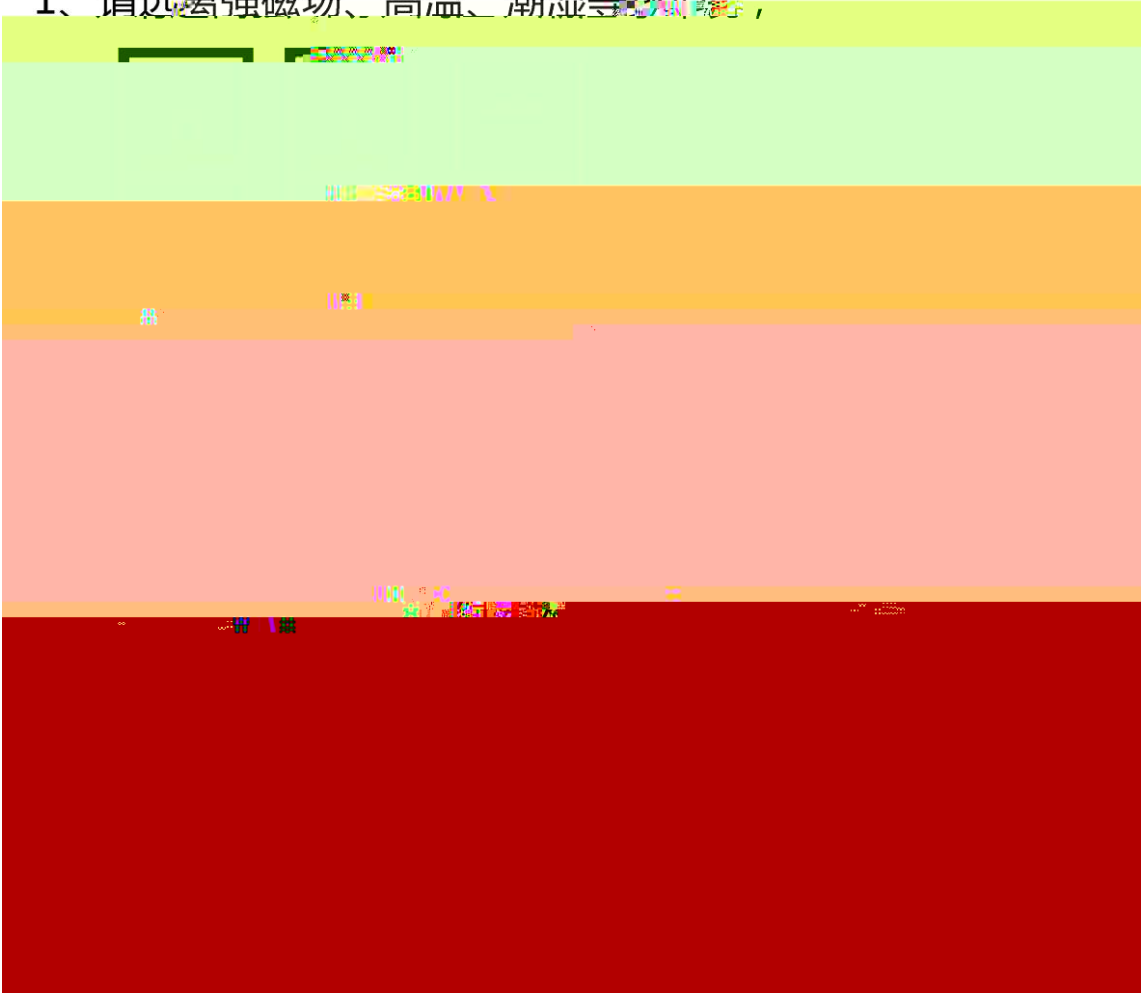


K-BUS

注意事项

1、请远离强磁场、高温、潮湿等环境；



1.
2.

.....1
.....
.....
.....
.....
.....

..... .

[illegible]

3

AC

LED

KNX

--

3

/

1

1 /2

--

1

AC

/

/

0 100%

0 100%

1

--

1

3

1 2

/

---		1	2	4	2		3point,
open and close	PWM		continuous, PWM	2	2	state-ON/OFF	4
			PWM		continuous, PWM	2	2
state-ON/OFF							

PWM

1byte

PWM

2

PWM

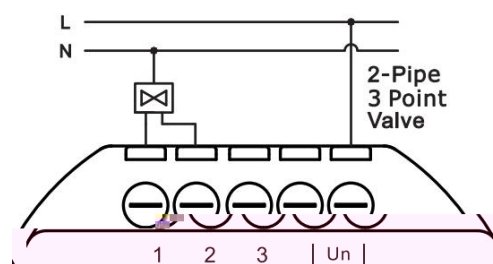
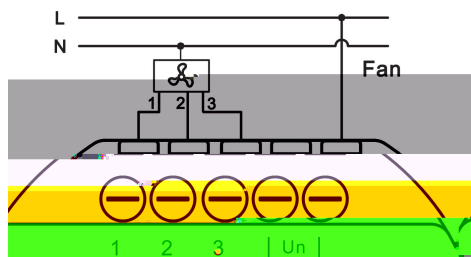
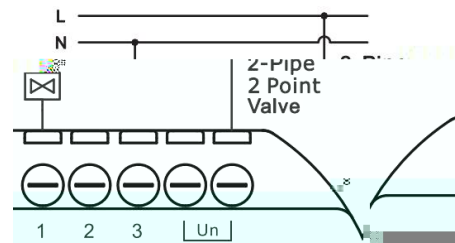
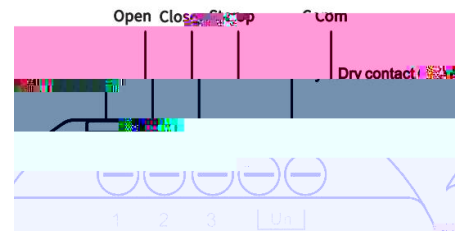
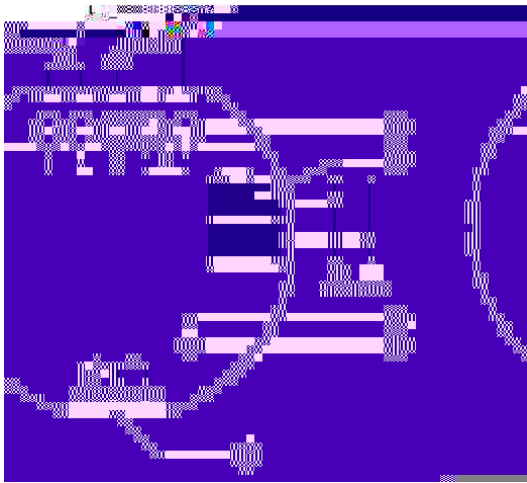
1bit

/

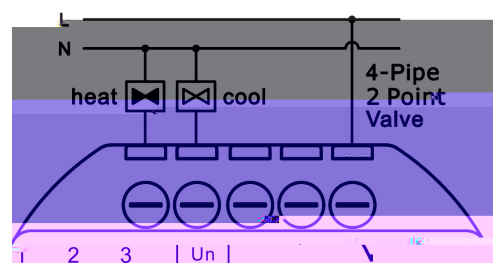
21-30V DC,		
<18.1mA/24V,<14.7mA/30V <441.0mW <24mA		
U _n	230V AC 50/60Hz	
I _n	6A	12A
16A/277V AC		
>10⁶ >5x10⁴ (16A 277VAC,)		
5V	12V	4mA
KNX	(0.8mm)	
		0.2-1.5mm ²
		0.2-2.5mm ²
		0.4N-m
/LED	≤5M	
LED		
-5 °C ... + 45 °C -25 °C ... + 55 °C - 25 °C ... + 70 °C		
<93%,		
80mm 86mm		

Multifunctional Actuator with Secure,3-Fold,Flush Mounted/1.0	104	250	250	250

2.



输入	1...8 — G	1...4 — G
LED	NG	5...8 — V
共阳极		



LED

KNX

/LED ,

G: GND

V: VCC

1...8: 1~8

Common Anode:

.1.

ETS

KNX

3

KNX

KNX



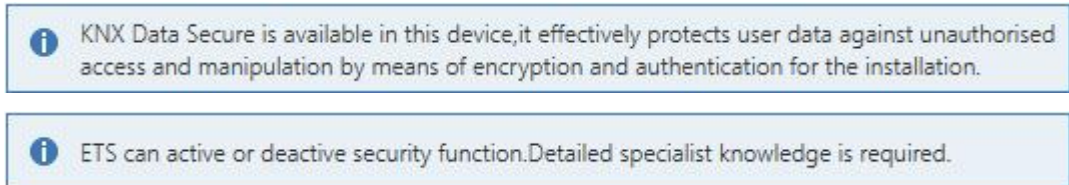
4.1 (1) "KNX Secure"

KNX

KNX

ETS

4.1(1)



KNX

ETS



FDSK

ETS



KNX

KNX

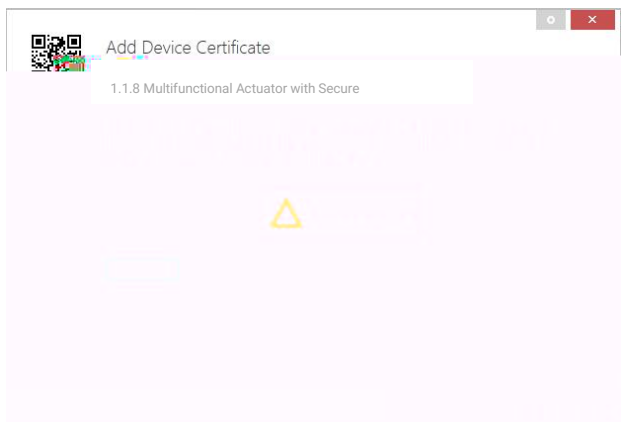
FDSK =

ETS

ETS

4.1 (2)

QR



4.1(2) Add Device Certificate

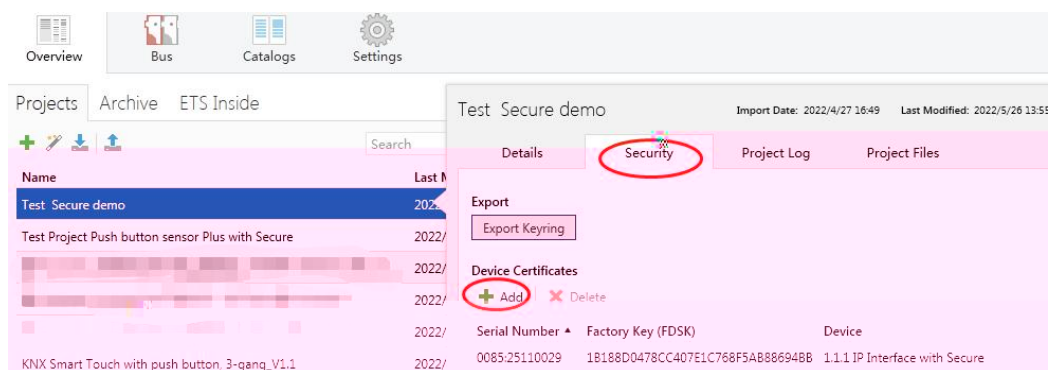
ETS

“Security”

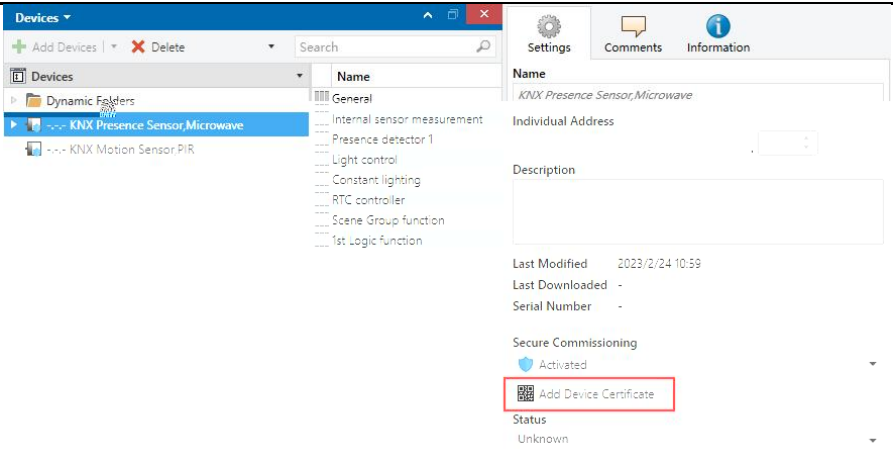
4.1(3)

“Add Device Certificate”

4.1(4)



4.1(3) Add Device Certificate



4.1(4) Add Device Certificate

FDSK

FDSK

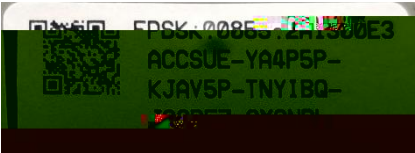
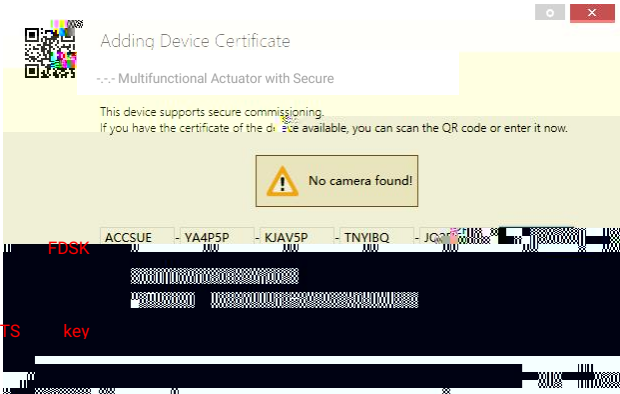
FDSK

ETS

4.1(5)

ETS

FDSK



4.1(5)

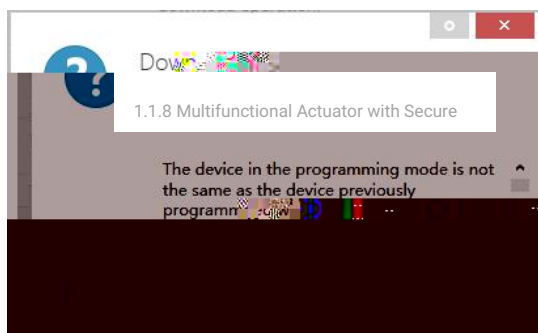
4.1(6)

“Yes”

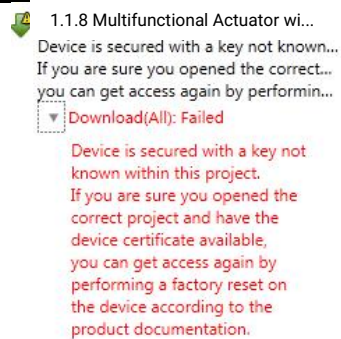
“Add Device Certificate”

FDSK

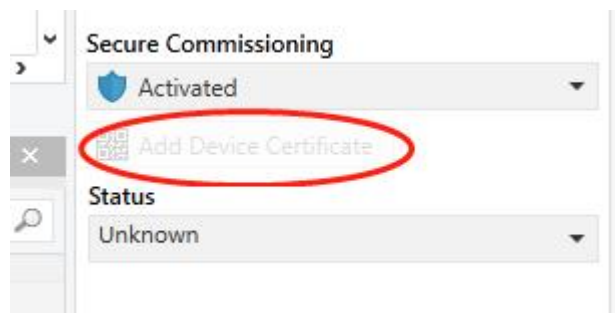
4.1(6)



4.1(6)



"Add Device Certificate"

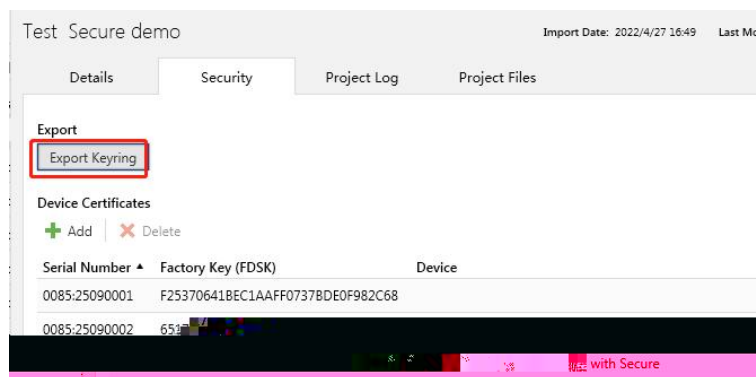


4.1(7)

ETS

4.1(8)

.knxkeys

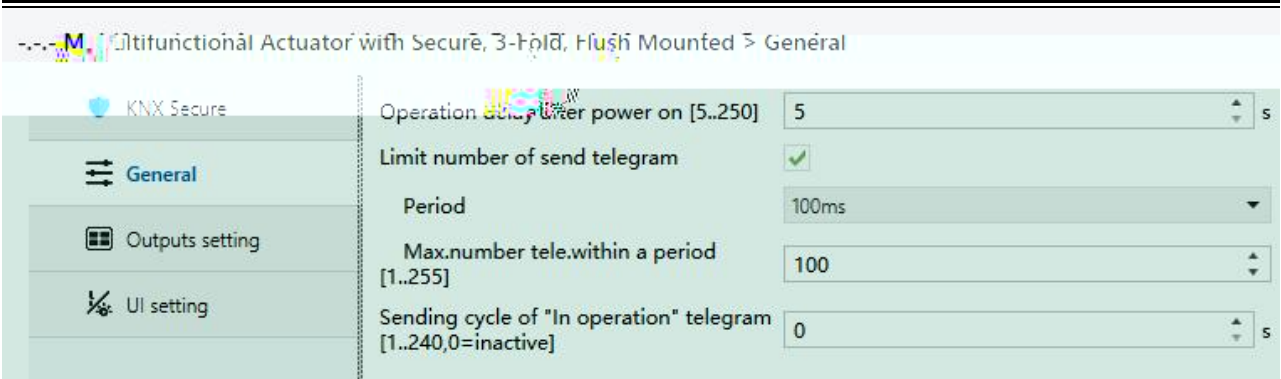


4.1(8)

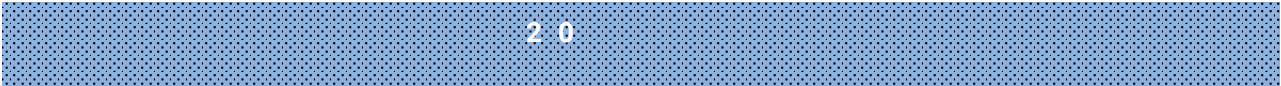
.2

"General"

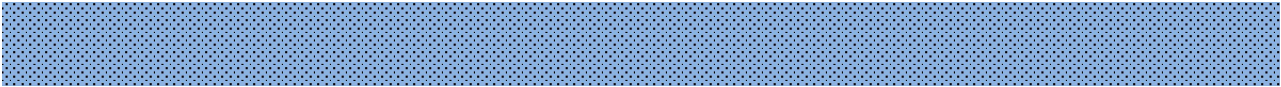
4.2



4.2 “General”



3s



“Period” “Max. Number of tele. within a period [1...255]”

100
00

10

. . 1..2

1 2



"0" "In

operation" "0" "In operation" "1"

0 2 0 0

4.3

KNX Secure

General

Outputs setting

Outputs config as

3 switch outputs

Output 1 Switch

Output 2 Switch

Output 3 Switch

--- Multifunctional Actuator with Secure, 3-Fold, Flush Mounting > Outputs setting

KNX Secure

General

Outputs config as 1 valve control 2-pipe and 1 switch outputs

Output 3 Switch ☐

Valve output is fixed for Output 1 if valve type is ON/OFF

KNX Secure

General

+

Outputs setting

Outputs config as

1 valve control 4-pipe and 1 switch outputs

Output 3 Switch

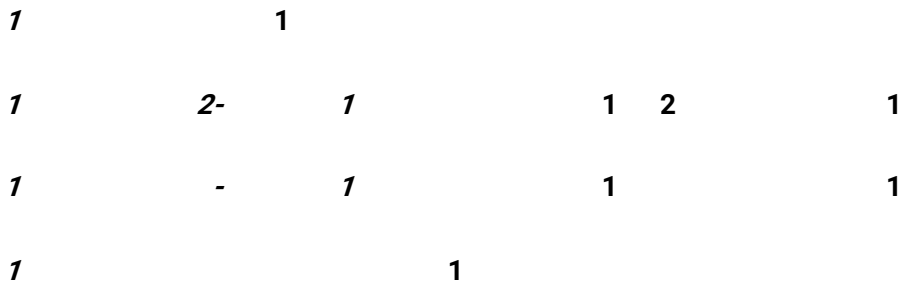
☐

Heat output is fixed for Output 1

Cool output is fixed for Output 2

4.3

Channel configuration



			/ /2-	-	
1	1		/		1
2	2		1&2, ' 2		2
			2- /)		

2

4

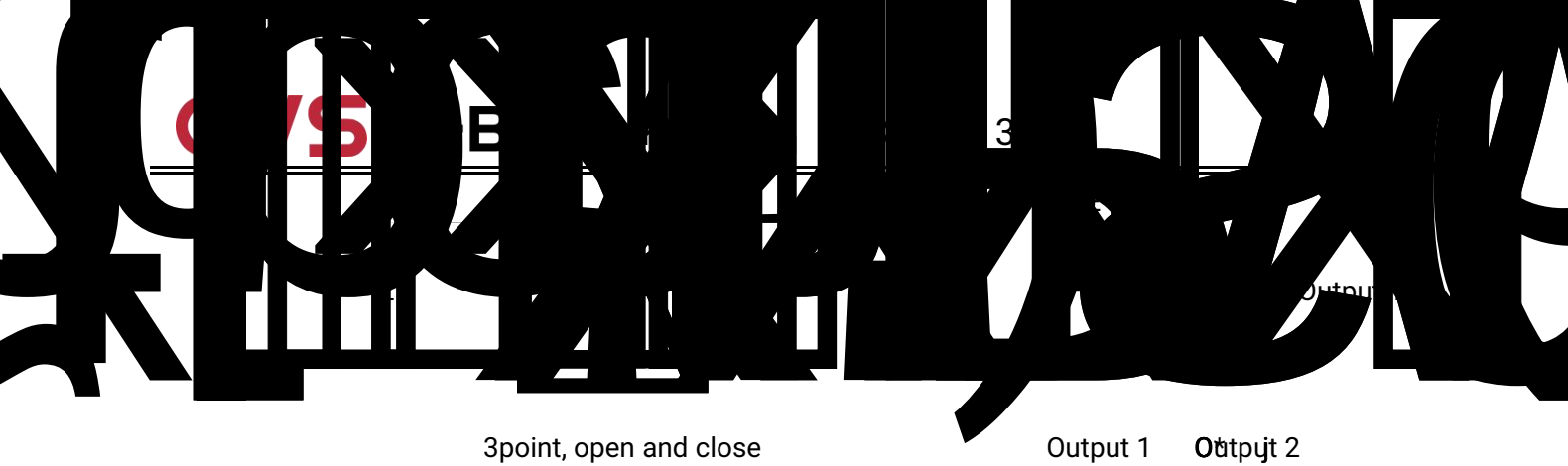
1 & 2



2



1 / **2**



3point, open and close

Output 1

Output 2

'Æt

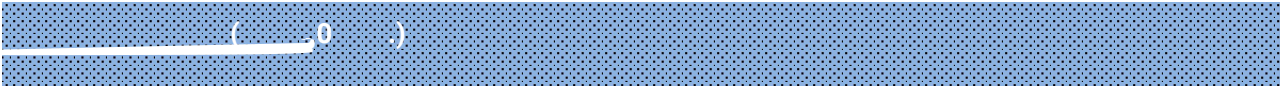
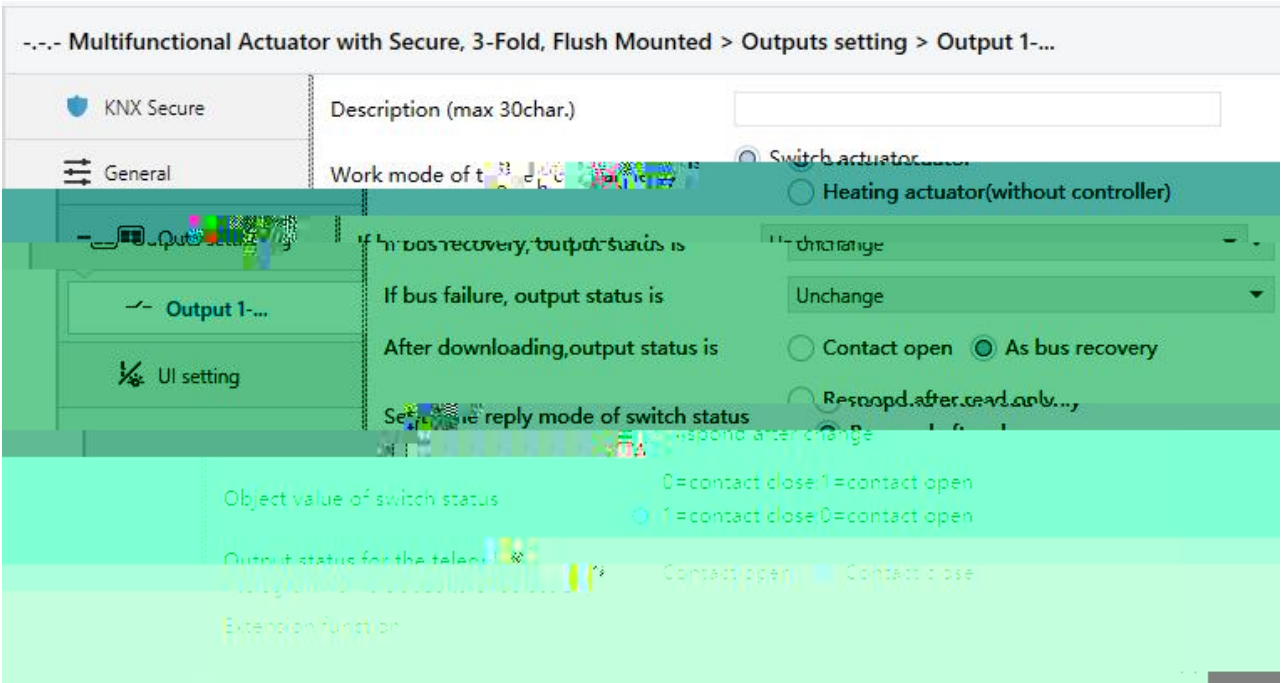
S`8%È-` (ÿ S dy... 18%È* @

. --

3

. .1

Output X Switch” 4.4.1 1



30



()

Switch Actuator

“Switch actuator”

Heating actuator without controller

4.4

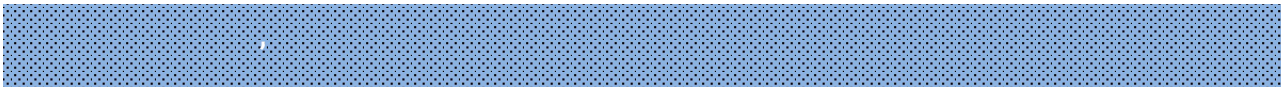


“Unchange”

“Contact open”

“Contact close”

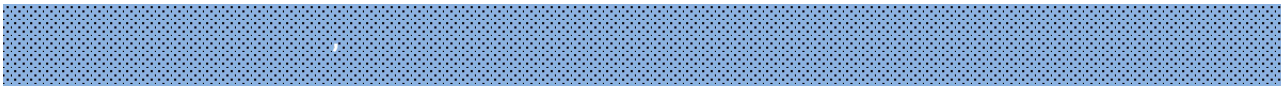
“As before as bus fail”



“Unchange”

“Contact open”

“Contact close”



“Contact open”

"As bus recovery"

"If bus recovery, contact is"

"Respond after read only"

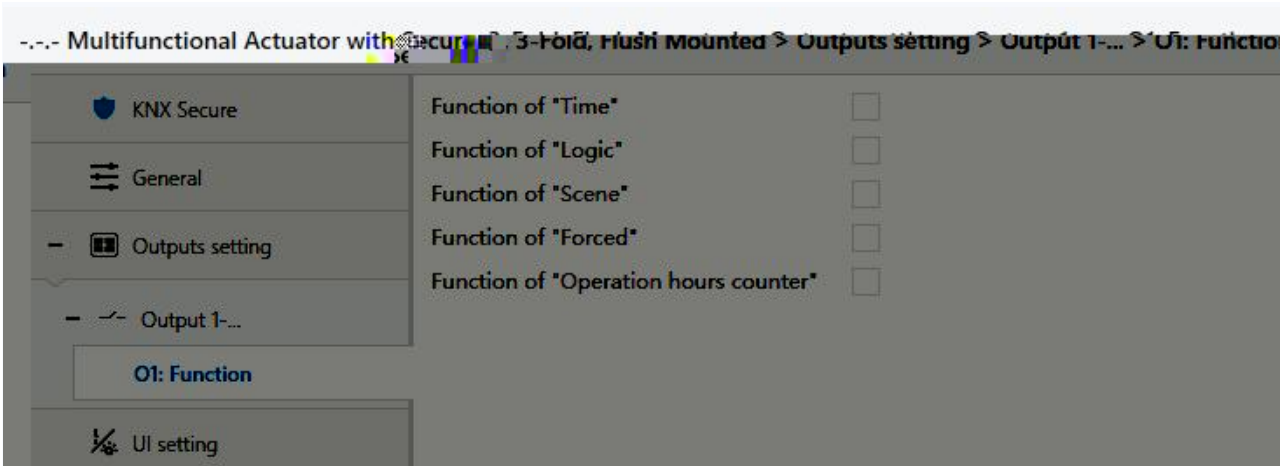
"Switch status" ☐

"Contact open"	1	0
"Contact close"	1	0
0	0	



"Output X: Function"

, 4.4.1(2)



4.4 .1(2) Output X: Function

“Enable time function”

Output X: Time - Delay

. .2.1

“ ”

4.4.2

“Delay function”

() -- 0...2 0 / 0...

0 2 0

0

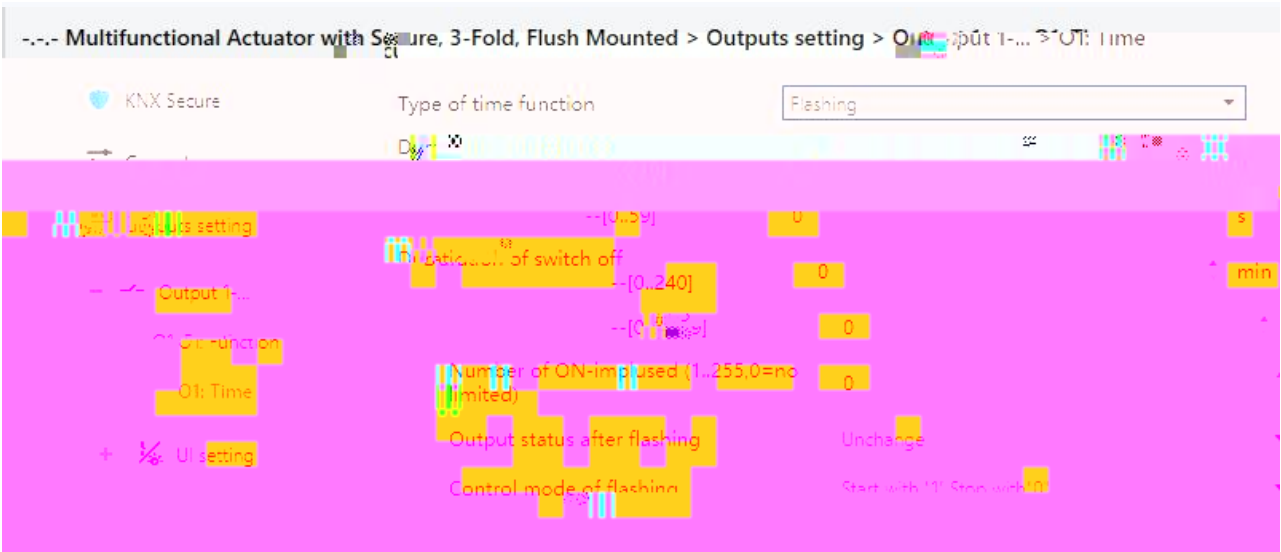
() -- 0...2 0 / 0...

0 2 0

0

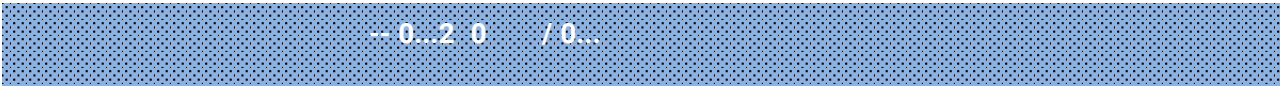
. .2.2

“Type of time function” “Flashing” 4.4.2.2



4.4.2.2 Output X: Time - Flashing

Flashing “Flashing function” “Duration of switch on” “Duration of switch off”



0...2 0

0...

-- 0...2 0 / 0...

0...2 0

0...

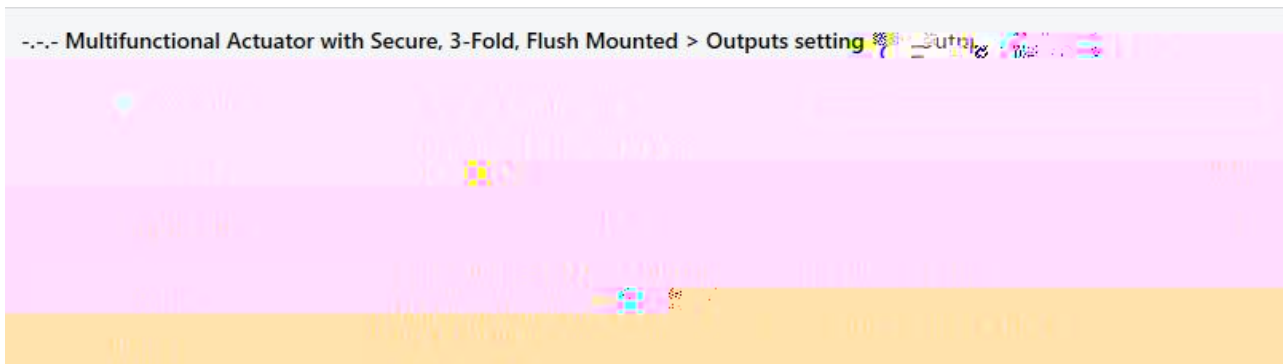
0't
9 0'0 WWAksi0

1...255 0 m

"Type of time function"

"Staircase"

4.4.2.3



4.4.2.3

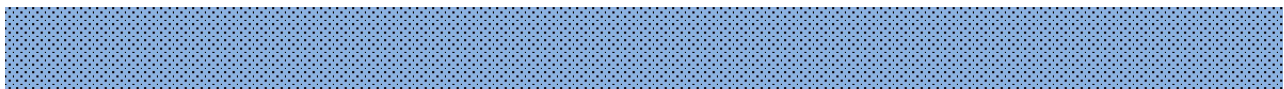
Output X: Time - Staircase

"Staircase function"



0 1000

0



1

0

1

0

0/1 ,

1 ,

0

"Start with '1' , Stop with '0'"

"1"

"0"

"Start with '1' , no reaction with '0'"

"1"

"0"

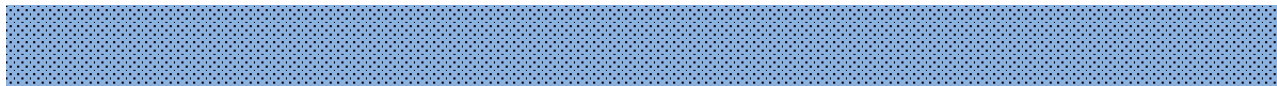
"Start with '0/1', can not be stop"

"0" "1"

"Start with '1', OFF with '0'",

"1"

"0"

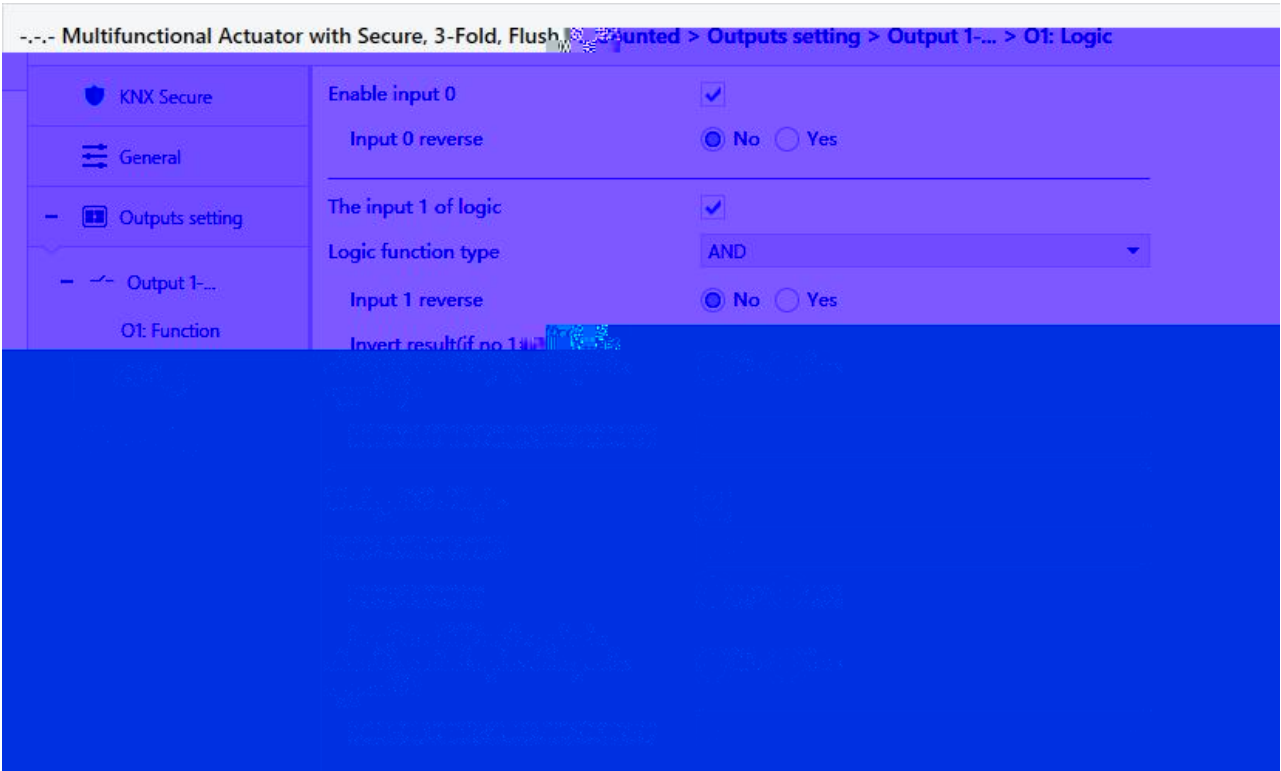


4.4.1(2) "Output X: Function"

"Function of "Logic" "

"Enable"

4.4.3

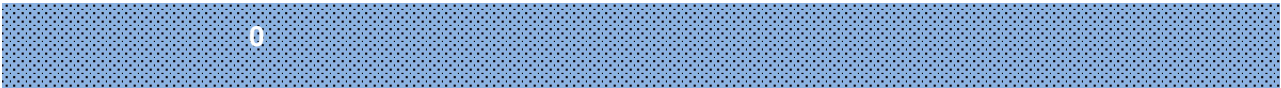
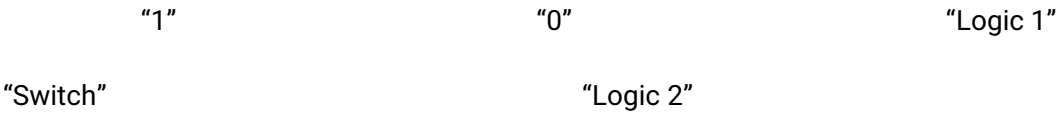


4.4.3

Output X: Logic

2

"Switch"



"Input 0"

"Input 0"

"Switch"

"Input 0"

0/1/2

Input 0/1/2

“Yes”

“No”

(1,2)

1 2

“Logic 1”

“Logic 2”

(AND, OR, XOR)

“GATE”

“GATE”

“1”

Input 1

1

Input 0

Input 2

1 Input 1

Input0/Input1

	Input0(Switch)	Input1	Result of Input 0/1	Input2	Output	
AND	0 0 1 1	0 1 0 1	0 0 0 1	0 1 0 1	0 0 0 1	1 1
OR	0 0 1 1	0 1 0 1	0 1 1 1	0 1 0 1	0 1 1 1	1 1
XOR	0 0 1 1	0 1 0 1	0 1 1 0	0 1 0 1	0 0 1 1	1.
GATE	0 0 1 1	Closed Open Closed Open	0 1	Closed Open Closed Open	0 1	open 1

1	"Input 1"	"Switch"	"Input 2"
2			
3			
4	(GATE)	Input2	Input1 Input0

(1 , 0)

"Yes"

"No"

1/2

"Logic 1/2"

"1" "0"

0

1

..

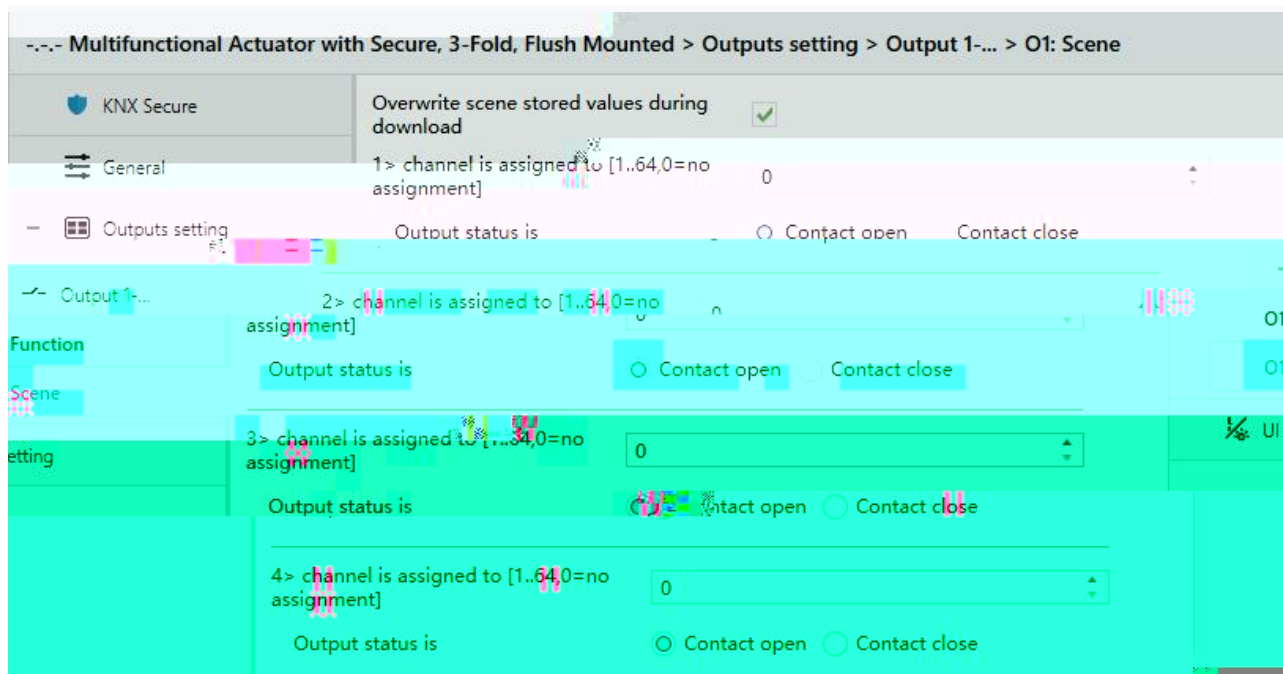
4.4.1(2) "Output X: Function"

"Function of "Scene" "

"Enable"

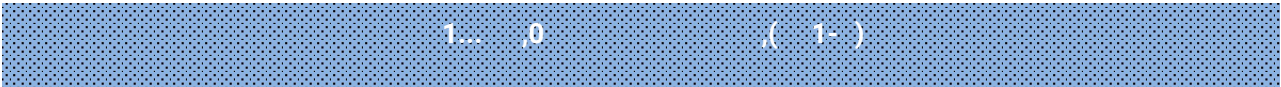
4.4.4

8



4.4.4

Output X: Scene



64

8

1...

0

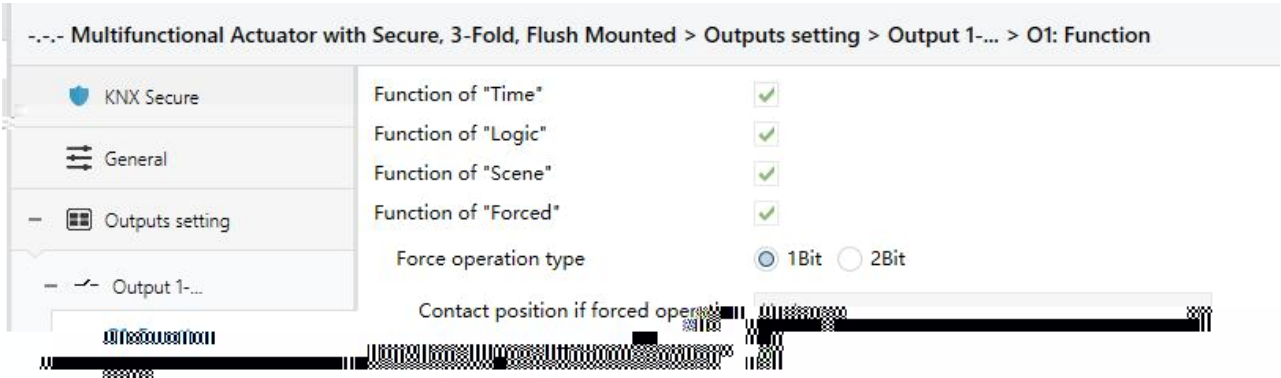
...

4.4.1(2) "Output X: Function"

"Function of "Forced" "

"Enable"

4.4.5



4.4.5

Output X Forced

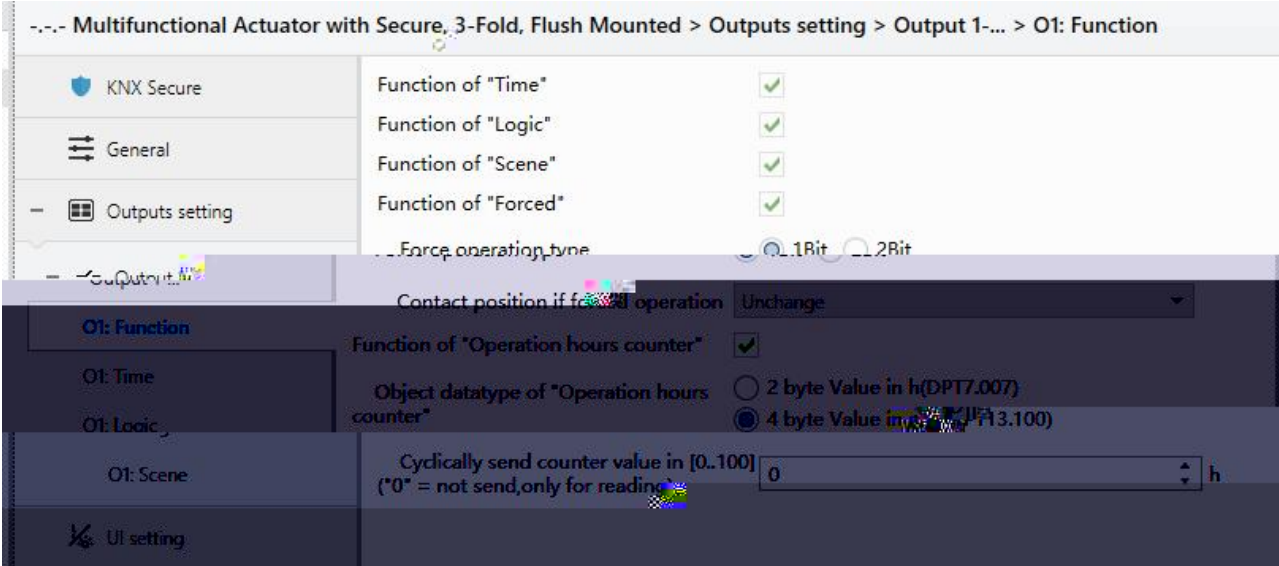
"Forced output"



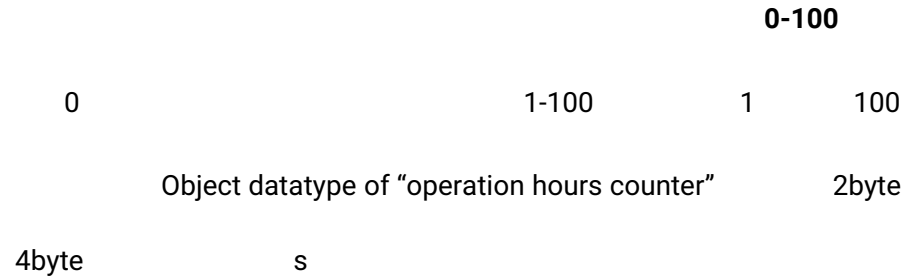
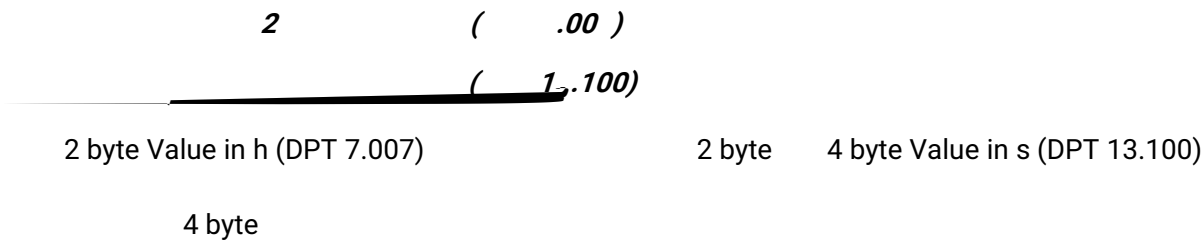
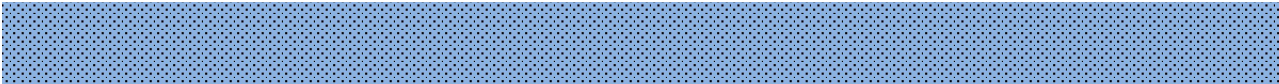
...

4.4.1(2) "Output X: Function" "Function of "Operation

hours counter" " "Enable" 4.4.6



4.4.6 Output X Operation hours counter



.. -- ()

Work mode of the channel is Heating actuator (without controller)

4.5(1) 4.5(2)

1bit 1byte 1bit

On-off control value 1byte Control value

(Continuous)

0%/OFF 100%/ON 0~100%

x%

--- Multifunctional Actuator with Secure, 3-Fold, Flush Mounted > Outputs setting > Output 1...

- KNX Secure - General - Outputs setting - Output 1... 111 setting	Description (max 30char.) Work mode of the channel is Valve type If bus failure, output status is If bus recovery, valve position PWM cycle time for continuous [60..65535] Control type Reply the status of contact state Function of monitoring Cyclic monitoring control value [0...65535] Valve position during fault Report fault status Function of forced operation Valve position during forced operation	☐ Switch actuator ☒ Heating actuator(without controller) ☒ Normal (de-energised closed) ☐ Inverted (de-energised open) Unchange Unchange 120 s ☒ 1bit (on-off control or PWM) ☐ 1byte (Continuous) Yes, 1=contact close; 0=contact open ☒ 120 s Unchange ☒ ☒ Unchange
--	---	--

4.5(1) Output X Heating actuator(without controller)_1bit on-off control or PWM

Multifunctional Actuator with Secure, 3-Fold, Flush Mounted > Outputs setting > Output 1-...

KNX Secure	Description (max 30char.)	
General	Work mode of the channel is	☐ Switch actuator ☒ Heating actuator(without controller)
Outputs setting	Valve type	☒ Normal (de-energised closed) ☐ Inverted (de-energised open)
Output 1-...	If bus failure, output status is	Unchange ▼
UI setting	If bus recovery, valve position	0%[Closed] ▼
	PWM cycle time for continuous [60..65535]	120 ▲▼ s
	Control type	☐ 1bit (on-off control or PWM) ☒ 1byte (Continuous)
	Reply the status for continuous control	No reply ▼
	Reply the status of contact state	Yes, 1=contact close; 0=contact open ▼
	Function of monitoring	☒
	Cyclic monitoring control value [0...65535]	120 ▲▼ s
	Valve position during fault	Unchange ▼
	Report fault status	☒
	Function of forced operation	☒
	Valve position during forced operation	Unchange ▼

Output X Heating actuator(without controller)_1byte(Continuous)

$$\begin{pmatrix} - \\ \end{pmatrix}$$

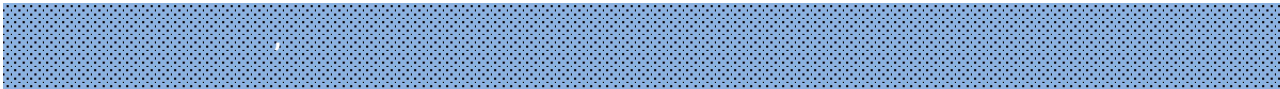
“Normal(de-energised closed)”

"Inverted(de-energised open)"

“Unchange”

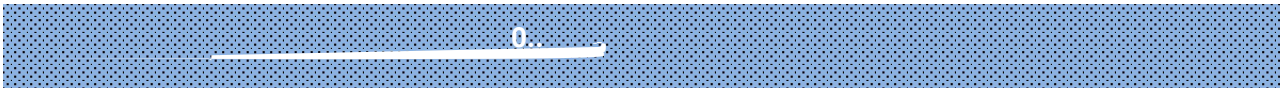
“Contact open”

“Contact close”



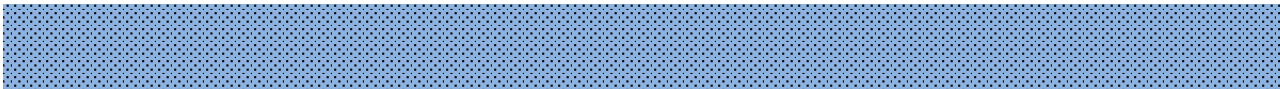
0%
10% 2
20% 1
...
0% 2, 0
100%

20% PWM 100s 1 40s 20s, 80s



(PWM) 0..

1 ()



1 (-)
1 ()

“1bit”

PWM

PWM

“1byte” B- 0 ~25 P

--

1byte Continuous

1bit 1Byte

,0% 0 1 (1)
,0% 1 0 (1)
, (1)



,0 1
,1 0

"No reply"

"0=contact close ; 1=contact open"
"status of contact"
"0"

"1"

"1=contact close; 0=contact open"



Function for monitoring is

--

0..

0..

--

PWM

0%
10% 2
...
100%

20% PWM 100s 1 40s 20s, 80s

Unchange

--

Report fault Report fault 1
0

--

PWM

0%

10% 2

...

100%

Unchange

40%

60%

60%

monitor

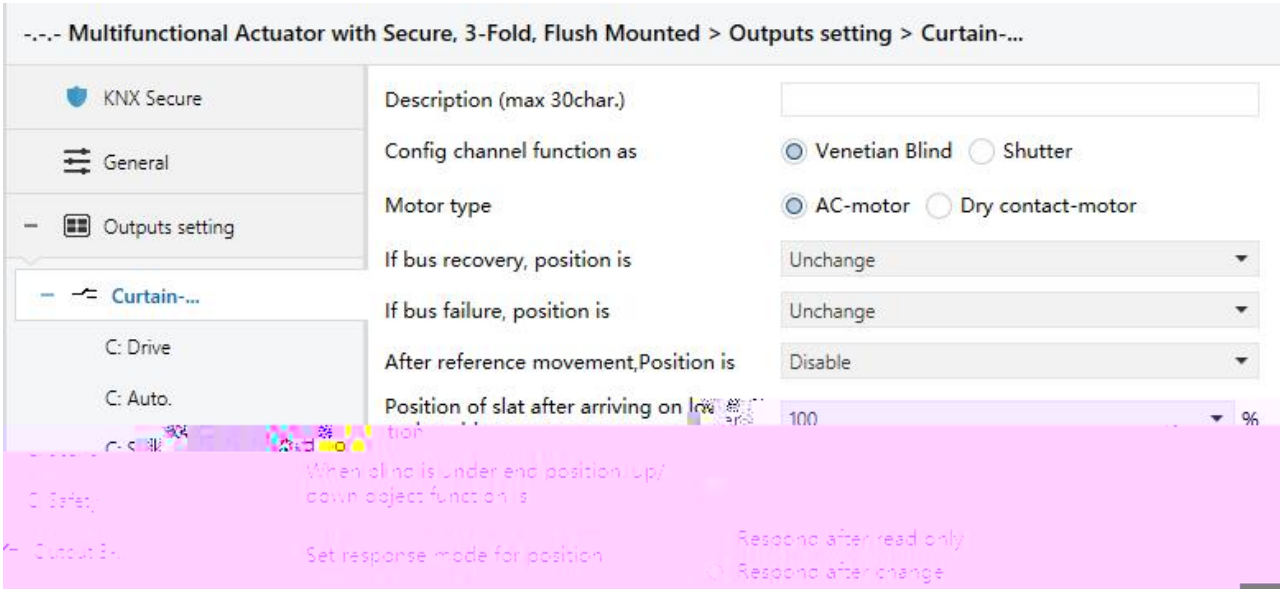
...

1

. .1

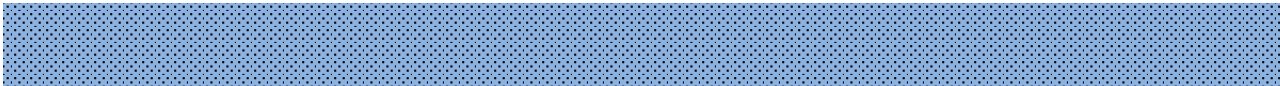
“Output Curtain”

4.6.1



4.6.1

Output Curtain

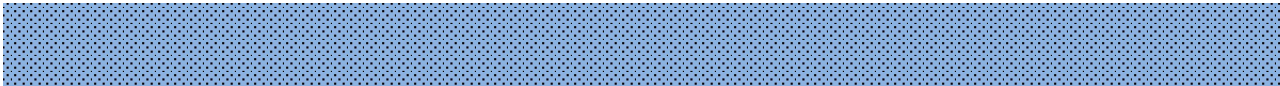


“Venetian Blind”

“Shutter”

“Venetian Blind”

“Venetian Blind”



-

-

AC-motor

Dry contact-motor

1.. 0 *100

Dry contact-motor

1.. 0

Dry contact-motor

-

-

Three-wire

/ /

+

+

+

+

Four-wio

0%



“Unchange”

“Up”

“Down”

“Stop”



“Disable”

“No reaction”

“reference movement”

‘0’

‘1’

"Move to saved position"

"1"

'0'

0%/10%/ / 0%/100%

"

"Move UP/DOWN"

"1"

40%

, /

/

"Move UP/DOWN"

"Respond after read only"

"Position status 0..100%/Slat status 0..100%"

"Respond after change"

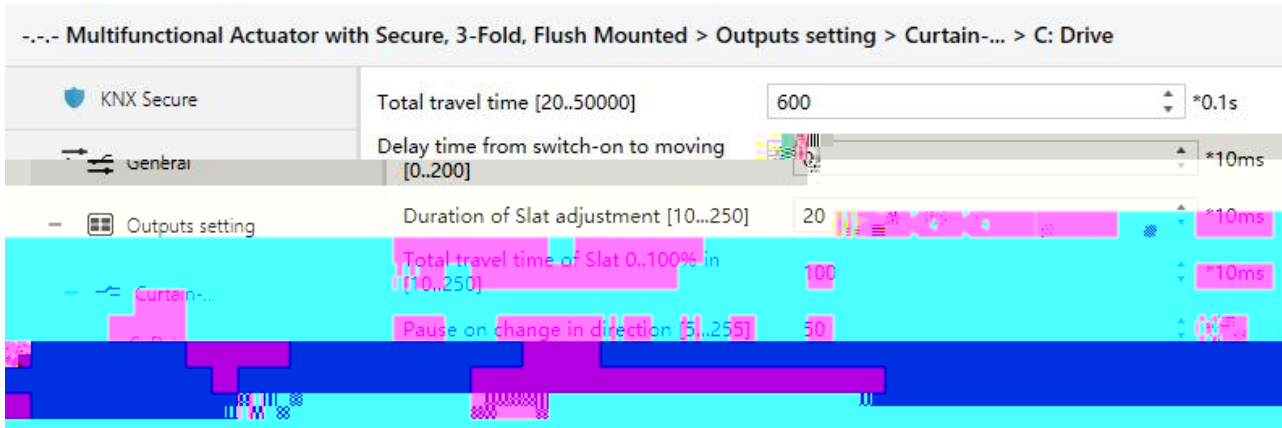
"Position status 0..100%/Slat

status 0..100%"

. 1.1

“Curtain: Drive”

4.6.1.1



Venetian Blind

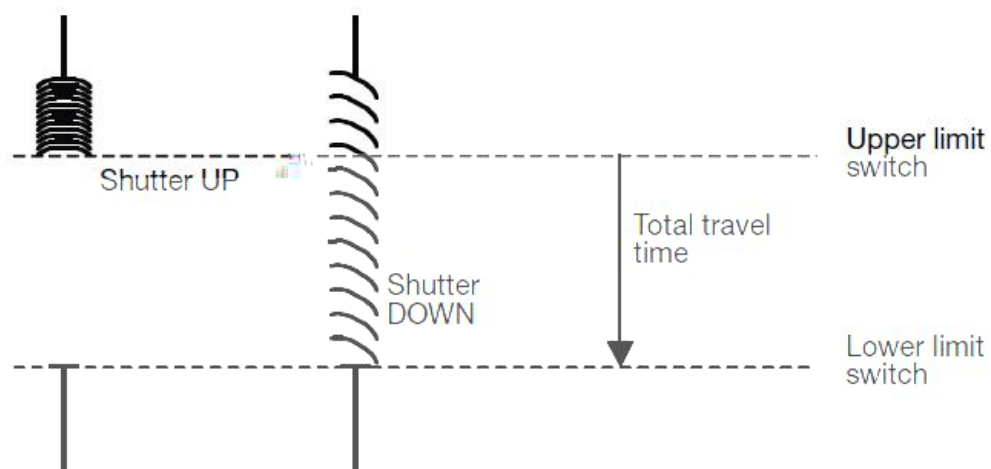


Shutter

4.6.1.1

Curtain Drive

20 0000 *0.1



- 0..200 *10

/

0..200

10 2 0 *10

KNX/EIB KNX

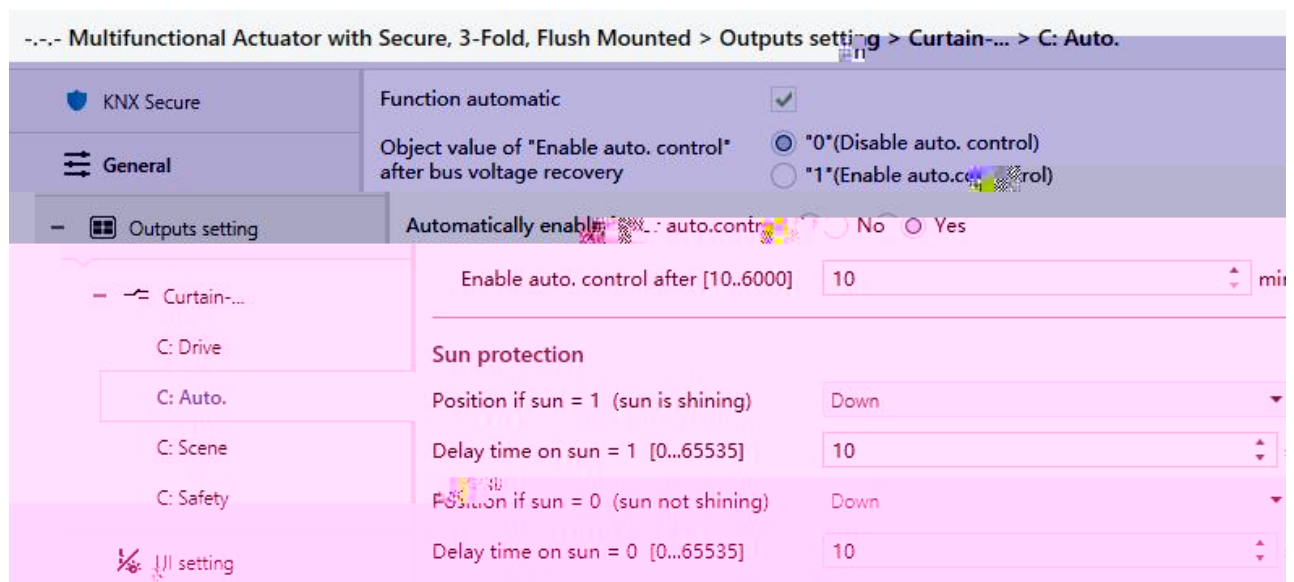
. .1.2

“Curtain: Auto.”

4.6.1.2

/

/



4.6.1.2 Curtain Auto.



“Enable auto. control” “Sun operation” “Sun:

blind/shutter position 0..100%” “Sun: slat adj.0..100%”

“Enable auto. control” “1”

“Enable auto.

control” “0” /

) (

1

10 000

“Enable auto. control”

0 (.)

1 (.)

“Enable auto. control” 0

“Enable auto. control” 1

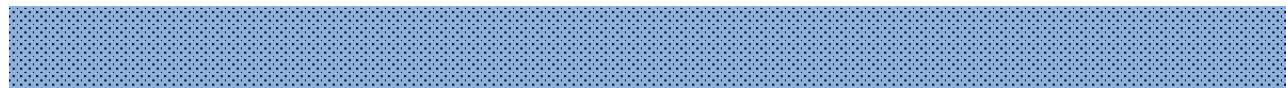
.

“Enable auto. control”

“yes”

-- . 10 000

“ Enable auto. control”



-- 1 ()

“Sun operation” “1”

1

"No reaction"
 "Sun operation"
 "1"

"Receive 1 byte value"
 "Sun operation"
 "1"
 "Sun:

blind/shutter position 0..100%"
 "Sun: slat adj. 0..100%"

"130"(51%)

--
 1 0...

"Sun operation"
 "1"

0

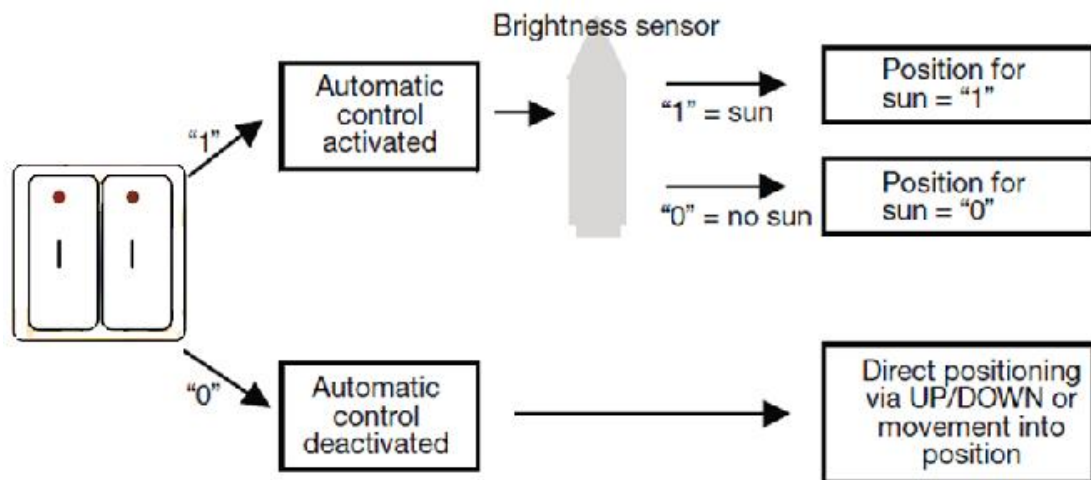
--
 0 (
)

"Sun operation"
 "0"

--
 0 0...

"Sun operation"
 "0"

0



/

"Curtain: Scene"

4.6.1.3

8



4.6.1.3 Curtain Scene



64

8

0...

0

--

/

0...-100% (0% ,100%)

0 100% 0% , 100%

--

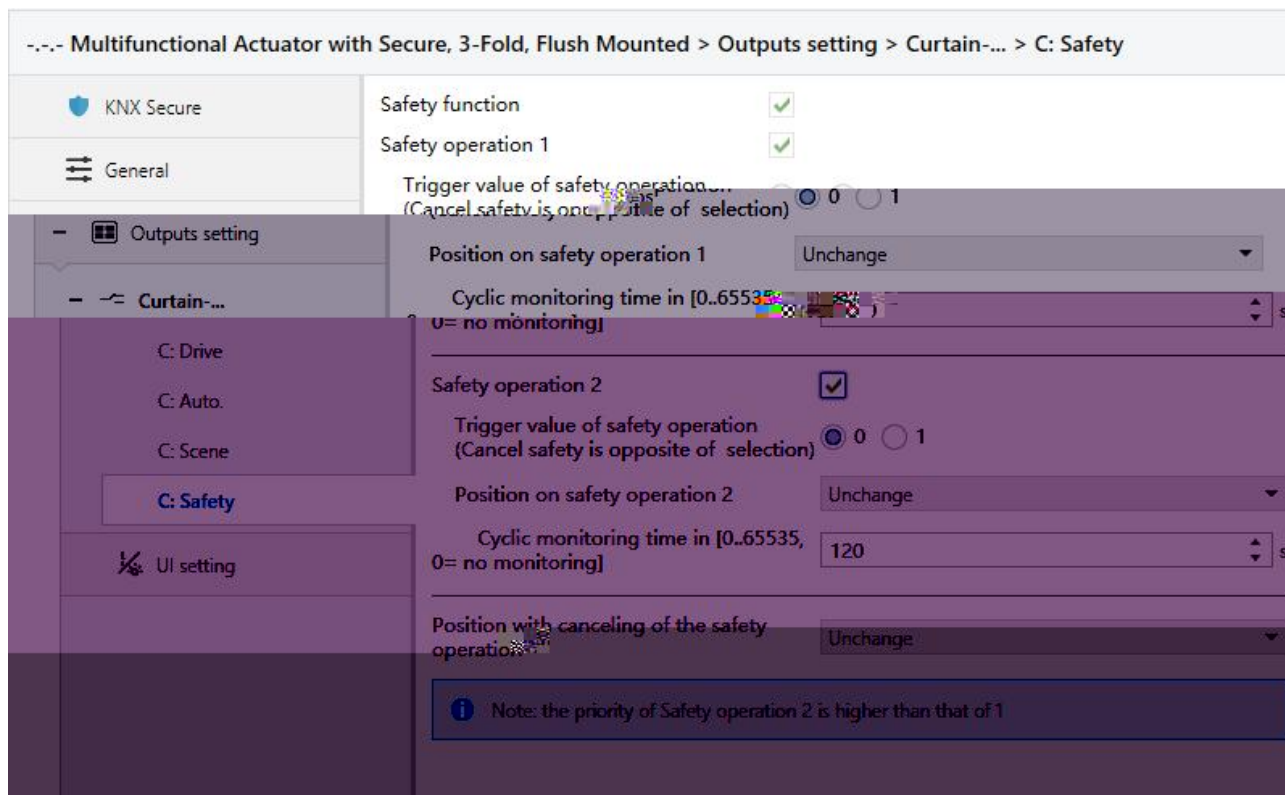
0...-100% (0% ,100%)

0 100% 0% , 100%

. .1.

“Curtain: Safety”

4.6.1.4



4.6.1.4

Curtain Safety

1/2

“Safety operation 1/2”

()

0

1

“ ”

“Safety operation 1/2”

“0”

1

" "

"Safety operation 1/2"

"1"

0

1/2

0..0 , 0

/

"0"

"Safety operation1/2"

/

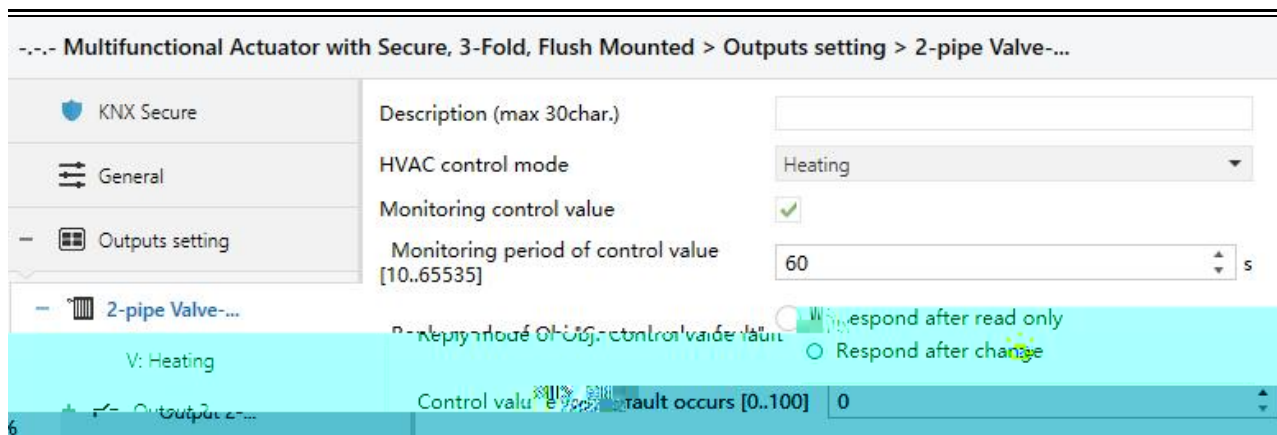
/

/

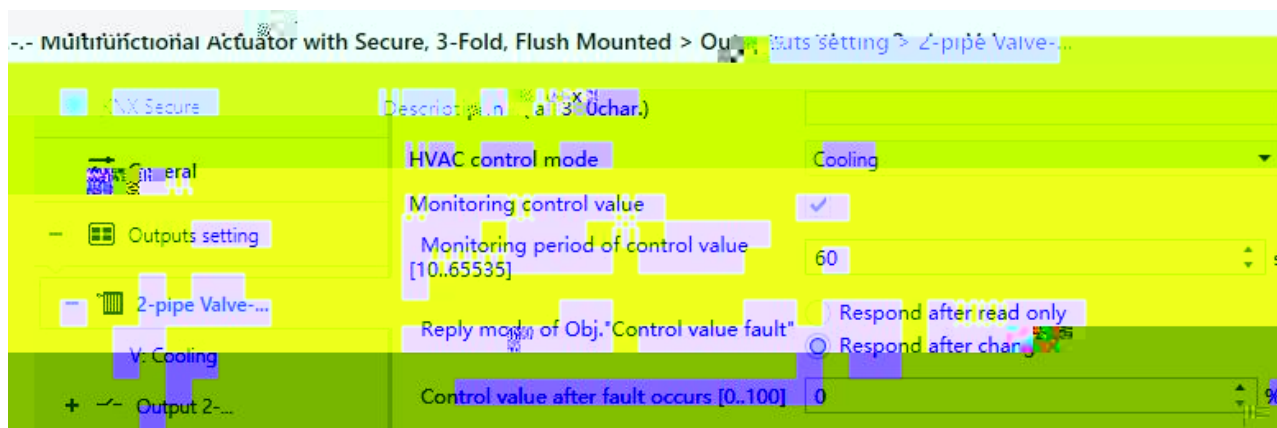
safety 2

safety 1

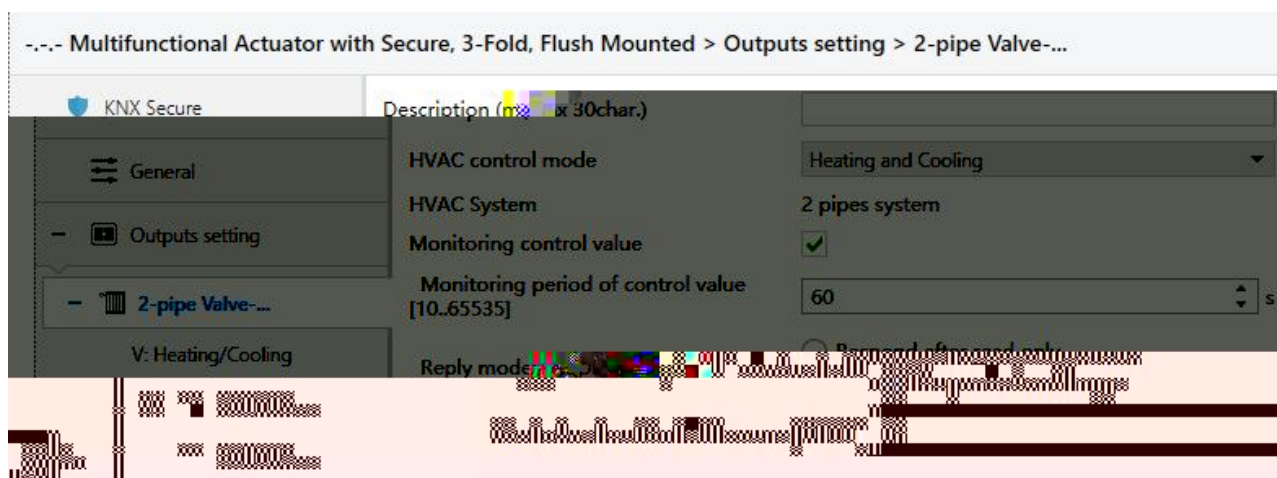
..



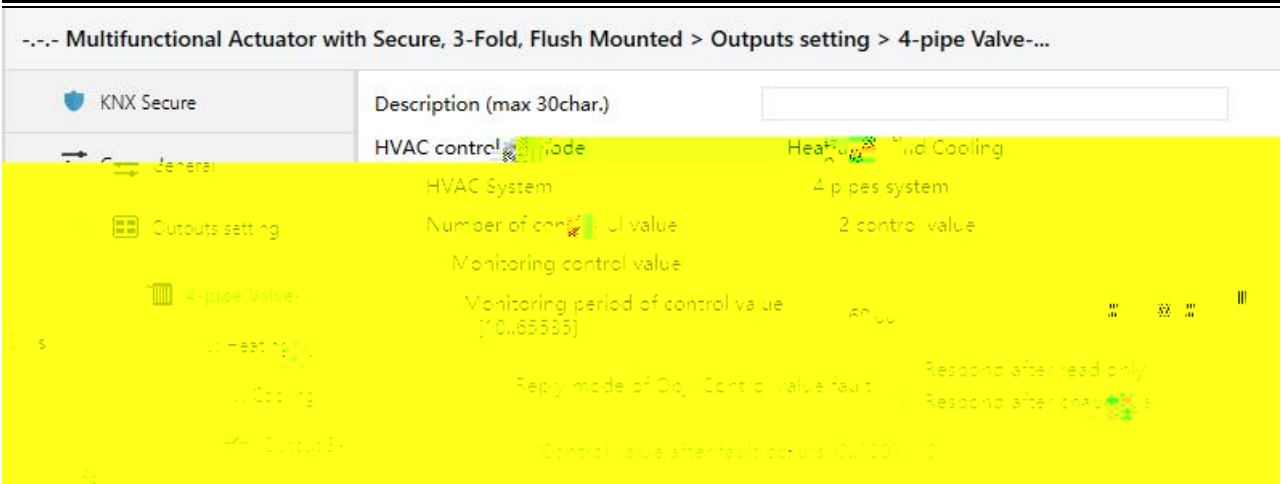
4.7 2 Output Valve--Heating



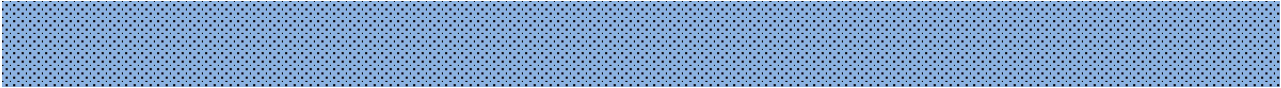
4.7 3 Output Valve--Cooling



4.7 4 Output Valve--Heating and Cooling (2-pipes)

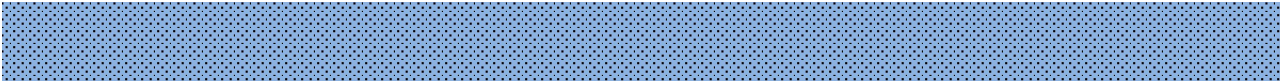


4.7(5) Output Valve--Heating and Cooling (4-pipes)



HVAC

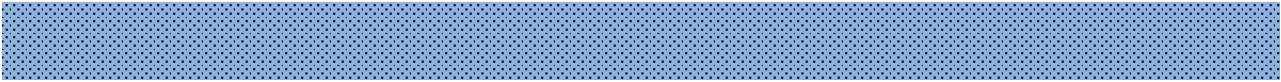
- Heating
- Cooling
- Heating and cooling



24HVAC

2 pipes system:

4 pipes system:



44



KNX/EIB KNX

2 state-ON/OFF

Continuous, PWM PWM

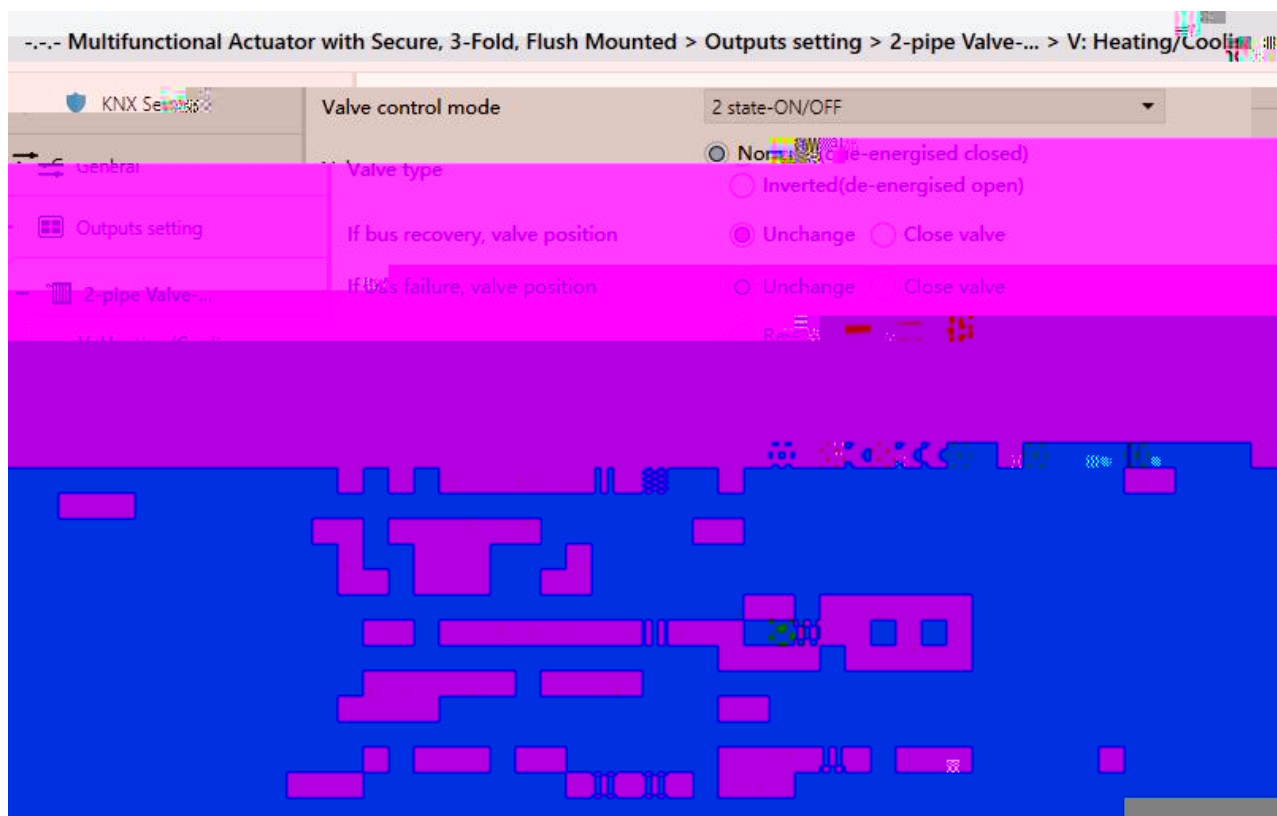
3 point, open and close:

2-

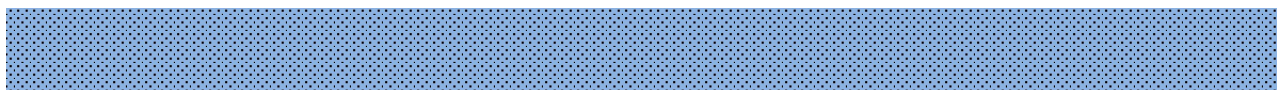
-

/

4.7.1.1



4.7.1.1 "2 state-ON/OFF"

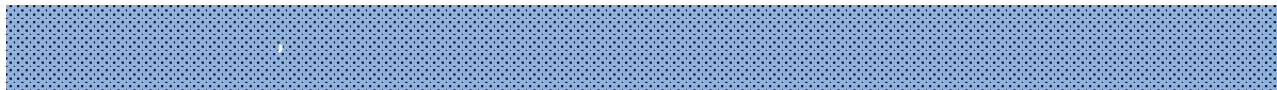


(-)

(-)

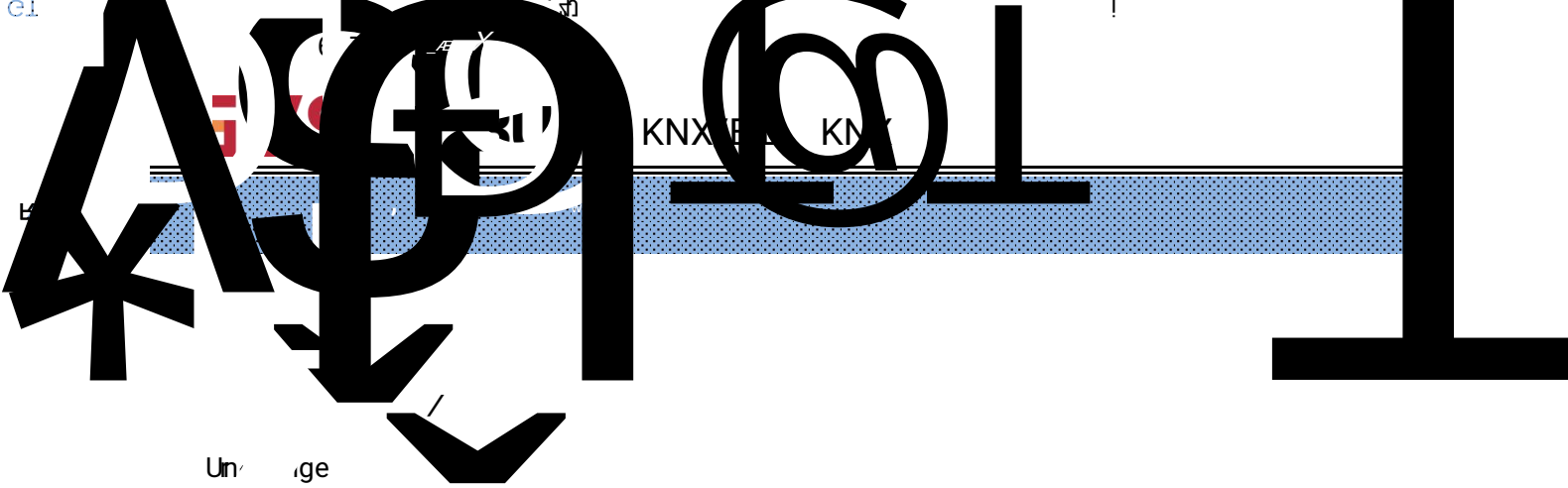
Normal(de-energised closed)

Inverted(de-energised open)



Unchange

Close valve



Un/age

use valve

1 12

(1)

Respond after read only

“Valve

purge status, Heat/Cool”

Respond after change

“Valve purge status,

Heat/Cool”



1bit

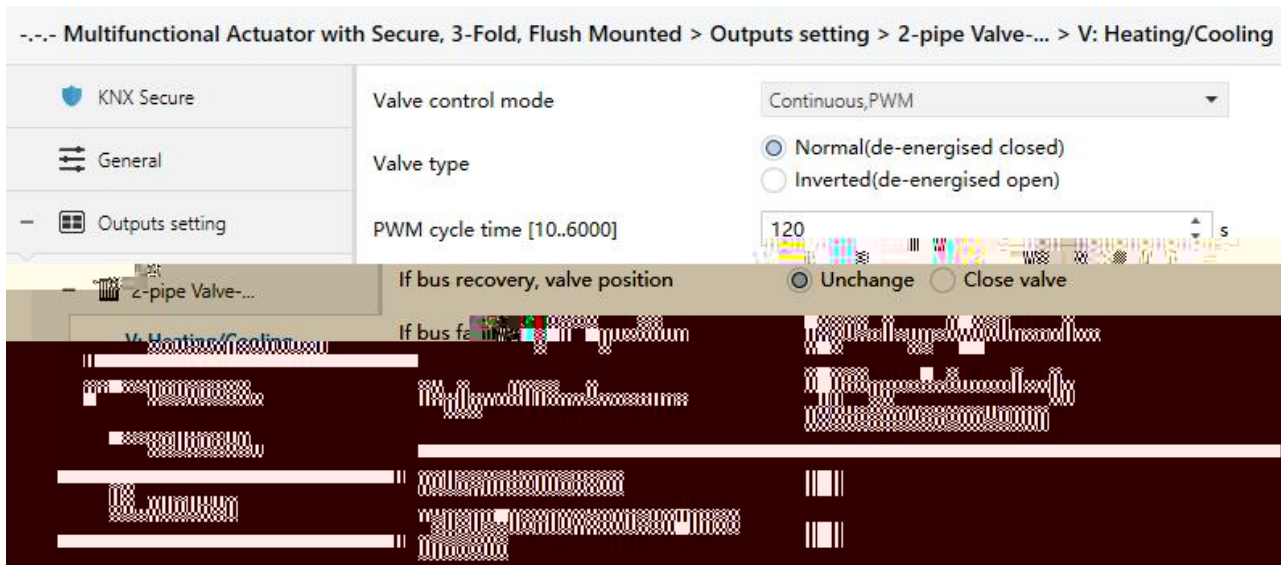
“Disable, Heat/Cool”

/



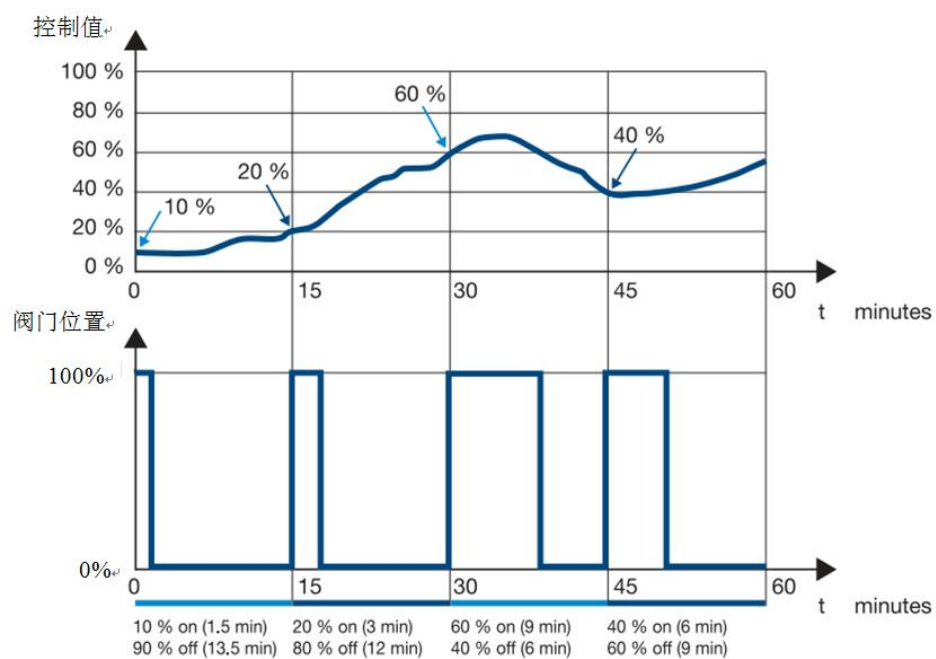
	/		
0	/1		
1	/0		
0=Disable/1=Enable	Disable, Heat/Cool	0	/
1			
1=Disable/0=Enable	Disable, Heat/Cool	1	/
0			

4.7.1.2



4.7.1.2 “Continuous, PWM”





“2state-ON/OFF”

PWM

10 000

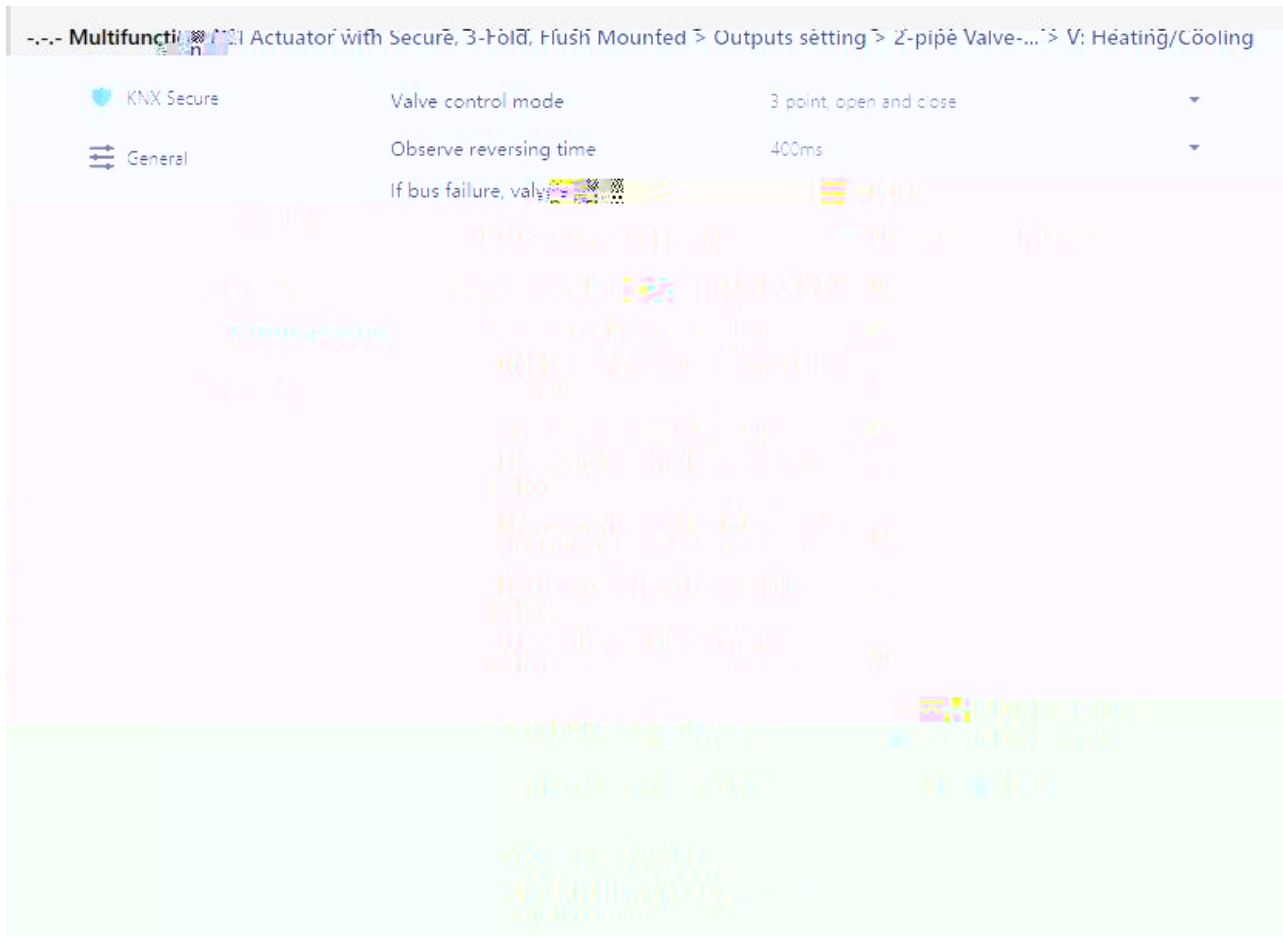
PWM

10 000

,

(-)	0	relay opened relay closed	Valve status, Heat/Cool 1
(-)	0	relay closed relay opened	Valve status, Heat/Cool 1

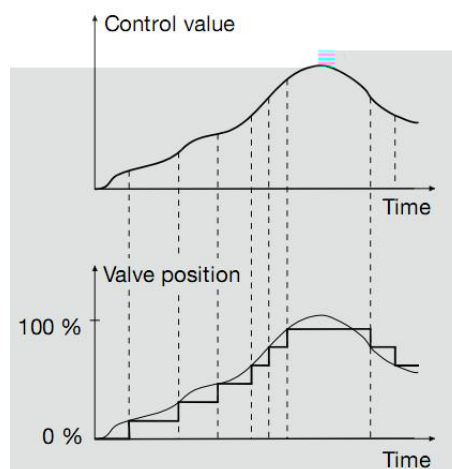
4.7.1.3



4.7.1.3 “3 point, open and close”

20%

20%



GVS

K-BUS

KNX/EB

KNX

3

100 /200 / /1 /1.2

Unchange

Close valve

0%

0%

0% 100% 0 000

0 000

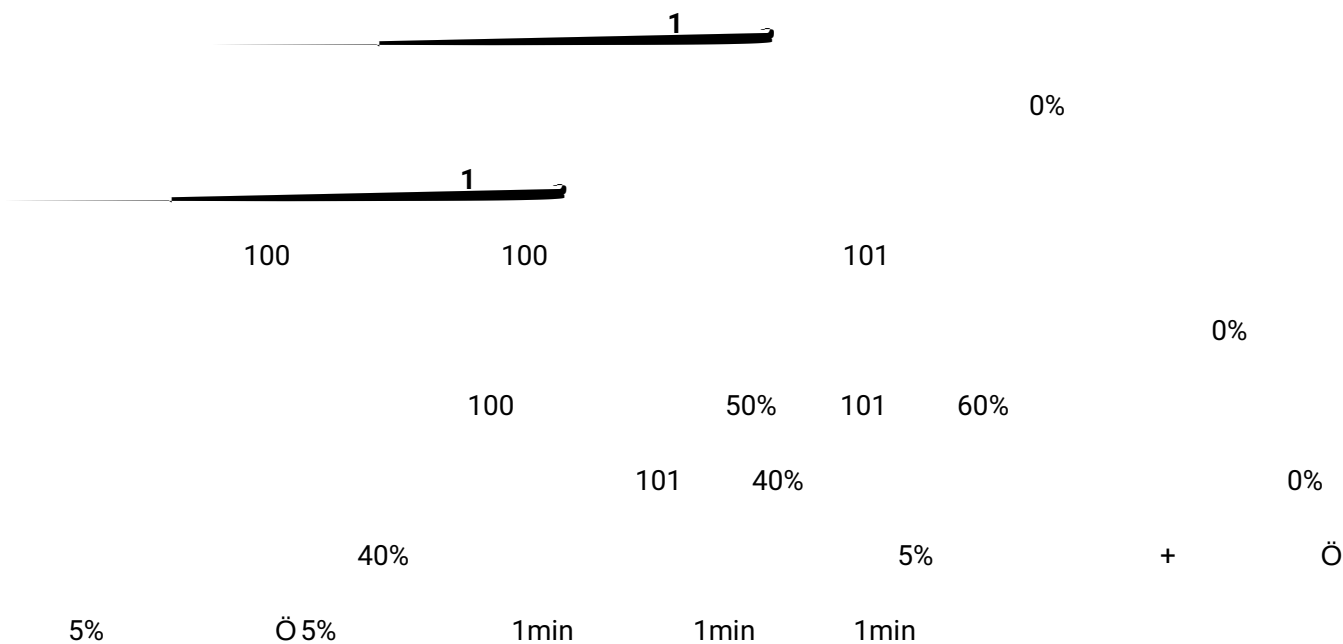
180s

20%

60%

20%

60%



.

0..100 %

.

0...100 %

0...100 %

0...100 %

0...100 %

Min. controller value for closed valve

Max. controller value for fully opened valve

Lower valve position for opening

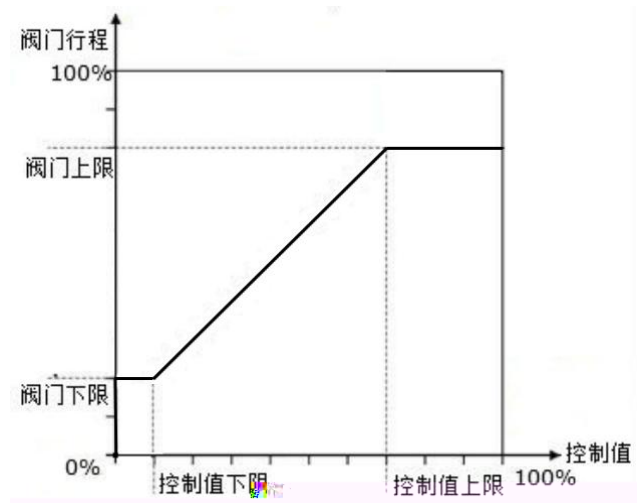
Upper valve position for opening

70%

80%

10%

20%



Respond after read only

Valve

status, Heat/Cool

Respond after change

Valve status,

Heat/Cool



1

1

1bit

1bit

Valve status, Heat/Cool

1byte

1byte

Valve status, Heat/Cool

0

0

1

1

0

Valve status, Heat/Cool

1

GVS

K-BUS

KNX/EB

KNX

3

0

0

1

2

61840

□ □ □ □ □ □ □ □ □ □ □

||||

1 ^

~



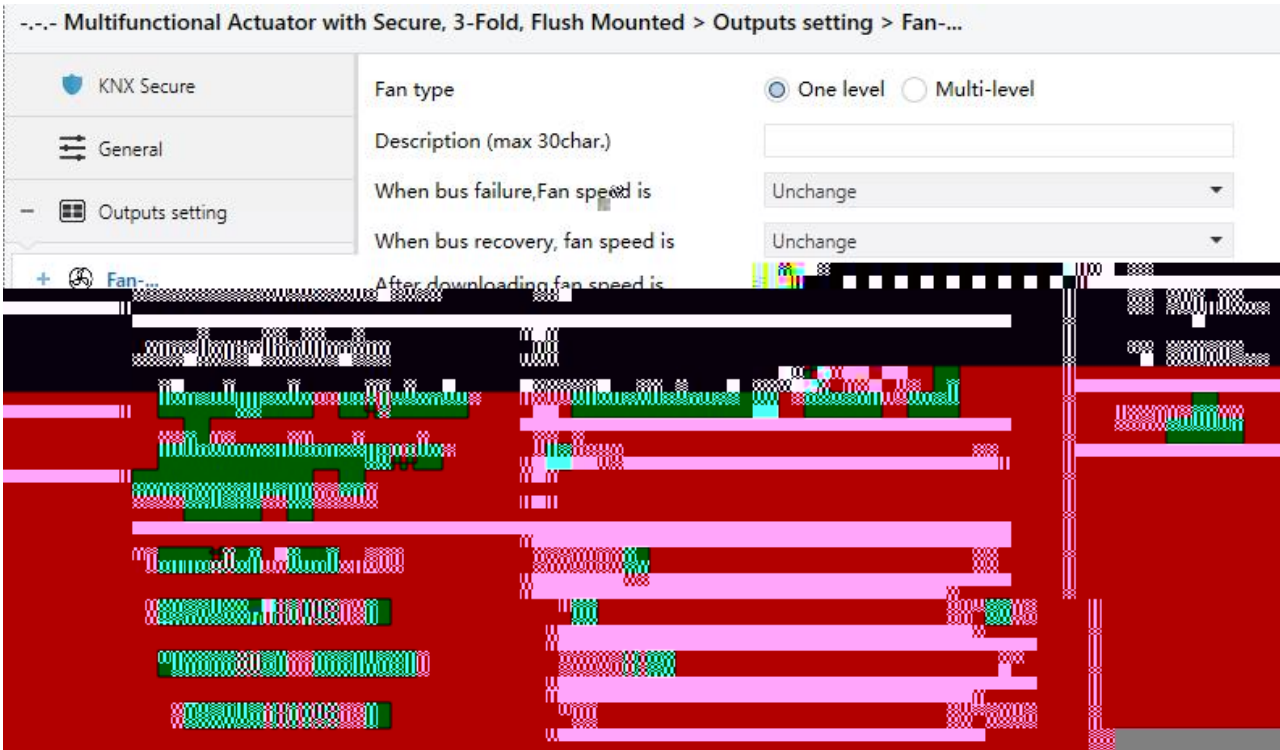
...

1

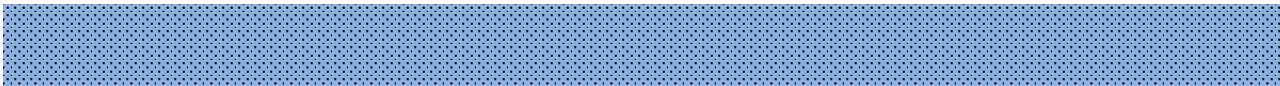
..1

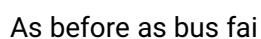
--

Fan type -- One level4.8.11



4.8.1 Fan type -- One level





THE UNIVERSITY OF CHICAGO

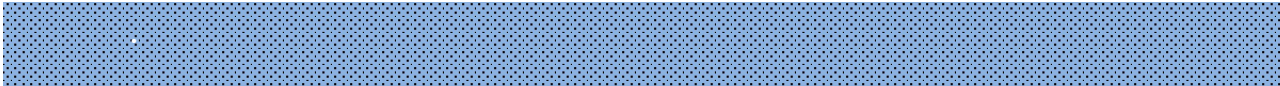
ADP ☐

— ԼՎԳԹ • Ն Բ ԲՄՏՆՈ

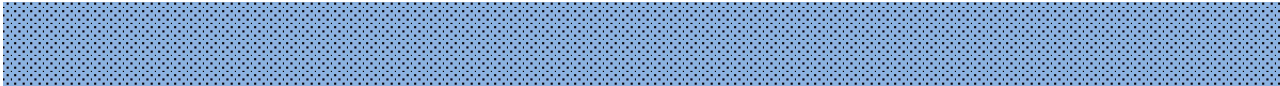
Unchange

OFF

ON



4.7.2.1



None

Switch delay

ON

“Delay time

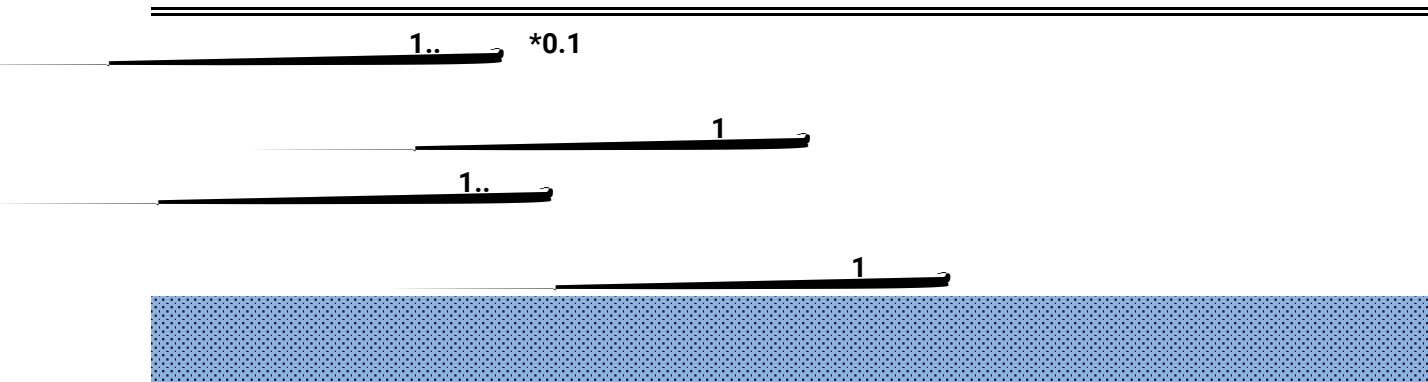
[1..65535]*0.1s”

“Fan speed”

“1”

Minimum time

“Minimum time[1..65535]s”



None

Switch delay

OFF

“Delay time

[1..65535]*0.1s”

Minimum time

“Minimum time[1..65535]s ”



1...65535



1...65535

. .1.1

4.8.1

Auto. Operation function

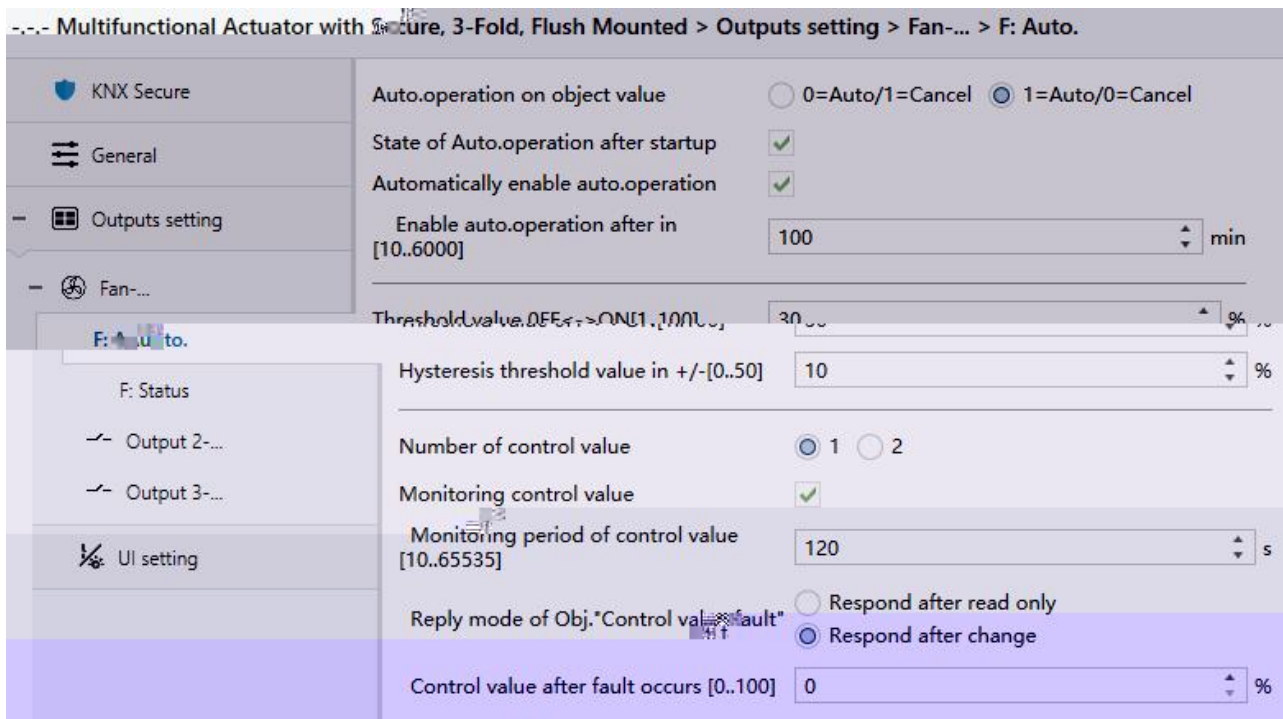
4.8.1.1

1

Automatic function

Automatic function

Status Automatic



4.8.1.1

Fan: Auto.

0 /1

1 /0

0=Auto/1=Cancel

Automatic function

0

1

1=Auto/0=Cancel

Automatic function

1

0



. 10.. 000

10.. 000



Control

value 1 100



0

0

0

10

50

60

+

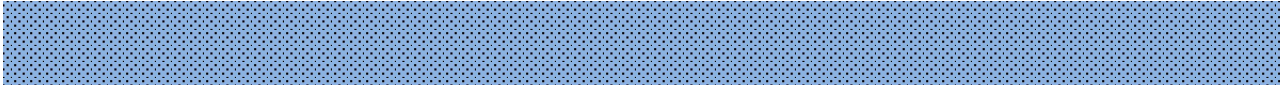
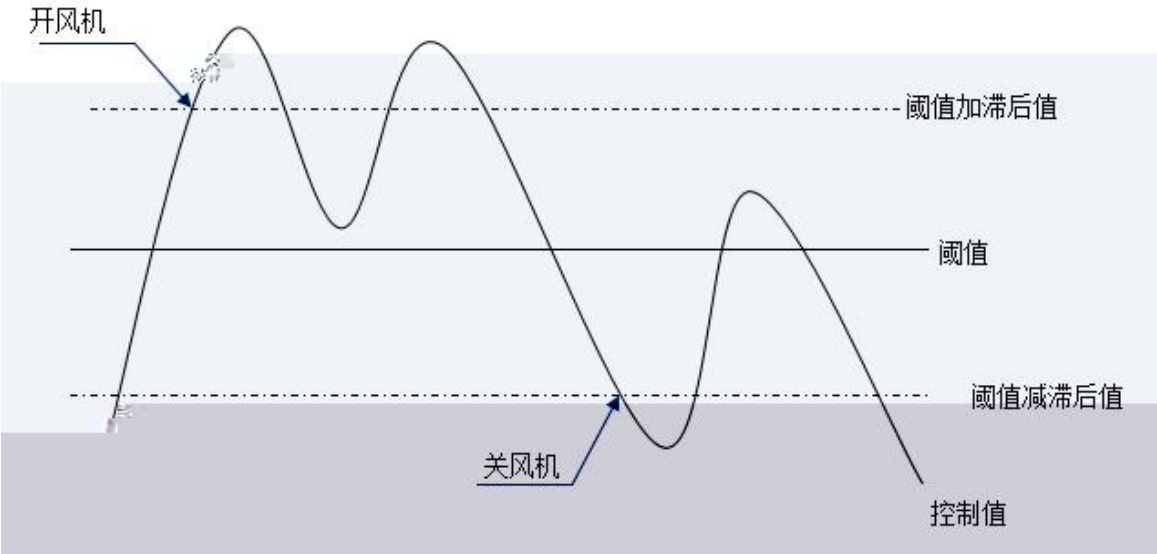
40

-

40~60

40

60



1 1

2 2

1

2

2

Latest value

Control value with switching object

Switching control value1/2

0 1 1 2

1 2

1/2



10..

10

.

Respond after read only

"Control value fault"

Respond after change

fault"

"Control value

0..100 %

0 100 %

. 1.2

Fan: Status

4.8.1.2

Multifunctional Actuator with Secure, 3-Fold, Flush Mounted > Outputs setting > Fan-... > F: Status

KNX Secure

General

Outputs setting

Reply mode of Obj. "Status Fan ON/OFF"(1bit)

Reply mode of Obj. "Status Automatic"(1bit)

☐ Respond after read only

☒ Respond after change

☐ Respond after read only

☒ Respond after change

4.8.1.2¶

Fan: Status

.

/

(1)

Respond after read only

Status Fan ON/OFF

Respond after change

Status

Fan ON/OFF

.

(1)

Status Automatic

1

0

Respond after read only

Status Automatic

Respond after change

Status

Automatic

KNX/E

2

Multi-level

2

3

2

3

3

2

Changeover switch

Step switch

3

3

Output 1&2&3

2

2

Output 1&2

0 000

changeover switch

0 000

1

2

OFF

1 2 3

1 2 3

2

1

2

OFF

1 2 3

1 2 3

As before as bus fail

2

1

1byte

(.001)

(.100)

1/2L

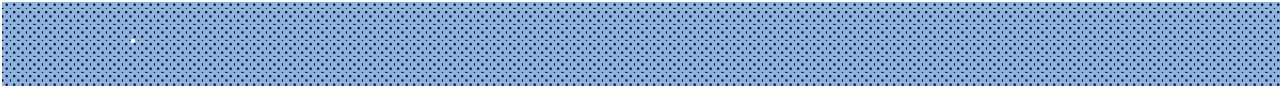
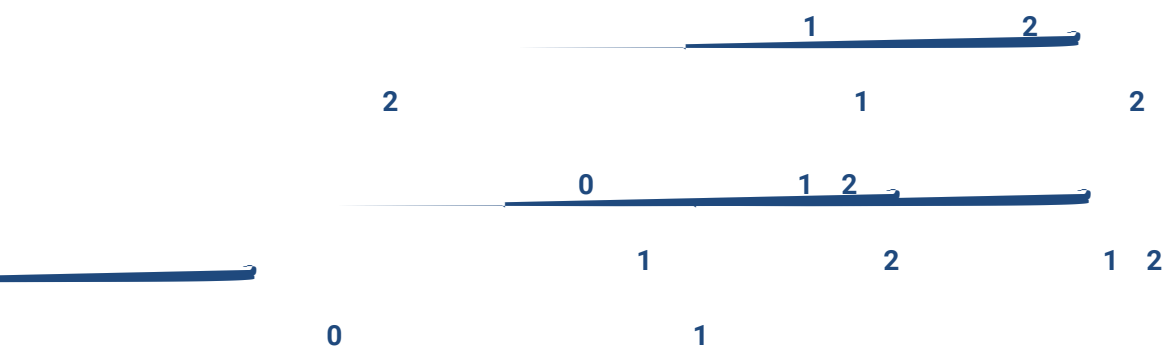
Fan speed--1byte

1..100% 1..2

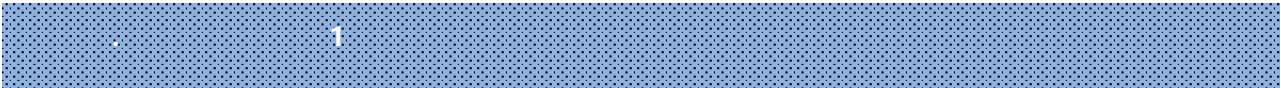


Unchange

1	1
1, off	1
2	2
2, 1	1 2
2, 1, off	1 2
3	3
3, 2	3 2
3, 2, 1	1 2 3
Off	



4.7.2.1

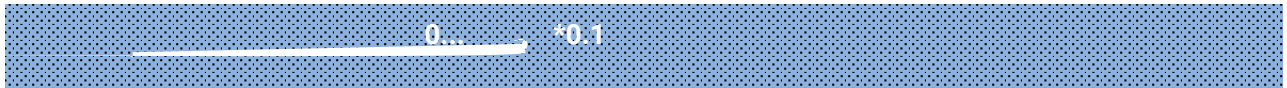


1bit Fan speed 1 , Fan speed 2 Fan speed 3

1

0

ON/OFF

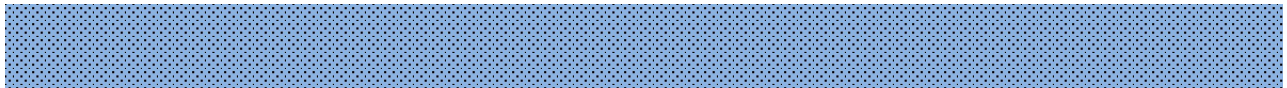


speed1

OFF

0

0



2

1

2

1



OM)J^I×;=9üt3^hæð

OFF 1/2L

2

3

2

⌘

⌘ ⌘ ⌘ ⌘ ⌘ ⌘

; &4... |×|×

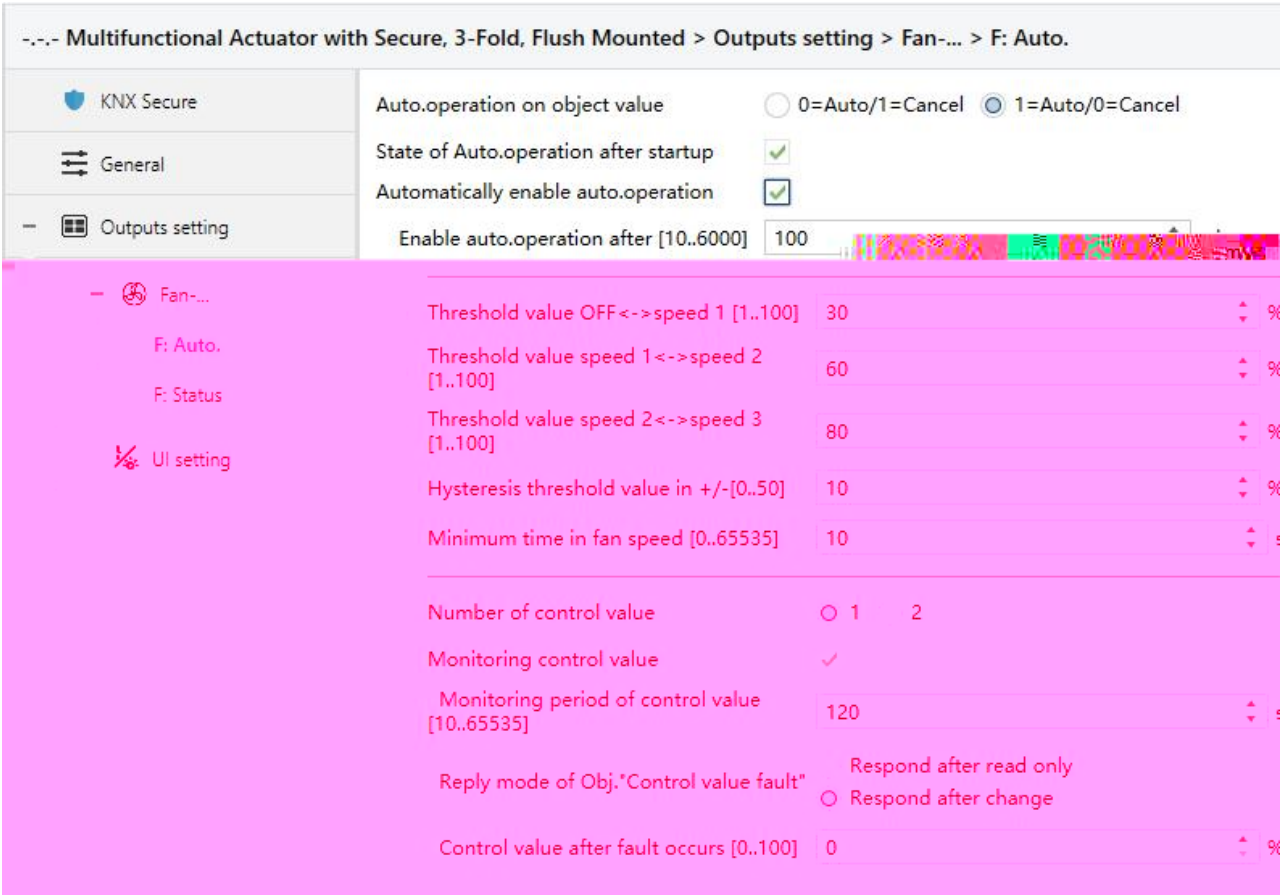


1.

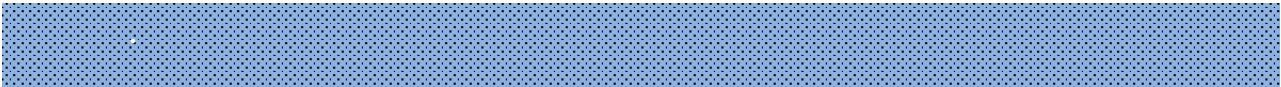
1

⌘ ⌘ ⌘ ⌘ ⌘

4.8.2	Auto. operation function	Enable	4.8.2.1
-------	--------------------------	--------	---------



4.8.2.1 Fan: Auto.



0 /1

1 /0

0=Auto/1=Cancel Fan Automatic ON/OFF 0

1

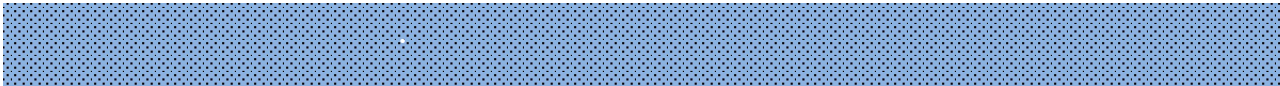
1=Auto/0=Cancel

Fan Automatic ON/OFF

1

0

.



.

10.. 000

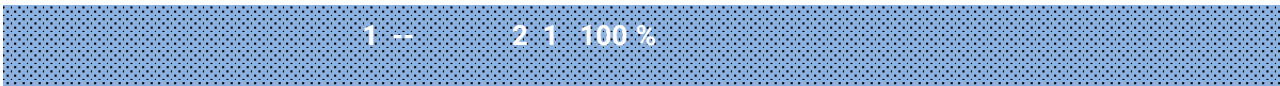
10.. 000



1

1 100%

1



2

2

1 100



3

3

1 100

- 1

1 - 2 2 -

- 1

1 - 2

1 - 2

2 -

+/- 0 0%

0 0

0

10

50

60

+

40

-

40~60

40

()60

开风速 x

阈值加滞后值

阈值

阈值减滞后值

关风速 x

控制值

1

2

1

OFF <-> 1 10%

1 <-> 2 20%

2 <-> 3 30%

15%

OFF

OFF 25% 10%+15% 2 25% 20% 30%

1

3

3 14% <30%-15% 1 14% 10% 20%

2

2

OFF <-> 1 10%

1 <-> 2 40%

2 <-> 3 70%

5%

OFF

OFF 15% 10%+5%

41% 2 41% 40% 70%

1

39% 1 39% 10% 40%

3

3 64% <70%-5%

39% 1 39% 10% 40%

2

3 0

0

0

0

1

1

2

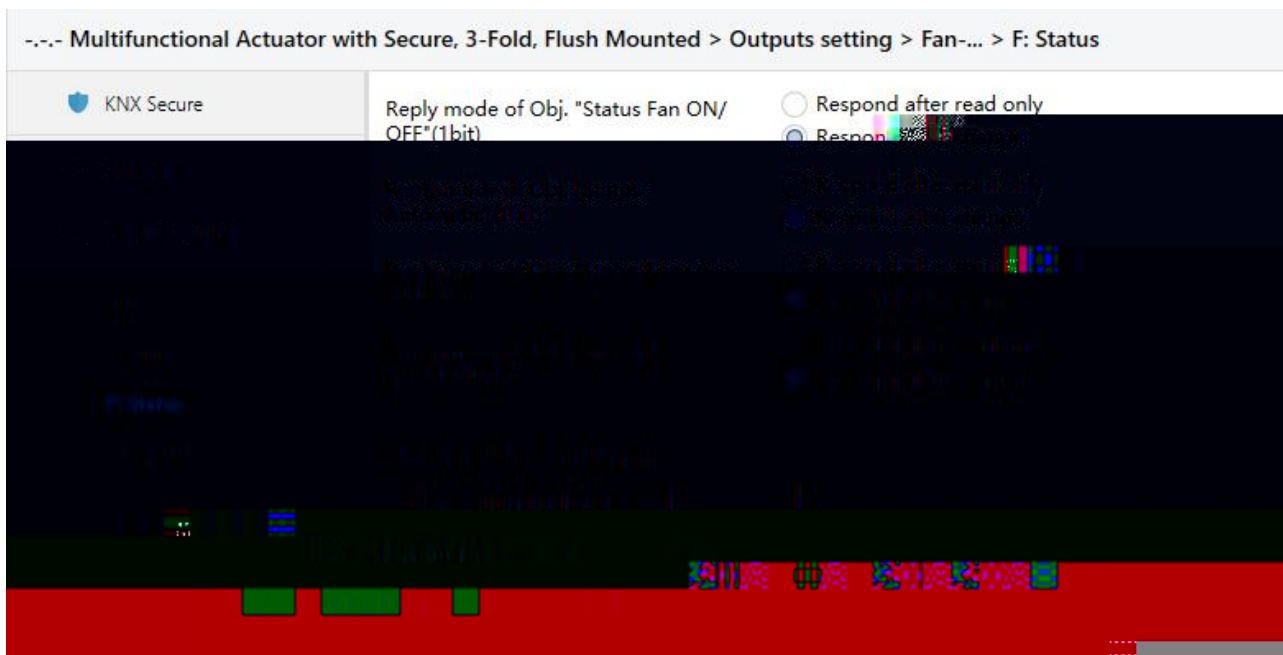
0

. .1.1

. 2.2

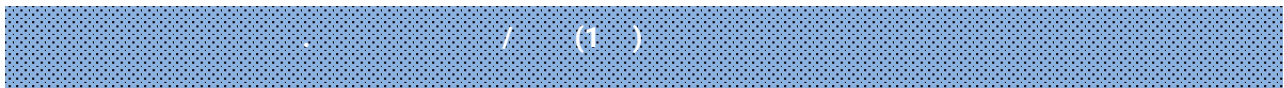
Fan: Status

4.8.2.2



4.8.2.2

Fan: Status



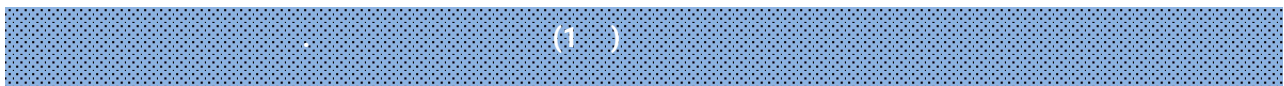
Respond after read only

Status Fan ON/OFF

Respond after change

Status

Fan ON/OFF



Status Automatic

1

0

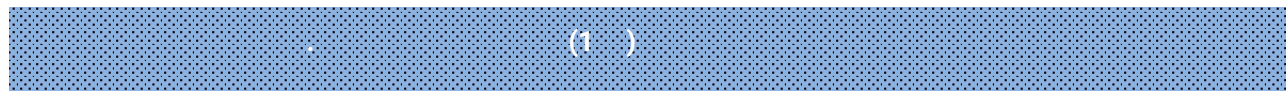
Respond after read only

Status Automatic

Respond after change

Status

Automatic



1bit

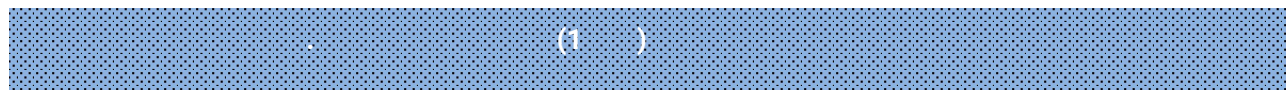
Status Fan speed 1

Status Fan speed 2

Status Fan speed 3

Respond after read only

Respond after change



Status Fan speed

1byte

Respond after read only

Respond after change

1/2L

1..100

0

• •

UI setting

4.9

LED

LED

LED

LED



4.9

Channel configuration

.(1-)

/

0

、(-)

/

□

0

0

100

1 0

.10.1

4.10.1

4.10.1

“Input x- Switch”

/

“Yes”

..2 *0.1

/

10

/ /

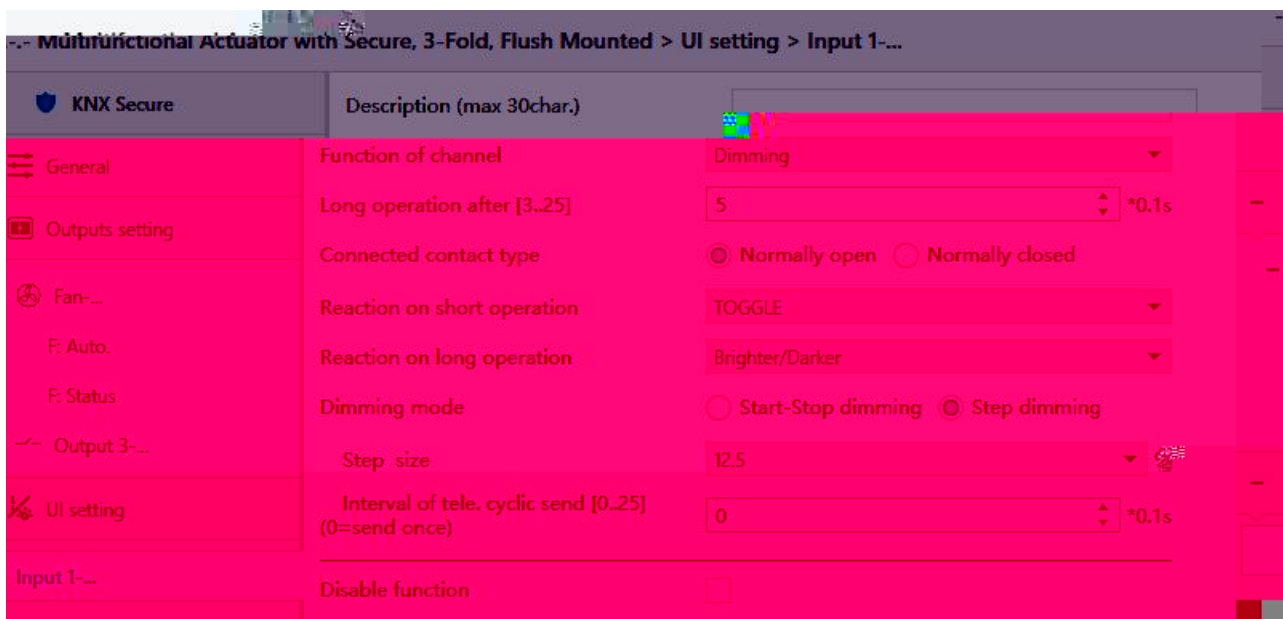
/

1/ 0
0/ 1

.10.2

“Dimming ”

4.10.2



4.10.2

“Input x- Dimming”



...2



Normally open

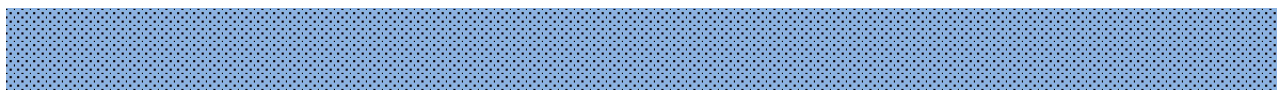


No action

ON

OFF

TOGGLE



/

No action

Brighter

Darker

Brighter/darker



-

“Start-stop dimming”

“Steps dimming”

“Dimming mode” “Steps dimming” ,

100%

0%

1. %

. **0..2 *0.1 (0**

“Dimming mode” “Steps dimming” ,

0..2 , 0

“Value output”

4.10.3

--- Multifunctional Actuator with Secure, 3-Fold, Flush Mounted > UI setting > Input 1-...

KNX Secure

General

Outputs setting

Fan-...

F: Auto.

F: Status

Output 3-...

UI setting

Description (max 30char.)

Function of channel

Distinction between short and long operation

Long operation after [3..25]

Connected contact type

Reaction on short operation

Output value [0..1]

Reaction on long operation

Output value [0..3]

Value output

No

Yes

5

*0.1s

Normally open

Normally closed

1Bit value[0..1]

0

2Bit value[0..3]

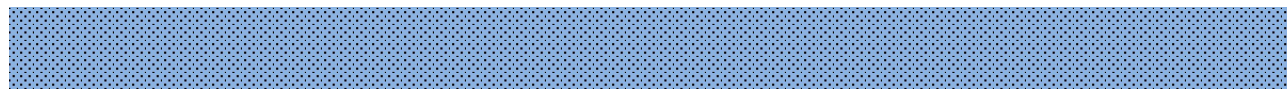
0

Input 1-...

Disable function

4.10.3

“Input x- Value output”



/

“Yes”

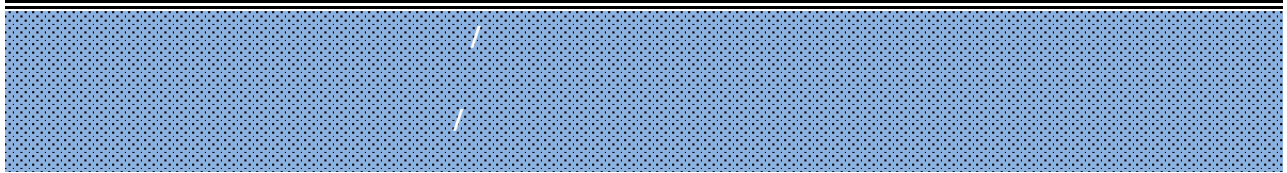
...2 *0.1

/

...2

/

Normally open



/ /

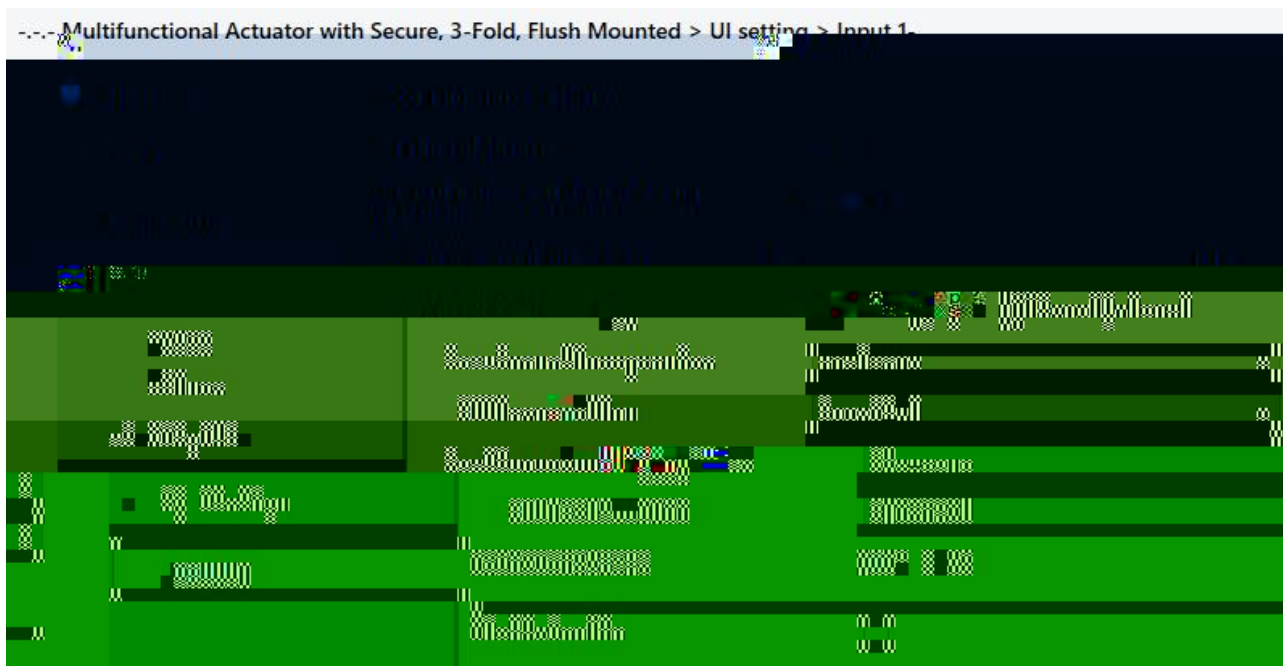
1 **0..1**

2 **0..**

.10.

“Scene control”

4.10.4



4.10.4

“Input x- Scene control”



/

“Yes”

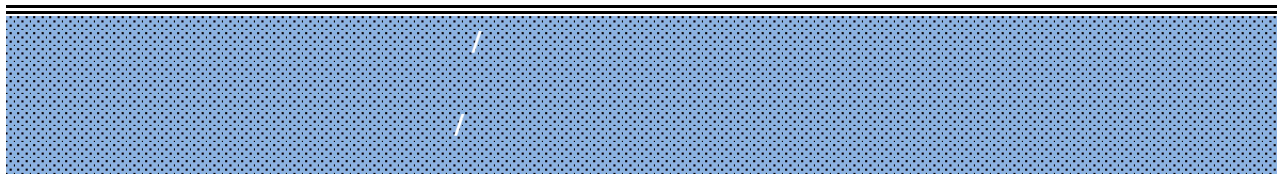
...2 *0.1

/

...2

/

Normally open



/ /

Scene NO.1~64

0~63



1

2

.10.

“Shutter control”

4.10.5

Actuator with Secure, 3-Fold, Flush Mounted > UI setting > Input 1-...

KNX Secure	Description (max 30char.)	
General	Function of channel	Blind
Outputs setting	Long operation after [3..25]	5 *0.1s
Fan-...	Connected contact type	☒ Normally open ☐ Normally closed
F: Auto.	Reaction on short operation	Up/Down
F: Status	Reaction on long operation	Stop(Adjust Up/Down)
Output 3-...	Interval of tele. cyclic send [0..25] (0=send once)	0 *0.1s
UI setting	Disable function	☐

4.10.5

“Input x- Blind”

No action

Up

Down

Up/Down /

Stop (Adjust Up)

Stop (Adjust Down)

Stop (Adjust Up/Down) /

. 0..2 *0.1 (0

" "

0..2 0

GVS

K-BUS

KNX/EIB

KNX

3

.10.

“Shift register”

4.10.6

Multifunctional Actuator with Secure, 3-Fold, Flush Mounted > UI setting > Input 1-...

KNX Secure

General

Outputs setting

Fan-...

F: Auto.

F: Status

Output 3-...

Description (max 30char.)

Function of channel

Shift type

Value begin with

Value end with(must be larger than value begin with)

Step size

Direction

Reset function

Long operation after [3,25]

Connected contact type

Disable function

Shift register

Shift by step value

Shift without step value

0

10

2

From lowest

Disable

Enable by long operation

5 *0.1s

Normally open

Normally closed

4.10.6

“Input x- Shift register”

□ □ □ □

⌵

Shift by step value

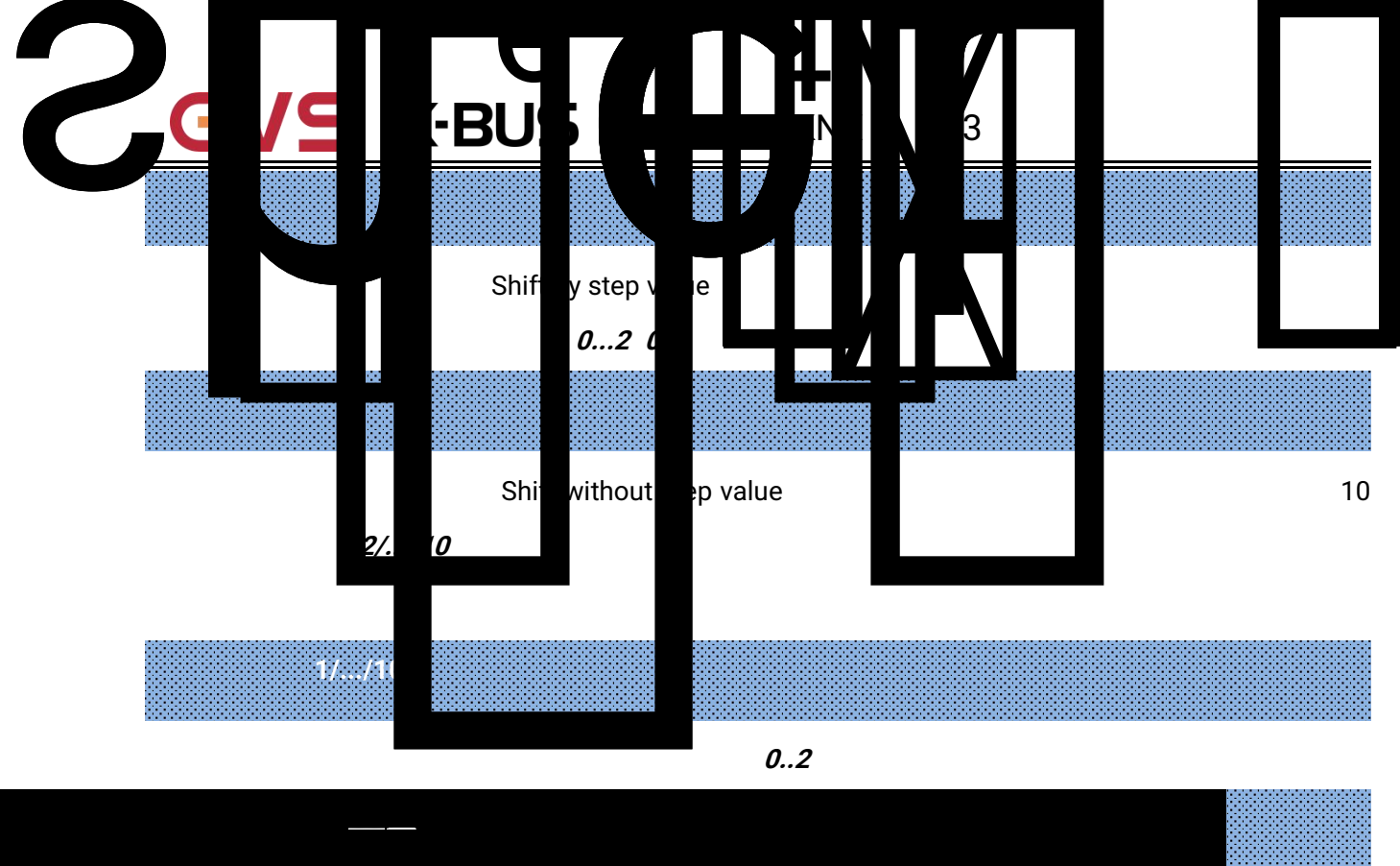
61

Shift without step value

10

□ Shift by step □

109



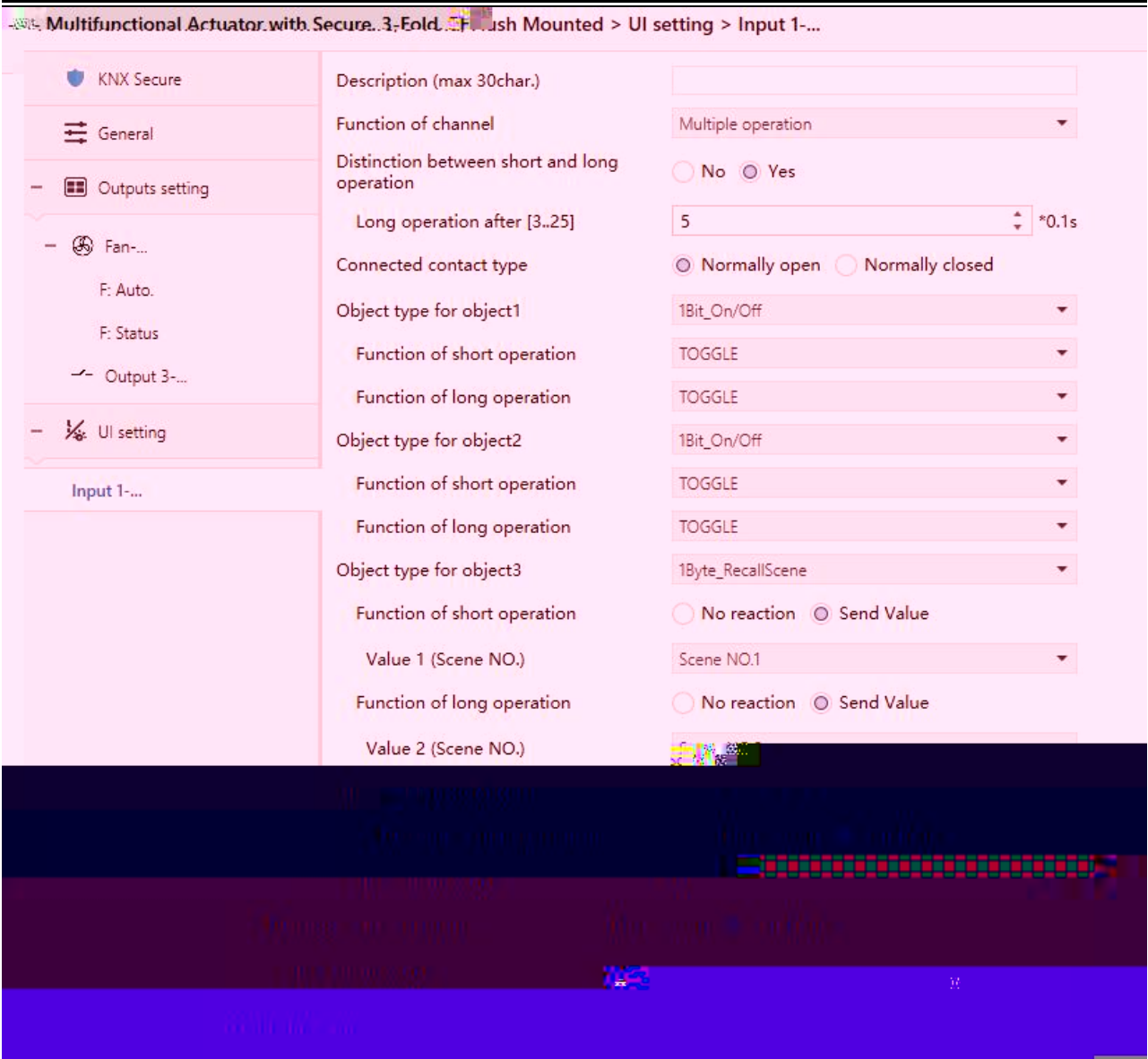
Enable by long operation

4

--- Multifunctional Actuator with Secure, 3-Fold, Flush Mounted > UI setting > Input 1-...

- KNX Secure - General - Outputs setting - Fan-... - F: Auto. - F: Status - Output 3-... - UI           	Description (max 30char.)	
	Function of channel	Multiple operation
	Distinction between short and long operation	☒ No ☐ Yes
	Object type for object1	1Bit_On/Off
	Function of press the contact	TOGGLE
	Object type for object2	1Bit_On/Off
	Function of press the contact	TOGGLE
	Object type for object3	1Byte_RecallScene
	Function of press the contact	No reaction ☐ Send Value
	Value 1 (Scene NO.)	Scene NO.1
Object type for object4	1Byte_Percentage	
Function of press the contact	No reaction ☐ Send Value	
Value 1 (Percentage)	30	
Disable function		

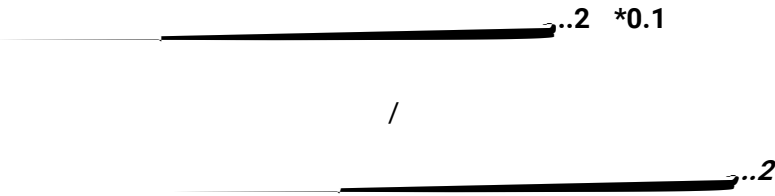
)



4.10.7(2) "Input x- Multiple operation" ()

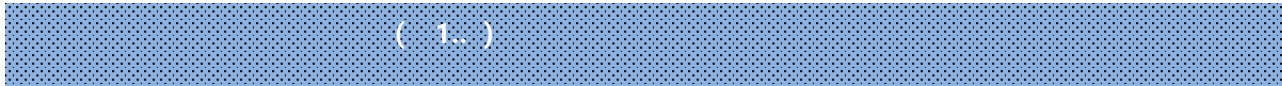


/ "Yes"



/

Normally open



/

1 /

1

/

/

No reaction (Send value,

)

1/2 ...

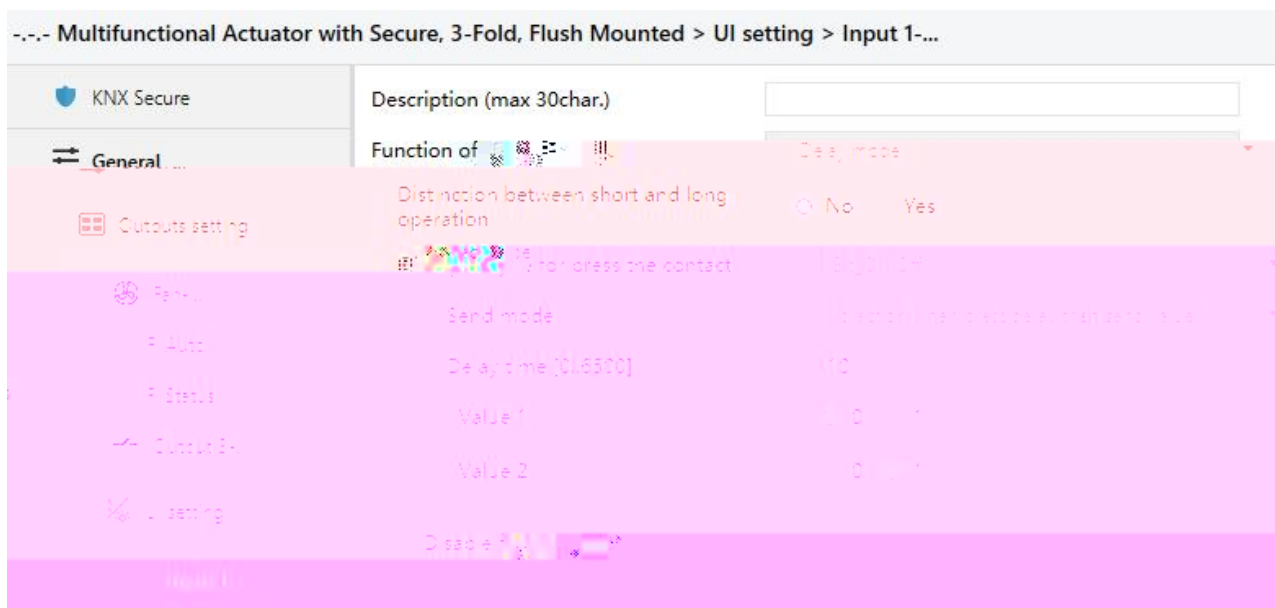
1byte_RecallScene 1byte_StoreScene 1byte_Percentage

1byte_Unigned value

.10.

“Delay mode”

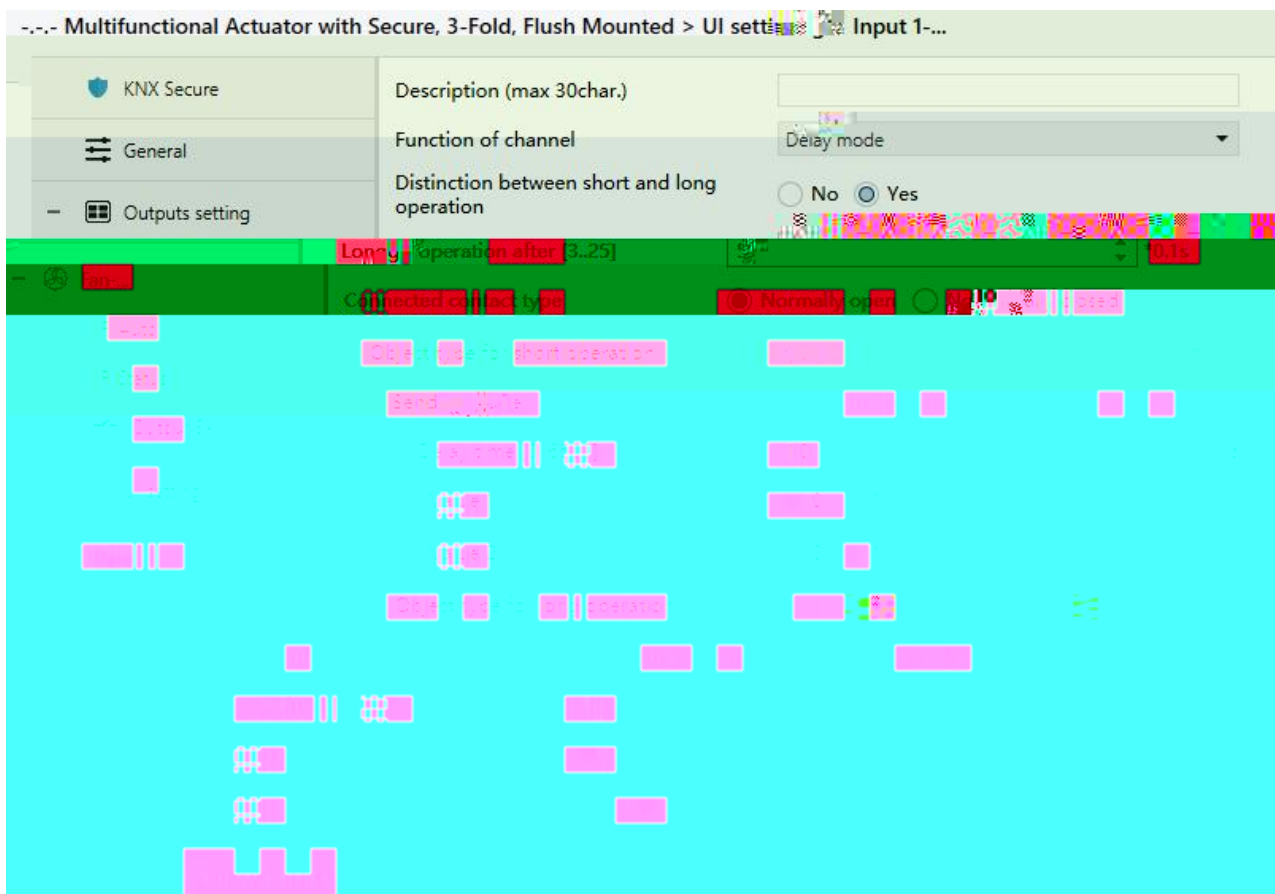
4.10.8



4.10.8(1)

“Input x- Delay mode”(

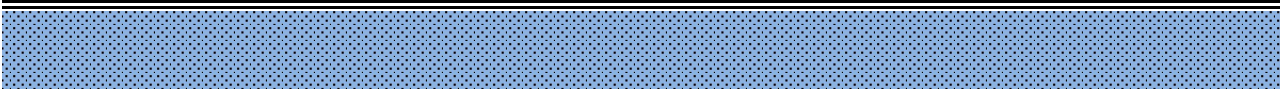
)



4.10.8(2)

“Input x- Delay mode”(

)



/ "Yes"

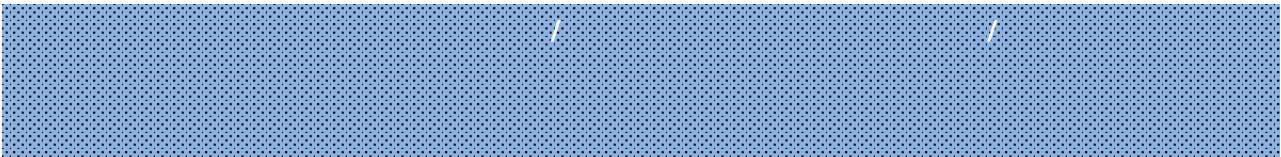
...2 *0.1

/

...2

/

Normally open



/

1 /

1

	,	1	1
	,	2	2
1	,	2	1
			2

2 , 1 2 1

0.. 00

0.. 00

1/2

1/2

.11.

LED

LED

LED

Multifunctional Actuator with Secure, 3-Fold, Flush Mounted > LED 5-...

KNX Secure

General

Outputs setting

Output 1-...

Description (max 30char.)

Status LED indication

External object datatype

When object value="0", LED is

When object value="1", LED is

Control by external object

☒ 1Bit ☐ 1Byte

☒ OFF ☐ ON

☐ OFF ☒ ON

- 1 Bit

--- Multifunctional Actuator with Secure, 3-Fold, Flush Mounted > UI setting > LED 5-...

KNX Secure General Outputs setting Output 1-... O1: Function	Description (max 30char.) Status LED indication External object datatype Threshold value is If object value < threshold value, LED is If object value = threshold value, LED is	Control by external object ☐ 1Bit ☒ 1Byte 50 ☒ OFF ☐ ON ☐ OFF ☒ ON
--	--	--

- 1 Byte

KNX Secure

General

Outputs setting

Description (max 30char.)

Status LED indication

Always on

Always on

4.11

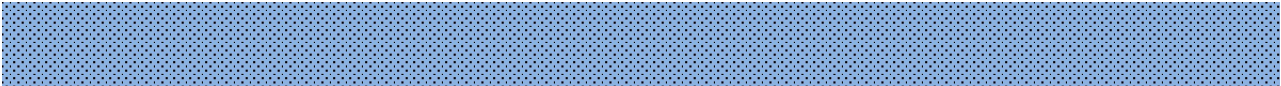
“LED X”

LED

None

Control by external object LED

Always



LED Control by external object LED

1

1

0/1 ,

LED Control by external object 1Bit LED LED

1 0



LED Control by external object 1Byte LED

1...2

,

LED Control by external object 1Byte

LED

,

LED Control by external object 1Byte

LED

,

LED Control by external object 1Byte
LED

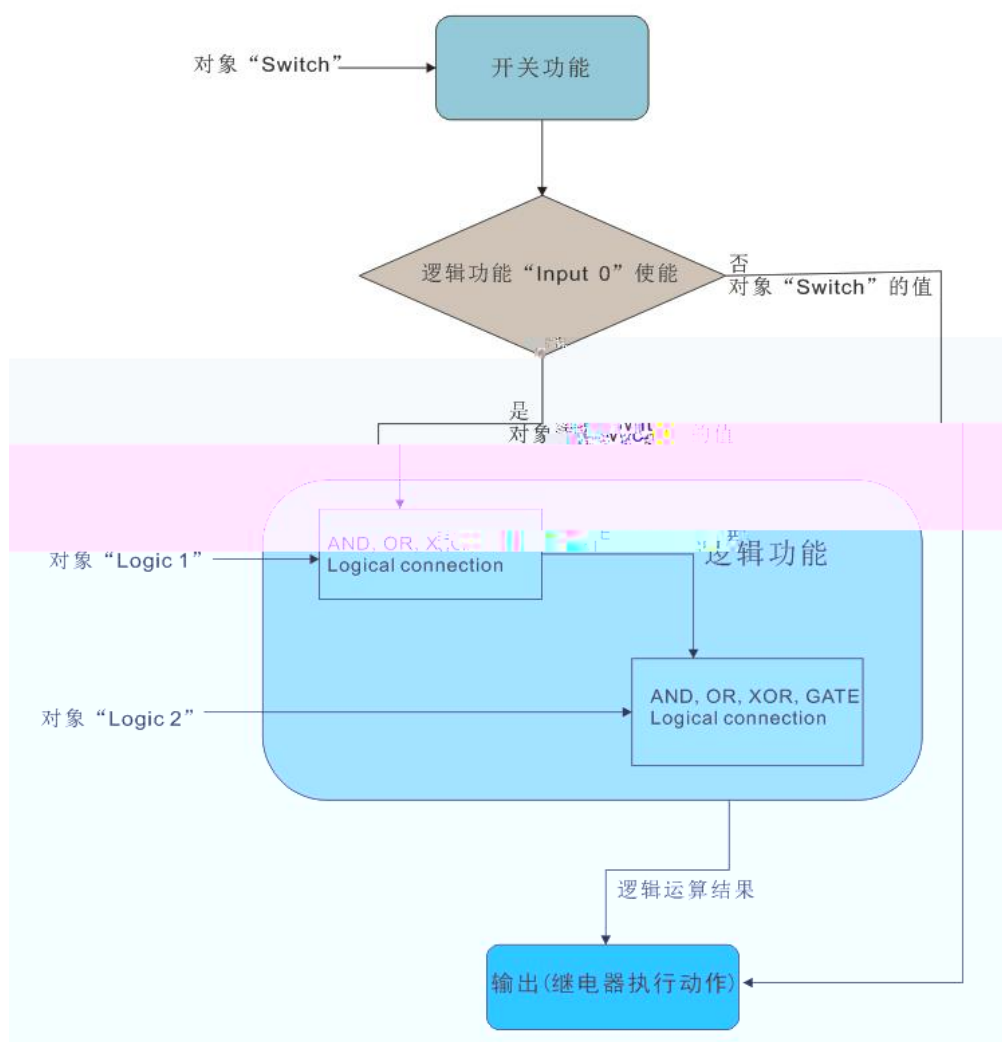
.1.

.1.1 --

Number	Name	Object Function	Description	Group Address	Length	C	R	W	T	U	Data Type	Priority
1	General	In operation			1 bit	C	-	-	T	-	switch	Low
2	Output 1 Switch	Switch			1 bit	C	-	W	-	-	switch	Low
3	Output 1 Switch	Switch status			1 bit	C	R	-	T	-	switch	Low
4	Output 1 Switch	Enable time function			1 bit	C	-	W	-	-	enable	Low
5	Output 1 Switch	Delay function			1 bit	C	-	W	-	-	switch	Low
6	Output 1 Switch	Operation hours counter			4 bytes	C	R	W	T	U	time lag (s)	Low
7	Output 1 Switch	Scene			1 byte	C	-	W	-	-	scene control	Low
8	Output 1 Switch	Forced output			2 bit	C	-	W	-	-	enable	Low
5	Output 1 Switch	Flashing function			1 bit	C	-	W	-	-	switch	Low
5	Output 1 Switch	Staircase function			1 bit	C	-	W	-	-	switch	Low
6	Output 1 Switch	Operation hours counter			2 bytes	C	R	W	T	U	time (h)	Low
8	Output 1 Switch	Forced output			1 bit	C	-	W	-	-	enable	Low

5.1 --Switch actuator

					DPT
1			1	,	1.001
"1"					
2			1	,	1.001
"Input 0" "Switch"					



			1	,	1.001
4.3"Output X Switch" "Object value of switch status " "Respond after read only" "Respond after change"					
			1	,	1.00
"0"					"1"
			1	,	1.001

"Type of time funct

1bit	"1"				"0"
2bit	"3"		"2"		"1"
"0"					
		1	1	,	1.002
"The input 1 of logic" "Enable" Input1					
10		2	1	,	1.002
"The input 2 of logic" "Enable" Input2					

5.1

--Switch actuator

.1.2

--

(

)

Number *	Name	Object Function	Description	Group Address	Length	C	R	W	T	U	Data Type	Priority
1	General	In operation			1 bit	C	-	-	T	-	switch	Low
2	Output 1 Switch	On-off control value			1 bit	C	-	W	-	-	switch	Low
3	Output 1 Switch	Status of contact			1 bit	C	R	-	T	-	switch	Low
7	Output 1 Switch	Report fault			1 bit	C	-	-	T	-	switch	Low

1bit(on-off control or PWM)

Number *	Name	Object Function	Description	Group Address	Length	C	R	W	T	U	Data Type	Priority
1	General	In operation			1 bit	C	-	-	T	-	switch	Low
3	Output 1 Switch	Status of contact			1 bit	C	R	-	T	-	switch	Low
5	Output 1 Switch	Control value(Continuous)			1 byte	C	-	W	-	-	percentage (0, 100%)	Low
4	Output 1 Switch	Status of continuous, 1bit			1 bit	C	R	-	T	-	switch	Low

1byte(Continuous)

5.2

--Heating actuator(without controller)

					DPT
2		-	1	,	1.001
"Control telegram is received as"		"1bit(on-off control or PWM)"			
1bit		"0"	"1"		
			1	, ,	1.001
"Reply the status for contact"		"Yes, 1= contact close ; 0=contact open" "Yes,0= contact close ; 1=contact open"			
		()	1	,	.001
"Control telegram is received as"		"1byte(Continuous)"			
1Byte		0...100%	"0%"	"100%"	
		, 1	1	, ,	1.001
"Reply the status for continuous control"		"Yes 0%=0, otherwise "1"(1bit)" "Yes 0%=1, otherwise "0"(1bit)"			
"Yes, 0% =0, otherwise"1"(1 bit)"		"0"	"1"		
"Yes, 0% =1, otherwise"0"(1 bit)"		"1"	"0"		
		, 1	1	, ,	.001

"Reply the st

.2.

Number *	Name	Object Function	Description	Group Address	Length	C	R	W	T	U	Data Type	Priority
1	General	In operation			1 bit	C	-	-	T	-	switch	Low
2	Output Curtain	Move UP/DOWN			1 bit	C	-	W	-	-	up/down	Low
3	Output Curtain	Slat adj/stop			1 bit	C	-	W	-	-	step	Low
4	Output Curtain	Reference movement			1 bit	C	-	W	-	-	up/down	Low
5	Output Curtain	Move to position 0..100%			1 byte	C	-	W	-	-	percentage (0..100%)	Low
6	Output Curtain	Slat position 0..100%			1 byte	C	-	W	-	-	percentage (0..100%)	Low
7	Output Curtain	Scene			1 byte	C	-	W	-	-	scene control	Low
8	Output Curtain	Position status 0..100%			1 byte	C	R	-	T	-	percentage (0..100%)	Low
9	Output Curtain	Set status 0..100%			1 byte	C	R	-	T	-	percentage (0..100%)	Low
10	Output Curtain	Sun blind position			1 bit	C	-	W	-	-	on/off	Low
11	Output Curtain	Enable auto control			1 bit	C	-	W	-	-	enable	Low
12	Output Curtain	Sun blind position 0..100%			1 byte	C	-	W	-	-	percentage (0..100%)	Low
13	Output Curtain	Sun blind position 0..100%			1 byte	C	-	W	-	-	percentage (0..100%)	Low
14	Output Curtain	Safety operation 1			1 bit	C	-	W	-	-	alarm	Low
15	Output Curtain	Safety operation 2			1 bit	C	-	W	-	-	alarm	Low
16	Output Curtain	Status of operation			1 byte	C	R	-	T	-		Low

5.3

DPT

2 / 1 , 1.00 %

		0 100%																									
/ "Venetian Blind" "Slat position 0...100%" "0%" -- -- "100%"--																											
		0 100%	1	,	.001																						
"Venetian Blind" "0%" -- -- "100%"--																											
			1	,	1 .001																						
8bit 8bit 8bit () FXNNNNNN F: '0' '1' X 0 NNNNNN 0...63 1~64 "Scene" 0~63 1 "Scene" 0																											
<table><tr><td></td><td></td></tr><tr><td>0</td><td>1</td></tr><tr><td>1</td><td>2</td></tr><tr><td>2</td><td>3</td></tr><tr><td>...</td><td>...</td></tr><tr><td>63</td><td>64</td></tr><tr><td>128</td><td>1</td></tr><tr><td>129</td><td>2</td></tr><tr><td>130</td><td>3</td></tr><tr><td>...</td><td>...</td></tr><tr><td>191</td><td>64</td></tr></table>								0	1	1	2	2	3	...	...	63	64	128	1	129	2	130	3	...	...	191	64
0	1																										
1	2																										
2	3																										
...	...																										
63	64																										
128	1																										
129	2																										
130	3																										
...	...																										
191	64																										
		0..100%	1	, ,	.001																						

/ / "0%" --- --- "100%" ---					
		0..100%	1	,	.001
"Venetian Blind" "0%" --- --- "100%" ---					
10			1	,	1.001
"0" "1"					
11		.	1	,	1.00
"0" --- "1" --- "0" --- "1" --- "0" --- "1" ---					
12		/	1	,	.001
0 100% "Venetian Blind" "0%" --- --- "100%" --- / "Sun:slat adj. 0...100%"					
1		. 0 100%	1	,	.001
"Venetian Blind" "0%" --- --- "100%" ---					

1 /1		1/2	1	,	1.00
0 1 "1" "1" 2 1					
1			1	, ,	
/ 8bit "0"--- "1"--- "2"--- "3"---1 "4"---2					

5.4_1 _One level

5.4_2 _Multi-level

131

1~3 OFF "0"--- "1"--- 1					
1		2	1	,	1.001
30					
2			1	,	1.001
30					
		/	1	, ,	1.001
"0"--- "1"---					
			1	, ,	.010
Status value for Fan speed 1/2/3 [1..100]% "0"					
		1	1	, ,	1.001
1 "0"--- "1"--- 1 1					
		2	1	, ,	1.001
35					
			1	, ,	1.001
35					
			1	,	1.00

“0 Auto/1=Cancel”

“0”——

“1”——

“1 Auto/0=Cancel

5L

“0”——

“1”——

29 Output Fan--Fan speed

30-32 Output Fan-- Fan speed x (x=1,2,3,)

1 , , **1.00**

“0”——

“1”——

0

1

, **1.00**

“Limitation on forced operation”

“0 Force/1=Cancel”

“0”——

“1”——

“1 Force/0=Cancel”

“1”——

“0”——

1

1

, **.001**

1

2

2

1

, **.001**

1

Control value

2

Control value1/2

□ □ □

2					
"0"---Control value 1 (1)					
"1"---Control value 2 (2)					
			1	, ,	1.00
"0"--- "1"---					

5.4

...

4

Number ^	Name	Object Function	Description	Group Address	Length	C	R	W	T	U	Data Type	Priority
1	General	In operation			1 bit	C	-	-	T	-	switch	Low
45	Output Valve	Heat/Cool mode status			1 bit	C	R	-	T	-	cooling/heating	Low
46	Output Valve	Control value fault			1 bit	C	R	-	T	-	alarm	Low
47	Output Valve											

5.5

						DPT
		/	1	, ,	1.100	/
/ "0"--- "1"---						
			1	, ,	1.00	
"0"--- "1"---						
/ 2		, /	1	,	1.00	
/ 0%						
/		, /	1 1	,	.001 1.001	
2 (48) 1bit 1byte						
/		, /	1 1	, ,	.001 1.001	

0/		,	/	1	,	<u>1.00</u>
"0"-- "1"--						
1/		,	/	1	,	<u>1.00</u>
"0"-- "1"--						

5.5

• •

Number ^	Name	Object Function	Description	Group Address	Length	C	R	W	T	U	Data Type	Priority
1	General	In operation			1 bit	C	-	-	T	-	switch	Low
57	Input 1	Switch			1 bit	C	-	W	T	U	switch	Low

Number ^	Name	Object Function	Description	Group Address	Length	C	R	W	T	U	Data Type	Priority
1	General	In operation			1 bit	C	-	-	T	-	switch	Low

Number ^	Name	Object Function	Description	Group Address	Length	C	R	W	T	U	Data Type	Priority
1	General	In operation			1 bit	C	-	-	T	-	switch	Low
57	Input 1	Short, Switch			1 bit	C	-	W	T	U	switch	Low
58	Input 1	Long, Switch			1 bit	C	-	W	T	U	switch	Low
61	Input 1	Disable			1 bit	C	-	W	-	-	enable	Low

"Switch"

Number ^	Name	Object Function	Description	Group Address	Length	C	R	W	T	U	Data Type	Priority
1	General	In operation			1 bit	C	-	-	T	-	switch	Low
57	Input 1	Short, Switch			1 bit	C	-	W	T	U	switch	Low
58	Input 1	Long, Dimming			4 bit	C	-	W	T	-	dimming control	Low
61	Input 1	Disable			1 bit	C	-	W	-	-	enable	Low

"Dimming"

Number ^	Name	Object Function	Description	Group Address	Length	C	R	W	T	U	Data Type	Priority
1	General	In operation			1 bit	C	-	-	T	-	switch	Low

Number ^	Name	Object Function	Description	Group Address	Length	C	R	W	T	U	Data Type	Priority
1	General	In operation			1 bit	C	-	-	T	-	switch	Low
57	Input 1	Short, Switch			1 bit	C	-	W	T	U	switch	Low
58	Input 1	Long, Dimming			4 bit	C	-	W	T	-	dimming control	Low
61	Input 1	Disable			1 bit	C	-	W	-	-	enable	Low

"Value output"

Number ^	Name	Object Function	Description	Group Address	Length	C	R	W	T	U	Data Type	Priority
1	General	In operation			1 bit	C	-	-	T	-	switch	Low

"Scene control"

Number ^	Name	Object Function	Description	Group Address	Length	C	R	W	T	U	Data Type	Priority
1	General	In operation			1 bit	C	-	-	T	-	switch	Low

"Blind"

Number ^	Name	Object Function	Description	Group Address	Length	C	R	W	T	U	Data Type	Priority
1	General	In operation			1 bit	C	-	-	T	-	switch	Low

"Shift register"

Number ^	Name	Object Function	Description	Group Address	Length	C	R	W	T	U	Data Type	Priority
1	General	In operation			1 bit	C	-	-	T	-	switch	Low
57	Input 1	Object1-On/Off			1 bit	C	-	W	T	-	switch	Low
58	Input 1	Object2-Up/Down			1 bit	C	-	W	T	-	up/down	Low
59	Input 1	Object3-SceneControl			1 byte	C	-	-	T	-	scene control	Low
60	Input 1	Object4-Percentage			1 byte	C	-	-	T	-	percentage (0..100%)	Low
61	Input 1	Disable			1 bit	C	-	W	-	-	enable	Low

"Multiple operation"

Number ^	Name	Object Function	Description	Group Address	Length	C	R	W	T	U	Data Type	Priority
1	General	In operation			1 bit	C	-	-	T	-	switch	Low
57	Input 1	Short, Delay mode			1 bit	C	-	-	T	-	switch	Low
58	Input 1	Long, Delay mode			1 bit	C	-	-	T	-	switch	Low
61	Input 1	Disable			1 bit	C	-	W	-	-	enable	Low

"Delay mode"

5.6

					DPT
			1	, , ,	1.001
	,		1	, , ,	1.001

	,		1	, , ,	1.001
	,		1	, , ,	1.001
	,		1	, , ,	1.001
0 1					
	,			, ,	.00
1~7 7 0 9 9~15 15 8 1					
	,1 /2 / /1 /2		1	,	1.001
	,1 /2 / /1 /2		2		2.001
	,1 /2 / /1 /2		1	,	.00
	,1 /2 / /1 /2		2	,	.010
	,1 /2 / /1 /2			,	.001
			1	,	1 .001
	,		1	,	1 .001
	,		1	,	1 .001
	,		1	,	1 .001
	,		1	,	1 .001

8bit		8bit																											
8bit	()	FXNNNNNN																											
	F	'0'	'1'																										
	X	0																											
	NNNNNN		0...63																										
<table><tr><td></td><td></td></tr><tr><td>0</td><td>1</td></tr><tr><td>1</td><td>2</td></tr><tr><td>2</td><td>3</td></tr><tr><td>...</td><td></td></tr><tr><td>63</td><td>...</td></tr><tr><td></td><td>64</td></tr><tr><td>128</td><td>1</td></tr><tr><td>129</td><td>2</td></tr><tr><td>130</td><td>3</td></tr><tr><td>...</td><td></td></tr><tr><td>191</td><td>...</td></tr><tr><td></td><td>64</td></tr></table>						0	1	1	2	2	3	...		63	...		64	128	1	129	2	130	3	...		191	...		64
0	1																												
1	2																												
2	3																												
...																													
63	...																												
	64																												
128	1																												
129	2																												
130	3																												
...																													
191	...																												
	64																												
1~64		"Scene"																											
		0~63																											
1	"Scene"	0																											
	/ ,		1 , , 1.00 /																										
/																													
0 /																													
1 /																													
	/ ,		1 , , 1.00																										
			1 , .010																										
/	- /		1 , , 1.001																										

/	-	/	1	,	1.00	/
/	-		1	,	1 .001	
0/	-		1	,	.001	
	-		1	,	.010	
4 x=1,2,3,4 4						
	,		1	,	1.001	
	,			,	.00	
	,		1	,	.010	
1			1	,	1.00	
/						

...

序号	名称	对象功能	描述	群组地址	长度	C	R	W	T	U	数据类型	优先级
	LED 5-...	Status			1 bit	-	-	-	-	-	switch	低

5.7 LED

					DPT
101		- ...	1 1	, , ,	1.001 .010
LED	Control by external object	LED5~8	LED5		
	1bit/1byte	LED			

5.7 LED