

3M Personal Safety
3M™ Peltor™ X Series Ear Defenders



A new
Standard
in Design, Comfort &
Protection



The Power to Protect Your World™



DESIGN

- Protected wire head band - building on the successful design of the current 3M™ Peltor™ Optime range
- Light-weight dual moulded cups with maximum space inside to help minimise heat and moisture build-up
- Integrated design for increased robustness
- Colour coded for ease of selection
- Electrically insulated headband
- Easy to clean

COMFORT

- Easy to adjust headband
- Wire headband ensures constant pressure over prolonged wearing periods
- Twin headband design helps reduce heat build-up, provides good fit and balance



PROTECTION

- Streamlined cups without compromising attenuation
- Works well with a range of 3M eyewear and respirators
- New smart sealing ring

A new Standard in Design, Comfort and Protection

Our aim is to reduce the number of noise induced hearing loss cases in the workplace through simple and innovative solutions. The development of the new 3M™ Peltor™ X Series Ear Defenders is our next step to fulfil this ambitious goal. Built on the three key pillars of our product development programme; design, comfort and protection and in collaboration with our customers, the 3M Peltor X Series meet the needs of an extensive range of industrial applications.

In addition to exceptional comfort and modern styling the range is based on ground-breaking attenuation techniques for unparalleled attenuation with a stream-lined design. With our vast experience spanning over 40 years in developing innovative hearing protectors we believe that the 3M Peltor X Series has taken design, comfort and protection to the next level.



3M Hearing Protection Solutions made innovatively easy

The new 3M™ Peltor™ X Series Ear Defenders offer a wide range of attenuation levels designed to meet the needs of the majority of industrial applications.

3M Peltor X1 Ear Defenders (SNR 27dB)
 For protection against light industry noise.
 For example, grounds maintenance or power drilling. (Page 5)



3M Peltor X2 Ear Defenders (SNR 31dB)
 For protection against moderate to high noise levels.
 For example, roadworks or construction. (Page 7)



3M Peltor X3 Ear Defenders (SNR 33dB)
 For protection against high noise levels.
 For example, forestry or heavy engineering. (Page 8)



3M Peltor X4 Ear Defenders (SNR 33dB with a slim cup)
 For protection against high noise levels, whilst maintaining a sleek, low profile, aesthetically pleasing design.
 (Page 9)



3M Peltor X5 Ear Defenders (SNR 37dB)
 For protection against extremely high noise levels.
 For example, airports, quarrying or paper mills. (Page 11)



Care & Maintenance

To help you protect your investment and keep your ear defenders in clean working order, a full range of hygiene kits are available.

HYX1	Hygiene Kit for 3M Peltor X1 Ear Defenders
HYX2	Hygiene Kit for 3M Peltor X2 Ear Defenders
HYX3	Hygiene Kit for 3M Peltor X3 Ear Defenders
HYX4	Hygiene Kit for 3M Peltor X4 Ear Defenders
HYX5	Hygiene Kit for 3M Peltor X5 Ear Defenders



Please visit our website, www.3M.co.uk/peltorx to watch our care & maintenance videos and to learn how to fit and replace a hygiene kit.

Standard attenuation, slim design

3M™ Peltor™ X1 Ear Defenders



- Slim-line cups for moderate attenuation (SNR 27dB) that meets the needs of most industrial applications.
- Lightweight design.
- Simple colour coding: green, indicating the first level of attenuation within this range.



“The new range, 3M Peltor X, are nice and soft to wear”

Bo Hammar, Steel & Silver AB

3M™ Peltor™ X1A Ear Defenders - Standard headband

Frequency (Hz)	63	125	250	500	1000	2000	4000	8000
Mean Attenuation (dB)	15.6	11.9	15.4	24.5	34.3	32.6	37.4	37.4
Standard Deviation (dB)	3.6	2.0	2.6	2.6	2.3	3.3	2.5	3.8
Assumed Protection (dB)	12.0	9.9	12.8	22.0	31.9	29.5	34.9	33.5

SNR = 27dB H = 32dB M = 24dB L = 16dB



3M™ Peltor™ X1P3 Ear Defenders - Helmet mounted version

Frequency (Hz)	63	125	250	500	1000	2000	4000	8000
Mean Attenuation (dB)	14.7	11.4	15.8	24.5	32.5	32.0	35.6	35.1
Standard Deviation (dB)	3.3	3.7	2.4	2.9	2.9	3.7	2.5	4.9
Assumed Protection (dB)	11.4	7.7	13.4	21.6	29.7	28.3	33.1	30.1

SNR = 26dB H = 30dB M = 23dB L = 15dB



Medium attenuation, slim design

3M™ Peltor™ X2 Ear Defenders



SNR 31dB

- Slim-line cups for moderate to high attenuation (SNR 31dB) that meets the needs of most industrial applications.
- Lightweight design.
- Simple colour coding: yellow, indicating moderate to high attenuation.



3M™ Peltor™ X2A Ear Defenders - Standard headband

Frequency (Hz)	63	125	250	500	1000	2000	4000	8000
Mean Attenuation (dB)	19.0	14.1	22.2	31.1	39.7	36.6	37.0	37.9
Standard Deviation (dB)	4.5	2.2	2.1	2.7	3.2	3.2	3.7	3.4
Assumed Protection (dB)	14.5	11.9	20.1	28.4	36.6	33.5	33.3	34.5

SNR = 31dB H = 34dB M = 29dB L = 20dB



3M™ Peltor™ X2P3 Ear Defenders - Helmet mounted version

Frequency (Hz)	63	125	250	500	1000	2000	4000	8000
Mean Attenuation (dB)	15.9	13.8	20.2	30.0	37.7	35.4	34.9	35.8
Standard Deviation (dB)	4.6	2.8	2.1	3.2	2.6	3.0	3.0	4.7
Assumed Protection (dB)	11.3	11.0	18.1	26.8	35.1	32.4	31.9	31.1

SNR = 30dB H = 33dB M = 28dB L = 19dB

High attenuation, low weight

3M™ Peltor™ X3 Ear Defenders



SNR 33dB

The 3M™ Peltor™ X3 utilises a newly designed spacer to help improve attenuation without the need for a double cup design, thus increasing the space inside the cup for greater comfort and wearability.

- High attenuation (SNR 33dB) from a single cup design, light-weight and slim compared with similarly attenuating products.
- Simple colour coding: red indicating high attenuation.



“3M™ Peltor™ X Series.
Great comfort and most importantly, ideal protection”
Zaid Gabro, Proplate

3M™ Peltor™ X3A Ear Defenders - Standard headband

Frequency (Hz)	63	125	250	500	1000	2000	4000	8000
Mean Attenuation (dB)	21.5	22.8	25.1	27.0	40.0	35.8	38.5	38.9
Standard Deviation (dB)	3.0	2.1	3.1	1.7	2.8	2.2	2.7	2.9
Assumed Protection (dB)	18.4	20.7	22.0	25.4	37.2	33.6	35.8	35.9

SNR = 33dB H = 35dB M = 30dB L = 25dB



3M™ Peltor™ X3P3 Ear Defenders - Helmet mounted version

Frequency (Hz)	63	125	250	500	1000	2000	4000	8000
Mean Attenuation (dB)	18.9	20.0	24.2	27.4	40.1	36.0	39.7	37.0
Standard Deviation (dB)	3.3	2.8	1.7	2.1	3.0	3.0	3.5	3.7
Assumed Protection (dB)	15.6	17.2	22.6	25.3	37.1	33.1	36.2	33.3

SNR = 32dB H = 34dB M = 30dB L = 24dB

Extremely slim, high performance

3M™ Peltor™ X4 Ear Defenders



Historically, higher attenuating ear defenders meant large and bulky cups - but not anymore. The 3M Peltor X4 Ear Defenders can attenuate sound by as much as 33dB whilst maintaining a sleek, low profile, aesthetically pleasing design.

- Extremely slim and light-weight cups help to improve compatibility when used with other Personal Protective Equipment.
- New specially formulated damping pads and innovative foam contained in the sealing ring provide excellent acoustic protection, particularly against sounds dominated by low frequencies.
- Simple colour coding: bright green, indicating high attenuation combined with an extremely slim, lightweight design



3M™ Peltor™ X4A Ear Defenders - Standard headband

Frequency (Hz)	63	125	250	500	1000	2000	4000	8000
Mean Attenuation (dB)	19.6	17.8	22.1	30.6	39.5	37.3	43.8	42.1
Standard Deviation (dB)	4.1	2.3	2.5	1.8	2.9	4.1	2.8	4.0
Assumed Protection (dB)	15.5	15.5	19.6	28.8	36.6	33.2	41.1	38.2

SNR = 33dB H = 36dB M = 30dB L = 22dB



3M™ Peltor™ X4P3 Ear Defenders - Helmet mounted version

Frequency (Hz)	63	125	250	500	1000	2000	4000	8000
Mean Attenuation (dB)	16.6	16.8	21.8	30.6	40.1	36.7	43.1	41.9
Standard Deviation (dB)	3.6	2.5	2.1	1.9	2.3	3.7	2.7	4.7
Assumed Protection (dB)	12.9	14.3	19.7	28.7	37.8	32.9	40.4	37.2

SNR = 32dB H = 36dB M = 30dB L = 21dB



Unparalleled attenuation without the need for double protection involving ear defenders and ear plugs.

3M™ Peltor™ X5 Ear Defenders



SNR 37dB

- Unparalleled attenuation (SNR 37dB) as a result of an optimum combination of specially formulated foam technology and a newly designed spacer and cup.
- Despite the larger cups the product remains relatively lightweight with excellent balance and wearer comfort.
- Simple colour coding: black, for extremely high attenuation in demanding environments.



“ I don't care about specific brands, I just want the best. The best?

It's 3M™ Peltor™! ”

Magnus Forsblom, Astra Zeneca

3M™ Peltor™ X5A Ear Defenders - Standard headband

Frequency (Hz)	63	125	250	500	1000	2000	4000	8000
Mean Attenuation (dB)	23.0	22.3	28.8	39.7	44.2	39.8	43.0	40.2
Standard Deviation (dB)	3.1	2.4	2.4	2.7	3.4	4.6	2.8	2.9
Assumed Protection (dB)	19.8	19.9	26.4	37.0	40.9	35.2	40.2	37.3

SNR = 37dB H = 37dB M = 35dB L = 27dB



3M™ Peltor™ X5P3 Ear Defenders - Helmet mounted version

Frequency (Hz)	63	125	250	500	1000	2000	4000	8000
Mean Attenuation (dB)	20.4	22.0	26.9	38.2	43.5	38.7	41.0	40.4
Standard Deviation (dB)	3.3	3.1	2.2	2.8	3.4	4.5	2.5	3.3
Assumed Protection (dB)	17.1	18.9	24.7	35.4	40.2	34.2	38.5	37.2

SNR = 36dB H = 36dB M = 34dB L = 26dB

Hearing Protection Solutions made Innovatively Easy



1 detection

3M is harnessing a chain reaction of new ideas that deliver innovatively easy solutions to complex hearing protection challenges.

Detecting and monitoring noise exposures as an integral part of risk assessment in your work environment is the first step in protecting your workers. For larger organisations 3M can offer a free noise check service or alternatively we can support you in the use of our range of reliable and flexible instrumentation.



2 protection

Select appropriate hearing protectors that employees are motivated to wear. 3M has a broad selection of hearing protectors for a wide range of environments.



3 education

3M can help to educate, motivate and train safety officers and workers around all aspects of hearing conservation. Please contact us to find out more about our range of training resources and our popular webinar series.



4 validation

The 3M™ E-A-Rfit™ Validation System delivers the science of fit to help build confidence in the level of hearing protection offered to each individual employee.

3M Peltor is a world leader in the field of hearing protectors. Over 40 years of developing and manufacturing hearing protectors has put us at the forefront of safety, comfort, protection and aesthetics. The 3M Peltor hearing protectors are designed with the worker in mind.

Our key aim is to minimise the number of reported cases of noise induced hearing loss in the world. Our stated objective is to develop hearing protectors that are comfortable, wearer acceptable and worn for the entire duration of the noise exposure period. Innovative design, a wide range of attenuation levels together with increased comfort help to make our hearing protectors more acceptable to wearers.



For more information on all our products, call **3M Personal Safety Division** on **0870 60 800 60 (UK)** and **1800 320 500 (Ireland)** or visit www.3M.co.uk/safety

3M

3M Personal Safety Division
3M United Kingdom plc
3M Centre
Cain Road, Bracknell
Berkshire RG12 8HT
Tel: 0870 60 800 60
www.3M.co.uk/safety

3M Ireland Limited
The Iveagh Building
The Park
Carrickmines
Dublin 18
Tel: 1 800 320 500

3M and Peltor are trademarks of 3M company.
Please recycle. Printed in the United Kingdom.
© 3M 2013. All rights reserved.
16702

www.3M.co.uk/peltorx