

# Synchro/Resolver SWMG/RWMG Angle Measuring Device

The SWMG/RWMG records the angle position of a connected synchro or resolver, displays the angle with a resolution of 0.1° and makes the measured values available on analog and digital output channels.

The exciting voltage for the angle transmitter can be provided by an internal generator or even looped in externally.

In addition, there is the option of looping an external differential synchro or resolver into the signal path in order to change the measured actual angle by constant value.



SWMG

## Function:

A digital converter with 18 bit resolution, which features an upstream passive synchro/resolver converter, converts the 3 signal voltages that are provided by the angle transmitter into a digital data word depending on the angle.

The data word is outputted without any further processing on a potential isolated parallel interface.



The digital converter is a "tracking converter", i.e. it delivers the correct angle position as a digital word at all times for a constant angle speed of the signal source.

Although at any time a digital word can be read in by the converter. There is a configurable conversion rate for the measurement devices with

which the data words are processed in a fixed timing code.

Therefore, the conversion rate can be adjusted from 100/sec. to 2500/sec.

At a conversion rate of 2500/sec., a data word is read in by the converter every 400 µsec. and directly outputted on a potential-free parallel port with a strobe signal.

With the same conversion rate, the angle is standardized to an analog voltage value of 0 to 10V and exported via the analog output.

A subset of the angle data is converted into an ASCII string and made available at the potential-free serial interface.

A reduced data amount is depicted on the display with a refresh rate up 10/sec.

## Technical data:

Supply	: 230VAC, opt. 115VAC, 10VA
Input	: SWMG = Synchro, RWMG = Resolver
Output	: analog: +/-0...10V; res. 16 Bit, accuracy 0,02% digital: V.24; parallel 16 Bit (Strobe)
Display	: 0...359,99° (LCD 12,5mm char.)
Excitation	: TBD
Dimension	: 19" - 3HE - 21TE - rack mount

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DIE ENTWICKLER

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