MODEL: Calibration Kit

(Manual Calibration Kit)

User Manual

SENKO

SenKo Co., Ltd

Index

Product Overview

The calibration kit provides the standard gas used for calibrating the MGT multigas monitor. It uses a 58 Litre cylinder of gas combined with a tygon tube and 0.5LPM flow regulator.

1. Introduction

1.1. Connecting the parts

Before calibrating the cylinder and the regulator need connecting. The regulator is screwed into the top of the gas cylinder until tight (See below).

The regulator must be secure but do not over tighten.

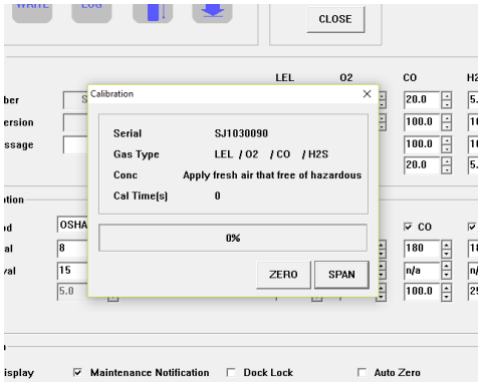
Once the regulator is in place a piece of 4mm i/d tygon tubing should be attached to the outlet of the regulator and connected to the inlet of the MGT Calibration adaptor.

With the cylinder connected to the calibration adaptor, the kit is ready to use to calibrate the MGT.

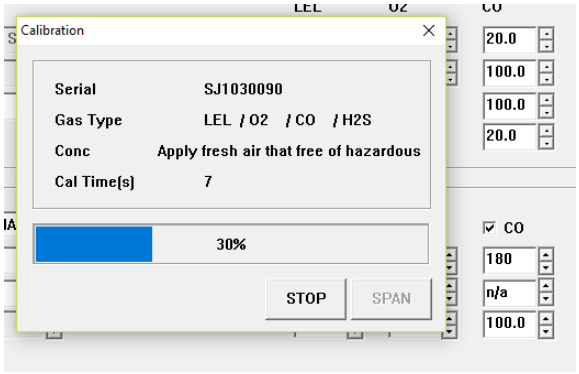
2. Calibration

2.1 Using the IR Link software

If the IR Link software is being used for the calibration then pressing this button  begins the calibration sequence.



Press ZERO to perform the calibration in fresh air.



After the ZERO process has successfully completed, the screen will show Zero Success and the instrument will show OK on each sensor

At this point attach the calibration adapter plate top the front of the MGT, and click into place so it is covering all three sensor apertures. As shown below

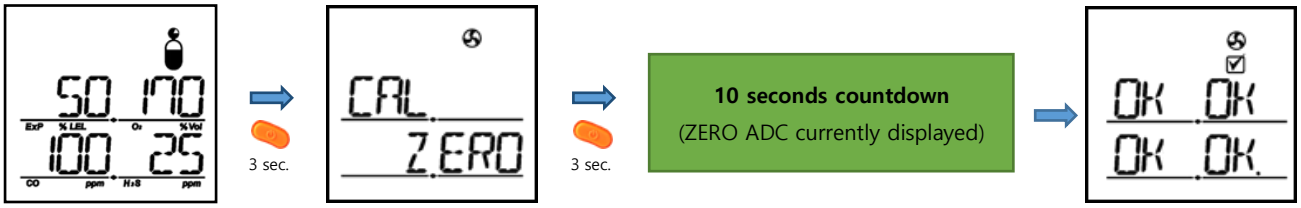
Click on SPAN and then open the port on the regulator by turning the wheel.

The test gas will flow at a constant rate of 0.5LPM over the gas sensors. The process takes approximately 90 seconds. When complete the screen will display Span Calibration success and the device will show OK on each sensor. At this point close the port on the regulator by turning the wheel the opposite direction.

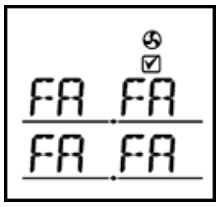
Remove the calibration adapter from the MGT and allow the gas to disperse. The readings will return to normal levels and the alarms will stop. The calibration is complete.

2.2. Calibration using just the instrument

From the normal gas reading display screen in order to carry out the ZERO fresh air calibration

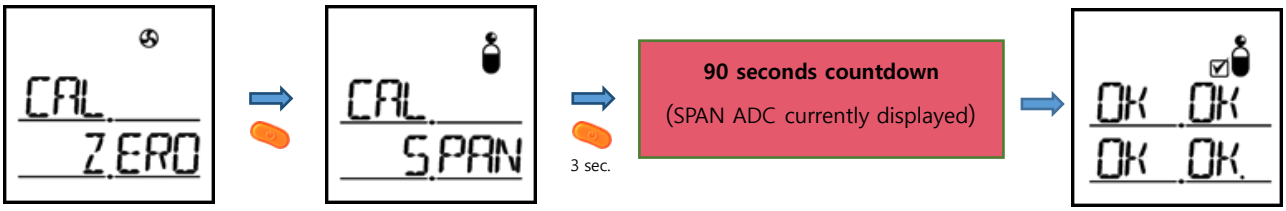


Press KEY button ( ) for 3 seconds under the gas calibration value mode and the icon ( ) signifying fresh air calibration will appear on the LCD monitor with the phrase "CAL ZERO." Press for another 3 seconds to do fresh air calibration and it takes 10 seconds to calibrate.

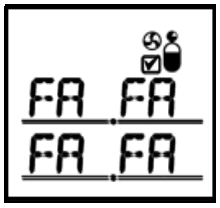


If the calibration fails, FA(Fail), not OK, appears on the LCD.

Next attach the calibration adpater to the front of the instrument as described above and then open the port on the regulator by turning the wheel.



Next press the KEY button ( ) under the fresh air calibration mode and the icon ( ) signifying standard gas calibration will appear on the LCD monitor with the phrase "CAL SPAN." Press for 3 seconds to do the standard gas calibration. It will be completed automatically in 90 seconds.



If the calibration fails, the phrase FA(Fail), not OK, appears on the LCD.

.

At this point close the port on the regulator by turning the wheel the opposite direction.

Remove the calibration adapter from the MGT and allow the gas to disperse. The readings will return to normal levels and the alarms will stop. The calibration is complete.

If the Calibration process fails, please contact Senko.

Initial Standard gases concentration for calibration

It is very important that the concentrations of gas on the gas cylinder label match the concentrations the instrument is expecting. The standard gas concentrations are listed below, if these have not been modified this is what the MGT is expecting.

	Combustible	Oxygen	Carbon Monoxide	Hydrogen Sulfide
Concentration	50%LEL(CH_4)	18 %Vol	100 ppm	25 ppm

The concentration for calibration may be modified on PC through SENKO IR-LINK and software. This has to be written to the instrument prior to the calibration process.

3. Specification

Item	Calibration Kit
Cylinder	58L four gas mix (50% LEL CH4, 18% O2, 100ppm carbon monoxide, 25ppm hydrogen sulphide)
Regulator	5LPM flow regulator
Tubing	4mm i/d Tygon tubing
Adapter	Standard MGT calibration adapter
Software option	IR Link software for use with PC

Limited Warranty

SENKO warrants that this product is free from defects in workmanship and materials, under normal use and maintenance, for two years from the date of purchase from the manufacturer or authorized reseller of the product.

The manufacturer is not responsible (under this warranty) if its tests and examinations reveal that the alleged product defect does not exist or was caused by misuse, neglect or improper installation, tests or calibrations of the buyer (or third parties). Any unauthorized attempt to repair or modify the product, or any other cause of damage going beyond the intended range of use, in particular damage caused by fire, lightning, water damage or any other danger, cancels the manufacturer's liability.

In the event that a product does not perform according to the manufacturer's specifications during the applicable warranty period, please contact the authorized reseller of the product or the SENKO service center at + 44 191 428 3415 for repair / return information.

Senko Europe, Jarrow Business Centre, Viking Industrial Park, Jarrow, NE32 3DT, UK

Tel : +44 191 428 3415

Email :latest@senkoeurope.com **Web :** www.senkoeurope.com