Danish Icons in Manhattan
Tawaraya in Kyoto
Cambridge Faculty of Education
The Statoil Guest House in Stavanger
Design reflected in a prism

Danish icons in Manhattan

Louis Poulsen, Fritz Hansen, Georg Jensen, Royal Copenhagen and Bang & Olufsen have more in common than just their Danish origins. All are leaders in their respective fields – lighting, furniture, silver, porcelain and sound systems. All enjoy rich histories and solid reputations, and all have designed products that enjoy the status of international icons. They recently staged a joint exhibition in Manhattan.

The direct inspiration was Styling Danish Life, an exhibition designed for the same five companies by architect Tadao Ando at the Mori Art Museum in Tokyo, 2005. This time around, the event was part of the Danish export drive, Creative Nation, held in New York this September. The five again opted to present a common front but the outcome was an exhibition quite different – as far as idiom and location are concerned – from the type usually graced by these prestigious companies.

The choice of location was an important consideration. The chosen venue was the art and architecture gallery Storefront on Kenmare Street, between SoHo and Little Italy. The exhibition also marked Storefront’s 25th anniversary as an independent, experimental gallery, respected by the city’s pre-eminent architects and artists. Storefront’s location on Manhattan’s Lower East Side added a certain edge to the companies’ products, bringing them to the attention of New York’s young opinion-makers.

The five chose Jonas Hartz, owner of the Danish design studio Hz, as the creative brain behind the exhibition. He describes the idea behind Ikon: “The era in which we live encourages the iconisation of design, art and fashion. These five companies are closely associated with the development of creative thinking. They all mass-produce design that somehow also manages to offer a unique experience. The PH Artichoke, The Egg, Georg Jensen’s silver, blue-fluted porcelain and the Beolab are on display in museums but they still play a significant role in the life of ordinary Danes. They form part of Danish identity and self-awareness.”

Ikon featured examples of Danish design’s biggest icons, alongside visual narratives that highlighted their everyday significance. “We all have personal relationships with these products,” explains Hartz. “It is precisely these connections that make them so alive. Design without context is uninteresting. It

BY IDA PRÆSTEGAARD
The interior and the exterior of Storefront are merged together by Steven Holl and Vito Acconi, who designed the gallery façade as a series of 12 hinged panels covered in mirrors in 1993.

Storefront is a long, narrow and demanding exhibition space. Curator Jonas Hartz opted to reflect the exhibition’s principal idea by using prism-shaped display cases and mirrors.

The Egg and the AJ fixture - two icons created by the same icon – Arne Jacobsen.
Storefront is able to merge its interior and exterior, a major advantage for receptions, etc.

Their Royal Highnesses Crown Princess Mary and Crown Prince Frederik inaugurated Ikon, which was part of the export promotion Creative Nation.

Photo: Lotte Hansen
is the human experience, the interaction between the human and the product, that is so fascinating. “The designer, who these days is considered an integral part of the product, is another facet of the exhibition. The personality behind the product helps to create our experience, and several of the designers are icons in their own right. We also look at the relationship of the products to each other.” These stories are related in Elizabeth Heltoft’s beautiful still-life photos, which are also published in the accompanying catalogue. The photographs present a refreshing take on a classic narrative form to illustrate the products’ everyday use.

While the five companies are certainly unique, they also have their similarities and complement one another. Each represents a jewel in the crown that is the past, present and future of Danish design. It is for this reason that the prism was chosen as the symbol of the exhibition – made tangible in the form of display cases constructed from wood and mirrors. Jonas Hartz elaborates: “The reference is the classic image of the white diffuse light that is divided into five colours on its journey through the crystal. It represents the underlying story that binds the exhibition together and endows it with its visual idiom. The prism symbolises the dynamism communicated by the companies when they channel the creative energy of their designers, craftsmen and architects. The prism reflects and fragments the reality that surrounds us, the reality that we all take for granted. Like a kaleidoscope, it shows us something we haven’t seen before, or offers a new perspective on something we thought we knew. It tells us something about the shoulders on which we stand, but also allows us a glimpse of where we are heading.”

The primary goal of Creative Nation (CN) is to enable Danish companies and institutions to coordinate their efforts on target markets.
The Faculty of Education Building in Cambridge provides a good model of what can be achieved when illumination is seen as part of the design process as well as the architecture, to the degree that, in this case, it shaped the development of the building itself.

Probably one of the most crucial factors for achieving a successful lighting scheme is to consider it at the earliest possible stage. Lighting is often considered to be a bolt-on option or an area of compromise and it invariably suffers as a result. However, as the design of buildings moves towards a more integrated approach, lighting is becoming an increasingly more important issue.

“We were involved early in the design process, which enabled us to provide a detailed integration of services, including a number of bespoke lighting solutions that were tailored to suit the functional and aesthetic aspirations of each space,” says Stuart Bellamy of Mott MacDonald, which was responsible for the lighting design. “The lighting throughout played a key role in the development of the design of specific aspects of the building and interior. Thus, the lighting solutions complemented and used the architecture and fixed furniture to achieve the desired treatment of lighting for each space.”

The ‘brick house’, with its ceilings primarily formed of in-situ concrete coffers, is just one example of this process. Early consultation allowed for lighting to be included in the input leading up to the final design of the coffer shape and frequency. This resulted in a common coffer width of 1.5 m to suit the required spacing between luminaries – a bespoke, extruded aluminium, continuous linear fluorescent system.

In the classrooms, the same system was developed to reflect the curved form of the coffers. Using T5 lamps, it comprises direct lighting sections, with opal acrylic diffusers and continuous up-lighting for the concrete coffers, providing a comfortable environment for both teaching and learning. The system was also designed to incorporate additional
services, including fire alarm detectors and lighting control sensors.

The lighting within these rooms is maintained by a fully addressable lighting control system, which automatically dims fittings when daylight reaches a certain level. Manual dimming is also available.

Lighting within the theatres and IT rooms follows the same principles, although lighting for these spaces was designed in conjunction with a cooling strategy – a bespoke, integrated chilled beam unit was developed to be suspended within the ceiling coffer. This complements the shape of the continuous luminaires in adjacent spaces and features direct lighting units for the underside, with light sources controlled by an open louvre to limit potential glare. Continuous indirect lighting was incorporated towards the rear of the beams to uplight the coffers along their full length.

In terms of lighting, the library in the ‘timber house’ represents one of the more interesting aspects of the project, as illumination was a key tool for creating the type of ambience the architect wanted. The primary aim was to avoid blanket lighting. “The architectural aspiration for this space was to keep ceilings uncluttered and to create a warm and intimate ‘home study environment’,” says Bellamy. “We focused on providing lighting where required, on shelves and study desks, with minimal additional lighting in circulation spaces.”

The primary lighting solution was shelf lighting, designed to illuminate the book shelves and the circulation space...
The library is a double-height room in the north of the building, where the influx of natural light is limited. The room is lit by Satellite (Wohlert), the matt-glass surface of which provides uniform and diffuse light. The opening in the bottom part of the pendant emits a direct downward light.

Above: The large, glass-covered atrium links the east entrance with the garden to the west. The room acts as a road through the building, and the Nyhavn Posts look just as natural indoors.

Right: Some of the lighting in the glass-covered atrium is provided by Nyhavn Wall fixtures and Satellite (Wohlert) pendants.
The inground fixture Pharo LED casts light upwards onto the trees in the garden and produces an atmospheric effect after nightfall.

The Cambridge Faculty of Education opens up towards the town in a friendly and inviting manner with the help of large glass surfaces.

The Kipp outdoor fixture provides general lighting at the front of the building and announces the transition to the city of Cambridge.
The bespoke, extruded aluminium, linear fluorescent luminaire was developed in close collaboration with the interior designer and shelving system supplier, providing a carefully detailed and integrated result. Fittings were designed to match the width of the shelving units, with remote control gear concealed within each unit and connected via cables running within bespoke brackets.

A bespoke desk lamp was developed for the study desks along the perimeter, to provide specific task lighting for the desk areas. The decorative luminaires are a self-ballasting, compact fluorescent lamp, and are comprised of an opal glass shade and a spun aluminium support pedestal. Again, this was designed in close conjunction with the architect to complement the architectural rhythm of the space.

To illuminate the individual study spaces and to provide lighting to circulation spaces not sufficiently lit by the shelf system, Louis Poulsen’s Satellite (Wohler) glass pendants were selected to complete the desk lights and to provide a warm and diffuse light. The luminaires, which use a 1 x 42 W CFL, were suspended from high level on long, white textile cables.

Louis Poulsen fixtures also play a prominent role on ‘the street’. Decorative Nyhavn wall-mounted exterior luminaires, also with CFLs, run along the length of ‘the street’ and within the café areas, providing the main source of illumination for the space. They were selected for their visual presence, as well as to minimise upward light distribution and to create a warm canopy of light for the ground-floor space, explains Bellamy. Additionally, twin-headed Nyhavn were installed adjacent to the café area, to match the wall-mounted fittings and to provide continuity of design.

Additional low-level, external brick lighting and circular-recessed luminaires were positioned below the wall-mounted lights to provide additional illumination and emergency lighting coverage for the space.

‘The lighting concept for “the street” was to have a warm but external feeling to the space, providing a synergy with the building’s outside areas, and creating a transient environment that building occupants could use for breakout sessions as well as general circulation,’ says Bellamy.

Lighting for the main, open-plan stair-case was an integral part of the lighting design for the atrium, linking the atrium to all of the floors of the ‘brick house’. Louis Poulsen’s Satellite pendants, with 1 x 42 W CFLs, again were used to provide a warm ambient lighting effect and to complement the luminaire in the adjacent library space. The fixtures were suspended up high, to follow the line of the stairway as it climbs upwards.

The open bridges crossing the space were lit using a bespoke, extruded aluminium, linear fluorescent luminaire, mounted below the handrail balustrades to achieve a discreet, low-level lighting solution that focuses light onto the bridge surface.

Outside, between the building and the car park area, Louis Poulsen’s Nyhavn Boulevard Post fixtures pick up the theme from ‘the street’ lighting solution, creating a consistent visual flow into and out of the building.

Kipp single-headed and doubled-headed, Nyhavn Post fixtures, also by Louis Poulsen, were used for the car park and rear access road, primarily because of their aesthetic appearance and to complement the Kipp Bollard luminaires used for general pathway lighting. The higher-than-average height of the bollards enabled increased spacing between fittings.

Louis Poulsen’s Pharol uplighters, using either metal halide lamps or CFLs, were installed in selected areas to provide feature uplighting of tree canopies and to uplift the small section of the building’s main entrance façade below its ‘glazed bubble’.

This is a building in which the diversity of spaces reflects the diversity of working styles. But the overarching aim was a convivial environment, conducive to collaboration and the exchange of ideas. Fluid and organic, it has a sense of cohesion. Throughout, carefully integrated and well-considered lighting is the subtext of that message.

Jill Entwistle Editor and writer specialising in lighting design.

The building consists of two key components. The ‘brick house’ is an orthogonal block facing the campus road (south), which houses most of the classrooms, lecture theatres and IT rooms, with offices on the third storey. There is also the informal organic side, ‘the timber house’, which overlooks a newly created lawn and a Georgian villa called Trumpton House.

This wooden building faces north and primarily houses the double-height library spaces, with two mezzanine levels which form the first floor areas of the library. The second floor contains offices and an art room. The library is positioned on the north side of the street, depressed into the lawn along the edge of the trees so that it gets glare-free northern light. Along the south side, flexible classrooms, seminar rooms and office spaces form a structured backdrop to the high side of the existing Homerton College.

The brick and timber components are linked by a four-storey, full-height central atrium space known as ‘the street’. This day-lit space winds through the site linking the reception entrance to the east with the Trumpton House garden to the west. At the west end of ‘the street’ is a café area and an open-plan lift shaft serving all floors of the brick house.

A grand, three-storey high open-tread staircase hung from the atrium roof provides primary access to all floors, but is modest in the space it occupies. On the upper level, two bridges span the atrium to connect the floors.
Sunrise Tower is the first of a number of planned high-rise blocks in the Leutschenbach commercial district in northern Zurich. The interior of the building was designed by HCInternational who has mainly opted for Louis Poulsen.
Sunrise Tower is a striking building whose double towers stand 49 and 53 metres high. The towers emerge from the 25-metre building that forms the base of the complex.

The choice of architectural effects is limited to simple elements and few materials. The windows are illuminated at night as a contrast to the dark façade. By day, the merging colours from the open and closed parts of the building endow it with a monolithic character.

The minimalist reception area is lit by LP Centrum fixtures, designed by Kurt Nørregaard, on the basis of Poul Henningsen’s initial sketches. Ballerup Micro, designed by C. J. Nørgaard Pedersen & P. Hougaard Nielsen, are mounted in the ceiling.
LP Charisma King fixtures, designed by PLH Design, are used in the lounge areas. The internal reflector technology casts the majority of the light downwards. The shades stop glare and spread the light horizontally, generating a sparkling effect in the transparent cone. Different architectural details are underlined by the Nimbus fixture sunk into the floor.

Conference tables are illuminated by Plate, designed by Vesa Honkonen and Julle Oksanen. This fixture emits indirect, soft and diffuse light. Two layers of sand-blasted glass with a laminated core transmit the light horizontally and vertically, which brings out the shape of the glass.

Various architectural details are underlined by the Nimbus fixture sunk into the floor.
The canteen is illuminated by PH Snowball, drawn by Poul Henningsen in 1958. The eight shades’ positioning and their curved shape produce a unique lighting effect. The pendants are supplemented by the Ballerup ceiling fixture, which generates a symmetrical, downward light.
Modern-day Stavanger’s status as a centre for growth in Norway can be attributed to the success of the oil industry. This positive trend is also evident in its architecture and outdoor spaces, with architects and the local authority enjoying greater freedom to explore their creativity.
Stavanger is in the most south-westerly part of Norway, at a point where only a wide peninsula protects the city from the North Sea and the stiff westerly wind. The city used to be an important fishing port, complete with canneries, shipyards and other traditional industries. The city has enjoyed huge growth since oil was discovered in the North Sea in the late 1960s, however, and these days, as well as being the fourth-largest city in the country, Stavanger is also Norway’s undisputed oil capital, as witnessed by the presence of Statoil’s headquarters, which employs 4-5,000 people, in the middle of the city.

Statoil held an architecture competition in 1998, the aim of which was to design a small house for hospitality, guest visits, seminars and meetings. The idea was to provide staff with an opportunity to hold seminars in a stimulating...
location, far from the pressures of daily business, which would mean fewer interruptions and greater freedom to come up with new ideas. The plot of land selected faced the beach in a holiday-home area in Sola, some 20 km south of Stavanger and not far from the airport. The competition was won by the local architecture company Haga & Grov, which then took over the actual project planning.

The whole project took six years to complete, partly due to the fact that it was built on a greenfield site among existing holiday homes, which meant extra demands on planning permission and repeated alteration of the plans. The very understated architectural idiom of the design pays due heed to the site and to the neighbours. For example, unlike many of the neighbouring houses, the building is only one storey high and has an almost flat roof, covered in local flora that almost looks as if it has grown there naturally.

House with two different sides
As well as various meeting rooms and a dining room for 30–40 people, the house also contains six bedrooms with en-suite bathrooms. The building is divided into three zones. The first is a large, longitudinal central passage with room to meet and chat in small groups. This foyer-like area, which serves as the spine of the building, affords access to all the other rooms in the house. Towards the sea is the second zone, which contains the communal facilities, such as a room with an open fireplace, a dining room and a number of meeting rooms. These simple elements are almost like separate cubic wooden units linked to the central passage.

On the landward side is the third and more private zone, featuring bedrooms, a kitchen and rooms for various technical installations. This subdivision was entirely deliberate. The house opens up towards the sea and the magnificent scenery, while towards the cultivated area to the rear, the idiom is more discreet and neighbour-friendly. This subdivision into functions is also expressed in the different types of materials used.

For the exterior walls and dry-stone walls towards the road and the open fields, raw rough-hewn ashlar has been used, a greyish stone from a quarry in Ryfylke, north-east of Stavanger. The roof has a cast concrete cover, topped off with a layer of earth that has been sown with seeds from the same kind of indigenous plants found in the adjacent fields and beach meadows. The house’s energy needs are partly met by geothermal sources, a unit for which is found in the small, closed extension beside the main entrance. The façade here is covered in brick – another local reference, as the area near Stavanger has historically been renowned for its brick production.

The façades on the beach side utilise laths of heartwood from pine trees, mounted in such a way as to resemble a trellis. These wooden slats retain their yellowish warm shade thanks to a semi-gloss surface treatment. In addition, large glass surfaces serve both to flood the building with light and to endow it with an open and inviting character when viewed from the beach. After the construction was completed, the surrounding terrain was restored to its previous state, so the sand dunes on one side and the wild flowers on the other reach all the way up to the building.

Classic interior design
Indoors, the guesthouse is characterised by an honest use of materials. Natural stone from Ryfylke and concrete are both
Parts of the sea-facing walls are covered by pine laths, producing a trellis effect. The wooden slats retain their warm, yellowish shade thanks to a semi-gloss surface treatment.

The WeeBee LED fixture mounted on the walls produces a subdued, energy-efficient light at the entrance.
Honest, natural materials also characterise the interior. The floors are made of oak and the walls of birch.

Arne Jacobsen’s Munkegaard lamp (AJ Cirkul) is used liberally throughout the Statoil Guest House. The fixture was developed for a Danish school of the same name in 1958. Munkegaard (AJ Cirkul) resembles a glass plate that hovers just below the ceiling. The opal dual-layer glass is uniformly illuminated and produces a soft, diffuse light.
visible on many parts of the frontage. Light wood is used for the interior floors and walls: specifically, oak for the floors and birch for the walls. The big central foyer features a concrete floor that has been honed and treated with oil, and also houses one of the many works of art found inside the building and in its grounds.

The furnishings are further evidence of the architects’ desire to emphasise the use of natural materials. Børge Mogensen’s Spanish Chair, for example, fits in perfectly with this environment of stone, wood and sand. Similarly, chairs, sofas and tables by Arne Jacobsen and Hans J. Wegner have been used in both conference rooms and the dining room. The Oxford chair, for example, is upholstered with light-coloured leather and is the perfect choice for visitors to the big auditorium-like meeting room, which offers an unimpeded view of the North Sea.

The interior lighting is characterised by the design principles of the old masters. Arne Jacobsen’s lamps in particular have been generously used in the rooms. The Munkegaard lamp is used in several places (e.g. on the ceiling in the dining hall), and the AJ lamp, in both floor and wall versions, can also be found here and there. For the grounds in front of the building, Haga & Grov faced the challenge of further downplaying the institutional nature of Statoil’s guesthouse. The surrounding landscape and holiday-home area is conspicuously lacking in significant artificial light, but in order to guarantee that guests and staff would be able to orient themselves on arrival and departure, some exterior lighting was necessary.

The architects deliberately avoided installing outdoor fixtures on poles, so the discreet lighting in front of the house consists of semi-submerged Dome fixtures, which light up the stone walls, and of small WeeBee lamps inserted into the dry-stone wall by the parking area. Along with the light from the windows in the guesthouse, these are sufficient to provide subdued but effective outdoor lighting. In keeping with the nature of the rest of the project, the lighting is characterised by gentleness and respect for the surrounding nature and landscape. This makes for a house in which tradition and nature are living elements.

STATOIL GUESTHOUSE, STAVANGER
BUILDING CONTRACTORS: STATOIL ASA
ARCHITECT: HAGA & GROV AS, SIVILARKITEKTER MNAL
ENGINEER: BOYE OG WÅGE AS
HVAC ENGINEER: VVS DESIGN AS
ELECTRICAL ENGINEER: MJELDE OG JOHANNESSEN AS
ENGINEER: ORIGO AS
LANDSCAPE ARCHITECT: ORIGO AS / HAGA & GROV AS, SIVILARKITEKTEN MNAL
INTERIOR DESIGNER: HAGA & GROV AS, SIVILARKITEKTEN MNAL
Not just a professional partnership but a personal one too, the architects Hilde Haga and Rune Grov designed their own home. Built some six years ago, the house occupies a somewhat unusual location – a small, steeply sloping piece of land parcelled out from the neighbouring plot. In fact, there is a 45° slope from one corner of the house to the diagonally opposite one. The result is a tower-like three-storey house, covering an area of 60 m². Located in a residential neighbourhood consisting mainly of houses dating from around 1970 and redolent of their era,
Haga and Grov’s house sticks out somewhat. It is a functional house, so practical and thoroughly thought out in its solutions that it is vaguely reminiscent of Le Corbusier’s idea of the home as a ‘living machine’. Several factors have influenced the distinctive design of the roof. It is partially an attempt to exploit the restrictions on the building’s height, and partially a result of the couple’s wish to minimise the use of guttering and drainpipes as much as possible. The latter has resulted in a roof that slopes in towards the middle from three sides, and slopes out towards one of the long sides, where a single gutter leads water away.

The entrance is on the middle floor, which also features children’s rooms and a television room/library. If you go downstairs you will find a bath, laundry room, the parents’ bedroom and one other small room, which can also be used as a study, from whence there is direct access to the bottom part of the garden which opens onto a public path. If you go up the stairs to the top floor you will find a single big, bright living room with a kitchen at one end. Light pours into the third floor from all directions, with the windows offering views of the forest and lake. The room also extends onto a small balcony. The outside of the whole building is covered with untreated Siberian larch, which patinates in a light greyish tone as time goes by. The interior walls are either plaster, concrete or birch plywood, and the floors are either concrete – as on the bottom floor, where underfloor heating from embedded electric cables minimises the cold from the earth – or pine planks, as on the two other floors. The interior features a great deal of classic Danish designer furniture, such as the Y chair, the lattice sofa and Arne Jacobsen’s Seven chair. The lighting is also very Danish, with the AJ lamp in both floor and wall versions, AJ Eklipta lamps on the walls and in the ceiling, and a couple of PH lamps.

The architecture matches the interior design, which is simple and functional. Arne Jacobsen’s floor lamp, originally designed for the Royal Hotel in Copenhagen, provides atmospheric light in the living room.
A stairway leads from the tiled floors of the lower level up to the living room and kitchen.

As dining table pendant Haga & Grov chose PH 4/3.
The building is in a privileged location, with a unique view of the beautiful, undulating terrain.

Below: A PH 4/3 table lamp produces harmonic, glare-free light in the living room.
Stavanger has always been a seaport, and remains one to this day. The modern city consists essentially of a 25-km built-up strip along the Gandsfjord. The oldest area of the harbour is the innermost part – the small Vågen bay, close to the old town, with its steep, narrow streets and low, white-painted wooden houses. It is in this part of the harbour that Stavanger Council has established the Blue Promenade, a path along the inner quays that stretches for approximately four kilometres. The promenade, which links Bjergsted culture park in the west to Badedammen in the east, is fitted with benches along its length and incorporates a series of recreational facilities. The route is paved with flagstones and flat bricks of various types, and at night, the edge of the quay is marked by blue light. Along one part of the promenade, the lighting consists of Pharo LED lamps, which are level with the surface. For the rest of the route, a matt-grey version of the Waterfront bollard supplies the light that marks out the Blue Promenade route and the quays. The Blue Promenade is just one part of ongoing efforts to raise the profile of Stavanger, which will culminate in 2008 when it serves as the European City of Culture. To mark the occasion, a major architectural project called Norwegian Wood will be launched. The project takes as its starting point the fact that the largest old wooden housing development in North Europe is located in Stavanger. A number of new exhibition buildings will be ready by August 2008, and will, in conjunction with the old wooden houses, form one big communication initiative that trains the spotlight on modern, high-quality and environmentally friendly architecture that uses wood as a building material.

Thomas Dickson is an architect and research associate professor at the School of Architecture in Aarhus.

Pharo marks the waterfront

Blue Promenade

With the help of beautiful coverings and a kilometre-long strip of semi-submerged lighting fixtures, Stavanger Council has found a beautiful way to mark out the quays in the inner harbour.
The approximately four-kilometre-long promenade is marked out by semi-submerged Pharo fixtures.

With its downward light, robust construction and maritime design, Waterfront is specifically designed to illuminate places like harbours and ports.
When BDP was commissioned to design two City Academy schools in Bristol, they wanted to break free of the traditional category rated luminaries. The head of BDP’s lighting division, Martin Lupton, led the project from the conceptual stage and his team spent three years developing a unique light fitting that may become the new standard for the way schools and classrooms are lit.

“Scientist, philosophers and artist have been studying the effects of light and vision for thousands of years. Although lighting is a subjective issue, it is now accepted that lighting design is a combination of science and art. Lighting that is sensitive to its non-visual effects – on the users, the material and the architectural space in which it is used – creates places people want to be,” Martin Lupton launches into this conversation about the Skole fixture.

**Lighting affects more than just what we can see.** A third type of photoreceptor in the retina turns light energy directly into brain signals without passing through the rods and cones in the eyes. The so called ‘intrinsically photosensitive ganglion cell’ may explain why some people who are functionally blind can still adjust their biological rhythms.

BDP’s unique design – The Skole fixture – has been developed to offer integrated daylight control, simple maintenance and specific photometric performance for a price that is affordable on all school projects.

**BY IDA PRÆSTEGAARD**
to match the day and night of the external world. It is believed that these cells play a role in setting the body’s internal clock as well as a variety of other functions where all the brain needs to know is how bright it is. The study of the non-visual, systemic effects of light clearly demonstrates that light can influence human mood and behavior.

“Classrooms lit by traditional and category rated luminaires face the same challenges as today’s offices: poor vertical illumination, harsh shadows and dark upper walls and ceilings.

In BDP, we prepared a demanding brief. The design team set a clear objective to incorporate integrated daylight controls. The unit needed to distribute light in a controlled way and achieve the targets of 300 lux on the horizontal plane for normal teaching spaces and 500 lux for science/art rooms, both with a vertical illuminance of 200 lux. The optic had to redirect and dissipate the lamp image to reduce glare and to cast a limited amount of light upwards,” Martin Lupton explains.

After careful consideration, the T8 lamp was chosen for its cost-effectiveness and low maintenance. A combination of single and twin 58 W T8 lamps enabled both the 300-lux and 500-lux light levels to be met with a single light source in most standard sized classrooms.

Most of the schools BDP architects were working on had exposed thermal mass. They required simple fittings that were capable of being surface-mounted, suspended on wires or fixed on to a standard 50 mm x 50 mm electrical trunking.

**BDP selected Lois Poulsen** to team up with and prior to producing the first prototype, Louis Poulsen was able to predict its photometric performance using advanced optical modeling techniques.

The luminaire has a co-extruded polycarbonate optic fixed to a simple folded steel body. The optic has two parts: a diffuse opal element for gentle uplight to the ceiling and a custom-designed prism system that controls and distributes the light in the vertical and horizontal planes. An integrated photocell generates a closed control loop that can respond to daylight by automatically dimming the lamp. The fixture is named The Skole fixture since skole means school in Danish.

The first 400 units are installed and BDP is already looking at taking it further. The product design has been refined and improved by Louis Poulsen. BDP is working towards developing new standards for all aspects of classroom design including developing its own targets for incorporating daylight into classrooms. “If we are to address the non-visual requirements of people in a sustainable way then we need to design buildings or facilitate lifestyles where we get a much higher exposure to natural light. Our artificial lighting must respond to the use of natural light to maximize the benefits,” Martin Lupton concludes.

Ida Præstegaard is the editor of NYT and an architect.

The Skole fixture has just won The Sorrell Foundation School of the Year Award. Earlier in 2007 it also won a RIBA Award, RIBA National Award and was Shortlisted for the RIBA Schools Award.
Visiting Kyoto, the historical city that was the capital of Japan from 794-1868, is a special experience even for many Japanese people. Numerous temples, shrines, gardens, houses and restaurants, designed in traditional styles and displaying the beautiful characteristics of Japanese life, art and architecture, have been preserved and are still used for daily activities. Even though some old styles that were prevalent in the past are still evident, the design essence, based on simplicity, is clearly connected to contemporary Japanese modern style. The core of traditional Japanese architecture in Kyoto has been an inexhaustible source of inspiration for many architects and designers.

Tawaraya, a nearly 300-year-old Japanese inn located at the centre of Kyoto City, is one such place where people can experience the core of Japan’s beauty: the rooms with highly sophisticated design, the always refreshing minimalist gardens, the arrangements of flowers and art work moderately displayed, and the finest meals served in an elegant manner. However, it does not do it justice simply to describe it as a beautiful, traditional inn in a tourist city. Beyond the quality of services offered, guests feel that staying at this inn allows them to experience a distinctive culture, and they naturally feel that their sense of the art of living is refined as a result.

From the street, Tawaraya appears quiet, with a small, modest entrance. But once you step into the entry, with stone ground cleaned with sprinkled water, a special atmosphere begins to surround you; a cozy atmosphere created by old, but well-maintained, natural materials such as wood, paper, Japanese earthlike plaster etc. These have been used harmoniously for flooring, walls, ceilings and sliding doors, emanating a poetic calmness. The interior design is essentially based on a traditional style, but

In Praise of Light

By Shinji Aratani

In this 300-year-old Japanese inn – a Ryokan – one can experience the innermost essence of Japanese culture. Its character is expressed in the simple architecture, the minimalist interior design and in the cultivated gardens. Most importantly, the beautifully choreographed light is closely tied to the soul of the house.

On their way to the rooms, guests pass a small courtyard decorated with seasonal flowers.
The stone-covered entrance radiates Tawaraya’s beauty, aesthetics and poetry, and invites guests to surrender to the building’s tranquil atmosphere.
also, strangely enough, a touch of modernity is somehow palpable. The staff at the inn warmly welcomes guests, and after the guests take off their shoes, they are guided to their rooms. Before reaching their rooms, guests pass by a small courtyard garden with a beautiful arrangement of seasonal flowers. Even though the garden is small, it gleams because of its skylight; it is a central focus of attention, surrounded by relatively dark wooden corridors.

All 19 rooms in the inn have been renovated individually, and on more than one occasion, to meet the requirements of current living standards and functional use, and to provide the highest level of comfort for guests. The ideas and details of the renovation are designed by the owner Toshi Satow, and all the work was completed by skilled artisans. Satow does not insist on incorporating only traditional styles in the renovations. For instance, to attain a wider view of the garden, one of the rooms was extended with a transparent glass wall, which looks like it is lightly floating off the ground and thus freed also from the conventional heaviness to which traditional style often falls prey. This lightness might be one of the reasons why guests always sense a touch of modernity in this inn.

To obtain the lightness, the creation of feeling of the light can be a key. Japanese houses traditionally have incorporated deep eaves to prevent direct sunlight from entering into rooms. Instead, it is leaves, stones, mossy ground or water in garden ponds that reflect the daylight and bring brightness into rooms. Therefore, the beautification of interior spaces largely depends on how the feeling of the space is successfully expressed with the help of light from the garden. Every room at Tawaraya has been positioned to face its garden space. And the delicate design of screens and blinds around windows, as devices for the...
minute adjustment and shading of light and for protecting the privacy of each room, is one factor that characterises the whole image of the rooms. The size, position, proportion and material for the vertically sliding paper screens and reed blinds have been carefully selected. The Japanese paper often covers a part of the ceiling and wall around the windows to obtain a warm reflection of light.

Another example is the space called ‘Ernest Study’, which was refurbished in memory of the late Y. Ernest Satow, a photographer and Toshi Satow’s husband. This library-like space, which is open to guests, includes an art book collection and photographic works by Y. Ernest Satow. Here, together with some of the masterpieces of modern Danish furniture, Louis Poulsen’s light fittings have been used in harmony with the Japanese atmosphere. And it is the subtle treatment of light that provides the room with a sense of lightness. Due to the conditions of the room’s location, i.e., it could not face the garden on the ground level below, a hollow corner was made under the eaves and some greenery was planted. From inside the room, this corner looks like a small greenhouse or ‘light box’. The actual amount of light coming through this box is not great; however, the feeling of light that the foliage reflects in the small hollow is effective enough to conjure up a bright and relaxing atmosphere. Toshi Satow said that it was not the abundance of light itself, but it was important to make people feel the light, which is what she aimed for in the restoration of this space.

The attitude in Japanese culture that maximum effect must be obtained with limited space may be the background for its simple and decent design of architecture, interior settings and art in general. The same attitude has been applied to the design of Tawaraya, which is situated in the midst of the dense, old city of Kyoto; here, there is a strong will to create comfort and beauty. Guests will realise that the beauty of simplicity and decency outstrips the eloquent gorgeousness in this country. In Japan, there are quite a few design-oriented hotels and inns, merchandising with a traditional Japanese interior style. However, it is obvious that Tawaraya differs from many of the others in that its room design is not an artificial setting detached from daily living. Tawaraya’s design is not a goal in itself; it incorporates a sophisticated process to reach comfort in beauty.

Shinji Aratani, Sales & Marketing Director of Louis Poulsen Japan.
The Japanese element in the Ernest Study comes partly from the use of daylight, which is controlled here with the help of the courtyard garden’s architecture and greenery.

The ceiling is covered with Japanese paper from Kyoto. Strata Micro (AH Exakta Micro), complete with dimmers, are mounted in the ceiling.
New York City’s Battery Park is located on the southern tip of Manhattan. The 23-acre park is one of the city’s oldest public spaces and it is visited daily by thousands of tourists, office workers and neighbourhood residents. Despite its waterfront location and historic significance, Battery Park had suffered from years of neglect.

The Battery Bosque: A park-within-a-park
At the forefront of the renewal of lower Manhattan is The Battery Bosque. Encircling 4 acres of Battery Park, this area featured cracked asphalt and rows upon rows of worn, broken benches. After sunset, the area became dark and foreboding.

Warrie Price, The Battery Conservancy president and visionary behind the parks transformation, commissioned a renowned design team, including garden designer Piet Oudolf, landscape architects Saratoga Associates, architects Weisz + Yoes and lighting designer Linnaea Tillett to create a world-class horticultural destination.

The Bosque Reconstruction
Landscape architect Laura Starr, (at the time principal in charge of the Bosque Reconstruction, now of Starr Whitehouse Landscape Architects and Planners PLLC) imagined the verdant forests and marshes that greeted Dutch explorers to the area 400 years ago and asked, “How can we recreate this natural abundance in a place traversed by millions of visitors a year that is also used for events, and picnicking? How can the design provide the experience of meandering and exploring, feeling soft ground under foot – being in a romantic world apart from the surrounding streets – and be sustainable and maintainable?” With this thought as inspiration, the design team worked together to create a series of garden rooms joined by paths that wander through a grid of 140 London plane trees. In the spring of 2003, The Battery Conservancy presented this plan to The New York City Department of Parks and was awarded $8 million for renovation.

“Connecting lighting and landscape
A key part of the reconstruction was a
lighting plan that encouraged the use of the park after dark. Lighting designer Linnaea Tillett was brought in early during the conceptual stage to help create an identity for the park through illumination. The existing post-top lanterns along the waterfront would provide way-finding lighting, but there was no connection between the elements – the lighting, the horticulture and the landscape architecture.

"By illuminating elements of the landscape like the plantings, the fountain and the kiosks, we were able to create a sense of place," says Linnaea Tillett. "The bosque bollard knits together the park's elements."

The Bosque Bollard

The bollard fixture grew out of several needs. The space needed a visual attraction that would catch the eye from a distance. The lighting needed to create a sense of intimacy and discovery to draw people into the space as well as complement the plantings and bring them to life at night. It had to function on multiple levels, withstand extreme weather conditions and be easily maintained.

"Part of the project was to figure out how to take all of the points of view – things that you think ought to be true – and coalesce them into a fixture," says Linnaea Tillett. An enormous amount of analyses was done in order to convince New York City authorities of the feasibility of using bollards. "New York City does not use bollards – fear of vandalism," comments Linnaea Tillett. Maintenance of the bollard impacted the way they were designed and placed. The fixtures were integrated into the planting beds, creating an "island of safety" that meant you had to walk through the plants to get to them. The bollard was designed to be simple, removable and extremely rugged.

Setting new standards

What would last in a public space? The design team turned to Louis Poulsen with their specifications. It was crucial that a reputable company could manufacture all of the standards set for the bollards. "We had to vouch for the fact that the company that made them would stand behind them. And that was a significant part of the reason for choosing Louis Poulsen," says Linnaea Tillett.

THE BATTERY BOSQUE PARK

CLIENT: NEW YORK CITY PARKS AND RECREATION DEPARTMENT; THE BATTERY CONSERVANCY

LANDSCAPE ARCHITECT, TEAM LEADER: SARATOGA ASSOCIATES

ARCHITECT: WEISZ + YOES

HORTICULTURAL DESIGNER: PIET OUDOLF DESIGN

LIGHTING DESIGNER: TILLETT LIGHTING DESIGN

Battery Park is on Manhattan’s southern point, and offers views of Staten Island and the Statue of Liberty.
Originally, Zirkon was customised by the architectural firm of C.F. Møller for the University of Aarhus in Denmark which needed a contemporary new ceiling fixture as general corridor and room lighting.

The idea of Zirkon is to produce a simple, pure fixture with diffuse light distribution, ideal for walls and ceilings.

Zirkon features a precise, monolithic shade, and appears as a fine, illuminated disc that shields the outline of the light source completely. The suspended acrylic disc appears to be floating in the air, elegantly illuminating the ceiling surface. The disc achieves its characteristic appearance from the space existing between the luminous centre surrounded by two differently illuminated outer zones framed by a matt, diffusely luminous edge.

Installation of Zirkon is extremely fast and easy. It comes in three sizes: Ø 199, Ø 251 and Ø 283mm. The Zirkon shade is made from serigraphed, semi-transparent polycarbonate. The fixture is fitted with 1x35W HIT CRI G12 HF or 1x26/32/42W TC-TEL HF.

As his point of departure, Hadi Teherani set out to reinterpret the classic downlight. Another goal was to create a distinct fixture that would underline the power emanating from the light source while also completely shielding it off for direct view.

The result is a very coherent fixture, one of its characteristics being a solid metal ring produced from the material used for the downlight reflector. The fixture does not seek to hide in the ceiling, but rather manifests itself as a decorative element. Teherani is perfect as general lighting, but will also be ideal as supplementary lighting in, for instance, offices, libraries as well as meeting and conference rooms. The downlight fixture may also be used in secondary rooms such as corridors and stairways. Teherani is made from aluminium with satinated, matt metallic surface. It comes in two sizes: Ø 238mm and 275mm. Teherani is fitted with 1x26W TC-TEL HF, 1x32W TC-TEL HF or 1x42W TC-TEL HF.
The underlying idea of Transair is to create a series of spots suited for illumination of art in the pure, unadorned rooms you often see in museums and galleries. But in addition to art exhibitions, spotlights are used in many other settings, and the designer therefore wanted to develop a spotlight that would also fit into private homes.

Ross Lovegrove endeavoured to create a fixture with personality while still exhibiting a discrete and tranquil design. Transair has a modern, bold and sophisticated design. The transparent arm sets the fixture apart and is almost invisible in the room thus leaving the fixture to hover. The arm encompasses a calibration system with a trigger, offering technicians easy and efficient access to precise adjustment. Ross Lovegrove and Louis Poulsen cooperated with Japanese company Yamagiwa in developing Transair. Transair is made from die-cast aluminium, the arm from clear polycarbonate. The fixture comes in light grey, orange or white. Transair is fitted with 1x75W low-voltage GY6, 35 or 1x35W HIT CDM-T G12.
The two first Enigma pendants won extremely high acclaim in the market. All over the world, a multitude of people has in their interior design opted for the original fixtures, which create an illusion of illuminated wings floating in the air. The pendants found their inspiration in Japanese lighting culture and share the lighting philosophy of glare-free, comfortable light with all other fixtures from Louis Poulsen. From the first stages at the drawing table, the designer worked with different sizes. Enigma 425 is a flexible fixture suited for private homes, whereas Enigma 825 was designed for large rooms. The new Enigma 545 combines the best qualities of the first, two pendants. The new five-shade pendant displays a well-balanced, beautiful shape, ideal for both large and small rooms – in private homes, conference rooms, restaurants, stores and banquet halls. Despite its completely pure design, Enigma 545 has an extremely sophisticated and superb light distribution. As the other pendants of the series, Enigma 545 emits both indirect light – light reflected by the shades – and agreeable, direct light, as the shades diffuse soft light, dispersing it into the entire room. Held together by an ultra-thin steel wire, the shades are acrylic with matt surfaces – a unique finish for acrylic which achieves the optimum, soft diffuse light. Its shades’ lower sides are polished, and the conical fixture heading made of brushed aluminium. Enigma 545 is fitted with 1x50W QR10. The reflector light source comes with the fixture.

New addition to Japanese-inspired fixture series

Design: Shoichi Ushiyama

Classic PH fixtures in new finish

Designed late in the 1920s, PH 3/2 table and pendant represent a highly decorative fixture series, which has, since its relaunch almost 10 years ago, enjoyed great demand. On the occasion of Poul Henningsen’s 100 anniversary, Louis Poulsen launched the PH 3/2 series in a burnished version, but it has since then only been available as our standard fixture – high-lustre chrome-plated. The fixtures are now available in new, black chrome-plated finish, which allows them to be used in even more settings. The new black chrome-plated version displays a supreme graphical and distinct idiom, which will underpin the interior design of any environment. The fixtures may be used individually or supplement each other in settings calling for illumination with a warm glow. In manufacturing the PH 3/2 in black chrome-plating, Louis Poulsen always observes outstanding craftsmanship. The three shades are made from mouth-blown opal glass, polished on the outside and matt on the inside. The table fixture is 472mm high, the pendant 242mm. The largest shade of both versions measures Ø 286mm.

(Will be launched in the US in 2008).
Relaunch of classic large-room pendant

The LP Centrum pendant was designed for large rooms, based on Poul Henningsen’s original drawings and completed by Danish lighting designer Kurt Nørregaard. Louis Poulsen has not marketed the pendant for a number of years, but it was previously known in our range as Memory. LP Centrum was made to illuminate very large rooms, and in such settings, the fixture unites excellent lighting qualities with extremely favourable operating costs. Its simple, classic design enables complete shielding of the light source coupled with superb light output and luminous efficacy.

LP Centrum is related to PH Snowball and PH Louvre, both conceived by Poul Henningsen in the 1950s. LP Centrum works on the same principle of mirroring reflection but is – due to its design – particularly suited for very large rooms.

LP Centrum is especially ideal for illuminating high-ceilinged rooms, such as conference halls, audience rooms, foyers, railroad stations and shopping centres.

The LP Centrum shades are made from spun aluminium. Its frame is extruded, anodised aluminium. The fixture comes with a four-meter cable and canopy. LP Centrum is fitted with 1x150W HIT G12 HF.

LP Hint – flexible post lamp in pure design

In its design, LP Hint is the epitome of simplicity. But simplicity hides perfection as even the minutest aspects of the fixture head were designed in detail.

The designer found inspiration for the shape and design in glasses and clothing. Pleats and folds from dresses combined with light refraction in glass are all ingredients, which young Swedish industrial designer Helena Tatjana Eliason integrated into the LP Hint post fixture. LP Hint post fixture is a complete, compact lighting machine. Behind the simple exterior, it stores pole connection, ballast, reflector and adjustment facilities. LP Hint was designed to accommodate easy, fast maintenance, so Louis Poulsen carries over the LP Icon Mini concept – tool-free light-source replacement.

LP Hint is available in two basic versions, one with a completely closed surface and one with an opal top shade, which helps to illuminate the actual fixture while also functioning as directional pointer in, for instance, hilly areas. Shades are available in clear glass mounted in the fixture or as a lowered shade, so that the fixture points an illuminated edge downwards. This edge helps indicating directions and also lends decorative effect to places where illumination should be more than merely a discrete aspect of the surroundings such as pedestrian streets and paths in urban environments.

LP Hint comes with fixture head in painted aluminium with sprayed, textured surface. Its diffuser is made of opal flow-formed acrylic. The reflector is metallised, flow-formed polycarbonate. Fixture housing is cast aluminium. Shades come in hardened, clear glass or flow-formed acrylic. LP Hint is available in three variants: Basic, Opal or Opal with shade. LP Hint can be mounted on poles measuring Ø 115mm or Ø 60mm. (Will be launched in the US in 2008).
New fixtures in light and unpretentious design

In introducing the Flindt series, Louis Poulsen strikes a light cord in the company’s fixture range. The Flindt series came about in partnership with Christian Flindt – a young designer who has, through his original and highly expressive design idiom, quickly made a name for himself nationally and internationally.

The new fixture series – two pendants and a floor lamp – display a refreshing and novel idiom in innovative materials. Christian Flindt achieved the unpretentious look without compromising on the tough material and detail requirements Louis Poulsen poses to all fixtures. And Flindt more than meets the Louis Poulsen requirements to light distribution, the keys to creating comfort and ambiance.

**The Flindt series’** utterly simple geometry coalesces with a high degree of visual complexity. The dual shades encompass a cylinder and a truncated cone, both weaved in white, matt vinyl string. The weaving technique fashions a three-dimensional, transparent idiom, and patterns interchange when you view the fixture from different angles.

**The Flindt fixtures primarily generate** direct downlight. The white, matt strings prevent glare from the light source. The fixture head appears as a shining, transparent cylinder emanating diffuse and soft light into the room. Five acrylic wings create the fixture head structure. The wings also outline the fixture shape, being visible as measured, shining slits in the cylinder.

The Flindt series’ numbers two pendants with fixture heads of Ø 220mm and Ø 475mm. Flindt 220 Floor is 1,395mm high and comes with a fixture head measuring Ø 220mm. The weaved string is made from extruded white, matt vinyl. The wings are made from injection-moulded acrylic. The floor lamp foot is die cast high-lustre black zinc, while the stem is extruded high-lustre black steel. Flindt 475 Pendant is fitted with 1x100W incandescent lamps, Flindt 220 pendant and Flindt 220 Floor with 1x60W. The three fixtures may also be fitted with energy-saving light sources.
Louis Poulsen has been acquired by the Italian lighting group Targetti Sankey SpA. Like Louis Poulsen, Targetti Sankey produces and markets high-end lighting products. Its main markets are middle and southern Europe and the USA. The new merged company has adopted the name Targetti Poulsen, effective 7 September 2007. The two companies supplement each other extremely well in terms of both products and markets. Targetti Poulsen looks forward to an exciting future in which our combined strengths will make the new company an attractive partner for professional and private customers all over the world.