
eness
LUMES
Naturally LED

Reimagine Walls

A new interactive light emitting wall panel, bringing light, color and stories to any space. LUMES integrates into interior walls and comes in many surfaces that glow, from wood to wool.

Our Process

From idea to implementation, our team of talented designers, coders and artists at ENESS are driven by a shared passion in creating unique meaningful experiences

Brief

Our interdisciplinary team explores the creative opportunities specific to your site.

We consider how to use lumes in your project depending on your objectives and budget.

We envision how we can bring our digital world into yours.

Design

We work alongside architects and interior designers to integrate LUMES within the built form.

3D visualisations are developed to further communicate and solidify a shared vision.

Production

Allow 6 - 8 weeks for the design and fabrication of your order request.

Advanced manufacture techniques can be used to produce custom designs.

In house coders and visual artists develop site specific animated content.

Integration

We work with your builders to ensure LUMES is integrated into the space appropriately.

Our team is involved in the technical installation to ensure a high quality fit and finish.

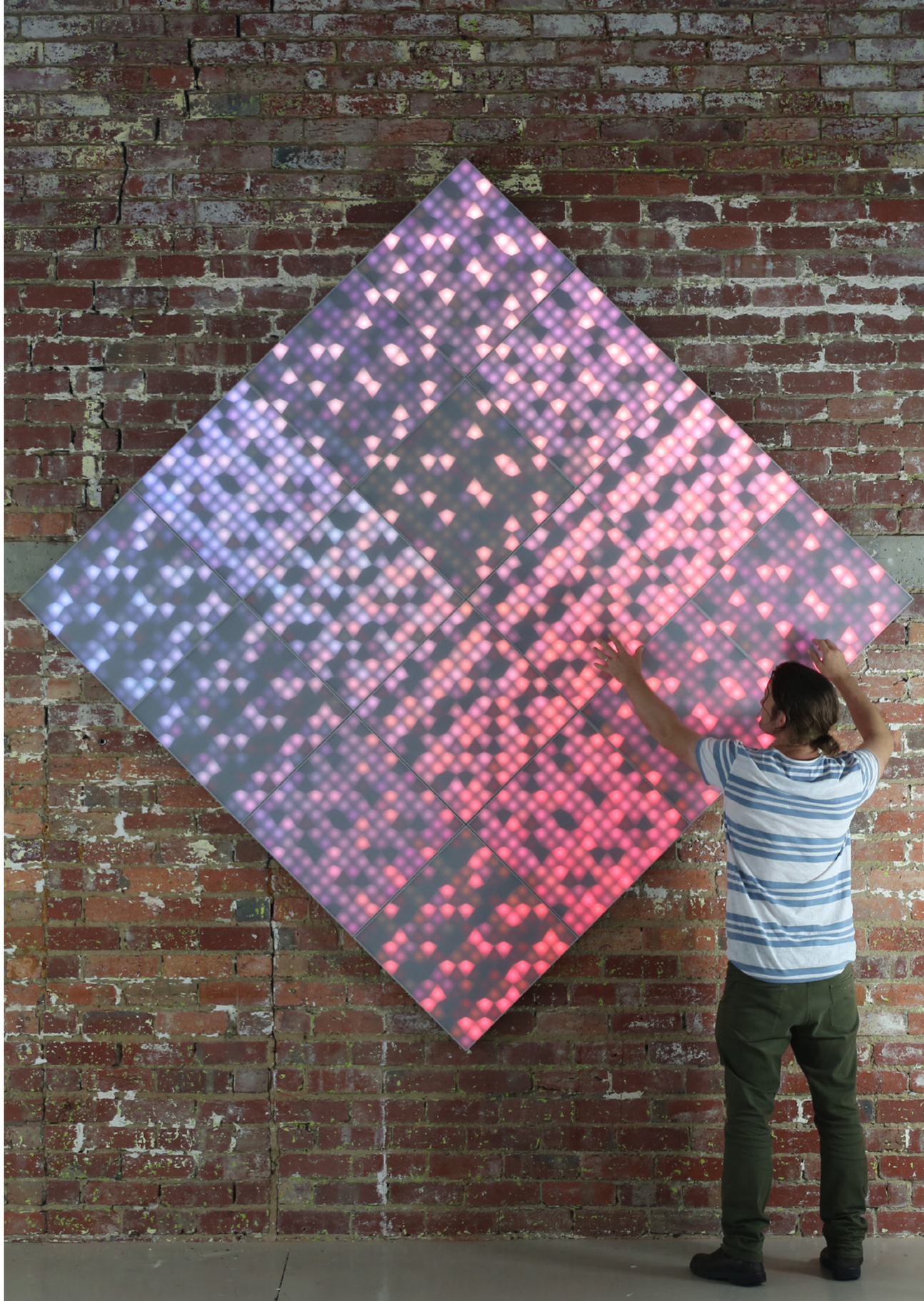
Visual content is fine tuned on site and approved by the client.

Operation

Upon completion of each installation we ensure ongoing support and quality control.

Our system is automated to run daily according to your needs.

We offer the option to update and refresh the content at any time.



Architectural Integration

LUMES brings surfaces to life, designed to integrate into interiors and mount onto walls and ceilings creating immersive experiences seamlessly blended into the environment.

We work with architects, interior designers and builders throughout all stages of the design process to develop harmonious environments.

We believe in a collaborative design approach, working together to realise a joint vision.

Bright in Daylight

LUMES are bright enough to illuminate dark spaces and even punch through natural light interiors.

With LUMES, each pixel contains the full spectrum colour palette, opening up unlimited possibilities for enhancing your environment through colour, movement and light.

The light is contained inside the panel using high quality 16 bit LEDs offering a far deeper range of colours than conventional 8 bit LEDs. The panels emit colours rangng from subtle dark gradients to stunningly vivid tones.

Interactive

LUMES represents an emerging field of design where the digital and physical worlds are uniting, offering new ways of engaging with built environments. LUMES is adaptable to various forms of interactive sensors. Our tailored software gives you the freedom to explore generative content including interactive 3D visuals, games, online data feeds, smartphone control and more.

With LUMES you can create an environment where the walls have the ability to react to time, the weather, movement, vibration, audio or even skeletal and facial recognition.

The opportunities are endless and only limited by a designer's imagination.

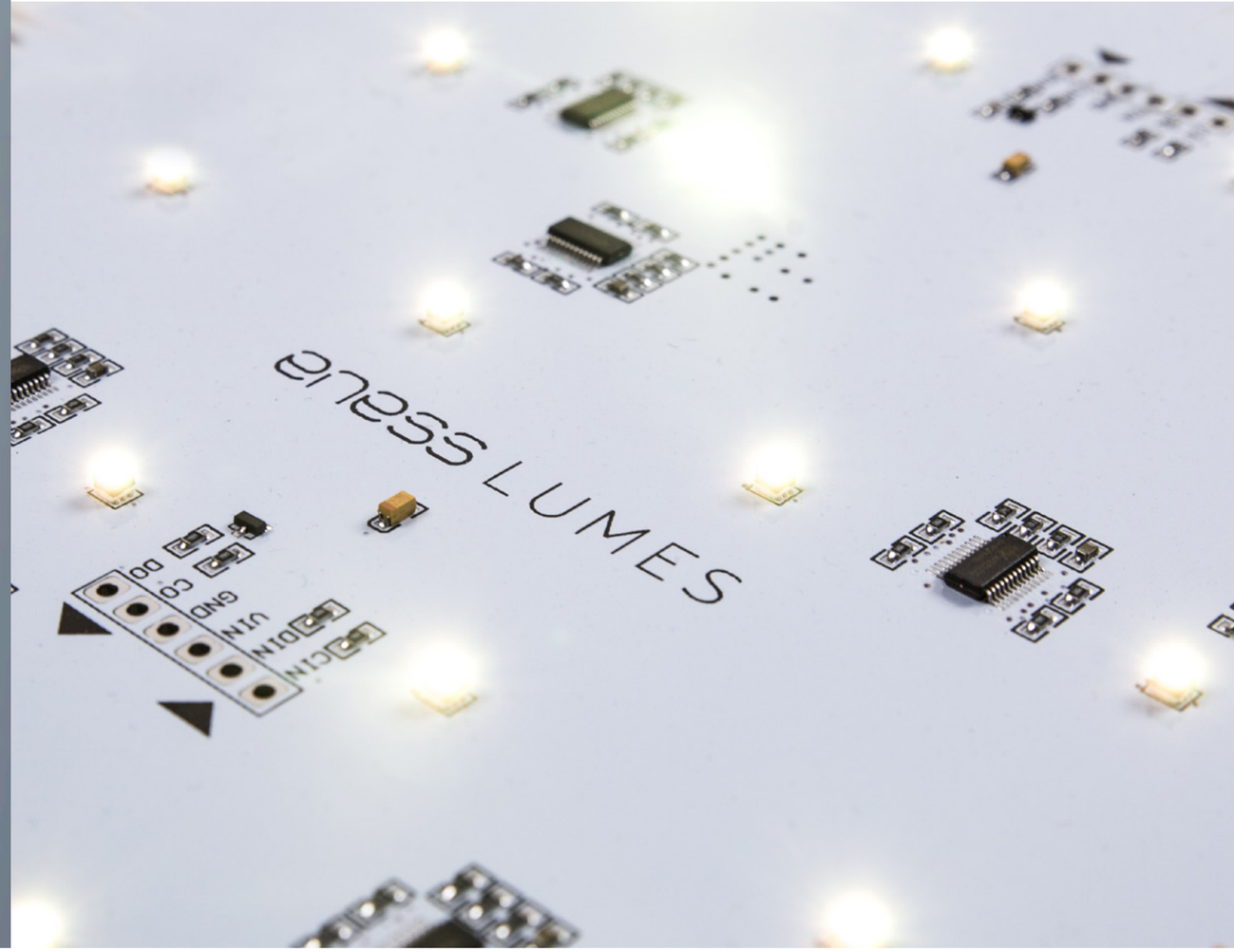
Input compatibility :

- KINECT
- Infrared sensors
- 360° motion cameras
- Laser tracking (LiDAR)
- Touch capacitance
- Audio input

Curated Content

Create meaningful experiences by bringing your surfaces to life with animations and visuals. Our in house team of developers and artists code and create unique visual experiences for each installation.

We develop narratives and curate emotional experiences for each site with visuals ranging from animated illustrations, through to generative 3d visuals, colour gradients, complex patterns and illusions.



Tactile Finishes

Our LUMES tiles are designed to compliment and integrate into a diverse range of architectural projects. They come in three high quality finish options:

LUMES FABRIC
Comes in a variety of light-filled soft materials from canvas, to wool, to synthetics. Adds a delicate look and feel with soundproofing qualities too. Great for hospitality and commercial spaces, lobbies, bars and clubs.

LUMES WOOD
Emits light through quality timber veneer, creating depth and warmth with an elegant architectural finish.

LUMES ACRYLIC
Designed for versatility to work in high brightness, sun-filled environments. is highly durable for common areas like atriums, foyers and walkways.

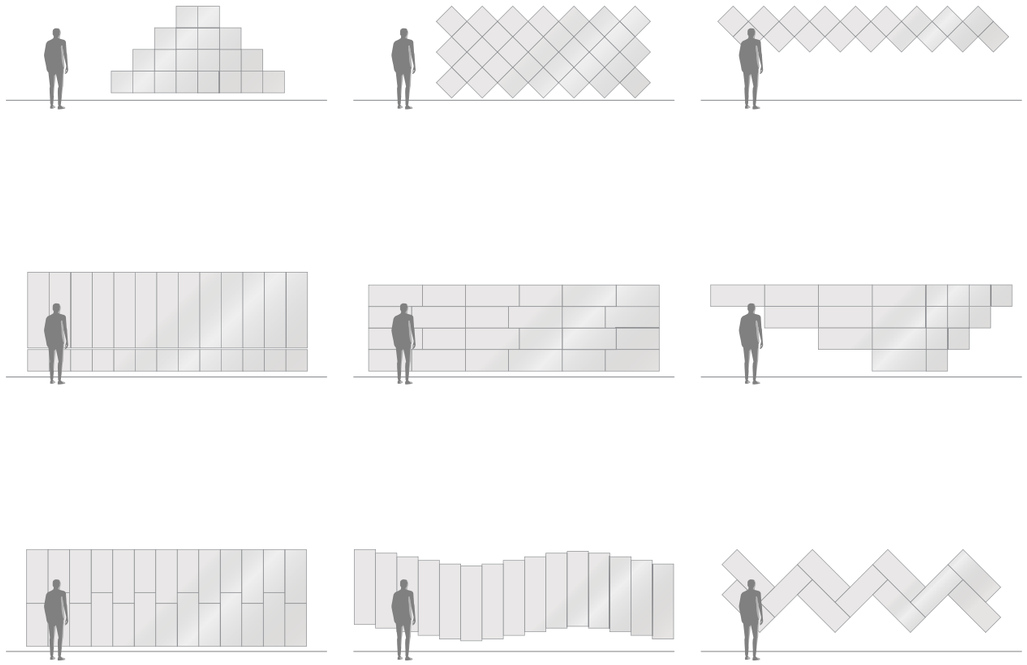
Longevity Guaranteed

We use the highest quality components to ensure our installations stand the test of time. LUMES uses the latest technology in Cree RGB LEDs, the market-leading innovator of lighting-class LEDs, highly regarded for their long life and energy efficiency.

Cree LEDs are lead-free and RoHS Compliant.

LUMES come with a 3 year warranty on LEDs.

CREE LEDs



Configurations

LUMES modular panels can be configured to adapt to your architectural style and space.

They have the ability to be linked together, patterned and formed to create numerous configurations.

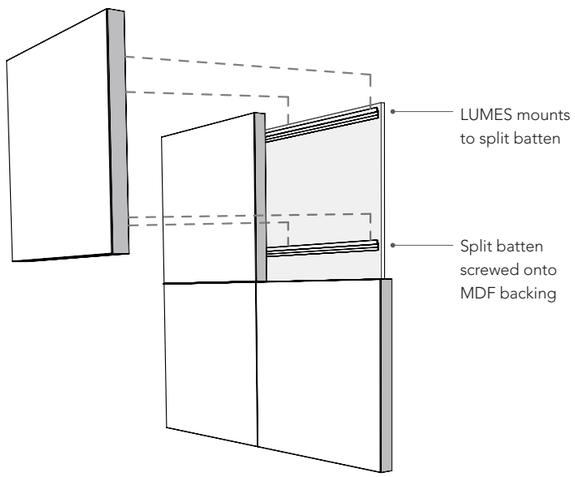
Examples of pixel pattern designs pictured above

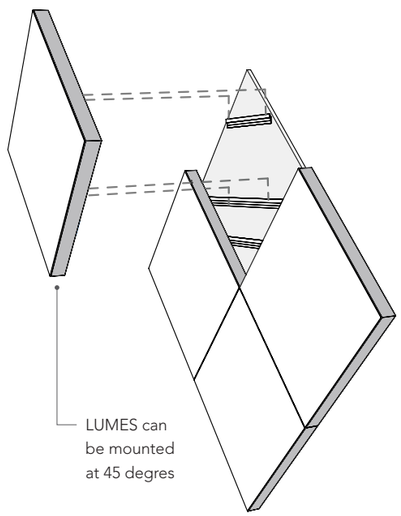
Customisable Patterns

The LUMES pixel grid patterns within each tile can be customised.

Shapes can vary from hard-edged polygons, tessellated fractels to organic curves.

Each panel can be designed to suit the look and feel of their prospective environment.





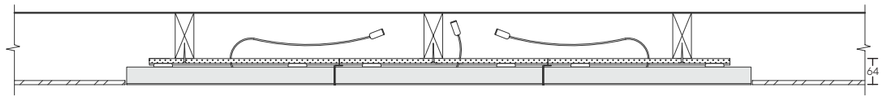
Mounting System

We have developed a simple mounting system which makes the tiles easy to install, remove and replace for easy maintenance.

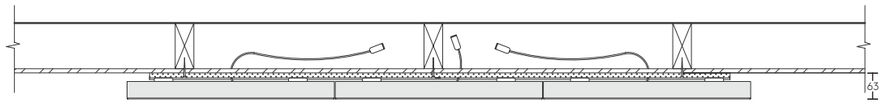
Our customised backing boards are designed as per project, to ensure a seamless integration.

The cables for power and data can be surface mounted or chased into the wall.

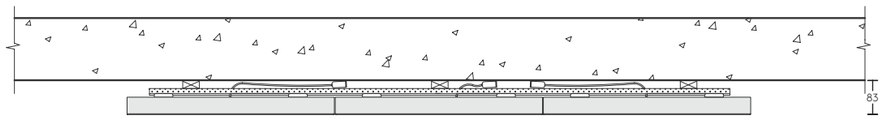
A split batten system is fitted to the backing boards for mounting the tiles.



1 DETAIL : WOOD LUMES intergrated within surface



2 DETAIL : ACRYLIC LUMES mounted on studs/joists



3 DETAIL : ACRYLIC LUMES mounted to concrete surface

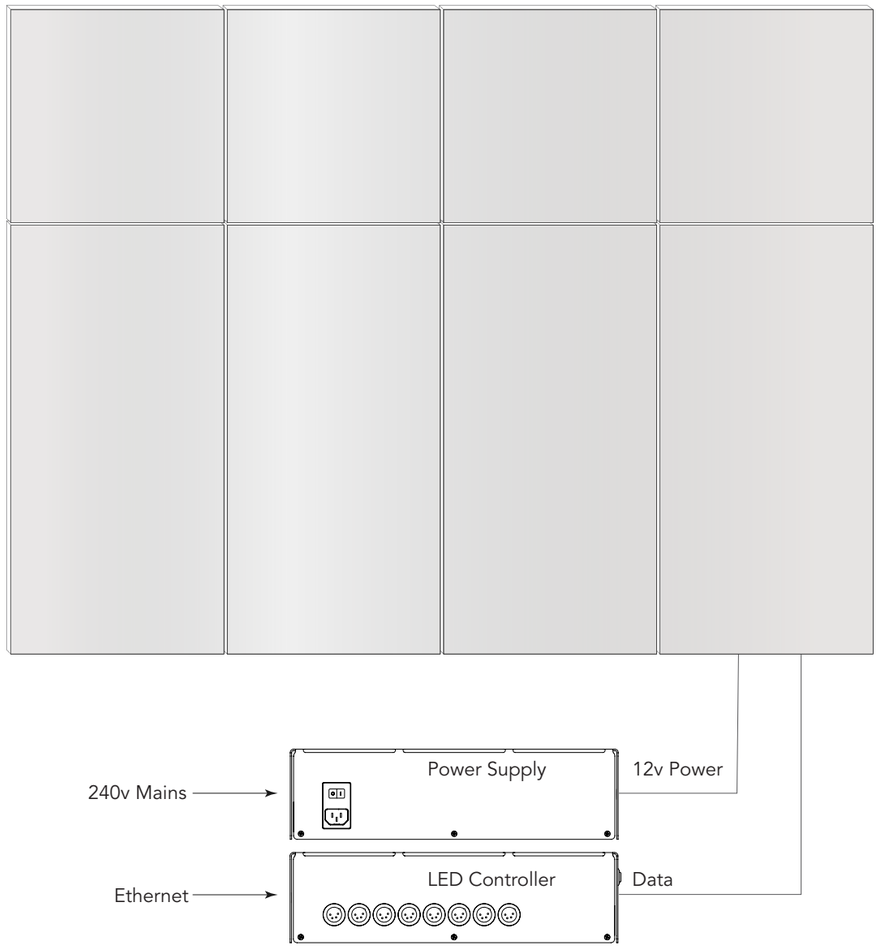
TOP VIEW

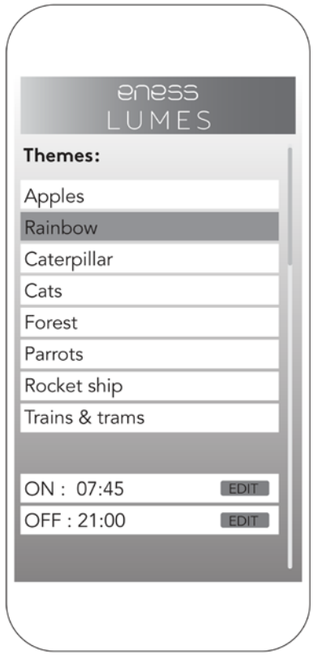
Wall Lining
MDF backing board
Solid walls

Mounting Consideration

LUMES is a light generating building material that can be integrated within your walls and can also be mounted onto most surfaces. The three diagrams above illustrate the different ways the panels can be mounted and integrated.

LUMES WOOD is recommended to be installed with stainless dividers between panels (refer to detail 1).





Controller Specifications

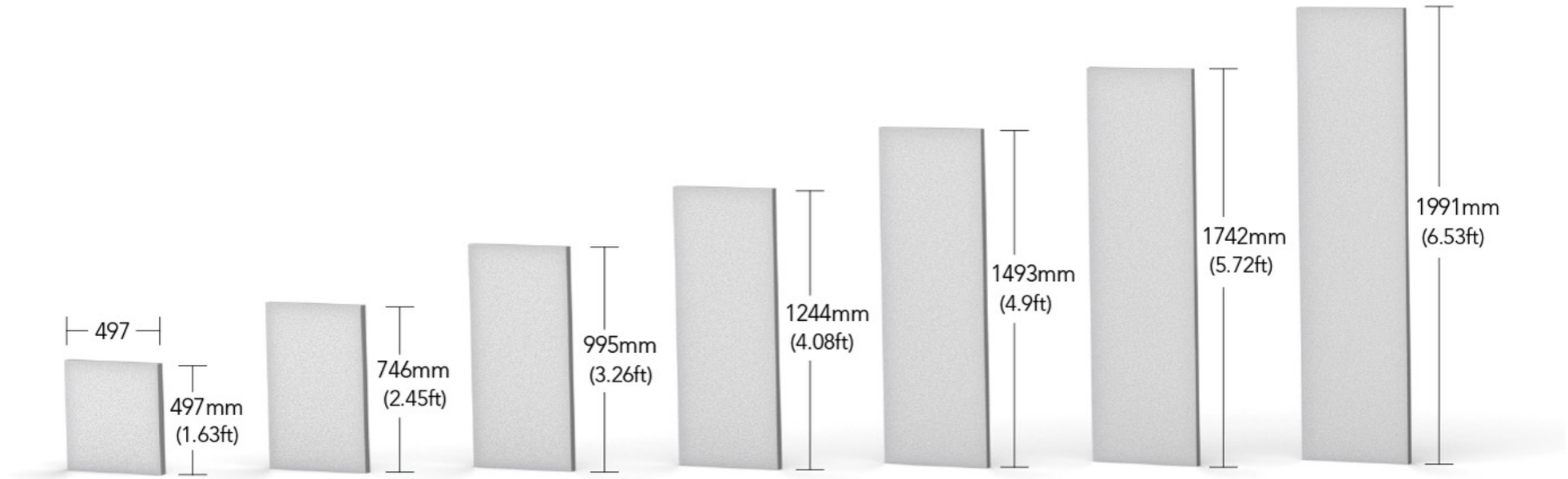
LUMES are operated by the using a custom LED controller and power supply.

The operation of the panels requires the LUMES controllers to have access to power and cat5.

It is recommended that the controller is located at a distance no more than 5 meters away from the panels. Controllers and power supplies in most cases can be mounted in ceilings or wall cavities.

Customised Portal

We design a customised web App. for each project, this easy to use interface gives the client executive control over the installation, with the ability to activate different themes as well as schedule operation times.



Panel Specifications

LUMES panels can be made at heights of 249mm increments to suit different surface areas.

Dimensions (mm) :	W 497 x D 42 x L (varies see above)
(inch) :	W 19.6 x D 1.65 x L (varies see above)
Weight (kg/m2):	16kg
Frame finish :	Anodized Aluminium
Front face :	6mm Plexiglas acrylic
Mounting :	Split batten wall mounted system

Electrical Specifications

Energy consumption (per m sq) :	100 watts average 304 watts (running full white)
LED voltage :	24V DC
LED lifetime :	6-10 years
Input voltage :	240V
Light source :	576 RGB led per meter sqaure
Pixel pitch :	41.5mm
Usage environment :	Indoor only (ip22)
Relative humidity :	max. 95% non-condensing
LED warranty :	3 years

About ENESS

ENESS is a new media design studio based in Melbourne, Australia. We design and fabricate bespoke interactive installations, combining our skill set in lighting, software, interactive media, product design, sculpture and architecture. The outcomes are distinctive and unexpected.

Our studio seeks to bridge the physical world with the digital, enhancing environments through immersive sensorial experiences.

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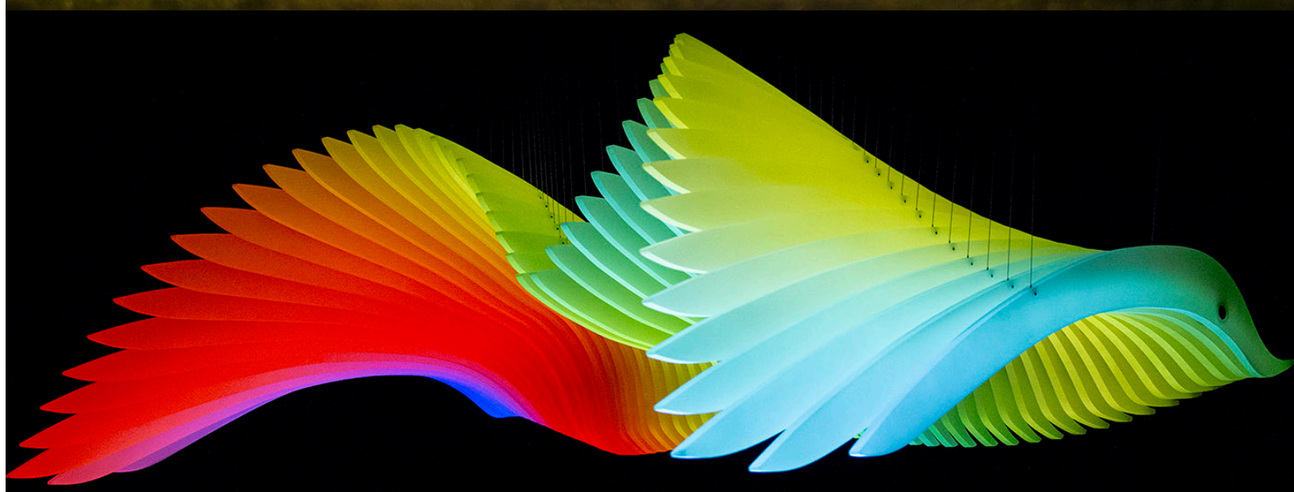
Sonic Light Bubble



Bunjil - Melbourne Museum

MINI Dancefloor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