

# Technical Datasheet



## VTB (Ex)

Local Display

Battery-powered

Ex protection according to ATEX, IECEx

## Description

The VTB is a programmable local display unit with integral carrier frequency pickup and amplifier unit. The VTB serves the evaluation of flow volumes and can be used with all KEM flowmeters. With the integrated battery, measuring points can be operated without a voltage supply. In addition to the volumetric flow, two sum meters are available for volume counting. Measuring results are indicated in a 7 digits 7segments LCD display.

## Application

- Chemical Injection
- Off-shore and oil & gas applications
- Stand-Alone Fluid Consumption Monitoring

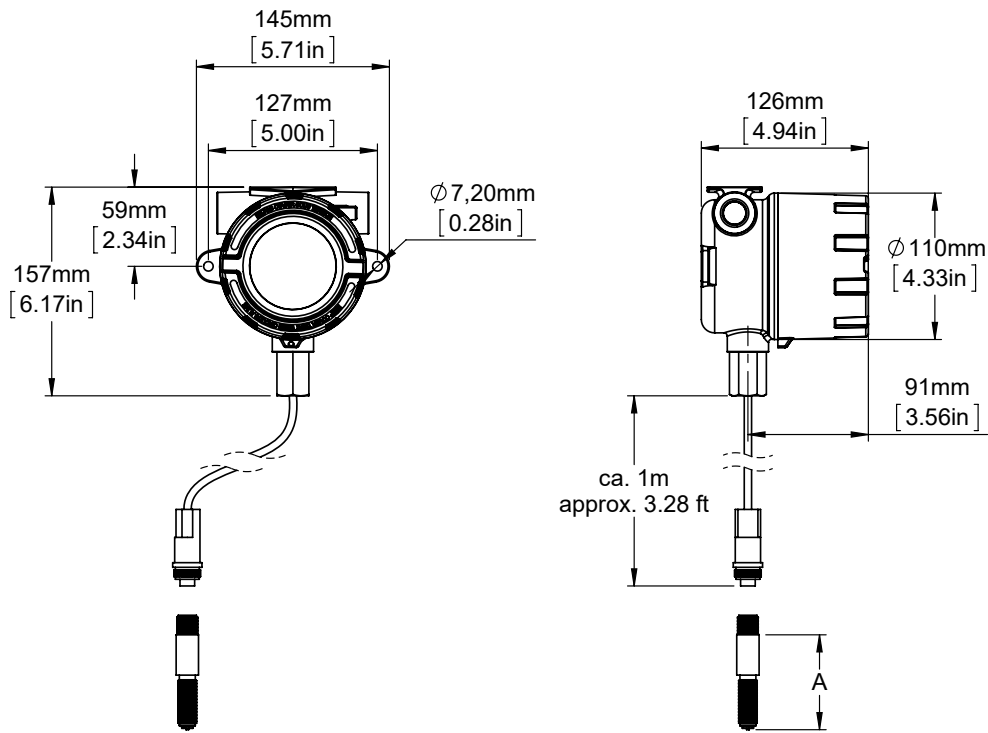
## Highlights

- LCD-Display: 7/7
- Ex-approval: ATEX, IECEx
- Local Flow Display
- Total Counter

## Technical Data

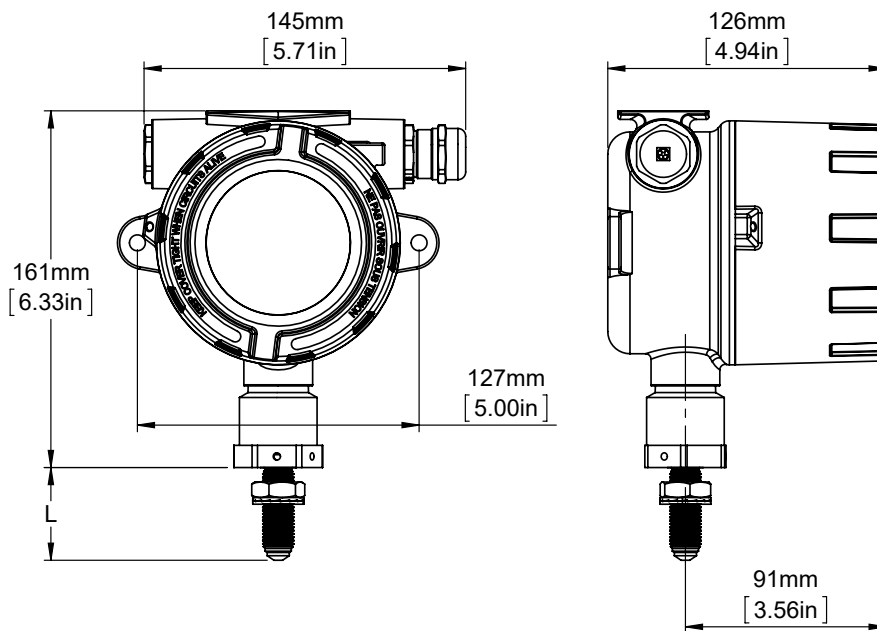
LCD Display	7 digits (7 segments), digit height 11 mm for real time value, totals and parameterization
Ambient Temperature	0 °C up to +50 °C [+32 °F up to +122 °F] (non Ex / Ex, T4)
Media Temperature	-40 °C up to +120 °C [-40 °F up to +248 °F]
Ex-Protection according to ATEX	II 2G Exd [ia] IIC T4, BVS 10 ATEX E 054
Ex-Protection according to IECEx	Exd [ia Ga] IIC T4 Gb, IECEx BVS 15.0002
Protection Class	IP66
Housing	Aluminum AlMgSiPb or stainless steel 1.4401 [AISI 316]
Weight	App. 3,750 g
Battery Life Time	5 years

Dimensional Drawing – VTB remote



Type	A
K or R	72 mm [2.83 in]

Dimensional Drawing – VTB compact (non Ex)



Type	L
K/R	40 mm [1.57 in]
L	80 mm [3.15 in]

## Ordering Code

	VTB	-	X	-	X	-	X	-	X
<b>Mechanical Design</b>									
ZHM 01/* - 04, HM Series			K						
ZHM 01/* - 07, HM Series			L						
ZHM 01, SRZ Series, LFM Series			R						
<b>Ex Protection</b>									
ATEX and IECEx					Ex				
<b>Housing Material</b>									
Stainless Steel 1.4401 (AISI 316)							ST		
Aluminum							AL		
<b>Option</b>									
Compact electronic (non Ex)									K2

## Safety Instructions

The following has to be adhered to:

- Installation instructions for electrical devices and for associated intrinsically-safe devices.
- The amplifier has to be installed in a way that the max. ambient temperature does under no circumstances exceed +50 °C [+122 °F] (consider self heating).
- Generally, supplied units have to be connected by an expert according to EMC stipulations.
- Flammable media may only be used as measuring medium when they do not build an explosive atmosphere permanently or for a longer period of time. In addition, the amount of air and oxygen contained must be low enough to ensure the danger of explosion can definitely be excluded. The local display unit has to be included in repeated pressure tests.

**WARNING: The unit must not be opened in hazardous areas!**



Küppers Elektromechanik GmbH

[www.kem-kueppers.com](http://www.kem-kueppers.com)

[info@kem-kueppers.com](mailto:info@kem-kueppers.com)

### KEM Headquarters

Liebigstraße 5  
85757 Karlsfeld  
Germany

T. +49 8131 59391-0  
F. +49 8131 92604

[info@kem-kueppers.com](mailto:info@kem-kueppers.com)

### KEM Manufacturing Center

Wetzeller Straße 22  
93444 Bad Kötzting  
Germany

T. +49 9941 9423-0  
F. +49 9941 9423-23

[production@kem-kueppers.com](mailto:production@kem-kueppers.com)

### KEM Sales

Liebigstraße 5  
85757 Karlsfeld  
Germany

T. +49 8131 59391-100  
F. +49 8131 92604

[sales@kem-kueppers.com](mailto:sales@kem-kueppers.com)

### KEM Service & Repairs

Wetzeller Straße 22  
93444 Bad Kötzting  
Germany

T. +49 9941 9423-37  
F. +49 9941 9423-24

[service@kem-kueppers.com](mailto:service@kem-kueppers.com)

*More distributors & partners can be found at:  
[www.kem-kueppers.com](http://www.kem-kueppers.com)*