

DALI integration

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The Ampio system allows integration with the DALI lighting bus, via the M-CON-DL-s module. Up to 64 lamps (controllers) can be connected and grouped according to the DALI standard.

In order to control the lamps on the DALI bus, the M-CON-DL-s module must be connected to the CAN network, the lamps must be powered and the DALI connector must be connected to the M-CON-DL-s module.

Configuration in Ampio Designer

Search for lamps

To search for and name individual luminaires, enter the settings of the M-CON-DL-s module (cog icon). In the *Functions* tab, select the *DALI lamp* sub-tab. Search for lamps by clicking on the arrow icon in the upper right corner.

MAIN ∠ (0_28)	×							
Functionalities	DALI lamp	DALI group	DALI broadcast	DALI motion sensor	DALI presence sensor	DALI lux sensor	Flag	8-bit flag
Conditions	16-bit flag	Diagnostics						
Parameters					Q Search		@ () (
DALI	NUMBER	DESCRIPTIO	: LO	CATION	VISUAL		DALI :	
	1			° 0 0	0	9823a	e(1) : 0	

In the *DALI Group* sub-tab, several lamps can be assigned to one lighting group. In the *DALI* column, select the corresponding lamps by their addresses. The recording is done automatically.

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Functionalities	DALI lamp	DALI group	DALI broadcast	DALI motion sensor	DALI presence senso	DALI Iu	ux sensor	Flag	8-bit flag
Conditions	16-bit flag	Diagnostics							
Parameters					Q Search			@ (?)	
DALI		DESCRIPTIO	I LC		VISUAL			DALI :	
	1			÷ 🛛 🖂	0	Ð	9823ae(1 988806(:) × 2) ×	\$

The settings of the luminaires together with their short addresses or groups are also available in the DALI tab.

Conditions		EDIT DALI	RANDOM	SHORT ADDRESS	DEVICE TYPE	GROUPS	
Parameters	1	ß	9823ae	1	8	1	
DALI	2	ß	988806	2	8	1	
	3	C	98f971	3	8		

Search for sensors

Motion sensors or LUX lighting sensors based on the DALI standard are searched for in a similar way to lamps in the corresponding tabs.

	×							
Functionalities	DALI lamp	DALI group	DALI broadcast	DALI motion sensor	DALI presence sensor	DALI lux sensor	Flag	8-bit flag
Conditions	16-bit flag	Diagnostics						
Parameters					Q Search	(20	
DALI		DESCRIPTION	LC	CATION	VISUAL	D	ALI :	
	1			۰ .	OFF	2a060d	(1):	

The sensors have parameters available that are compatible with the DALI standard. In order to find out what a particular parameter is used for, it is recommended to search online for a description of the DALI standard. In addition, the reporting time or dead time between consecutive motion detections can be freely set, among other things. Examples of sensor settings are shown below, the parameters should be selected individually according to your requirements.

Active
Occupied event
Vacant event
Repeat event
Movement event
No movement event
Event priority
Highest \Diamond
Report timer (1-255)
20
Dead time timer (0-255)
1
Hold timer (1-255)
90
Save

Creating conditions

Conditions on the LOGIC tab can be created either from individual lamps, sensors or groups of luminaires.



Single luminaires, groups of luminaires or all luminaires at once can be controlled via the Broadcast dali option.



Configuration in the Smart Home Configurator*

*from January 2024, the Smart Home Configurator software is no longer being developed. It is recommended to use it only in substantiated instances.

Available for the Ampio Smart Home configurator version 3.5

Ampio system is able to integrate with the DALI system through the M-CON-DL-s module.

A user can connect up to 64 lamps and link them in groups.

To control DALI lamps, an installer has to connect M-CON-DL-s to the CAN network, power on DALI lamps, and connect the DALI connector to M-CON-DL-s.

In the Ampio configurator, after opening the Device Monitor from the menu on the right, a user can enter device names for each of the lamps in the installation.

					CE 10											\sim
	• <i>^</i>	mpio sma	rtHome Config	jurator devices ver. 3.5.0.										_		^
FI	le	Edit Sort	Connection	Device Project Io	ols				Vour	offwar	o ic un t	data	Det	mote cunn	ort - dou	beolo
	evi S	earch text:						Search by:	Name of the devi	re v				O Sez	arch desc.	moau
	No	MAC	Type	Nama	DCB	Soft	Conditione	,-		Vec	Drod de	to .				
	1	00008378	10_MSERV_3s	Enter device name (us	7	11034	The size of	the message buffer 5	12B	N/A	FIGU. US	ite				
	2	00005FC2	51-MDOT-M4+	mdot	6	10241	The size of	the message buffer 1	024B	12.2V	2021-08	-09		Devic	e Monitor	
								,						Devic		
															¢°	
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R	U	SB Interface	connected					1	0:58:53							

Monitor-MAC: 0000CBE	B/LOC: 0000CBEB ver	r: 5.0.0.7134					×
🙃 Luminaires 📘 Fla	ags Bin						
Binary Linear							
0-47 48-63							
0 lampOne	1 lampTwo	2 Desc.	3 Desc.	4 Desc.	5 Desc.		
6 Desc.	Desc.	B Desc.	9 Desc.	10 Desc.	Desc.		
12 Desc.	13 Desc.	14 Desc.	15 Desc.	16 Desc.	17 Desc.		
18 Desc.	19 Desc.	20 Desc.	21 Desc.	22 Desc.	23 Desc.		
24 Desc.	25 Desc.	26 Desc.	27 Desc.	28 Desc.	29 Desc.		
30 Desc.	31 Desc.	32 Desc.	33 Desc.	34 Desc.	35 Desc.		
36 Desc.	37 Desc.	38 Desc.	39 Desc.	40 Desc.	41 Desc.		
42 Desc.	43 Desc.	44 Desc.	45 Desc.	46 Desc.	47 Desc.		
						🔁 Get names	
							×
						C. Save names	Close

As it is the case with every module in the Ampio system, a user can create control conditions for the device in the Device configurator.

In the Device Parameters, a user can group lamps, check if they are working correctly, set group numbers, and search for new lamps.

In the first tab – Basic – user can tick or untick the box to check the status of each lamp regularly, as shown below.

It is important that the module is not asked to check the status of lamps that are not present in the network.

Device parameters-MAC: 0000CBEB/LOC: 0000CBEB ver: 5.0.0.7134	_	×
2 Basic FLAGS Bin C Luminaires		
State calibration		
Calibrate outputs Load output range at the start of device		
Querying the luminaires for the status:		
1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22 23 24 25 26 27 28 29 30 31 32 33 34 35 36 37 38 39 40 41 42 43 44 45 46 47 48 49 50 51 52 53 54 55 56 57 58 59 60 61 62 63 64		~
📩 Load 🕞 Set default		

In the third tab, a user can search for new lamps with 3 methods as listed in the drop-down list under Luminaires Search, shown in the picture below.

A full search will delete all numbers that have been already set up.

	Devie	ce para	meters-M	AC: 0000CBEB/LOC: 0000CBEE	3 ver:	5.0.0.7134		-		×
	🔍 Bas	iic 🗌	FLAGS Bin	2 Luminaires						
	Lumin	aires	Groups							
	Lamp	list								
	On	Addr	Long	Туре	Ver	Desc.			Parameters	5
	1	0	7AED70	Moduł LED	8				_	
									On	
									Power off	
				Address change through	doub	le click				
	Lamp	searc	h							
	Fast	t searc	h through	short addresses		~	Search			
	2	Loa	ad	○ Set default			📩 Send	ł		
-					-					

By accessing the Parameters in the configurator's main menu, a user can check which functions are supported by the specific lamp. It is here, where you can set up parameters, such as fade time, or max/min level of brightness, etc. If a function is described as *Err*, it means that this function is not supported.

	Devi	ce para	meters-	MAC: 0000CBEB/LOC: 00000	BEB ver	: 5.0.0.7134				— (×
(🔍 Bas	ic 📘	FLAGS I	Bin 🔓 Luminaires								
	Lumin	aires	Group	s								
	Lamp	list										
	On	Addr	Long	Туре	Ver	Desc.				Param	eters	
	1	0	7AED7	ModullED	8							
				Lamp parameter						0	n	
				STATUS:	0	ACTU	AL LEVEL:	0		Powe	er off	11
				CONTROL GEAR:	255] M/	AX LEVEL:	254 >:	>			
				LAMP FAILURE:	Err	м	IN LEVEL:	85 >:	>			
				LAMP POWER ON:	Err	POWER	ON LEVEL:	254 >:	>			
				LIMIT ERROR:	Err	SYSTEM FAILU	RE LEVEL:	254 >:	>			
				RESET STATE:	Err	FA	DE TIME:	0 >:	>			
				PHYSICAL MINIMUM:	85	FA	DE RATE:	7 >:	>			
				POWER FAILURE:	Err							
						1			_			
	Lamp	searc	h					Close				
	Fast	searc	h throu	gh short addresses		~	Sea	arch				
L												
	4	<u>L</u> oa	d	C Set default				📥 <u>S</u> er	nd]		

The second tab of Luminaires part is used to connect lamps to a specific group. You can select groups numbered from 0 to 15 and name the groups.

	Devi	ce para	meters-M/	AC: 0000CBEB/LOC	: 000	0CB	EB v	/er: !	5.0.0).713	34										-	[×	
	🔍 Bas	ic 📘	FLAGS Bin	2 Luminaires																				
	Lumin	aires	Groups																					
	Group	oing list	t																					
	On	Addr	Long	Desc.	0	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15				
	1	00	7AED70																					
L																								
	2	Loa	d	🔿 Set d	efault	t											2	5	<u>S</u> end	ł				
-																								-

Ampio Smart Home Manager*

*from January 2024, the Smart Home Manager software is no longer being developed. It is recommended to use it only in substantiated instances.

In order to enable control of the DALI lamps via the Ampio mobile application, an installer needs to add specific objects in the Smart Home Manager.

The first step is to open the Ampio Smart Home Manager with M-CON-DL-s connected to the local network and log in.

Then, enter Objects from the side menu on the left and Add a new object.

Amp File Ec	io Smart Home Man	ager v 1.2.5o fully connected						- 0	×
	Devices	+ Add	Remove	Сору	By All	•		Filter	
	Users	Id	Device	Description	Turn on time[Number	Component type	Settings	
9	Locations	68	1:	strefa 18	0	18	Regulator	Settings	
000		- 69	1:	strefa 19	0	19	Regulator	Settings	
	Groups	70	1:	strefa 20	0	20	Regulator	Settings	
	Objects	71	1:	strefa 21	0	21	Regulator	Settings	
	objects	. 72	1:	strefa 22	0	22	Regulator	Settings	
69	Scenes	73	1:	strefa 23	0	23	Regulator	Settings	
	<i>a</i> .	- 74	1:	strefa 24	0	24	Regulator	Settings	
	Grouping	75	1:	strefa 25	0	25	Regulator	Settings	
84.0	Relations	76	1:	strefa 26	0	26	Regulator	Settings	
• •	ICHIMIOILS	. 77	1:	strefa 27	0	27	Regulator	Settings	
-	Actions	78	1:	strefa 28	0	28	Regulator	Settings	
-	*	- 79	1:	strefa 29	0	29	Regulator	Settings	
-	Integrations	80	1:	strefa 30	0	30	Regulator	Settings	
	Loons	81	1:	strefa 31	0	31	Regulator	Settings	
	5 ICONS	82	1:	strefa 32	0	32	Regulator	Settings	
E E	Resources	83	10f5c50:dali_control	dali1	0	1	Slider	Settings	
_		84	1:	Symulacja	0	1	Presence simulation	Settings	
		85	1:	Detekcja	0	1	Presence detection	Settings	
		86	1 - 6338 / 10f5c50:d 🔺	New object	0	1	Flag	Settings	$\square \forall$
			0 6270 / 1						
			0-05/6/1:						
			1 - 6338 / 10f5c50:dali_co						
			2 - bd2a:						

Select the DALI module from the list in the Device column, add a Description and click on the Settings button.

🙈 New object		-	×
File			
C Icon ON		Icon OFF	
Select		Select	
PIN	Object type:	Flag 🔺	Advanced
Log every: 60 seconds (0 - data	Relay		
Block when local connect Block when	cloud connect 🔲 Hide value on sketch icon (Slider	
Interpretation 1 🗌 Read or	hy 🗌 Home entrance 🗌 Sho	Blind	dots)
		RGBW	
Access rights		Sensor	gie All
Id	Name	Regulator	
0	admin	Alarm	
		Input	
Object is deleted		Save	Cancel

From the Object Type drop-down menu, select the Slider option and click on Advanced.

In order to check the status of a specific group, a user needs to select exactly which lamps will be queried for data. It can be set in the Interpretation field shown in the picture above.

In the Advanced tab, a user can choose if one lamp is controlled or the whole, selected group. Own value range can also be specified.

٨	-		×
 Ampio Object DALI Group DALI Draw ON/OFF switch for slider objects) Obje	ect OWA	
 ✓ Own value range (min,max) 0 Hide loader in time based object Send value on release only 		255	
LED V			
Dictionary i Save Cancel			

After setting up the parameters, the object needs to be ticked on the list in the Grouping option of the menu on the left, to be visible in the mobile app.

Devices	Select Group:	-1 Main Menu		Only grouped	By All	•
Users						V Filter
? Locations	Belongs	ID	Object name	Device name	Settings	LP
Cronne	0	70	strefa 20	1:	Settings)
Groups		71	strefa 21	1:	Settings)
Objects		72	strefa 22	1:	Settings)
	- 🗆	73	strefa 23	1:	Settings)
Scenes		74	strefa 24	1:	Settings)
Grouping		75	strefa 25	1:	Settings)
orouping	. 0	76	strefa 26	1:	Settings	
Relations		77	strefa 27	1:	Settings)
		78	strefa 28	1:	Settings)
Actions		79	strefa 29	1:	Settings)
Integrations		80	strefa 30	1:	Settings)
Integrations		81	strefa 31	1:	Settings)
Icons		82	strefa 32	1:	Settings)
	- 🗹	83	dali1	10f5c50:dali_control	Settings)
Resources		84	Symulacja	1:	Settings)
		85	Detekcja	1:	Settings)
		86	dali_object	10f5c50:dali_control	Settings	Ì