



Logger-Box Datalogger

6 temperatures conform with HACCP / EN12830

Manual



Ver. 4.0
June 2017



GENERAL

It's an Datalogger for up to 6x temperatures which is confirm with HACCP / EN12830. You can use it immediately, there are only very small configuration to do! Please use temperature-probes from OEHME-Systeme type "NTC-15m" (length 15 meters). The logging-cycle is preselected to 15 min. (HACCP). Download of saved temperatures via USB-stick or PC via RJ45-cable, WEB-browser. The File-format ist TXT, no need of special software! After switching on the Logger saves automatically with log-cycle of 15min. the temperatures from the connected temperature-probes.

**You can change the names oft the inputs „IN1“ ... „IN6“ via WEB-browser.
There you can give short-names and long-names.**

TECHNICAL DATAS

Measurement	: 33 x 33 x 15 cm
Power-Supply	: 230V 50Hz
Inputs	: 6 x NTC-temperature-probes (config. as digital inputs – potential-free)
Output	: relay 8A / 250V
Ethernet	: RJ45-plug für internal WEB-Server
Display	: 128 x 64 Pixel graphic-LCD
Webserver	: LINUX

Clamp Logger-OS1	Type	Function
AI1 / GND	NTC	Temp.-probe 1 / digital input 1 (potential-free, e.g. door-switch)
AI2 / GND	NTC	Temperature-probe 2 / digital input 2
AI3 / GND	NTC	Temperature-probe 3 / digital input 3
AI4 / GND	NTC	Temperature-probe 4 / digital input 4
AI5 / GND	NTC	Temperature-probe 5 / digital input 5
AI6 / GND	NTC	Temperature-probe 6 / digital input 6
POWER IN	24V AC	Internal power-supply 24Vac
POWER SUPPLY	230V 50Hz	External power-supply for the whole BOX is 230V, 50 Hz via 230V-cable 3m (is supplied in the package).
C1 / DO1	Dig. Output 8A / 250V	Relay as collecting-alarm for all temperature-alarms and digital inputs.



DELIVERY

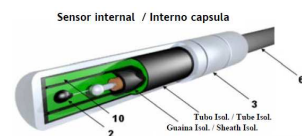
- 1x Datalogger „Logger-OS1“ with trafo 230V/24V already connected in the box.
 - 2x Temperature-probes length 15 meters type **NTC-15m** (already connected)
 - 1x Powersupply-cable 230V with length 3 meters(already connected)
 - 2x PG16-Connection, IP68 for the cables (probes “NTC-15m” and power-supply)
 - 2x Silicon-inlet for PG16 with two holes for cable with diameter 4,3 ... 6,1 mm, fort two probes NTC-15m (diameter each 6mm).
 - 2x PG7 for 230V-cable and also suitable for temperature-probes NTC-15m
- * The wholes for PG16/PG7 must be done from the customer. So you can look for the best place in your situation, where to do the holes.

IF YOU NEED TO ORDER MORE STUFF www.oehme-systeme.de

NTC-15m Temperature-probes 15 meters, V2A L=40mm D=6mm
Logger-OS1 up to 6x temperature-probes.

PG-16-Set PG16-connection + inlet of silicon with 2 holes for cables
with diameter 4,3 ... 6,1 mm (NTC-15m: D = 6mm)

PG-7-Set-5pieces PG7-connection for 230V-cable, but also suitable
for temperature-probes NTC-15m












LED

Color	Function
GREEN	Is on during normal use.
YELLOW	Starts blinking, if one temperature is out of the limits. Too high or too low.
RED	Starts blinking (together with yellow LED) after a delay-time. For high or low-temperature-alarm and digital input (e.g. door-switch). Plus Alarm-Relay ON* .

* Collecting alarm for all inputs.

BUTTONS

	Button LEFT / RIGHT	To switch between menu's. To do selections. To go to positions.
	Hold pressed the button LEFT	To go back one level. To leave a menu.
	Hold pressed the button OK	To go the the main-menu.
	1x OK-button	To go to the next lower menu. To confirm a selection or modification.
	Button UP or DOWN	To do selection in menu. To increase/decrease values, after that 1x OK-button.
	Hold pressed the button RIGHT	Hotkey – goes directly to time/date – settings.
	Hold pressed the button DOWN	RESET during main-alarm: alarm-relay OFF + red LED OFF for 15 minutes (fixed).



DOWNLOAD OF DATAS

Download of HACCP-datas on USB-stick:



Display

AI1 10,7 °C	AI4 11,5 °C
AI2 11,3 °C	AI5 -8,1 °C
AI3 -0,2 °C	AI6 21,9 °C
01/03/13	DI 15:32

Download of data on USB-stick----->

In menu 5sec OK-button

At symbol USB

1x OK-button

At "Download"

1x OK-button

✔ TXT-Datei

e.g. feb17.txt

No need of special software



	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R
1	File:	FEB2013.txt																
2																		
3	Year		Month															
4	2013		FEB															
5																		
6	Day		Hour		Min		AI_1	AI_2	AI_3	AI_4	AI_5	AI_6						
7	13		18		3		23.7	23.0	22.2	22.7	23.5	22.8						
8	13		18		13		23.4	22.8	22.1	22.8	23.1	22.7						
9	13		18		23		23.4	22.7	22.3	22.6	23.4	22.8						

Download of HACCP-datas via PC:

Another possibility is the connection to PC via cable RJ45.

IP: 10.0.0.100 admin / admin (Name/PW)

Menu: HOME / Logged Files (TXT)

Eingang	Display-Name	Wert	Einheit	Status
Eingang1	IN1	27.7	°C	OK
Eingang2	IN2	11.2	°C	OK
Eingang3	IN3	46.3	°C	OK
Eingang4	IN4	19.1	°C	OK
Eingang5	IN5	16.3	°C	OK
Eingang6	IN6	0.8	°C	OK

Home Logged Files OEHME Systeme

Lokaler Datenspeicher

Datei download

Name des Files	Größe [B]
JUN2017.TXT	6395
AL_JUN17.TXT	4838



BASE-SETTINGS

Input	Description	Limits	Unit	Default
IN1	„Min-Temp.“ (low-alarm)	-99,0 ... +99,0	°C	-99,9
	„Max-Temp.“ (high-alarm)	-99,0 ... +99,0	°C	+99,9
	“Alarm-delay” (for temperatures & dig. Inputs)	0 ... 99	Min.	0
	“Max+/Min-“ (immediately main-alarm)	0 ... 99	K	10
	<u>Without delay</u> -> Red LED + alarm-relay ON e.g. “Max-Temp” = 5°C and “Max+/Min-“ = 10 K Temperature > 15°C => main-alarm (red LED + relay)			
IN2	„Min-Temp.“ (low-alarm)	-99,0 ... +99,0	°C	-99,9
	„Max-Temp.“ (high-alarm)	-99,0 ... +99,0	°C	+99,9
	“Alarm-delay” (for temperatures & dig. Inputs)	0 ... 99	Min.	0
	“Max+/Min-“ (immediately main-alarm)	0 ... 99	K	10
IN3	„Min-Temp.“ (low-alarm)	-99,0 ... +99,0	°C	-99,9
	„Max-Temp.“ (high-alarm)	-99,0 ... +99,0	°C	+99,9
	“Alarm-delay” (for temperatures & dig. Inputs)	0 ... 99	Min.	0
	“Max+/Min-“ (immediately main-alarm)	0 ... 99	K	10
IN4	„Min-Temp.“ (low-alarm)	-99,0 ... +99,0	°C	-99,9
	„Max-Temp.“ (high-alarm)	-99,0 ... +99,0	°C	+99,9
	“Alarm-delay” (for temperatures & dig. Inputs)	0 ... 99	Min.	0
	“Max+/Min-“ (immediately main-alarm)	0 ... 99	K	10
IN5	„Min-Temp.“ (low-alarm)	-99,0 ... +99,0	°C	-99,9
	„Max-Temp.“ (high-alarm)	-99,0 ... +99,0	°C	+99,9
	“Alarm-delay” (for temperatures & dig. Inputs)	0 ... 99	Min.	0
	“Max+/Min-“ (immediately main-alarm)	0 ... 99	K	10
IN6	„Min-Temp.“ (low-alarm)	-99,0 ... +99,0	°C	-99,9
	„Max-Temp.“ (high-alarm)	-99,0 ... +99,0	°C	+99,9
	“Alarm-delay” (for temperatures & dig. Inputs)	0 ... 99	Min.	0
	“Max+/Min-“ (immediately main-alarm)	0 ... 99	K	10

Log-Cycle for alarms : 5 min. = default (1 ... 99 min)

Log-Cycle for temperatures : 15 min. = default (1 ... 99 min)

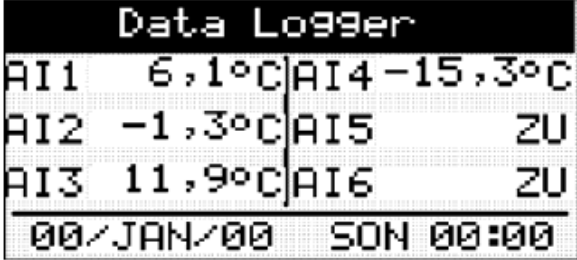

DOWN-Button for 5sec = RESET of main-alarm (remains OFF for 15 min, 15min is fixed)

Input IN1 + IN2 : **NTC = default** (selectable is NTC, DI and input active/ not active)


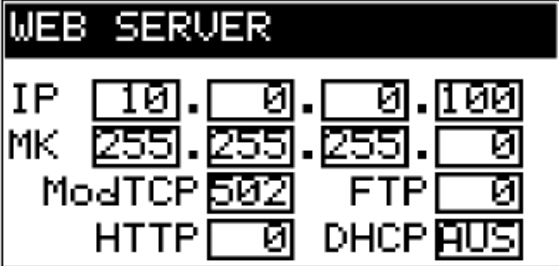
Input IN3 ... IN6 : **not activ = default** (selectable is NTC, DI and input active/ not active)



MENU - DISPLAY

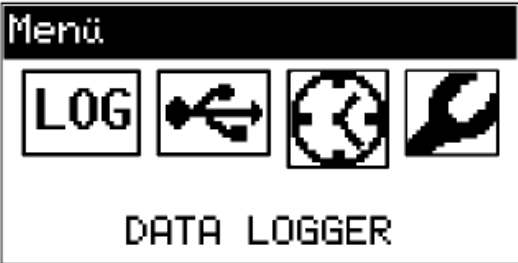


Description	Display
Start-display „Logo OEHME-Systeme“ - Press any button - Shows actual temperatures	 <pre> Data Logger AI1 6,1°C AI4 -15,3°C AI2 -1,3°C AI5 ZU AI3 11,9°C AI6 ZU ----- 00/JAN/00 SON 00:00 </pre>
OK-Button for 5sec – goes to Menü Left / Right – Button, than OK: LOG = Input-Settings USB = Download datas Clock = Date / Time Tool = System	 <pre> Menü LOG [USB] [Clock] [Tool] DATA LOGGER </pre>

Menu -> TOOL-symbol: Only for Administratoren (LCD, RS485, WEB)!

Beschreibung	Display
LCD - Attention! Contrast =30 is perfect! Don't change contrast do much!	 <pre> LCD HG-Bel. [30] sec Kontrast [30] </pre>
WEB Network-settings If you want to use it inside your network LAN-ethernet.	 <pre> WEB SERVER IP [10] . [0] . [0] . [100] MK [255] . [255] . [255] . [0] ModTCP [502] FTP [0] HTTP [0] DHCP [AUS] </pre>



LOG = Input-Settings

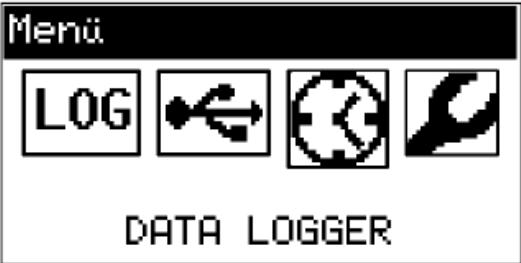


	<p>At symbol „LOG“ 1x OK-Button</p> 
<p>Datalogger >>> Log-Cycle: 15 min „Input ON/OFF CALIBRATION“</p>	<p>Press RIGHT-button several times to see alarm-settings for probe IN1, IN2 ... IN6.</p> <p>e.g. <<< Alarm-Logger-IN1 >>></p>
<p><<< Alarm-Logger IN1 >>> Log-Cycle: 15 min Max-Temp.: 99.0 °C Min-Temp.: -99.0 °C Alarm-delay: 5 min Immediately +/-: 10 Kelvin</p>	<p>Log-Cycle Log-Cycle for alarms.</p> <p>Immediately +/-: 10 Kelvin Main-alarm RED-LED + alarm-relay ON e.g. Max-Temp. = 0°C Temp. > 10°C immediately main-alarm.</p>
<p>Max-Temp.: 99.0 °C 99.0 °C</p>	<p>Modify a value: Use UP / DOWN-button for change the value and also LEFT/RIGHT for position (underline), confirm with 1x OK-button.</p>
<p>Datalogger >>> Log-Cycle: 15 min „Input ON/OFF CALIBRATION“ Reading-process</p>	<p>Several times RETURN-Button, to go back one level</p> <p>Hold pressed RETURN-Taste for 5 sec., to go back to main-menu!</p> 



LOG Lower level: Input, ON/OFF

<p>Datalogger >>> Log-Cycle: 15 min „Input ON/OFF CALIBRATION“ Reading-process ...</p>	<p>Press 1x OK-button on „Input ON/OFF CALIBRATION“</p>
<p>Temp-Probe Button >>> IN ON IN ON IN ON IN ON IN ON IN ON</p>	<p>Press several times the RIGHT-button.</p>
<p><<< Input IN1 >>> „Type NTC / DI“ Calibration/10 Polarity DI</p>	<p>Temperature-probe or digit. input DI If digital input: Polarity DI (0 / 1) BACK: RETURN-button</p>
<p>Temp-Probe Button >>> IN ON IN ON IN ON IN ON IN ON IN ON</p>	<p>Input activate / deactivate: UP/DOWN-button for position, then 1x OK BACK: RETURN-button, then RETURN 5 sec.</p>

Menu -> USB-symbol: Download of datas

	<p>At „USB-symbol“ 1x OK-button</p> 
	<p>Use a normal USB-stick. Select time-interval from „month“ to „month“, than „Download“ (TXT-Format).</p>



INTERNET

IP: 10.0.0.100 admin / admin (Name/PW) masteradmin (for Administrator)

Start-menu: HOME then Logged Files

Eingang	Display-Name	Wert	Einheit	Status
Eingang1	IN1	27.7	°C	OK
Eingang2	IN2	11.2	°C	OK
Eingang3	IN3	46.3	°C	OK
Eingang4	IN4	19.1	°C	OK
Eingang5	IN5	16.3	°C	OK
Eingang6	IN6	0.8	°C	OK

Logged Files (month's):

[SEP2017.TXT](#)

[SEP2017-alarms.TXT](#)

[OKT2017.TXT](#)

[OKT2017-alarms.TXT](#)

[NOV2017.TXT](#)

[NOV2017-alarms.TXT](#)

[DEZ2015.TXT](#)

[DEZ2017-alarms.TXT](#)

Klick for Download!

```
File: JUN2017.txt;
Year      Month
2017     JUN
Unit: °C

"ERR" = Probe Error
"----" = Probe not used

**      **
** OS      **
** Innovation **
** & Software **
**      **
***      **

Day  Time  IN1  IN2  IN3  IN4  IN5  IN6
01.  20:56  OK   28.1 AL   ---  ---  ---
01.  20:57  OK   28.2 AL   ---  ---  ---
01.  20:58  OK   28.2 AL   ---  ---  ---
01.  20:59  OK   28.2 AL   ---  ---  ---
01.  21:00  OK   28.2 AL   ---  ---  ---
01.  21:01  OK   28.3 AL   ---  ---  ---
01.  21:02  OK   28.2 AL   ---  ---  ---
01.  21:03  OK   28.3 AL   ---  ---  ---
01.  21:04  OK   28.4 AL   ---  ---  ---
```



Inputs activate/deactivate

Inputs

Input	Display-Name	Activation
<input type="text" value="Input1"/>	<input type="text" value="IN1"/>	<input type="radio"/> AUS <input checked="" type="radio"/> EIN
<input type="text" value="Input2"/>	<input type="text" value="IN2"/>	<input type="radio"/> AUS <input checked="" type="radio"/> EIN
<input type="text" value="Input3"/>	<input type="text" value="IN3"/>	<input type="radio"/> AUS <input checked="" type="radio"/> EIN
<input type="text" value="Input4"/>	<input type="text" value="IN4"/>	<input checked="" type="radio"/> AUS <input type="radio"/> EIN
<input type="text" value="Input5"/>	<input type="text" value="IN5"/>	<input checked="" type="radio"/> AUS <input type="radio"/> EIN
<input type="text" value="Input6"/>	<input type="text" value="IN6"/>	<input checked="" type="radio"/> AUS <input type="radio"/> EIN

Alarm-Settings

Min-Max values for temperature-probes

Input	Name	Value	Unit
<input type="text" value="Input1"/>	Max-temperature probe 1	<input type="text" value="99.9"/>	°C
	Min-temperature probe 1	<input type="text" value="-99.9"/>	°C
	Alarm-delay probe 1	<input type="text" value="5"/>	min
	Immediately alarm probe 1 without delay with	<input type="text" value="10"/>	Degree over Max/below Min
<input type="text" value="Input2"/>	Max-temperature probe 2	<input type="text" value="99.9"/>	°C
	Min-temperature probe 2	<input type="text" value="-99.9"/>	°C
	Alarm-delay probe 2	<input type="text" value="5"/>	min
	Immediately alarm probe 2 without delay with	<input type="text" value="10"/>	Degree over Max/below Min
<input type="text" value="Input3"/>	Max-temperature probe 3	<input type="text" value="99.9"/>	°C



Administrator -> PW: „masteradmin“

Inputs, names, password and network.

Inputs activate/calibrate

Inputs

Input	Activation	Type	Calibration/10 If input-type DI	Alarm with signal
<input type="text" value="Input1"/>	<input type="radio"/> AUS <input checked="" type="radio"/> EIN	NTC (103AT) ▾	<input type="text" value="0"/>	<input checked="" type="radio"/> 0 <input type="radio"/> 1
<input type="text" value="Input2"/>	<input type="radio"/> AUS <input checked="" type="radio"/> EIN	NTC (103AT) ▾	<input type="text" value="0"/>	<input checked="" type="radio"/> 0 <input type="radio"/> 1
<input type="text" value="Input3"/>	<input type="radio"/> AUS <input checked="" type="radio"/> EIN	DI ▾	<input type="text" value="0"/>	<input checked="" type="radio"/> 0 <input type="radio"/> 1
<input type="text" value="Input4"/>	<input checked="" type="radio"/> AUS <input type="radio"/> EIN	NTC (103AT) ▾	<input type="text" value="0"/>	<input checked="" type="radio"/> 0 <input type="radio"/> 1
<input type="text" value="Input5"/>	<input checked="" type="radio"/> AUS <input type="radio"/> EIN	NTC (103AT) ▾	<input type="text" value="0"/>	<input checked="" type="radio"/> 0 <input type="radio"/> 1
<input type="text" value="Input6"/>	<input checked="" type="radio"/> AUS <input type="radio"/> EIN	NTC (103AT) ▾	<input type="text" value="0"/>	<input checked="" type="radio"/> 0 <input type="radio"/> 1

Username and password modify

New settings

	Username	Password	Ones more password	Confirm
User actual	<input type="text" value="admin"/>	<input type="text" value="admin"/>		
User	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="button" value="modify"/>

You can change „admin / admin“ (name / PW), but be careful!
Advise: Don't change the password, perhaps you can loose or forget it!



Names for Inputs

New Names: Longname NEW + Shortname NEW in ONE Line!

Input	Longname	Longname new	Shortname	Shortname new	Confirm
Analog/Digital-Input 1	<input type="text" value="Input1"/>	<input type="text"/>	<input type="text" value="IN1"/>	<input type="text"/>	<input type="button" value="modify"/>
Analog/Digital-Input 2	<input type="text" value="Input2"/>	<input type="text"/>	<input type="text" value="IN2"/>	<input type="text"/>	<input type="button" value="modify"/>
Analog/Digital-Input 3	<input type="text" value="Input3"/>	<input type="text"/>	<input type="text" value="IN3"/>	<input type="text"/>	<input type="button" value="modify"/>
Analog/Digital-Input 4	<input type="text" value="Input4"/>	<input type="text"/>	<input type="text" value="IN4"/>	<input type="text"/>	<input type="button" value="modify"/>
Analog/Digital-Input 5	<input type="text" value="Input5"/>	<input type="text"/>	<input type="text" value="IN5"/>	<input type="text"/>	<input type="button" value="modify"/>
Analog/Digital-Input 6	<input type="text" value="Input6"/>	<input type="text"/>	<input type="text" value="IN6"/>	<input type="text"/>	<input type="button" value="modify"/>

LAN-settings

Ethernet-Parameters

Name	Value
Port_HTTP_PI	<input type="text" value="0"/>
Ip_ETH_PI	<input type="text" value="10"/> . <input type="text" value="0"/> . <input type="text" value="0"/> . <input type="text" value="100"/>
DefGtwy_ETH_PI	<input type="text" value="10"/> . <input type="text" value="0"/> . <input type="text" value="0"/> . <input type="text" value="1"/>
NetMsk_ETH_PI	<input type="text" value="255"/> . <input type="text" value="255"/> . <input type="text" value="255"/> . <input type="text" value="0"/>
PriDNS_ETH_PI	<input type="text" value="194"/> . <input type="text" value="25"/> . <input type="text" value="2"/> . <input type="text" value="129"/>
SecDNS_ETH_PI	<input type="text" value="194"/> . <input type="text" value="25"/> . <input type="text" value="2"/> . <input type="text" value="130"/>
EnableDHCP_ETH_PI	<input type="text" value="FALSE"/>

TROUBLE-SHOOTING

Repeat a link in the browser („http: ...“ then RETURN)



PROTECTION AND SECURITY

Read before using

This manual is part of the product and should be kept near the instrument for easy and quick reference. The instrument shall not be used for purposes different from those described hereunder. It cannot be used as a safety device. Check the application limits before proceeding.

Safety precautions

Check the supply voltage is correct before connecting the instrument. Do not expose to water or moisture: use the controller only within the operating limits avoiding sudden temperature changes with high atmospheric humidity to prevent formation of condensation.

Warning: disconnect all electrical connections before any kind of maintenance. The Logger-OS1 instrument must not be opened. Consider the maximum current which can be applied to each relay (see Technical Data). Ensure that the wires for probes, loads and the power supply are separated and far enough from each other, without crossing or intertwining. Fit the probe where it is not accessible by the end user.

Storage and use

Temperature during use: 0 ... +60 °C

Humidity: 20 ... max. 85% rel. humidity (without condens)

Storage-temperature: -30 ... +85 °C

CE-Conformity

MANUFACTURER

Jörg Oehme – Systeme, Austr. 5, 74564 Crailsheim (Germany)

PRODUCT-NAME

Logger-OS1-Box

Conform with

2006/95/CE, 89/336 CEE, 93/68 CEE, 93/68 EEC

Comply with european norms

EN 61000-6-1 EN 61000-6-3 EN 60335 – 1

DIN/VDE : 0472 Teil 815

Protection-class : IP65



NOTICES: