clothing in certain circumstances, e.g. joint construction to improve flexibility while maintaining full protection, sealings of clothing to ensure air-tightness between the clothing and the wearer.

#### References

#### Limiting references

Protective clothing for work or sport	<u>A41D 13/00</u>
Clothing combined with harnesses	<u>A41D 13/0007</u>
Overalls	A41D 13/02
Surgical gowns	<u>A41D 13/12</u>
Materials for protecting clothing	A41D 31/04

Protection of eyes and ears	A61F 9/00
Composition of materials for protective clothing	<u>A62D 5/00</u>
Life-saving garments for use at sea	<u>B63C</u>
Diving suits	<u>B63C 11/02</u>
Flight suits, anti-g suits	<u>B64D 10/00</u>
Space suits	<u>B64G 6/00</u>
Bullet-proof clothing	<u>F41H 1/02</u>

# Informative references

Attention is drawn to the following places, which may be of interest for search:

Half-masks which are made out of filter-material	<u>A62B 23/025</u>
Clothing with controlled internal environment	<u>A41D 13/002</u>
Selection of materials for outerwear	<u>A41D 31/00</u>
Details of garments, e.g. closures, seams	<u>A41D 2300/30</u>
Headwear, hoods	<u>A42B</u>
Clothing for nuclear engineering	<u>G21F 3/02</u>

# A62B 18/00

Breathing masks or helmets, e.g. affording protection against chemical agents or for use at high altitudes {or incorporating a pump or compressor for reducing the inhalation effort} (<u>A62B 17/00</u> takes precedence; anaesthetic masks <u>A61M 16/06</u>)

# **Definition statement**

This place covers:

Breathing masks or helmets where the construction of the mask or helmet is concerned.

# References

#### **Limiting references**

This place does not cover:

Respiratory apparatus for aircraft	<u>A62B 7/14</u>
Protective clothing	<u>A62B 17/00</u>
Storing devices for breathing masks or helmets	<u>A62B 25/00</u>
Testing respiratory or breathing devices	<u>A62B 27/00</u>
Anaesthetic masks	<u>A61M 16/06</u>

# Informative references

Helmets with ventilation	<u>A42B 3/28</u>
Fastening of respirators or breathing masks to helmets	<u>A42B 3/288</u>

# A62B 19/00

# Cartridges with absorbing substances for respiratory apparatus {(carbon dioxide absorbing devices <u>A61M 16/22</u>)}

# **Definition statement**

This place covers:

the mechanical construction of cartridges with absorbing substances.

## References

#### **Limiting references**

This place does not cover:

Filters for breathing protection purposes	<u>A62B 23/00</u>
Carbon dioxide absorbing devices	<u>A61M 16/22</u>
Chemical composition of absorbing substances	<u>B01D 53/00</u>

# A62B 21/00

# Devices for producing oxygen from chemical substances for respiratory apparatus

# **Definition statement**

#### This place covers:

Devices producing oxygen for respiratory apparatus from chemical substances where the construction of the device or the relationship with the breathing apparatus is concerned. E.g. the construction of the housing of "candles" burning chemicals to produce oxygen which is fed to breathing apparatus in regard to form, thermal optimisation (shedding of heat without endangering the user).

# References

#### **Limiting references**

This place does not cover:

Filters for breathing protection purposes	<u>A62B 23/00</u>
Carbon dioxide absorbing devices	<u>A61M 16/22</u>
Chemical composition of absorbing substances	<u>B01D 53/00</u>

# A62B 23/00

#### Filters for breathing-protection purposes (gas-filters in general **B01D**)

#### **Definition statement**

#### This place covers:

Filters and filtering media used to protect users of breathing apparatus from toxic environments, also masks made out of a filtering material.

# References

# Limiting references

This place does not cover:

Gas filters in general	<u>B01D</u>
Chemical composition of absorbing substances	<u>B01D 53/00</u>

### Informative references

Attention is drawn to the following places, which may be of interest for search:

Face masks of for use in foul atmosphere (protection during work against dust, splashes/liquids, or exterior impact)	<u>A41D 13/11</u>
Filters in breathing apparatus used for medical or therapeutical purposes	<u>A61M 16/105</u>

# **Special rules of classification**

When mask protects against splashes/liquids, dust or exterior impact, classification should be in <u>A41D 13/11</u>.

When filtering or respiratory protection of the mask is relevant, classification should be done in <u>A62B 23/025</u>.

When both kind of protections are specified, both classes should be given.

# A62B 25/00

# Devices for storing {or holding or carrying} respiratory or breathing apparatus

# **Definition statement**

This place covers:

Devices, apparatus or similar to store, hold or carry breathing apparatus.

# References

#### **Limiting references**

This place does not cover:

Carrying harness for divers equipment	<u>B63C 11/02</u>
---------------------------------------	-------------------

#### Informative references

Storage of equipment in airplanes	<u>B64D 11/00</u>
-----------------------------------	-------------------

# A62B 27/00

# Methods or devices for testing respiratory or breathing apparatus {for high altitudes} (apparatus for testing gastightness in general <u>G01M</u>)

## **Definition statement**

This place covers:

Testing of respiratory or breathing apparatus to indicate readiness of use, certification for certain tasks (e.g. high altitudes (meaning in aircraft, for mountain climbing, but not in outer space/vacuum), legal, ergonomic, or other requirements);

Indicating devices to indicate necessary refill/service of the apparatus (e.g. after previous use)

#### References

#### **Limiting references**

This place does not cover:

Apparatus for testing gastightness in general	<u>G01M</u>
"Artificial head" for testing gastightness of masks and helmets	<u>G01M 3/00</u>

# A62B 29/00

Devices, e.g. installations, for rendering harmless or for keeping off harmful chemical agents (respiratory apparatus <u>A62B 7/00</u>; gasproof doors, windows, shutters <u>E06B</u>)

# **Definition statement**

#### This place covers:

Other devices for dealing with chemical agents which are not respiratory apparatus, e.g. devices including substances that eliminate chemical agents

#### References

#### **Limiting references**

Respiratory apparatus	<u>A62B 7/00</u>
Gasproof windows, doors, shutters	<u>E06B</u>
Ventilation in general	<u>F24F</u>

# A62B 31/00

Containers or portable cabins for affording breathing protection with devices for reconditioning the breathing air or for ventilating, {in particular those that are suitable for invalids or small children} (ventilation of gasproof shelters <u>A62B 13/00</u>; protective clothes or coverings <u>A62B 17/00</u>; treatment rooms for medical purposes <u>A61G 10/00</u>)

# **Definition statement**

This place covers:

Mobile shelters (e.g. containers, cabins, tents) including breathing protection apparatus.

## References

#### **Limiting references**

This place does not cover:

Ventilation of gasproof shelters	<u>A62B 13/00</u>
Protective clothing or coverings	<u>A62B 17/00</u>
Treatment rooms for medical purposes	<u>A61G 10/00</u>
Ventilation in general	<u>F24F</u>

# A62B 33/00

Devices for allowing seemingly-dead persons to escape or draw attention; Breathing apparatus for accidentally buried persons

#### **Definition statement**

This place covers:

Devices allowing accidentally buried person to indicate their location (e.g. victims of avalanches, earthquakes.

#### References

#### **Limiting references**

Means for indicating the location of accidentally buried person while mountaineering	<u>A63B 29/021</u>
Devices for in and under water	<u>B63C 9/00</u>
Detection of hidden masses in general	<u>G01V</u>
Distress signalling with visible signals	<u>G08B 5/002</u>

# A62B 35/00

Safety belts or body harnesses; Similar equipment for limiting displacement of the human body, especially in case of sudden changes of motion (buckles <u>A44B 11/00</u>; accessories for children's furniture <u>A47D 15/00</u>; children's seats <u>B60N 2/24</u>; safety belts or body harnesses for land vehicles <u>B60R 22/00</u>; harnesses for parachutes <u>B64D 17/30</u>; harnessing in aircraft <u>B64D 25/06</u>; releasable fastenings <u>F16B</u>)

## **Definition statement**

This place covers:

Devices which keep people safe working at exposed position, e.g. catching devices for workers at heights; this includes lifeline constructions, harnesses, safety belts.

## References

#### **Limiting references**

This place does not cover:

Lowering of persons from heights	<u>A62B 1/00</u>
Hunting stands (shooting stands used for hunting)	A01M 31/02
Buckles	<u>A44B 11/00</u>
Baby-walk harnesses, harnesses to guide children	<u>A47D 13/08</u>
Accessories for childrens furniture	<u>A47D 15/00</u>
Restraining devices for orthopaedic means (attaching a body to e.g. bed, chair,)	<u>A61F 5/37</u>
Children seats	<u>B60N 2/24</u>
Safety seat belts for vehicles	<u>B60R 22/00</u>
Harnesses for parachutes	<u>B64D 17/30</u>
Harnessing in aircraft	<u>B64D 25/06</u>
Fabrics for safety-belts	D03D 1/0005
Safety devices used in combination with a ladder	E06C 7/18
Releasable fastenings	<u>F16B</u>

#### Informative references

Safety devices for window cleaning	<u>A47L 3/00</u>
Harness for surfing	<u>B63H 8/56</u>
Conveying of suspended loads	<u>B65G 9/00</u>
Safety devices used during construction of buildings	E04G 21/32
Karabiners / snap-hook devices	<u>F16B 45/02</u>
Means for fastening cables or ropes to one another or other objects; e.g. tensioning devices	<u>F16G 11/00</u>

# A62B 99/00

# Subject matter not provided for in other groups of this subclass

# References

# Limiting references

This place does not cover:

Medical transport, e.g. stretchers

<u>A61G 1/00</u>