

TMF100 / TMF500: MEM & Operators

Logical operators:

	OR	=	
&	AND	+	
!	NOT	-	
>		*	
<		/	
#	DIVERSO	^	POTENZA

Functions:

SIN	radians	LOG	\log_{10}
COS	radians	LN	\log_e
TAN	radians	ABS	Absolute
INT	integer	SGN	Returns -1 when negative, 1 when positive
SQR	\sqrt{x}	ESP	e^x

MEM List:

Referred to a measurement (positional):

Mx02	instantaneous
Mx12	average
Mx13	minimum
Mx14	minute of minimum
Mx15	maximum
Mx16	minute of maximum
Mx48	totalization, integral (commonly used for rainfall)
Mx82	standard deviation
Mx83	standard deviation (sqrt)

Global:

M43	latitude
M44	longitude
M45	hour
M46	minutes
M47	seconds
M48	battery voltage
M49	external power supply voltage (photovoltaic panel or power supply)

Example of derived measurement:

Evapotranspiration (ETO): *E/M<T>12/M<RH>12/M<AS>12/M<RN>12

Dew point: ((M<RH>02/100)^{0.125})*(112+0.9*M<T>02)+M<T>02/10-112

where:

- <T> = var. reference of Air Temperature
- <RH> = var. reference of Relative Humidity
- <AS> = var. reference of Air Speed
- <RN> = var. reference of Net Solar Radiation