











































## TIMEBANDS-TARIFF PERIOD 8

Register HEX	Word	Description	Range	Reset
\$31B6	3	Hours and Minutes and band of begin the 1 <sup>st</sup> tariff band	(1)	NO
\$31B9	3	Hours and Minutes and band of begin the 2 <sup>nd</sup> tariff band	(1)	NO
\$31BC	3	Hours and Minutes and band of begin the 3 <sup>rd</sup> tariff band	(1)	NO
\$31BF	3	Hours and Minutes and band of begin the 4 <sup>th</sup> tariff band	(1)	NO
\$31C2	3	Hours and Minutes and band of begin the 5 <sup>th</sup> tariff band	(1)	NO
\$31C5	3	Hours and Minutes and band of begin the 6 <sup>th</sup> tariff band	(1)	NO
\$31C8	3	Hours and Minutes and band of begin the 7 <sup>th</sup> tariff band	(1)	NO
\$31CB	3	Hours and Minutes and band of begin the 8 <sup>th</sup> tariff band	(1)	NO
\$31CE	1	DAY selecting	(2)	NO
\$31CF	1	MONTH selecting	(3)	NO

## TIMEBANDS-TARIFF PERIOD 9

Register HEX	Word	Description	Range	Reset
\$31D0	3	Hours and Minutes and band of begin the 1 <sup>st</sup> tariff band	(1)	NO
\$31D3	3	Hours and Minutes and band of begin the 2 <sup>nd</sup> tariff band	(1)	NO
\$31D6	3	Hours and Minutes and band of begin the 3 <sup>rd</sup> tariff band	(1)	NO
\$31D9	3	Hours and Minutes and band of begin the 4 <sup>th</sup> tariff band	(1)	NO
\$31DC	3	Hours and Minutes and band of begin the 5 <sup>th</sup> tariff band	(1)	NO
\$31DF	3	Hours and Minutes and band of begin the 6 <sup>th</sup> tariff band	(1)	NO
\$31E2	3	Hours and Minutes and band of begin the 7 <sup>th</sup> tariff band	(1)	NO
\$31E5	3	Hours and Minutes and band of begin the 8 <sup>th</sup> tariff band	(1)	NO
\$31E8	1	DAY selecting	(2)	NO
\$31E9	1	MONTH selecting	(3)	NO

## TIMEBANDS-TARIFF PERIOD 10

Register HEX	Word	Description	Range	Reset
\$31EA	3	Hours and Minutes and band of begin the 1 <sup>st</sup> tariff band	(1)	NO
\$31ED	3	Hours and Minutes and band of begin the 2 <sup>nd</sup> tariff band	(1)	NO
\$31F0	3	Hours and Minutes and band of begin the 3 <sup>rd</sup> tariff band	(1)	NO
\$31F3	3	Hours and Minutes and band of begin the 4 <sup>th</sup> tariff band	(1)	NO
\$31F6	3	Hours and Minutes and band of begin the 5 <sup>th</sup> tariff band	(1)	NO
\$31F9	3	Hours and Minutes and band of begin the 6 <sup>th</sup> tariff band	(1)	NO
\$31FC	3	Hours and Minutes and band of begin the 7 <sup>th</sup> tariff band	(1)	NO
\$31FF	3	Hours and Minutes and band of begin the 8 <sup>th</sup> tariff band	(1)	NO
\$3202	1	DAY selecting	(2)	NO
\$3203	1	MONTH selecting	(3)	NO

HOLIDAYS (read only)

Register HEX	Word	Description
\$3400	1	day of holyday no. 1
\$3401	1	month of holyday no. 1
\$3402	1	day of holyday no. 2
\$3403	1	month of holyday no. 2
\$3404	1	day of holyday no. 3
\$3405	1	month of holyday no. 3
\$3406	1	day of holyday no. 4
\$3407	1	month of holyday no. 4
\$3408	1	day of holyday no. 5
\$3409	1	month of holyday no. 5
\$340A	1	day of holyday no. 6
\$340B	1	month of holyday no. 6
\$340C	1	day of holyday no. 7
\$340D	1	month of holyday no. 7
\$340E	1	day of holyday no. 8
\$340F	1	month of holyday no. 8
\$3410	1	day of holyday no. 9
\$3411	1	month of holyday no. 9
\$3412	1	day of holyday no. 10
\$3413	1	month of holyday no. 10
\$3414	1	day of holyday no. 11
\$3415	1	month of holyday no. 11
\$3416	1	day of holyday no. 12
\$3417	1	month of holyday no. 12
\$3418	1	day of holyday no. 13
\$3419	1	month of holyday no. 13
\$341A	1	day of holyday no. 14
\$341B	1	month of holyday no. 14
\$341C	1	day of holyday no. 15
\$341D	1	month of holyday no. 15
\$341E	1	day of holyday no. 16
\$341F	1	month of holyday no. 16
\$3420	1	day of holyday no. 17
\$3421	1	month of holyday no. 17
\$3422	1	day of holyday no. 18
\$3423	1	month of holyday no. 18
\$3424	1	day of holyday no. 19
\$3425	1	month of holyday no. 19
\$3426	1	day of holyday no. 20
\$3427	1	month of holyday no. 20
\$3428	1	day of holyday no. 21
\$3429	1	month of holyday no. 21
\$342A	1	day of holyday no. 22
\$342B	1	month of holyday no. 22
\$342C	1	day of holyday no. 23
\$342D	1	month of holyday no. 23
\$342E	1	day of holyday no. 24
\$342F	1	month of holyday no. 24
\$3430	1	day of holyday no. 25
\$3431	1	month of holyday no. 25
\$3432	1	day of holyday no. 26
\$3433	1	month of holyday no. 26
\$3434	1	day of holyday no. 27
\$3435	1	month of holyday no. 27
\$3436	1	day of holyday no. 28
\$3437	1	month of holyday no. 28
\$3438	1	day of holyday no. 29
\$3439	1	month of holyday no. 29
\$343A	1	day of holyday no. 30

\$343B	1	month of holyday no. 30
\$343C	1	day of holyday no. 31
\$343D	1	month of holyday no. 31
\$343E	1	day of holyday no. 32
\$343F	1	month of holyday no. 32
\$3440	1	day of holyday no. 33
\$3441	1	month of holyday no. 33
\$3442	1	day of holyday no. 34
\$3443	1	month of holyday no. 34
\$3444	1	day of holyday no. 35
\$3445	1	month of holyday no. 35
\$3446	1	day of holyday no. 36
\$3447	1	month of holyday no. 36
\$3448	1	day of holyday no. 37
\$3449	1	month of holyday no. 37
\$344A	1	day of holyday no. 38
\$344B	1	month of holyday no. 38
\$344C	1	day of holyday no. 39
\$344D	1	month of holyday no. 39
\$344E	1	day of holyday no. 40
\$344F	1	month of holyday no. 40

GENERIC COUNTERS VALUES- Double format

Register HEX	Word	Description	Range	Reset
\$2B00	4	Generic Counter 1 Value	0+99999999.9	NO
\$2B02	4	Generic Counter 2 Value	0+99999999.9	NO
\$2B04	4	Generic Counter 3 Value	0+99999999.9	NO
\$2B06	4	Generic Counter 4 Value	0+99999999.9	NO
\$2B08	4	Generic Counter 5 Value	0+99999999.9	NO
\$2B0A	4	Generic Counter 6 Value	0+99999999.9	NO
\$2B0C	4	Generic Counter 7 Value	0+99999999.9	NO
\$2B0E	4	Generic Counter 8 Value	0+99999999.9	NO

GENERIC COUNTERS SETTINGS

Register HEX	Word	Description	Range	Reset
\$2B10	7	Generic Counter 1 Setting	(*)	NO
\$2B12	7	Generic Counter 2 Setting	(*)	NO
\$2B14	7	Generic Counter 3 Setting	(*)	NO
\$2B16	7	Generic Counter 4 Setting	(*)	NO
\$2B18	7	Generic Counter 5 Setting	(*)	NO
\$2B1A	7	Generic Counter 6 Setting	(*)	NO
\$2B1C	7	Generic Counter 7 Setting	(*)	NO
\$2B1E	7	Generic Counter 8 Setting	(*)	NO

(\*)

Description:

Byte(s) Read/Write

1: Counter (i) -> Digital Input association

2: Counter's name type (0=kWh+; 1=kWh-; 2=kVArh+; 3=kVArh-; 4=Water; 5=Gas; 6=User.)

3÷10: Counter's name (ASCII codes)

11÷14: Pulse's weight (0÷1999.99)

**ONLY WRITE NQM PARAMETERS (Function code \$10)**

Register HEX	Word	Description	Range	Reset
\$1A90	1	DELETING RAM	9=deleting all archives	YES
\$1A91	1	SET RAM STORING	0=nothing 1=15' 2=min/max 3=15'+min/max 4=armonics 5=15'+armonics 6=min/max+armonics 7=15'+min/max+armonics 8=sample 9=15'+sample A=min/max+sample B=15'+min/max+sample C=armonics+sample D=15'+armonics+sample E=min/max+armonics+sample F=15'+min/max+armonics+sample	YES
\$1A92	1	15' STORED IN RAM	0=nothing 1=delete first one	YES
\$1A93	1	MIN/MAX STORED IN RAM	0=nothing 1=sending the following block 2=deleting all min/max value in RAM	NO
\$1A94	1	HARMONICS STORED IN RAM	0=nothing 1=delete first one	NO
\$1A95	1	SAMPLES STORED IN RAM	0=nothing 1=delete first one	NO
\$1A96	1	CONSUMPTION ENERGY COUNTER	1=reset count B0...B3 2=reset timebands 3=reset all	YES
\$1A97	1	MIN/MAX VALUES	1=reset all	NO

**DIGITAL OUT 1**

Register HEX	Word	Description	Range	Reset
\$1AA0	1	MODE	0= off 1= upper limit 2= lower limit 3= pulse 4= band 5= always on	YES
\$1AA1	1	VARIABLE	80-BC	YES
\$1AA2	1	PULSE COEFFICIENT	0÷9.999	YES
\$1AA3	1	PULSE DURATION (msec)	50÷999	YES
\$1AA4	1	INTERVENTION VALUE (integer)		YES
\$1AA5	1	HYSTERISIS	0-99	YES
\$1AA6	1	DELAY TIME in sec	0-999	YES
\$2AA8	2	FLOAT INTERVENTION VALUE		YES
\$2AAA	2	FLOAT INF. BAND VALUE		YES
\$2AAC	2	FLOAT SUP.BAND VALUE		YES

## DIGITAL OUT 2

Register HEX	Word	Description	Range	Reset
\$1AB0	1	MODE	0= off 1= upper limit 2= lower limit 3= pulse 4= band 5= always on	YES
\$1AB1	1	VARIABLE	80-BC	YES
\$1AB2	1	PULSE COEFFICIENT	0+9.999	YES
\$1AB3	1	PULSE DURATION (msec)	50+999	YES
\$1AB4	1	INTERVENTION VALUE		YES
\$1AB5	1	HYSTERISIS	0-99	YES
\$1AB6	1	DELAY TIME in sec	0-999	YES
\$2AB8	2	FLOAT INTERVENTION VALUE		YES
\$2ABA	2	FLOAT INF. BAND VALUE		YES
\$2ABC	2	FLOAT SUP.BAND VALUE		YES

## DIGITAL OUT 3

Register HEX	Word	Description	Range	Reset
\$1AC0	1	MODE	0= off 1= upper limit 2= lower limit 3= pulse 4= band 5= always on	YES
\$1AC1	1	VARIABLE	80-BC	YES
\$1AC2	1	PULSE COEFFICIENT	0+9.999	YES
\$1AC3	1	PULSE DURATION (msec)	50+999	YES
\$1AC4	1	INTERVENTION VALUE		YES
\$1AC5	1	HYSTERISIS	0-99	YES
\$1AC6	1	DELAY TIME in sec	0-999	YES
\$2AC8	2	FLOAT INTERVENTION VALUE		YES
\$2ACA	2	FLOAT INF. BAND VALUE		YES
\$2ACC	2	FLOAT SUP.BAND VALUE		YES

## DIGITAL OUT 4

Register HEX	Word	Description	Range	Reset
\$1AD0	1	MODE	0= off 1= upper limit 2= lower limit 3= pulse 4= band 5= always on	YES
\$1AD1	1	VARIABLE	80-BC	YES
\$1AD2	1	PULSE COEFFICIENT	0+9.999	YES
\$1AD3	1	PULSE DURATION (msec)	50+999	YES
\$1AD4	1	INTERVENTION VALUE		YES
\$1AD5	1	HYSTERISIS	0-99	YES
\$1AD6	1	DELAY TIME in sec	0-999	YES
\$2AD8	2	FLOAT INTERVENTION VALUE		YES
\$2ADA	2	FLOAT INF. BAND VALUE		YES
\$2ADC	2	FLOAT SUP.BAND VALUE		YES



## DIGITAL OUT 5

Register HEX	Word	Description	Range	Reset
\$1A70	1	MODE	0= off 1= upper limit 2= lower limit 3= pulse 4= band 5= always on	YES
\$1A71	1	VARIABLE	80-BC	YES
\$1A72	1	PULSE COEFFICIENT	0+9.999	YES
\$1A73	1	PULSE DURATION (msec)	50+999	YES
\$1A74	1	INTERVENTION VALUE		YES
\$1A75	1	HYSTERISIS	0-99	YES
\$1A76	1	DELAY TIME in sec	0-999	YES
\$2AE8	2	FLOAT INTERVENTION VALUE		YES
\$2AEA	2	FLOAT INF. BAND VALUE		YES
\$2AEC	2	FLOAT SUP.BAND VALUE		YES

## DIGITAL OUT 6

Register HEX	Word	Description	Range	Reset
\$1A80	1	MODE	0= off 1= upper limit 2= lower limit 3= pulse 4= band 5= always on	YES
\$1A81	1	VARIABLE	80-BC	YES
\$1A82	1	PULSE COEFFICIENT	0+9.999	YES
\$1A83	1	PULSE DURATION (msec)	50+999	YES
\$1A84	1	INTERVENTION VALUE		YES
\$1A85	1	HYSTERISIS	0-99	YES
\$1A86	1	DELAY TIME in sec	0-999	YES
\$2AF8	2	FLOAT INTERVENTION VALUE		YES
\$2AFA	2	FLOAT INF. BAND VALUE		YES
\$2AFC	2	FLOAT SUP.BAND VALUE		YES

## ANALOG OUT1

Register HEX	Word	Description	Range	Reset
\$1AE0	1	MODE	0=0-20mA mono 1=4-20mA mono	YES
\$1AE1	1	VARIABLE	80..BC	YES
\$1AE2	1	MIN LIMIT VALUE	YES	
\$1AE3	1	MAX.LIMIT VALUE	YES	

## ANALOG OUT 2

Register HEX	Word	Description	Range	Reset
\$1AE8	1	MODE	0=0-20mA mono 1=4-20mA mono	YES
\$1AE9	1	VARIABLE	80..BC	YES
\$1AEA	1	MIN LIMIT VALUE	YES	
\$1AEB	1	MAX.LIMIT VALUE	YES	

## ANALOG OUT 3

Register HEX	Word	Description	Range	Reset
\$1AF0	1	MODE	0=0-20mA mono 1=4-20mA mono	YES
\$1AF1	1	VARIABLE	80..BC	YES
\$1AF2	1	MIN LIMIT VALUE	YES	
\$1AF3	1	MAX.LIMIT VALUE	YES	

ANALOG OUT 4

Register HEX	Word	Description	Range	Reset
\$1AF8	1	MODE	0=0-20mA mono 1=4-20mA mono	YES
\$1AF9	1	VARIABLE	80..BC	YES
\$1AFA	1	MIN LIMIT VALUE	YES	
\$1AFB	1	MAX.LIMIT VALUE	YES	

DIGITAL IN 1

Register HEX	Word	Description	Range	Reset
\$1ADA	1	MODE	0= off 1= sync. RTC 2= Timeband (with Digital In 2)	YES

DIGITAL IN 2

Register HEX	Word	Description	Range	Reset
\$1ADB	1	MODE	0= off 1= sync. RTC 2= Timeband (with Digital In 2)	YES

**ADVICE:**PROGRAM OUTPUT PARAMETERS ALL AT THE SAME TIME TO PREVENT THE INSTRUMENT FROM RESETTING REPEATEDLY,THUS AVOIDING TIME WASTE