

**SORDIN SUPREME****PRODUCT FEATURES**

Supreme is a hearing protector equipped with electronics for reproducing ambient sound. The sound is reproduced by speakers inside the hearing protector. The sound reproduction is limited to a maximum of 82 dB(A) to prevent damage to hearing. Supreme is part of a range of products developed to improve your working environment or leisure whenever you are exposed to noise. To ensure your complete satisfaction with the product it is important that you read the user's instructions carefully.

**BASIC LINE:**

**Supreme Basic**                      **75300:** Basic model, headband.  
**Supreme Basic AUX**              **75301:** Basic model, headband, audio input.

**PRO LINE:**

**Supreme Pro**                      **75302:** Pro version, headband. For high standards of sound reproduction and comfort.  
**Supreme Pro X**                    **75302-X:** Pro version, headband, waterproof  
**Supreme Pro WW**                **75318:** Pro version, headband, with *Bluetooth®* wireless technology  
**Supreme Pro CC**                **75328:** Pro version, headband, with down lead.  
**Supreme Pro**                      **76302:** Pro version, neckband. For high standards of sound reproduction and comfort.  
**Supreme Pro CC**                **76328:** Pro version, neckband, with down lead.

**Note!** All models might not be available on all markets.

**IMPORTANT INFORMATION ABOUT LEVEL DEPENDENT OPERATION/RETURN GUARANTEE (figure A)**

This hearing protector is equipped with level-dependent function. The above hearing protector is equipped with electronics for reproducing ambient sound. The electronics consists of two externally mounted microphones that pick up the ambient sound (A1). The ambient sound is reproduced inside the hearing protector at a safe level (max. 82 dB(A)). The sound is reproduced in stereo to maintain or improve the sense of direction. This feature is designed for use in environments where it is desirable that ambient sounds can be heard, eg, warning signals, conversation, traffic, etc. If this product does not meet your expectations, please return it without delay to the point of sale and your money will be refunded. **Note!** This guarantee will be invalidated if the product has been in regular use.

**MATERIAL SPECIFICATION**

<b>Manufacturer / Ear-muff-type</b>	<b>Material of the headband cover</b>	<b>Material of the headband</b>	<b>Material of the cushions</b>
MSA Sordin / Supreme Basic 75300	Imitation leather 50%cotton, 20%polyester, 30%polyuretan	Stainless springsteel and plastic	PVC-foil
MSA Sordin / Supreme Basic AUX 75301	Imitation leather 50%cotton, 20%polyester, 30%polyuretan	Stainless springsteel and plastic	PVC-foil
MSA Sordin / Supreme Pro 75302	Leather	Stainless springsteel and plastic	PVC-foil
MSA Sordin / Supreme Pro X 75302-X	Leather or coloured fabric 50% cotton, 50% nylon	Stainless springsteel and plastic	PVC-foil
MSA Sordin / Supreme Pro WW 75318	Leather or coloured fabric 50% cotton, 50% nylon	Stainless springsteel and plastic	PVC-foil

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MSA Sordin / Supreme Pro CC 75328	Leather or coloured fabric 50% cotton, 50% nylon	Stainless springsteel and plastic	PVC-foil
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Manufacturer / Ear-muff-type	Material of the neckband cover	Material of the neckband	Material of the headband net	Material of the cushions
MSA Sordin / Supreme Pro 76302		Stainless springsteel	Cotton	PVC-foil
MSA Sordin / Supreme Pro CC 76328		Stainless springsteel	Cotton	PVC-foil

## USER'S INSTRUCTIONS

### **BASIC LINE: ACTIVATING THE HEARING PROTECTOR/REPLACING BATTERIES (figure B)**

The product must be fitted with 2 standard alkaline batteries 1.5 V AA. The use of rechargeable batteries such as NiMH 1.2 V or NiCd 1.2 V will reduce the operating time. The battery holder is full integrated in the earmuff and does not have any buttons. To change the batteries, follow the instructions below (figure B). Start by pulling the earmuff down as far as it will go (figure F). Remove the cushion by pulling it straight out (figure B). Insert the batteries in the battery holder. Make sure that the (+) and (-) terminals on the batteries are the right way round (figure B1). Refit the insert and press on the cushion. After replacing the batteries it is important to check carefully that the inserts and the cushion are correctly fitted so that noise reduction is not impaired. Turn the cushion so that the bulge is at the bottom.

### **PRO LINE: ACTIVATING THE HEARING PROTECTOR/BATTERY INSTALLATION/REPLACEMENT (figure C)**

The hearing protector requires two standard alkaline 1.5 V AAA/LR03 batteries. Rechargeable batteries, for example NiMH 1.2 V or NiCd 1.2 V, should not be used as they may significantly reduce the operating time of the product. The batteries are protected from moisture and dirt by our unique battery compartment. You can easily install and replace batteries by following the instructions (figure C): Unscrew the battery cover. Insert the first battery with the (-) pole facing inwards. Shake the earmuff lightly so that the battery falls into place inside the earmuff. Then insert the second battery with the (+) pole facing inwards. Refit the battery cover. **Note!** Make sure that the batteries are inserted the right way round to ensure the correct polarity (+/-).

### **FUNCTION KEYS (figure D)**

#### **On and off, (O)**

Press key (O) to activate the electronic functions. To switch off, hold the same key (O) pressed in for 1 second.

#### **Volume adjustment, (+/-)**

Volume of the ambient sound is adjusted by short presses on the volume keys, ie, down (-) or up (+). The volume starts in the mode at which it was switched off. The volume can be adjusted in four steps (Basic Line) or five steps (Pro Line). The output signal from the sound reproduction system of the product will not exceed known risk levels for damage to hearing. Sound via the speakers is limited to maximum 82 dB(A) equivalent sound level.

#### **Battery-saving mode**

This product is provided with a battery economy function to ensure maximum life of the batteries. The function automatically switches off the level dependent mode after 4 hours if no key is activated during this period. To restart, push the key located at the middle of the keypad (O). About 2 minutes before automatic switch-off a tone will be heard as a warning that sound will be switched off. Press any key to delay the switch-off by a further 4 hours.

### **HEADBAND VERSION**

#### **Folding the earmuff (figure E)**

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Extend the headband as far as it will go (fig. E1). Then press the top of the headband to fold the earmuffs together (fig. E2). Make sure that the cushions lie flat against each other and that there are no creases in them (fig. E3). **Note!** Do not store the earmuffs in this positions.

### Use and fit (figure F)

Brush excess hair back and out from beneath the cushions with your hand as much as possible. Be certain that the cushions seal tightly against the head with no interference from objects such as respirator headbands or arms of glasses, in order to obtain the best performance. With the headband over the head, place the ear cups so as to completely enclose the ears. The ear cups may be slipped up or down the headband to adjust for a firm, comfortable fit with the headband over the crown of the head.

This safety requirement is satisfied for the sizes:

	M	L
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### NECKBAND VERSION

#### Use and fit (figure G)

Brush excess hair back and out from beneath the cushions with your hand as much as possible. Be certain that the cushions seal tightly against the head with no interference from objects such as respirator headbands or spectacle frame, in order to obtain the best performance. With the neckband behind the head, place the ear cups so as to completely enclose the ears. Adjust the net over the head so the hearing protector don't fall off. **Note!** Do not pull the net to tight because it will affect the cushions seal, the net shall only hold the hearing protector on place, not pull the hearing protector upwards.

This safety requirement is satisfied for the sizes:

S	M	L
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#### The following supplementary information applies only to Pro Line:

##### Amplification

At the two highest volume stages Sordin 75302, 75302-X, 75318, 75328, 76302 & 76328 amplifies the ambient sound.

##### Battery warning

A tone will be heard when about 40 hours battery life remains. The battery warning will be heard after 10 seconds in connection with starting up the electronics.

#### The following supplementary information applies only to versions 75301, 75302, 75302-X, 75318, 75328, 76302 & 76328

##### Connection

75301, 75302, 75302-X, 75318 & 76302 has one input, 3.5 mm, for connecting an external acoustic source, eg.: communication radio, hunting radio, mobile phone, etc. We recommend that you connect the angled jack plug to the earmuff as this gives the most secure connection and is least obtrusive.

75328 & 76328 have a down lead with a connector to connecting an external acoustic source, e.g.: communication radio, hunting radio, mobile phone, etc.

Refer to the operating instructions for the external audio equipment to ensure that it is correctly connected. The impedance of the Supreme Pro is 32 Ohms. The circuit must not be subjected to a signal greater than 5 volts to prevent permanent damage. The maximum input signal must not exceed

75301: 134 mVrms

75302, 75302-X & 76302: 399 mVrms

75318, 75328 & 76328: 242 mVrms

(rms = root mean square of signal strength) to prevent the sound level through the speakers from exceeding 82 dB(A). **Note!** Please see **Table 1** for more detailed information.

#### The following supplementary information applies only to version 75302-X, 75318 and 75328 with fabric headbandcover:

The headband covers is made in fabric and are detachable and washable. Please see figure H for detachable instructions.

**The following supplementary information applies only to version 75318:**

We have moved one step further into the *Wireless World*. You can now link your mobile phone or communication radio to your hearing protector without cables and hands-free leads that interfere with your work. The range is around 10 metres (33 feet) for interference-free communication (the range is affected by wall construction, road vehicles, vegetation, etc.). Certain features depend on which brand of mobile phone or communication radio you use. We therefore recommend that you read carefully through the user's instructions for your mobile phone or communication radio before using it with the hearing protector. Any equipment you want to use with Supreme WW must be compatible with *Bluetooth*<sup>®</sup> wireless technology (version 1.1 or later), and provide support for one of the *Bluetooth*<sup>®</sup> Headset or Hands-free profiles (up to version 1.00 m).

**TO ACTIVATE THE *BLUETOOTH*<sup>®</sup> SYSTEM**

The first time you use your mobile phone or communication radio with Supreme WW hearing protector you will need to connect the units so that they recognize each other. **Note!** This requires that you have a mobile phone or communication radio equipped with *Bluetooth*<sup>®</sup> technology!

**Connecting your mobile phone and hearing protector:**

Switch on the hearing protector by pressing the key (O) in the middle of the keypad (figure D). Press and hold in the Push-To-Talk (PTT) button (figure I) for 10 seconds until you hear a "dong" tone in the hearing protectors. This sends a signal to all units with *Bluetooth*<sup>®</sup> technology within a distance of 10 metres. Switch on your mobile phone, search the menu and follow your mobile phone instructions on how to search for and receive signals from *Bluetooth*<sup>®</sup> units. When your mobile phone has found "WW Headset", select it and key in the **PIN code 0000**. The "dong" tone should stop and your mobile phone and hearing protector are now connected and ready to use! **Note!** Some mobile phone need that you connect the hearing protector by choosing the hearing protector in your mobile phone after you have complete the pairing process.

**Connecting your communication radio and hearing protector:**

Switch on the hearing protector by pressing the key (O) in the middle of the keypad (figure D). Press and hold in the Push-To-Talk (PTT) button (figure I) for 10 seconds until you hear a "dong" tone in the hearing protector. This sends a signal to all units with *Bluetooth*<sup>®</sup> technology within a distance of 10 metres. Switch on your communication radio and follow your communication radio instructions on how to search for and connect *Bluetooth*<sup>®</sup> units.

**BOOM MICROPHONE (figure J)**

The hearing protector is equipped with an electret microphone on a hinged boom. The microphone is noise compensating, which ensures very good voice perception even in noisy environments. **Note!** It is important that the head of the microphone is positioned close to your mouth, about 2-5 mm from your lips, in order for noise compensation to work well. To prevent interference from wind noise we recommend that the accompanying windshield is used.

**FUNCTION KEYS (figure D)**

**Making a call**

First make sure that the *Bluetooth*<sup>®</sup> function in your mobile phone is switched on. Normally this is indicated by a symbol in the mobile phone display. (Please refer to the user manual for your mobile phone). Call the number with your mobile phone as usual. You will hear the call in the hearing protector speakers and you talk into the microphone attached to the hearing protector. Remember to position the microphone close to your mouth to ensure that the noise compensation works.

**Adjusting the volume during a call**

Adjust the conversation volume by briefly pressing the centre key (O) (figure D). When switched on, the volume starts at the same setting as when it was last switched off. The volume can be adjusted in four steps.

#### **Voice-activated calls**

This feature requires that you have recorded voice-activation commands on your mobile phone. (It is recommended that you record your voice-activation commands using the microphone on the hearing protector.) Press the PTT button (figure I) briefly, wait until your mobile phone answers with a beep tone (this may take a few seconds). Speak your voice command into the microphone. **Note!** Some mobile phones don't send the beep tone when it is time to speak the voice command.

#### **Receiving and ending calls**

When your mobile phone rings you will hear it in the hearing protector. Answer by pressing the PTT button (figure I). You end a call by pressing the same button. A brief tone confirms that the call has ended.

#### **Call divert**

If your mobile phone rings while you are having a conversation, or if you are unable to answer the call, press and hold the PTT button (figure I) for 3 seconds. Two brief beeps will confirm that the call has not been taken. **Note!** The "call divert" feature does not work on all mobile phones. Please refer to the user manual for your mobile phone for more information.

#### **LED LIGHT (figure I)**

Your hearing protector is equipped with a LED light. To activate the LED light press the + and – buttons at the same time, to inactivate the LED light press the + and – buttons at the same time. The LED lights automatically shuts off after some minutes.

**Note!** If your hearing protector is connected to a mobile phone or communication radio with Bluetooth you will hear the sound on your right speaker. If your hearing protector is connected to a mobile phone or communication radio with the 3,5 mm audio input you will hear the sound on your left speaker.

#### **TECHNICAL FACTS ABOUT BLUETOOTH®**

*Bluetooth*® technology operates in the ISM band (Industrial, Scientific, Medical) at 2.45 GHz. The frequency range, 2400–2500 MHz (2.45 GHz), is unlicensed and generally freely available all over the world. The data transfer rate with *Bluetooth*® is around 25 times higher than with a standard 28.8 kb/s modem, and the system is capable of carrying speech in full duplex. Interference from other radio transmitters in the same frequency range is countered by the random and rapid frequency changes of *Bluetooth*® technology (1600 frequency jumps/second).

Range: approx. 10 m/33 feet (0 dBm), Transfer rate: 1Mbit/second, Output: 1mW (0dBm).

The *Bluetooth*® word mark and logos are owned by the *Bluetooth*® SIG, Inc. and any use of such marks are under licence. Other trademarks and trade names are those of their respective owners.

#### **The following supplementary information applies only to versions 75328 & 76328:**

#### **CONNECTION**

The hearing protector is equipped with a down lead and adapter for connection to external communication devices, like communication radios and mobile phones.

#### **BOOM MICROPHONE (figure J)**

The hearing protector is equipped with an electret microphone on a hinged boom. The microphone is noise compensating, which ensures very good voice perception even in noisy environments. **Note!** It is important that the head of the microphone is positioned close to your mouth, about 2-5 mm from your lips, in order for noise compensation to work well. To prevent interference from wind noise we recommend that the windshield, supplied with the product, is used.

## MAINTENANCE

The outside of the muff and the cushion can easily be cleaned with soap and water. Earmuffs and in particular cushions may deteriorate with use and ageing and should be inspected regularly for cracks and leakage. The cushions are filled with foam or gel and are replaceable. Worn or damaged parts are easily replaced (fig B). Use only hygiene kits from the manufacturer, designed for electronics, order number SOR60089 or SOR60092. The hygiene kit should be replaced at least twice a year for standard use to ensure that the noise attenuation performances are maintained. This product may be adversely affected by certain chemical substances. Further information should be sought from the manufacturer.

The user must ensure that the hearing protector:

- fits properly and is adjusted and maintained in compliance with our instructions
- is used all the time in noisy environments
- is inspected regularly to ensure good condition.

If the above recommendations are not adhered to, the protection afforded by the earmuffs can be severely impaired. Moisture may occur inside the hearing protector muffs if used for long periods. To avoid long term effects of moisture on the electronic components it is recommended that the acoustic inserts are regularly removed to allow the muffs to dry, eg, overnight (figure B). When removing the cushion and insert take great care not to touch the electronics board or cables. Changes in position of cables could cause disturbance in the system. Do not subject the hearing protector to rough handling, which can damage the electronics.

**The earmuffs must not be immersed in water!**

## STORAGE

When the hearing protector is not in use, the headband/neckband should not be extended or the cushions compressed. Keep the muffs dry and clean and keep them in normal room temperature. Do not allow the hearing protector to lie in direct sunlight. If the product is to be stored for a longer period it is recommended that the batteries be removed from the battery holder to prevent damage.

**If the above recommendations for the hearing protectors are not adhered to the attenuation values ability could deteriorate considerably.**

## LIMITED TROUBLE SHOOTING/CARE ADVICE

If the electronics cease to function it may be easy to rectify the problem. Please check the following:

- Replace the batteries with new ones.
- Ensure that the batteries are correctly fitted in the hearing protector.
- Ensure that the battery plates make good contact with the batteries.
- Ensure that the battery plates have not become coated with verdigris.
- When the hearing protector is worn for long periods, moisture may build up inside the earmuffs.

To prevent long-term effects of moisture on the electronic components we recommend that the inserts and cushions are removed regularly to allow the inside of the earmuffs to dry out, overnight for example. If these measures do not help, consult the point of sale.

## WARNING!


- When exceeding the specified limits a risk of hearing impairment exists.
- This hearing protector may not be used to restore entertainment.
- These earmuffs reproduce ambient sound electronically. The user must check the function before using the product. If distortion or other fault is detected, follow the instructions for changing and maintenance of the batteries. If this does not help, consult an authorized agent.
- The function can deteriorate in step with discharging of the battery. In normal use, the estimated life of the batteries is about 150 hours (Basic Line) and 600 hours (Pro Line). For version 75318 is the estimated battery life 110 hours (based on one hour talk/ eight hour use)
- The estimated A-weighted sound level inside the muff, with consideration taken to attenuation values (table 2, 3 & 4), shall not exceed 82 dB(A).
- Remember that hearing protectors generally can shut out ambient sound, such as warning shouts, alarms and other important signals. Be therefore extra cautious of your surroundings when wearing hearing protectors.
- The integrated microphones for reproduction of ambient sound increase safety considerably in your daily work. **Note!** It is possible to disconnect the level dependent function, which means that warning signals

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and warning shouts would be much more difficult to hear. To minimize the risk of accidents we therefore recommend that the level dependent function be connected as far as possible.

- The output signal from the level dependent function can exceed the actual external sound level.
- The level dependent function may deteriorate in rain or moist conditions and the user should therefore be aware of the possible deterioration. If deterioration occurs, immediately allow the microphones in the hearing protector to dry (with open muffs for 24 h) until the function is fully restored.
- The fitting of the hygiene covers to the cushions may affect the acoustic performance of the earmuffs.



- The symbol  on the product indicates that this product may not be treated as household waste. Instead it shall be handed over to the applicable collection point for the recycling of electrical and electronic equipment. By ensuring this product is disposed of correctly, you will help prevent potential negative consequences for the environment and human health, which could otherwise be caused by inappropriate waste handling of this product. For more detailed information about recycling of this product, please contact your local council office, your household waste disposal service or the shop where you purchased the product.

### TESTS AND APPROVAL

All products meets the Basic Safety Requirements as laid out in Annex II of the EC Directive 89/686 for CE marking in accordance with EN352-1:2002, EN352-4:2001, EN352-6:2002 & prEN352-8:2003. The products are tested and approved by BGIA, Alte Heerstr., 111, D-53757 St Augustin, Germany (0121) and FIOH, Topeliusgatan 41aA, FI-00250 Helsinki, Finland (0403) Version 75318 is also tested and approved to the relevant requirements of the Headset profile according to *Bluetooth®* Profile Specification version 1.1 and Hands-free profile version 1.00m. The requirements of the EMC directive 89/336/EEC, EN55022 (1998), EN55024(1998) is tested by SEMKO, Sweden and CETECOM, Germany

### ATTENUATION VALUES (table 2, 3 & 4)

The attenuation values of the hearing protectors are tested according to EN 24869-1 (with the electronics switched off) by BGIA and FIOH and the results are noted in the table K, L & M. Explanation:

#### Type of hearing protector

75300	Supreme Basic	Headband	(Table 2&3)
75301	Supreme Basic AUX	Headband	(Table 2&3)
75302	Supreme Pro	Headband	(Table 2&3)
75302-X	Supreme Pro X	Headband	(Table 2&3)
75318	Supreme Pro WW	Headband	(Table 2&3)
75328	Supreme Pro CC	Headband	(Table 2&3)
76302	Supreme Pro	Neckband	(Table 4)
76328	Supreme Pro CC	Neckband	(Table 4)

#### Attenuation value explanation

**F** = Frequencies where attenuation value is measured.

**Mf** = Mean value,

**Sf** = Standard deviation,

**APV (Mf-sf)** = Assumed Protection Value

**H** = High frequency attenuation value (predicted noise level reduction for noise with LC-LA = -2 dB)

**M** = Medium frequency attenuation value (predicted noise level reduction for noise with LC-LA = +2 dB)

**L** = Low frequency attenuation value (predicted noise level reduction for noise with LC-LA = +10 dB)

**SNR** = Single Number Rating (the value which is subtracted from the measured C-weighted sound pressure level, LC, in order to estimate the effective A-weighted sound pressure level inside the ear)

**W** = Gross weight of the hearing protector in gram, not including batteries

### CRITERION LEVELS (table 5) Supreme Basic Line / Supreme Pro Line

Typical values in accordance with EN 352-4:2001, appendix A, with the volume set to maximum. Table 5 key:

H = High frequency sound pressure level (LC-LA = 1.2 dB)

M = Medium frequency sound pressure level (LC-LA = 2 dB)

L = Low frequency sound pressure level (LC-LA = 6 dB)

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### THE FOLLOWING SUPPLEMENTARY INFORMATION APPLIES TO SORDIN SUPREME, ONLY IN USA/CAN:

Tested according to ANSI Specifications, ANSI S3.19-1974

#### Information required by E.P.A:

The level of noise entering a person's ear, when hearing protection is worn as directed, is closely approximated by the difference between the A-weighted environmental level and the NRR. Example: The environmental noise level at the ear is 92 dB(A). The NRR is 23 decibels (dB). The level of noise entering the ear is approximately equal to 69 dB(A).

#### CAUTION:

For noise environments dominated by frequencies below 500 Hz, the C-weighted environmental noise level should be used. Improper fit of this device will reduce its effectiveness in attenuating noise. Although hearing protections can be recommended for protection against harmful effect of impulse noise, the Noise reduction Rating (NRR) is based on the attenuation of continuous noise and may not be an accurate indicator of the protection attainable against impulsive noise, such as gunfire.

<b>Noise Reduction Rating</b>	<b>18</b>	DECIBELS (WHEN USED AS DIRECTED)
THE RANGE OF NOISE REDUCTION RATINGS FOR EXISTING HEARING PROTECTORS IS APPROXIMATELY 0 TO 30. (HIGH NUMBERS DENOTE GREATER EFFECTIVENESS.)		
SORDIN AB - SWEDEN #75302		
From now on, the removal of this label is prohibited.		LABEL REQUIRED BY US EPA REGULATION 40 CFR Part 211, Subpart B

#### ATTENUATION DATA – Supreme Pro #75302

Frequency (Hz)	125	250	500	1000	2000	3150	4000	6300	8000	NRR
Mean (dB)	11,1	16,5	23,1	25,0	29,5	33,9	35,5	38,3	38,7	18
Standard deviation (dB)	2,6	3,0	3,2	2,8	4,1	3,1	3,6	4,0	3,2	

<b>Noise Reduction Rating</b>	<b>18</b>	DECIBELS (WHEN USED AS DIRECTED)
THE RANGE OF NOISE REDUCTION RATINGS FOR EXISTING HEARING PROTECTORS IS APPROXIMATELY 0 TO 30. (HIGH NUMBERS DENOTE GREATER EFFECTIVENESS.)		
SORDIN AB - SWEDEN #75302		
From now on, the removal of this label is prohibited.		LABEL REQUIRED BY US EPA REGULATION 40 CFR Part 211, Subpart B

#### ATTENUATION DATA – Supreme Pro WW #75318

Frequency (Hz)	125	250	500	1000	2000	3150	4000	6300	8000	NRR
Mean (dB)	15,6	19,0	26,4	27,0	27,8	35,1	41,5	43,0	43,8	21
Standard deviation (dB)	3,6	2,2	2,0	2,4	2,3	2,0	4,0	2,1	2,7	

<b>Noise Reduction Rating</b>	<b>18</b>	DECIBELS (WHEN USED AS DIRECTED)
THE RANGE OF NOISE REDUCTION RATINGS FOR EXISTING HEARING PROTECTORS IS APPROXIMATELY 0 TO 30. (HIGH NUMBERS DENOTE GREATER EFFECTIVENESS.)		
SORDIN AB - SWEDEN #75302		
From now on, the removal of this label is prohibited.		LABEL REQUIRED BY US EPA REGULATION 40 CFR Part 211, Subpart B

#### ATTENUATION DATA – Supreme Pro #76302

Frequency (Hz)	125	250	500	1000	2000	3150	4000	6300	8000	NRR
Mean (dB)	14,7	17,2	24,3	23,5	27,3	34,7	38,5	41,5	41,7	19
Standard deviation (dB)	3,7	2,1	2,9	2,5	2,6	2,8	3,7	1,6	2,5	



**THE FOLLOWING SUPPLEMENTARY INFORMATION APPLIES TO SUPREME PRO WW (75318), ONLY IN USA/CAN:**

This device complies with part 15 of the FCC Rules and with RSS-210 of Industry Canada. Operation is subject to the following two conditions: (1) This device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation.

This Class B digital apparatus complies with Canadian ICES-003.

Cet appareil numérique de la classe B est conforme à la norme NMB-003 du Canada.

This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- Reorient or relocate the receiving antenna of the disturbed device.
- Increase the separation between the equipment and receiver.
- Consult the dealer or an experienced radio/TV technician for help.

**Warning:**

Changes or modifications made to this equipment not expressly approved by **MSA Sordin AB** may void the FCC authorization to operate this equipment.

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**Additional information** about the hearing protectors can be found on [www.msa-sordin.com](http://www.msa-sordin.com) or from MSA-SORDIN, Rörläggarvägen 8, SE-331 53 VÄRNAMO, Sweden.

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**Table 1** (Supreme Basic Line / Supreme Pro Line)

Soundpressure level (dB(A))	Signal level (mVrms) 75301	Signal level (mVrms) 75302, 75302-X & 76302	Signal level (mVrms) 75318, 75328 & 76328
76	67	204	127
77	76	229	138
78	84	257	154
79	95	287	176
80	107	322	204
81	119	361	219
<b>82</b>	<b>134</b>	<b>399</b>	<b>242</b>
83	150	449	266
84	169	507	293
85	189	569	335

**Table 2** (Supreme Basic Line/Supreme Pro Line, headband) Hygiene kit SOR60089

F (Hz)	125	250	500	1000	2000	4000	8000
MF (dB)	13,5	15,5	23,7	24,1	30,4	36,6	38,6
Sf (dB)	3,2	1,9	3,9	2,7	3,2	4,4	4,2
APV = Mf-sf (dB)	10,3	13,6	19,8	21,4	27,2	32,2	34,4

H = 28 dB M = 21 dB L = 16 dB SNR = 25 dB

W = 310g

**Table 3** (Supreme Basic Line/Supreme Pro Line, headband) Hygiene kit SOR60091

F (Hz)	125	250	500	1000	2000	4000	8000
MF (dB)							
Sf (dB)							
APV = Mf-sf (dB)							

H = dB M = dB L = dB SNR = dB

W = g

**Table 4** (Supreme Pro Line, neckband) Hygiene kit SOR60089

F (Hz)	125	250	500	1000	2000	4000	8000
MF (dB)							
Sf (dB)							
APV = Mf-sf (dB)							

H = dB M = dB L = dB SNR = dB

W = g

**Table 5** (Supreme Basic Line / Supreme Pro Line)

Kriterienivåer / Kriteeritasot / Kriterieniveauer / Criterion levels /  
Beurteilungspegel / Critères des niveaux / Niveles de criterio :

**Supreme Basic Line** (Headband)

H= 114 dB(A) M= 107 dB(A) L=95 dB(A)

**Supreme Pro** (Headband)

H= 113 dB(A) M= 105 dB(A) L=94 dB(A)

**Supreme Pro X** (Headband)

H= 113 dB(A) M= 105 dB(A) L=94 dB(A)

**Supreme Pro WW** (Headband)

H= 110 dB(A) M= 103 dB(A) L=95 dB(A)

**Supreme Pro CC** (Headband)

H= 110 dB(A) M= 103 dB(A) L=95 dB(A)

**Supreme Pro** (Neckband)

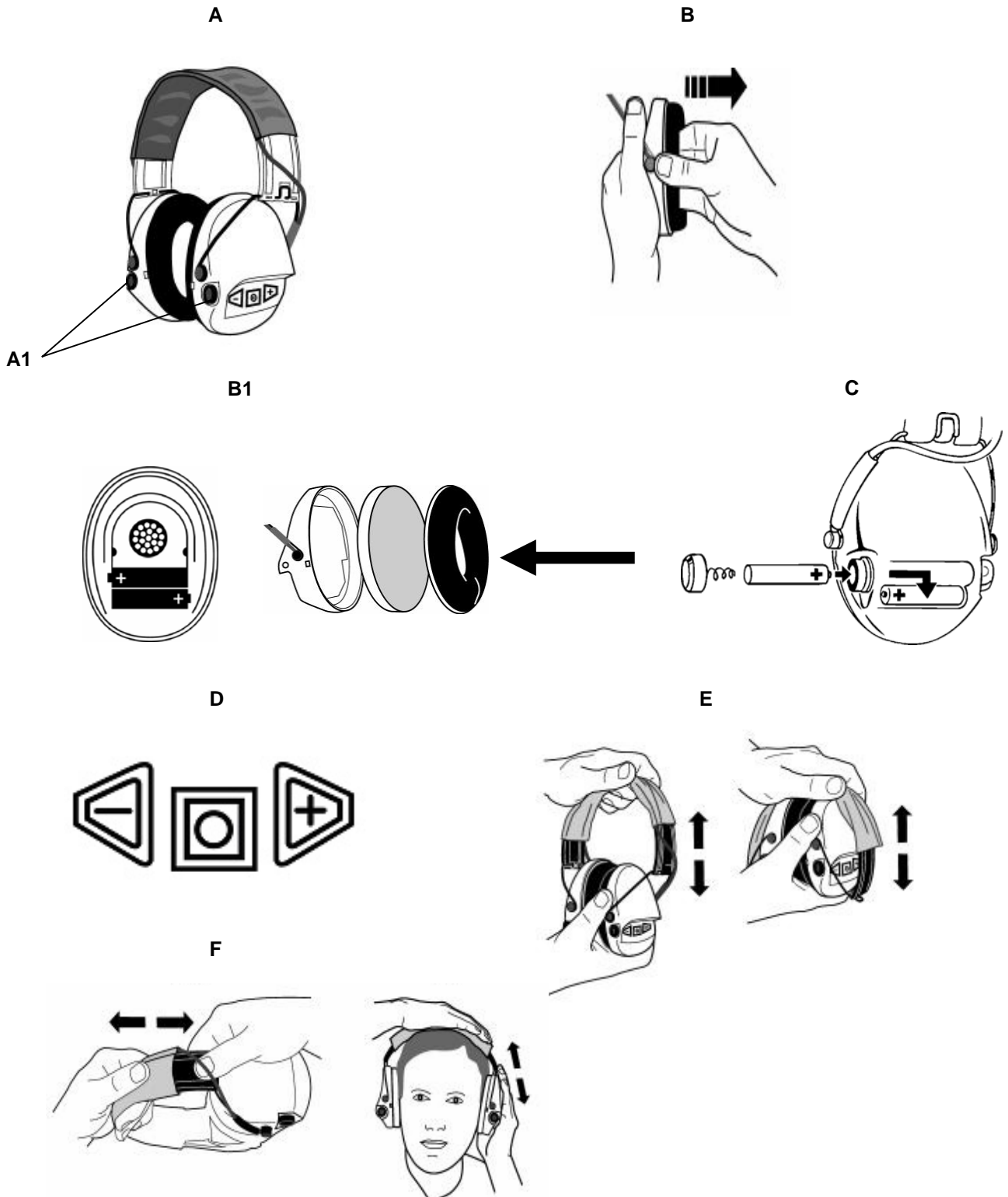
H= X dB(A) M= X dB(A) L=X dB(A)

**Supreme Pro CC** (Neckband)

H= X dB(A) M= X dB(A) L=X dB(A)

Operational Description Wireless World - Supreme

FIGURES



Operational Description Wireless World - Supreme

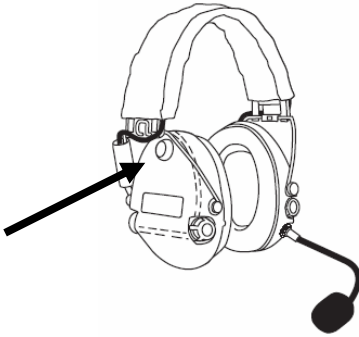
**G**



**H**



**I**



**J**



**K**



**L**

