## Scena



Who controls the lighting, awakens emotions

simon



Light is what we see, emotion is what we feel
Lighting Control





## The influence of light on humans

Variations in light, both artificial and natural, affect people's mood and behaviour.

By controlling its density, tonality and modifying its shades, light can become a key element, designed for people's well-being.





Conference Room, Hotel Condes de Barcelona - Barcelona

## MODELLING SPACES WITH LIGHT AND COLOUR



#### LIGHTING CONTROL ANY USER CAN AFFORD

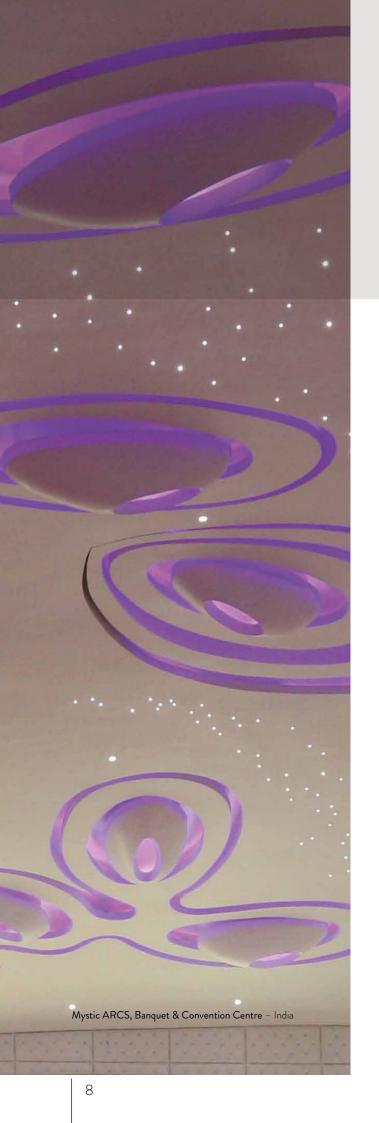
Transforms homogeneous, uniform spaces into heterogeneous areas full of contrasts, by adapting the light to the medium receiving it.

#### UNLIMITED LIGHTING EFFECTS

Modify spaces, enliven them and differentiate them using light, by means of colour, chromatic temperature or based on static or dynamic lighting scenarios.

## USE ONLY THE LIGHT YOU NEED

By using light appropriately and regulating artificial lighting, you contribute to balancing the circadian cycle and to aiding natural biorhythms. So avoiding great contrasts and enhancing well-being.



#### SCENA

## EMOTIONAL



## TREATMENT OF COLOUR

Elegant use of colour lets you give a space its own personality. From a predefined palette of colours, enabling you to change the luminosity, saturation and hue to another precise RGB-based combination.



### MODIFYING THE TONALITY OF LIGHT

The warmth of light can produce a great variety of sensations in a given environment. Scena lets you change the colour temperature and the brightness of a biodynamic luminaire.



#### **SEQUENCES**

Let you harmonise the space with the passing day by using dynamic light.

#### SCENA

## RATIONAL



#### **CIRCADIAN CYCLE**

Scena simulates sunlight depending on geographic location, so helping to synchronize the sleep - wake cycle.



#### **CONSTANT** LIGHTING CONTROL

The lighting level necessary at each time needs to be adapted in agreement with the weather and atmospheric conditions outdoors. Scena sets the light levels to avoid contrasts and contractions of the pupils that can lead to headache or tiredness.



#### **SCHEDULING**

Lets you program activation and deactivation automatically. Avoids carelessly leaving the lights on, with the corresponding energy savings.



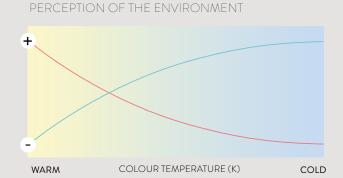
# Scena lets you control the colour temperature and the brightness of a biodynamic luminaire.

## BIODYNAMIC

The feeling a space transmits is closely linked to its lighting tonality.



## CONTROLS TONE



Biodynamic control enables you to modify tone to achieve the desired effect at all times.

## CIRCADIAN

Circadian rhythms are due to the action of the biological clock which regulates the body's physiological functions, such as sleep and wakefulness, with a regular 24-hour cycle.

Light influences the way this clock works, both the amount of light and the colour temperature, sending signals through the retina to different parts of the brain and modifying physiological activity.

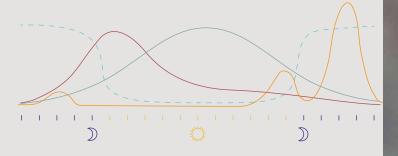
Circadian cycles are important in determining the cycle of sleep and wakefulness, hormonal activity, cell regeneration and brain function, among other bodily functions.



It adjusts the colour temperature in an appropriate way according to the time of day, depending on the geographic location selected.

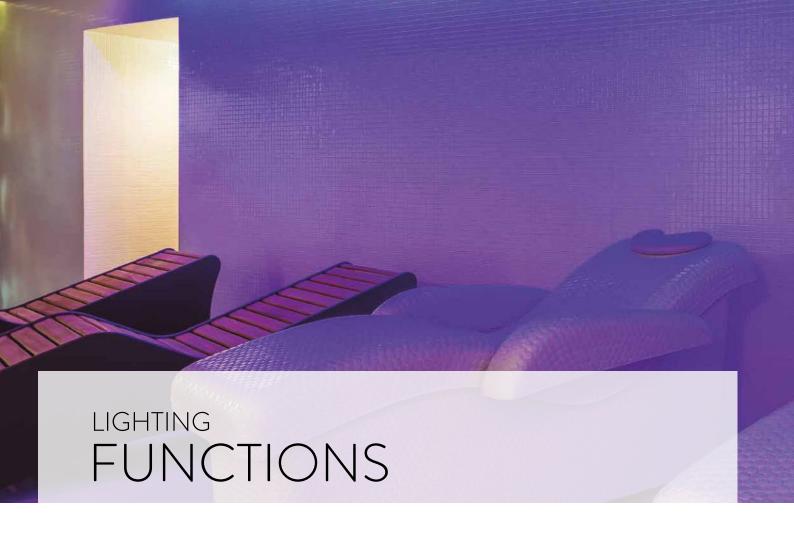
### CONTROLS SLEEP AND WAKEFULNESS

CIRCADIAN CYCLE



Scena automatically calculates the time of sunrise and sunset.

● BODY TEMPERATURE ● CORTISOL ● MELATONIN ● GROWTH HORMONE



#### **EMOTIONAL**



#### ON/OFF

Individual on/off control of luminaires.



#### DIMMING

Individual dimming of luminaires.



#### **BLINDS**

Individual control of motors for blinds and curtains, etc.



#### **RGB COLOUR**

Individually control of RGB luminaires: colour, brightness, saturation and hue.



#### **BIODYNAMIC CHANNEL**

Control of luminaires with several colour temperatures.



#### **GROUP OF LUMINAIRES**

Grouping for overall control of luminaires.



#### **BLINDS GROUP**

Individual control of motors for blinds and curtains, among others.



#### **RGB GROUP**

Grouping for control of RGB luminaires



#### MIXED GROUP

Grouping for overall control of luminaires and blinds.



#### LIGHTING SCENARIO

Individual control of multiple channels and/or groups to achieve an overall lighting setting.



#### **COLOUR SCENARIOS**

Individual and conventional control of RGB luminaires to achieve an overall lighting setting.



#### **SEQUENCES**

Dynamic Control to enable changes of scenario depending on the time (changing colour and lighting levels at the desired speed).



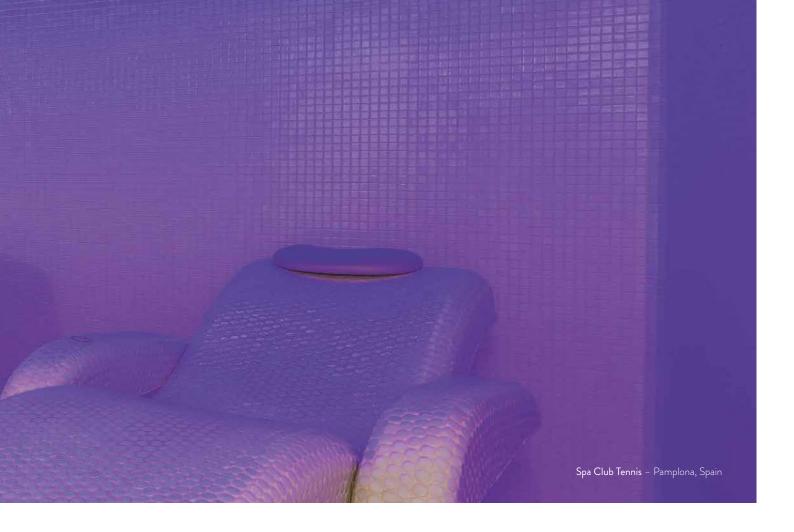
#### SCOLOUR

Control of up to 10 scenarios based on an external analogue signal (1-10 V).



#### PRESENCE SIMULATION

Smart activation/deactivation of channels, groups and scenarios to simulate an occupied space.



#### RATIONAL



#### CIRCADIAN CYCLE

Reproduction of the colour temperatures according to the time of day.



#### CONSTANT LIGHT CONTROL (CLC)

Control of natural and artificial lighting to maintain a constant light level and maximise use of natural light sources.



#### **SENSORS**

Lets you link conventional devices (such as hotel cards or presence detectors) to make changes to scenarios and groups, etc.



#### **SCHEDULE**

Activation/deactivation of channels, groups and scenarios based on a time schedule.



#### ECO

After a determined consumption, luminaires not considered a priority will be switched off.



#### **ALERTS**

Reports the status of security functions: luminaire needs changing, eco function, etc.

#### **SYSTEM**



#### **DIRECT ACCESS POINTS**

Lets you customise the main screen with the most commonly used functions.



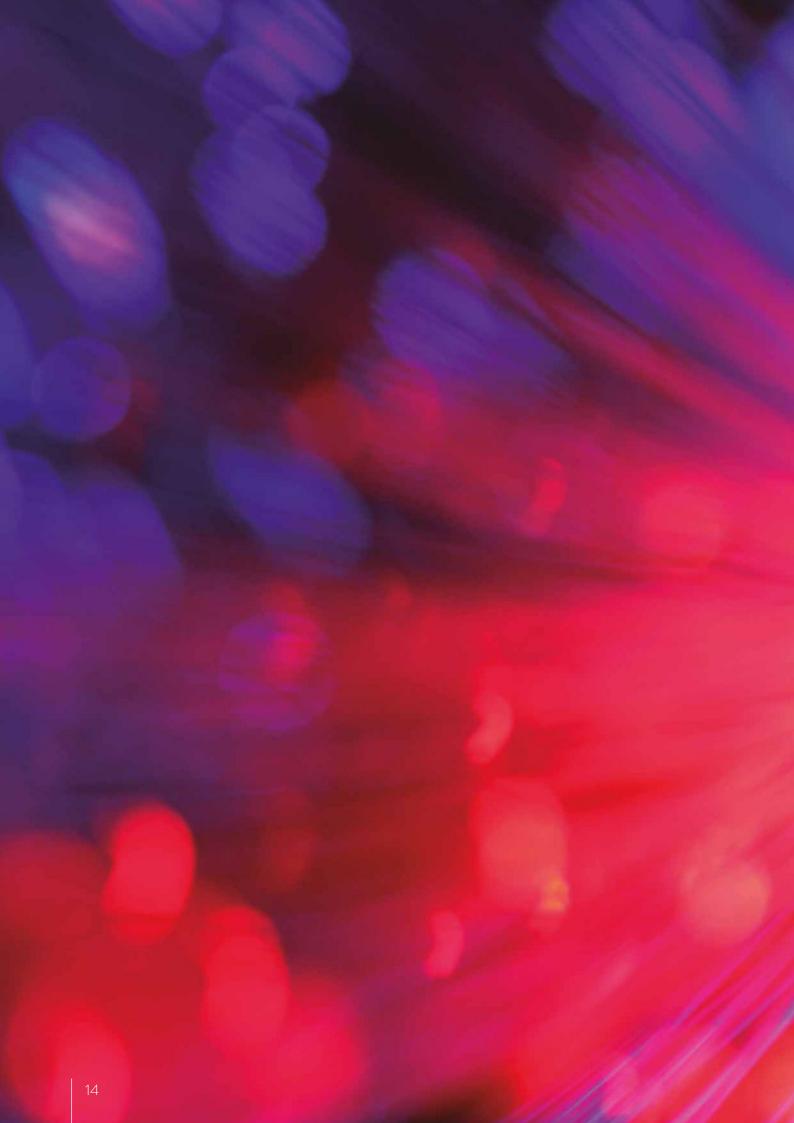
#### **CONFIGURATION OF PERMITS**

Customising the applications users can access.



#### ADVANCED CONFIGURATION

Enabling advanced adjustments to the system.



## Scena Technology

Scena enables you to manage all types of luminaires with easy configuration to achieve total lighting control.

## 5 KEY POINTS OF SCENA TECHNOLOGY



### TOTAL LIGHTING CONTROL



Dimming



Blinds



Colour



Biodynamic



Groups



Scenarios



Sequences



Circadian



Constant light control



Scheduling



Occupation



Presence

#### 2

#### FAST, INTUITIVE USE VIA MULTIPLE INTERFACES







Professional App. Display of multiple SCENA systems in a single interface.



User App for smartphone and tablet. Direct access to the most frequently used functions.

Download at





Optional keypads.

Download at:









USB input allows schedule loading, plus version updating with innovative new functions.







UNIVERSAL, ALL TYPES OF LUMINAIRES AND LIGHTING PROTOCOLS











#### 1 CORPORATE LIGHTING

Subtle, gradual transitions are generated dynamically with the corporate colour at a certain time.







#### (6) TRANSIT AREAS OR INFREQUENT USE

Space lit when it is occupied. Courtesy lighting avoids dark areas during the rest of the day.



#### 2 ) MEETING ROOMS

Adaptation of lighting to highlight the most important aspects in a meeting or presentation.



Scenarios

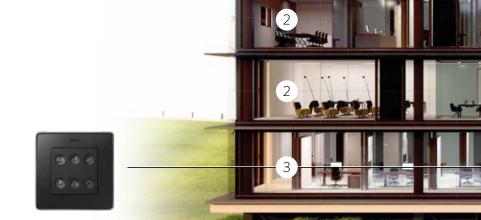
#### 3 OPEN-PLAN LIGHTING

The luminaires activate automatically according to working hours. So, with constant light management, the entire space is uniform, without contrasts, by balancing natural and artificial light.





Scheduling



#### 4 INDIVIDUAL AREAS OR OFFICES

Individual lighting control or by group for general switching on and off.





Channels

#### 5 AREAS WITH LITTLE CONTRIBUTION OF NATURAL LIGHT

Biodynamic effect lighting helps workers through their day by simulating the circadian cycle.



Circadian

#### INDIVIDUAL USER

Using a smartphone, lighting adapts to each user in areas of individual use.



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## ARCHITECTURE OF THE SCENA TECHNOLOGY SYSTEM













#### **GENERAL USER**

The active building features can be viewed rapidly from reception and their status known.



#### ADVANCED USER

The building maintenance manager has access to all the lighting circuits in the building and can create functionalities that integrate all the systems.



## CONTROL SYSTEM

#### **OPTIONAL**

Touch Light Manager Advance console





#### **CONSOLES**

Sense - DMX Keypad



Set consisting of: Scena bus coupler 8900150-039 and front Sense Keypad. External dimensions: 93 x 93 mm See simon.es/sense Touch Light Keypad

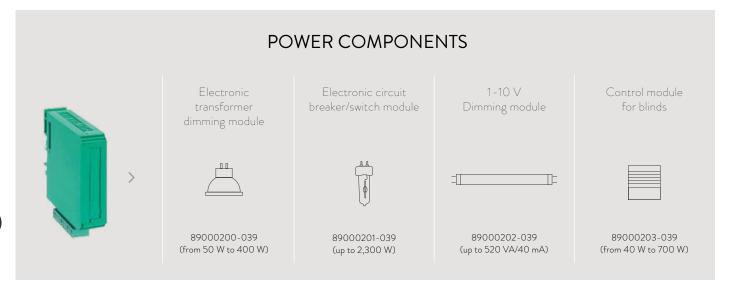


8900015\*-0\*\* External dimensions: 85×100 mm











#### LUMINAIRES DMX



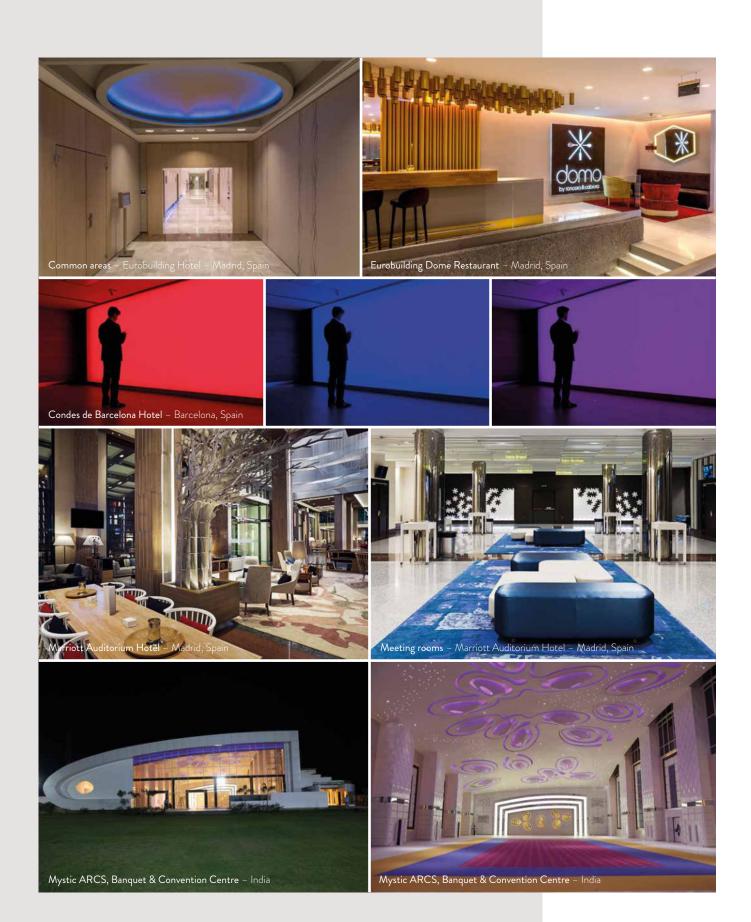


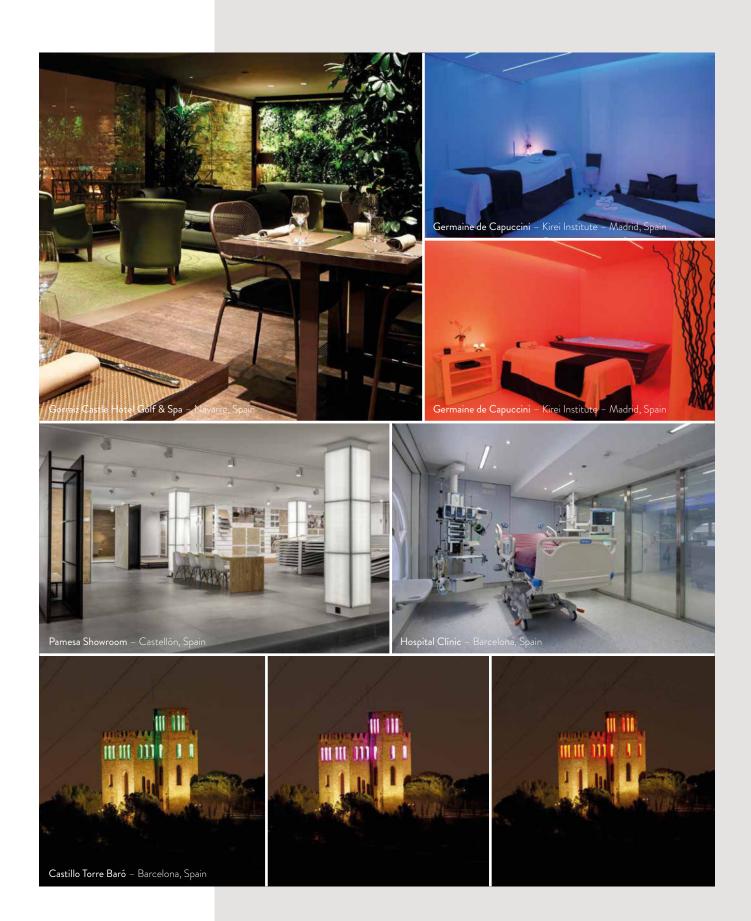






Scena suits the lighting to people's needs, adapting the necessary environments at each time and for each space.





#### LIGHT COLOUR COMES INTO PLAY

The ideal atmosphere for breakfast is not the same as during a meal or dinner. For this reason, by using lighting scenarios with different degrees of lighting, the space adapts to the needs of the day.

#### "BREAKFAST" SETTING

A high light level, together with effect lighting with dynamic colour hues will generate a pleasant sensation of activity in the restaurant.

#### "MEAL" SETTING

With a medium light level and a neutral lighting tone, the environment will be perceived as an open, homogeneous space, with ideal brightness for holding a good conversation.

#### "COCKTAIL" SETTING

After dinner, various moving scenes will awaken a sense of changing and dynamic space.





#### LIGHT, AN EXCEPTIONAL GUEST

In a hotel, each area needs different handling of lighting. For this reason, individual management of spaces allows you to control the lighting down to the smallest detail. Additionally, by using the Professional App, the most basic functionalities can be centralised.

#### MEETING ROOMS

Staying concentrated continually during a long convention or training session is difficult. So, adapting the space to training is seen as a visual rest, improving the capacity to pay attention and learn.

Presentation focused on the projection: a low light level aimed towards the projected presentation.

Presentation focused on the speaker: uniform lighting on the show area changes the perception of space, helping to hold the attention.

Presentation focused on highlighting the speaker and the item: by using accent lighting, attention is drawn to where it is needed. And diffuse coloured lighting gives more impressive presentations.

#### TRANSIT AREAS

Transit areas can act as transmitters of information, helping to locate spaces by means of companies' corporate colours.

#### OTHER APPLICATIONS

A bar or reception space can hint at stillness or movement through light.





#### CREATING PATHWAYS OF LIGHT

Each lighting point helps to create guides for attention and routes through a given space.

#### **AUDITORIUMS**

In an auditorium, the lighting scenarios enable both general and individual control of the lighting points in the various settings.

For example, a high light level for receiving attendees, softer lighting in the show or medium during interaction with the public.

In addition, the luminaries can be located and can be acted on rapidly and intuitively thanks to the Professional App through the filtering method. As such, on certain occasions, one or more lights can be activated to honour an attendee.

#### **MUSEUMS**

In museums, light recreates a path to follow by means of dynamic lighting, making it possible to light the works sequentially to help visitors cover the whole route.





## MAXIMUM UNIFORMITY, MINIMUM CONSUMPTION

People's activities directly influence the type of lighting that needs to be provided for a space, above all when there is excessive or no natural lighting.

#### CIRCADIAN CYCLE

Natural light regulates human beings' biorhythms depending on the time of day. The hormone cortisol is activated with the first rays of light in the morning to send sugar to the system and start activity, while at night melatonin is secreted to help induce sleep.

Simulating natural sunlight by means of biodynamic lighting allows you to continue with the natural activity of the body.

#### CONSTANT LIGHTING CONTROL

A large amount of natural light, added to the artificial lighting in the work space, can produce an excess of illumination. If you add the lighting from a screen and the contrast between a personal area and the environment to this excess, the eye is forced to work intensively, which can cause discomfort and headaches.

#### MEETING ROOMS

Light can be adapted to the space to give it the necessary flexibility: lighting for projection, for meetings, etc.

#### BUILDING

Time scheduling for a building adapts the lighting according to working hours, by deactivating or activating lights and lighting up the façade at night.

#### OTHER APPLICATIONS

Courtesy lighting in common areas, when no one is detected, avoids dark areas at the same time as making energy savings. In addition, the Professional App lets you view all the functionalities for each space and know their status.





#### LIGHTING, THE PERFECT SALES AGENT

In spring, summer, autumn and winter, light lets you create atmospheres which give style to the atmosphere and the products. And the most important bond between the product and the customer is the lighting.

#### PRODUCT DISPLAY

Making the products displayed on shelves draw the attention can be achieved by creating dynamic settings that highlight them sequentially, letting each of them take the leading role.

#### **OPEN AREA**

Neutral colour temperatures reproduce pure whites, metallic or bluish colours best; while warm colour temperatures favour orange, yellow or reddish colours. As such, biodynamic lighting will adapt its tone to appropriately reproduce the displayed products.

#### FITTING ROOMS

Appreciation of the colour of a garment, even of its shape, depends on the lighting in the space. Now, thanks to the use of a dynamic fitting room, office lighting, midday light, soft lighting or, for example, dynamic cocktail lighting can be simulated. In this way, customers will now be able to see garments under the lighting for the occasion they choose, so enhancing their shopping experience.

#### SHOP WINDOWS

Lighting scenarios can change the perception of a space; generating a fresh atmosphere in summer and warm in winter.

#### OTHER APPLICATIONS

The use of time scheduling lets you automatically activate lighting depending on opening and closing times, cleaning or replacement of products.





#### COLOUR AS MEDICAL THERAPY

Light as therapy is achieved by controlling the warmth and colour to enhance the patient's comfort and relaxation.

#### MEDICAL TESTING ROOMS

Medical tests often take a long time, leading to patient nervousness and discomfort.

For this, a tranquillising sensation is generated by using dynamic lighting and scenarios with moving colour hues. As such, colour takes the role of communicator between the patient and the doctor.

#### ROOMS

During recovery, patients can suffer sleep disorders that can prolong the process due to lack of rest.

To avoid this, reproducing sunlight by means of the circadian cycle feature improves well-being and helps achieve deep and long-lasting sleep fast.

#### WAITING ROOMS

Adjusting the brightness of a waiting room, by using soft lighting at night, transmits a sensation of silence and calm.

#### **LABORATORIES**

As well as appropriate lighting for performing tasks, dynamic perimeter lighting generates a dynamic environment that breaks away from the idea of a monotonous space.

#### OTHER APPLICATIONS

Soft lighting in transit areas during the night allows them to be used without causing discomfort to patients.





#### LIGHT AND COLOUR HAVE NO BOUNDARIES

The versatility of Scena makes it ideal for creating compositions outdoors and indoors, where these are prime settings for the creation of environments in retail, business and domestic contexts.

#### HISTORIC BUILDINGS

On a façade, decorative lighting acts to differentiate its architecture from the setting and to highlighting certain elements, making them more visible. Furthermore, dynamism can be used to accentuate one element or another depending on the day.

#### CORPORATE BUILDINGS

In the case of a company building, indirectly lighting with its corporate colour acts as a means of transmission, creating a brand image.

#### **CELEBRATIONS AND EVENTS:**

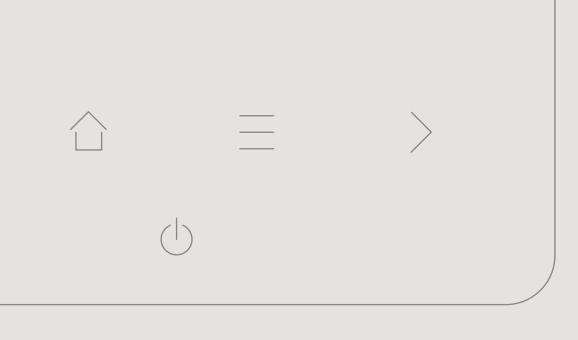
During theme days, events or celebrations important to a company, façade lighting can be in harmony with other historic buildings around the world.

#### OTHER APPLICATIONS

Lighting can be programmed for sequential activation in harmony with the natural rhythms of the sunset and sunrise.







### simon

## Lighting Control System



#### **TOUCH LIGHT MANAGER**



REFERENCE	DESCRIPTION	Power Supply
<b>89000110</b> 030 <b>038</b>	Touch Light Manager Advance Allows you to program and control all the system elements	100/230 V

Touch screen.

Includes flush-mount box.(ref. 89000990-039)



	REFERENCE	DESCRIPTION
	89000990-039	Flush-mount box
Recess dimensions: 172 x 124 x 42 mm, includes cover for pre-insta		Recess dimensions: 172 x 124 x 42 mm, includes cover for pre-installation

#### TOUCH LIGHT KEYPAD

Optional device for control from another point.

- Enables control of up to 8 functions that can be modified from Touch Light Manager



REFERENCE	DESCRIPTION
<b>89000150</b> 030 <b>038</b>	Touch Light Keypad
	Integrated IR receiver compatible with controller ref. 75350-69



REFERENCE	DESCRIPTION
<b>89000151</b> 030 <b>038</b>	8-Digit Touch Light Keypad
	Integrated IR receiver compatible with controller ref. 75350-69



REFERENCE	DESCRIPTION
<b>89000152</b> 030 <b>038</b>	Touch Light Keypad (4 channels + 4 scenarios)
	Integrated IR receiver compatible with controller ref. 75350-69

#### SENSE SCENA KEYPAD



REFERENCE DESCRIPTION

8900150-039

Scena bus coupling Sense application interface.

COMPATIBLE WITH



8000621-03\*

Sense Keypad 2B



Dims luminaires compatible with dimming by phase cutting.

8000641-03\*

Sense Keypad 4B



8000661-03\*

Sense Keypad 6B

ivot compatible v	vitii Sense Keypa	n ip and 2nde	e control versions
* Consult the Sens	e section, page 3	18, for further	information.

#### **POWER MODULES**

Incandescent/ halogen 230 V	Electronic transformer halogen lamps	Fluorescent	Low consumption / LED	1-10 V bus
<u>.</u>	<b>I</b> ⊗		<b>©</b>	(1:10V):
Blinds	Motor	DALI	PWM RGB	Single-channel PWM
	M	>\$	><;	>\$

#### Designed for universal control of all types of luminaires



REFERENCE DESCRIPTION Power Supply 230 V ac 50-400 W/VA 89000200-039 50-400 W/VA Electronic transformer dimming module





REFERENCE	DESCRIPTION	Power Supply Power and type		pe of load			
89000201-039	Electronic circuit breaker/switch module	230 V ac	2300 W	550 VA	520 VA	200 W	3 A
	On and off operation (ON/OFF)		<b>.</b>	$\mathbb{Z}$	<u></u>	<b>©</b> :	M



REFERENCE DESCRIPTION Power and type of load Power Supply 89000202-039 1-10 V Dimming module 230 V ac 40 mA / 520 VA Dims luminaires with 1-10 V analogue input.



=(1-10V)=



REFERENCE DESCRIPTION Power Supply Power and type of load 89000203-039 Control module for blinds 230 V ac 40 - 700 W Controls blind operation

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#### SIGNAL CONVERTERS

 $Modules \ for \ transforming \ a \ digital \ or \ analogue \ signal \ to \ DMX \ for \ subsequent \ programming \ using \ Touch \ Light \ Manager$ 



REFERENCE	DESCRIPTION
89000301-039	Digital signal converter
	Enables linking of pushbuttons, detectors, etc.
	2 independent digital inputs.



REFERENCE		DESCRIPTION
	89000302-039	Analogue signal converter Enables linking of light level, temperature, etc. detectors With 1-10 V signal. 2 independent 0-10 V analogue inputs.

#### PROTOCOL CONVERTERS

Modules capable of controlling luminaires with DALI and PWM protocols



REFERENCE	DESCRIPTION	Measurements	Protocol	
89000500-039	DMX/DALI converter Enables control of 64 DALI luminaires Automatic addressing from Touch Light Manager.	108x75x61 mm	DALI	



REFERENCE	DESCRIPTION	Protocol
89000303-039	DMX/PWM RGB converter	PWM RGB
	Lets you control RGB luminaires (3 A per channel), e.g. LedFlex RGB.	⇉



	REFERENCE	DESCRIPTION	Protocol
,	89000304-039	Single-channel DMX/PWM converter	Single-channel
		Lets you control monochrome luminaires (10 A per channel), such as LedFlex High Flux	PWM
		With pushbutton input for direct dimming	>\\$

#### **POWER SUPPLY**



REFERENCE	DESCRIPTION
8999901-039	12 V 2 A power supply
	For DIN rail
	Ideal for installations with more than 16 modules



SIMON Malaysia Web.www.simon.com.my

