

#### OCTOBER 2020

# ABB IP touch 7"/10"

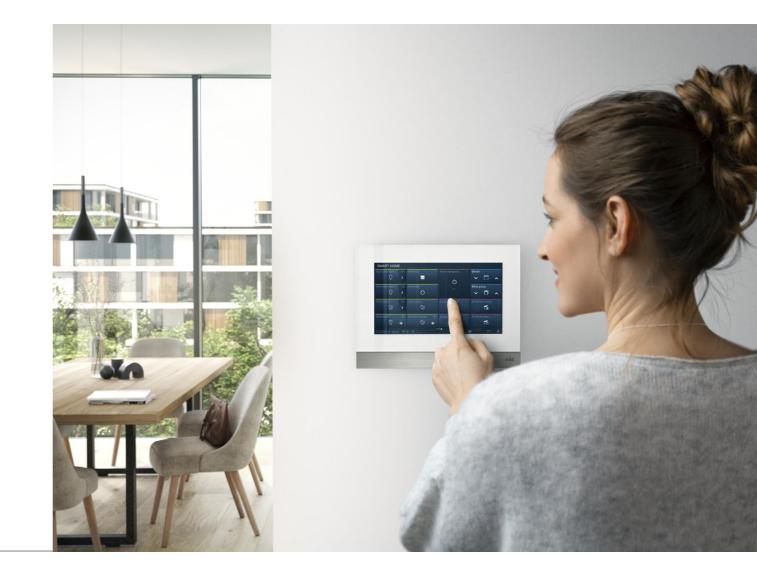
#### Webinar – Competence Center Europe – Smart Buildings

Document ID.:

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### Agenda

ABB IP touch 7"/10" Introduction Technical Information Applications: ABB-Welcome IP ABB i-bus KNX® ABB-free@home®



Introduction

Introduction

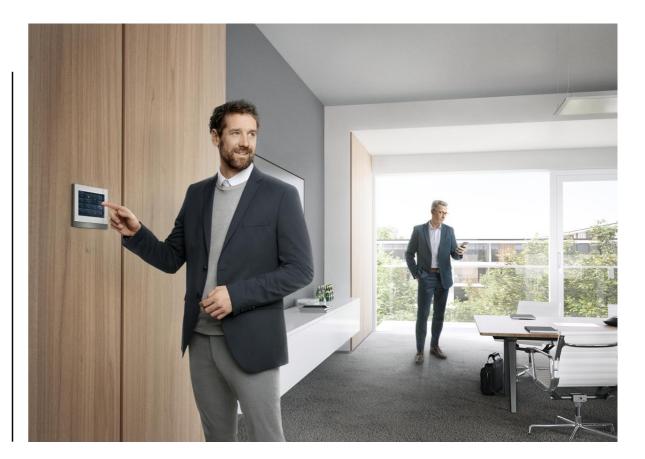
#### Motivation

The IP touch 7" and 10" control panels are IP-based and provide a far greater number of options for building control

Powerful and beautiful. The new ABB's IP touch has the most two built-to-last colors: white and black glossy glass are available

The end strips are easy to change with varieties of material and colors optional

The integration with home and building automation makes it the best universal visualization panel in residential and non-residential areas



Introduction

#### USPs

- With high resolution display
- Intuitive GUI on sliding screen
- Selection of installation box options ensure easy installation on all kind of walls
- Induction loop for hearing aid
- Only 7.8 mm depth when flush mounted
- Both LAN and WIFI version to connect to home network





Introduction

#### **Main Functions**

- Home and building dashboard
- Door entry communication: indoor station for Welcome IP with intercom function
- Easy app connection
- Easy commissioning





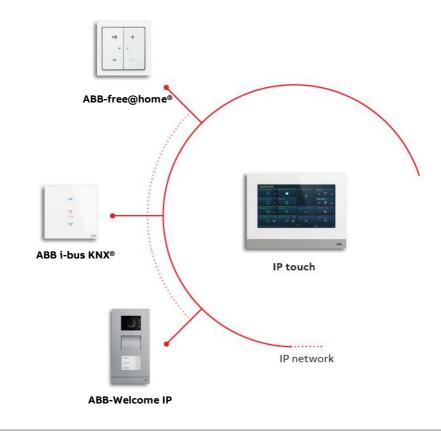
Introduction

#### One panel for all systems

#### smartIP eco system

The platform does away with restrictions on the number of devices and range, making planning and installation for projects of every size far simpler

A glance into the future: With the integration of the ABBfree@home® and ABB i-bus KNX® systems into the IP world, ABB extends its functionality many times over



Introduction

#### IP touch 7"



#### IP touch 10"



**Technical Information** 

Technical information

#### IP touch 7"

- SD card slot for extension of the picture memory
- Capacitive display with glass surface (Resolution: 1024 x 600)
- For flush-mounted installation with 42361F-03
- Power supply via Power-over-Ethernet (PoE) 802.3af
- Alternative power supply 24 Volt DC, 280 mA
- Alternative power supply via adapter plug 53011PS-03
- Protection class (device): IP 30
- Temperature range (device): -10°C ... +55°C
- Dimensions: (L x W x D): 150 mm x 198.5 mm x 17 mm



Technical information

#### IP touch 7"

Black	ABB		Busch-Jaeger	
LAN/LAN	H8236-5B	2TMA130050 B0067	H82365-B-03	2TMA130050 B0017
LAN/WIFI	H8236-4B	2TMA130050 B0065	H82364-B-03	2TMA130050 B0016

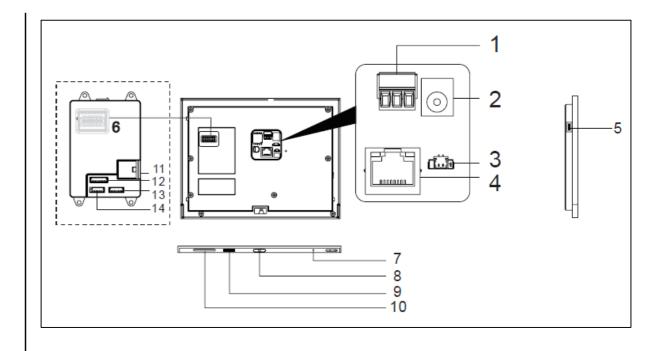
White	ABB		Busch-Jaeger	
LAN/LAN	H8236-5W	2TMA130050 W0067	H82365-W- 03	2TMA130050 W0017
LAN/WIFI	H8236-4W	2TMA130050 W0065	H82364-W- 03	2TMA130050 W0016



Technical information

#### **IP touch 7" – terminal description**

No.	Function
1	Power input connector
2	Power input connector (DC-JACK input)
3	Doorbell connector
4	LAN1 (PoE)
5	Micro USB Upgrade connector
6	<sup>3</sup> Extension module connector
7	Microphone
8	Dismantling switch
9	Micro SD card connector
10	Speaker
11	<sup>2</sup> LAN2
12	<sup>2</sup> Alarm connector
13	<sup>2</sup> RS485 connector, 12 V output, emergency port (SOS, GAS, fire)
14	<sup>2</sup> Relay output



Technical information

#### IP touch 10"

- SD card slot for extension of the picture memory
- Capacitive display with glass surface (Resolution: 1280 x 800)
- For flush-mounted installation with 42361F-03
- Power supply via Power-over-Ethernet (PoE) 802.3af
- Alternative power supply 24 Volt DC, 280 mA
- Alternative power supply via adapter plug 53011PS-03
- Protection class (device): IP 30
- Temperature range (device): -10°C ... +55°C
- Dimensions: (L x W x D): 185 mm x 251 mm x 31 mm



Technical information

#### IP touch 10"

Black	ABB		Busch-	Jaeger
LAN/LAN	H8237-5B	2TMA130050 B0055	H8237-5B-03	2TMA130050 B0060
LAN/WIFI	H8237-4B	2TMA130050 B0054	H8237-4B-03	2TMA130050 B0058

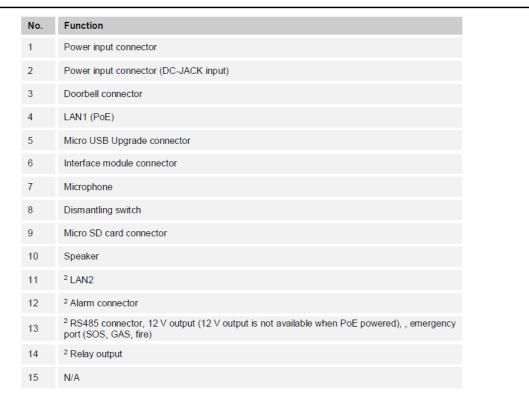
White	ABB		Busch-	Jaeger
LAN/LAN	H8237-5W	2TMA130050 W0055	H8237-5W- 03	2TMA130050 W0060
LAN/WIFI	H8237-4W	2TMA130050 W0054	H8237-4W- 03	2TMA130050 W0058

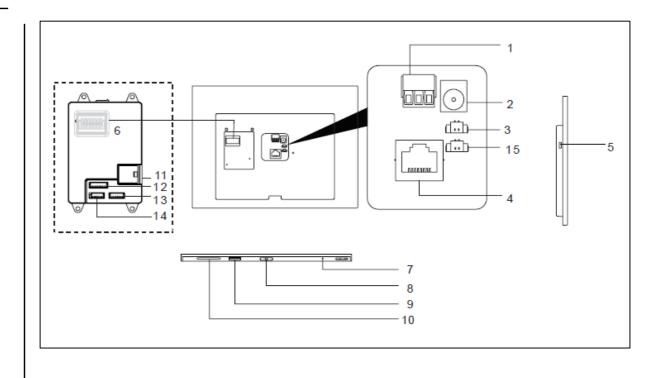


Slide 14

Technical information

#### **IP touch 10" – terminal description**







Technical information

#### Installation material

Black	ABB Busch-		Jaeger	
Flush- mounted box and Pre installation box 7" and 10"	42361F	2TMA130160 B0132	42361F-03	2TMA130160 B0134
Surface mounted box for IP touch 7'' panel	42361S-W 42361S-B	2TMA130160 W0017 2TMA130160 B0017	42361S-W-03 42361S-B-03	2TMA130160 W0021 2TMA130160 B0021
Surface mounted box for IP touch 10"	42371S-W 42371S-B	2TMA130161 W0001 2TMA130161 B0001	42371S-W-03 42371S-B-03	2TMA130160 W0041 2TMA130160 B0041

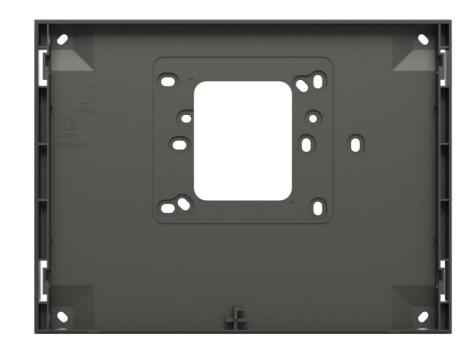


ABB panels overview (ABB i-bus® KNX)

				ABB RoomTouch®	
		ABB IP touch 7	ABB IP touch 10	5"	ABB SmartTouch® 7"
L	Display Size	7''	10''	5''	7"
Technical Information	Display Resulution	1024 x 600	1280 x 800	720 x 1280	1024 x 600
B	Power supply	PoE / 24V	PoE / 24V	24V	20-32 VDC
for	KNX Connection	No	No	Yes	Yes
l	IP Connection	LAN/WLAN	LAN/WLAN	No	No
cal	Mounting	FM/SM	FM/SM	FM	FM/SM
ini i	Available Colors	Black/White	Black/White	Black/White	Black/White
ech	Number of pages	8	8	3 / 10	30
Ĕ	Number of control elements	64	100	30	480
KNX Functions	Switch, Dimmer, RGBW , Value Slider, Blinds, Fan Switch, Scene, Display, RTC Control Frame	yes	yes	yes	yes
L KN	Split Unit Control	no	no	yes	no
л	Page Link	yes	yes	no	yes
	Audio Control	yes	yes	yes	yes
SL	Door Communication	yes	yes	no	yes
Other functions	Fault + Alarm Messages, Scene actuators, presence simulation, time programs, logic functions	yes	yes	yes	yes
f	RTC Internal	5	5	1	1

ABB panels overview (ABB-free@home®)

		Market of Market     Market     Market     Market     Market       Market     Market     Market     Market     Market		ARE	
		ABB IP touch 7	ABB IP touch 10	ABB- free@homeTouch 4.3"	ABB free@homeTouch 7"
Technical Information	Display Size	7"	10"	4,3"	7"
ati	Display Resulution	1024 x 600	1280 x 800	480 x 854	800 x 480
E	Power supply	PoE / 24V	PoE / 24V	24V	20-32 VDC
fo	free@home Connection	No	No	Yes	Yes
<u> </u>	IP Connection	LAN/WLAN	LAN/WLAN	No	No
ica	Mounting	FM/SM	FM/SM	FM	SM
u c	Available Colors	Black/White	Black/White	Black/White	Black/White
ecl	Number of pages	4	4	4	1
F	Number of control elements	64	100	16	16
f@h Functions	Switch, Dimmer, RGBW , Value Slider, Blinds, Fan Switch, Scene, Display, RTC Control Frame	Partly	Partly	Partly	Partly
0 t	Split Unit Control	no	no	Yes	Yes
– 'n	Page Link	yes	yes	no	No
ш.	Audio Control	yes	yes	yes	Yes
S	Door Communication	yes	yes	no	Yes (2-wire)
Other functions	Fault + Alarm Messages, Scene actuators, presence simulation, time programs, logic functions	Partly	Partly	Partly	Partly
fu	RTC Internal	no	no	1	No
©ABB	RICInternal	no	no	1	NC

ABB-Welcome IP

ABB-Welcome IP

#### **Main functions**

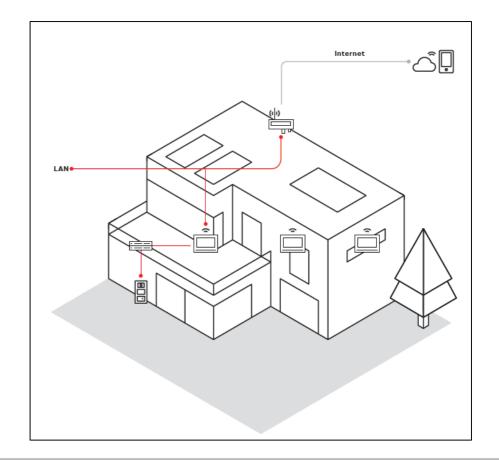
- Up to 8 indoor stations in one apartment
- Integrated IP gateway
- Apartment to apartment intercom
- Intercom in the same apartment
- Automatic unlock
- Text communication
- Absence messages
- Direct integration of IP cameras



ABB-Welcome IP

#### Gateway between technical and private network

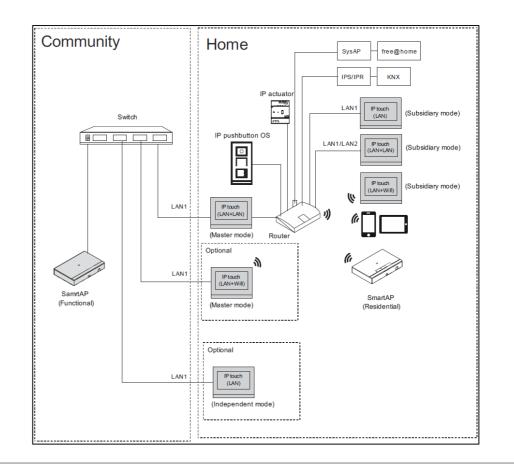
- The IP touch builds up the gateway between private and technical network to protect your private IP network
- Connection to technical network via LAN
- Connection to private network can be LAN or WLAN



**ABB-Welcome IP** 

#### Application

- The SmartAP can be located in the technical network (functional mode) or in the private network (residential mode), depending on the application
- One IP touch is always used as a master device and builds up the gateway between technical and private network
- If you use the LAN/WIFI IP touch as a master panel, the WIFI port must be connected to the home network



**ABB-Welcome IP** 

#### Local settings (Engineering settings)

- In the engineering settings all relevant settings for Welcome IP, KNX and ABB-free@home<sup>®</sup> must be fulfilled
- Addressing and mode selection
- Selection of the home network port
  - If "Master mode"
    - LAN1/LAN2 (for H82365-.)
    - WIFI by default (for H82364-.)
  - If "Subsidiary mode"
    - LAN1/LAN2 (for H82365-.)
    - LAN/WIFI (for H82364-.)

🔶 Engineering setting	gs					
Engineering settings						
Local settings	Call mode					
Outdoor station settings	Physical address	~				
IP actuator settings	Mode select					
Smart home settings	Master mode	~				
Password management	Block no.		Room no.			
	001		0101			
	Device no					
Tu 24/07/18 17:18 🛛 🗣 🗣				0	Q	
IP actuator settings	Home network port					
Smart home settings	WIFI	×				

ABB-Welcome IP

#### **Network settings (WIFI)**

- Connection to the local WLAN must be setup in the system settings → Network settings
- WLAN must be selected via the button "WIFI settings"
- After entering the password the connection will be visible below the button

System Settings	
System settings	
Sound	WIFI settings
Language	
Network settings	Network settings
System Settings	
System settings	
Sound	WIFI settings
Language	
Network settings	ି WIFI: TP-LINK_fraya

ABB-Welcome IP

#### **Network settings**

- IP address settings for the IP touch
- The indoor station uses DHCP to obtain an IP address from the router by default
- It is also possible to set the IP address by unticking the checkbox

★ System Settings		
System settings		
Sound	Network settings	
Language	Obtain IP address automatica	ally
Network settings	IP address	Subnet mask
Door Entry System	192 . 168 . 33 . 100	255 . 255 . 255 . 0
Display	Default gateway	DNS
Display	192 . 168 . 33 . 1	192.168.0.5
Date and time		
Monitor settings		ОК
Su 22/07/18 03:01 훅 🐔		

**ABB-Welcome IP** 

- IP cameras, which are used in the same network, for example for the ControlTouch, can be used visualized with the IP touch
- IP cameras must support ONVIF Profile S



	Camera		< <b>i</b>
Add new project	Name	IP Cam Internal3	
Import project	Туре	Other	~
CT Scripts	URL	http://192.168.0.243:80/cgi-bin/vid	eo.cgi?user
Group Addresses	URL external	http://192.168.0.243:80/cgi-bin/vid	eo.cgi?user
Cameras		1280 x 720	~
Commands	Width	1280	
Data Logger	Height	720	
Presence detection		0	
Trigger	Interval (s)	-	
Scripts	Mobile / wifi	Always get videostream	~
Sonos KNX linking	Username	admin	
Room thermostat controllers	Password	•••••	
	Display no warnings for t	nis camera.	
Sonos Training	-	Change	
Tills Haus		Change	
Archive	For Axis/Vapix or Mobotix or	amera's the URL should be the base url of the o	camera including a / at the er
Backups		nould be the full path to the MJpeg stream or in	

ABB-Welcome IP

- The indoor station and the camera must be on the same network
- On the "System settings" screen, click "Monitor settings",
   "Home monitor", then click p to access the corresponding screen

System Settings			-
System settings			
Network settings	Home monitor	Community monitor	
Door Entry System			
Display			
Date and time			
Monitor settings			
APP settings			
Su 22/07/18 00:48 🧧 🖵 🕤		P P	

**ABB-Welcome IP** 

- The indoor station and the camera must be on the same network
- On the "System settings" screen, click "Monitor settings",
   "Home monitor", then click places the corresponding screen
- Click to search the IP-Cams and create a camera list automatically
- Select a camera from the camera list and click. Enter the name, user account and password, then click "OK"

System Settings Home monitor	Ŕ			
Home monitor				<b>v</b>
	Delete All ៣			
Name	Address	Status		
General	192.168.33.100	0	Ū	
×		€		
Su 22/07/18 00:26 🤋 🖵 🕤			0 P	

**ABB-Welcome IP** 

- The indoor station and the camera must be on the same network
- On the "System settings" screen, click "Monitor settings",
   "Home monitor", then click place to access the corresponding screen
- Click to search the IP-Cams and create a camera list automatically
- Select a camera from the camera list and click . Enter the name, user account and password, then click "OK"
- On the "Home monitor" screen, tick "Enable" to enable the function
- With this setting, the register IP-Cam can be selected from the drop-down list on the "Door entry" screen

System Setting	s Home monitor			
Home monitor				¥
Name	Address	Status	Linked with door	Enable
General	192.168.33.100	✓		V
		×		
Su 22/07/18 00:27	ି ର 🖵 🖣			0 P .

ABB i-bus KNX®

ABB i-bus KNX®

#### **KNX integration**

- IP touch must be connected to the IP network of the KNX IP Router with the home network connection of the panel (can be adjusted on the panel directly)
- Easy connection via LAN or WLAN
- Programming via SD card

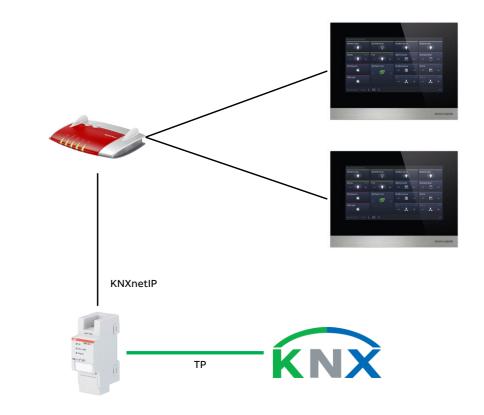


ABB i-bus KNX®

#### **Panel settings**

- On the "Engineering setting" screen, click "Smart home settings" to access the corresponding screen
- Select KNX
- KNX interface can be detected automatically or manual input of the IP-address

Engineering setting	S	
Engineering settings		
Local settings	Smart home mode	
Outdoor station settings	KNX settings	~
IP actuator settings	Import configuration file	
Smart home settings	Read SD card	
Engineering password		

ABB i-bus KNX<sup>®</sup> – Commissioning

#### **Overview DCA tool – Preperation**

- The ABB IP touch 7"/10" is commissioned with the "ABB/BJE Touch DCA"
- DCA tool must be downloaded on <u>https://my.knx.org/de/shop/ets-apps</u> and activated in the ETS5
- All settings, parameters and group addresses will be adjusted in the DCA tool

Apps	+ ¢		<b>10</b> active / 1	8 installed
	Name	Vendor	Version	License
	ABB IoT Dashboard ETS App	ABB	1.0.2.0	
🗸 A88	ABB KNX Bus Update	ABB	1.0.37.0	<b>L</b>
🗸 A88	ABB SUG/U1.1 Configuration App	ABB	1.0.23.0	G.
V A88	ABB Touch DCA	ABB	1.0.136.0	

ABB i-bus KNX<sup>®</sup> – Commissioning

#### **Overview DCA tool – Get started**

- After successful installation of the DCA tool the ABB IP touch can be added to the ETS project
- Tool will start by clicking on the tab "DCA"
- In the parameters no settings can be done

0.0.1 H8236 IP touch > DcaTouch	
DcaTouch	Please use DCA

📳 Buildings 🔹	Number	Name	Object Function	Description	Group Addres	Length	С	R \	ΝТ	U	Data Type	Priority
Dynamic Folders	∎≵ 1	Ringtone Volume	input/output			1 byte	c -	W	/ Т	U p	percentag	Low
Webinar RoomTouch	∎‡ 2	Increase/decrease ringtone volume	input			4 bit	с -	W	! - !	Uc	dimming c	. Low
ABB RoomTouch	<b>■</b> ‡ 3	Speech Volume	input/output			1 byte	C -	W	!Т	Up	percentag	Low
55	<b>■‡</b>  4	Increase/decrease speech volume	input			4 bit	с -	W	( - )	Uc	dimming c	. Low
🔺 🛄 IP Touch	■‡ 5	Ringing	output			1 bit	с -	-	Т	- s	switch	Low
Image:	■2 6	Call started	output			1 bit	c -	-	Т	- 5	switch	Low
Other devices	■‡ 7	Call ended	output			1 bit	c -	-	Т	- s	switch	Low
X Trades	<b>■</b> ‡ 8	Mute incoming calls	input/output			1 bit	c -	W	/Т	U s	switch	Low
	■‡ 9	Switch Light	input			1 bit	c -	W	ΙΤ	U s	switch	Low
	■‡ 10	Open door	input			1 bit	с -	W	/Т	U s	switch	Low
	■# 11	Block all timeprograms	input			1 bit	с -	W	- 1	Uε	enable	Low
	■‡ 12	Activate vacation	input			1 bit	с -	W	- 1	U s	start/stop	Low
	■‡ 13	Status vacation	output			1 bit	с -	W	(т	U s	start/stop	Low
	■之 16	Display brightness	input			1 byte	c -	W	- 1	Up	percentag	Low
	■之 17	Backlight on/off	input			1 bit	c -	W	- 1	Us	switch	Low
	■2 18	Backlight status	output			1 bit	c -	-	т	- s	switch	Low
	■之 19	Screensaver on/off	input			1 bit	c -	W	- 1	U s	switch	Low
	■≵ 20	Screensaver status	output			1 bit	c -	-	Т	- 9	switch	Low
	Group Object	ts Channels Parameters	DCA /									

ABB i-bus KNX<sup>®</sup> – Commissioning

#### **Overview DCA tool – general setup**

- The working area is separated into 5 blocks
  - Application/Navigation internal functions and pages
  - Pages setup of the control elements
  - Parameter
  - Communication Objects
  - Group Addresses
- Tool bar: all essential functions for the panel

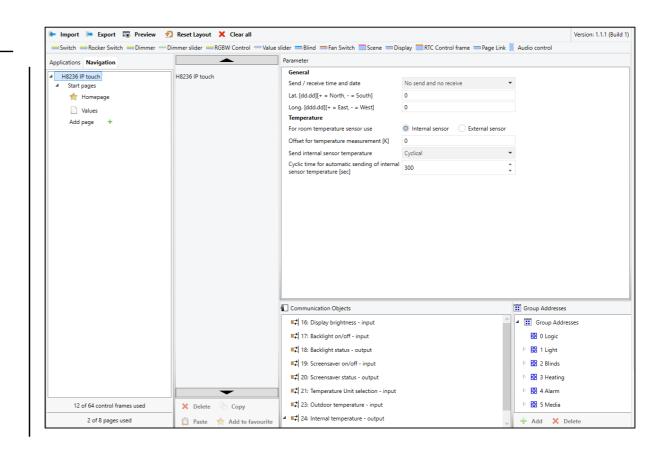
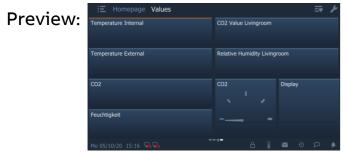


ABB i-bus KNX<sup>®</sup> – Commissioning

#### **Overview DCA Tool – Tool Bar**

- Import project data (.stpl-file)
- Export
  - .pid-file: to import configuration via SD-card
  - .stpl-file: to create backup of the configuration



- Reset Layout: reset layout of the DCA tool
- Clear all: Reset of all functions, pages, parameter, etc.
- 2nd line: all available control elements

	iew 🕤 Reset Layout 🗙 Clear all	Value slider — Blind — Fan Switch — Scene — Di:	splayRTC Control framePage Link	Version: 1.1.1 (Build
Applications Navigation		Parameter		
<ul> <li>Populacións</li> <li>Revisión</li> <li>Revisión</li> <li>Revisión</li> <li>Start pages</li> <li>★ Homepage</li> <li>Values</li> <li>Add page</li> </ul>	H8236 IP touch	General           Send / receive time and date           Lat. [dd.dd][+ = North, - = South]           Long. [ddd.dd][+ = East, - = West]           Temperature           For room temperature sensor use           Offset for temperature measurement [K]           Send internal sensor temperature           Cyclic time for automatic sending of internal           sensor temperature [sec]		• • •
		Communication Objects		II Group Addresses
		Communication Objects	^	Group Addresses     Group Addresses
			^	· · · · · · · · · · · · · · · · · · ·
		16: Display brightness - input         17: Backlight on/off - input         11: Backlight status - output	^	<ul> <li>▲ III Group Addresses</li> <li>BI 0 Logic</li> <li>▶ BI 1 Light</li> </ul>
		■‡ 16: Display brightness - input ■‡ 17: Backlight on/off - input	^	Group Addresses
		16: Display brightness - input         17: Backlight on/off - input         11: Backlight status - output		<ul> <li>▲ III Group Addresses</li> <li>B 0 Logic</li> <li>▶ II Light</li> <li>▶ II 2 Blinds</li> <li>▶ II 3 Heating</li> </ul>
		<ul> <li>■2  16: Display brightness - input</li> <li>■2  17: Backlight on/off - input</li> <li>■2  18: Backlight status - output</li> <li>■2  19: Screensaver on/off - input</li> </ul>		<ul> <li>▲ III Group Addresses</li> <li>B 0 Logic</li> <li>▶ B 1 Light</li> <li>▶ B 2 Blinds</li> </ul>
12 of 64 control frames used	× Delete Copy	<ul> <li>■2  16: Display brightness - input</li> <li>■2  17: Backlight on/off - input</li> <li>■2  18: Backlight status - output</li> <li>■2  19: Screensaver on/off - input</li> <li>■2  20: Screensaver status - output</li> </ul>		<ul> <li>▲ III Group Addresses</li> <li>B 0 Logic</li> <li>▶ II Light</li> <li>▶ II 2 Blinds</li> <li>▶ II 3 Heating</li> </ul>

ABB i-bus KNX® – Commissioning

#### **Overview DCA Tool – Application/Navigation**

- Application:
  - System settings
- Activation of inputs
- Fault and alarm messages
- Scenes, time programs, logic functions
- RTC
- Favorites
- Navigation:
  - Creation of pages
  - Overview of used pages and control elements (only portrait mode)

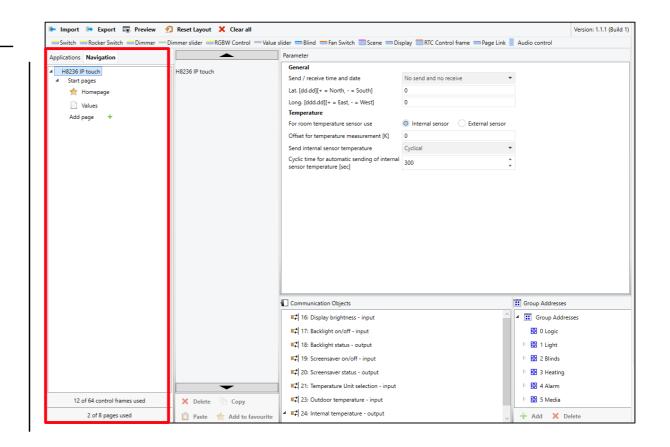




ABB i-bus KNX<sup>®</sup> – Commissioning

#### **Overview DCA Tool – Pages**

- Setup for each page
- Control elements can be dragged from the task bar to the field of the page
- Each added control element can be deleted, copied or add to the favorites
- Copied control elements can be pasted on an empty spot

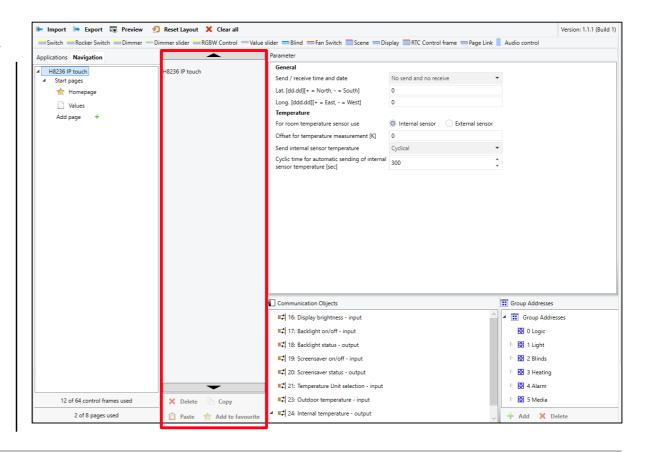


ABB i-bus KNX® – Commissioning

#### **Overview DCA Tool – Parameter**

- General parameter for the panel itself, all pages and control elements
- Can only be adjusted in the DCA tool

Import 🛤 Export 🐻 Previ	iew 👩 Reset Layout 🗙 Clear all ner — Dimmer slider — RGBW Control —			Version: 1.1.1 (Buil
		Parameter		
Ications Navigation H8236 IP touch Start page Values Add page +	Parameter General Send / receive time and date Lat. [dd:dd][+ = North, - = South] Long. [dd:dd][+ = East, - = West] Temperature For room temperature sensor use Offset for temperature measurement [K] Send internal sensor temperature Cyclic time for automatic sending of internal sensor temperature [sec]	No send and no receive 0 0 0 0 Internal sensor 0 Cyclical 3 300	•	
		Communication Objects		Group Addresses     Group Addresses     Group Addresses     Group Addresses     O Logic
		다. 18: Backlight status - output 다리 19: Screensaver on/off - input 다리 20: Screensaver status - output 다리 21: Temperature Unit selection - input		<ul> <li>▷ 등 1 Light</li> <li>▷ 등 2 Blinds</li> <li>▷ 등 3 Heating</li> <li>▷ 등 4 Alarm</li> </ul>
12 of 64 control frames used	🗙 Delete 📄 Copy	at 23: Outdoor temperature - input at 24: Internal temperature - output		🖻 🛗 5 Media



ABB i-bus KNX<sup>®</sup> – Commissioning

#### **Overview DCA Tool – Communication objects**

- All available communication objects for the selected control element
- Can be linked also via the tab "Group Objects"

		П		Version: 1.1.1 (Build
Switch Rocker Switch Dim		ol — Value slider — Blind — Fan Switch — Scene — Di	isplay 🔜 RTC Control frame 📁 Page Lin	Audio control
pplications Navigation	<b></b>	Parameter		
H8236 IP touch	H8236 IP touch	General		
▲ Start pages		Send / receive time and date	No send and no receive	•
🚖 Homepage		Lat. [dd.dd][+ = North, - = South]	0	
Values		Long. [ddd.dd][+ = East, - = West]	0	
Add page 🕂		Temperature For room temperature sensor use	Internal sensor     External sensor	-
		Offset for temperature measurement [K]		•
		Send internal sensor temperature	Cyclical	•
		Cyclic time for automatic sending of internal sensor temperature [sec]		*
		Communication Objects		Group Addresses
		■≵ 16: Display brightness - input		Group Addresses
		■리 16: Display brightness - input ■리 17: Backlight on/off - input		Group Addresses
		#2        16: Display brightness - input         #2        17: Backlight on/off - input         #2        18: Backlight status - output		<ul> <li>▲ III Group Addresses</li> <li>B 0 Logic</li> <li>▶ I Light</li> </ul>
		#2        16: Display brightness - input         #2        17: Backlight on/off - input         #2        18: Backlight status - output         #2        19: Screensaver on/off - input		<ul> <li>✓ III Group Addresses</li> <li>BI 0 Logic</li> <li>▷ BI 1 Light</li> <li>▷ BI 2 Blinds</li> </ul>
		#2        16: Display brightness - input         #2        17: Backlight on/off - input         #2        18: Backlight status - output		<ul> <li>▲ III Group Addresses</li> <li>B 0 Logic</li> <li>▶ III Light</li> </ul>
		#2        16: Display brightness - input         #2        17: Backlight on/off - input         #2        18: Backlight status - output         #2        19: Screensaver on/off - input		<ul> <li>✓ III Group Addresses</li> <li>BI 0 Logic</li> <li>▷ BI 1 Light</li> <li>▷ BI 2 Blinds</li> </ul>
12 of 64 control frames used	× Delete Copy	#2       16: Display brightness - input         #2       17: Backlight on/off - input         #2       18: Backlight status - output         #2       19: Screensaver on/off - input         #2       20: Screensaver status - output		<ul> <li>✓ I Group Addresses</li> <li>B 0 Logic</li> <li>&gt; B 1 Light</li> <li>&gt; B 2 Blinds</li> <li>&gt; B 3 Heating</li> </ul>



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#### **Overview DCA Tool – Group addresses**

- All available group addresses in the project
- To link the communication objects with the group addresses
- New group addresses can be created here
- Can be linked also via the tab "Group Objects"

	Dimmoralistan - DCDM Control	-Value slider -Blind -Fan Switch Scene -Di	and an International Annual International Contract	Audia anatasi
Applications Navigation		Parameter	splay RIC Control frame Page Link	Audio control
4 H8236 IP touch	H8236 IP touch	General		
Start pages	H8230 IP touch	Send / receive time and date	No send and no receive	•
📩 Homepage		Lat. [dd.dd][+ = North, - = South]	0	
Values		Long. [ddd.dd][+ = East, - = West]	0	
Add page +		Temperature		
		For room temperature sensor use	Internal sensor     External sensor	
		Offset for temperature measurement [K]	0	
		Send internal sensor temperature	Cyclical	•
		Cyclic time for automatic sending of internal sensor temperature [sec]		* *
		Communication Objects		E Group Addresses
		Communication Objects		Group Addresses     Group Addresses
		16: Display brightness - input		Group Addresses
		■之 16: Display brightness - input ■之 17: Backlight on/off - input		Group Addresses
		■2       16: Display brightness - input         ■2       17: Backlight on/off - input         ■2       18: Backlight status - output		<ul> <li>▲ III Group Addresses</li> <li>BII 0 Logic</li> <li>▶ BII 1 Light</li> </ul>
		16: Display brightness - input         17: Backlight on/off - input         17: Backlight status - output         11: Backlight status - output         12: 19: Screensaver on/off - input		<ul> <li>▲ I Group Addresses</li> <li>B 0 Logic</li> <li>▶ B 1 Light</li> <li>▶ B 2 Blinds</li> </ul>
12 of 64 control frames used	× Delete Copy	16: Display brightness - input         17: Backlight on/off - input         17: Backlight status - output         18: Backlight status - output         19: Screensaver on/off - input         12: 10: Screensaver status - output		<ul> <li>▲ If Group Addresses</li> <li>B 0 Logic</li> <li>▶ I Light</li> <li>▶ 8 2 Blinds</li> <li>▶ 8 3 Heating</li> </ul>



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#### System Settings – General & Temperature

- Time/Date settings can be sent or received
- Geo data
- Settings for the internal temperature sensor of the panel
- Internal measured temperature settings

Applications Navigation	or	Applications Navigation H8236 IP touch
Parameter	¥	
General		
Send / receive time and date	No send and no re-	ceive 👻
Lat. [dd.dd][+ = North, - = South]	0	
Long. [ddd.dd][+ = East, - = West]	0	
Temperature		
For room temperature sensor use	Internal sensor	<ul> <li>External sensor</li> </ul>
Offset for temperature measurement [K]	0	
Send internal sensor temperature	Cyclical	•
Cyclic time for automatic sending of internal sensor temperature [sec]	300	* *

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#### Pages and Functions – New pages

- All pages and their functions are displayed in the "Navigation" tab
- New pages can be created by clicking on the plus icon next to "Add page"
- Up to 8 pages with 64 control elements can be created
- The new page will be displayed in the list

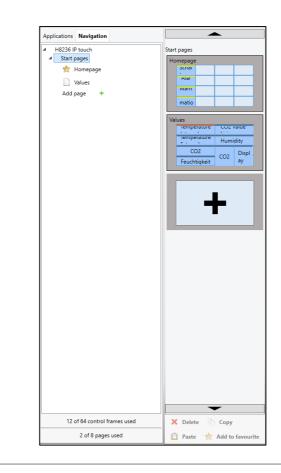


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#### Pages and Functions – Page settings

- Page settings:
- Name of Page
- Maximum 16 controls
- Page PIN-protected (default: no)
- PIN-code level: 1, 2 or 3 (see system settings "Security")
- The order of the pages can be changed
- The first page of the list is the homepage

Applications Navigation		Parameter		
▲ H8236 IP touch	Start pages > Main Functions	Name of Page	Main Functions	
▲ Start pages	Main Functions	Page PIN-protected	$\checkmark$	
🚖 Homepage		PIN-code level	Level 1	•
Values				
Main Functions				
Add page +				

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#### **Pages and Functions – Adding functions**

- New functions can be added to a page by dragging the needed function from the tool bar to a free field of the page
- Available functions: switch, rocker switch, dimmer, dimmer slider, RGBW control, value slider, blinds, fan switch, display, scene, RTC control frame, page link, audio control
- Each control element can be deleted, copied or add to the favorites, when it is selected



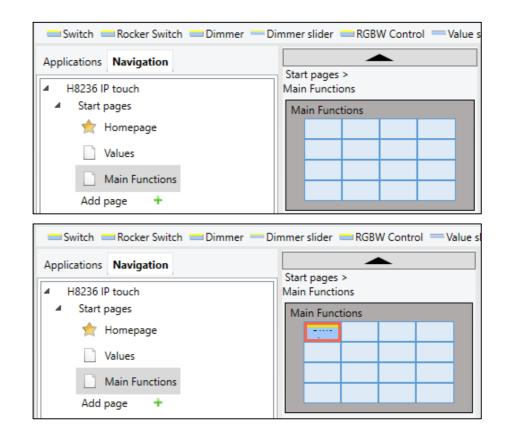


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#### **Pages and Functions – Switch**

- Name of control element: will be displayed on the IP touch
- 1 column or 2 columns control element
- Kind of switch:
  - Toggle  $\rightarrow$  switch between 1 and 0 (1-bit)
  - Press/Release → e.g. garage opener: press = 1 / release = 0 (different object types possible)
  - Short/Long → separate function for long and short press (different object types)
- Status can be controlled by separate object
- Icon can be changed
- Alternatively texts can be used instead of icons

	Parameter		
Start pages > Main Functions	Name of control element	Switch	
Main Functions	Function of control element	Light (Yellow) 🔻	
	Control size	1 column     2 columns	
	Kind of Switch To	Toggle 🔻	
	Status of control (lcon/Text) is controlled by separate object		
	Type of Icon	Icons Text	
	Icon for On	•	
	Icon for Off	Ŷ.	
	Enable communication object "Disable" 1 bit		

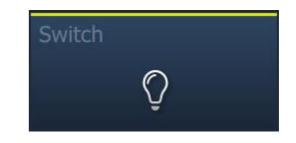
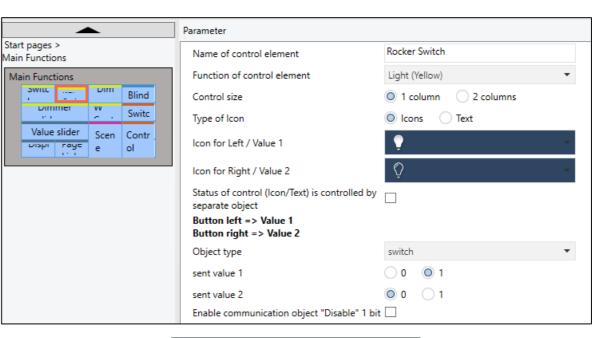


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#### Pages and Functions – Rocker switch

- Button up and button down control element
- 1 column or 2 columns control element
- Name, icon/text, type of icon and status-text (visible on the top left side) can be adjusted
- Object type can be chosen individually

switch
forced operation
1 byte value [0%100%]
1 byte value [0255]
1 byte value [-128+127]
Scene number
RTC operating mode
Temperature
2 byte value [-32768+32767]
2 byte value [065535]
2 byte floating point
4 byte value [-2147483648+214748364
4 byte value [04294967295]
14 byte text



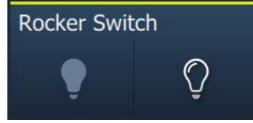
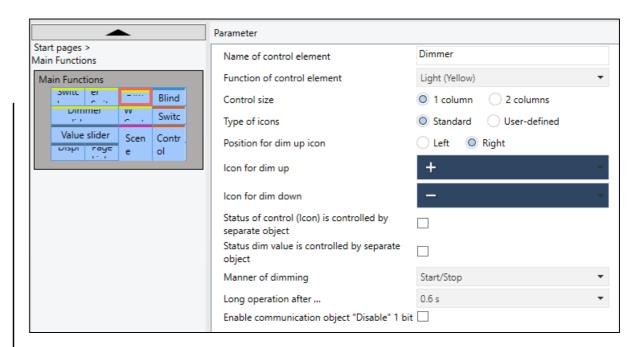


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#### **Pages and Functions – Dimmer**

- Freely adjustable dimming control element
- Operation like push-button/sensor
- 1 column or 2 columns control element
- Manner of dimming:
  - Start/Stop (4-bit relative dimming)
  - Stepwise (4-bit)
  - Value (1-byte)
- Name and icons can be changed
- Status of control can be controlled by separate object



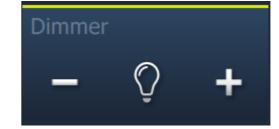


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#### Pages and Functions – Dimmer slider

- Freely adjustable dimming control element
- 2 columns or 3 columns control element
- Value sender (when released or cyclically)
- Status icon can be separated

	Parameter	
tart pages > lain Functions	Name of control element	Dimmer slider
Main Functions	Function of control element	Light (Yellow) 🔻
Switc er Dim Blind	Control size	2 columns     3 columns
Switc	Type of icons	Standard User-defined
Value slider Scen Contr	Slider goes from	Left to right Right to left
	Status of control (lcon) is controlled by separate object	
	Show value in Control	
	Slider sends	○ When slider is released ◎ cyclically
	Brightness change [%]	1 *
	Telegram is repeated every [s]	0.5s 👻
	Enable communication object "Disable" 1 bi	t 🗌

Dimmer slider

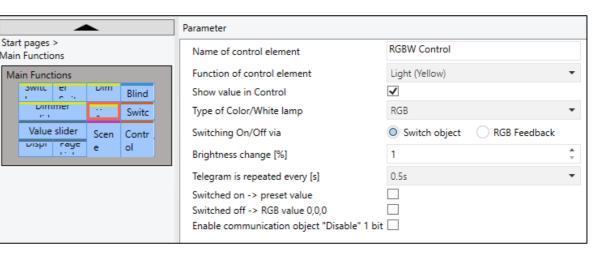
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#### Pages and Functions – RGBW Control

- Control for RGBW control
  - RGB
  - RGBW
  - RGBW + WW/CW
  - WW/CW
- Advanced settings for each control mode

#### Communication Objects

- ■
   796: Switch output/input
- ■↓ 798: Value Red output/input
- ■↓ 799: Value Green output/input
- 800: Value Blue output/input
- 2 801: Value RGB [3 byte] output/input
- 203: Value Cold White output/input
- ■↓ 804: Value Warm White output/input



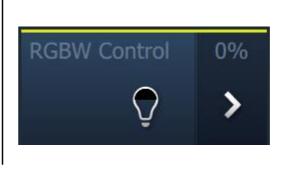




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#### Pages and Functions – Value slider

- Value slider for 1/2/4-byte objects

1 byte value [0100%]
1 byte value [0255]
1 byte value [-128+127]
2 byte value [065535]
2 byte value [-32768+32767]
2 byte floating point
4 byte value [04294967295]
4 byte value [-2147483648+2147483647]
4 byte floating point

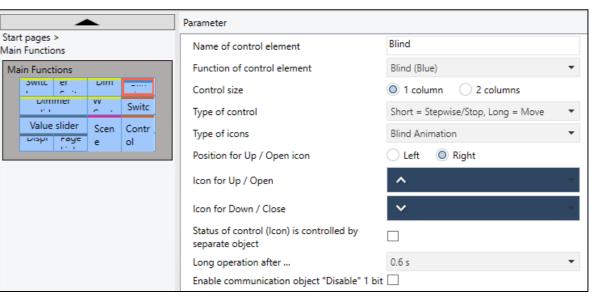
- 2 columns or 3 columns control element
- Minimum and maximum value must be defined
- Controlled by swiping

Start pages >				
Main Functions		Name of control element	Value slider	
Main Functions		Function of control element	Undefined (Grey)	
Swite er Dim	Blind	Control size	O 2 columns 3 columns	
Dimmer W	Switc	Slider goes from	Left to right Right to left	
Value slider Scen	Contr	Show value in Control		
vispi raye e	ol	Slider sends	When slider is released O cyclic	:al
		Telegram is repeated every [s]	0.5s	
		Object type	1 byte value [0100%]	
		Value change [%]	1	
		Minimum object value	0	
		Maximum object value	100	
		Minimum displayed value	0	
		Maximum displayed value	100	
		Enable communication object "Disable	e" 1 bit 🗌	

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#### Pages and Functions – Blinds

- Predefined icons for blinds, shutter, marquee and hang
- Slat adjustment can be turned off
- 1 column or 2 columns control element



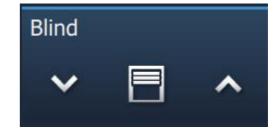
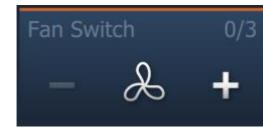


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#### **Pages and Functions – Fan Switch**

- 1 column or 2 columns control element
- Number of steps can be adjusted (1-8)
- Object type can be 1-bit or 1-byte
- Value for each step can be adjusted (1-byte  $\rightarrow$  0 255)
- Separated communication objects for 1-bit operation
- 1-bit switch pattern:
  - 1 of n
  - X of n
  - Gray-code



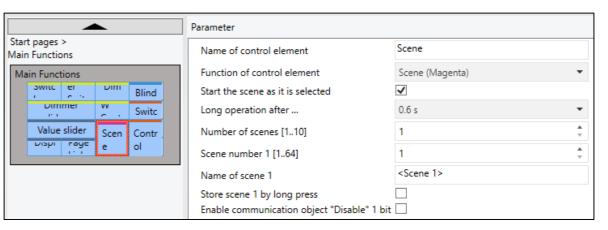
<b></b>	Parameter	
Start pages > Main Functions	Name of control element	Fan Switch
Main Functions	Function of control element	Temperature (Orange) 🔹
Switt     er     Dim     Blind       Dimmer     W     Switt       Value slider     Scen     Contr       Dispi     rage     e     ol	Control size Disable Off control Type of icons Position for step up icon Icon for step up	<ul> <li>1 column</li> <li>2 columns</li> <li>Standard</li> <li>User-defined</li> <li>Left</li> <li>Right</li> <li>+</li> <li>-</li> </ul>
	Icon for step down	
	Telegram is repeated every [s]	0.5s 👻
	Number of steps	3 🌲
	Object type	1 bit [0/1]
	Value Off	0 *
	Value step 1	1 ‡
	Value step 2	2 *
	Value step 3	3
	Display Status	Default 🔹
	Text Out of range	Fault
	Enable communication object "Disable" 1 bit	



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#### **Pages and Functions – Scene**

- Up to 10 Scenes in one control element
- Easy adjustment of each scene (name, scene number)
- Scenes can be stored/overwritten by long press



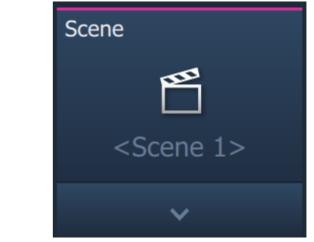


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### Pages and Functions – Display

- Display different values like energy data, temperature, CO2, ppm,...
- 13 different display types
  - 9 predefined types
  - 4 types, which can be adjusted individually
- Display of energy data with 4-byte object possible
- Can be used for many different applications

			Parameter		
pages > Functions			Name of control element	Display	
n Functions			Function of control element	Undefined (Grey)	•
swite er	ווווט	Blind	Type of Display element	Value display	•
Dimmer	~ .	Switc	Control size	1 column     2 columns	
Value slider	Scen e	Contr . ol	Object type	1 byte value [0100%]	•
10.1		0.	Unit	%	
			Decimal places	0	*
			Thousand separation	✓	
			Minimum object value	0	*
			Maximum object value	100	*
			Minimum displayed value	0	*
			Maximum displayed value	100	*
			Enable communication object "Disable" 1 bit	t 🗌	

Start Main

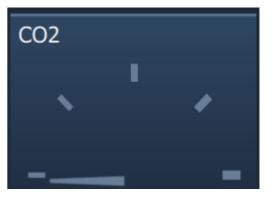


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#### Pages and Functions – RTC Control Frame

- Unified RTC 2.0
- Slave control element
- Comprehensive settings for display and function of the RTC control frame



	Parameter	
tart pages > ain Functions	General	
Main Functions	Name of control element	RTC Control frame
Switc er Dim Blind	Function of control element	Temperature (Orange)
Dimmer w Switc	Additional functions/objects	
Value slider Scen trol	Temperature reading	
UISPI Faye e troi	Inputs of temperature reading	Internal measurement     O External measurement
	Operating functions Show actual temperature value Hide temperature unit	
	Temperature unit	O °C ○ °F
	Switchover heating/cooling Fan coil control during heating mode Fan coil control during cooling mode Changing setpoint	マ マ マ
	Step size of setpoint adjustment	0.5 ℃ ▼
	Setpoint adjustment master/slave via communication object	Absolute temperature value
	Fan Coil settings	
	Number of fan devices	Heating/cooling via one system     Heating/cooling via two systems
	Fan speed data format Master-Slave	Counter values (e.g. 0 - 5) O Percentage values
	Fan speed levels	
	Number of fan speeds	3 speeds 🔹
	Lowest manually adjustable fan speed level	Speed 0 O Speed 1
	Fan coil settings	
	Step values	According to standard values table

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### Pages and Functions – Page Link

- Links to other pages can be added
- 1 column or 2 columns control element
- All other pages can be called
- Direct links to system settings, time programs and door communication possible

	Parameter	
Start pages > Main Functions	Name of control element	Page Link
Main Functions	Function of control element	Undefined (Grey) 👻
Switc er Dim Blind	Control size	1 column 2 columns
Switc	Linked to page	Homepage 💌
Value slider Scen trol	Enable communication object "Disable" 1 bit	

Linked to page	Homepage	•
	Homepage	
	Values	
	Main Functions	
	System settings	
	Time programs	
	Door communication	

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#### Pages and Functions – Audio Control

- Flexible settings for audio control
- Can be combined with different audio sources
- Object type can be changed depending on the needs (Example: object type for mute control: 1-bit/1-byte)

ages > Control	Name of control element	Audio control	
Control	Function of control element	Undefined (Grey)	-
Control	Number of sources	1	
udi	Source 1 name	<source 1=""/>	Ŧ
ont			
	Source 1 type	1 bit 1 byte value [0255]	
	Use play control		
	Object type play control	1 bit 1 byte value [0255]	
	Value for play	0 0 1	
	Use pause control		
	Object type pause control	1 bit 1 byte value [0255]	
	Value for pause	0 1	
	Use stop control		
	Object type stop control	1 bit 1 byte value [0255]	
	Value for stop	0 0 1	
	Use skip forward control	✓	
	Object type skip forward control	1 bit 1 byte value [0255]	
	Value for skip forward	0 0 1	
	Use skip backward control	$\checkmark$	
	Object type skip backward control	1 bit 1 byte value [0255]	
	Value for skip backward	0 0 1	
	Use mute control		
	Object type mute control	1 bit 1 byte value [0255]	
	Value for mute	0 0 1	
	Value for unmute	0 0 1	
	Use volume control		
	Object type volume control	1 byte value [0100%]	
	Volume change [%]	5	÷
	Telegram is repeated every [s]	0.5s	+
	Use on/off control	<ul> <li>0.55</li> </ul>	
	Object type on/off control	1 bit 1 byte value [0255]	
	Value for on	0 0 1	
	Value for off Enable communication object "Disable"	◎ 0 ○ 1	

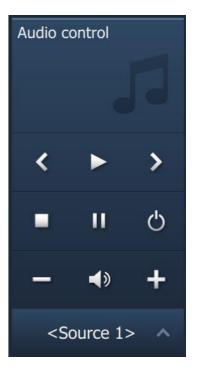


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#### Applications

- Special applications and functions of the ABB IP touch
- By activating some of the functions additional application pages will be activated in the display
- Other functions will run in the background and must be configured in the ETS

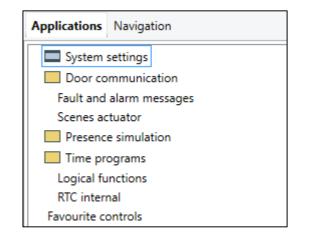


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#### **Applications – Door Communication**

- Communication Objects for door communication (Welcome IP)
- Ringtone and speech volume control
- Information about ringing and calls can be used
- Switching light and opening doors possible

# Parameter Use door communication objects

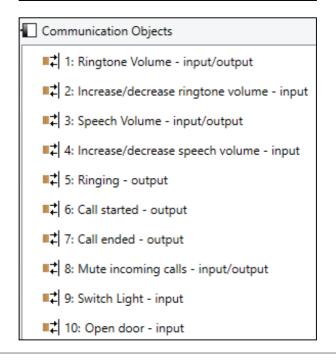


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#### Applications – Fault and alarm messages

- Up to 20 fault and alarm messages can be created
- Page for alarm messages can be protected with PIN
- 5 different sounds for 3 alarm types

	Parameter		
Fault and alarm messages	Use fault and alarm messages Page PIN-protected Enable export Automatic archive at an acknowledge Automatic archive when the alarm is no longer active		
	Sound for alarm	1	*
	Sound for hint	2	÷
	Sound for fault	3	*
	Sound volume preset [%]	100	÷

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#### Applications – Fault and alarm messages

- Type of message: Alarm , Hint or Fault
- Type of alarm: 1-bit or 14-byte for flexible alarm messages

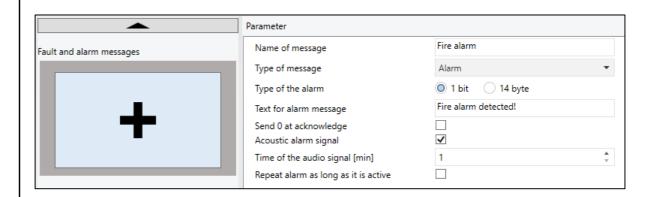


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#### **Applications – Scene Actuator**

- Scene actuators (4 actuators with each 15 participants)
- 4 scenes per actuator channel

<b></b>	Parameter		
Scenes actuator	Name of scene actuator	Actuator 1	
	Number of participants	1	*
	Number of scenes	1	* *
	Overwrite scenes at download		
	Telegram delay	200ms	-
	Type of object 1	switch	•
	Scene 1		
	Name of scene	< Text >	
	Scene number	1	*
	Scene can be startet with a	Both	•
	Scene can be saved Object 1 should be changed	<b>&gt;</b>	
	Value for object 1	O off O on	

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#### **Applications – Presence Simulation**

- Up to 10 objects can be used for the presence simulation (1-bit and 1-byte)
- Activation of the presence simulation via panel

Parameter			
Use presence simulation Function PIN-protected Enable export Waiting time till activation [min]	<ul> <li>✓</li> <li>□</li> <li>2</li> </ul>		*
Object type 1	🔘 1 bit	Value (1 Byte)	_
Object type 2	🔘 1 bit	Value (1 Byte)	
Object type 3	🔘 1 bit	Value (1 Byte)	
Object type 4	🔘 1 bit	Value (1 Byte)	
Object type 5	🔘 1 bit	Value (1 Byte)	
Object type 6	🔘 1 bit	Value (1 Byte)	
Object type 7	🔘 1 bit	Value (1 Byte)	
Object type 8	🔘 1 bit	Value (1 Byte)	
Object type 9	🔘 1 bit	Value (1 Byte)	
Object type 10	🔘 1 bit	Value (1 Byte)	

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#### **Applications – Time Programs**

- Setup of all time programs must be done on the IP touch
- Time programs can be protected with PIN

Applications Navigation	Parameter
<ul> <li>System settings</li> <li>Door communication</li> <li>Fault and alarm messages</li> <li>Scenes actuator</li> <li>Actuator 1</li> <li>Presence simulation</li> <li>Time programs</li> </ul>	Page PIN-protected

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### **Applications – Logic functions**

- Up to 10 logic functions can be used
- Available functions:
  - Logic gate
  - Multiplexer
  - Multiplier
  - Gate
  - Temperature comparator
  - State converter
  - Time function

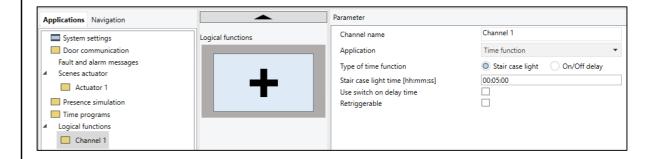


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#### **Applications – Internal RTC**

- Five integrated Master RTC
- 6 different control functions (heating, cooling, heating and cooling, + additional stages)
- Setpoint adjustment via 1-byte, absolute or relative value

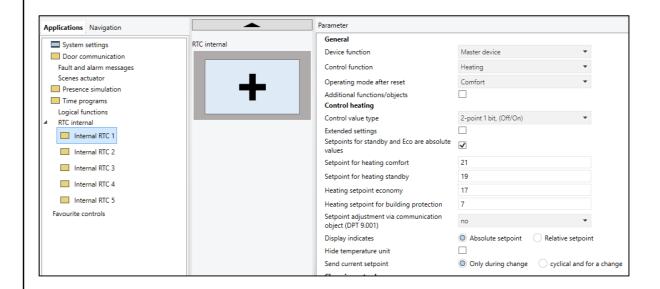


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#### **Applications – Favorites**

- Control elements can me marked as a favorite to fasten the configuration
- All adjusted parameters will be stored in the template



ABB-free@home®

ABB-free@home®

#### Introduction

Now ABB-free@home® also has a super-flat panel with simple IP integration via LAN or WIFI, fast commissioning via the familiar ABB-free@home® APP and, if required, integration of IP door communication



ABB-free@home®

### ABB-free@home® integration

- IP touch must be connected to the IP network of the ABBfree@home® SysAP with the home network connection of the panel (can be adjusted on the panel directly)
- Easy connection via LAN or WLAN
- Programming ABB-free@home® interface

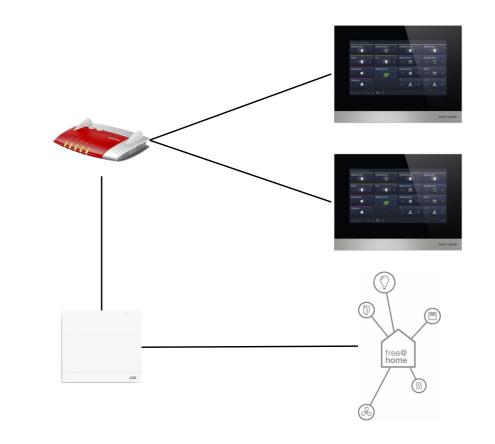


ABB-free@home®

#### Connection

- IP touch must be connected to the IP network of the ABBfree@home<sup>®</sup> SysAP with the home network connection of the panel (can be adjusted on the panel directly)
- free@home and IP touch must be paired via the interface of the panel
- On the "Engineering setting" screen, click "Smart home settings" to access the corresponding screen
- Smart home mode = free@home
- On the "Smart home settings" screen, click "System Access Point", followed by the name of the SysAP

Engineering settings			
Engineering settings			
Local settings	Smart home mode		
Outdoor station settings	free@home 🗸		
IP actuator settings	System Access Point		
Smart home settings			
Password management			
Th 26/07/18 20:19 🤏 🖵 1 🐔			

ABB-free@home®

#### Connection

- IP touch must be connected to the IP network of the ABBfree@home<sup>®</sup> SysAP with the home network connection of the panel (can be adjusted on the panel directly)
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- On the "Smart home settings" screen, click "System Access Point", followed by the name of the SysAP

System Access Point							
Serial number	Name	IP address	Authentication	Connection status			
ABB700CE359D	Tina	192.168.12.107	No authentication	Disconnected			
	×		ОК				

ABB-free@home®

#### User name and password

Please ente	er account and p	assword	
User name	Tina		
Password	• • • •	• •	
×		OK	

#### **Connection success**

System Access Point						
Serial number	Name	IP address	Authentication	Connection status		
ABB700CE359D	Tina	192.168.12.107	Success!	Connected		
	×		ОК			

ABB-free@home®

### Commissioning

- The IP touch will appear in the ABB-free@home® interface now

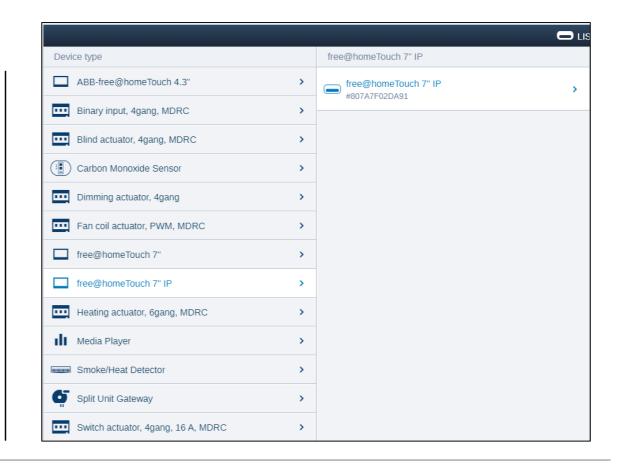




ABB-free@home®

### Commissioning

- Panel can be commissioned like any other ABB-free@home® panel
- 4 pages with up to 64 functions available

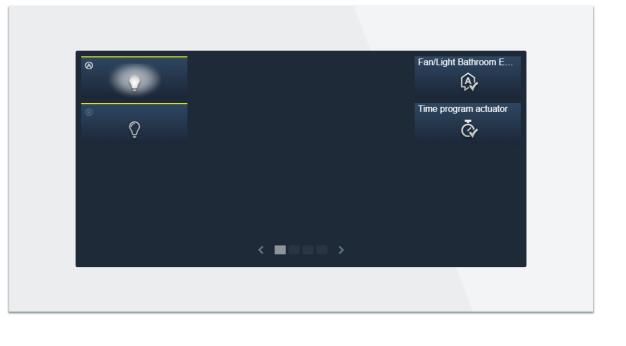




ABB-free@home®

#### Functions in ABB-free@home® - Mute

- Door call be muted and unmuted via free@home
- Sensor for operation via panel (if door call is muted)
- Example: turn off door call in the night

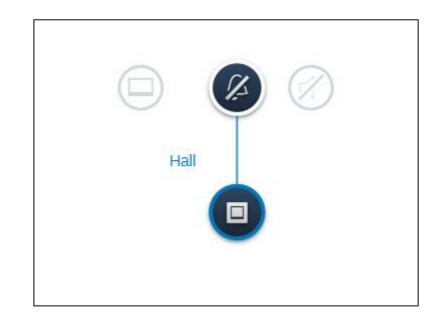


ABB-free@home®

### Functions in ABB-free@home® – Door opener and corridor light

- Opening the door via free@home sensor
- Corridor light can be controlled also

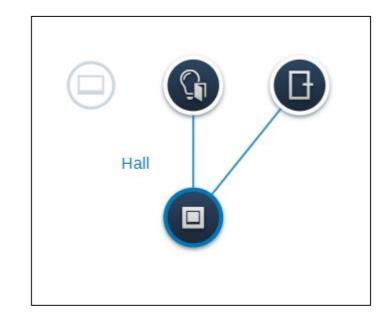
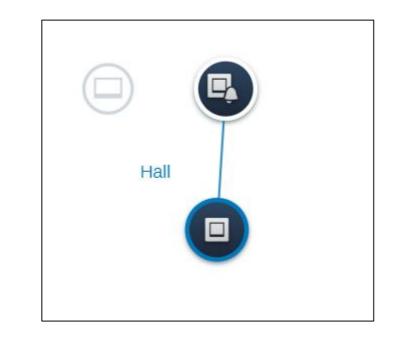




ABB-free@home®

Functions in ABB-free@home® – Level door call

- Local/Level door call via free@home sensor



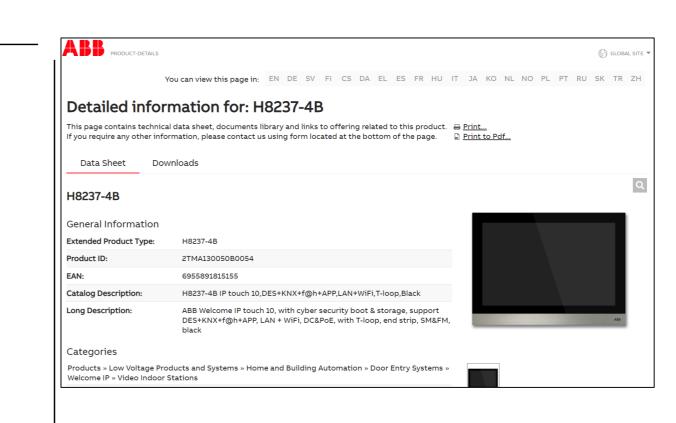


#### Homepage

#### www.abb.com/KNX

- $\rightarrow$  Products and Downloads
  - $\rightarrow$  Visualization, Display and Signalling
  - $\rightarrow$  Search Options IP touch
- Product Manual
- Installation and Operating Instructions
- ETS Application

- • • •



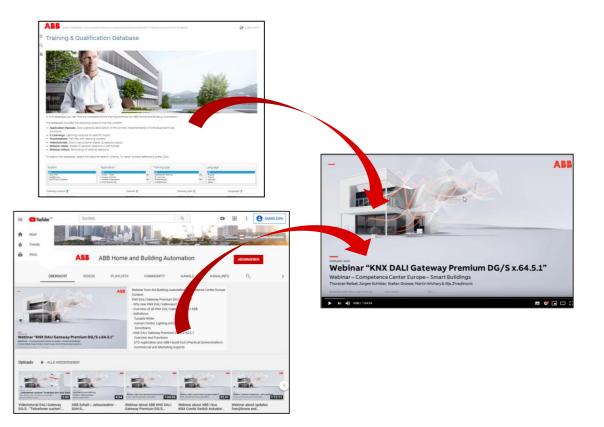
#### **Training Material**

**Training & Qualification Database** 

- The database contains extensive training content
  - Presentations
  - Video tutorials
  - Webinar slides and videos
  - and more ...
  - <u>https://go.abb/ba-training</u>
  - <u>ww.abb.com/knx</u> (→ Services & Tools → Training and Qualification → Training Database)
- Training and Qualification

YouTube

- Channel "ABB Home and Building Automation"
  - <u>https://www.youtube.com/user/ABBibusKNX</u>



### **Training & Qualification Calendar**

In addition to the online modules and the traditional training programs offered by your local ABB sales team, we offer a variety of on-site trainings conducted by our specialists at different ABB training facilities

In this Training & Qualification Calendar you can find the educational events that are taking place during 2020

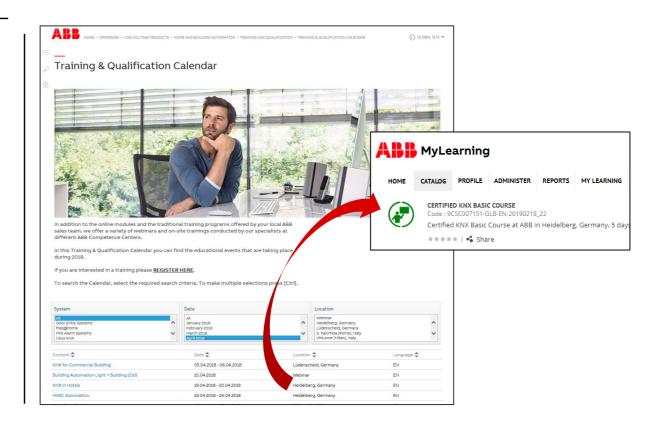
If you are interested in a training please click the training und you will be forwarded to register in "ABB MyLearning"

www.abb.com/knx or https://go.abb/ba-training

 $\rightarrow$  Training Calendar

- $\rightarrow$  Services & Tools
  - $\rightarrow$  Training and Qualification Training and

Qualification





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