

Face Fit Testing

Checking that your dust mask offers you maximum protection

If you use respiratory protective equipment (RPE) for protection at work, it must fit your face properly.

If you are exposed to hazardous dusts or fibres, you will usually need the protection of so-called 'tight-fitting' RPE. A common example of tight fitting RPE is a half mask with detachable filters or an 'FFP3' disposable mask. The protection given to you by these masks relies greatly on a good seal to your face.

If you wear tight-fitting RPE at work to protect against high hazard dusts and fibres, notably asbestos and silica, then you will need a 'face fit test' (FFT) to check that the mask is suitable for you. The aim of FFT is to check that you do not select poorly fitting face masks, and that you know how to put on the mask correctly. Since faces vary significantly in size and shape, it is unlikely that one type or size of face mask will fit everyone. Poorly-fitting RPE greatly reduces your protection from airborne hazards, and if you have facial hair in particular it can really undermine your protection from dust and fibres (you should always be clean shaven when wearing any tight-fitting RPE).

Face fit testing must be done by a competent person. *How often you need FFT depends entirely on the prevailing circumstances.* However, if you need FFT, it should be repeated if, for any reason, the shape of your face changes (e.g. you change weight significantly or have any scars or moles around the face seal area) or if you change the make/model/size of mask.

You do not need FFT if a suitable risk assessment for the jobs you do suggests that you do not need the protection of a tight fitting dust mask.

However, if you do need FFT, you should be trained to correctly wear and use the face mask you use before doing the test. Based on a risk assessment of the jobs that you do, you should receive refresher RPE training at regular intervals. This training should cover vital topics such as correct use, cleaning, maintenance and safe storage. There should be specific attention to whether your RPE is providing you with effective protection.

'Qualitative' FFT is most relevant for M&E work

There are two basic types of RPE face fit testing - qualitative and quantitative. Unhelpfully, the names are very similar but M&E contractors normally use qualitative FFT (as it is more simple and cost-effective to conduct). Qualitative testing is suitable for disposable and half masks, also known as filtering face masks (qualitative testing is not suitable for full face masks - a quantitative test must be used for these types of masks).

Any FFT must be carried out by a competent face fit tester, whether it is done in-company, or by an outside tester. It should not be carried out by a member of staff or other worker, for example, who is not properly trained to do it. The qualitative test is a fairly simple pass/fail test. It is based on the wearer's subjective assessment of whether a harmless test substance (e.g. with a strong taste) has leaked in via your face seal. In addition to wearing your dust

mask, you will need to wear a large hood with a clear visor over your head when undergoing the test. A good example of a qualitative FFT method is a bitter or sweet tasting aerosol (for FFP1, FFP2 or FFP3 disposable masks)

Pre-use RPE checks

Face fit testing is not the same thing as your day to day check that your face mask fits well (your 'pre-use fit check'). A pre-use fit check is required each time you wear a face mask - and definitely before entering a hazardous environment - to check that your face mask fits correctly and that face mask valves are working correctly. Your employer and fit test provider should provide you with simple instructions for carrying out a pre-use fit check. Always check that your mask is fitted according to the manufacturer's instructions (e.g. ensure that the straps and strip for moulding your mask around your nose are correctly adjusted, then hold the mask in place, cover the filters and breathe in or out sharply. You should readjust your mask if you detect any leakage around your face or your glasses steam up (if you wear glasses...) when you breathe out.

Remember, this routine daily fit check should not be confused with FFT. You should discard disposable masks at the end of the shift, or sooner if they are heavily contaminated. Never hang up a mask in a dusty place if you aim to use it later on.

Toolbox talks and refresher training

'Toolbox' talks and other verbal communication and consultation with you on RPE issues (including on face fit) can be very useful if the person giving the talk is practically competent. FFT is a type of 'refresher training' for those whose work can disturb asbestos or create silica dust.

Finally, before relying on RPE at all, your employer must properly consider other means of addressing the risks from exposure to hazardous substances – for example, control measures such as good ventilation or dust suppression/capture. The practicalities of the job might mean these other measures are not possible, but they should be properly considered.

***What is a 'protection factor'?**

To help ensure you are protected, your dust mask must be properly 'CE' marked to show that the design has been tested to a recognised Standard (for disposable masks this is **EN149:2001+A1:2009**). Additional markings, such as 'FFP2', indicate the classification of the mask and the 'assigned protection factor' it offers - if the mask is a good fit and you use it correctly. The higher the FFP number - the more protection. FFP1, FFP2 and FFP3 masks can reduce the dust you inhale by factors of 4, 10 and 20 respectively. So if you are wearing a properly-fitting FFP2 mask you may breathe in a tenth of the dust that is in the outside air.

FFP1, FFP2 and FFP3 masks are designed to filter workplace dusts and fibres only. They offer *absolutely no protection whatsoever* against an oxygen-deficient atmosphere or harmful gases or vapours.