

ATEX Directive

Do you meet the requirements?



ATEX Directive

Brief Overview

What is ATEX?



- ATEX (Atmosphères Explosifs) is a set of EU directives concerned with all equipment installed in potentially explosive atmospheres (both gas and dust).
- ATEX harmonises various national technical and legal requirements across Europe to ensure a very high level of safety.
- From 1st July 2003 it's been a mandatory requirement that all products to be used in potentially explosive environments must comply with the EU's ATEX Manufacturer's Directive (94/9/EC).
- Products installed after July 2003 may have to be replaced should they not comply with ATEX requirements.
- ATEX is designed so that both the end-user and the manufacturer each carefully consider their response to the particular problem.
- Non-compliance can lead to heavy fines and even imprisonment!

ATEX is explosive - Act now before it's too late!

Does ATEX affect you?



- The ATEX directive applies across the whole EU and the European Economic Area (EEA).
- The ATEX User Directive (92/92/EC) is directly concerned with the health and safety of workers.
- Employers are legally required to ensure their employees operate in a safe working environment.
- End-users must ensure their facilities comply with the ATEX Directive, and eliminate risk of explosions.



If there is a risk of an explosion then ATEX applies!

ATEX & End-Users



**ATEX puts the onus
of responsibility upon
you!**

- The main responsibilities of the end-user are:
 - Prevent the formation of explosive atmospheres and subsequent ignition
 - Assess the risk of explosion
 - Eliminate or reduce the level of risks
 - Classify the workplace into Zones
 - Prepare an Explosion Protection Document
 - Identify hazardous areas using warning signs
 - Specify suitably safe equipment for use in the zone
- The provision of this essential information allows Fläkt Woods to select your ATEX fans.

ATEX & Hazard Analysis



- Hazard analysis should consider: -
 - Types, properties & quantities of hazardous substances present.
 - Circumstances of work processes and their interactions with the hazardous substances.
 - Interactions of various substances in the atmosphere.
 - The likelihood of an explosion due to these circumstances or through ignition sources.
 - The scale of anticipated effects.
- Employers must take measures to ensure the hazard is minimised.
- Results of the hazard analysis enable end-users to provide Flakt Woods with a specification for suitable equipment based upon:
 - Zone Classification
 - Hazard Category
 - Temperature Class
 - Gas or Dust Group
 - Surface Temperatures

**Effective Hazard Analysis
enables selection of the
optimum fan solution!**

ATEX & Zone Classification



- Hazardous areas are classified into zones on the basis of frequency and duration of an explosive atmosphere: -

Zone		Zone Criteria (frequency / duration of explosive atmosphere)	Equipment Category *	Protection Level
Gases	Dust			
0	20	continually present or present for long periods. (>10,000hrs/annum)	1	Very High
1	21	occasionally likely to occur in normal operation (>10hrs, <10,000hrs/annum)	1, 2	High
2	22	unlikely to occur in normal operation. (<10hrs/annum)	1, 2, 3	Normal

* subject to suitability with gas or dust type present

**Correct zone classification
enables correct fan
selection!**



ATEX Directive

Fläkt Woods Response

ATEX & Fläkt Woods



- Fläkt Woods recognised the importance of the ATEX directive, taking the below steps to maintain high quality service : -
 - Fläkt Woods undertook an extensive engineering programme to ensure all Fläkt Woods ATEX fans adhere with the ATEX Directive.
 - Fläkt Woods' ATEX equipment for Zones 1, 2, 21 & 22 have been approved to the ATEX Directive. Without this Fläkt Woods could not legally supply into the EU and EEA!
 - Fläkt Woods staff are trained to select products based on the specific information provided by the end-user, ensuring the optimum solution is reached.
 - Fläkt Woods has developed the technical expertise and application experience to support end users in every stage of the selection process.

**Fläkt Woods' products are ATEX compliant.
ARE YOU?**

Fläkt Woods ATEX Compliant Fans

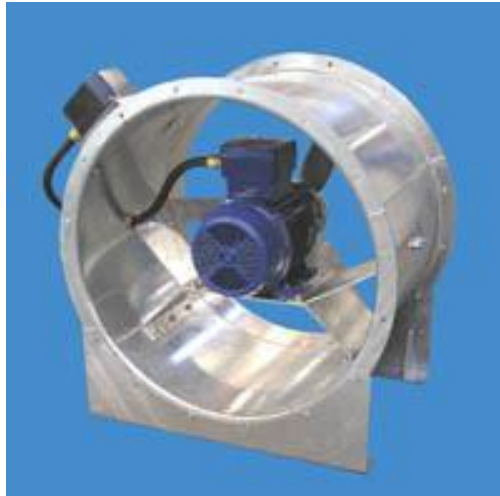


- Fläkt Woods are in a unique position to satisfy most ATEX requirements: -
 - The widest range of ATEX compliant and registered fans in the industry.
 - Centrifugal & Axial flow fans & full range of ancillaries
 - Vast experience of industries & applications covered by the directive.
 - A product solution to handle most of the specific mixtures of potentially explosive hazards



Whatever your ATEX situation, Fläkt Woods has the optimum solution!

ATEX Compliant Axial Fans



Selecting non-conforming fans will cost you much more than a few dB!

- ATEX axial fans incorporate the following safety features: -
 - Spark minimising features.
 - Higher specification motors.
 - Special conduit systems.
 - Impeller Locking System.

ATEX Compliant Centrifugal Fans



- ATEX centrifugal fans incorporate the following essential features: - :
 - Fully welded casing and impeller design
 - Special anti-spark seals and linings on rotating parts
 - Carbon ring ensures non-sparking
 - Brass inlet cones
 - No inserts inside the casing
 - Single piece flanges to avoid leakage
 - Earthing of all bolted parts with stainless steel
 - Anti-static coatings (without iron / aluminium)



**Fläkt Woods designed
ATEX fans will
provide valuable peace
of mind!**

ATEX Key Issues



- From 1st July 2003 ATEX been a mandatory directive.
- ATEX directive applies across the whole EU and the EEA.
- End-users must ensure their facilities comply with the ATEX Directive.
- Specifying non-conforming fans for ATEX applications can result in heavy fines and even imprisonment.
- Fläkt Woods are in a unique position to satisfy most ATEX requirements
- Fläkt Woods offers the widest range of ATEX compliant fans in the industry

**ATEX puts the onus
of responsibility upon
you!**



Need Further Information?

Please contact your Light Industrial
Department on:

0044 (0) 1206 244403

ATEX Directive

Do you meet the requirements?