Hazardous Area Zone and Gas Group Table

Basis: IEC 60079 10 1 and 10 2 area classification, IEC 60079 0 equipment groups and EPL, ATEX 2014/34/EU categories, NEC Articles 500 and 505.

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Zones, EPL and equivalents

Zone	Definition	Presence	EPL	ATEX category	NEC equivalent
Zone 0	Gas present continuously or for long periods	Over 1000 h per year (guide)	Ga	1G	Class I Division 1
Zone 1	Gas likely in normal operation	10 to 1000 h per year (guide)	Gb	2G	Class I Division 1
Zone 2	Gas not likely; if present only briefly	Under 10 h per year (guide)	Gc	3G	Class I Division 2
Zone 20	Dust cloud present continuously		Da	1D	Class II Division 1
Zone 21	Dust cloud likely in normal operation		Db	2D	Class II Division 1
Zone 22	Dust cloud not likely; if present only briefly		Dc	3D	Class II Division 2

Gas and dust groups

Group	Typical substance	NEC group	MESG (gas)
IIA	Propane, methane (mines are Group I)	D	Over 0.9 mm
IIB	Ethylene	C	0.5 to 0.9 mm
IIC	Hydrogen, acetylene	B (hydrogen), A (acetylene)	Under 0.5 mm
IIIA	Combustible flyings	Class III	
IIIB	Non conductive dust	Class II Group G	
IIIC	Conductive dust	Class II Group E	

Notes

- Hour figures are common guidance, not part of the definitions.
- IIC equipment may be used in IIB and IIA areas; not the reverse.

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