



NICOR[®]

NLC Commissioning Guide

www.nicorlighting.com



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NICOR NLC Overview

NICOR's Network Lighting Controls (NLC) is a wireless network of components comprised of passive infrared (PIR) motion/daylight sensors, load controllers, power packs, wall controls, and system nodes. Each component utilizes Bluetooth Low Energy (BLE) Mesh to remotely control and operate luminaires separately or together as a zone. The NLC system can control up to 100 luminaires per zone across multiple rooms with NICOR's NLC app. Available to download on major app marketplaces, the NICOR NLC app provides total system control with energy usage statistics. The NLC system is certified UL Gold 1376 and acts as a localized network with encryption (128-bit) and protection from outside sources. Whether you're in the design or remodel phase, NICOR's Network Lighting Controls system is designed to fit any new or existing framework with easy scaling solutions. Take control of your lighting today.



FEATURES

- **Occupancy/Vacancy Detection**

Completely adjustable, dual-time delays with light level reduction can help save energy in unoccupied rooms/zones. Settings can be adjusted from anywhere using the NLC App.
- **Dimming**

Full-range dimming with smooth transitions on select 0-10V NLC controlled luminaires and devices.
- **Daylight Harvesting**

Continuous dimming technology automatically adjusts light levels while factoring in the natural lighting in the space. This helps provide energy savings while reducing the need for artificial lighting during daylight hours.
- **The NLC Network**

Utilizing a Bluetooth Low Energy (BLE) Mesh network, the NLC Network can connect to existing frameworks, devices, and building management systems.
- **Groups**

Create groups of luminaires or devices that share similar settings to quickly configure rooms or spaces. Integrate groups within zones for easy scaling with no limit to the number of groups that can exist.
- **Zones**

NLC Luminaires can be grouped together in unlimited configurations within zones. The NLC Network can accommodate unlimited zones with the ability to scale up to provide coverage for entire sites. Each zone can control up to 100 devices.
- **Task/Trim Tuning**

Light levels can be adjusted to match predetermined visual requirements of a given space. Each NLC enabled luminaire can be adjusted to limit its maximum lumen output to save on energy costs.
- **Scenes**

Create preset lighting scenes within the NLC app to apply specific brightness and color temperatures stored in the NLC network. Scenes can be controlled with the app or NLC connected wall switches.
- **Schedules**

Set-up your lighting system according to your schedule. Create simple on/off automations at certain times of the day or week to eliminate unnecessary energy consumption.
- **Security**

The NLC system meets UL's Gold (1376) level IoT security rating to protect each connected device on the network. The Bluetooth Low Energy (BLE) Mesh features 128-bit data encryption and acts as a localized network, eliminating the need for a hub, gateway, or internet connection.

BENEFITS

- **Limitless Configurations**

Each individual NLC luminaire or device acts independently from the next. This allows for a limitless combination of settings and features to meet any application requirement.
- **Wide Compatibility**

Whether you're in the design or remodel phase, NICOR's Network Lighting Controls system is designed to fit any new or existing framework with added security measures.
- **Complete Control**

Control every zone, luminaire, wall switch, and sensor directly from your phone with NICOR's NLC app. Available on Android and iOS.
- **Energy Savings**

The NLC System uses advanced features such as Daylight Harvesting, Task/Trim Tuning, and Occupancy/Vacancy Detection settings to optimize lighting. This can help reduce energy consumption to ultimately save on energy costs.



NLCPS1
NLC In-Line Low-Voltage
Power Pack



NLCW31WH
NLC 3-Button Wireless
Control Switch



NLCPC1
NLC Wireless Zone and Plug
Load Controller



NLCW51WH
NLC 5-Button Wireless
Control Switch



NLCSPEW1WH
NLC Wireless End-Mount
PIR/Daylight Sensor



NLCWP1WH
NLC Wall-Mount Switch
Base with Faceplate



NLCLHW1WH
NLC Fresnel Occupancy
Sensor Lens for High-Mount
(Wide Distribution)



NLCLHN1WH
NLC Fresnel Occupancy
Sensor Lens for High-Mount
(Narrow Distribution)



NLCspeJ1WH
NLC Wireless External-
Mount PIR/Daylight Sensor



NLCLMW1WH
NLC Fresnel Occupancy
Sensor Lens for Mid-Mount
(Wide Distribution)



NLCSPCW1WH
NLC Wireless Low-Voltage
PIR/Daylight Sensor



H12VADJARM1WH
H12 Socket Mount
Adjustable Arm



NLCSPCMOUNT1
NLC Spring-Loaded
Recessed Ceiling Mount



H12VSOCKET
H12V Socket Mount Base



NLCSPiHW1WH
NLC Wireless Integrated
Low-Voltage PIR/Daylight
Sensor



NLCSPFW1WH
NLC Wireless Integrated
Low-Voltage PIR/Daylight
Sensor



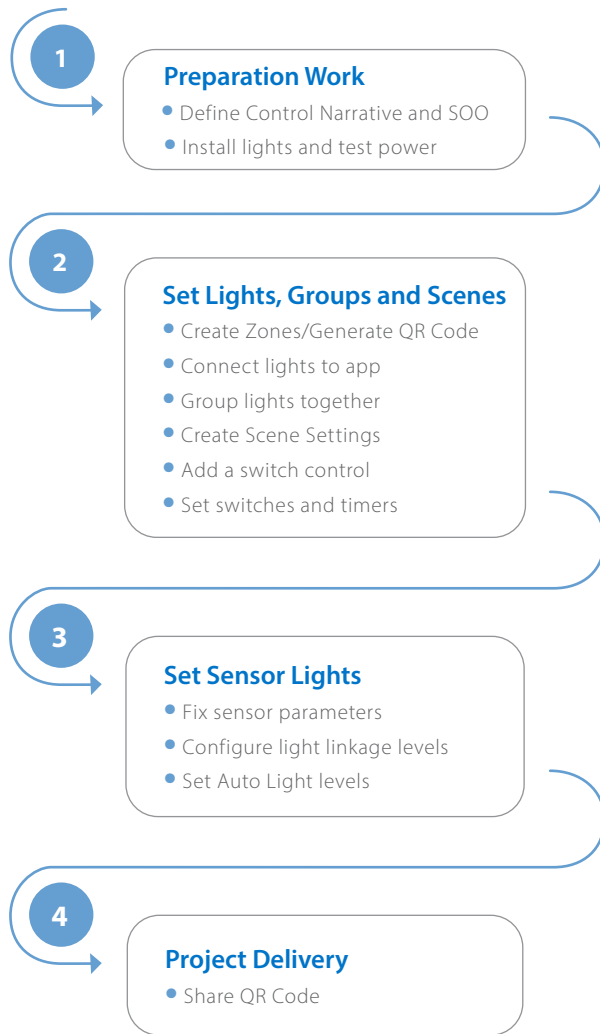
NLCSPCWNBWH
NLC Non-Bluetooth Low-
Voltage PIR/Daylight Sensor



NLCPC2
NLC Wireless Zone
Controller

NICOR NLC Enabled Fixtures

Product Series		NLC Solution	Assortment Code
CLR			NLCDOWN1
CDA			ND
TACsv2			NI
TGL			N1
TGLS			N1
T7C			N1
LSCS			N2
HBGv1			NLCIND
HBLv4			NLCIND3.5A
HMLv1			NLCIND3.5
HMLv1 Twin			NLCIND3.5



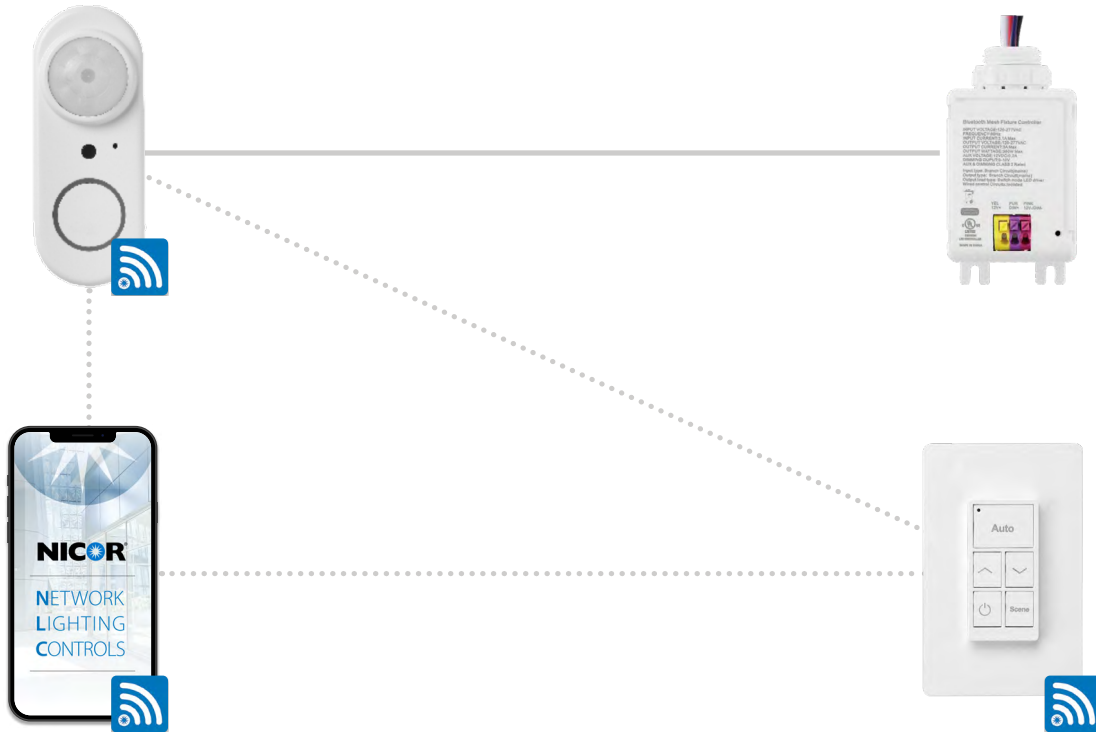
Download the NICOR NLC App



Scan QR code or click on buttons to download the NICOR NLC App. NICOR NLC App will need access to network and Bluetooth. Accept prompt to allow access to photos for QR codes to be automatically saved in your album.

System Planning

System planning will ensure the user has the best benefits from the NICOR NLC. The guidelines and best practices should be fully reviewed prior to commissioning the NLC System.



How to put it all together

Simple Application Rules

- Determine whether Room/Zone or individual luminaire Control (LLLC)
- Maximum of 100 network devices per group/zone
- Maximum of 75' distance between devices

1

Identify your Room Requirements

- Sequence of Operation
- Sensor Requirements
- User Interface Requirement
- Load Schedule

2

Select the Appropriate Controller

- Room/Zone Controller
- Additional ceiling sensors can be added for coverage
- LLLC - Select the NLC enabled luminaire for individual control

3

Select your Load Controller for plug loads

4

Select your User Interface(s)

- Use one or more of the following:
 - 3 button wireless, battery wall station - ON/OFF, Raise, Lower
 - 5 button wireless, battery wall station - AUTO, Raise, Lower, On/OFF, Scene

5

For energy monitoring, connect zones with the dongle

6

To connect with third-party controls devices, use the Bridge.

Contact factory for more information.

System Preparation

Define a system **Control Narrative with a Sequence of Operation (SOO)** for each lighting controls project. Preparation should begin with a layout or floor plan of the entire space. The control narrative should include the following:

- Zones
- Group
- Luminaires

It is suggested to divide the site into zones according to their lighting functions. Make sure each zone contains no more than 100 lights and that no objects will block the wireless signal transmission, such as concrete walls or large metal objects. The size of a zone should not reach outside the limit of the wireless coverage. For interior application, keep node distance less than 100ft and the zone diameter less than 150ft.

Example of a Control Narrative

Space Type	Daylight Sensor	Manual Switch	Occupancy Sensor	Auto Schedule
Conference	×	×	×	
Equipment Room	×		×	
Office - Open	×		×	×
Office - Private	×	×	×	
Restrooms			×	

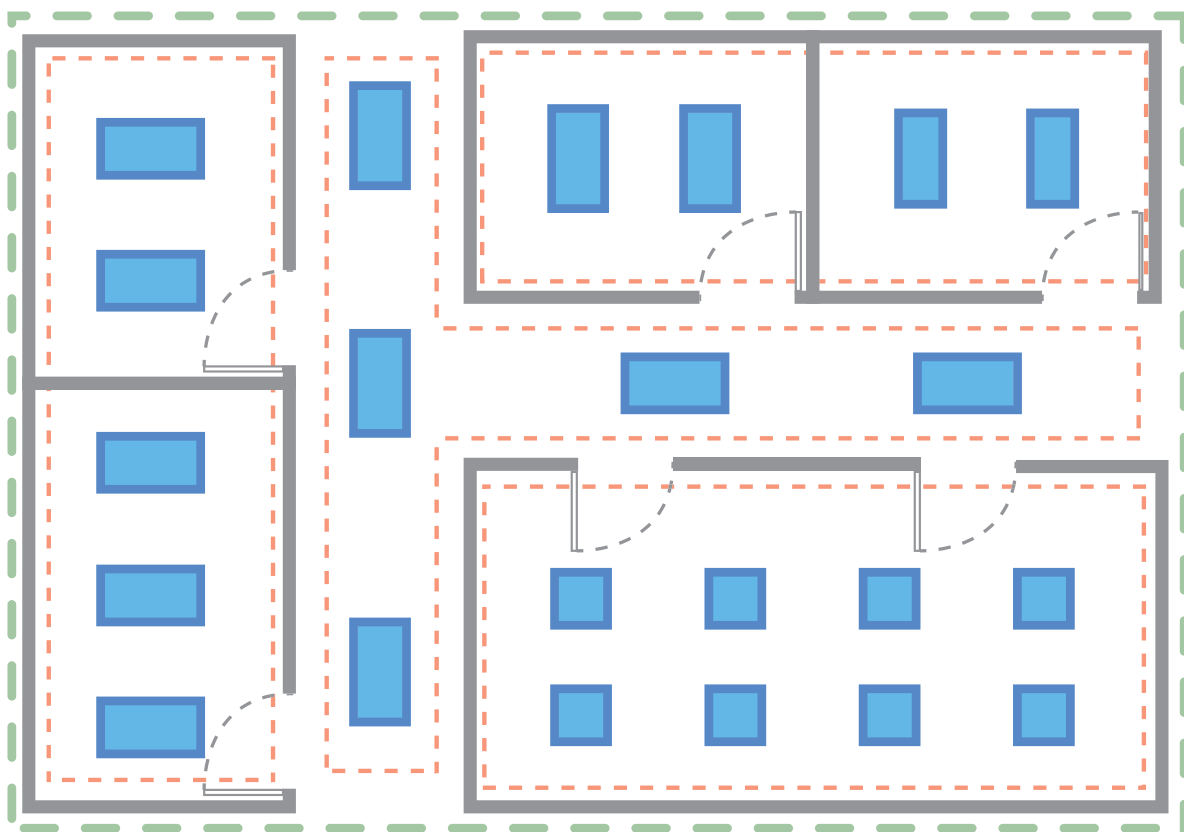
Example of a Sequence of Operation (SOO)

Area:	Open Office		
	Lights	Zones (A) - (D)	Fully dimmable lights controlled in this area
Lighting and Controls	Daylight Zones	Zones (A) - (B)	Daylight rows 1 and 3 will dim independently; Lights will automatically adjust to daylight, maintaining recommended 30FC on task surfaces
	Manual Switch	Zones (A), (B), (C), (D)	User can select scenes, turn lights ON/OFF, or dim lights in each independent zone

System Installation

An installation layout presents a clear map of where NLC components will be placed into the physical space of the room or floor. This also allows an easy identification of groups within a zone, scene areas, and wall switches. Design an installation layout by dividing the floor plan into groups according to the room's operational needs.

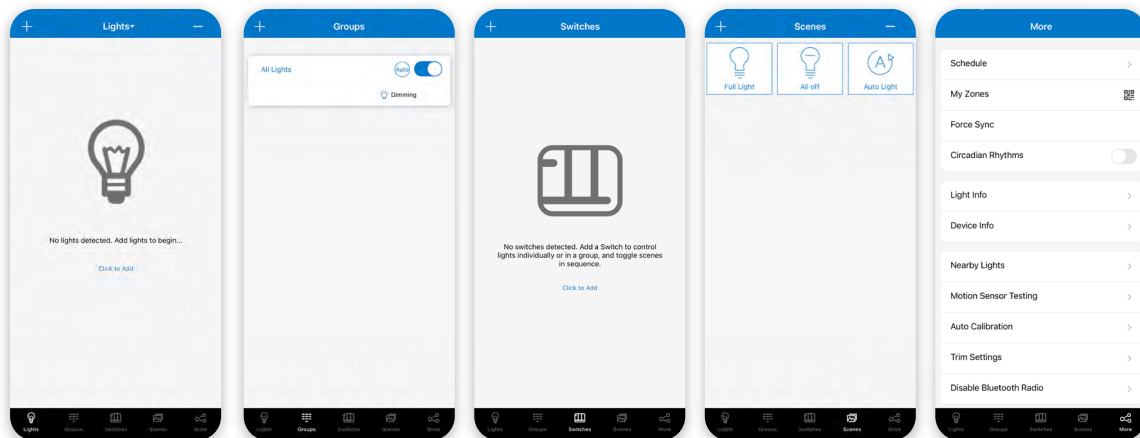
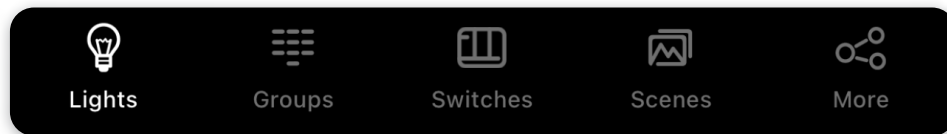
Example of an installation layout



- Zones
- Group
- Luminaires

App Pages

NICOR NLC app has five (5) tab pages you can switch between that gives you better control on your lights. They can be found on the bottom menu bar of the screen. Below is a brief description of each tab pages of the app.



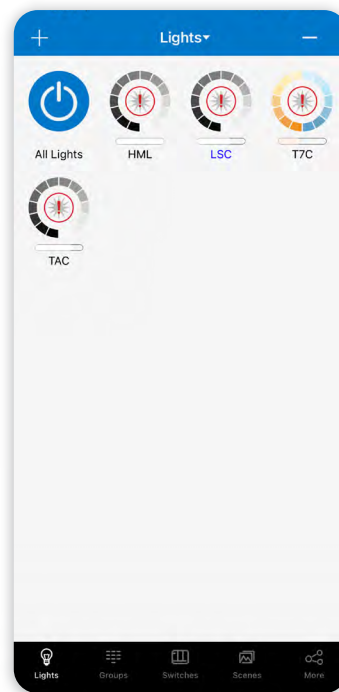
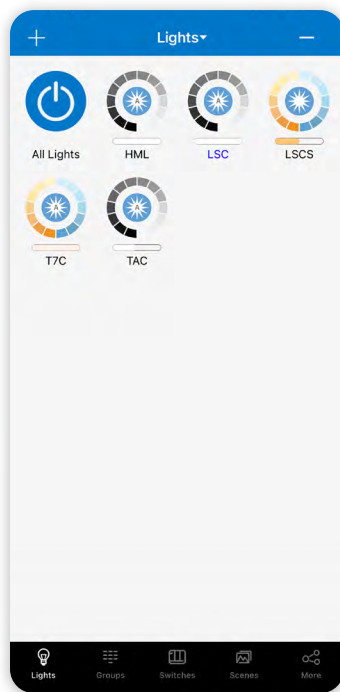
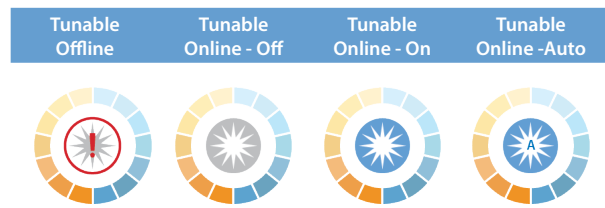
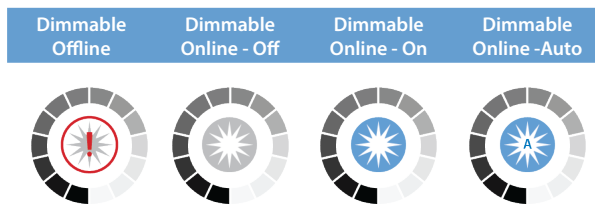
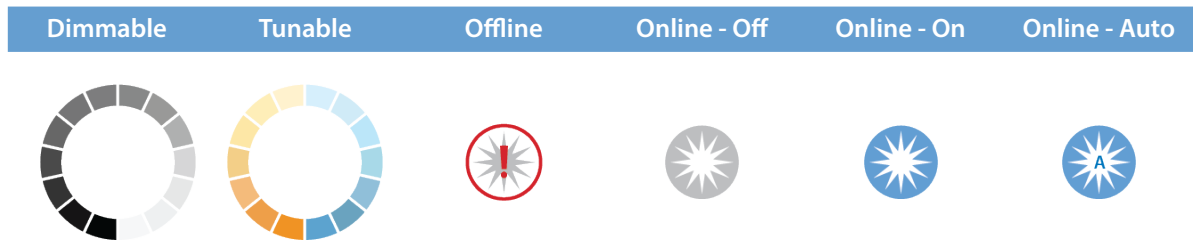
- 1 "Lights" shows all connected lights to the app. Allows user to view and control individual lights.
- 2 "Groups" allows user to create and manage groups.
- 3 "Switches" displays all switches connected to the app. Allows user to view/edit switch controls.
- 4 "Scenes" allows user to create and manage scenes.
- 5 "More" allows user to view Schedules, Zones, Light and Device Info, and other additional settings.

Navigation for each pages will be explained in their corresponding sections of the guide.

Light Icons

Lights connected to the app will be listed on the **Lights** page.

Refer to the icons below to check the status of each individual light.



More Menu

Additional settings and features of the app can be accessed by pressing the **More** button.

Schedule
Set a schedule for individual lights, groups and/or scenes

My Zones
Create, edit and delete zones
Generate and share QR codes

Force Sync
Sync data and settings across devices

Circadian Rhythms
Enable or disable circadian lighting

Light Info
Check info on all connected lights, groups and scenes in a zone

Device Info
Check info about external converters and sensors connected to app

Nearby Lights
See a list of all online lights nearby

Motion Sensor Testing
Test settings for motion sensors

Auto Calibration
Auto calibrate brightness and temperature of lighting groups

Trim Settings
Adjust trim settings of lights or groups

Disable Bluetooth Radio
Disables all bluetooth connections to the app for quick control transfer

Energy Monitoring
Monitor and analyze monthly energy consumption levels

INSTRUCTION
Quick link to the app commissioning guide for instructions

Version
Displays current app version

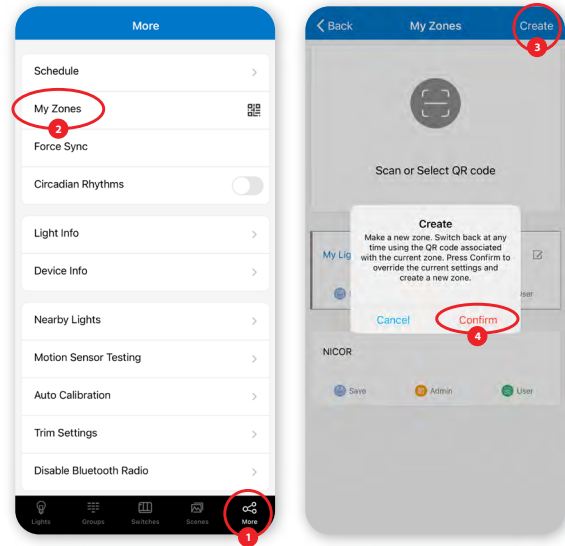
More menu items:
Schedule
My Zones
Force Sync
Circadian Rhythms
Light Info
Device Info
Nearby Lights
Motion Sensor Testing
Auto Calibration
Trim Settings
Disable Bluetooth Radio
Energy Monitoring
INSTRUCTION
Version: 1.1.1

Creating, Renaming, Deleting

A zone will automatically be created named “My Lights” upon first opening the app. A zone can control groups of lights in a huge area. Each zone is assigned a unique QR code for easy access to light controls between different users. If you allowed access to your phone’s photos, QR codes for both the admin and user will automatically be saved in your albums.

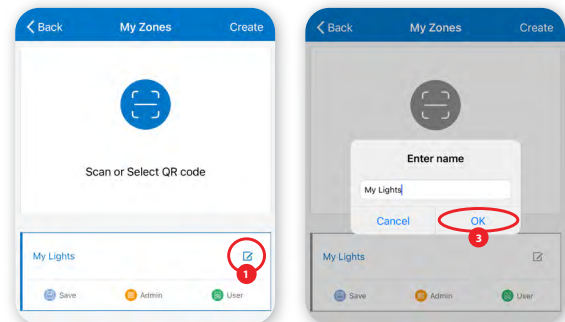
Creating Zones / Generating a QR Code

- 1 Press “More” located on the lower right menu bar.
- 2 Press “My Zones”.
- 3 Press “Create” on the top-right corner of the screen.
- 4 Press “Confirm”.
- 5 Type in a name for the Zone/QR Code and then press “OK”.
- 6 Switch between zones by tapping on them.



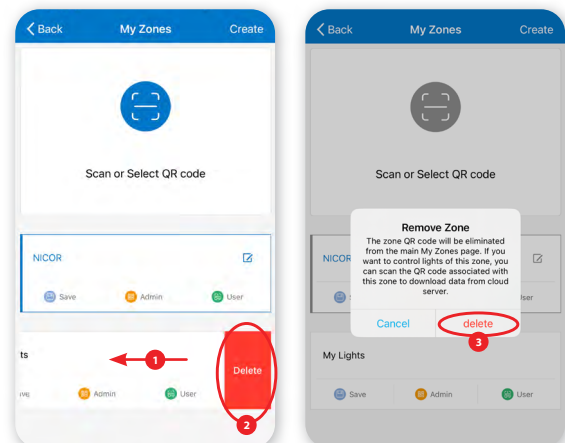
Renaming Zones

- 1 On the My Zones page, press the edit button located to the right of the zone name.
- 2 Enter preferred zone name as prompted.
- 3 Press “OK” to save.



Deleting Zones

- 1 Choose which zone to delete and slide finger to the left.
- 2 Press the red “Delete” button that appears.
- 3 Press “delete” to confirm.

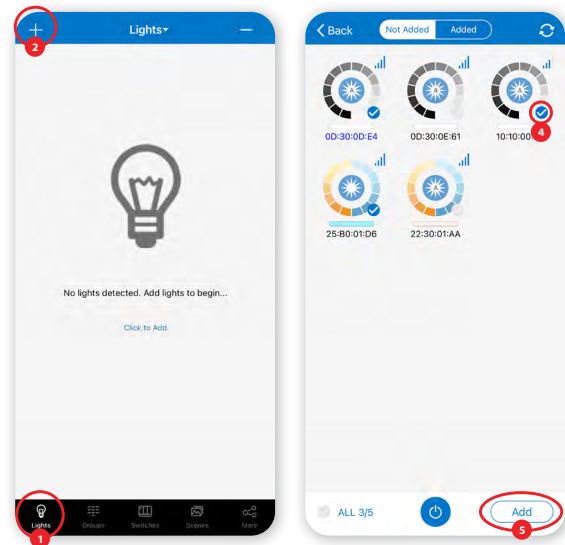


Connecting, Dimming, Tuning

The Lights page will be the first page you'll see whenever you open the app. It is the main page for controlling individual lights. Add lights per zone and do not turn on more than 100 lights at the same time. To prevent wireless communication jamming, turn off lights that are not in the current zone.

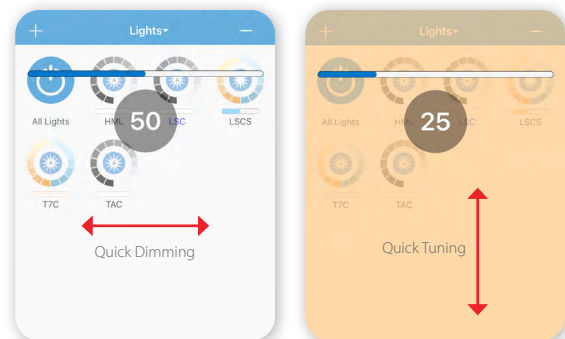
Connecting Lights to App

- 1 Switch to the "Lights" page of the app.
- 2 Press the "+" button on the top left corner.
- 3 App will scan for applicable lights that can be added to the zone. Locate the lights by pressing the icons to turn it ON/OFF.
- 4 Select the lights you want to add by pressing the check mark located on the bottom right corner of the icons.
- 5 Press "Add" to add all the selected lights into the zone.
- 6 Confirm by tapping the "Add" button again. Light will blink to indicate a successful connection.
- 7 Press the "Back" Button to return to the Lights page.
- 8 Check and confirm all lights have been added and successfully connected with the app.



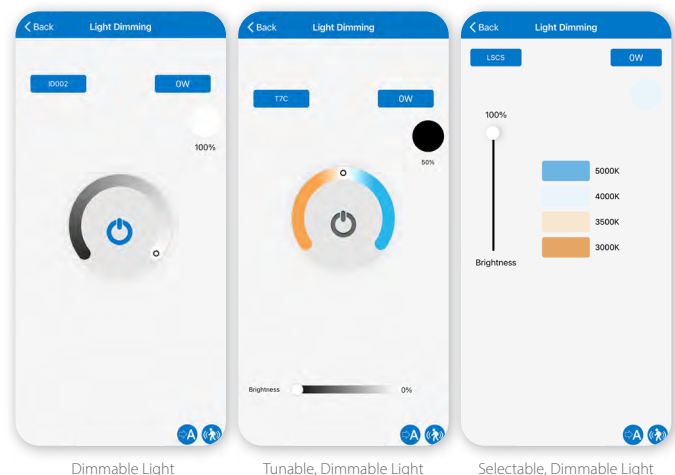
Quick Dimming and Tuning

- 1 Choose which light to change the dimming or tuning levels.
- 2 Lightly tap the light icon and quickly slide finger left or right to adjust brightness.
- 3 Lightly tap the light icon and quickly slide finger up or down to change the color temperature.



Accessing Light Dimming Settings

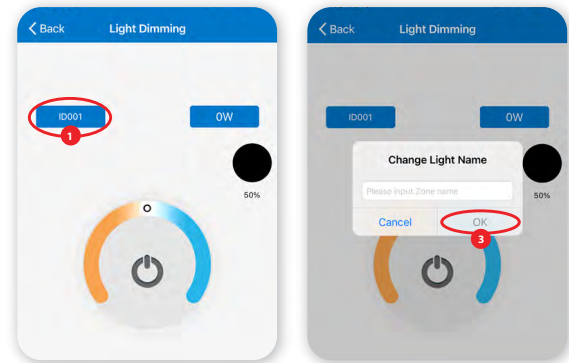
- 1 Select a light. Press and hold icon to access the Light Dimming settings.
- 2 The Light Dimming settings page will vary according to the light.
- 3 Set dimming and tuning according to preferences. Press the "Back" button to save settings.



Renaming, Deleting, Sensor Settings

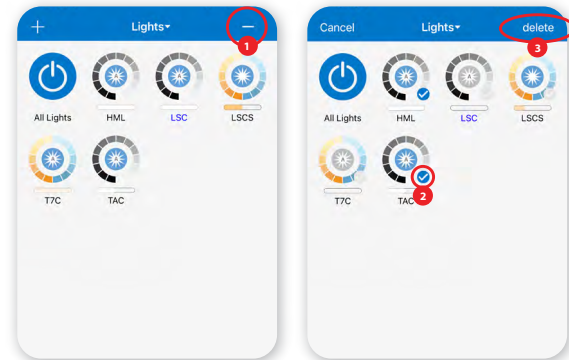
Renaming Lights

- 1 On the Lights Dimming page, press the light name located on the upper left of the dimming/tuning slider.
- 2 Enter light name as prompted.
- 3 Press "OK" to save.



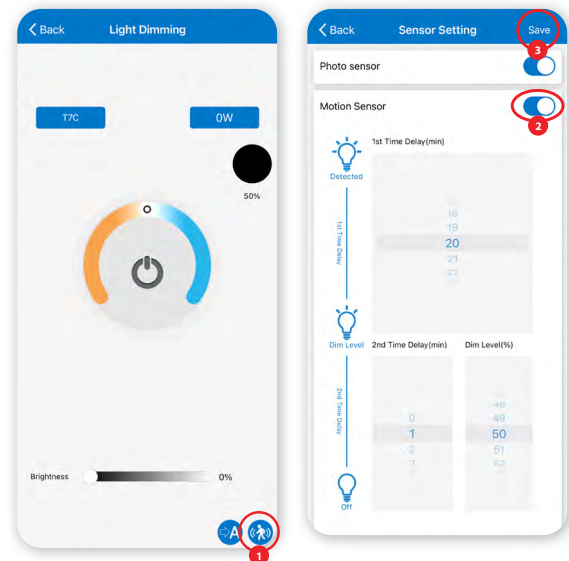
Deleting Lights

- 1 Press the "-" button on the top right corner of the Lights page.
- 2 Select the lights you want to delete.
- 3 Press "delete" to confirm.



Sensor Settings

- 1 On the Light Dimming settings, press the "Sensor Settings" icon located on the lower right of the screen.
- 2 Enable or disable motion sensors and set parameters according to preferences.
- 3 Press the "Save" button on the top right corner to save sensor settings.

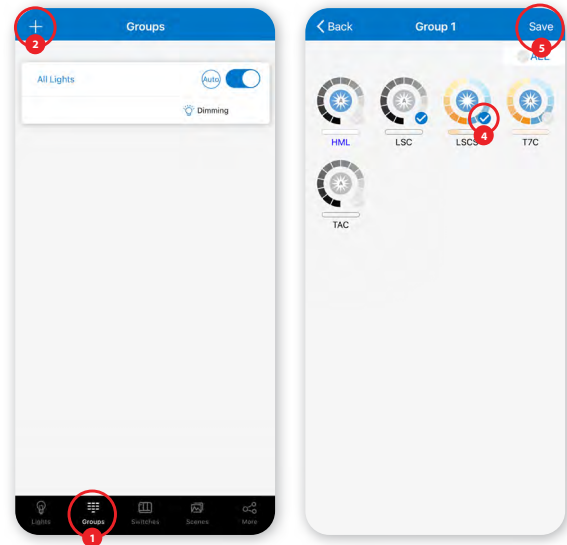


Creating, Renaming, Deleting

Groups simplify control by grouping lights in a small area together. There will be a default group named “All Lights” which gives user control over all lights in the zone.

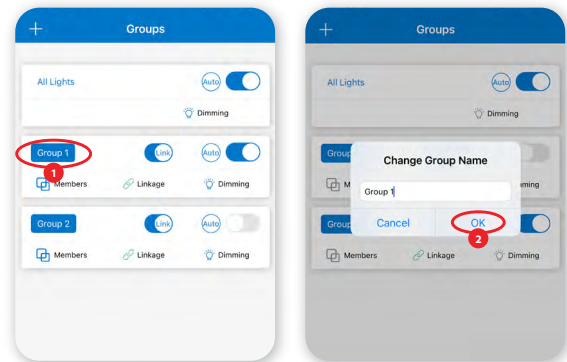
Creating Groups

- 1 Switch to the “Groups” page screen of the app.
- 2 Press the “+” button on the top left corner.
- 3 Input the group name as prompted then press “OK”.
- 4 Select the lights you want to add in the group.
- 5 Press “Save” to save group settings.



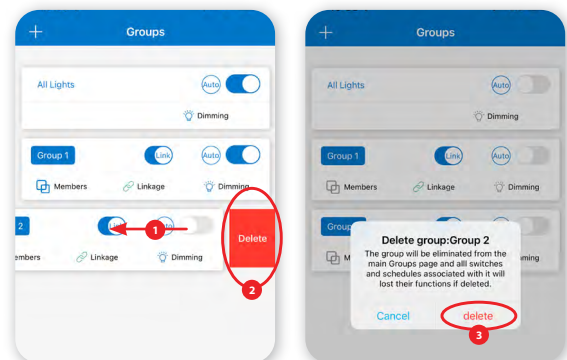
Renaming Groups

- 1 Tap the group you wish to rename.
- 2 Enter new group name as prompted
- 3 Press “OK” to confirm.



Deleting Groups

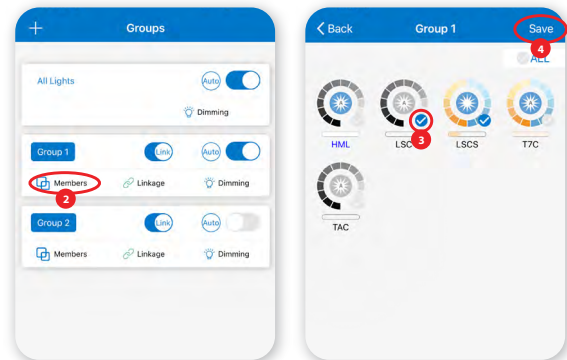
- 1 Choose which group to delete and swipe finger to the left.
- 2 Press the red “Delete” button that appears.
- 3 Press “delete” to confirm.



Adding/Removing, Linkage, Dimming and Wattage

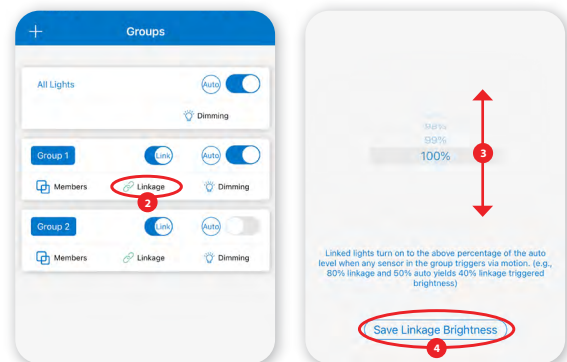
Adding/Removing Lights

- 1 Choose which group to add/remove lights.
- 2 Tap "Members" to see all current lights in the group.
- 3 Select which lights you want to add/remove.
- 4 Press "Save" to confirm changes.



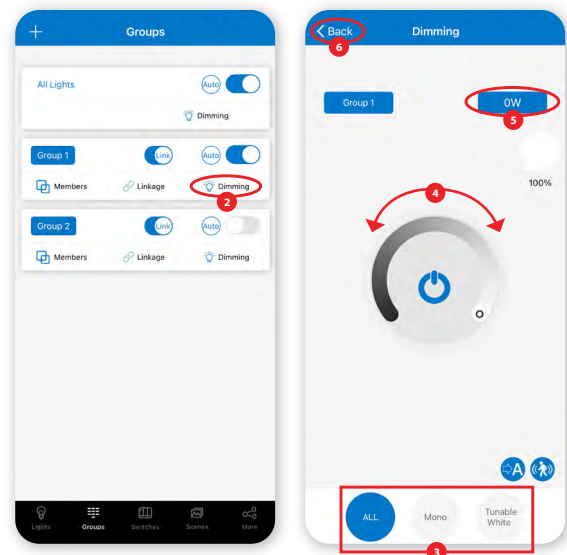
Change Group Linkage Levels

- 1 Choose which group to change linkage settings.
- 2 Tap "Linkage" to access the group linkage controls.
- 3 Set linkage brightness level according to preference.
- 4 Press "Save Linkage Brightness" to confirm changes.



Change Group Dimming and Wattage Levels

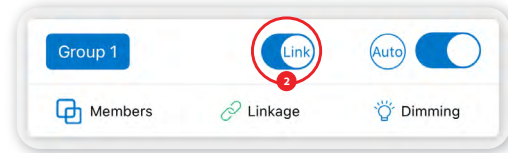
- 1 Choose which group to change dimming settings.
- 2 Tap "Dimming" to access group dimming controls.
- 3 Select which dimming settings to change.
- 4 Set dimming and/or tuning levels according to preference.
- 5 Set wattage levels according to preference.
- 6 Press "Back" to save changes.



Group Controls, All Lights Controls

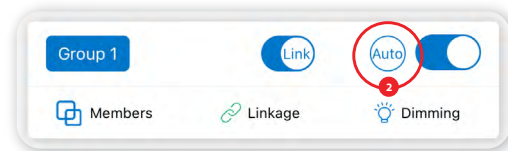
Enable/Disable Group Linkage

- 1 Choose which group to change linkage settings.
- 2 Toggle the "Link" button to enable/disable linkage.



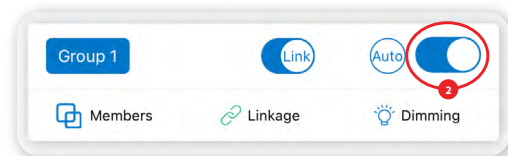
Enable/Disable Group Auto Mode

- 1 Choose which group to switch to Auto Mode.
- 2 Tap the "Auto" button above the Dimming button.



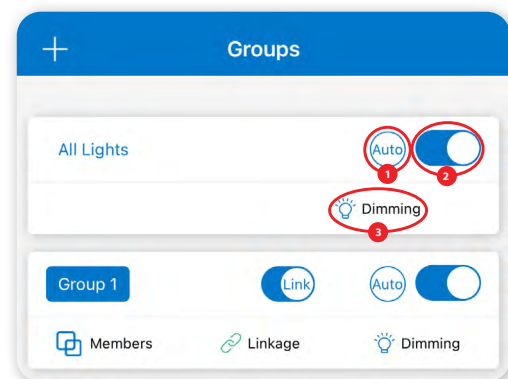
Toggle Group lights ON/OFF

- 1 Choose which group to turn ON/OFF.
- 2 Toggle the ON/OFF switch above the Dimming button.



All Lights Control

- 1 Tap "Auto" button to turn on Auto Mode on all lights.
- 2 Toggle the "ON/OFF" switch to turn ON/OFF all lights.
- 3 Press the "Dimming" button to access Dimming Settings of all lights.

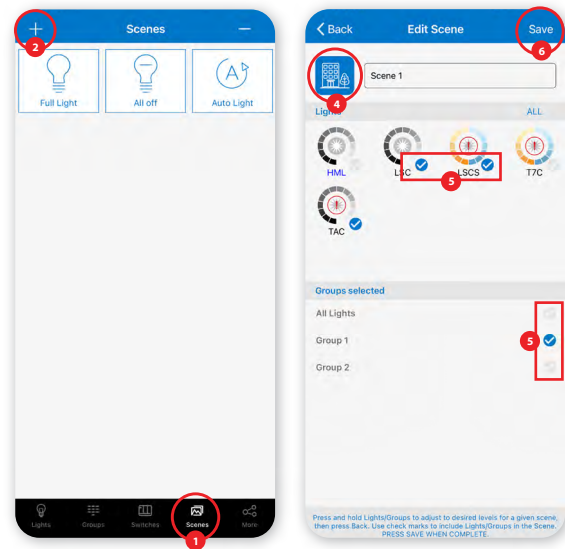


Creating, Programming, Deleting

Scenes are pre-programmed light settings that users can manually set. Triggering a scene will cause all members (individual lights or groups) to change their settings to the applied scene. The app comes with three default scenes: Full Light, All Off, and Auto Light.

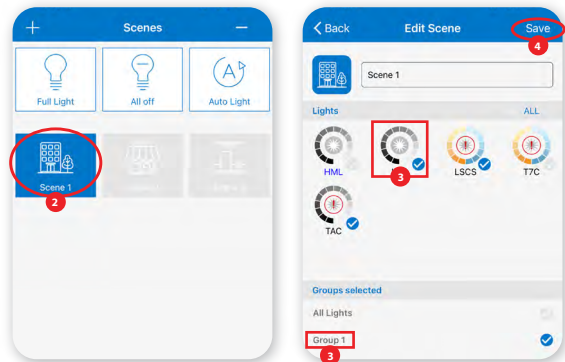
Creating Scenes

- 1 Switch to the "Scenes" page of the app.
- 2 Press the "+" button on the top left corner.
- 3 Type the scene name as prompted then press "OK".
- 4 Select an appropriate icon to use as the scene icon.
- 5 Select individual lights or groups to add to the scene.
- 6 Press "Save" to save scene settings.



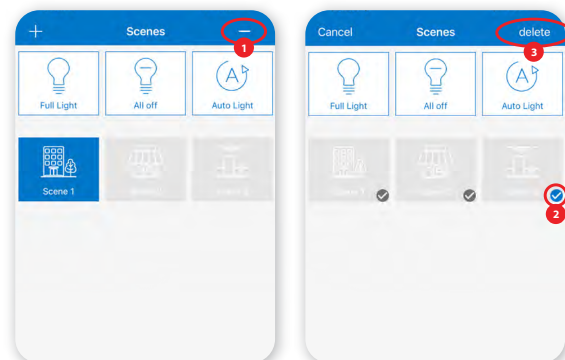
Programming Scenes

- 1 Select which scene to program.
- 2 Press and hold scene icon to access scene settings.
- 3 To program scenes, press and hold Lights/Groups and adjust settings according to scene preferences.
- 4 Press "Save" to save scene settings.



Deleting Scenes

- 1 Press the "-" button on the top right corner.
- 2 Select which scenes to delete.
- 3 Press "delete" to confirm.

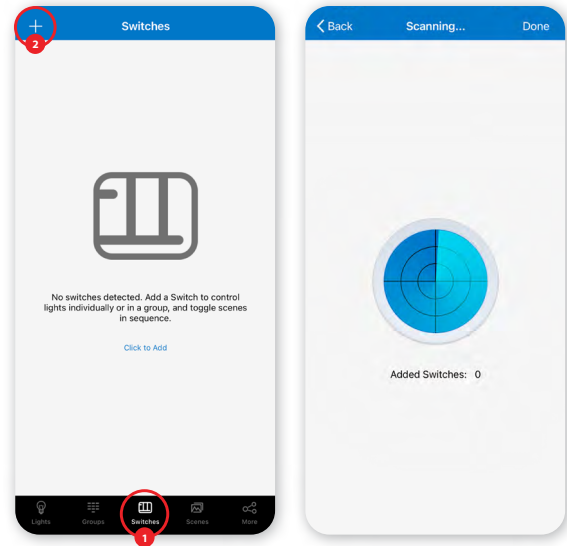


Adding Switches

Add switches to the app to easily control individual lights or groups. Depending on the switch type, you can associate up to 3 scenes to a button. Switches will automatically stop pairing after 30 seconds or when a button is pressed.

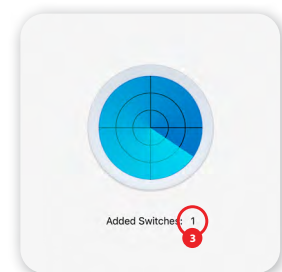
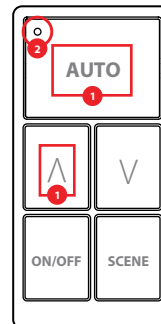
Pairing Switches

- 1 Switch to the "Switches" page of the app.
- 2 Press the "+" button on the top left corner.
- 3 App will scan for nearby switches.
- 4 Follow instructions below to pair a 5-Key or 3-Key switch.



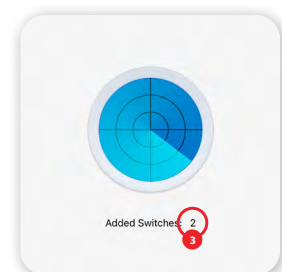
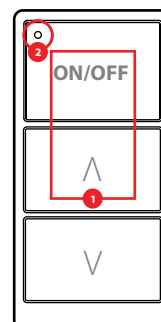
Pairing a 5-Key Switch

- 1 Press and hold the "Auto" and "∧" buttons at the same time.
- 2 Release buttons after 3 seconds or when the LED light indicator blinks.
- 3 App will automatically add switches as soon as it's detected.
- 4 Press "Back" to confirm changes.



Pairing a 3-Key Switch

- 1 Press and hold the "ON/OFF" and "∧" buttons at the same time*.
- 2 Release buttons after 3 seconds or when the LED light indicator blinks.
- 3 App will automatically add switches as soon as it's detected.
- 4 Press "Back" to confirm changes.

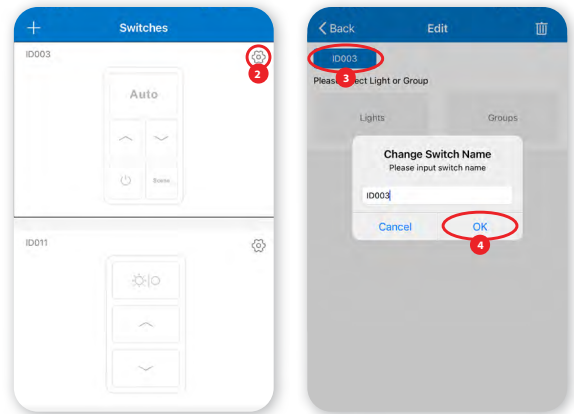


*For early models, press and hold the "ON/OFF" and "v" buttons.

Renaming, Deleting, Button Configurations

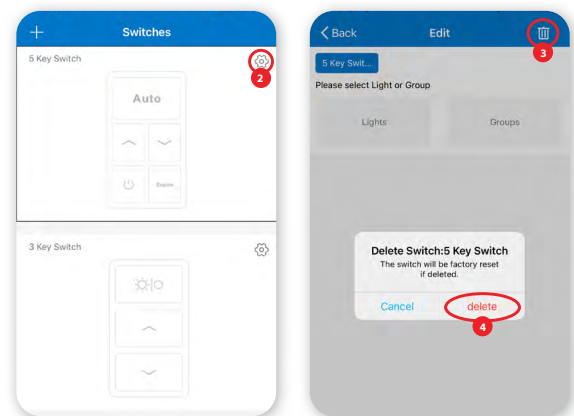
Renaming Switches

- 1 Choose which switch to rename.
- 2 Press the gear icon to access switch settings.
- 3 Tap the current switch name displayed on the top left.
- 4 Enter the new switch name and press "OK" to confirm changes.



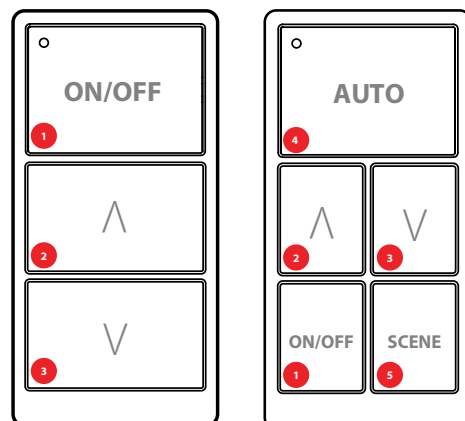
Deleting Switches

- 1 Choose which switch to rename.
- 2 Press the gear icon to access switch settings.
- 3 Tap the trash icon on the top right corner.
- 4 Press "delete" to confirm.



Button Configurations

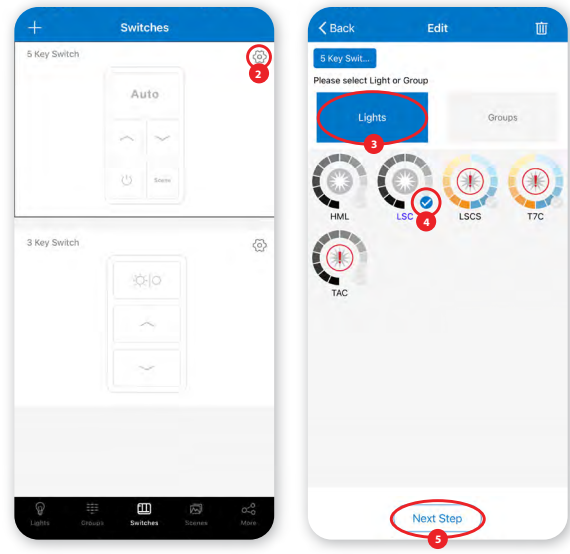
- 1 ON/OFF button
- 2 Dimming button - UP
- 3 Dimming button - DOWN
- 4 Auto-sensors button - ON/OFF
- 5 Scene button - switch between assigned scenes



Assigning Lights, Groups and Scenes

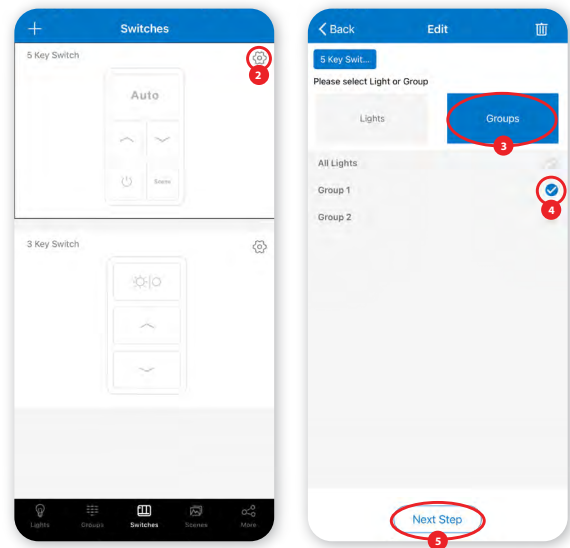
Assigning Lights to Switches

- 1 On the "Switches" page, choose which switch to assign lights.
- 2 Press the gear icon to access switch settings.
- 3 Press "**Lights**" to see a list of individual lights.
- 4 Select only **one** light to assign for the switch.
- 5 Press "Next Step" to continue.



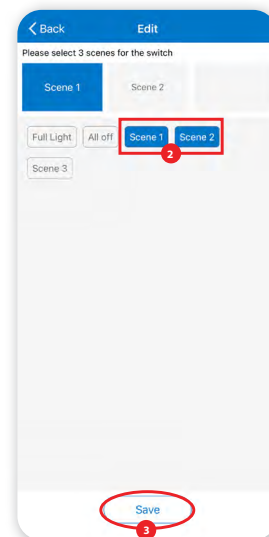
Assigning Groups to Switches

- 1 On the "Switches" page, choose which switch to assign lights.
- 2 Press the gear icon to access switch settings.
- 3 Press "**Groups**" to see a list of individual lights.
- 4 Select only **one** group to assign for the switch.
- 5 Press "Next Step" to continue.



Assigning Scenes to Switches

- 1 After assigning **one** light OR group to the switch, you will be prompted to select scenes next.
- 2 Select up to **three** scenes.
- 3 Press "**Save**" to confirm.



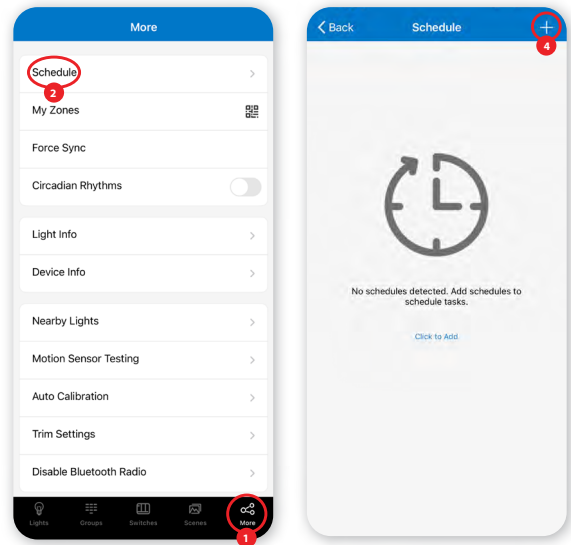
Creating, Assigning, Scheduling

Schedules allow users to set a specified date and time for lights to function.

Users can set schedules to an individual light, a group or a scene.

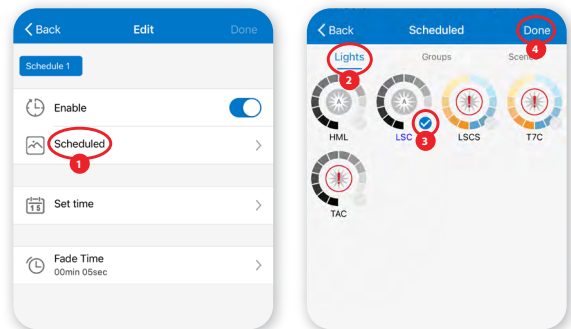
Creating a Schedule

- 1 Press **"More"** to access additional settings of the app.
- 2 Press **"Schedule"**.
- 3 Press **"+"** on the top right corner.
- 4 Type in a name for the schedule as prompted.
- 5 Press **"OK"** to continue.



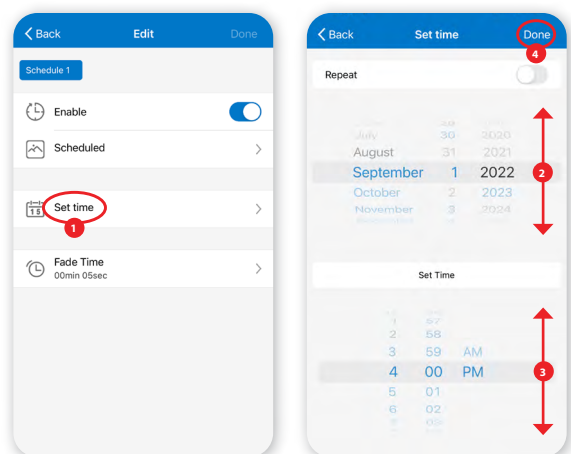
Assigning Schedule to Lights, Groups, or Scenes

- 1 On the Edit screen of a selected schedule, press **"Scheduled"**.
- 2 Choose between **"Lights"**, **"Groups"**, or **"Scenes"**.
- 3 Select one light/group/scene to schedule.
- 4 Press **"Done"** to continue.



Set Schedule Date and Time

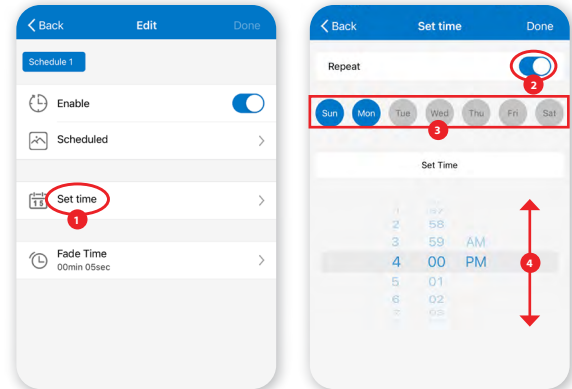
- 1 On the Edit screen of a selected schedule, press **"Set time"**.
- 2 Choose preferred date for the schedule.
- 3 Choose preferred time for the schedule.
- 4 Press **"Done"** to continue.



Repeating, Fade Time, Deleting

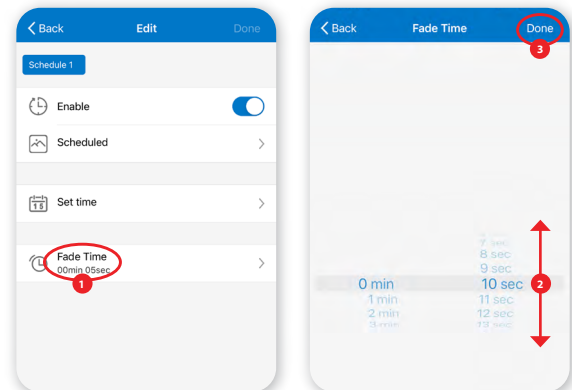
Set a Repeating Schedule

- 1 On the Edit screen of a selected schedule, press **"Set time"**.
- 2 Toggle switch to enable **Repeat**.
- 3 Choose the days of the week you want the schedule to repeat.
- 4 Set preferred time for the schedule.
- 5 Press **"Done"** to continue.



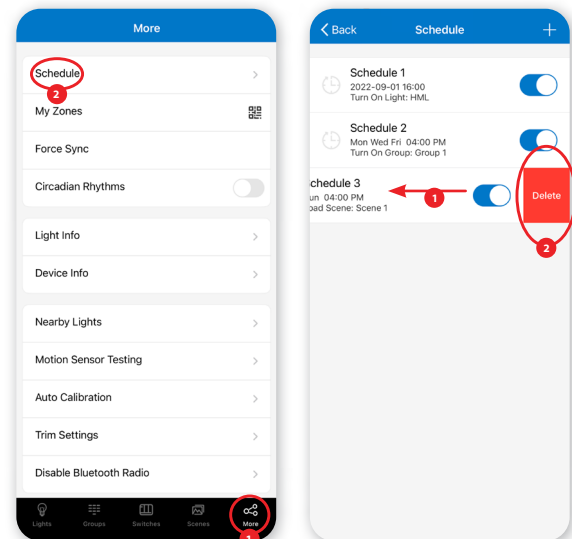
Set Schedule Fade Time

- 1 On the Edit screen of a selected schedule, press **"Fade Time"**.
- 2 Set Fade Time according to preference.
- 3 Press **"Done"** to continue.



Deleting a Schedule

- 1 Press **"More"** to access additional settings of the app.
- 2 Press **"Schedule"** to see a list of all schedules.
- 3 Choose which schedule to delete and swipe finger to the left.
- 4 Press the red **"Delete"** button that appears.
- 5 Press **"delete"** to confirm.



Scanning, Saving, Sharing

A QR code represents a zone and the lights, switches, and groups inside the zone. By creating a zone, a QR code is automatically generated for both an admin and user. While the User QR code is limited only to lighting controls, an Admin QR code allows any user to control and edit all settings in the app.



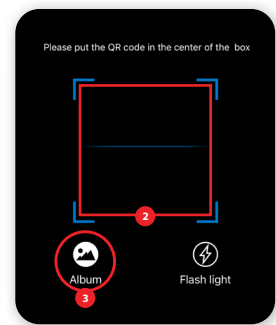
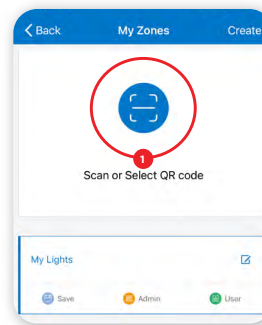
Admin QR code



User QR code

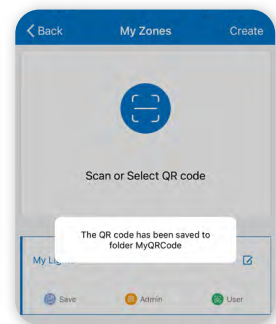
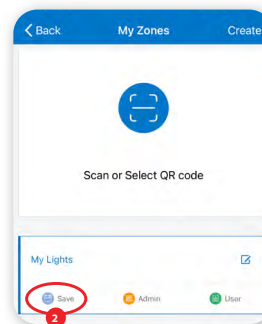
Scanning QR Codes

- 1 On the My Zones page, press **"Scan or Select QR code"**.
- 2 Place QR code inside the boxed camera area to scan.
- 3 You can also select QR codes saved in phone by pressing the **"Album"** button.
- 4 App will automatically add Zone after QR code has been scanned.



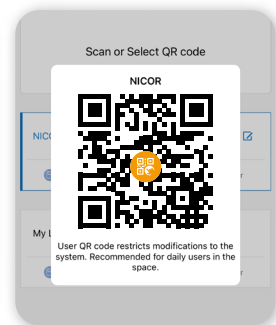
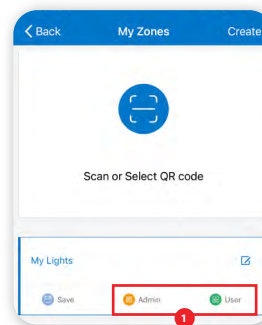
Saving QR Codes

- 1 Allow access to photos for QR codes to be saved to phone.
- 2 Press the **"Save"** button located under the zone name.
- 3 QR codes will be saved on an auto-generated album folder **"MyQRCode"**.



Sharing QR Codes

- 1 Choose between Admin or User level QR codes then press to share.
- 2 A QR code will be displayed on the app for scanning.



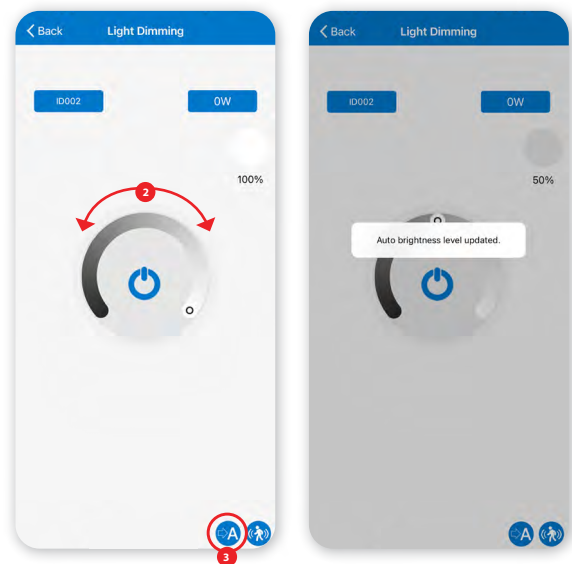
Auto Brightness, Auto Calibration

Light levels are automatically controlled by sensors in Auto Mode. There will be an "A" in the middle of the light's icon to indicate that it has been set to Auto Mode. Light sensors that can harvest daylight will record data so sensors can fully control the light's brightness accordingly. There are two ways to set auto light levels in the app: **Auto Calibration** and **Auto Brightness**.

Adjust Auto Brightness Level

Auto Brightness sets the maximum brightness level of a light after recovering from a passive state. By default, the auto brightness level is 100%.

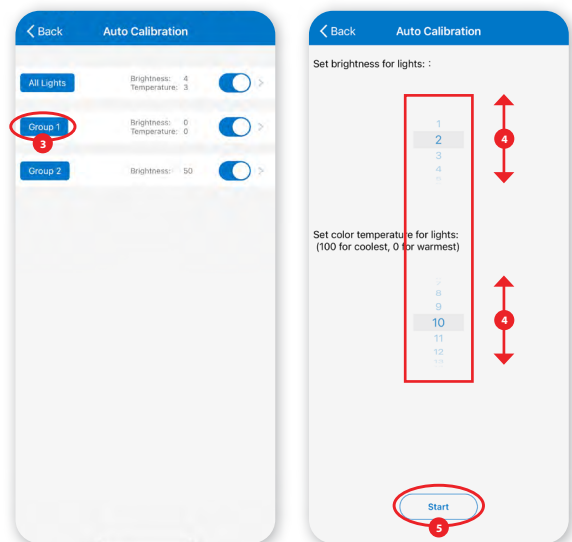
- 1 Press and hold a light icon to access the "Light Dimming" settings.
- 2 Adjust the dimming levels according to preferences.
- 3 Enable Auto Mode by pressing the **Auto** button on the lower right.
- 4 A confirmation will appear that the Auto Brightness level has been updated.



Enable Auto Calibration

Auto Calibration automatically removes the ambient light interference by a self-learning process to determine the appropriate auto light levels. During calibration process, lights will turn on and off several times.

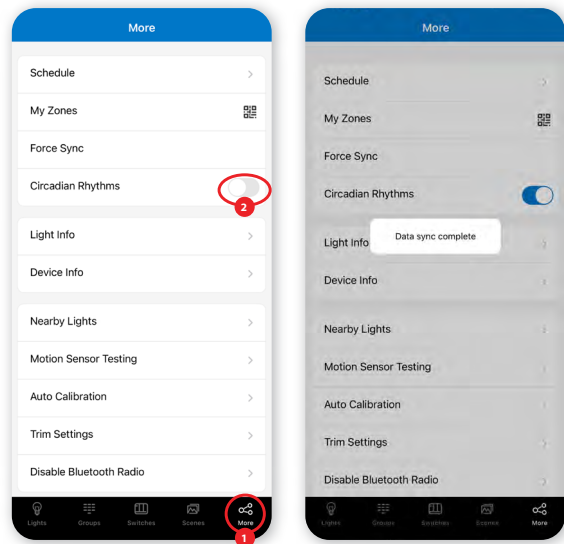
- 1 Press "More" to access additional settings of the app.
- 2 Press "Auto Calibrate".
- 3 Choose which group to auto calibrate.
- 4 Adjust parameters according to preference.
- 5 Press the "Start" button to start calibration.



Enable/Disable Circadian Rhythm

Circadian Rhythm auto syncs all the lights' color temperature according to the time of the day to simulate natural light. This can only be applied to **tunable white** lights that is set to **Auto Mode**.

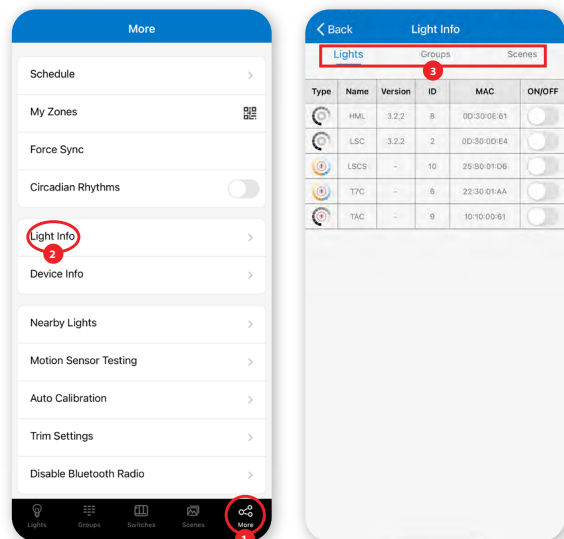
- 1 Press "**More**" to access additional settings of the app.
- 2 Toggle the button to the right to enable/disable Circadian Rhythm.
- 3 Upon enabling/dsabling, settings will automatically be synced across devices.



Checking Light Information

The **Light Info** tab give users a list of all information on lights, groups and scenes in a zone.

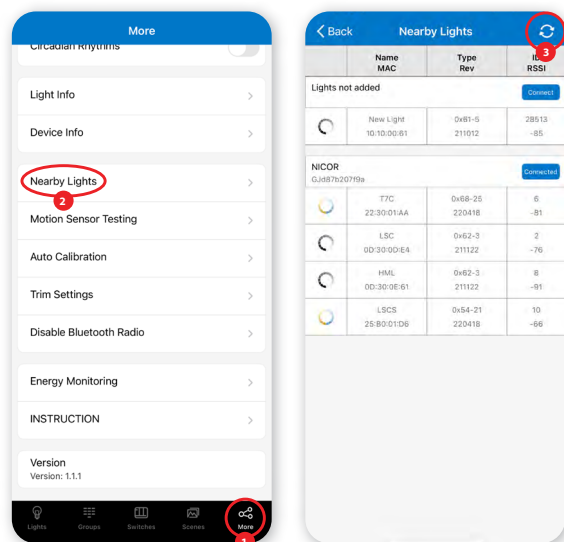
- 1 Press "**More**" to access additional settings of the app.
- 2 Press "**Light Info**".
- 3 Switch between **Lights**, **Groups**, or **Scenes** to display needed info.



Checking Nearby Lights

Nearby Lights tab helps the commissioning process by listing all online lights that are connected and not connected to the app.

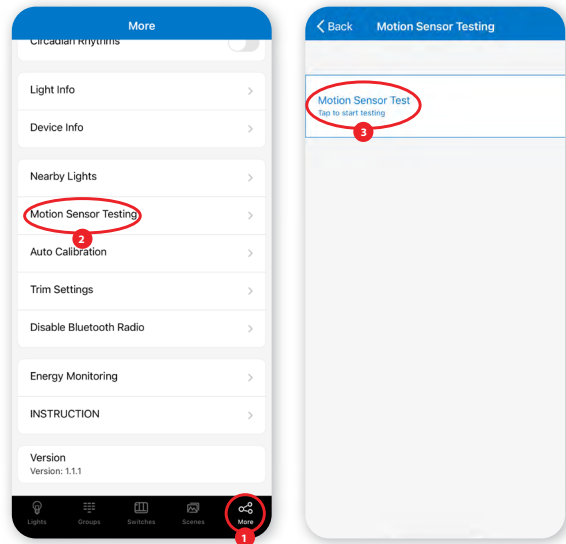
- 1 Press "**More**" to access additional settings of the app.
- 2 Press "**Nearby Lights**".
- 3 Press the **Refresh** button if lights don't show up.



Motion Sensor Testing

Motion Sensor Testing allows users to test if motion sensors work properly. Lights must first be set to **Auto Mode** before running the test.

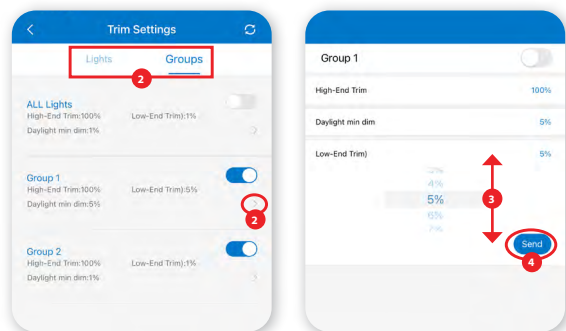
- 1 Press "**More**" to access additional settings of the app.
- 2 Press "**Motion Sensor Testing**".
- 3 Tap to start the test. Lights should turn off as soon as the test is started.
- 4 Walk around to test sensors and trigger lights.



Trim Settings

Trim Settings allows users to set the minimum and maximum power output of lights and groups to save energy.

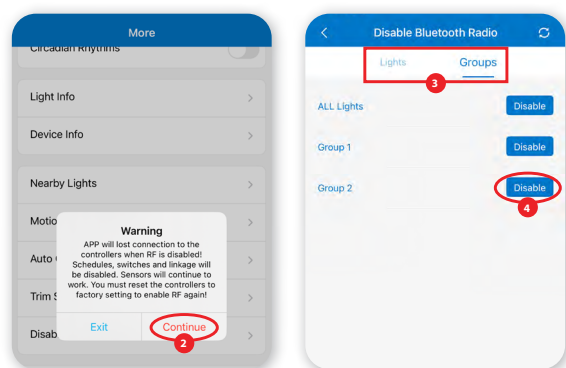
- 1 Press "**More**" to access additional settings of the app then tap "**Trim Settings**".
- 2 Select Lights or Groups to change settings.
- 3 Adjust parameters according to preferences.
- 4 Press "**Send**" to send settings to light.



Disable Bluetooth Radio

Disabling Bluetooth Radio disconnects all lights' bluetooth connection to the app for easy transfer of controls. To restore, sensors will need to be reset.

- 1 Press "**More**" to access additional settings of the app then tap "**Disable Bluetooth Radio**".
- 2 A warning prompt will appear. Press "**Continue**" to accept.
- 3 Select which Lights or Groups to disable bluetooth connection.
- 4 Press "**Disable**". App will automatically refresh and sync settings.



There are two ways to restore lights to their factory settings. Deleting lights from the app is the easiest way to reset the light settings. The other way is by forcefully resetting through a power sequence. See steps below.

- 1 Make sure the lights are off.
- 2 Turn on lights for 8 seconds; then turn the power off for 10 seconds.
- 3 Immediately turn the lights on and off, then wait for another 10 seconds. Repeat 3 times.
- 4 Turn the lights on for 8 seconds, then turn the power off for another 10 seconds. Repeat 2 times.
- 5 Turn the lights back on. Blinking Lights indicate a successful factory reset. All previous settings connected to the app has now been deleted.

Waiting for at least 10 seconds will ensure that the fixture is completely powered off.

The duration will vary depending on the driver and the power supply. If the driver can cut power to the fixture within 3 seconds, then you may change the waiting period from 10 to 3 seconds to facilitate a faster reset time.

System Capacity

Luminaires	Up to 100 lights in a zone. Please divide to different zones if you have more than 100 lights.
Luminaire/Group	Lights can be added up to 20 groups and will automatically be removed from the first group after.
Scene	Lights can be set up to 32 scenes and will automatically be removed from the first scene after. Up to 127 scenes can be set per zone.
Schedule	Up to 32 schedules can be set per zone.
Switch	Up to 10 switches can be set per zone. Switches and lights are counted separately. Adding switches to a zone does not reduce the number of lights.
Zones	Unlimited number of zones can be added to the app.
Data Persistence	All settings (sensor, group, scene, parameters and switch) are saved on individual luminaire controllers so the system can run without network connection or after a power outage.

Contact [NLC support](#) for any questions or concerns.