Precise measurement of gases in various locations or even sites requires a suitable analyser and reliable sample gas conditioning. Both must be relatively simple and most importantly allow safe and protected transport to the sampling site. Type MAS systems use a 19” analyser and a sample gas conditioning system configured for the application with sample gas cooler, filter, pump, flow meter, etc. inside a sturdy case.

The case is a “housing-in-housing” style with shock absorption, rollers, carrying handles, and a handle for pulling the housing make the MAS easy to move.

A locking drawer to store lines, cables, documentation, etc. is optional. The connections are quick couplers.
System example

The analyser is a BA 5000 multi component analyser for measuring CO, NO, SO₂ and O₂ per 13th BImSchV and TA-Luft.

Sample gas conditioning consists of a condensate pre-separator, a Peltier cooler, a moisture detector with control unit, acid-proof filter, a gas pump and a condensate pump. The system statuses and the cooling temperature can be read from displays. The gas connections and the condensate drain have self-locking quick couplers.

An accessory drawer with 2 heights holds connection hoses, mains cable and documentation.

The MAS stands on 4 large wheels, has handles at the sides and an extending handle for pulling the system at the back.

Technical Data

Technical data for the system example shown

<table>
<thead>
<tr>
<th>Parameter</th>
<th>Specification</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ambient temperature:</td>
<td>32…122 °F</td>
</tr>
<tr>
<td>Weight:</td>
<td>approx. 121 lb</td>
</tr>
<tr>
<td>Supply voltage:</td>
<td>230 V</td>
</tr>
<tr>
<td>Total flow rate:</td>
<td>approx. 2 lpm</td>
</tr>
</tbody>
</table>

Dimensions

View without cover

approx. 23.62 in

View without cover

approx. 30.31 in

Configuration of a MAS

HOUSING

The housing dimensions mainly depend on the built-in components. Also available with a single wall housing, which reduces the dimensions.

ANALYSERS

All 19” rack mount analysers may be used:
- Oxygen analyser: BA 3000 and BA 6000-0₂
- Multi component analysers: BA 3500, BA 5000 and BA 6000-IR

SAMPLE GAS CONDITIONING

The sample gas conditioning is freely configurable. It is based on the model SCS sample gas conditioners. For a description and configuration, please refer to the data sheet and questionnaire “19” sample gas conditioning systems”.

Fig. 1: System example dimensions
MAS

ORDERING INSTRUCTIONS

– Choose an analyser and define the required specifications such as measuring range and equipment, etc.
– Complete the SCS 19” systems questionnaire to define the sample gas conditioning.
– Would you like the MAS with or without accessory drawer?
– Do you have special housing requirements?