



SCTMWEXL

Manual

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General

The software SCTMWEXL makes it possible to load data from internal device memory into PCs over a serial interface (RS232/V.24) or modem. The data stored in the equipment (e.g. DLX, DATAFW, DATAREG, 7FMS1, MSR10-MemoryCard-Reader, FAG, FAF,...) can be interrogated using the SCTM protocol. The interrogation is serial (data format 7E1) with a settable baud rate (300 to 9600 baud). The baud rate of the interrogation protocol is defined during parameterization (**DMFPARA** or **DLXPARA**). The data will be saved in the subdirectory "Data" in EXCEL-TXT-Format.

System requirements

Computer: PC, minimum Intel Pentium 500MHz or comparable PC / Laptop
Main memory: ≥ 256 MB
Hard disk: ca. 1 MB for installation and ≥ 1 MB for data files
Disk drives: Minimum CD ROM or floppy disk 1.44 MB
Interfaces: Minimum one RS232 interface (COM1 to COM255);
Alternative: USB interface with converter from USB to RS232

Operating system: **Microsoft Windows Vista,**
Windows XP,
Windows 2000 / 2003 Server,
Windows NT 4,
Windows 98SE / ME,
Windows 95 and up
Recommendation of the manufacturer: **Microsoft Windows XP**

Installation

The software package contains a 3.5" floppy disk or CD ROM and this user manual.

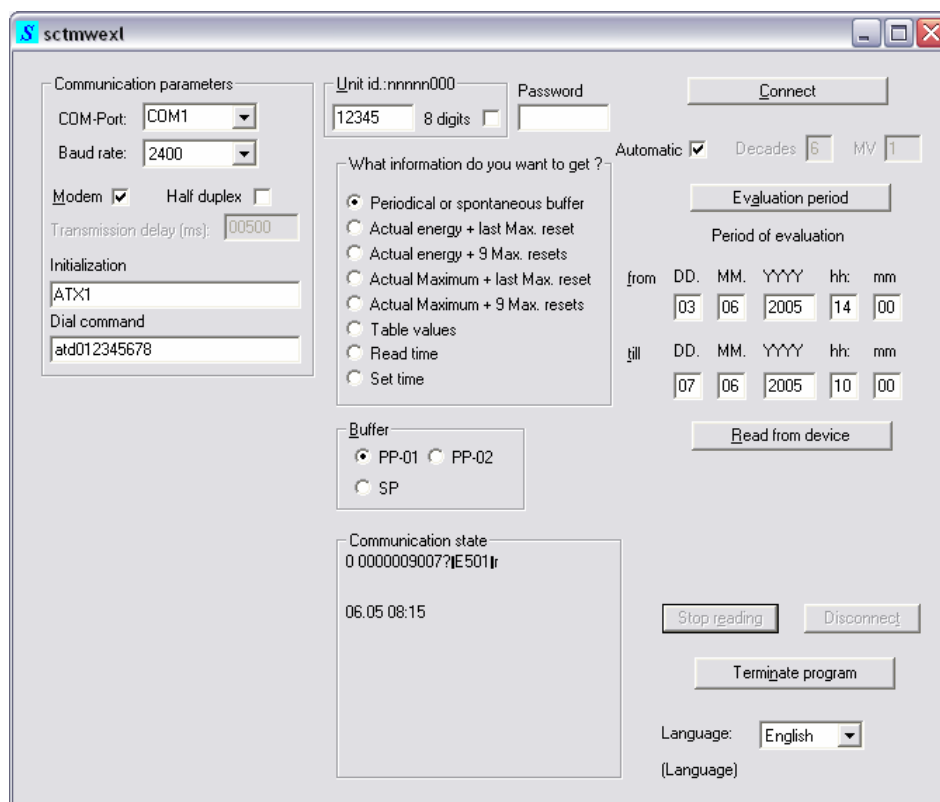
In order to install the reading software all files on the shipped disk or CD ROM need to be copied onto the hard disk drive of the PC or laptop computer (e.g. into the directory „SCTMWEXL“ or another). The following paragraphs explain how to install the software on a computer where it was previously not installed and no such directory exists.

Example: Installation from disk drive A: (source drive) onto hard disk drive C: (target drive on the hard disk), into a newly created directory named "SCTMWEXL".

1. Insert the floppy disk or CD ROM into the disk drive.
2. Start the MS Windows Explorer and select the root folder of the drive on which the reading software shall be installed (click on the drive symbol on the left-hand side of the screen).
3. Create a new folder named „SCTMWEXL“ on this drive (File – New – Folder) and two subdirectories named „DATA“ (for stored data) and „SYSTEM“ (for software settings).
4. Now select the disk drive (click on the symbol with the name „A:“ next to it).
5. Select all files on the right hand side of the screen and copy them into the newly created folder named „SCTMWEXL“.
6. The software is now installed on drive C: in the folder „SCTMWEXL“.

Starting the program

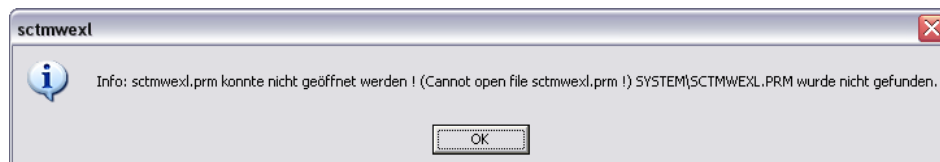
The program will be activated through the entry of the file name (**SCTMWEXL.EXE**). After starting the software following window appears:



The screenshot shows the main window of the SCTMWEXL program. It features several configuration sections:

- Communication parameters:** Includes dropdowns for COM-Port (COM1) and Baud rate (2400). It has checkboxes for Modem (checked) and Half duplex. A text field for Transmission delay (ms) is set to 00500.
- Initialization:** Includes text fields for ATX1 and Dial command (atd012345678).
- Unit id:** A text field containing nnnnn000 and a Password field.
- What information do you want to get?:** A list of radio buttons for data collection options: Periodical or spontaneous buffer (selected), Actual energy + last Max. reset, Actual energy + 9 Max. resets, Actual Maximum + last Max. reset, Actual Maximum + 9 Max. resets, Table values, Read time, and Set time.
- Buffer:** Radio buttons for PP-01 (selected), PP-02, and SP.
- Communication state:** A text area showing the current state: 0 0000009007?|E501|r and the timestamp 06.05 08:15.
- Buttons:** Connect, Evaluation period, Read from device, Stop reading, Disconnect, and Terminate program.
- Other controls:** Automatic (checked), Decades (6), MV (1), and a Language dropdown menu set to English.

Note: After the first start (!) of the program following message appears:



The screenshot shows an information dialog box with the following text:

Info: sctmwexl.prm konnte nicht geöffnet werden ! (Cannot open file sctmwexl.prm !) SYSTEM\SCTMWEXL.PRM wurde nicht gefunden.

An OK button is located at the bottom of the dialog.

Click "OK" for confirm.

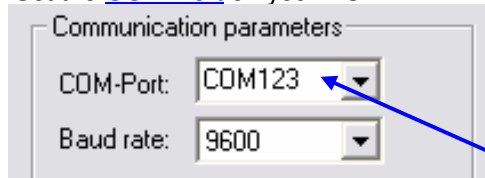
Finishes the program

Enter "ALT" and "F4" or "ESC".

Condition

Connect the PC with the device (e.g. DLX / DATAFW / MSR10 - RS232 interface) by RS232 cable.

- 1) Set the [language](#) (English or German).
- 2) Set the [COM Port](#) on your PC.



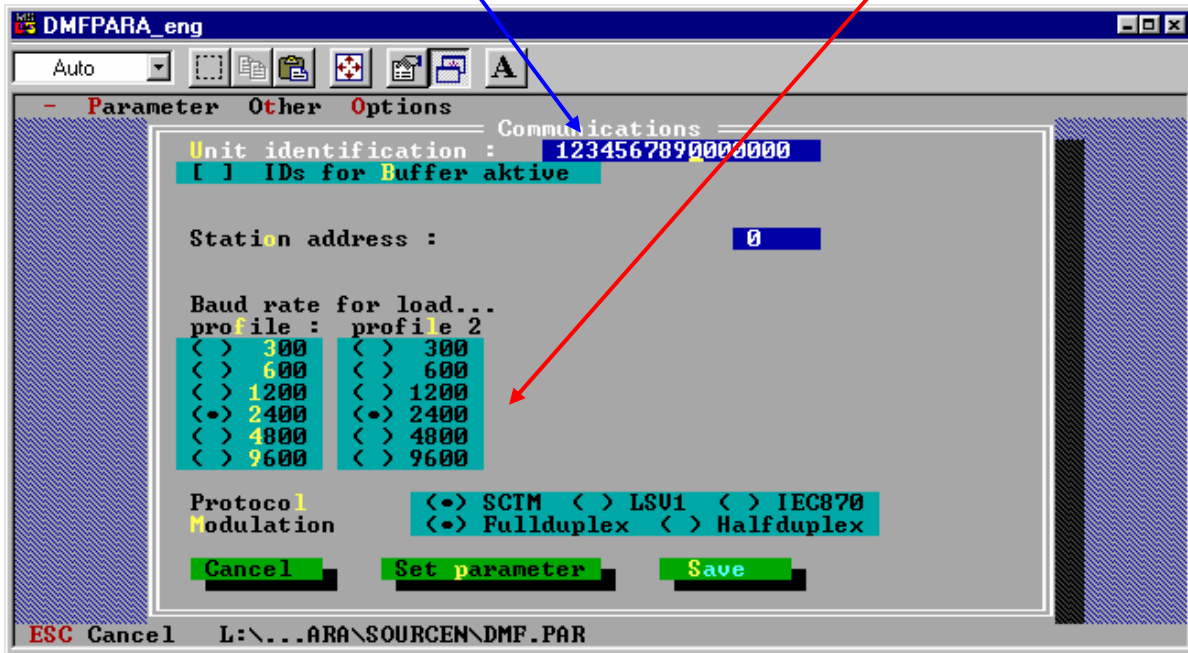
It is possible to write directly user-defined name for the COM-Port: e.g. COM123, COM8, InterfaceA ...

- 3) Set the [Baud rate](#) (see DMFPARA or DLXPARA, menu Parameter-Communications, e.g. 9600, 2400...).
- 4) If you have an optional modem: click „[Modem](#)” and set the modem parameter.
- 5) Set the (SCTM-) ID number (5 digits, optionally: 8 digit): „[Unit id](#).:“;
For DATAFW / DLC32 / DATAREG 48 and 32C: the first five (or eight) digits from the unit identification, e.g. 12345
For DLX: Unit identification for SCTM Protocol
- 6) Activate communication (connection between PC and the device): click „[Connect](#)“.
- 7) Set the measurement data „[What information do you want to get](#)“:
 - Periodical or spontaneous buffer
 - Actual energy + last Max. reset (only for DLX device)
 - Actual energy + 9 Max. resets (only for DLX device)
 - Actual Maximum + last Max. reset (only for DLX device)
 - Actual Maximum + 9 Max. resets (only for DLX device)
 - Table values
 - Read time
 - Set time (to next full minute): PC-Time or edited time with year, month, day, hour and minute
e.g.: Read the periodic buffer: „[PP-01](#)”, „[PP-02](#)” or spontaneous SP: „[Buffer](#)”, e.g. „[PP-01](#)“
- 8) Set the „[Automatic](#)”-Flag (possible for DATAFW, DLC32, DLX, 7FMS1 if „[PP-01](#)” or „[PP-02](#)” is active) or set the number of decades and metered values (“MV”) manually
- 9) Read the evaluation period: „[Evaluation period](#)“
- 10) Change the evaluation time (from - till)
- 11) Read data: „[Read from device](#)“: the data (text file) will be saved automatically into the subdirectory: **"DATA"**.
Names of the file (examples):
P1_12345.TXT for periodic buffer 1 and unit ID 12345
P2_00000.TXT for periodic buffer 2 and unit ID 00000
SP_11111.TXT for spontaneous buffer and unit ID 11111
TAB00001.TXT for table values and unit ID 00001

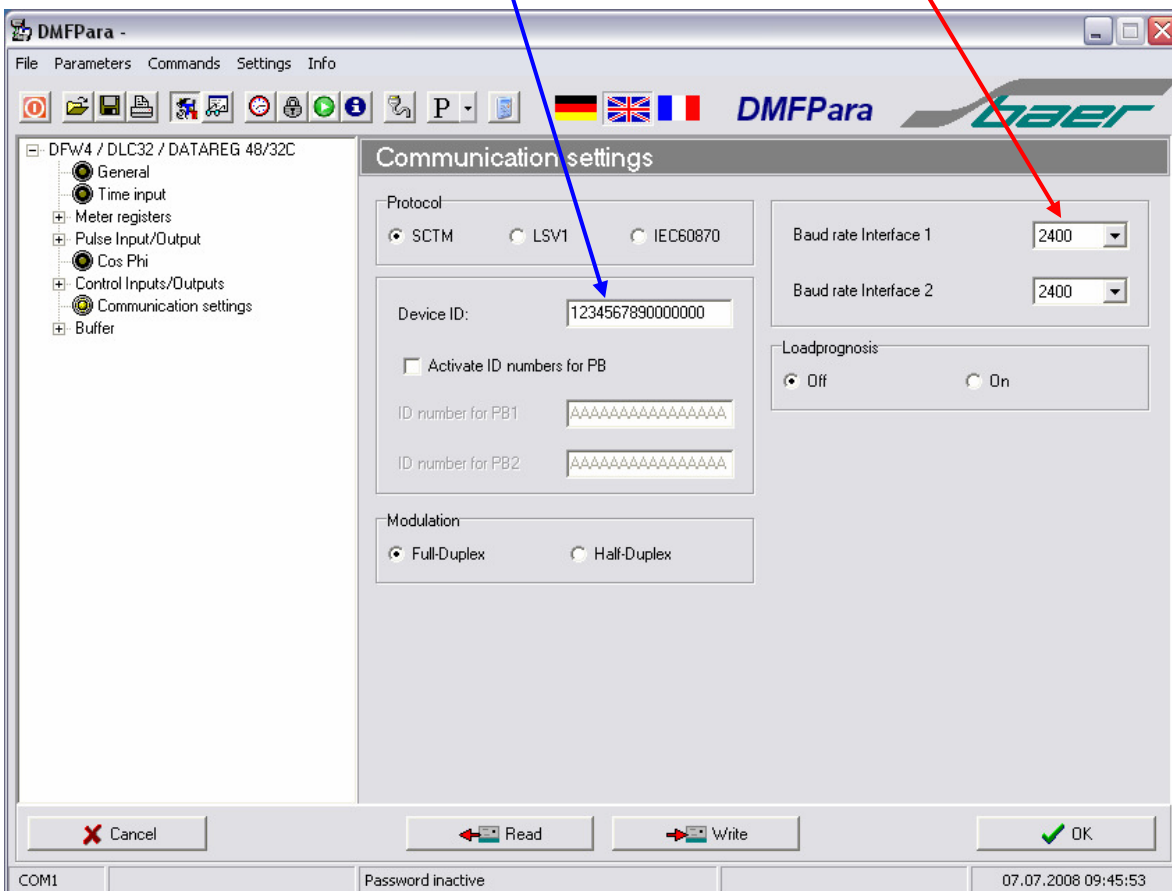
Note: The software settings (e.g. COM-Port, baud rate...) will be saved into the subdirectory: **"SYSTEM"** in to the file **"SCTMWEXL.PRM"**

Communication settings in the parameterization software **DMFPARA** (for DATAFW / DLC32 / DATAREG 48 and 32C):

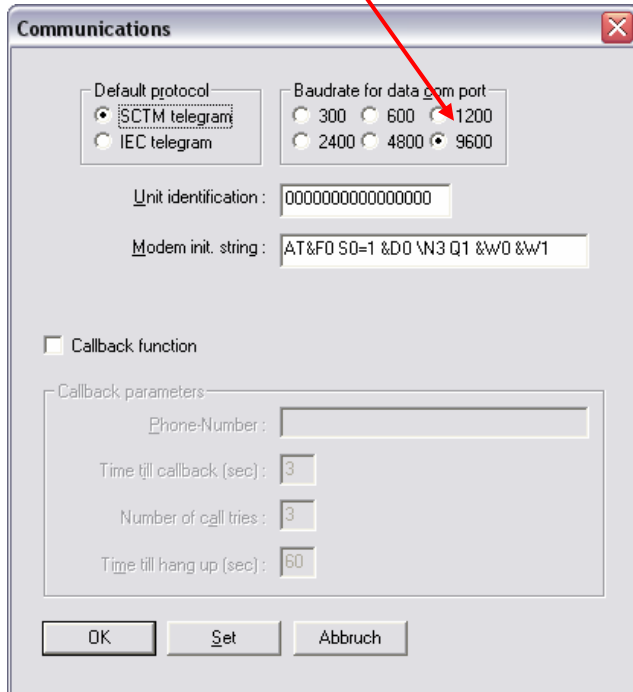
Version 1 (DOS) with unit ID "12345" and baud rate 2400 baud:



Version 2 (Windows) with unit ID "12345" and baud rate 2400 baud:



Settings in the parameterization software **DLXPARA** with unit ID "12345" and baud rate **9600** baud:



Communications

Default protocol:
 SCTM telegram
 IEC telegram

Baudrate for data com port:
 300 600 1200
 2400 4800 9600

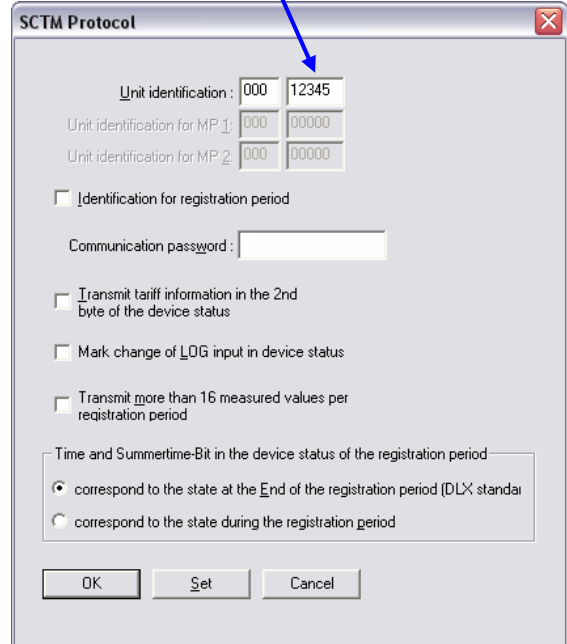
Unit identification: 0000000000000000

Modem init. string: AT&F0 S0=1 &D0 \N3 Q1 &W0 &W1

Callback function

Callback parameters:
Phone-Number:
Time till callback (sec): 3
Number of call tries: 3
Time till hang up (sec): 60

OK Set Abbruch



SCTM Protocol

Unit identification: 000 12345

Unit identification for MP 1: 000 000000

Unit identification for MP 2: 000 000000

Identification for registration period

Communication password:

Transmit tariff information in the 2nd byte of the device status

Mark change of LOG input in device status

Transmit more than 16 measured values per registration period

Time and Summertime-Bit in the device status of the registration period:
 correspond to the state at the End of the registration period (DLX standard)
 correspond to the state during the registration period

OK Set Cancel

Examples

1. Example for periodic buffer PP-01 - File DATA\P1_12345.TXT:

```
01.01.00 00:00 0040 002174 001519 000000 000000 000000 000000 000000
01.01.00 00:15 0040 002174 001520 000000 000000 000000 000000 000000
01.01.00 00:30 0040 002174 001519 000000 000000 000000 000000 000000
01.01.00 00:45 0040 002148 001512 000000 000000 000000 000000 000000
01.01.00 01:00 0040 002126 001487 000000 000000 000000 000000 000000
```

....

Column 1: Date

Column 2: Time

Column 3: Device status

Column 4 to 10: Data (e.g.: Input 1, 2, 3, 4, 5, 6, 7)

2. Example for spontaneous buffer SP - File DATA\Sp_12345.TXT:

```
24D198010100000003181253
```

```
43A1000902085005103          0  03/02
```

```
43A1000902121305104        03/02  0
```

```
24A300092110090009211014
```

...

Line 1: Set time (D1) old time (19)98.01.01 00:00, new time (20)00.03.18 12:53

Line 2: Alarm on (A1) (0 → 03/02)

Line 3: Alarm off (A1) (03/02 → 0)

Line 4: Power failure (A3) from (20)00.09.21 10:09 to (20)00.09.21 10:14

3. Example for energy values (billing data) - File DATA\A9R12345.TXT (only for DLX):

Date	Time	Input	Total	Tariff1	Tariff2
29.09.00	10:38	Z01	01801204	01801204	00000000
		Z02	00000003	00000003	00000000
		Z03	00000000	00000000	00000000
		Z04	00000000	00000000	00000000
01.09.00	00:00	Z01	01801204	01801204	00000000
		Z02	00000003	00000003	00000000
		Z03	00000000	00000000	00000000
		Z04	00000000	00000000	00000000
01.08.00	00:00	Z01	01801204	01801204	00000000
		Z02	00000003	00000003	00000000
		Z03	00000000	00000000	00000000
		Z04	00000000	00000000	00000000

**4. Example for maximum values (billing data) - File DATA\M1R12345.TXT
(only for DLX):**

Date	Time	Input	Value (T1)	Date T1	Time T1	Value (T2)	Date T2	Time T2
29.09.00	10:38	Z01	00000015	01.09.00	12:00	00000001	01.09.00	01:00
		Z02	00000022	01.09.00	12:00	00000002	01.09.00	02:00
		Z03	00000033	01.09.00	13:00	00000003	01.09.00	01:15
		Z04	00000044	03.09.00	09:00	00000004	10.09.00	22:30
01.09.00	00:00	Z01	00000015	01.08.00	15:15	00000011	01.08.00	01:00
		Z02	00000027	01.08.00	12:30	00000022	01.08.00	02:30
		Z03	00000031	01.08.00	15:00	00000023	01.08.00	01:15
		Z04	00000049	03.08.00	08:45	00000034	10.08.00	22:30