

CBU-DCS profile

DALI Gateway

“Enabling wireless DALI networks”

CBU-DCS with DALI gateway profile

- Integrate Casambi wireless networks with DALI
- Program, control & monitor a Casambi network from DALI
 - Device discovery, Grouping, Scenes...
- Wirelessly extend the 300m maximum DALI wiring distance
- Use DALI with non-DALI devices
 - Casambi enabled devices appear as standard DALI devices to the DALI system
 - Casambi enabled luminaires do not need DALI capabilities
 - Casambi enabled switches & sensors appear as DALI-2 devices
- DALI DT6 (dimming) & DT8 (Tuneable white, RGB, XY) support



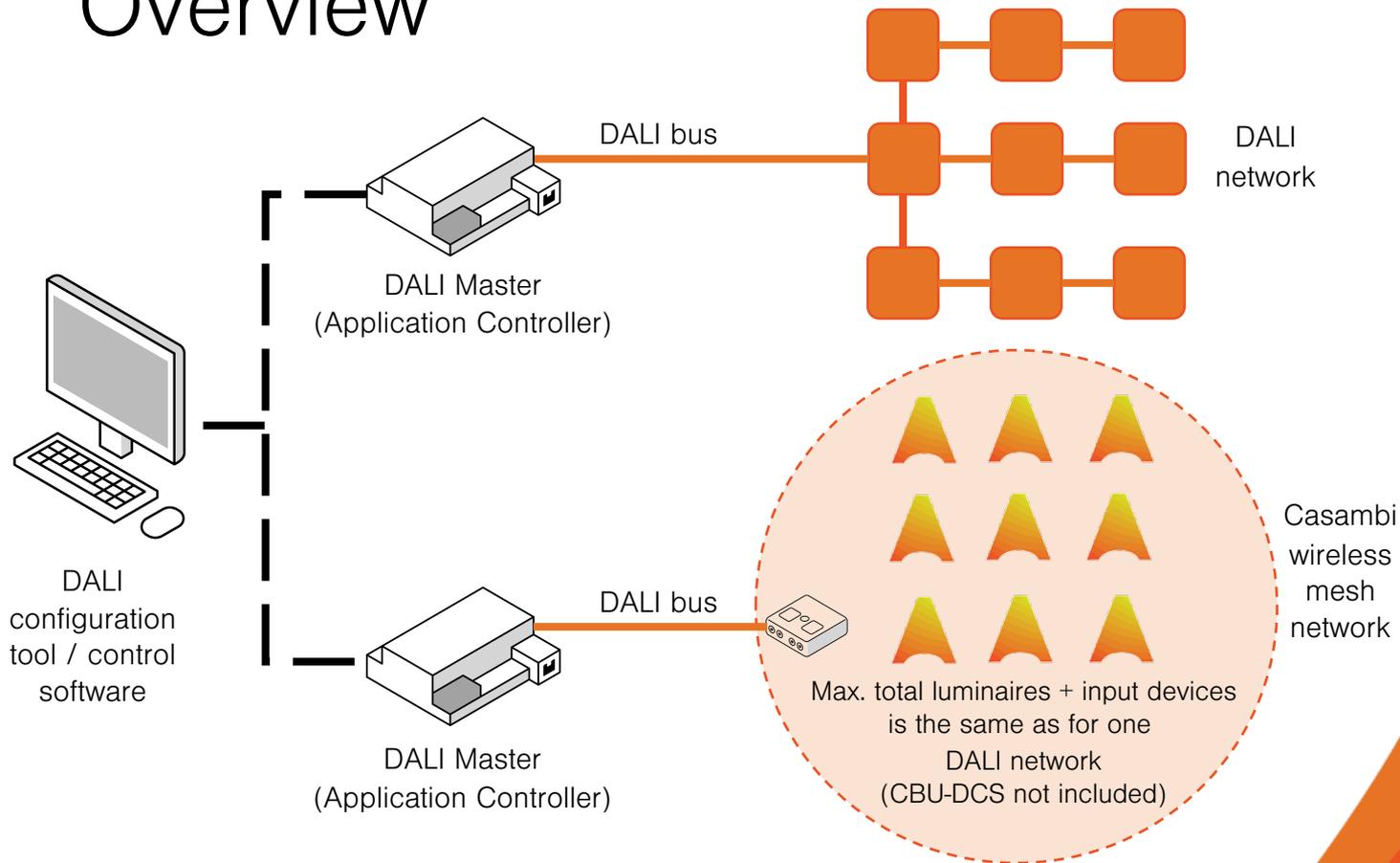
CBU-DCS with DALI gateway profile

- The DALI gateway is invisible to the DALI system
 - No DALI address required
- If desired, the Casambi network can also be used as normal
 - Program one set of functionality for DALI use
 - Program different functionality for the Casambi app
 - Control just from DALI, just from Casambi, or “mix & match”
 - Priorities for DALI commands sent to the Casambi network are defined in the Casambi app
- Multi-channel Casambi units appear as single-channel devices in the DALI configuration software
 - The separate channels can only be individually dimmed from the Casambi app

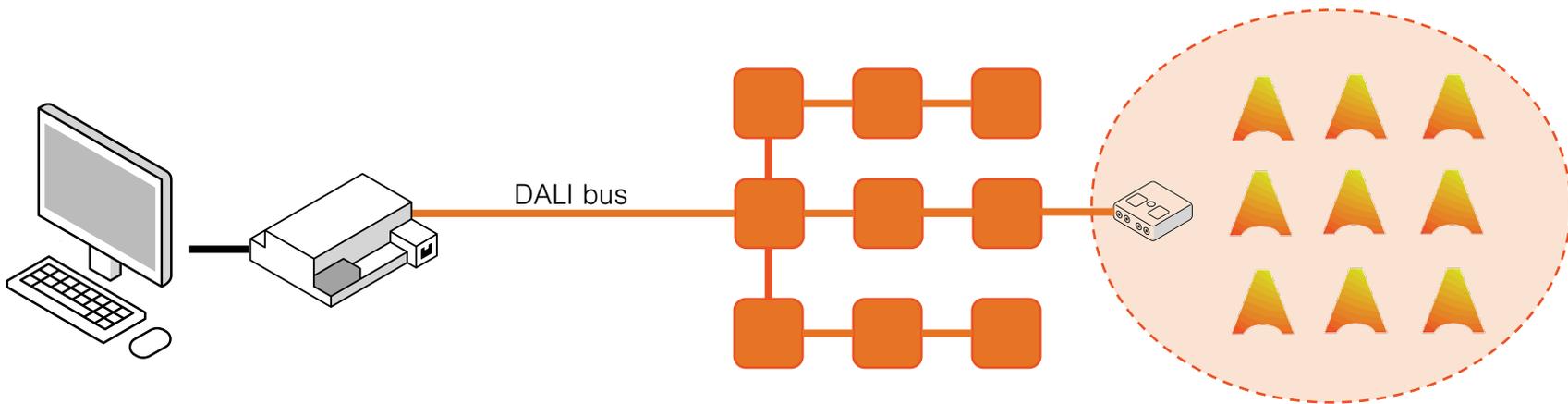
Ecosystem of interoperable devices

- Any of the following can be used as part of a Casambi network & as part of a DALI network
 - Casambi ready/enabled devices from the Casambi ecosystem
 - DALI devices from the DALI ecosystem
 - EnOcean devices
 - 1-10V & 0-10V devices
 - Pulse Width Modulation (PWM) controllable LED-strips
 - Phase cut dimmable light sources

Overview



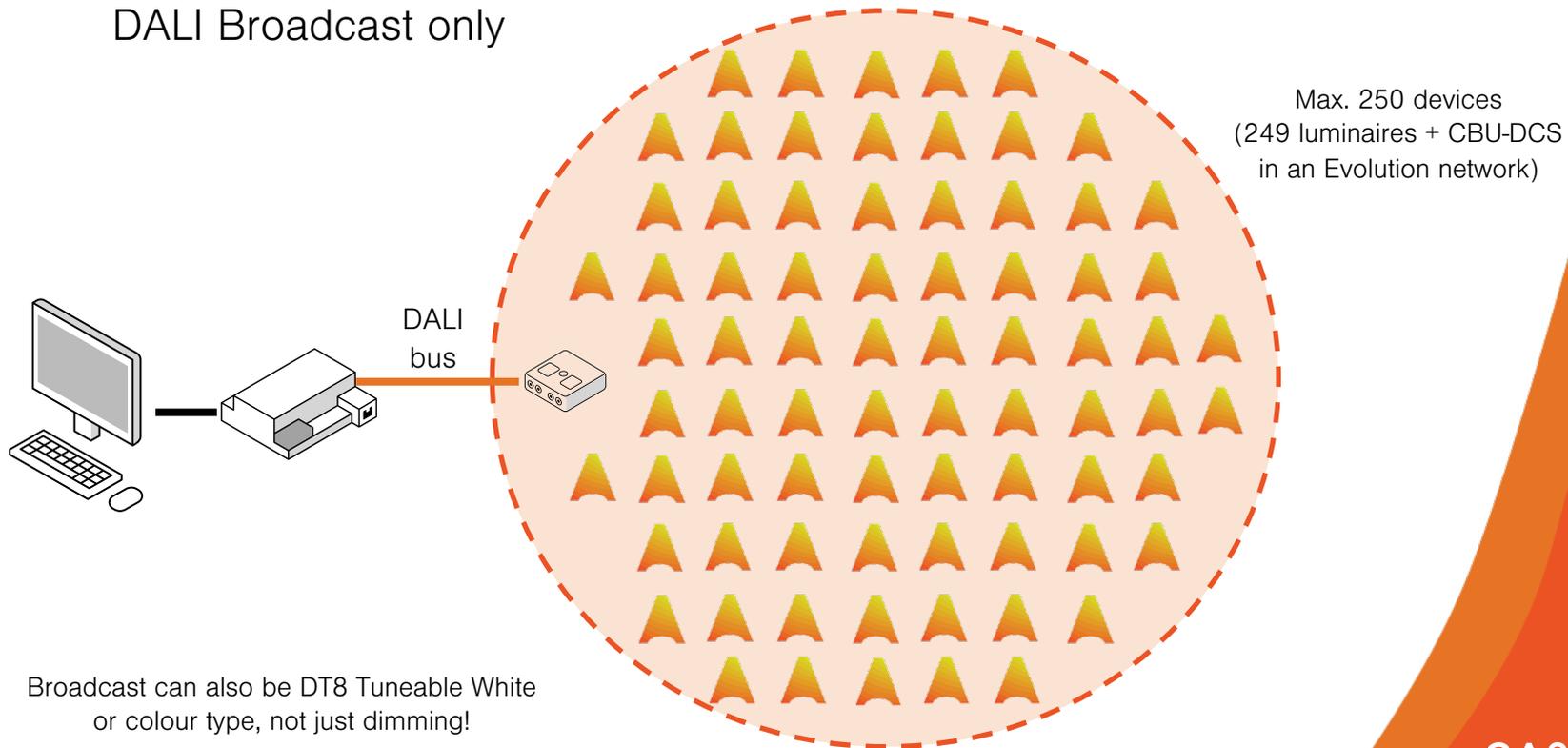
Expand an existing DALI network



Max. total luminaires + input devices
is the same as for one DALI network
(CBU-DCS not included)

Control a larger Casambi network (1)

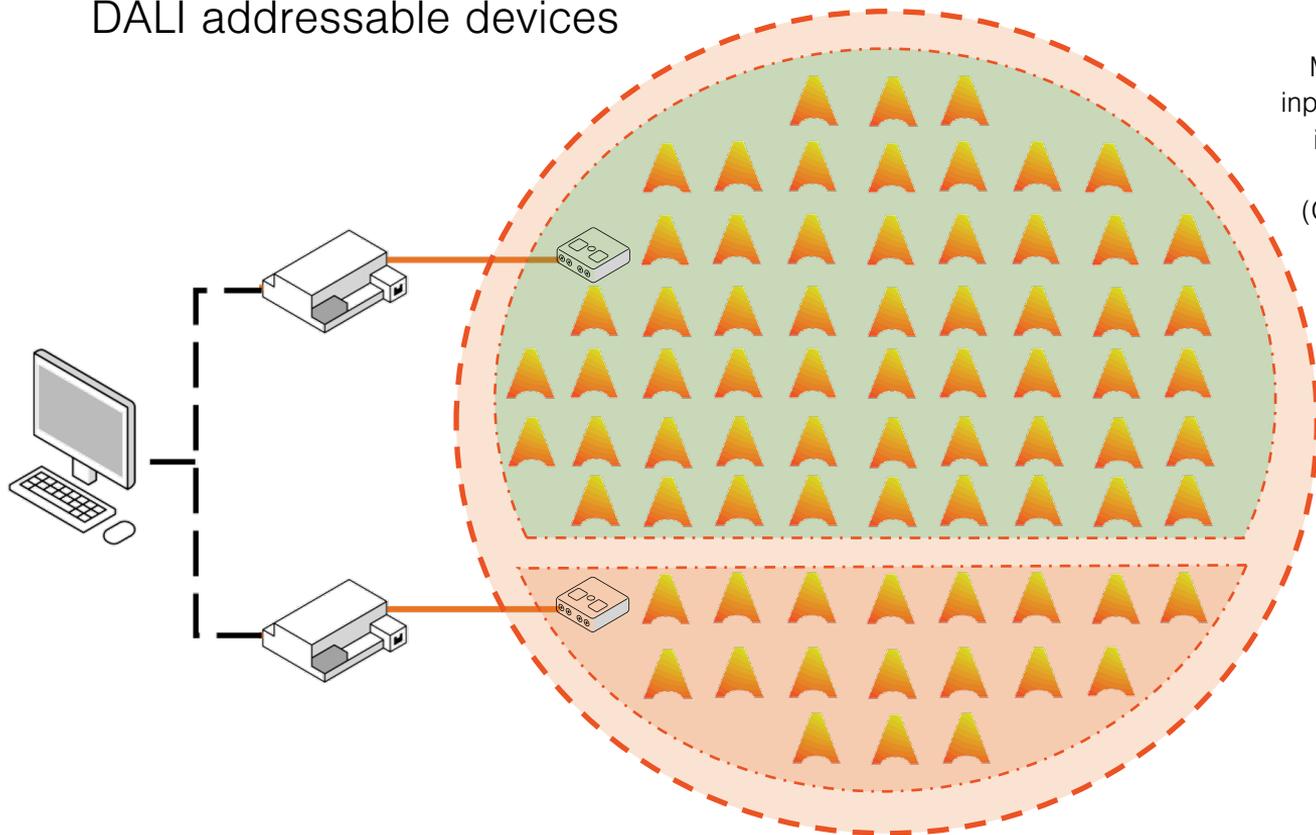
DALI Broadcast only



Broadcast can also be DT8 Tuneable White
or colour type, not just dimming!

Control a larger Casambi network (2)

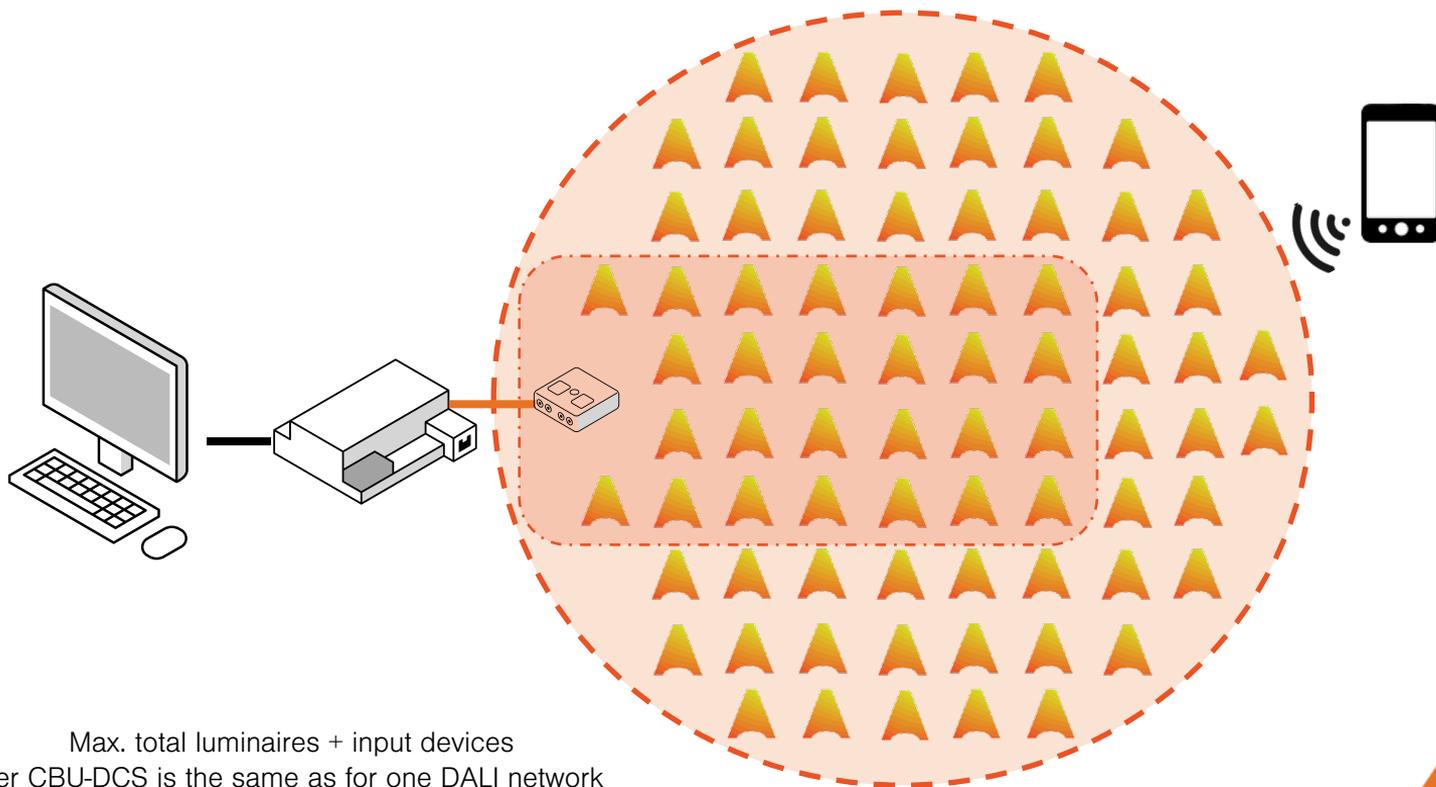
DALI addressable devices



Max. total luminaires +
input devices per CBU-DCS
is the same as for one
DALI network
(CBU-DCS not included)

Max. 250 devices
in one Casambi
Evolution network

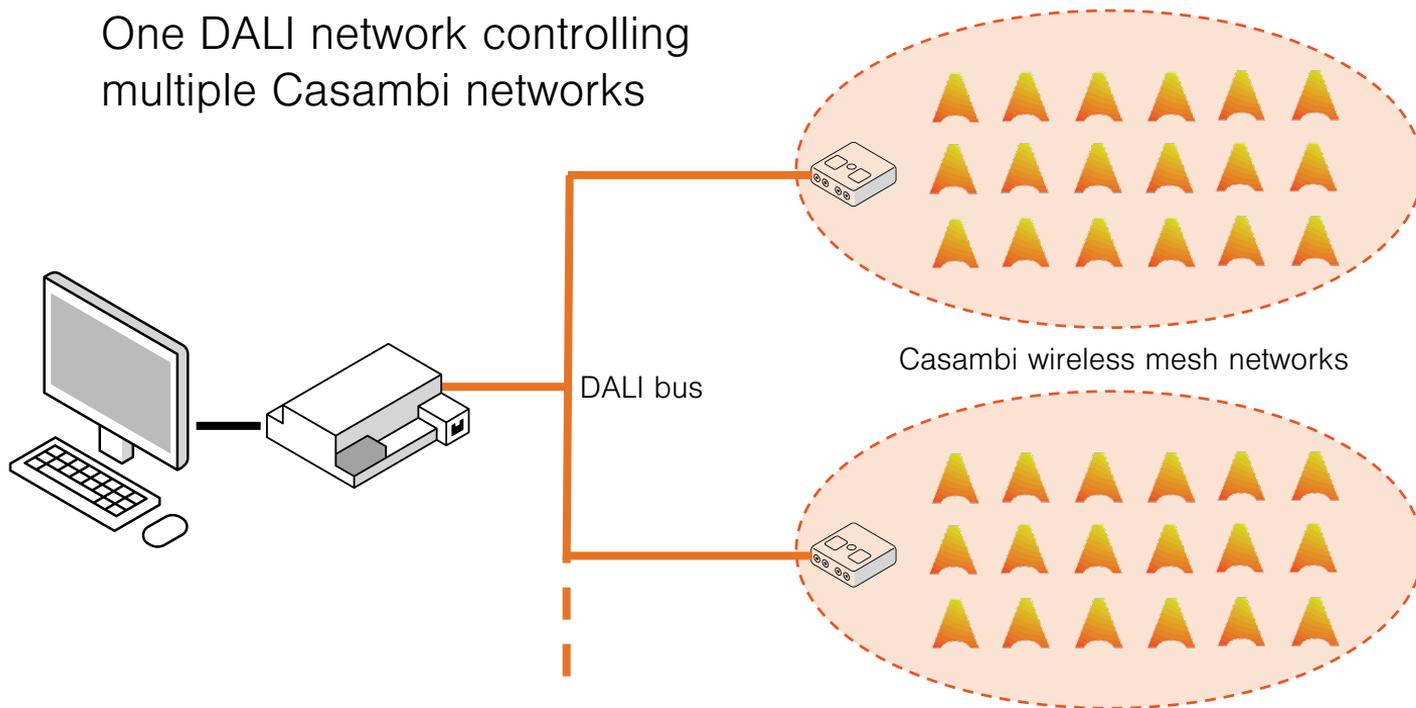
Partial control of a Casambi network



Max. total luminaires + input devices
per CBU-DCS is the same as for one DALI network
(CBU-DCS not included)

Control multiple Casambi networks (1)

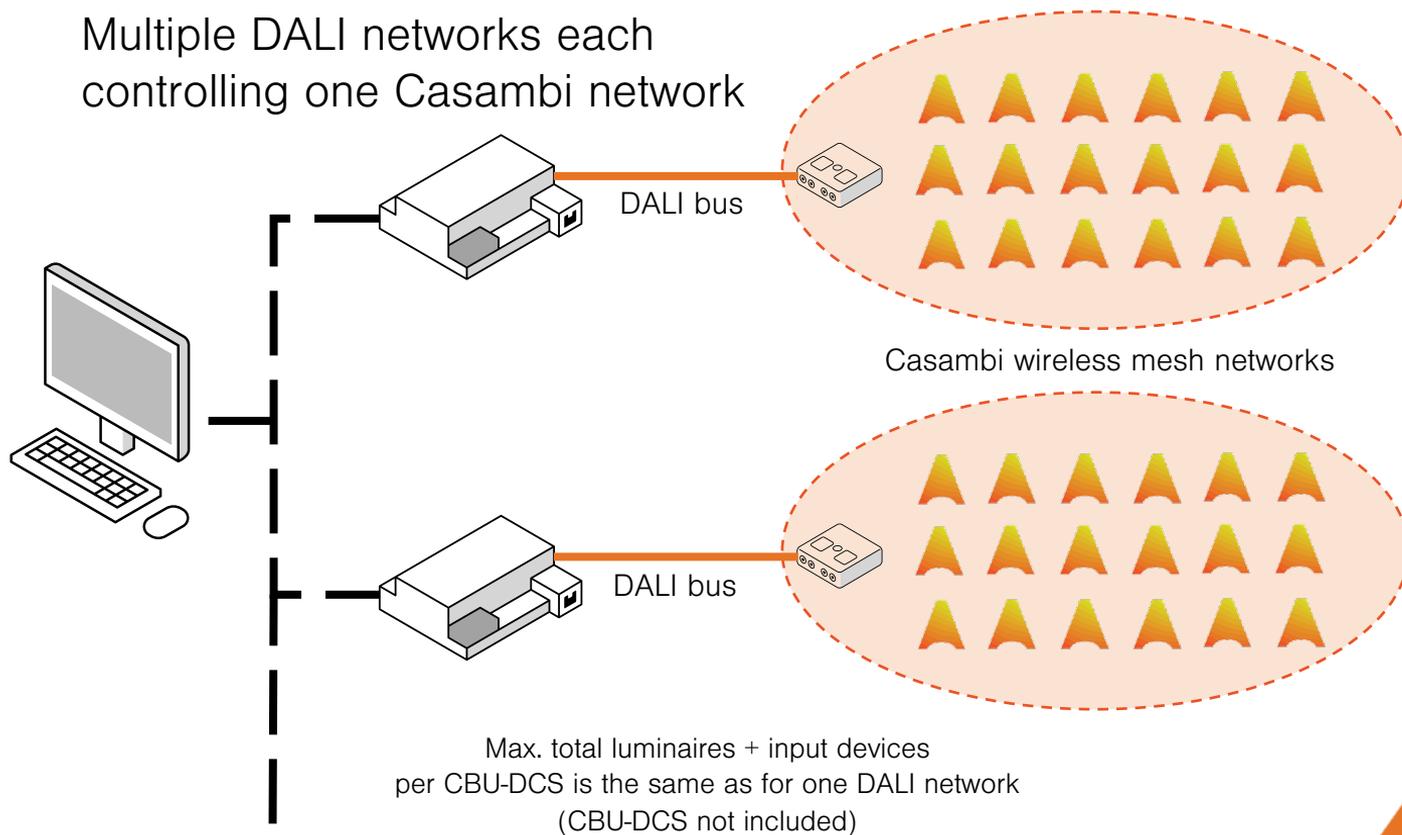
One DALI network controlling multiple Casambi networks



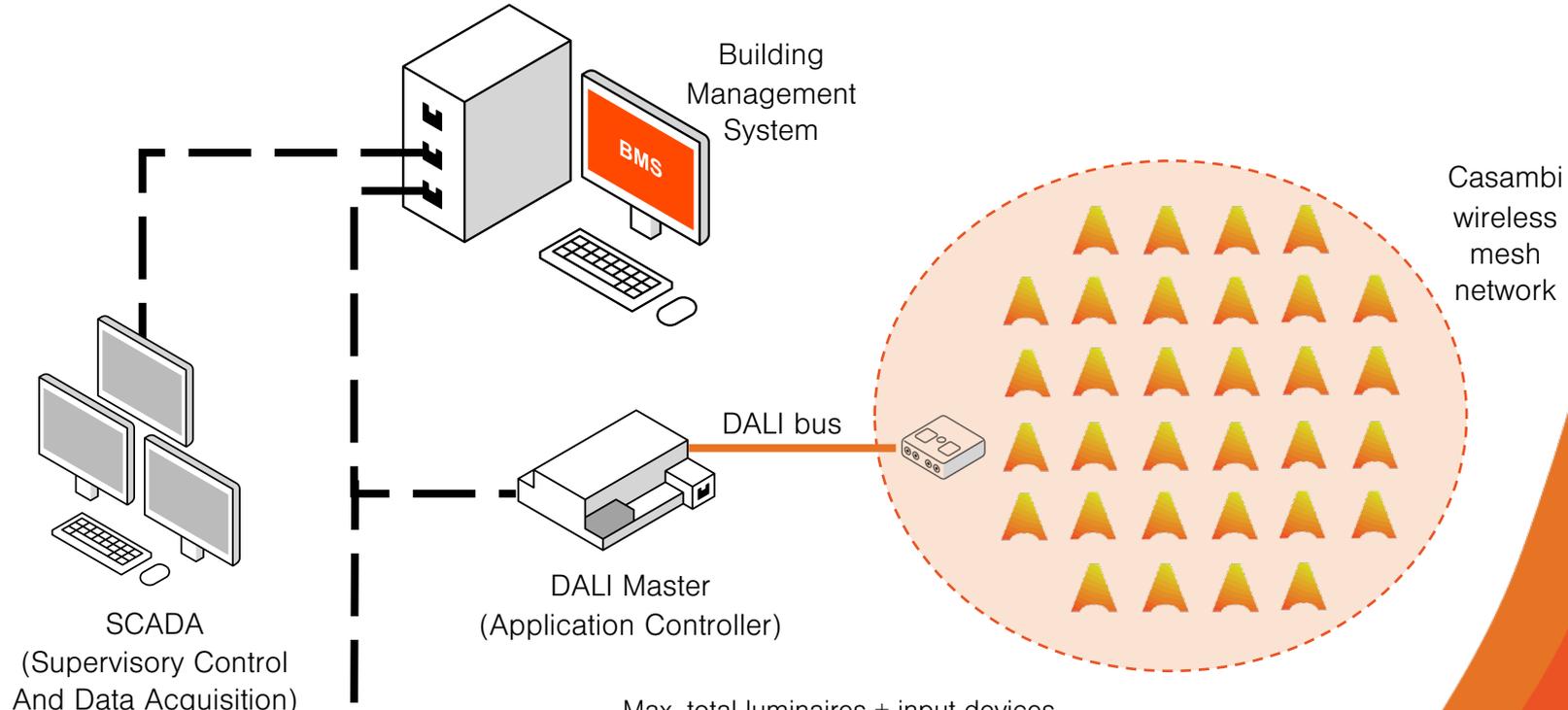
Max. total luminaires + input devices
is the same as for one DALI network
(CBU-DCS not included)

Control multiple Casambi networks (2)

Multiple DALI networks each
controlling one Casambi network



Connect to Building Management Systems



Max. total luminaires + input devices
per CBU-DCS is the same as for one DALI network
(CBU-DCS not included)

Configuration

- Connect the CBU-DCS to the DALI network
- Create a Casambi network using the app
 - Pair all devices (including the CBU-DCS)
- Configure the DALI gateway in the Casambi app
 - Define the Control scope & Control priorities for commands sent from the DALI system
 - Enable Export sensors / Export switches if sensors & "push-button" devices are to be discoverable from DALI (controller must support IEC62386 parts 301/303/304)
- Program the network from your preferred DALI configuration tool/software
- (No DALI reprogramming if a device in the Casambi network is replaced at a later date)

1

2

3

4

GATEWAY PARAMETERS

- Control scope: All luminaires > Higher than Manual
- Control priority: Manual > Manual ✓
- Export sensors: > Higher than automation
- Export switches: > Lowest-priority automation

DALI Bus - Preferences

Device Info

Name: wDALI Switch | Article Number: 86459541 | Update...
Manufacturer: Lunatone | Serial Number: 101167 | Firmware Ver: 2.0
DALI Device Type: N/A | Short Address: #A0 | Set

General | Button 1 | Button 2 | Button 3 | Button 4

Destination Address

Local Bus Operations | Crossline Operations

1:	Group	Group 1 (G1)	Power up
2:	none		Action after power up: no change
3:	none		Delay: 0 [0...7sec]
4:	none		

Function: BF10 - Push-button: CmdX on short press and release, CmdY on long press with repeat

sending ON AND STEP UP as Start-Cmd

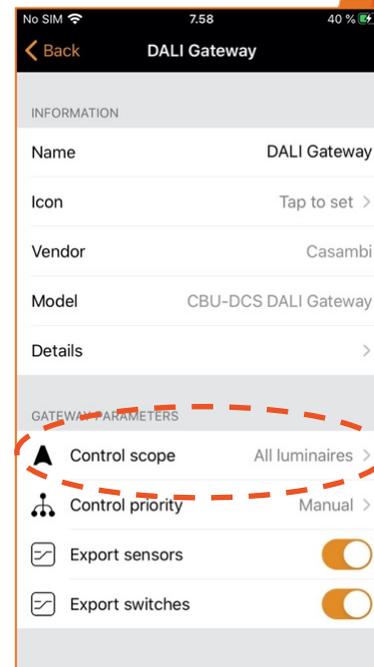
Cmd X (ON Cmd): RECALL MAX

Cmd Y (OFF Cmd): UP

Fade rate: [7] 44.7 steps/s

Control scope

- Defines which devices from the Casambi network have information passed through the DALI gateway to the DALI control software
- The default option is “All luminaires”
- The scope can also be restricted to a single “scene” containing just luminaires to be controlled by the DALI controller software
 - The “scene” is the method to group luminaires so that they can be allocated to a specific DALI gateway



Control priorities

Higher than manual

- Prevents the Casambi system from controlling Casambi devices
 - Casambi devices are only controlled by the DALI controller

Manual (default setting)

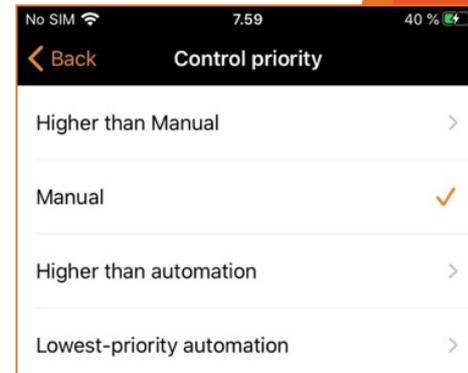
- Allows control by both the DALI controller software & from Casambi

Higher than automation

- Allows the DALI controller software to control lights under automation but not those manually controlled from Casambi

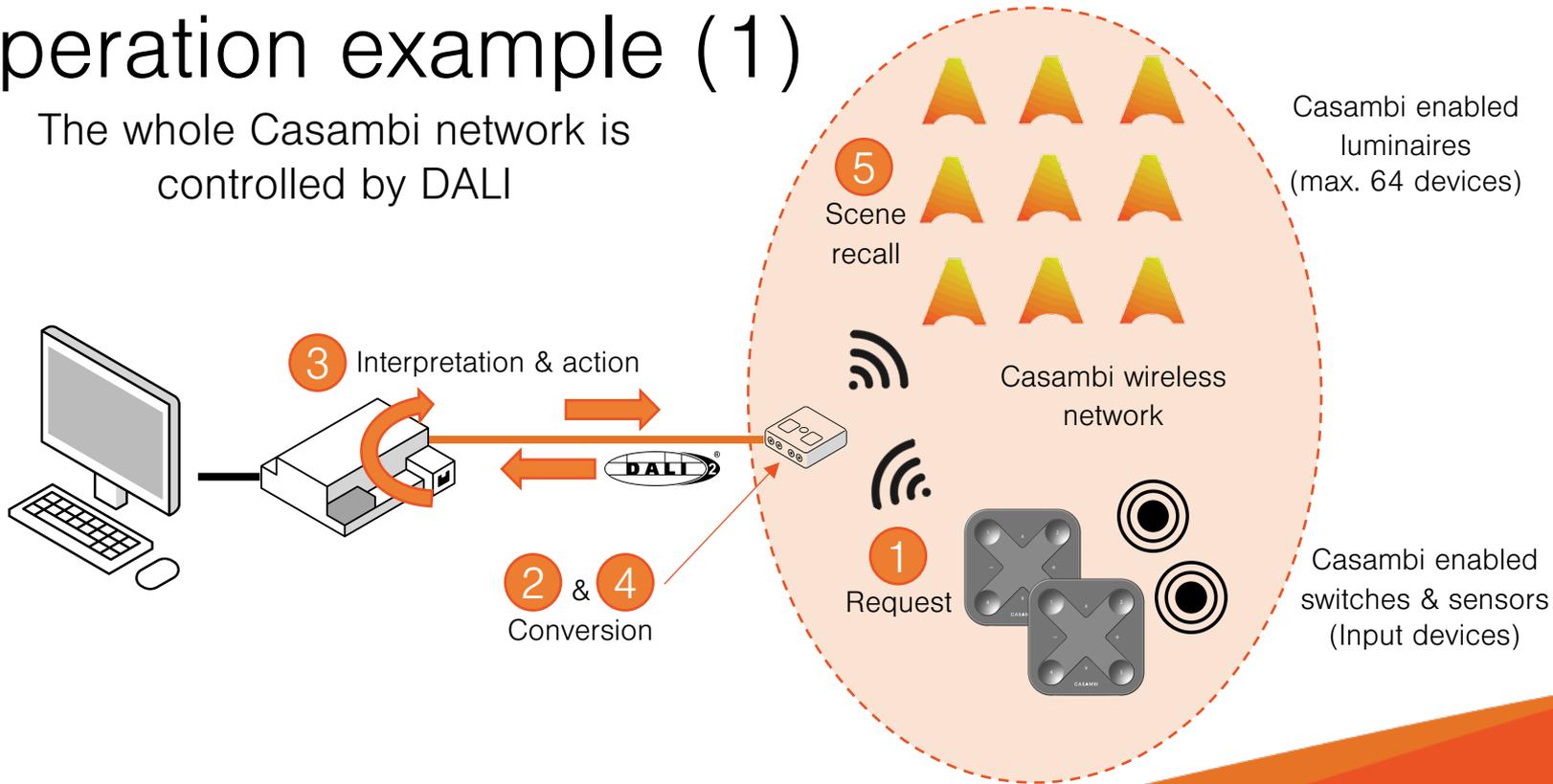
Lowest-priority automation

- The DALI controller only controls lights at the lowest automation level
- Any control from Casambi will override set dimming levels



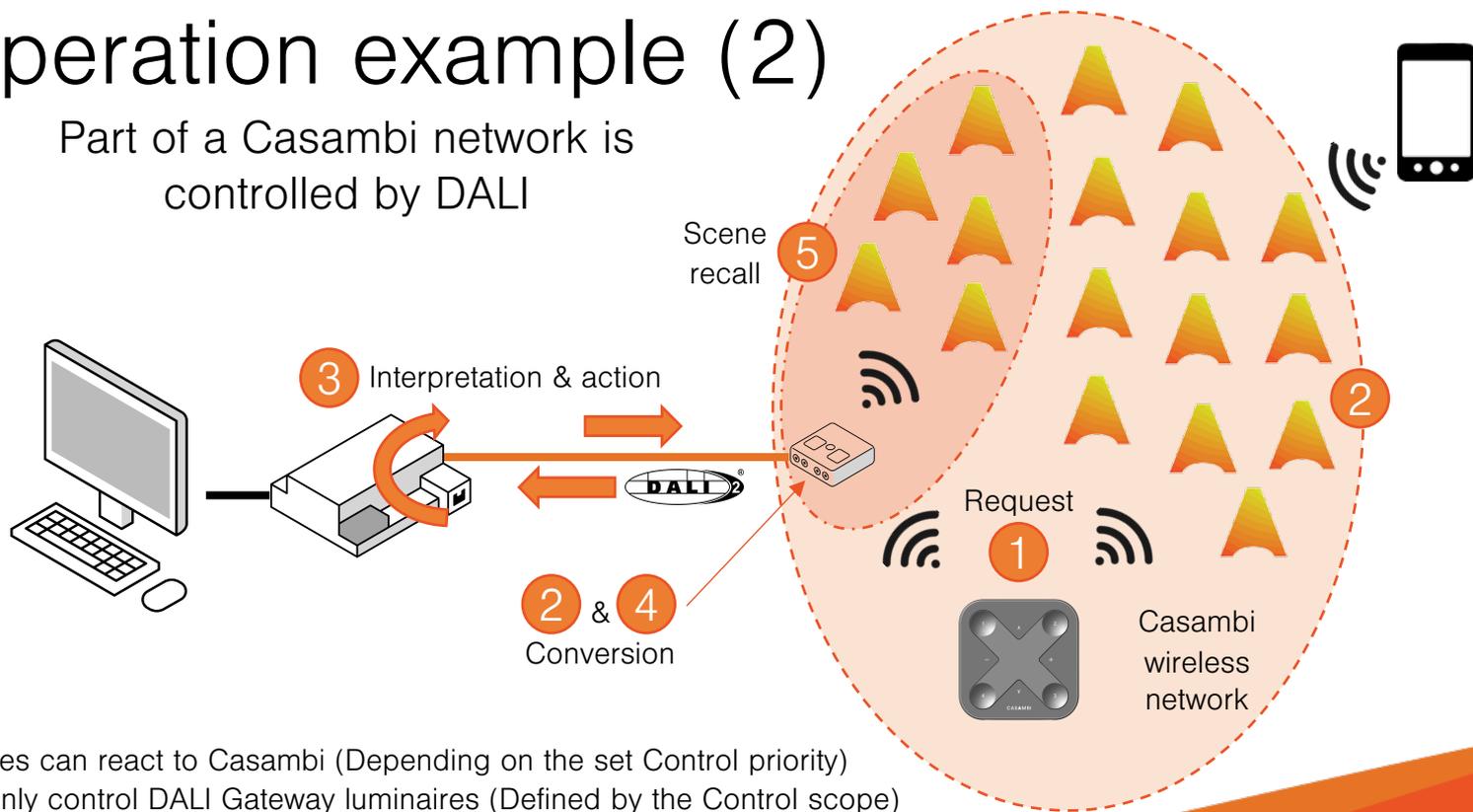
Operation example (1)

The whole Casambi network is controlled by DALI



Operation example (2)

Part of a Casambi network is controlled by DALI



- All luminaires can react to Casambi (Depending on the set Control priority)
- DALI can only control DALI Gateway luminaires (Defined by the Control scope)