

## VoIP desk/wall telephone for areas with explosive atmospheres Zone 2 & 22



### Introduction

This impact-resistant and shockproof polycarbonate telephone is approved for zone 2 / 22 according to ATEX.

Due to its striking signal colour the FernTel IP cannot be missed; useful for whenever a telephone is urgently needed.

The FernTel IP's impact-proof thermoplastic housing and stainless steel screws offer further advantages when installing the phone in explosive or humid atmospheres.

The device is easily converted from a wall telephone to a desk telephone.

The FernTel IP / zone 2 / 22 allows efficient working with high comfort completed by the illuminated keypad and display. The standardized features according to H.450 are supported.

The FernTel IP / zone 2 / 22 offers features of high quality based on industrial standards instead of proprietary solutions.

### Features

- Protection degree IP 65 EN 60529
- Ambient temperature -20°C to +55°C
- Call tone  $\geq 95$  dB(A), 1 m
- Explosion protection class II 3G Ex nA nL IIC T5 II 3D Ex tD A22 IP66 T80°C
- Pixel-based, illuminated LCD Display
- Illuminated keypad
- Intelligent and user-friendly menu structure
- Standard H.323, SIP, TSIP, SIPS protocols
- Power supply Power over Ethernet
- 1x Ethernet: RJ-45, 10/100-BASE-TX

Application Example:

### Telephones for Ex Zone 2 / 22

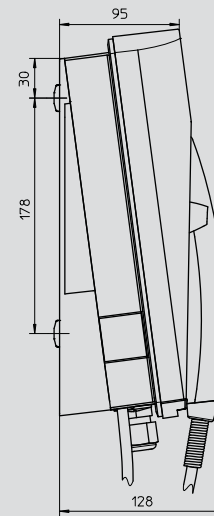
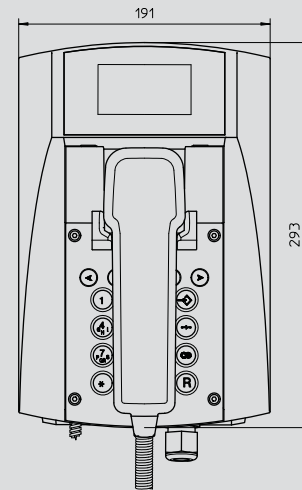
The new FernTel IP / Zone 2 / 22 is the ideal telephone for many different work areas in Zone 2 or 22.



# Certification and Specification

## Certification

Explosion protection class:	II 3G Ex nA nL II C T5, II 3D Ex tD A22 IP66 T80°C.
Protection Degree:	acc. to IEC60529 IP 65.
Temperature Range:	-20°C to +60°C.
Housing:	Polycarbonate.
Keypad:	With stainless steel plate.
Housing Dimensions:	Height x Width x Depth 293 x 191 x 128 mm.
Weight approx:	2.4 kg.
Power Supply:	Power over Ethernet (IEEE 802.3af).
Connection Plugs:	1x Ethernet: RJ-45, 10/100-BASE-TX auto negotiation.
Ringing Volume:	Approx. 95 dB(A) at 1 m distance.
Display:	128 x 64 Pixel.
Protocol:	H.323, SIP, TSIP, SIPS.
Total:	H.323 version 4 incl. H.225, H.235, H.245 and RAS Gatekeeper routed Signalling, H.450 Session Initiation Protocol (SIP) RTP, SRTP Real Time Protocol.
RTCP:	Real Time Control Protocol – first level of Quality of Service.
RAS Protocol:	Support for External Gatekeeper.
DTMF:	H.245 Alphanumeric or Signal Type.
Additional VoIP-Features:	H.245 Fast Connect En-block dialling Overlapped Sending.
Security:	Password Protected Administration. Encoded Password Authorization acc. to H.235.
Quality of Service:	Priority of IP-Packages acc. to TOS and DiffServ, VLAN Priority acc. to IEEE 802.1p / 802.1q.
Voice Encoding:	G.711 A-law / $\mu$ -law (64 kbps), G.723.1 (5.3 kbps), G.729A (16kbps).
Echo Compensation:	G.168.
Access:	Via HTML Web-Browser. Password protected authentication.
Troubleshooting:	Log- and Trace-Files, State Display of Interfaces and Connections, Ping Connection Test sending of SNMP Traps over Internet Protocol.
Update:	Configuration recording/reading, Boot code and firmware update via HTML upload, Automatic update via Update-Server.
DSL-Access:	PPPoE Protocol.
VPN:	Tunnelling with PPTP Encoding via MPPE.
NAT:	Network Address Translation – for Transformation of official IP Addresses into private IP Addresses and vice versa.
DHCP:	Dynamic Host Configuration Protocol – IP interfaces settings.
ICMP:	Internet Control Message Protocol – for Ping tests.
Dial Tone Generation:	Automatic Dial tone Generation European and US Standard.
Call Transfer:	Call Transfer with/without consultation call.
Call Diversion:	Call Diversion Unconditional, Busy, No Reply.
Call Hold / Retrieve:	Call Hold / Retrieve.
Call Waiting:	Call Waiting inclusive Signalling of second Call Information.
Calling Name Identification:	Name Display.
3 Party Conference:	3 Party Conference of internal and/or external Subscriber.
Calling Number Identification:	Display of Calling Number.
Multiple Registrations:	up to 6 Registrations.
Telephone Book:	Local, Integration of an External Database.
Time/Date:	Exact Time and Date Information via Time Server.



ALL DIMENSIONS IN MILLIMETRES

## Ordering Information

For ATEX and IECEx certified units the full article number is made up by appending the colour code for the coloured housing to the article number given here (-). Yellow 1 | Red 2 | Grey 7\* | Black 0 | For Inmetro certified units, please add (45) to the article no.

Type	Name	Version	Language	Article no.
FernTel IP / Zone 2/22	Desk/Wall Telephone	with spiral cord	Multi	F112 411 2 (45)(-)
FernTel IP / Zone 2/22	Desk/Wall Telephone	with armoured cord	Multi	F112 431 2 (45)(-)
FernTel IP / Zone 2/22	Stabiliser bracket			F112 390 00
<b>UL Versions</b>				
FernTel IP/Zone 2/22	Desk/Wall Telephone	with spiral cord	Multi	F112 411 4(-)
FernTel IP/Zone 2/22	Desk/Wall Telephone	with armoured cord	Multi	F112 431 4(-)

\*Not available with UL certified units.

All specifications, dimensions, weights and tolerances are nominal (typical) and MEDC reserve the right to vary all data without prior notice. No liability is accepted for any consequence of use.



6DS146/A 10/13