FōS

lighting

Care & Health

foslighting.com.au

FOS Lighting

THE FOS EXPERIENCE

FOS Lighting has an experienced engineering and design team who understand the architectural landscape of the lighting sector and its clients, while a dedicated manufacturing team brings cutting edge solutions to market. With quality and experience, FOS Lighting manufactures and distributes a complete selection of quality luminaires and lighting control systems to the following sectors:

- Office & Communication
- Science & Education
- Art & Culture
- Industry & Engineering
- Transport & Environment
- Adverse & Custodial
- Living & Lifestyle
- Retail & Presentation
- Care & Health
- Leisure & Entertainment
- Sports & Recreation
- Experience & Advertising
- Urban & Architecture
- Wellness & Hospitality

THE FOS WAY

FOS Lighting is a solutions driven, innovative lighting and controls business using in-house experience and engineering coupled with manufacturing facilities in Australia. Working closely with key account customers, its project lighting solutions business is based on innovative lighting concepts using leading edge technology to generate new levels of impact in both design and function.

FOS Lighting is highly regarded in the market for its knowledge of the lighting industry, this is made possible with its committed, highly talented and motivated team members, that continuously strive to provide the highest quality of product and service in the Australian and New Zealand market.
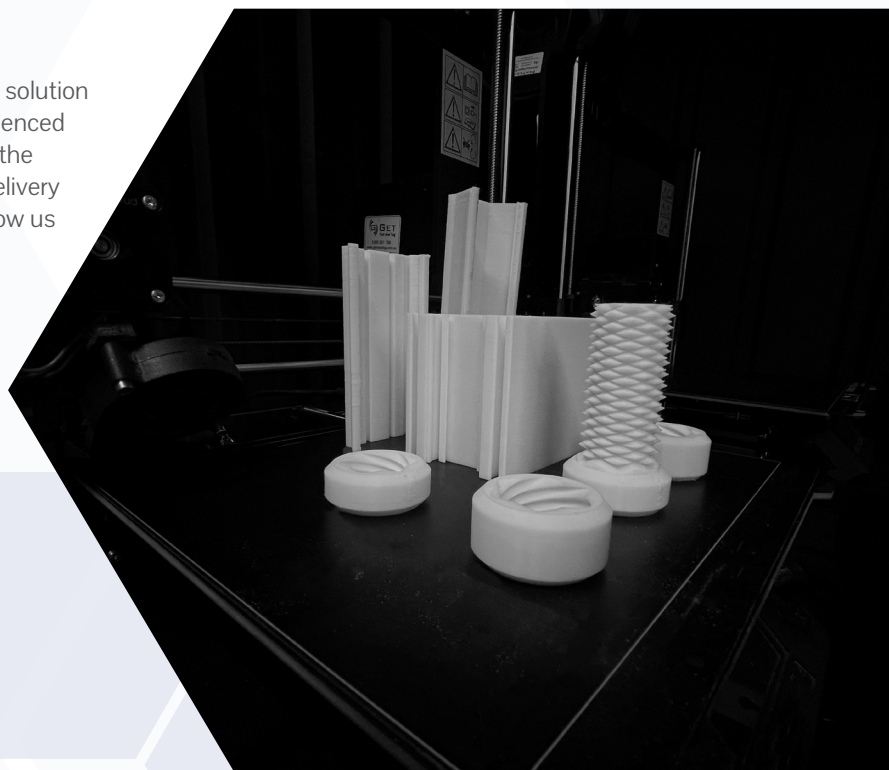
FOS QUALITY

FOS Lighting is a proud manufacturer and exclusive distributor of cutting-edge luminaires within Australia and New Zealand. With our integrated distribution and manufacturing facilities in Melbourne and Brisbane, we can provide a lighting solution from concept to delivery. FOS Lighting is known for its outstanding workmanship, quality, and getting the job done - its International ISO 9001:2015 accreditation is testament to this.

FOS - WE DELIVER

FOS Lighting is dedicated to achieving the desired lighting solution for all lighting requirements. The combination of our experienced research and development teams leveraging the power of the latest technology in 3D modeling programs, and reliable delivery of materials from our trusted and dependable suppliers allow us to meet client expectations and deliver on time.

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The Healthcare sector comprises of hospitals, clinics, dental practices, aged care, mental health and other wellbeing institutions. In these essential facilities lighting has proven to have a significant impact on the health of not only patients, but staff & visitors as well. In addition, it can affect patient recovery and the performance of staff. This is why well designed, application-specific, luminaires get the best results. FOS Lighting achieve this by combining the latest technology with intelligent design, providing a unique, effective & efficient solution that enhances performance, recovery, and overall health.

Recovery

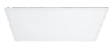| VEKTA	FREND LIGHTING	FREND LIGHTING	ECOPOINT
V170110	OSIK	FWU/15/LED	Step/Night Light

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Cyanosis

What is Cyanosis?

Cyanosis is the discolouration of the skin and mucous membrane caused by the decrease in saturation of oxygenated blood to 85% or lower.

Types of Cyanosis

There are two variants of cyanosis: Peripheral Cyanosis and Central Cyanosis. Peripheral Cyanosis is when non oxygen-rich blood flows through the body to the outer extremities and is commonly seen on the fingertips and toes. Central Cyanosis is when poorly oxygenated blood is in the lungs, affecting the body's internal organs. The blue and purple discoloration is often presented on the lips and/or tongue. Though both are caused by low oxygenated blood, Peripheral Cyanosis is not life threatening where Central Cyanosis can be. It maybe the sign of multiple life threatening conditions, making it crucial to be detected and attended to early.

What is COI

The Cyanosis Observation Index (COI) is a measure of a light source's ability to aid the detection of cyanosis in a patient. Australia and New Zealand introduced the 'Cyanosis' standard 1680.2.5 which sets out lighting recommendations within hospitals and medical facilities, specific to tasks associated with clinical observation, treatment and care. Light sources with a COI of 3.3 or less are deemed to provide a light quality that procures visual conditions appropriate to the detection of Cyanosis.

How lighting plays a role

With Cyanosis, the blue and purple discolouration of skin is the key identifier and is noticed during clinical observations. Lighting plays an important role in assisting medical practitioners to accurately identify Cyanosis. For example, if a light has a lower CCT such as 2700K, Cyanosis may be missed as it renders skin a warmer colour than what it is, while a higher CCT may highlight the skin blue when no cyanosis is present.

Only Cyanosis compliant luminaires can be used in Clinical Observation Areas and the below criteria must be met to achieve this compliance:

|	
Comply with AS/NZS 1680.2.5:2018 standards	Australian and New Zealand Standards
COI Index <3.3	A numerical scale ranking the suitability of a light source for the purpose of visual detection of the presence or onset of Cyanosis.
Correlated Colour Temperature (CCT) between 3300K-5300K	A range within which the colour characteristics of a light source are deemed suitable for the purpose of visual detection of Cyanosis.
A Colour Rendering Index of >80	Evaluates the colour rendition and colour accuracy of objects. The higher the CRI, the more natural the colour appears.

TM 30 results
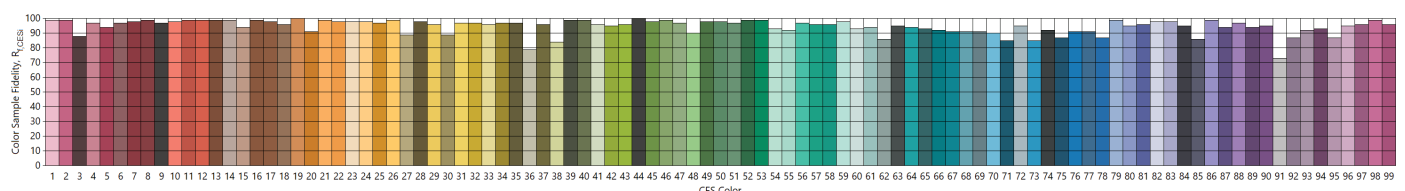
Coloured LED Solutions

Colour Rendering Index (CRI)

One of the most common measuring and scoring scales for lighting is the Colour Rendering Index (CRI), which measures and compares the reflection of light to a natural source. Lights can be given a score between 0 and 100, with 100 being the best, rendering an object the same as natural light. When choosing a light for a hospital it is best to have a luminaire with a higher CRI value.

The Issue

Most endoscopic surgeons around the world function in relative darkness. Endoscopic procedures entail inserting tubes in the body where surgeons and other professionals manipulate those tubes from outside the body. They see what they are doing on the inside by looking at video monitors displaying images sent by tiny cameras mounted on the tubes.

To make the computer screens easier to view in these minimally invasive procedures, hospitals typically turn the lighting down in endoscopic procedure rooms, unlike the bright white light associated with open body surgery. The low light levels can induce drowsiness - not a desirable attribute for the task at hand. It can also make instruments hard to find. Even the smallest amount of typical room lighting that is used can cause glare and reflection on the video display.

The Solution

Luminaires emitting different colours and levels in various areas of an operating or examination room, improves visibility, increases staff wakefulness, reduces stress, and calms nerves for doctors, nurses, clinicians, and patients alike.

During an endoscopic procedure, green light from behind the screen reduces reflection and enhances the depth and contrast on the monitor, as well as help to dilate the surgeon's pupils. Red light from behind the surgeon cuts down on screen glare. White light should be used in areas of the room where anaesthetists work and where nurses need to find equipment. While green, red, and white light are common, they are not the only ones and sometimes other colours are optimal. Mixing yellow with red helps staff spot blood vessels when inserting intravenous tubes. Violet behind-screen lighting provides a clearer view of X-ray and ultrasound screens, which are displayed in shades of grey, as opposed to green light which makes it harder to see.

Circadian Rhythm

What is Circadian Rhythm?

Circadian rhythms are physical, mental, and behavioural changes that follow a 24-hour cycle. These natural processes respond primarily to light and dark and affect most living things, including animals, plants, and microbes. A master clock in the brain coordinates all the biological clocks in a living thing, keeping the clocks in sync. This master clock is a group of about 20,000 nerve cells (neurons), forming the suprachiasmatic nucleus structure, or SCN which is in a part of the brain which receives direct input from the eyes. An example of light-related circadian rhythm is sleeping at night and being awake during the day. Circadian rhythms can influence important functions in our bodies, such as:

- Hormone release
- Body temperature
- Eating habits and digestion

However, most people notice the effect of disrupted circadian rhythms in their sleep patterns. The SCN controls the production of melatonin, a hormone that makes you sleepy. It receives information about incoming light from the optic nerves, which relay information from the eyes to the brain. When there is less light, for example at night, the SCN signals the brain to produce more melatonin to induce drowsiness.

Changes in our body and environmental factors can cause our circadian rhythms and the natural light-dark cycle to be out of sync. For example:

- Jet lag or shift work causes changes in the light-dark cycle.

- Light from electronic devices at night can confuse our biological clocks.

These changes can cause sleep disorders, and may lead to other chronic health conditions, such as obesity, diabetes, depression, bipolar disorder, and seasonal affective disorder .

Circadian Lighting

Circadian lighting refers to lighting that is designed to have a biological impact on the human circadian system. It is a term that has gained popularity in recent years – you may have also heard it referred to as 'human-centric lighting' or 'tuneable lighting'. Colour tuning or tuneable lighting is NOT necessarily circadian lighting. Colour tuning or tuneable white lighting refers to a specific kind of LED technology where the hue of white light can be changed to appear warmer (more yellow) or cooler (bluer) over a period. These dynamic lighting systems offer environmental ambience and may have other psychological benefits, but they fail to target how our bodies respond to light biologically. True and effective circadian lighting includes a specific part of the light spectrum (490nm), that helps regulate our circadian rhythms – this sky-blue signal is not found in traditional LEDs. This important part of the light spectrum sends the strongest circadian signal to our brains which ultimately provide benefits that could help reduce chronic health conditions related to our perpetual "indoor lifestyle" by improving mood, sleep, and overall sense of well-being.

Why is Circadian Lighting important?

Light impacts human health and performance by controlling the body's circadian system, affecting mood and perception, and by enabling critical chemical reactions in the body.

A healthy circadian rhythm is associated with improved long-term health, promoting better sleep at night, allowing our brains to repair our bodies as well as our minds.

Circadian Lighting can have a significant impact on the outcomes in healthcare settings by lessening agitation among dementia patients, reducing patient depression, easing pain, improving sleep and circadian rhythms, thus, supports the healing process which reduces the length of stay in hospitals. It can also improve the adjustment to night shift work among staff.

Acoustics

A lot of buildings, including health facilities, have poor acoustic ratings. Staff and other occupants in these spaces have inadequate privacy while having conversations, as well as having to deal with large amounts of background noise including phone users, movement of people & equipment and an array of other sources. People find themselves agitated, tired, and stressed.

The inclusion of sound-absorbing materials can reduce the negative impact that noises may have on an occupant within the space, as controlled acoustics have proven to heighten productivity, support better communication and provide an overall improved environment.

Telehealth

Telehealth has proven very popular in recent years, providing convenient & faster care for those who opt for it. Although convenient, it does have some drawbacks that have been highlighted by users:

- Difficulty hearing for people with both normal and already impaired hearing.

- Reduced visual size of interaction (when having a meeting an iPad or other devices).

- Reduced visual aid for examination and diagnosis.

- Speech interference

Recommendations for overcoming these issues is to provide adequate, sound-controlled areas where ambient noise can be reduced and the acoustics controlled, while increasing direct and indirect lighting for a better patient/practitioner communication and examination. To create these spaces in existing healthcare facilities, secondary instruments such as lighting can be considered. Whether it's a new or an existing facility, lighting that incorporates acoustics is highly recommended. Quality lighting combined with acoustic comfort and the beauty of fabrics is what LUCEPLAN have mastered. LUCEPLAN offer a lighting solution that matches décor and provides a high level of sound absorption, for public and private spaces.

## Luceplan Acoustic fittings

Silenzio

Pétale

Diade

Trypta

Farel

Bowen Hills Medical Specialist Centre, Queensland

Administration
A bright welcome

The first impression when entering a medical practice is vital, patients often enter with concern, fear, stress, and or anxiety. To help minimise these emotions, carefully considered lighting can create a welcoming and comforting environment as well as providing staff with a functional workspace.

A collection of products within the FOS Lighting range can create both a warm and inviting space for any visitor.
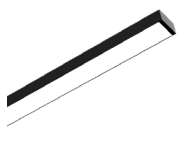
VEKTA
Micro Series
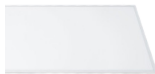
FREND LIGHTING
Elf

LUCEPLAN
Honeycomb

FORMALIGHTING
Circo Pro

FORMALIGHTING
Palla

ECOPOINT
Full Spectrum G4 Panel

VEKTA - VEKTA MICRO Series

The VEKTA MICRO Series is a family of linear luminaires for under-counter illumination.
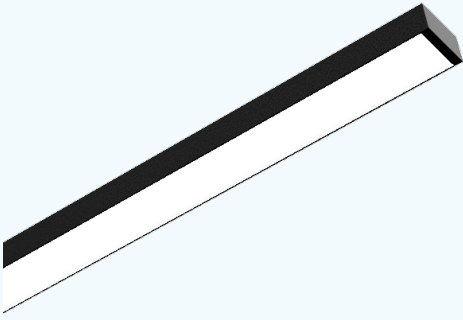
Features
- Even illumination
- Supplied with all mounting accessories
- Custom finishes to integrate seamlessly into any environment

FORMALIGHTING - Palla

Palla is a clean aesthetic spotlight, which can be used as 'task' lighting above counters and tables.

Features
- Clean aesthetic
- Suited to high ceiling spaces
- Ideal for task lighting
- Dim to Warm function

FORMALIGHTING - Circo Pro

Circo Pro is an architectural, ultaa slim, decorative luminaire providing direct and indirect illumination and boasting UGR<19.

Features
- IP20
- UGR>19
- Micro prismatic diffuser
- 4 diameters available (350mm,450mm,600mm,900mm)

LUCEPLAN - Honeycomb

The Honeycomb is a freely grouped, direct/indirect lighting solution. With its gloss white finish and hexagonal modules, a great many configurations can be installed while maintaining a clean aesthetic.

Features
- High quality ABS constructions
- Gloss white finish
- Endless configurations

Nurses Stations
Efficient & comfortable

Nurses plan and provide medical care for those suffering from poor physical and mental health, a key role in healthcare. Nurses' wellbeing is therefore crucial, and well-designed lighting can reduce stress and enhance performance. Lighting for nurses stations must be efficient, functional yet attractive, unobtrusive, non-glary, and must limit the adverse effects that shift work can have on the body.

When it comes to luminaires of this nature, FOS Lighting have a wide variety on offer, from linear Pendants to recessed and wall mounted spotlights, as well as low level indicators. Products from FOS Lighting can be customised to achieve the perfect illumination for any task required.
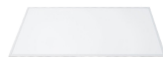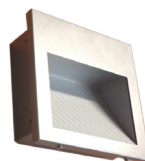
FREND LIGHTING
FWL Series

FREND LIGHTING
PBS-LED

FREND LIGHTING
KATOX

FREND LIGHTING
Elf Panel

FREND LIGHTING
FWU/15/LED

FORMALIGHTING
Microline Corner

ECOPOINT
Full Spectrum G4 Panel

FREND LIGHTING - FWL Series

The FWL series is a high quality, high colour rendering downlight, available in both recessed and surface mounted options.

Features
- IP65 available
- Cyanosis option available
- High quality reflector
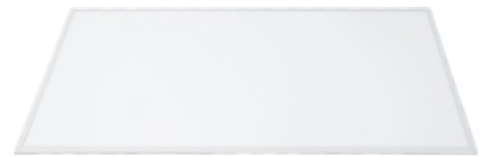- Tamperproof and Vandal resistant options
- High CRI

Manufactured in New Zealand

FREND LIGHTING - ELF

The ELF is a high quality, low-profile, edge-lit luminaire for areas with higher illumination requirements.

Features
- IP40
- Cyanosis option available
- Rated life = 50 000 Hours
- 4 Sizes
- 4 mounting configurations

FORMALIGHTING - Microline Corner

The Microline Corner is a flexible LED System designed for under cabinet and bench illumination.

Features
- CRI≥97
- Semi transparent diffuser
- Easy Installation

ECOPOINT - Full Colour Spectrum G4

The Full Colour Spectrum G4 Panel series provides enhanced colour performance where required. It is ideal for ceiling cavities with minimal space. The G4 panel is available in 1200x150 mm format for use in corridors and as an alternative to extrusion solutions.

Features
- IP40 as standard, IP65 option
- $R_a \geq 95$, $R_9 \geq 95$
- Rated life = 70 000 Hours (L80)
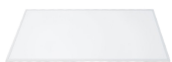- Optimal colour reproduction
- Cyanosis compliant

Designed in New Zealand

Examination Rooms
Vital signs in the light

During an examination, it is important to understand the client's symptoms and their associated needs. The luminaires within this space aid the examiner in making an accurate diagnosis, therefore must be Cyanosis compliant.
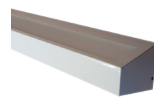
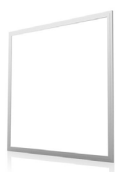| FREND LIGHTING	FREND LIGHTING	FREND LIGHTING	FREND LIGHTING	FREND LIGHTING	VEKTA	ECOPOINT
Elf Panel	FWL Series	ROB-LED	OB-LED	Wall	V170110	Edge Lit Panel G4

FREND LIGHTING - PBS-LED

The PBS-LED is a high output, high quality, IP65 sealed luminaire. Designed with a heavy-duty neoprene gasket to ensure positive seals, its replaceable gear tray makes it a future-proof luminaire.

Features
- IP65
- Rated Life = 70 000 Hours
- Inverted diffusers
- Cyanosis option available
- Self cooling LED Boards

FREND LIGHTING - FWL Series

The FWL Series is a high quality, high colour rendering downlight, available in recessed and surface mounted versions.

Features
- Cyanosis option available
- High quality reflector
- Tamperproof and vandal resistant options
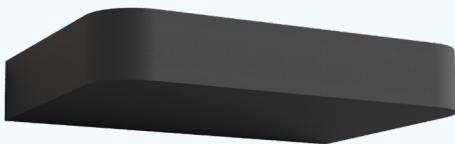- Optional IP65 lens
- High CRI

Manufactured
in New Zealand

FREND LIGHTING - Wall

Frend Wall is a wall mounting luminaire with indirect illumination.

Features
- IP44
- 120° Beam angle
- Custom Colours available

FREND LIGHTING - ROB LED

ROB-LED is a wall mounted, direct/ indirect over bed light. Separately switched, the uplighter component gives general illumination while the direct provides task lighting.

Features
- Rated life = 70 000 Hours
- Separate switching for the direct and indirect light
- A range of prismatic and opal diffusers

Wellington Hospital CCDHB Theaters

Procedure Rooms
Precision when it counts

Procedures require control, stability and precision by the surgeon. Lighting is key in eliminating shadows and providing true colour rendering. FOS Lighting have a range of high-performance, High CRI luminaires specific for these areas. We offer a tailored solution for every application, ranging from surgical lights to general lighting, background illumination to coloured LED's and tuneable fixtures.

FREND LIGHTING
PBS-LED (COI)

FREND LIGHTING
FWL Series (COI)

FREND LIGHTING
SCC

FREND LIGHTING - PBS-LED

The PBS-LED is a high quality, high output, IP65 fitting suitable for areas requiring sealed luminaires. The heavy-duty neoprene gasket ensures the integrity of the IP65 rating, and the retrofit gear tray enables this luminaire to be upgraded making it future-proof.

Features
- IP65
- Rate life = 70 000 Hours
- Retrofit gear tray
- Inverted wipe-down diffuser
- Cyanosis option available
- Self-cooling LED boards
- High-quality neoprene gasket

FREND LIGHTING - FWL Series

The FWL Series is a high quality, high colour rendering downlight, available in recessed and surface mounted versions.

Features
- Cyanosis option available
- High quality reflector
- Tamperproof and vandal resistant options
- Optional IP65 lens
- High CRI

Manufactured in New Zealand

FREND LIGHTING - SCC

SCC is a wall mounted sign box ideal for informing those on approach that a procedure is in progress. SCC can be customised to suit your needs.

Features
- Opal acrylic face
- Fabricated steel body
- Text options to suit customer requirements

X-RAY ON

SPECIALTY EXAMINATION LIGHTING COMING SOON

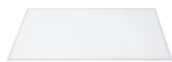Hutt Valley District Health Board (DHB)

Recovery Rooms
Control for optimal recovery

Lighting can have a key impact in reducing the time it takes for patients to return to 'normal' health. Simulating natural daylight conditions can help support patient mood, sleep, and overall recovery. Having the right light with the right level of control can help synchronise and work in harmony with our biological rhythm, adding to the comfort, experience and wellbeing of both patients and staff.

FOS Lighting offers a range of control solutions to suit not only patients, visitors, and staff's wellbeing, but also the budget.
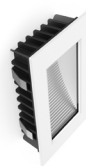
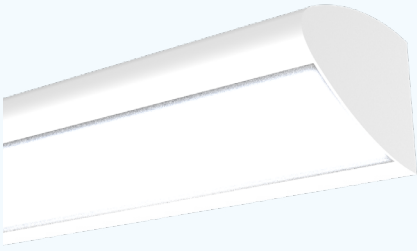| VEKTA	FREND LIGHTING	FREND LIGHTING	FREND LIGHTING	ECOPOINT	ECOPOINT	ECOPOINT
V170110	Elf Panel	OB-LED	OSIK	Step/Night Light	Full Spectrum Panel G4	Bedlight

VEKTA - V170110

VEKTA V170110 is a custom designed over-bed light incorporating both direct and indirect illumination. It can further house a night light or emergency additions on request.

Features
- Incorporated services options
- Cyanosis option available
- Direct/Indirect illumination

FREND LIGHTING - OSIK

The OSIK is an Australian designed & manufactured high performance LED luminaire.

Features
- Future-proof replaceable gear tray
- Cyanosis option available
- Rated life = 70 000 Hours

ECOPOINT - Overhead bed light

The Overhead bed light is a robust and modern luminaire with independent switching.

Features
- Wall mounted
- Rate life = 66 000 Hours (L80)
- Dedicated reading light
- Room uplight & Night light, 3 circuit independent switching

ECOPOINT - STEP/NIGHT LIGHT

The step/night light is a low-profile, discreet, and robust fitting, creating a safe level of lighting for orientation.

Features
- IP54
- Cast aluminium body
- Low powered LED
- Range of sizes
- Minimal cavity space
- Under Bed Light

Circulation Areas
Passing by

There are many circulation spaces within healthcare facilities, utilised by patients, visitors, and staff around the clock. These areas must provide clear visibility for occupants to navigate safely between departments. When designing for these spaces, considerations for emergency, directional/wayfinding and vertical lighting must be made while visual comfort, specifically for patients on beds while in transit is crucial.
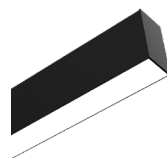
FREND LIGHTING	FREND LIGHTING	FREND LIGHTING	VEKTA	VEKTA	FORMALIGHTING	ECOPOINT
Elf Panel	FREND WALL	FWL Series	Macro Series	V1910IP	Gola Wall	Full Spectrum G4 Panel

ECOPOINT - Full Colour Spectrum G4

The Full Colour Spectrum G4 Panel series provides enhanced colour performance where required. It is ideal for ceiling cavities with minimal space. The G4 panel is available in 1200x150mm format for use in corridors as an alternative to extrusion solutions.

Features
- IP40 as standard, IP65 is option
- $R_a \geq 95$, $R_g \geq 95$
- Rated life = 70 000 Hours (L80)
- Optimal colour reproduction
- Cyanosis compliant

Designed in
New Zealand

ECOPOINT - Compact Downlight G2

The compact downlight G2 is an efficient modern luminaire, which features a faceted specular reflector protected by a clear intermediate lens.

Features
- IP54
- $Ra \geq 80$
- Available in a variety of power outputs
- Available in a variety of sizes
- <25W is it IC4 rated

FREND LIGHTING - FWL Series

The FWL Series is a high quality, high colour rendering downlight, available in recessed and surface mounted versions.

Features
- Cyanosis option available
- High quality reflector
- Tamperproof and Vandal resistant options
- Optional IP65 lens
- High CRI

Manufactured
in New Zealand

FORMALIGHTING - Gola Wall

The Gola Wall is a linear system, designed to be fastened directly to the wall, providing direct/indirect illumination.

Features
- IP40
- Acrylic opal white diffuser
- 4 apertures (40/60/95/160mm)
- RGBW Option

Mental Health
High protection, high safety

When it comes to Mental Health, both the security and comfort of patients and staff is imperative. The selection of tamper & vandal resistant luminaires with anti-ligature features provide safety, while the quality, output, and colour rendering of a luminaire adds to the occupant's sense of harmony, security, and overall recovery.

FOS Lighting has an in-depth portfolio of luminaires suited for secure facilities, providing effective illumination as well as safety and security.

FREND LIGHTING
FWL Series

FREND LIGHTING
VPBS-LED

SECURLITE
P600E

SECURLITE
Bang

SECURLITE
Senspot

ECOPOINT
Surface Mounted Panel

FREND LIGHTING - FWL Series

The FWL Series is a high quality, high colour rendering downlight, offered in recessed and surface mounted versions.

Features
- Cyanosis option available
- High quality reflector
- Tamperproof and Vandal resistant options
- Optional IP65 lens
- High CRI
- Anti-ligature option

Manufactured in New Zealand

FREND LIGHTING - VPBS

VPBS is a high powered, Vandal resistant, plaster recessed luminaire designed for secure environments.

Features
- IP65
- Fabricated from sheet steel
- 6mm high-impact polycarbonate lens
- Retrofit gear tray
- Diffuser options
- Heavy duty neoprene gasket
- Anti-ligature
- Cyanosis option available
- Tamper-proof screws

SECURLITE - Senspot

Senspot is a impact resistant spotlight designed for the harshest of environments.

Features
- IP44
- IK10+ 50Joules
- White polycarbonate reflector
- Clear polycarbonate diffuser
- Remote-control detector adjustment
- Anti-ligature

SECURLITE - Bang

BANG is an architecturally designed luminaire for environments where security is vital.

Features
- IP55
- IK10+ 50Joules
- Architectural design
- Opal polycarbonate diffuser
- Vandal resistant screws
- Decorative polycarbonate washers
- Reinforced polyamide base
- Anti-ligature

Bowen Hills Medical Specialist Centre, Queensland

Outdoors
Clear sight, clear direction

Lighting the exterior landscape maximises visibility to ensure distinction between pedestrian and vehicle zones, it provides a sense of safety and security, and makes arrivals and departures easy. There is also growing understanding that outdoor spaces are crucial to patients' physical, psychological, and social recuperation and wellbeing. Therapeutic and Healing gardens also enhance feelings of control and boost positivity. Illuminating such areas is achieved with the combination of FOS' fixtures and intelligent lighting control solutions.

FREND LIGHTING	YOUNGKONG	YOUNGKONG	YOUNGKONG	FORMALIGHTING	MEGABAY	ECLATEC
MR Bulkhead	Eclipse	Woody	Twin	Scala	Orbica	Link

FREND LIGHTING - MR Bulkhead

MR Bulkhead is a surface mounted, vandal proof luminaire, perfect for illuminating a variety of exterior applications.

Features
- IP65
- Die-cast aluminium body
- Polycarbonate diffuser
- Integral control gear
- Silicon gasket
- Security grill & Eyelid options
- Ceiling or Wall mounted

YOUNGKONG - Eclipse

The Eclipse is a wall mounted fixture perfect for exterior pathways and rooftop gardens. It features high performing LED's and is IP 65 rated.

Features
- IP65
- Die-cast aluminium
- High efficiency lens optics
- Dark-grey powder coat finish
- Integral driver

FORMALIGHTING - Scala

Scala is a low profiled luminaire, which was specially designed for installation into handrails.

Features
- IP67
- Mono-elastic clip
- Easy installation
- Complies with European standard EN60598
- Flat or curved faced options
- Symmetric and Asymmetric beam options

MEGABAY - ORBICA

The Orbica is an extremely compact surface mounted or suspended cylindrical luminaire, with endless possibilities in lighting.

Features
- IP65
- Aluminium housing
- Clear or diffused optics
- Rated life = 50 000 Hours
- Range of anodized or powdercoat finishes
- High CRI for superior colour quality

Signage & Sensors
A visual cue

Signage is the most effective way to understand & navigate an environment. FOS Lighting have a range of Illuminated signs for way finding and communication.

FREND LIGHTING
FLE MKII

FREND LIGHTING
STL MKII

FREND LIGHTING
SCC

ECOPOINT
Sensor Switch

FREND LIGHTING - FLE MKII

The FLE MKII is a back lit exit sign available in 3 configurations (Exit Left, Exit, Exit Right).

Features
- AS/NZS 2293 compliant
- Viewing distance of 24m
- Double Sided
- Interchangeable diffuser (included)

FREND LIGHTING - STL MKII

Starlite Emergency LED

Features
- AS/NZS 2293 compliant
- Optional surface mount box
- 1.2m Flex & Plug cable

FREND LIGHTING - SCC

Wall Mounted Sign Box

Features
- Opal acrylic sign face
- Fabricated steel body
- Customisable text

ECOPOINT - Sensor Switch

Ecopoint's advanced Sensor Switch is both a cost effective, and an energy saving upgrade solution. Ideal where lighting is often left on when a room is unoccupied.

Features
- Compatible with LED fixtures
- Manual override
- Sound sensor: On/Off option
- Adjustable timer/range
- Adjustable ambient light sensor
- Voltless dry contacts for AC/heat pumps and security equipment
- Energy savings of up to 40%

Cleaning Departments
A Clear Inspection

Medical equipment requires high illumination for an effective & thorough visual inspection. Any unidentified damages to equipment, misuse of chemicals or missed chemicals residue can be fatal if gone unnoticed or is managed incorrectly. Keeping these areas well illuminated will reduce these risks and gives staff confidence in their cleaning & inspection process.
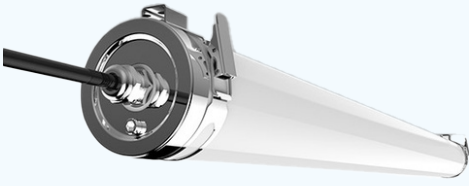
ECOPOINT
Tri-Proof Plus

FREND LIGHTING
PBS-LED

ECOPOINT
Compact Tri-Proof

SECURLITE
FILA 2

ECOPOINT - Tri-Proof Plus

The Tri-Proof Plus is built tough to protect agaisnt a range of chemical agents.

Features
- IP67
- IK09
- 316-grade stainless steel
- Easy to clean profile
- Surface Mounted or Suspended
- Ra ≥ 80
- PMMA, PC and Tempered-glass options

FREND LIGHTING - PBS-LED

The PBS-LED is a high quality, high output, IP65 fitting suitable for areas requiring sealed luminaires. The heavy-duty neoprene gasket ensures the integrity of the IP65 rating, and the retrofit gear tray enables this luminaire to be upgraded making it future-proof.

Features
- IP65
- Rate life = 70 000 Hours
- Retrofit gear tray
- Inverted wipe-down diffuser
- Cyanosis option available
- Self-cooling LED boards
- High-quality neoprene gasket

ECOPOINT - Compact Tri-Proof

Designed specifically to resist damage when operating in high-demand environments and if space may be at a premium.

Features
- IP65
- IK08
- Easy to clean profile
- Surface Mounted or Suspended
- Ra ≥ 80

SECURLITE - FILA 2

Fila 2 is a sealed vandal-resistant striplight for illumination in areas where chemicals are present.

Features
- IP67
- IK10
- 66 mm and 98 mm diameter options
- Opal and clear diffuser optics
- Louvre options
- 2mm thick polycarbonate body

Hutt Valley District Health Board (DHB)

St George's Hospital

Parking
safe and Secure

Parking complexes can be unnerving and difficult to navigate, made worse at night. The solution: ample light day & night, maximizing visibility both in and out of a vehicle. FOS Lighting offer a range of exterior and multi-story/undercover parking solutions, that can house cutting-edge, intelligent and easily integrate control systems

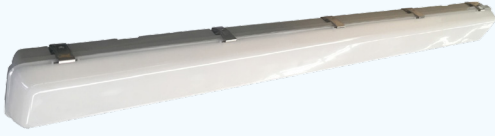| FREND LIGHTING	FREND LIGHTING	FREND LIGHTING	FREND LIGHTING	ECLATEC	ECLATEC	ECOPOINT
CWP	Prysm	SMHF-LED	SPF - LED	Stelium	Zelda	Compact Tri-Proof

FREND LIGHTING - CWP

CWP is a linear waterproof luminaire with a variety of applications such as carparks, perimeters, stairwells & other adverse areas.

Features
- IP65
- IK07
- Rated life = 70 000
- UV stabilised high impact polycarbonate diffuser
- Optional tamper proof clips
- Suspended option

FREND LIGHTING - PRYSM

Designed to withstand some of the toughest conditions, the Prysm was designed for areas such as multi-level carparks, service corridors, walkways, and prominent vandalism zones
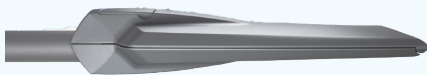
Features
- IP65
- IK08
- Square or Round profiles
- UV stabilised polycarbonate diffuser

ECLATEC - ZELDA

Zelda is an exterior pole mounted luminaire designed for urban environments to illuminate streets, pathways and other residential zones and walkways.

Features
- IK 10
- IP 66
- Available in S and X Modules
- X modules designed for easy maintenance
- Available in three sizes
- Die-cast aluminium for durability
- Colour options
- Extruded silicone seals for added protection

ECOPOINT - Compact Tri-Proof

Designed specifically to resist damage when operating in high-demand environments and if space may be at a premium.

Features
- IP65
- IK08
- Easy to clean profile
- Surface Mounted or Suspended
- Ra ≥ 80

FOS Projects

Australia

ALICE SPRINGS HOSPITAL
ARMIDALE HOSPITAL
ATHERTON HOSPITAL
BALLINA HOSPITAL
BENDIGO HOSPITAL
BENHOME MASONIC VILLAGE
BLACKTOWN HOSPITAL
BOWEN HILLS MEDICAL CENTRE
BRISBANE PRIVATE HOSPITAL
CABOOLTURE HOSPITAL
CAIRNS BASE HOSPITAL
CHARLEVILLE HOSPITAL
CHERMSIDE DAY HOSPITAL
CUNNAMULLA HOSPITAL
CYCLOTRON FACILITY
DARLING DOWNS HOSPITAL
FRANKSTON HOSPITAL
GEELONG HOSPITAL
GLADSTONE HOSPITAL
GOLDCOAST PRIVATE HOSPITAL
GOONDIWINDI HOSPITAL
GREENSLOPES PRIVATE HOSPITAL
HERVEY BAY HOSPITAL
INVERELL HOSPITAL
IPSWICH HOSPITAL
JOHN FLYNN PRIVATE HOSPITAL
KEMPSEY DISTRICT HOSPITAL
LIVERPOOL HOSPITAL
LOGAN MATERNITY HOSPITAL
MAREEBA HOSPITAL
MARYBOROUGH HOSPITAL
MATER HOSPITAL

MILES HOSPITAL
MORANBAH HOSPITAL
MOSSMAN HOSPITAL
MT ISA HOSPITAL
MUDGEE HOSPITAL
NAMBOUR HOSPITAL
NORMANTON HOSPITAL
NORTHERN BEACHES HOSPITAL
NORTHWEST PRIVATE HOSPITAL
ORANGE PRIVATE HOSPITAL
PA HOSPITAL
PINDARA PRIVATE HOSPITAL
PORT PIRIE HOSPITAL
PRINCE OF WALES HOSPITAL
PROSERPINE HOSPITAL
QEII HOSPITAL
RDH ROYAL DARWIN HOSPITAL
REDCLIFFE HOSPITAL
RIVER CITY HOSPITAL
ROBINA HOSPITAL
ROMA HOSPITAL
ROYAL NORTH SHORE HOSPITAL
ROYAL WOMEN'S HOSPITAL
ST ANDREW'S HOSPITAL
ST JOHN OF GOD HOSPITAL
ST VINCENT'S PRIVATE HOSPITAL
SYDNEY ADVENTIST HOSPITAL
TOOWOOMBA HOSPITAL
TOWNSVILLE HOSPITAL
WARWICK HOSPITAL
WESLEY HOSPITAL
WESTSIDE PRIVATE HOSPITAL

New Zealand

ASHBURTON HOSPITAL
CHRISTCHURCH HOSPITAL
COUNTIES MANAKAU DHB
HILLMORTON HOSPITAL
HUTT VALLEY DHB
INVERCARGILL HOSPITAL
KENEPURU HOSPITAL
MIDDLEMORE HOSPITAL
NORTHLAND DHB
NORTH SHORE HOSPITAL
ST GEORGE'S HOSPITAL

TIMARU HOSPITAL
WAIKATO DISTRICT HEALTH BOARD (DHB)
WAIRARAPA HOSPITAL
WAITAKERE HOSPITAL
WELLINGTON CHILDRENS HOSPITAL
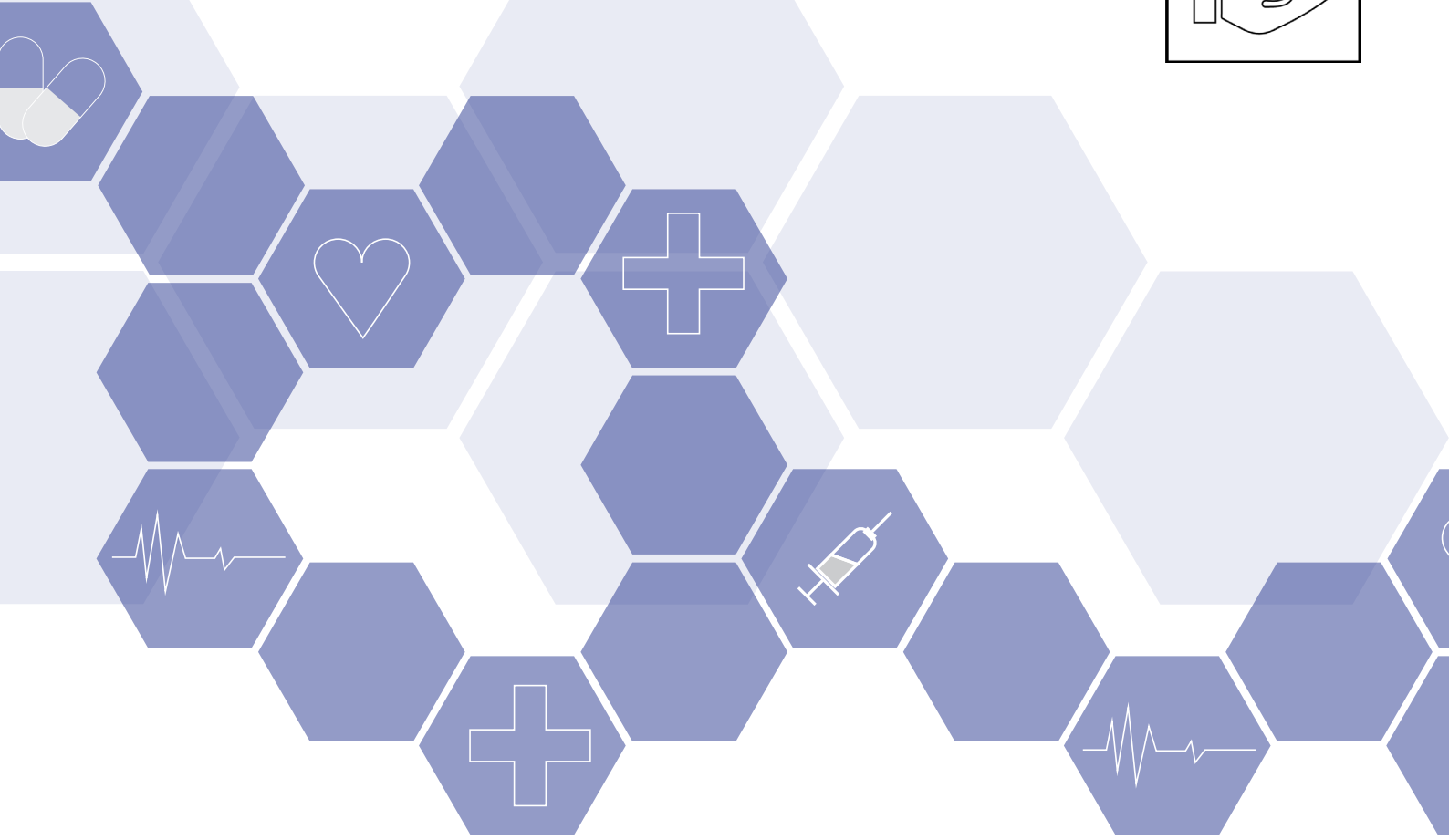WELLINGTON REGIONAL HOSPITAL