



LIGHTCARE®
The second best light on earth



LIGHTCARE®

**SENSORY-, STIMULI- AND SNOEZEL ROOM
WITH THERAPY LIGHT**

NON- PHARMACOLOGICAL STIMULI

BASED ON EVIDENCE-BASED CONTENT, EASE OF USE AND SIMPLICITY

SENSORY-, STIMULI- AND SNOEZEL ROOM WITH THERAPY LIGHT

NON-PHARMACOLOGICAL STIMULI

In LIGHTCARE we are inspired by the effects the sun and the darkness can have on people's health. We know that a combination of LED lighting technology and researcher validated light waves can boost and block our hormone production of stress-, happiness-, sleep hormones cortisol, serotonin and melatonin. LIGHTCARE has worked determined to make the entire sensory room's advanced equipment simple and intuitive to use. By innovation and user involvement we have focused on optimizing the safety of the residents and patients by using non-pharmacological stimuli. We offer a solution which includes audio-visual stimuli, which has been tested and approved in the South Denmark Region, the Mid Region and the Capital Region based on over 30 installations. The themes are based on evidence-based contents, ease of use and simplicity.

Sensory room – or snoezelen – which is the original Dutch expression – is defined as a multisensory environment, where people with sensory difficulties can get controlled and individually adapted sensory input.

The purpose with the snoezel room is to create an alternative to extra medication for residents with dementia, who e.g. are apathetic or – at the other end of the scale – overstimulated. Research shows that targeted influence on senses increases a person with dementia's well-being and functioning capabilities.

**LIGHTCARE Snoezel affects 4 out of 5 senses:
Sight, Smell, hearing and touch.**

When the care staff thinks a resident needs time in the room, they prepare the stimuli that will help the subject. If it is about e.g. a resident with apathy, it's possible via a user-friendly touch panel to turn on surging bubblers or a "living" sky with all the color-combinations of the rainbow, natural sounds or smells.

If the resident has a tendency for depression it's possible to show e.g. pictures of a delightful flower field, lively chirping and smells or everyday pictures that he or she might only remember fragments of. A trip to the beach in burning sun-

light and heat from radiant heat is pure therapy and with evidence its effect against winter depression.

The room can be furnished with nice materials and objects you can touch to stimulate the sense of touch.

It is important that the care staff knows every single user of the stimuli room so they receive the correct form of stimuli. Therefore, we offer the staff a course in the concept so they can use the room professionally and correctly. Our goal is that everyone becomes enthusiasts for the snoezeltherapy.

There must be created a positive and safe atmosphere in the room for the demented so that we can create a basis for a closer relationship to the staff so they can more easily get permission to e.g. help the demented with personal hygiene or other things that might have caused frustrations before.

Relatives will also be able to be in the room with their family member in the Snoezelroom. This opens a whole new way to be together – without disturbances and with impressions you can experience together on the terms of the demented.



COMFORT CREATING THEMES

CREATE YOUR OWN UNIVERSE OF CALM AND COMFORT

COMFORT CREATION THEMES FOR SENSORY ROOM

The themes are developed based on experience from studies and research through a many-year period, with the goal to create a safe environment and thereby calm the patients who are under stress. Important parameters are documented for achieving a calm through sight and hearing.

MUSIC AND NATURAL MOODS

The audio-visual themes contain calming extrasensory moods from nature paired with specially-composed calming music and present sound universe which studies has shown has an optimal calming effect on patients who are hospitalized and institutionalized.

OWN UNIVERSE

The audio-visual themes move in its own universe of calm and safety, where music, nature sounds and beautiful landscapes diverts the attention from stress.

WHY NATURE?

It is well documented through researched that nature has a positive effect on our well-being. The wild nature affects us positively since we have been a part of it for thousands of years. It is the human created environments that contributes to increased stress.

WHY DOES IT WORK?

We have adapted the light intensity, theme and sound so that it calms and creates perception for the person, that compensates for reactions from events, environmental impacts or situations that challenge and overstepped what the person could handle or which threatens the person's well-being.

A prerequisite for achieving good results are simple controls which makes sure that the staffing feels comfortable. Therefore we always focus on the actual user situation and organize in cooperation with the staff to get the most appropriate installation in relation to equipment and operation.

The effect of the themes has shown positive results in patients/ residents and staffing in these ways:

- Positive pain distraction, placebo
- Increased safety
- Calming down troubled patients and residents
- Staff feels more secure about the treatment

” A way to reduce stress reactions is by stimulating the senses with relaxing audio-visual programs with nature scenarios accompanied by nature sounds and calming music.” *Quote by dr.med. and Professor Lars Heslet, Sansernes Hospital.*



SENSORY- AND THERAPY ROOM WITH LIGHT BOOST

LIGHT THERAPY

Light plays an essential role in a sensory room. Light therapy resets our inner clock/ circadian rhythm. Messing up our circadian rhythm can lead to many different illnesses/ diseases e.g. winter depression (SAD). Therapy lights can boost our natural circadian rhythm and thus the production of different hormones. We can thereby correct certain imbalances in our hormone system without the use of medicine. In addition to regulating our circadian rhythm, therapy lights also gives us more energy.

Therapy lights makes the serotonin, 'happiness hormone', levels rise. In fact, the light makes special type of cells in the eye report to the brain that it should produce more serotonin. Serotonin is of great importance to a large number physiological functions in both the central nervous system and in the peripheral nervous system; e.g. sleep, mood, memory and libido. In addition, serotonin plays a role in psychiatric disorders such as anxiety and depression.

LIGHT THERAPY:

- Stabilizes the circadian rhythm
- Gives more energy
- Makes levels of serotonin in the brain rise
- Absence of blue light affects melatonin levels
- Pain relieving effects

WINTER DEPRESSION

Winter Depression, Seasonal Affective Disorder (SAD) is caused mainly due to lack of light. Through music, pictures,

scent and light therapy, we "travel" to a sunny place. There is evidence that 15-20 minutes of light therapy, where we booster the production of serotonin, is optimal for effective help against SAD symptoms. »You get a winter depression (SAD) because you don't get enough light. Light affects the levels of the substance serotonin in the brain, and it is the lack of the substance that often plays a crucial role when you get depressed« says the chief Physician and Ph.D. Klaus Martiny, Psychiatric Center Copenhagen.«

»The immediate difference between common depression and winter depression is, of course, winter depression is season dependent. In addition, some people with winter depression experience atypical symptoms in relation to what depressed people generally experience. People with winter depression become more irritable, sleep more, have a larger apatite and accordingly too often gains weight. This is not what happens with people who have regular depression- on the contrary «

Although we all have a smaller stock of serotonin at winter, some become more affected than others – which is due to the coding of our genes. Through experience we know that light therapy works best for winter depression. But it's also used for regular / non-seasonal depression – both alone and in interaction with medicine.

ENHANCES THE EFFECTS OF MEDICINE

Light therapy may be preferable to antidepressants in the treatment of SAD because it is a relatively safe and easy treatment. However, light therapy can also be given in with the antidepressant patient takes to increase the effect.

PRELIMINARY OBSERVATIONS

*Based on questionnaires and interviews, the following are indicated from psychiatric hospitals *:*

- Residents find more peace of mind when they get to the sensory room
- Increased interaction between citizen / patient and staff
- Several staff groups can use the emergency room
- The patient / citizen obtains natural sleep in the sensory room
- Decreased levels of conflict
- Reduction of coercion (physical isolation)
- Transcends linguistic and cultural barriers
- A new way of communicating with the patient / citizen on

** Opinions from: Sankt Hans, Egely, PC Amager, PC Svendborg, PC Aabenraa, PC Middelfart and Pilekrogen*

There is an ongoing research project at OUH, and a further one is planned.



CHOISE OF EQUIPMENT

WE HELP YOU FIND THE OPTIMAL SOLUTION

A complete solution with picture, sound, scent and the right light, gives the optimal conditions for dreaming yourself away to any destination. What do you say to getting warmed up on a relaxing sunny walk on the beach, a cozy fishing trip or a walk in the woods - with all the right sounds and scents. It is now possible with the right equipment.

CHOICE OF EQUIPMENT

Important considerations about the structure of the room, light intensity, interior design, simple and safe operation of light fixtures, scents, projector vs. flat screen etc. must be done to find the optimal solution for the sake of desired effect and economy.

PROJECTOR VS. FLATSCREEN

A quiet LED projector serving as a 100" big screen that gives the user the feeling of being part of the image. The image is supplied by a high-contrast laser projector, which is mounted above or below a unique 100" screen that includes a special micro-optical technology that delivers a bright and good quality image. This is at a significantly lower price than a corresponding LCD flat panel display. It is also more preferable than a flat screen because of a softer image that protects the eyes and is more durable and won't break in the possible event of aggressive behavior.

SOUND

The sound experience is incredibly important and is always organized, setup and selected individually in respect to the rooms use and themes.

SCENT

The scent machines diffusion system guarantees a constant level of scent throughout the scenario. Scents can be switched on or off for the different themes

100 " screen
- The bigger the screen is the better,
in order to maintain the feeling of being
a part of what is shown

AUDIO-VISUAL THEMES

Six themes have been installed from LIGHTCARE and furthermore three audiovisual themes from other suppliers.

WE RECOMMEND ONLY ONE SOFTWARE SYSTEM

We recommend only one control panel/software system to adjust light, sound, scent, and power on/off the projector/monitor and to service ALL hardware in the room. This ensures easy operation. Complex systems and various switches/Remote controls are the most common reason for equipment not being used.

THE GOOD RESULTS

We always want the optimal effect and a good user experience. Therefore, it is important that the room can shut out strong daylight and contains good equipment that is easy to operate. The effects of the themes will be if these conditions are not prioritized.

We consult in sound and light shielding, choice of equipment, assembly and teaching staff.

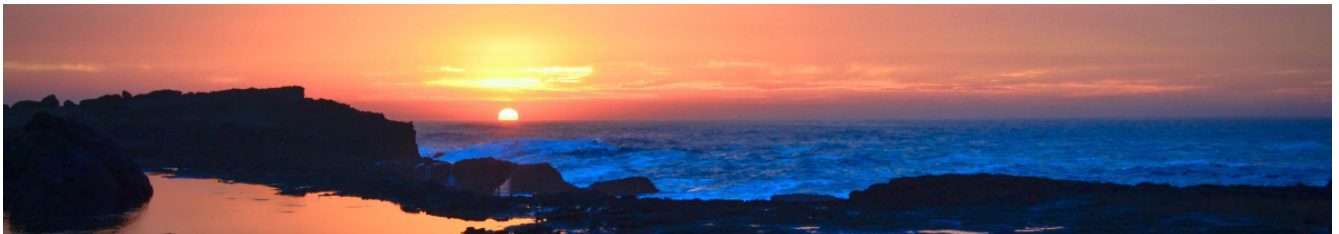
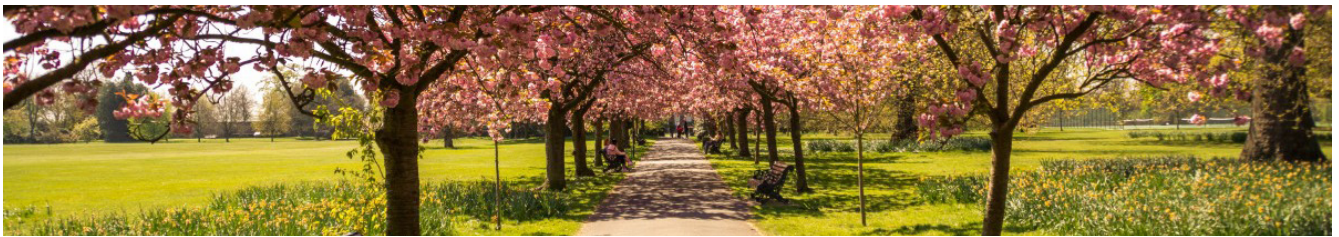
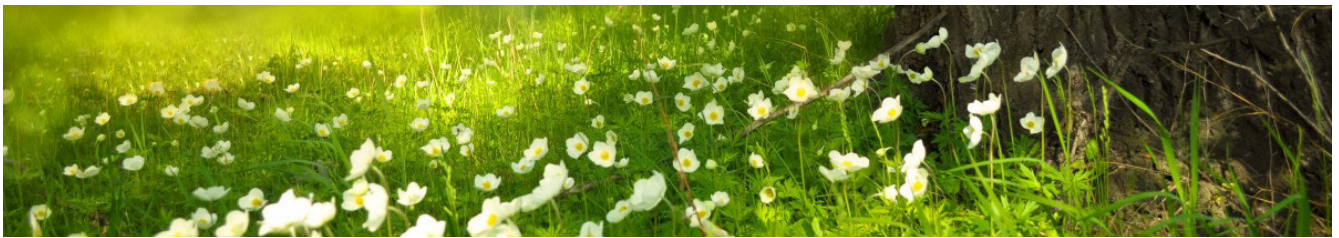


AUDIOVISUAL THEMES

COMPOSED FROM FIVE PARAMATERS

The audiovisual themes play a central role in the sensory space and is developed based on many years of research, studies and implementation. The themes contain movies from nature, which is composed of parameters that are

calming in a wide user group. The audiovisual themes are produced by an international award-winning photographer in close dialogue with patients and hospital staff.



THEMES COMPOSED FROM FIVE PARAMATERS

- No troublesome or three-dimensional movements
- No dark or gloomy moods
- Quiet transitions between light, images, sound, music and possibly scent
- Music and sound are specially composed and is customized to fit the images
- The pictures contain the visual composition, that emanates calm and gives peace of mind

OPTIMISM

Here the sun always shines - 60 minutes.

Nature wakes up slowly and the light intensity rises, the breeze moves the fresh spring green leaves, which expresses life and optimism. The music is optimistic and carries us through this lovely day.

CALMING

Nature speaks its own language only accompanied by its own sounds - 120 minutes.

The waves blow softly into the coast, here is warmth and freshness. Clouds that drift gives life together with the bird soft chirping.

RELAXATION FOR FALLING ASLEEP

Here the focus is on sleep and falling asleep - 60 minutes.

First, troubled thoughts are diverted from the mind and calming thoughts replace them through music and pictures. Slowly we decrease the pace and light intensity in a trip through the midsummer night. We avoid the blue and strong light in order to not affect melatonin production.

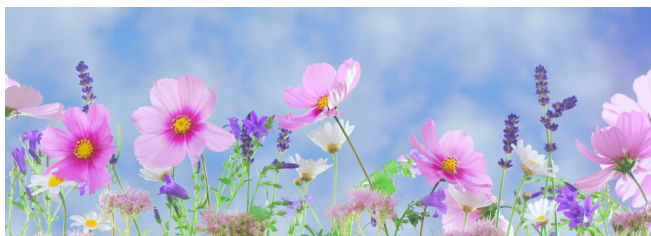
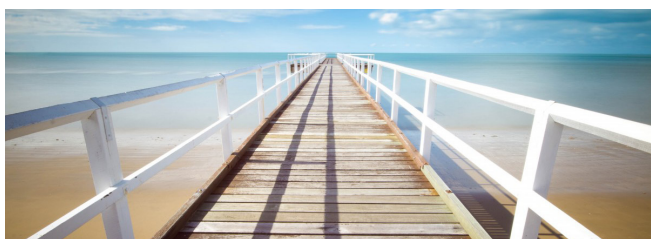
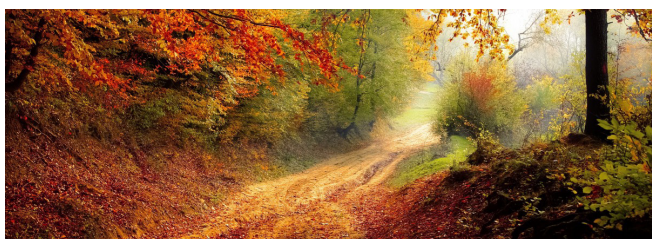


FRAGRANCE MACHINE

MORE OPPORTUNITIES FOR STIMULATING THE SENSES

We also use a smart scent machine designed to improve your well-being. The scent machine helps with creating a unique atmosphere right away. It gives life to imagination and can create a unique scent for any mood. Immediately! There are 20 scents that can be mixed and combined by

request. The right scent can affect our mood instantly. Dream yourself of to a lavender or flowery field, a walk on the beach, the sea with a fresh breeze or an exotic citrus plantation. The machine controls and mixes 4 scents that allow up to 20 scent combinations.



YOU CAN CHOOSE BETWEEN 20 DIFFERENT SCENTS:

- | | |
|---------------------|---------------------|
| ■ Neroli Citrus | ■ Midnight Thrill |
| ■ Divine Rose | ■ Jasmin Sambac |
| ■ Grandma Vanilla | ■ Wood Royale |
| ■ Sandalwood Mahara | ■ Lavender |
| ■ Sea Breeze | ■ Floral Magic |
| ■ Monoi De Tahiti | ■ Citrus Fresh |
| ■ Sweet Sand | ■ Spice Bouquet |
| ■ Amber Marine | ■ Eucalyptus Nights |
| ■ Orange Sunrise | ■ Shamans Potion |
| ■ Precious Spices | ■ Incense Voodoo |

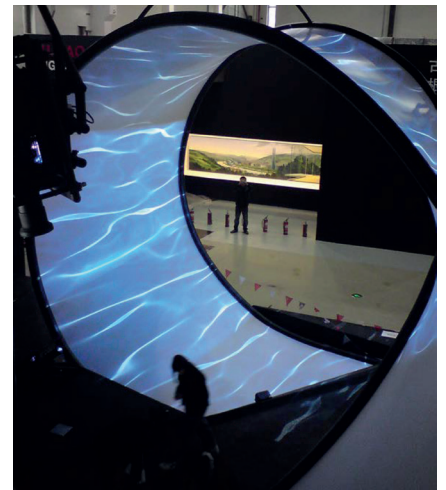
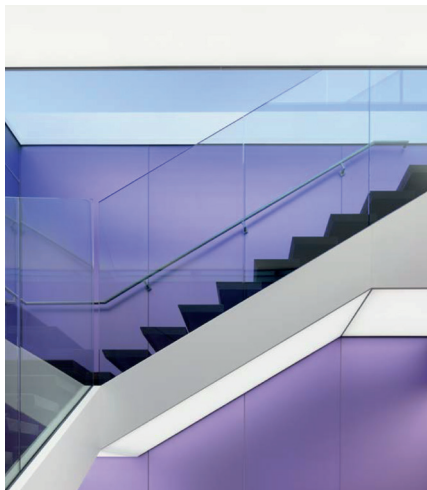
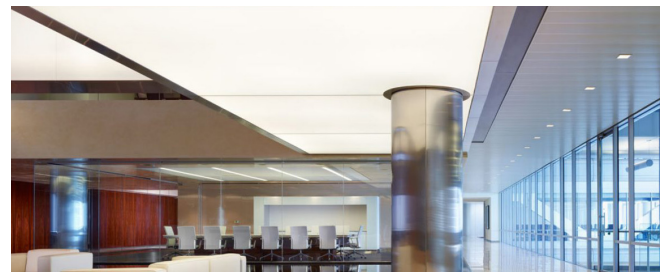
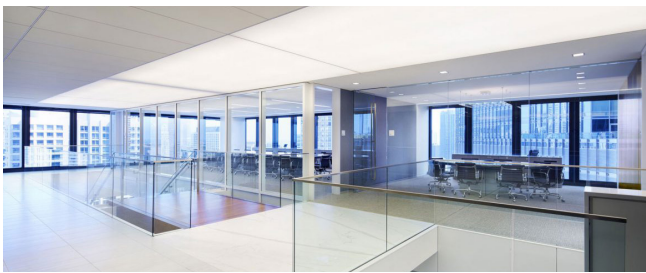


NO ASSIGNMENT TO LARGE

THERE ARE NO LIMITATIONS ON HOW LARGE THE LIGHTSOURCE CAN BE

STRETCH CEILING. There is also the possibility of stretch ceilings/walls. For example, let the entire room be illuminated by one large ceiling lamp/screen – which at the same time gives the citizen boost-ing light therapy. It is now possible to convert the entire ceiling into a great light-emitting, boost-ing source with stretch ceilings in textile and PVC. The ideal

system which can supply both stretch ceilings and stretching walls – which makes it possible to play with different light effects. Stretch Ceilings/walls allow you to play with the lighting – Everything is possible – and only your imagination sets the limits for your design. Below some of the supplier's existing solutions are shown for inspiration:



Due to the flexibility of the membranes, the system is ideal for easily creating curves, shapes and three-dimensional ceilings, walls and floating elements. The membranes are made from flexible PVC-material and is customly made to fit every need.

The transparent membranes – in different colors and transparencies – are intended to be backlit by any light source you want. By combining two membranes and the use of different light sources allows for unlimited lighting solutions.



OPERATED BY LIGHTCARE OS | UNIQUE USER FRIENDLY TOUCH SYSTEM | MULTIPLE PLATFORMS AND DEVICES

UNIQUE USER-FRIENDLY TOUCHPANEL

CONTROL PANEL AND SOFTWARE ARE THE HEART OF THE SYSTEM

Module-based simplicity makes it easy for users to operate the system. The ease of use on the touch panel ensures that playback can take place easily and comprehensively for the individual user. A single press will play the encoded audio-visual themes with associated light, sound and scent. As a baseline it will only be possible to play the encoded audio-visual themes with associated light, sound and scent. The entire content package with the soothing themes can be purchased as a TV package for the entire care center – also for the individual homes.

EASILY AVAILABLE MAINTENANCE

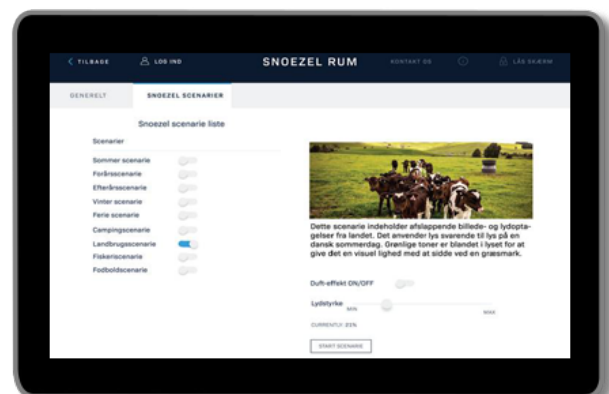
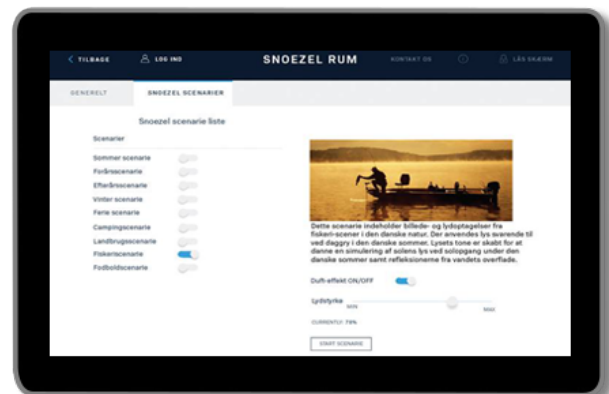
Technicians and electricians can gain further access to the system, service and maintenance through our technical interface.

FUTUREPROOF

We focus heavily on creating as future-proof a system as possible. The system is adapted to continuous input from users, research, experience from previous projects, specific needs in individual situations as well as the residents or patient's condition, mental and physical abilities. The most basic settings can always be adjusted by the technical department or the staff and can be adapted to the individual resident, patient or department.

TRAINING AND USER INVOLVEMENT

When we deliver our circadian lighting we always go through a thorough instruction with the staff and users in how to use the control panel. We will also happily have a dialogue around special wishes and features that are relevant to your custom full-dynamic lighting system.



User-friendly interface for both staff and technicians ▲



COMMISSIONING DEAL

WE PROVIDE A QUALITY ORIENTED PROCESS WHICH VERIFIES, DOCUMENTS AND TESTS THAT THE ROOM MEETS THE SPECIFIED REQUIREMENTS

At LIGHTCARE we will provide the entire package, if desired. In addition to dialogue and counseling, design, installation, delivery, implementation, teaching and service and follow-up – we will make sure you get what you want; e.g. the life-giving lighting, stretch ceiling, water bed, bubble tube, scent machine, surround speakers, comfortable armchairs, video and audio files etc. The desired scenario is started via a single touch of the touch panel.

DIALOGUE & ADVICE

• • • • • Dialogue and counseling could be:

Advice on the optimal environment, zone division and user-friendly operation. Specially adapted for residents and staff. Preparing requirement specific needs for the optimal room.

PLANNING

LIGHTCARE OS, with a general tab and a theme overview incl. all hardware and software as well as a turnkey commissioning process with commissioning of all hardware and teaching staff. Delivery of 9 themes, incl. one paid user license. Operational interface via user-friendly 21" touch control panel.

INSTALLATION

100" laser panel with micro-optical technology for optimal picture quality.

DELIVERY

Stereo or surround sound speaker set consisting of 4 speakers, amplifier and subwoofer.

Scent system, with the possibility of up to 20 custom scents.

IMPLEMENTATION

CARE COMMPLETE Package: Therapy Light, Optimism Light, Soothing Light and Relaxation Light. Fully automatic multicolored RGB + CW + WW LED luminaire panels makes up for the whole light installation that lies behind a specially designed artificial sky.

EDUCATION

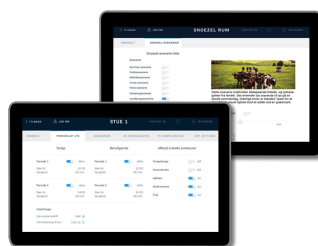
Bubble columns RGB with stimulating aquarium artificial fish.

SERVICE & FOLLOW-UP

Free standing water bed: 160 cm (5.2 feet) wide and 200 cm (6.6 feet) tall, with a high dampened water mattress, safety cloth, heated to 20-36 °C (68-97°F).

The CHAIR range includes some amazing and nice armchairs adapted to the target audiences wishes and needs. With up to 4 different types of shiatsu massage functions, which helps to provide physical well-being.

Beach Theme with radiant heat, umbrella, shelter, artificial sand and a dream island is another opportunity.



OPERATED BY LIGHTCARE OS | UNIQUE USER FRIENDLY TOUCH SYSTEM | MULTIPLE PLATFORMS AND DEVICES

OWN OR RENT

**LIGHTCARE CAPITAL ALWAYS GIVES YOU
THE NEWEST SOLUTION AT A LOW
MONTHLY PAYMENT**

Now you can rent our products incl. installation and assembly costs for up to 5 years.

LIGHTCARE A/S has helped companies, the elderly and health sector. With the right lighting solutions since the turn of the millennium, so we are well aware of the challenges, that can come with the invention of advanced new technology, that sometimes pose as a problem in the form of lack

of liquidity and timely budgeting.

That is why we offer our customers a transparent and hassle-free rental agreement, that makes it possible to acquire an excellent and future-proof lighting solution already today.

The technological development keeps going on strongly, and in 5 years you can choose to switch to new equipment. We provide a 100%

guarantee in the rental period, and the rental agreement includes an operating and maintenance agreement. You decide how you want to pay for LIGHTCARE's products. You can choose to buy and / or rent all or part of the plant and how the distribution of construction, operating, innovation or mutual funds shall be distributed, it is 100% up to you.

INVESTING IN A LIGHT THAT PREVENTS IS COMMON SENSE

Lighting technology improves health, well-being, work and CO2 environments. Reduction of drug consumption, admission time and sick days for the citizen and staff, are all indicators of great human and socio-economic savings by light that prevents.

**0,- INTEREST
FEE
PAYMENT**

First-time performance	0, -
Annual Costs Percentage	0%
Duration	60 months.
Maximum operating time	24/7/365

Price example:

Offer price 119,940 DKK

Get 60 months of funding at no extra cost from 1,999 DKK - per. month.

The price example is incl. electrical installation costs assembly, design costs, user dialog, education, operating and maintenance agreement excl. VAT.

The rental agreement starts at an offer price at DKK 10,000 excl. VAT per

rental period, and there is basically no upper limit.

The rental agreement is a maximum of five years at a time. The lease agreement can then be extended, terminated – or the installation can be bought. There is of course also

possibility of entering into a new lease agreement, where the installations products are replaced with latest product range, or you can continue with the same equipment at a significantly reduced rent.



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