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adf incorporating Building Projects magazine, architectsdatafile.co.uk and @architectsDF

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Annual subscription costs just £48 packing. Phone 01435 863500 for details. Individual copies of t publication are available at £5 each inc p & p. All rights resen

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FROM THE EDITOR



The Ministry of Housing has embarked on a review of the architecture profession, aimed at "modernising regulation, improving diversity and upholding the UK's global reputation in architecture." This is being driven by the post-Grenfell Building Safety Bill, as well as a range of other factors, and the first phase is a 12-week consultation covering regulation of architects, and the role

While the MHCLG is wise to involve the industry, The ARB is in the meantime conducting its own consultation process with the profession, to develop a good practice scheme for architects as their role in refereeing design safety issues on projects comes into greater focus. The Government launched a 'call for evidence' in mid-August for both architects and "built environment professions" on the role of the organisation now and in the future, and the ARB is putting a reassuring face on its newly weaponised role under the Building Safety Bill. It will be able to kick architects off the register if they fail to meet new competence standards, so no doubt many architects will be putting many searching questions to the body during the consultation.

The ARB is stressing the positives in its new set of proposals – how they will "improve overall competence in the profession," and it "won't be about catching out individuals." It also won't be a one-size-fits-all approach, they say, but will be "tailored by architects to their own practice and needs." The scheme will encourage architects to "reflect, plan, act and evaluate on their learning activities in a way that is relevant to their practice and development needs."

The board reckons that raising the game on safety competence means a "proportional and deliverable" process, with its research showing that 70% of architects are "committed to carrying out dedicated CPD annually." In addition, there will be a focus on avoiding duplication with existing schemes (and we have to hope that MHCLG's review won't get mixed up with ARB's on that basis!).

Welcoming the wide-ranging review by MCHLG, Niralee Casson, senior architect at Assael Architecture said that with Covid having shown how flexible, adaptable and resilient it could be, working from home also pointed to how accessibility into the profession could be increased. "Seeing diversity and inclusivity tabled alongside traditional architectural issues is a positive move to embedding these values within the profession from the outset."

Alongside the stringent safety culture the Government is trying to usher in for designers, with the profession remaining generally 'male and pale,' diversity and inclusion is going to be the major issue of the coming years.

Perhaps the "renewed and modern" policy framework that the ARB is attempting to work towards should include some firm targets on such issues, as well as policing architects' safety compliance.

James Parker Editor



ON THE COVER...

Genoa-based Frigerio Design Group took a highly sensitive approach to the design of a new sustainable power station on Capri, to avoid spoiling the setting.

Cover image © Enrico Cano For the full report on this project, go to page 28



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Sustainable Norwegian urban concept wins international Architizer prize

A concept masterplan providing a sustainable strategy for Ulsteinvik, a small town on the Norwegian west coast has won the Jury prize in the architectural model/render category at the Architizer A+ 2021 awards.

The concept, called Powered by Ulsteinvik, by Bergen and Helsinki-based practice Kaleidoscope Nordic, was selected from over a hundred global nominations.

The project's "core idea," said the architects of the project, was to "utilise the location's natural cycles and energy flows to create an attractive place to live and work."

The vision contains three main concepts: firstly the Smarthub in the centre of the town, a multi-functional building forming "innovation networks between public and private actors." It contains new town hall premises, a business hub, a public cafe, and a 24 hour "innovation lab." The facade comprises an "external sun protection system" of photovoltaic panels that produce electricity for the local smart grid.

The curvilinear architecture is formed from a CLT frame, with digital fabrication "allowing for playfulness of form," said the architects, with a facade expression inspired by artist M.C. Escher. This, said the Architizer judges, "investigates the concept of symmetry through architecture." They added that the design "explores three-dimensional expressions, contributing to the feeling of ownership in the area.

Also forming part of the wider project, The Generation Gardens in nearby Ulshaugen feature facilities shared between kindergarten, youth club, care homes, and offices for health services. The perimeter configurations create graded outdoor areas with sheltered inner courtyards for children to play safely. Its proximity to the city center brings activity and life to the urban context.

Lastly, the Circular Neighbourhoods in Holsekerdalen are claimed to offer a new housing typology in a circular system, with shared facilities that provide sustainable solutions including rainwater harvesting



and greywater for irrigating plant beds in balconies and in the common 'GrowHouse,' a greenhouse with a large kitchen where residents can cook and socialise.

The firm commented: "By creating new meeting places, opening the connections to the sea, and increasing accessibility for pedestrians, a car-based centre will be transformed into a lively town centre in just a few steps." The concept proposes a more concentrated centre with a "clear urban structure, and a new multi-purpose square that opens the axis from the sea."

The concept of a "300 metre city" is strengthened by combining existing connections with a new smart-grid, autonomous electric buses, and "blue-green" structures to provide the city with "new energy and a network of attractive meeting places," said the architects.

A plug-in module grid combines renewable energy, technology, and social urban spaces. It is envisaged that local businesses' expertise will be used to develop a photovoltaic module that Kaleidoscope Nordic call 'SmartPergola.' This "creates city roofs, meeting places, generates energy, and becomes a point where you can connect both as a city and a citizen, and become Powered by Ulsteinvik!"

A new seafront promenade will connect green axes in the project, forming part of a new "mobility plan." The inner part of the marina will be an activity centre with a maritime playground, including "autonomous boats and automated fishing rods."

The architects said: "Imagining the future of architecture and urban form is an important aspect of how Kaleidoscope works, and it is an honour to be recognised for this."

The jury at the Architizer A+ Awards commented: "The concept creates a strong identity for Ulsteinvik, with the potential to become an international iconic brand for the town. It ensures attractiveness through life cycle thinking and innovation, containing sharing concepts and strategies for an age-friendly society."



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NEW APPOINTMENT

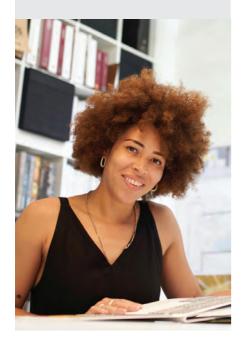
Sheila Bird Studio appoints senior designer

Sheila Bird Studio, a Manchesterbased multi-disciplinary design studio specialising in brand, architecture and interior design, has expanded its team with the appointment of senior designer Georgia Ingleton.

Georgia has over nine years' experience within the design industry and has spent the past seven years working on a range of different hospitality and retail projects. She joins Sheila Bird from Manchesterbased design studio, Phaus.

The firm said that this latest appointment will help Sheila Bird Group continue to expand its portfolio of work, "advising landlords and developers on the spaces of tomorrow, as the north west begins to emerge from the pandemic."

Sheila Bird Studio added:
"Georgia will work with the team
to generate new concepts and
design solutions for a wide variety of
clients, including a new Italian
restaurant and deli, as well as a new
food hall in Manchester."



EDUCATION

Hawkins\Brown's Aston University centrepiece project approved

Hawkins\Brown has been awarded planning approval by Birmingham City Council for a 12,000 m² building which will form the centrepiece of Aston University's "refreshed" campus masterplan.

The partly circular, 10-storey building will, said the architects, create a "high-quality landmark" as the university "refreshes its central Birmingham campus with a significant and impactful masterplan." Hawkins\Brown were appointed to design the building following a competition in 2019, and the practice lead a consultant team that includes Price & Myers, Hoare Lea and Ridge & Partners.

Aston University's brief called for a building that would act as a destination to "draw people into the campus," as well as capitalising on new and existing transport links as the university "reconsidered its connections to the surrounding city through the new masterplan."

The design includes a "civic plinth" at ground level with a landmark pavilion above. The plinth "addresses the surrounding campus and public realm," and is wrapped in a colonnade formed of pigmented precast concrete, with full height





glazing that allows views into and out of the public-facing functions.

The upper pavilion is a glazed lantern with a "dynamic, playful form that presents a distinctive silhouette within the skyline of Birmingham, particularly when lit at night," said the architects. The sawtooth form of the pavilion facade is used to control heat gains into the building and facilitate natural ventilation, reducing energy use.

Ground floor facilities include a museum-style cafe with associated social seating and relaxation spaces. A tiered lecture theatre is located at one end of the central 'public arcade' which includes a feature 'performance stair' providing a flexible area for social interaction. It will also double as an auditorium for evening lectures and presentations to the public.

Mid-level floors contain flexible teaching spaces, and student and social study areas, while upper floors are dedicated to university staff and workspaces.

An atrium rises through the height of the building, forming the primary circulation, and surrounded by "open, flexible" spaces for social learning. These benefit from natural ventilation, daylight and direct access to external roof terraces to "support sustainability and wellbeing."



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EDUCATION

Saunders Architects completes extension to historic Newham girls' school

Saunders Architects have completed an extension to Sarah Bonnell School, one of the UK's oldest girls schools, located in Newham, east London, providing a new ground floor dining facility and first floor music department.

A new building was required to cope with the demand for school places in the local area, and forms part of the school expansion plan to accommodate an additional 120 pupils over a five year period.

The redevelopment began on site following the first lockdown and involved carefully extending part of the existing building whilst retaining the majority of the building's ornate Edwardian elevations. The ground floor dining wing has been enlarged and extended upwards to provide new first floor accommodation.



At first floor level the original building and new extension are joined with a distinctive glazed link which "unifies the old and new, yet highlights the character of each," commented the architects. "The school buildings have historic architectural merit, and it was important to preserve them whilst allowing the contemporary elements to sit comfortably alongside the original building," added Saunders.

The new extended dining room will have access to an outdoor covered dining area with tensile canopies that can be used in the summer, and allow students to dine together in one place. The existing music facilities were close to the classrooms, which was an unsatisfactory solution acoustically, but the proposed new block is located away from study areas, and will meet stringent acoustic requirements. A sedum green roof will sit on a lower exposed roof, and views from the first floor will look out over this to the school green beyond.

PROMOTIONS

DLA announces senior promotions

DLA Architecture has announced two senior promotions as part of the practice's "succession planning strategy."

Mark Hargreaves has been promoted from associate director to director and education sector lead in the Leeds studio. Hargreaves, who has been with DLA for



six years, has an "award-winning track record," commented the firm, with "considerable experience in developing design solutions for schools across various education frameworks, and key clients." The practice added that Hargreaves is currently focused on offsite construction and component-based design solutions.

Neil Matthews has also been promoted from associate director to director in the practice's London studio. Matthews joined DLA's Leeds office over 16 years ago before relocating to London in 2010. Specialising in large complex mixed-use office and residential design, Matthews is "widely experienced in leadership, sustainability and collaborative working for both public and private clients," said DLA. He has also been "instrumental in growing the London workplace sector and the implementation of digital transformation across the practice," as



well as working on projects that have received national awards.

In January, DLA announced its succession strategy with a rebrand which puts an emphasis on "contextual narrative led architecture, and has "streamlined its core architectural services to focus on core growth sectors." While its HQ remains in Leeds, the practice has committed to grow its presence in the north west with larger premises in Manchester city centre.





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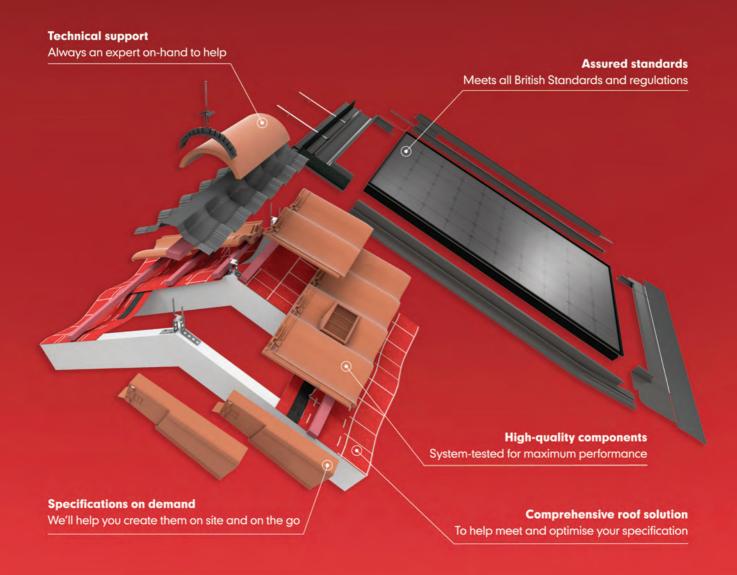
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VIEW POINT



Sean Ronnie Hill from RISE Design Studio looks at how and why the whole project team needs to be upskilled to maximise design benefit in pursuing net zero goals in residential retrofits

Retrofitting and refurbishing existing dwellings is a large part of the challenge of transitioning the built environment to net zero. We are faced with a considerable task, especially as every house is different – efficiency measures that work in one house may not be successful in another. Retrofitting is also a daunting task for homeowners, particularly in terms of engaging a contractor with the right skills and experience for the job.

We have worked on a significant number of projects that have included energy efficiency measures. As the requirement to reach net zero becomes ever more critical, we are working hard to upskill our design team, as well as choosing consultants with the relevant knowledge and experience so all our projects are as energy efficient as possible.

Embracing refurbishment

The 2008 Climate Change Act committed the UK to reducing its greenhouse gas emissions by 80% by 2050. Buildings and construction account for 37% of total UK greenhouse gas emissions and, of those, 65% are from the residential sector. As a result, there has been substantial growth in the residential retrofit industry, with buildings being adapted to be more sustainable and energy-efficient. The majority of our existing residential stock requires some level of retrofit to enable the Government's ambitious emissions targets to be reached.

The most common measure would be to include improved insulation to the skin of the building. A new heating system might also be installed, or double glazing might be fitted. Yet, conserving energy is not the only reason to retrofit a building. Improving indoor environmental quality, reducing dampness and mould will all lead



to increased health and productivity levels of residents.

Adding innovation

Recognising the increased momentum in London around reaching net zero, we have really enjoyed the opportunity to work with clients on refurbishment projects that incorporate environmental considerations. Architects are well placed to add creativity and innovation into the drive to retrofit existing housing stock, particularly those that may prove very expensive to retrofit.

For example, historic buildings such as Edwardian terraces are protected, and increasing their energy efficiency can pose a real challenge. However, there are options available to retain the facade and rebuild

the living spaces within the building. More and more clients are seeking energy efficient homes, and we are fully aware of the important role architects play in helping to reach the Government's net zero target for 2050.

Maximising design benefit

There are several industry standards designed to increase the efficiency of residential property, including the Passivhaus certification, and its retrofit version, EnerPHit. A Passivhaus project tends to use energy sources from within the building, including body heat, heat from the sun or light bulbs, or heat from indoor appliances to create a comfortable, healthy living environment. However, it can be difficult to



reach the exact requirements of the Passivhaus standard in a retrofit project.

Recognising this, the Passivhaus Institute developed the EnerPHit standard for projects that use the Passivhaus method to reduce fuel bills and heating demand. We are working hard to implement this standard in our projects and our design team has developed the skills to align retrofit projects with this approach. EnerPHit takes into account the limitations associated with retrofit projects, and relaxes some of the

Passivhaus criteria to reflect this. Nevertheless, it is still a very demanding standard and generally results in a building that outperforms a new-build property both in terms of energy and comfort.

Light House

We have recently completed a residential renovation project in Clapham, Light House, which targeted EnerPhit standards across the following elements: MVHR, air tightness, energy efficient glazing, and solar PVs.

The house is an existing Victorian mid terrace situated in south Clapham which was in need of a complete overhaul. A side extension was added on the ground floor and a dormer to the second floor, creating the additional space required by the client for a kitchen/diner, as well as a home office which can also be used as a third bedroom.

The MVHR system was designed and installed by sustainability consultants Enhabit, who we work with on the majority of our projects. The MVHR unit was positioned at the top of the stairwell as this was the location deemed most suitable for the ducting routes throughout the house. Risers were created within built-in joinery, and we lowered the ceiling in the



circulation space only.

On the ground floor we specified Ottostumm, a thermally broken Crittall-style door design, to the rear garden. All south and west facing glazing included solar control, which reflects and absorbs heat, as well as filtering light for reduced glare. Solar PVs were installed on the roof for micro generation of electricity to further reduce the energy demand from the grid.

Sean Ronnie Hill is founder at RISE Design Studio







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ASK THE ARCHITECT

Jo Wright, director of architecture for the UKIMEA region at Arup, answers *ADF's* questions on her inspirations and challenges



Jo Wright of Arup

WHAT MADE YOU WANT TO BECOME AN ARCHITECT?

I enjoyed studying physics, maths and art and I relished the breadth of skills that architecture requires. With hindsight, I had very little knowledge on which to base the decision – it was mostly instinct!

HOW DID YOU JOIN ARUP?

I spent the first 25 years of my career at FCB Studios. When I was looking for a new challenge I had conversations with a number of practices. I studied at Bath under Ted Happold and Michael Brawne, who had based their multi-disciplinary approach on Arup's – that's to say where architects, designers, planners, engineers, consultants and technical specialists collaborate under one roof to deliver "total architecture." With this background, I had a real sense of coming home when joining Arup.

WHAT IS THE SCOPE OF YOUR ROLE?

My role is to lead architecture in the UKIMEA, which is one of Arup's five global regions, with studios in 16 locations. We have a longstanding base in London and are currently looking to establish teams across the region, building on Arup's established locations.

Arup is engaged in some extraordinary projects globally, from a cultural centre in

the foothills of the Himalayas, to a new public transport network in a major Middle Eastern city. Closer to home, we have pioneered a new model for integrated social infrastructure in west Wales, bringing together healthcare, education, business incubation and wellbeing.

HOW HAS THE PANDEMIC AFFECTED YOUR WORK AND WHERE ARE YOU NOW BASED?

I have been working at home – a few miles outside Bath – for the majority of the time since March 2020. I feel incredibly lucky to have a dedicated workspace with a fabulous view of my garden.

In terms of work, we have adapted to an extent I'd never have predicted, and have continued to win and deliver some amazing projects. The pandemic has accelerated our adoption of flexible working and this will remain core to our culture. Every aspect of our work, from design review, bidding to delivery, appraisals and training, can continue remotely. As a global practice, some aspects even work better!

Our team has been amazing in supporting one another and there is a real upside in fostering much stronger connections with the rest of the global team.

WHAT IS YOUR PROUDEST PROFESSIONAL ACHIEVEMENT?

I feel very lucky to have worked on some incredible projects, which have been recognised as innovating in their design, sustainability and user experience. If I had to pick just one, I'd choose the Dyson Centre for Neonatal Care at the Royal United Hospital in Bath. Though just 600 m², it has transformed outcomes and demonstrated new approaches to the design of sustainable healthcare facilities. This was achieved by extensive engagement with staff and parents whose babies had been treated in the past – their input was fundamental to the success of the project.

WHAT'S YOUR BIGGEST CURRENT DESIGN CHALLENGE?

There are too many to count – but the common thread that runs through every area of our work is to question if a building is always the answer. As much as we love the challenge of a blank sheet of paper, we recognise the imperative to be frugal with finite resources, to embrace the principles of the circular economy, and to reuse in preference to demolition.



TRANS LEVEL

FRAMELESS GLASS BALUSTRADE







There is no other option! A more robust recognition of the real cost of whole life CO_2 – via taxation or some other means – will be needed to convince the remaining sceptics, or those who regard aesthetics as trumping outcomes. The 'cost' of this arrogance is socialised, as we've seen with recent floods in Germany and wildfires in Australia and the US. We need to start passing the burden onto those who still aren't trying hard enough.

DO YOU THINK ARCHITECTS WILL BECOME MORE CENTRAL TO DESIGNING FOR BUILDING PERFORMANCE IN FUTURE?

Architects are trained to integrate, and the challenges we now face require integrated solutions. It's about doing more with less, where structure and envelope are the primary environmental moderator. We need to understand and value the input of all parts of the team in order to orchestrate whole life solutions, as described in Ove Arup's Key Speech more than 40 years ago!

WHAT CHARACTERISTICS DO THE BEST CLIENTS SHARE?

The best clients I have been lucky enough to work with have recognised that what we deliver is intrinsically linked to what they put in. This is not so much in terms of budget, but in committing adequate time to

support the process and in making decisions at the right moment.

A timely "thank you" from clients also goes a very long way. Our teams work incredibly hard to deliver and are spurred on to do so all over again when they feel appreciated!

IS ARCHITECTURE SOMETIMES MORE ABOUT BEING A GOOD DIPLOMAT THAN BEING A GREAT DESIGNER?

Diplomacy and the ability to effectively communicate with a wide range of participants is an essential part of the architect's role. This ranges from aligning teams, to managing client and stakeholder expectations, negotiating with officers and members, and inspiring contractors to deliver the outcome we have defined.

There are, however, too many projects that can only come to fruition through architects with over-developed strengths in diplomacy – and a commensurate lack of design skills! These schemes make one despair at the missed opportunity to do something better and the long-lasting implications of poor quality in the built environment.

At 1 Triton Square in London's West End, we have just completed the extension and renewal of an Arup building from the 90s. We've managed to double the net area and secure BREEAM Outstanding against a target of Excellent, with no additional cost!



Our clients were persuaded to try something new, with the first circular economy facade in London.

DO YOU THINK ARCHITECTS CAN SUCCESSFULLY SPEND MOST OF THEIR WORK TIME AT HOME LONG-TERM?

I remain astounded at how well we have adapted. Our team put their technical and creative powers to great use in figuring out the challenges of working from home "on the hoof." Covid has catalysed changes that might have taken a decade to achieve.

Arup Architecture's forte is large and complex projects, which require a whole orchestra of specialists to deliver. Historically, our teams have learned not only by exposure to architects, but by being central to an integrated approach. This is much harder to replicate in a virtual environment, and most of us are craving some time back in the office.

But no one will be required to return full time – it remains an option of course, but the obligation under our recently launched 'Work Unbound' scheme is to spend a minimum of two days a week in the office. This will liberate people to make their own choices about where and when to work to best support projects and teams while continuing to deliver excellent results for our clients.

Jo Wright is director of architecture, UKIMEA, at Arup



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SITE LINES



Dementia-friendly design

James Botterill of HSSP Architects discusses the design ethos and biophilic principles that underpin his practice's approach to designing "homes that care"

aking the decision to entrust the care of a family member to a care home is difficult, and often emotional. Particularly true in the case of dementia sufferers, families often find themselves choosing a home for loved ones without being able to establish much about their wishes and preferences – while trying to juggle a multitude of considerations

It's natural to look for assurances that 24-hour support is available, that staff have specialist training, and that residents are safe, secure and comfortable. Equally critical, but less frequently discussed, is the way the building itself is designed and equipped. Indeed, design can improve the health and wellbeing of people

living with dementia by reducing symptoms of confusion, isolation and anxiety and help them live more independently.

With dementia cases on the rise, it's critical we all work harder to better support our ageing population – tackling outdated care home design which can be detrimental to residents, and providing innovative, user-centric solutions. At HSSP, we're leading projects that reimagine the care home setting, helping service users lead full, happy and comfortable lives.

Designing a home from home

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Critically, we need to address the hangover of 'hospital-like' design, which can be confusing and stressful for dementia sufferers. Instead, the most forward looking architects, designers and builders are striving to find ways to incorporate the heart of the home within a safe and functional building – realising that the right design approach can help provide residents with more comfort and stability.

Changing the layout within care homes can make an enormous difference. Best practice design, in line with the 12 principles set out by the Department of Health, avoids the creation of busy and crowded areas, unidentifiable spaces, noise and clutter that add to feelings of confusion and anxiety. There is an emphasis on easing the transition through 'comfort design' and a 'home from home' feel.

Harnessing the power of nature

Access to the outdoors is an important aspect of caring for people with dementia, providing fresh air, smells, birdsong, colours and natural light to stimulate the senses. However, accessibility is a barrier in many care homes. Traditional care home design only gives residents on the ground floor free flowing access; the majority of other residents have to manage with just a view and do not benefit from the enrichment of being outside.

At our newest project, a care home in Melton Mowbray, we are harnessing the health benefits of biophilic design – or design which supports the innate human instinct to connect with nature and other living beings – giving residents the ability to have safe, free-flow access to the outside. The building has been designed to create a series of south facing terraces, each connected to the open plan living area of each 'family unit' of between 10 and 12 residents.

The care home will make use of natural materials, textures and colours which promise to be highly therapeutic, as well as plenty of opportunity to interact with nature, both inside and out.

Light, bright & comfortable

At the Alysia Care Home in Rutland we focused on bringing yearround natural light into internal residential spaces, from bedrooms to corridors. Artificial patterns and lighting contrasts can confuse people experiencing sight loss and dementia, so we work on carefully balancing light and colours throughout. Orientation and feelings of wellness can be aided by a view of a building, landscape or garden, and here residents enjoy grand views of the Elizabethan manor, Burghley House, through large windows in the central communal building.

We aim to design with the watchwords 'bright,' 'airy' and 'light' – providing residents a simple but open living experience which will provide energy as well as comfort. At a new care home to be located towards Kirby Muxloe, we worked hard to deconstruct the traditional institutional layout into a cluster of six pods that form small self-contained communities within the care facility. By breaking down the long corridors and dispersing noisy communal living, entertainment and dining areas, we've in effect reduced the scale of the accommodation, making it quieter, more recognisable and easier to navigate.

Recreating childhood memories

Our memories of our childhood tend to be happy ones and are more easily recalled by dementia sufferers, who struggle with short-term memory loss. In Leicester, we designed a garden space in a care home that echoed an old-fashioned seaside resort with multicoloured beach huts. The beach huts were used as a device to help residents remember care-free times and make them comfortable with their surroundings.

Visual comfort also extends indoors. Patterned walls and flooring or chaotic décor can increase confusion and stress, while soothing artwork, block colours and carefully chosen visual cues as to the purpose of each room aid recognition and comprehension.

Comfortable living to support all residents

From builds like our beach huts in Leicester which invoke childhood memories, to the latest 'apartment style' as seen in Melton Mowbray, supporting independent living, design is critical to supporting people with dementia and helping them to live comfortable, supported and happy lives. And it is not just the residents that feel the effect. Great design also impacts the mindset of staff and the quality of care they deliver.

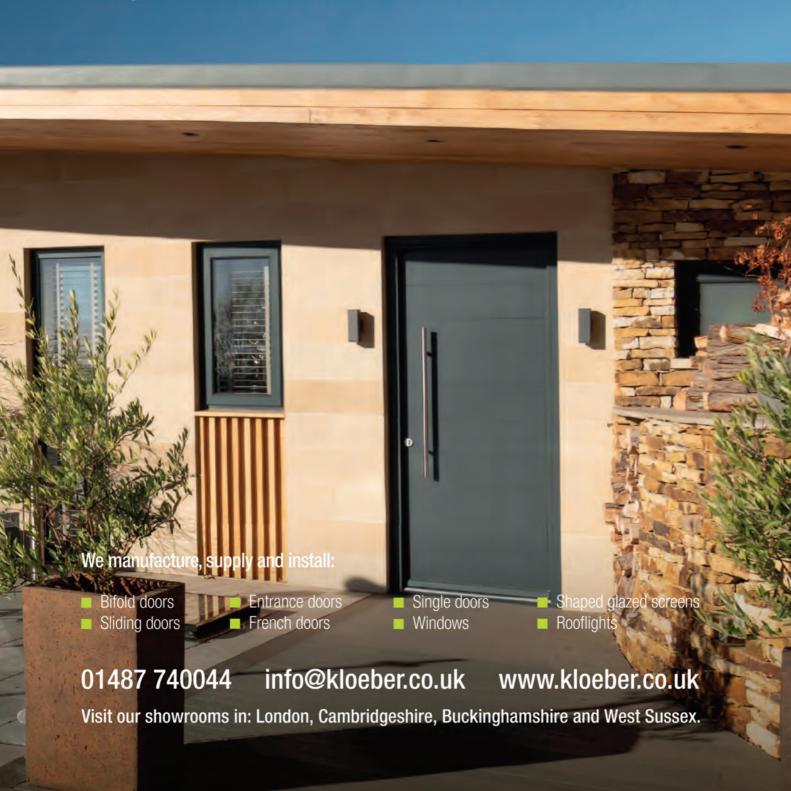
We believe that the most important part of designing 'homes that care' is evolving the design approach to leave behind the institutional aesthetic of old, and recognise the benefits of concepts like biophilia. Indeed, biophilic design has been found to support cognitive function, physical health, and psychological well-being, which is vital in looking after our ageing population.

James Botterill is a director at HSSP Architects



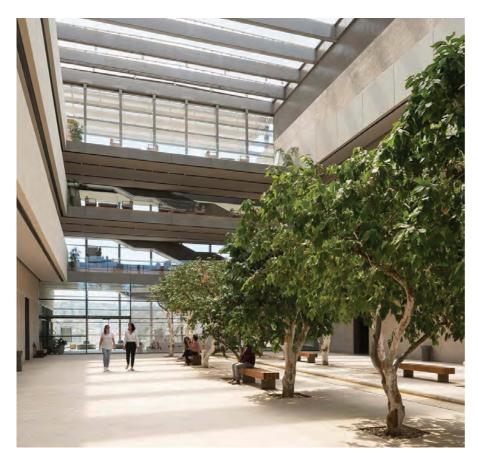
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EDMOND AND LILY SAFRA CENTRE, ISRAEL FOSTER + PARTNERS

Carefully sited amid a "natural rugged setting" in the heart of the Hebrew University of Jerusalem, the Edmond and Lily Safra Centre for Brain Sciences is "pioneering research facility for the scientific exploration of the brain," said architects Foster+Partners. Once the new tram link to the city centre is open, the building will "act as a gateway to the university – its dynamic social spaces and laboratory facilities are designed to attract exceptional scientists, as well as to foster an interest in the centre's research activities within the wider community." The building is arranged as two parallel wings around a central courtyard, upper levels house 28 highly flexible laboratories linked by social hubs, "which are conceived to encourage informal interaction and the exchange of ideas between students and staff." At ground floor, there are teaching facilities, a 200-seat auditorium, a library, cafe and a publicly accessible gallery for the display of relevant artworks. The courtyard at the heart of the scheme "unites these different functions, establishes new circulation routes through the campus and draws the greenery of the surrounding landscape into the building," said Fosters. Planted with citrus trees and a man-made stream along its length, the courtyard forms a quiet, reflective space and a cool microclimate, mediated by a retractable ETFE roof.



ESSENCE FINANCIAL SECURITIES HQ, CHINA, ROCCO DESIGN ARCHITECTS

Approaching completion in Shenzhen is the 193.5 metre tall headquarters building designed by Rocco Design Architects for Essence Financial Securities, featuring triple- and septuple-height courtyards that rise through the floors. Located in Futian, the central business district of Shenzhen, the tower combines two separate headquarters offices, financial trading halls, and commercial office space into a "vertical neighborhood," said the architects. The headquarters offices occupy three stacks of floors at the upper reaches of the tower. "All are defined by voids at the centre of the floorplates," said Rocco Design, rising six floors in the lower headquarters and three in the upper, "acting as communal courtyards and visually interconnecting the floors into cohesive office clusters." Below the top headquarters is a set of full-depth floors that houses communal functions and executive offices. At the centre of these floors is a double-height lecture theatre with tiered seating. On each of the two floors it extends through, it is wrapped with VIP offices and conference rooms with views over the city and nearby Shenzhen Golf Course. The tower's lower levels house a variety of commercial offices, spanning the entire floor plate to "maximise net rentable space." Sitting at the building's heart between the commercial offices and the headquarters offices is a 'skylounge' with amenities including a gym, conference rooms, and social areas.







THE WHALE. NORWAY **DORTE MANDRUP**

Sitting 300 km north of the Arctic Circle, on the tip of the island of Andøya, is Andenes; a small town located amid dramatic landscapes. Just a few miles from shore is an area frequently visited by migrating whales. A new attraction, The Whale, designed by Dorte Mandrup, tells the story of the inhabitants of this underwater world, rising as a "soft hill" on the rocky shore.

The surrounding landscape is "essential for the shape of the building," commented the architects; the form of the roof is defined by three high points on the site, and the foundation is influenced by the landscape beneath. The roof is covered with natural, unworked stones from the area, and large windows opening towards the archipelago reinforce the connection between landscape and building. Visitors and locals are invited to walk on the roof, for views of the archipelago, midnight sun or Northern Lights.

A single curved concrete shell makes up the roof; using this parabolic form, the structure effectively transmits forces to three support points in the corners of the building, making it possible to create a substantial space free of internal columns. Relatively long spans can be achieved while minimising material use, resulting in an economical and sustainable design. The minimal surface area, compared to floor area and volume, is favourable for both material and energy consumption. In addition the aerodynamic shape avoids any negative turbulence effects, and snow build-up will be minimised.

Inside The Whale, a large space opens towards the mountains and the sea. A long horizontal view of the mountains and archipelago creates a "direct visual connection between the surroundings and the exhibition, which is underlined by the rocks entering the building in multiple places." The exhibition will "curate a meeting between whale and human, nature and culture," said the architects, and there are also offices, a cafe and a store. Around the attraction, a carefully planned web of paths, platforms and viewpoints highlight the landscape. A tidepool, campfire and stepping-stones "invite visitors to explore the surroundings in-depth and underline the connection between the building and the surrounding nature."

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ENSURING ACCESS FOR ALL



GEZE UK's popular RIBA-approved CPD Removing Barriers to Access has been completely revised and updated and includes new visuals and updates to regulations all in GEZE's new branding.

The CPD looks at why door controls are needed, explains the various standards and regulations that apply, where and when to use a manual door control or an automatic operator. It looks at self-closing devices for fire door applications and the benefits of electro hold-open devices. The seminar also explains the benefit of automatic doors, the different types and their suitability, as well as their potential danger points.

Offering architects and specifiers invaluable advice and guidance, which contributes to their continuing professional development, this updated training seminar gives a better understanding of the requirements of specifying door control devices to make buildings accessible to everyone.

The 40 minute seminar covers all the relevant standards and regulations and is included in RIBA's core curriculum: Access for all, Compliance, and Designing and building it.

It can be presented in person or virtually via a variety of online platforms and at a time to suit, usually lunchtime but breakfast seminars or afternoon sessions can be accommodated.

National Specification Manager Richard Richardson-Derry said: "The Disability Discrimination Act 1995 and its replacement 'The Equality Act 2010' has rightly enshrined in law that a disabled person must not discriminated against and has the same opportunities as every other member of the public. This includes access to shops restaurants, theatres, hospitals or any public building.

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www.tritonsystems.co.uk/ overview-to-waterproofing-video

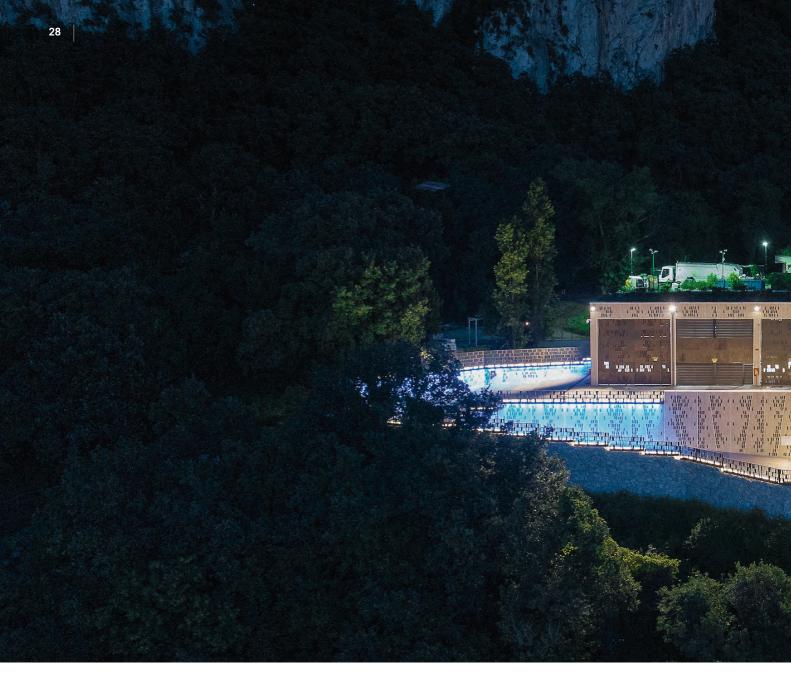
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BUILDING

TERNA POWER STATION CAPRI, ITALY

Exercising soft power

Designing a power station on the Italian island of Capri, famous as a luxury holiday destination, required a sensitive approach to sit a sustainable new plant gently in its setting. Enrico Frigerio speaks to Roseanne Field

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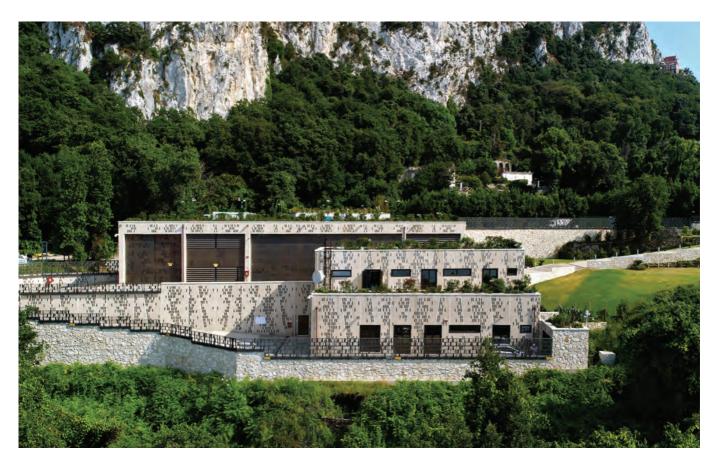
apri, located in the Bay of Naples, is famous for its rugged landscape and the high-end hotels, bars and restaurants on offer – qualities that don't traditionally dovetail with the creation of industrial buildings. It was inevitably a sensitive task, therefore, to design a small power station on a hillside near the marina on the island's north coast. However it was one that didn't faze Enrico Frigerio, architect and founder of Genoa-based practice Frigerio Design Group.

The firm entered an international competition for the project run by Italian electricity grid operator Terna, attracted by the unique challenge. "The aspect that particularly interested

me was being able to give an architectural quality to an industrial plant," Frigerio remarks. It wasn't the first power station the studio had designed, having worked on two previously. He explains that the functional aspects and costs are understandably key drivers on such projects, and as such have to be carefully considered by the architects. In particular, he highlights "the relationship between what is to be built and the environment in which it will sit. In the case of Capri, the landscape was overwhelming!"

The island had previously been powered by an old, privately-owned diesel power plant, which Frigerio explains was not environmentally-friendly, and often not The need to ensure the power station wouldn't detract from the surrounding landscape was a key part of the brief

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even fully functional. "The new power plant would replace a polluting, non-performing, often broken down power source," he says. The construction of a new and greatly improved facility provided Capri with the opportunity to obtain energy from renewable sources, and thereby reduce its emissions to zero, as well as provide safer power infrastructure. It would also connect the island to Italy's national grid for the first time. "For the island, the new power plant was a strategic intervention to ensure future development and a public service for the delivery of green electricity." The old plant, located in a different part of the island, has since been decommissioned and closed, though Frigerio says there are currently no plans to either demolish or repurpose it.

The brief

The need to ensure the power station wouldn't detract from the surrounding landscape was a key part of the brief that was given to the practice. "They wanted the insertion of the new power station to harmonise with the environment," says Frigerio, adding, "to diffuse the urban fabric and minimise

the visual impact, in a place considered 'the pearl of the Mediterranean'."

Terna manage Italy's high and extra high voltage national power grid, and as such had strict requirements for the plant specification itself, says Frigerio. The new power line connecting the new station to the mainland is entirely underwater and underground. It's been estimated that connection to the national grid means the island is collectively set to save around $\[\in \] 20m$ a year and see a 130,000 tonne reduction in $\[\odot \] CO_2$.

One of the most important practical features to bear in mind for the architects was to ensure the installed equipment would be easily accessible for maintenance purposes, as well as general day-to-day operation. The main rooms housing technical equipment were therefore located in areas accessible by vehicles.

It was also essential that any potential noise pollution was contained, which meant a change was required to the initial design by the architects. Large transformers initially planned to sit outside have been placed inside a volume covered by a green roof. Despite the non-negotiable requirements the client gave the studio, they





were, says Frigerio, "aware of the architectural challenge."

Harmonising, not hiding

Although it was imperative that the building wouldn't detract from the landscape, the practice never entertained the idea of a design that would camouflage it completely or imitate the nature surrounding it. "It was about interpreting the environment by relating the complex to its personality and architectural quality," Frigerio explains, continuing: "We explored, examined, breathed in the landscape, looking for all the elements that characterised it."

Capri's distinctive ecology combines limestone cliffs and rocks with lush green Mediterranean vegetation, a combination that proved to be a key influence on the studio's thinking, says Frigerio: "The project is inspired by the area's natural matrix." In particular, the shades of colour and trapezoidal geometric pattern of the facade were designed with the surrounding landscape in mind. "Geometries and colours were reinterpreted in materials and details to preserve the same richness and vibration of light," explains Frigerio. "The decision to

use the colours of the site has allowed us to obtain a 'sweeter,' more integrated visual impact," he says. "The building complex is thus linked to nature, becoming a counterpoint to optimise the environmental impact without sacrificing its identity."

The power station's facade primarily comprises reinforced concrete, finished with a marble grit that matches the colour of limestone, and modular burnished brass plates. The trapezoidal geometry was inspired by and designed to replicate the "natural geometries" of the island's limestone, explains Frigerio. He describes the surrounding rocks and cliffs as "a DNA" which the architects used to compose the various elements for the "architectural finish" of the complex, and to "define its personality."

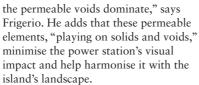
Perforations in the brass panels form a trapezoidal pattern, cut-outs also being inserted into the reinforced concrete to replicate the pattern as well as providing thermal breaks, avoiding wasting any material. The trapezoids also appear in the same cut-out form in burnished brass sheet metal parapets, gates, screens and fences. "The design of the sheets replicates that of the concrete panels, reversing the effect as

Capri's distinctive landscape combines limestone cliffs and rocks with lush green Mediterranean vegetation





The practice never entertained the idea of a design that would camouflage it completely or imitate the nature surrounding it



Material selection took some careful consideration because of the environment the power station sits in. It was important the materials wouldn't suffer over time and that maintenance would be kept to a minimum in the relatively harsh coastal environment, with the building exposed to the salty sea air, powerful UV rays and high humidity. "In a place with some of the most aggressive atmospheric and environmental agents, research was developed for a construction that would reduce maintenance to zero, entrusting performance over time to the quality of the materials and details," explains Frigerio.

In addition to the building's facade, a focus lighting was at the core of the design. The practice intended to minimise light pollution omitted by the power station at night, yet also wanted to utilise light to highlight the building's facade. Frigerio describes the lighting as having been "reworked in terms of quality, and completed with a scenic effect." LEDs were utilised with cut-off parabolas, positioned to hide the light source completely and minimise its impact on the building and landscape. Instead, the practice wanted to showcase the building itself. "Scenographic lighting features between the parapet and walls, with a blade of light shooting

upwards highlight the perforated plates, and downwards to illuminate the walls," Frigerio explains. "We wanted to create an evocative night vision of the new 'heart' that feeds the whole island."

One other element the practice wanted to include was green roofs, which Frigerio says was a challenging part of the design. Their inclusion, chiefly to disguise sophisticated electrical installations, meant "absolute water tightness had to be guaranteed," he explains. "The greatest effort was convincing the client's engineers that this was possible!"

Landscaping was another important consideration for the practice - so much so that they described Capri's mountainous scenery as the second "natural matrix" that influenced their design. "The plan was to follow the orography of the land," says Frigerio. "The calcareous steps that rise from Marina Grande become retaining walls or buildings, while the vegetation spontaneously occupies the empty spaces and the roofs, to mitigate the volumes and minimise the visual impact." The plants chosen are local to the island, not only helping the overall composition blend seamlessly, but also meaning they'll require virtually no maintenance and can be left to grow autonomously.

Although they wanted the landscaping to have a natural, organic feel, some design choices were made for more pragmatic reasons. Tall evergreen oaks, strawberries and carob trees were included to the north, to screen certain elements of the power





station. A variety of other local plants were used near retaining walls, and agaves were placed to prevent access at certain points. The colour and scent of the plants also influenced the placement, with the practice aiming for a "chromatic effect that changes with the different seasons of the year." Pre-existing 'downy' oaks were retained in place.

Construction

It was important to the client Terna that the construction programme was "contained," explains Frigerio, as well as the cost. Being on an island added an element of complication to the process, with all materials and supplies having to arrive by sea or air. "This influenced various construction solutions, orienting the choices towards prefabrication," Frigerio says. "This also had to have maximum dimensions to simplify its transport."

As well as being influenced by practicality, the practice were heavily guided on material choice by sustainability, with the UN's sustainable Development Goals (SDGs) in mind. "Buildings' sustainability is essential if we want to achieve the SDGs promoted by the UN," explains Frigerio, continuing: "In this project that has set the parameter for the choice of materials and construction technologies."

Despite the complicated nature of the construction, the practice – who remained heavily involved throughout the build phase – say they faced no delays or unexpected problems. The only setback came very early on in the project when the discovery of some archaeological objects from the Roman era meant the layout of the entire site had to be redesigned, causing some delays to the programme.

Overall Frigerio is thrilled with how the project has been received by the public. When asked what the response has been, he says: "I would say it has been excellent, in general; it has received many appreciative comments." There is one anecdote in particular which sticks out in his mind. "The complex is often mistaken for a resort, meaning we have managed to give an industrial plant an architectural dignity," he explains. "Target reached!"













BUILDING

BELLE VUE HAMPSTEAD, LONDON

A revealing take on later life

A project in north London offers highly individualised, non-institutional retirement village design both inside and out, producing a carefully detailed brick-clad form on a challenging site. Jack Wooler reports

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Belle Vue is a high-end retirement community in Hampstead, London which offers communal and neighbourhood facilities across four conjoined buildings clad in intricate brickwork.

Inspired by American and Scandinavian 'targeted housing' typologies, the project caters for residents of 60-80 years old, and is designed to support them both physically and emotionally, while 'inviting the community in.'

Project architects Morris+Company and client Pegasus Group faced the challenge of a busy, compact site; a pocket of land between the Royal Free Hospital and Haverstock Hill that's surrounded by varying typologies, a conservation area of Victorian housing, and listed buildings.

The client's aim was to provide generous spaces including corridors at least 2 metres wide and 59 homes ranging from 54 m² one-bed units to two-bed units of 129 m². These would be combined with the amenities of a health spa, gym, swimming pool, library, gardens, public restaurant and cafe. The project team faced a challenge to win over Camden

Council, who battled to restrict the building to a lower height than that which the footprint required to house the various elements.

The architects soon realised that their drive for a raised level of quality and function would be boosted by the need to allay any concerns of, and avoid any perceived negative impact on, the neighbours. This was achieved in part by the team designing a cluster of buildings of varying heights, facades and detailing to blend in with the surroundings, and taking many different sightlines into account. The facades offer complex brickwork detailing that "plays with light and shadow" to create depth, as well as adding to legibility from a distance, something which pleased the previously sceptical planners.

Via a series of detailed models, the council were convinced that the architects' highly considered designs vindicated the scheme's extending to 10 storeys. And, despite a Covid-compromised opening, the residents have reportedly expressed their appreciation for the project's inclusive, generous spaces.



Covid complications

Though the building reached practical completion before the pandemic began, it was not long after residents began moving in that the country was plunged into lockdown. This meant that there were only around 15 residents for much of the building's early life.

While this was of course a blow to the client, according to Miranda MacLaren, a director at Morris+Company, the threat of Covid actually served to highlight some of the project's best attributes: "Residents at Belle Vue were some of the best placed in the country during lockdown – the array of activities available to them on site kept their social lives full, and the copious outdoor space provided proved invaluable." In addition, all staff chose to isolate with them.

The range of onsite amenities were designed to encourage the target age group to stay active and social – and every room is connected to the outdoors, whether through windows, terraces or gardens. This was intended to allow less mobile residents to retain a sense of place and connection to nature, but MacLaren tells me that during

Covid the layout and amenities "proved to more than just cater for them, but to be a priceless improvement in their experience."

She explains further: "The residents were able to explore a building full of secret and intimate spaces, leading up to a terrace that offers perhaps even better views than from the top of Hampstead Heath." She continues: "You get this extraordinary feeling of space that's almost unheard of in London."

A home, not an institution

MacLaren says that before the project's inception, the practice wasn't known for housing," with a 45-home development in Brentford being "by far the biggest" they'd designed in that typology. According to the architect, however, its being relatively new to the sector was key to why the practice was brought in: "When they saw the work we'd been doing in Brentford and on smaller, one-off houses, they could see the consideration and care, and a potential that by not having done it 1000 times, that we could look at things with fresh eyes."

This lack of preconception is part of what led to the practice to be resolute from

The council fought hard to keep the building down to a lower height than that which the footprint required to house these elements



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SPATIAL QUALITY

The architects were focused on "generosity and wayfinding" when it came to the interiors, as well as "always having a relationship to an outdoor space so you can get fresh air when you need to"

the outset that the building would avoid "an institutional feel," a sentiment echoed by the client.

"It was a very exciting brief process," says the architect, "it was very iterative, and we shared many desires with the client." They spent a long time discussing what would be appropriate for communal spaces: "Where they should be placed, if they should be gated, and the benefits of different approaches, and this really paid off."

"One of the huge things that I'm really pleased we all agreed upon was that the public were to be invited in," she continues, referring to the public cafe on the ground floor. "We wanted visitors, friends, family, or even passers-by to be able to come and have a coffee, and create a great atmosphere where you also see a glimpse of residents' lives."

"Instead of feeling like a hospital, it would be more like an extension of their living room or kitchen, but where you are welcomed in, like a member's club."

Viability

Once this vision was shared by all, the team next had to ascertain the viability of the density such a scheme would require on the tight site. It originally held a convent, a fivestorey, T-shaped structure which the client purchased and demolished. The site is surrounded by a variety of neighbours, including a nursery, a school (which it shares a party wall with), and the hospital.

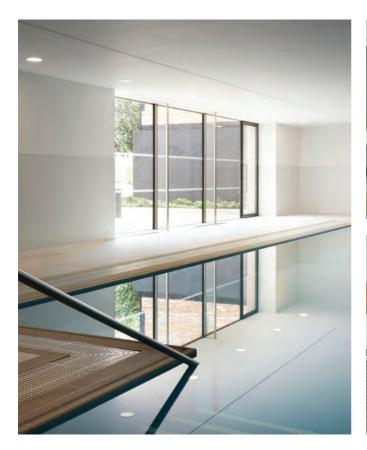
"It was quite a tricky job, as it was both a really complicated site and an expensive plot, so we needed to get a certain number of residences to make it viable."

As the clientele would be well-heeled residents from the Hampstead area, the team decided that aiming for around 100 m² for a two-bed flat was important, to ensure that while residents would still be downsizing, the change wasn't "too dramatic."

At this size of property, however, it was estimated that just under 60 homes were necessary to strike an acceptable profit. With the footprint available, meeting the brief necessitated that the buildings would have to rise to 10 storeys in places.

Perceived impact

In order to resolve this conflict with the best outcome possible, the architects worked closely with Camden planning officers throughout the design, to ensure







that the building was "of more benefit to the area than any perceived negative impact from its height." The practice had to work especially hard on the taller elements of the four buildings, with each facade being individually treated to blend with its respected neighbour.

"With so many different typologies and designs around us, we had to ask ourselves 'what we were,'" says MacLaren. "We couldn't really just be one thing, and so we fell upon the realisation that the only way forward was to design a cluster of buildings that shift and undulate according to window distances, views, impacts and heights next door."

As such, the tallest building was drawn into the northeastern corner of the site, with volumes shifting down to four storeys at the lowest. MacLaren admits a design dilemma of sorts: "We weren't sure at the start as to whether we should be echoing the local conservation area's qualities, or we should be looking for a more prefabricated look to match the hospital behind us." She adds: "In the end we decided that, because the residents were coming from the local area [in accordance with the council's policy], we wanted to reflect the area and give

the residents a sense of familiarity as well as excitement."

One key way in which Camden council were brought along with this complex design were the practice's detailed models, including plaster casts of brick lintels, speckled white paint and minute details that "presented exactly what we thought it should look like," says the architect.

"Through that modelling process, Camden began to feel confident that the quality would be there," MacLaren adds. "When it was finally agreed, the client didn't change a thing – everything remained exactly as we had drawn it."

Light & shadow

In a modern interpretation of the local vernacular, the practice chose brickwork for the building's envelope – paying tribute to the nearby, well-loved Victorian buildings. "There was so much care and thought that went into these buildings, how they meet the ground, the detailing around their bases, decoration around windows," says MacLaren.

The team decided that instead of pastiche, they would instead focus on maximising the play of light and shadow The arrival of the pandemic actually served to highlight some of the project's best attributes

ADF SEPTEMBER 2021 WWW.ARCHITECTSDATAFILE.CO.UK



ELEVATED DETAILS

Completing a cluster of buildings of different heights to blend with neighbours, the facades offer complex brickwork detailing that plays with light and shadow

"Not having done retirement living 1,000 times, we could look at things with fresh eyes"

Miranda Maclaren, Morris+Company

PROJECT FACTFILE

Client: Pegasus Life
Architect: Morris+Company
Construction manager: RISE
Contractor (interior D&B): ISG
Structural engineer: Elliott Wood
Environmental engineer: Max

Fordham

Landscape consultant: Camlins Interiors: Woods Bagot Interiors executive architect:

Architecture PLB

Building control: Assent Building

Control

with highly detailed brick facades, but "following the same rules of craft." As such, the facade was constructed largely of intricate brickwork with deep reveals and jutting elements that add depth and interest, such as precast concrete string courses around the edges (which also deal with practical issues like waterproofing), or splayed lintels.

The architects were particularly focused on the ground and top levels of the buildings being legible. One way in which this was achieved was 15 mm splayed brick at the base, and another is in the taller buildings, which widen as they ascend. In addition, the brick work changes to tumbled bricks at higher levels, the mortar changes shade, and the lintels have a different, slightly grey colour.

"One of my favourite aspects of the facades was how different we made each one – we asked the bricklayers to bash the bricks around, and get more or less slurry on each so they would sparkle, while not looking brand new," explains MacLaren. "While they were sceptical at the start, they're extremely proud of the way it looks now – and so are we."

Interior spaces

Moving inside, while another team created much of the internal finishings,
Morris+Company were responsible for the "principles of the interior spaces," and their being closely tailored to the users' needs.

MacLaren explains: "We were more involved with the spatial quality and

relationships. We focused on generosity and wayfinding, the importance of being safe and secure at the same time as always being able to see where you're going, as well as always having a relationship to an outdoor space so you can get fresh air when you need to."

Designing these spaces however proved one of the major challenges in this project, according to MacLaren, as "there just weren't any examples to visit in this country."

"We reviewed buildings that had been designed elsewhere, alongside comments and papers on such projects, but I think Pegasus were pushing us to follow our intuition and take the typology in new directions," she says.

As such, following their instinct on the exterior designs, inside these blocks the architects went to great lengths to individualise each interior space, from subtle details like carpet changes around the entrance, to recessed doors that residents can make their own. Instead of "long institutional corridors," they provided spaces that felt like home for residents – "Their space, their block, their floor; it's quite unique in that way."

She continues: "It was extremely important to us that we found the perfect balance between the building feeling like a home, not a hotel, but while also having that sense of pride and community in some of it being publicly accessible."

Proof of concept

MacLaren of Morris+Company hopes that the Belle Vue will inspire future designers of targeted retirement housing in the UK, and be seen as an exemplar in its field, inspiring future UK projects to adopt lessons from across the globe.

She says: "Regardless of whether it's more or less expensive, the spatial understandings and relationships transcend its cost; allowing older residents to increase their happiness and sense of community, as well as safety and security."

MacLaren tells me she is "extremely proud" of the way the residents have settled in and used the building, and that this "truly achieves proof of concept."

At the time of interview, Pegasus Life had only been recently able to market the project and bring new residents in.

However, the architect had just toured the project with the client, and reported that the residents were delighted. She concludes: "If others are only to look, Belle Vue is a great indicator of the benefit of this type of accommodation."





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Ultra-efficient MVHR: from room to roof



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The show must go on

The RCI Show is back, connecting visitors with the leading roofing, cladding and insulation manufacturers and suppliers on 29-30 September at Stadium MK, Milton Keynes



If the pandemic has taught us anything, it's that we need to be more connected. The RCI Show, taking place at the end of this month, provides visitors with an opportunity to make new connections – and reaffirm old ones – with leading manufacturers and suppliers. You will be able to browse the latest products that are relevant to your business, and access thought-leadership content via a series of keynote seminars, free of charge.

There's so much going on at the RCI Show, the largest gathering of roofing, cladding and insulation supply chain professionals in the UK, that planning your day is a must if you want to get the most out of your visit.

Why attend?

Compare and source new products from over 50 leading specialist roofing, cladding and insulation suppliers and solution providers in the UK. You will also have the opportunity to get 'hands-on,' as many exhibitors will be running interactive demonstrations of their latest tools and products exclusively at the show, which are not to be missed!

Visitors can also learn from the experts and hear about the important issues currently impacting the market during the conference sessions. What's more, the whole



seminar programme is CPD-accredited, meaning you can earn CPD points for free with content delivered from leading industry speakers. Here are some of the highlight sessions taking place across the two days:

- The survey and risk review of existing cladding/insulation on buildings Nick Jenkins, technical manager, International Fire Consultants
- Pitched roofing design considerations and moisture control
 Iain Fairnington, technical director, A.
 Proctor Group
- Designing to zero carbon: regulations, Future Homes Standard and RIBA Climate Challenge 2030 Simon Tucker, specification manager (north), Xtratherm
- Effective roof inspections
 Keith Roberts, managing director,
 Roberts Consulting
- Introduction to solar PV in the pitched roofing sector
 Sam Tebbs, special project manager, Marley
- Making cities greener green roofs will be an important element of the journey Dusty Gedge, president European Federation of Green Roof and Wall Associations and director, The Green Infrastructure Consultancy

The session booking form is live at www.rcishow.co.uk. Once you have registered to attend, you can pre-book onto the sessions that are of most interest to you. They are another way to network with likeminded individuals to share knowledge and ideas, whilst leveraging the best contacts for you and your business.

Over the years, the RCI Show has become a key date in the industry calendar for



thousands of contractors, installers, surveyors and specifiers, and this year's two-day event is expected to attract a significant number of manufacturers, associations and suppliers who are eager to engage face-to-face once again.

The safe return of the RCI Show

As event organisers of the RCI Show, Mark Allen Group's number one priority is to ensure the health, safety, and wellbeing of its exhibitors, visitors and staff. The company is working closely with the venue to ensure the safety and comfort of all those on-site, and to give everyone the reassurance and confidence they need to participate in a safe and controlled environment.

With government guidelines for public gatherings continuing to evolve, the organisers say they will be "following all recommendations, and will let visitors know the full list of protective measures as they assess the situation nearer the show."

So, whether you're searching for the most up-to-date product innovations and services, working to stay ahead of the latest news, trends and best practice guidance, or wanting to extend your network, the RCI Show is back, reconnecting you with key experts across the entire roofing, cladding and insulation supply chain.

Don't miss out! Register for your free ticket by visiting www.rcishow.co.uk

Visit Aico at UK Construction Week 2021

ico, an Ei Company, are the European Market Leader in Home Life Safety, **L**pioneering new technologies and offering high quality alarms, developed and manufactured in Ireland. All Aico alarms meet UK standards and offer a variety of sensor types to guarantee protection for every home, the cornerstone of which is delivering education, quality, service and innovation. In 2020, Aico expanded their Connected Home offering with the acquisition of leading Internet of Things (IoT) solutions provider, HomeLINK. HomeLINK are a multi-awardwinning high-tech software team within Aico that leverage cutting edge home integration and analytic technologies to address the needs of social landlords and their residents.

Aico offer unparalleled support, from the twenty-three Regional Specification Managers covering the whole of the UK and the expert in-house technical support team to their free of charge, Fire Industry Association accredited training scheme, Expert Installer. Expert Installer provides Electrical Contractors with all of the information that they require to select, site, install and maintain Aico alarms to the highest quality. It also ensures that attendees are up to date with the latest legislation and requirements.

Corporate Social Responsibility is a key focus for Aico; in 2018 Aico launched 'Aico in the Community' initiative to help schools, colleges, charities and community organisations achieve their goals to help create safer communities and build sustainable futures. Aico does this through the core areas of Education, Business Enterprise, Volunteering, Charity and Environmental Impact.

Aico are exhibiting at UK Construction Week 2021, visit them at Stand B418 to find out more about their flagship 3000 Series and revolutionary SmartLINK Gateway; an innovative solution for landlords, providing access to real-time data insight into the status of the Smoke, Heat and Carbon Monoxide alarm systems across their entire housing stock.

01691 664100 www.aico.co.uk



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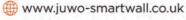
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mail@juwo-smartwall.co.uk

Visit us on stand B502 UK CONSTRUCTION WEEK, NEC, 5-7 Oct 21

Catch up on two years of innovation

UK Construction Week is back after a long two-year wait, to showcase innovation and knowledge on 5-7 October at the NEC in Birmingham



The pace of digital transformation and innovation in architecture and the built environment has undoubtedly accelerated over the last 18 months or more, driven particularly by the changes forced upon us by the Covid pandemic. So how do we best get back up to speed?

If registrations to this autumn's UK Construction Week (UKCW) are anything to go by, say the organisers, architects are voting with their feet, choosing to be there in person rather than relying on trawling the internet.

Taking place on 5-7 October at the NEC in Birmingham, the award-winning show is a one-stop-shop for all things construction, including CPD sessions, product demos and free information on all the latest regulations, digital technology and MMC solutions, innovative materials and new suppliers coming into the UK market. It is the first major live event in the construction industry for two years, and is expected to attract more than 20,000 specifiers and buyers and at least 300 exhibitors.

Each day of the show will have a topical theme, with day one focusing on sustainability, day two on diversity, equality and inclusion in construction, and day three on the big issues around quality, social value and building safety. UKCW's longestablished half-day summits on 'Quality' and 'Wellbeing' will also be a key feature for architects.

Products

Exhibitors will be showcasing two years' worth of exciting new product launches and innovation, providing demos and offers on more than 6,000 products. Major brands such as Google, HS2, Geberit, Hanson Plywood, Ford, Xero, Procore and the Construction Innovation Hub will be promoting heavily. The Innovation Zone







The COINS seminars will focus on how the last 18 months have changed the way we build, and how that can be used in a positive way

will also return this year – a collection of the most interesting and inventive products to have recently launched onto the specification market.

Learn

The UKCW main stage, sponsored by COINS, will see keynote presentations by senior leaders from, among others, McKinsey, the Construction Products Association, CIOB, Willmott Dixon, Barratt Homes, Bioregional, Grimshaw, the Sustainable Energy Association, and the Construction Leadership Council.

The COINS 'Future of Construction' series of seminars will focus on how the last 18 months have changed the way we build, and how that can be used in a positive way. These sessions will cover updates in technology such as collaborative urban design via augmented reality, procurement, sustainability, wellbeing and more.

Go digital

The Digital Construction Hub at UKCW will also feature more than 30 presentations

over the three days, and over 10 hours of CPD for architects.

Highlights include an interactive workshop from Birmingham City University exploring the usefulness of augmented reality as a visual design tool for urban design projects, plus a practical session from one of the leading legal specialists in BIM to review common risks, causes of disputes and how to mitigate them. A deep dive into how Buro Happold has adopted BIM and upskilled its staff will provide highly practical advice around skills and development and how they dealt with key legal and contractual risks along the way, and there will also be sessions on the UK BIM Framework's standards and guidance, and on the national 'digital twin' programme.

The Digital Construction Hub is sponsored by Procore, which will deliver practical case studies and high impact training sessions every day, and is curated by the UK BIM Alliance. All seminars are free to attend, and will be suitable for architects' CPD.

Celebrate

The UKCW Role Models initiative is making a welcome return in the face of skills shortages across the construction industry. The shortlist this year includes several architects in the running for the Role Model of the Year awards, including Priya Aiyer, architect at Mace; Felicity Meares and Dagmar Binsted, associates at Scott Brownrigg; Duncan Baker-Brown, School of Architecture and Design senior lecturer at University of Brighton; Dominic Marshall, Founder at Bounce Architecture, and Dmitrij (Orlovski) Burakevic, architect at Terence O' Rourke. The overall winner will be announced on the main stage on Wednesday 6 October.

One entry badge gives access to multiple sections: Build sponsored by Easy-trim, Modern Methods of Construction, Building Tech, Timber, Civils, Energy and HVAC, and Surface and Materials, as well as Grand Designs Live.

Free registration to UK Construction Week is open: ukconstructionweek-2021-visitor.reg.buzz/pr

To get regular updates on the event, including safety protocols and new features, follow UKCW on social media using the hashtag #UKCW2021

Retail casing solutions from Encasement

s retailers re-open and shoppers return to the high street, malls and retail parks, the importance of combining practicality with decorative design is still important to ensure the shopping experience is enhanced.

Decorative casings, such as column casings and building linings, are a fundamental part of retail design and in addition to providing a practical method of concealing interior and exterior structural steelwork, they also add to a building's aesthetics.

For almost 15 years, Encasement has been manufacturing and supplying column casing and building lining solutions to a diverse range of retailers covering the grocery sector, homeware, clothing, furniture stores, restaurants and automotive dealerships.

The company's range provides architects, specifiers and designers with a wide choice of materials and finishes, as well as bespoke shapes and dimensions, so it should be no surprise that their products are used by many well-known brands. These include, Halfords, Porsche, Tesco, ASDA, Oak Furnitureland, Kia Motors and Greggs, as well as major retail parks and shopping centres across the UK.

Encasement's Circa and Quadra column casings ranges are manufactured from preformed plywood, while Forma casing are fabricated from metal. Both Polyma and Gypra casings are produced from moulds in glass reinforced plastic (GRP) and glass reinforced gypsum (GRG) respectively.

Circa and Quadra allow circular, square and rectangular profiles to be specified while also providing a wide range of finish options with the most popular being decorative



laminates. These have very good resistance to damage, scuffs and scratches, making them ideal for high traffic retail environments.



They also offer specifiers a diverse palette of finishes including plain colours, wood grains and metallics, as well as textured and real wood veneers.

While all Encasements column casings can be used for building interiors, the Polyma and Forma ranges are also widely used for exterior retail projects, due to their inherent weather resistance and durability.

Available in aluminium or stainless steel, Forma offers a diverse range of options and can be specified in circular, square, rectangular or hexagonal forms, as well as unique bespoke shapes. A wide choice of finishes is available including polyester powder coating (PPC) coating in any RAL colour, as well as brushed, anodised, embossed or textured finishes such as Rimex.

Strength, durability and colour choice are also features of the Polyma GRP range. As they are produced from moulds, a high degree of design flexibility is possible with shape; size and colour options all open to specification to meet bespoke project requirements.

Alongside Encasement's column casings, its 'Vecta' building linings system provides a high quality solution for interior wall linings, bulkheads and reveals and are regularly specified for supermarkets, automotive retail, restaurant and food brands including Tesco, Prêt a Manger, Mini and Greggs.

By offering six different column casing ranges and Vecta decorative building linings, specifiers are able to source a range of specialised interior finish products from a single company, supported by high levels of experience in this sector. The company also offers a full supply and install service to support contractors.

01733 266 889 www.encasement.co.uk



A Bright and Happy Dog Tale!

he Dogs Trust has recently opened a brand new rehoming Centre located just a couple of miles from Cardiff Bay. The charity's 22^{nd} rehoming centre has been devised with man's best friend's welfare at the forefront of its design including the LED lighting solutions supplied by Luceco. The £13.5m project has created a canine oasis with three buildings and landscaped outside space for up to 210 dogs.

The new extensive facilities include 78 light and airy "sleep & run" kennels with underfloor heating, lit with Platinum Mini Downlighters, a recessed luminaire offering an efficacy up to 117 Llm/cW, with a



unique swing tab design for quick and easy installation.

Circulation areas were lit with linear arrays of the Contour luminaire. The LED lighting system consists of connectable modules that can be surface mounted, suspended or recessed as at the Dogs Trust in Cardiff forming contemporary, decorative, and highly effective illumination. Contour offers over 100,000 hours operational life, making the luminaire ideal for environments with high working hours.

Outside, Guardian Pro flood lights were used for the exercise paddocks and runs and IP65 rated Atlas bulkheads were installed around the exterior of the building with Deco Bollards lighting landscaped gardens and pathways. The perimeter roads and parking facilities were lit with Viva City Pro, a modular, slimline, performance LED street lantern offering a choice of optics and an operational working life of 100,000 hours.

The Dogs Trust goes to huge lengths to help abandoned dogs and rehabilitate those dogs in need of a little extra help, and the Cardiff Rehoming Centre will be no different.





With dedicated Training and Behaviour Advisors, dogs of all shapes and sizes will be offered all the help they need to find a new home – creating many bright and well-lit Happy Dog Tales!

01952 238 100 www.luceco.uk



JACKON is 'Future Homes ready'

At UK Construction Week this year JACKON is promoting the fact that it is Future Homes ready. This means it is ready for the tough new u-value targets for new-builds, when they come into effect from 2025 as part of the Future Homes Standard. JACKON's THERMOMUR® ICF and JACKODUR® ATLAS ranges already meet or exceed the new targets for thermal insulation. The THERMOMUR® 350 Super range - currently the company's best-selling range in the UK - already achieves 0.15 for walls with no added materials, and the JACKODUR® ATLAS system can be designed to achieve 0.11. There will be plenty of opportunity to find out more about the benefits JACKON's 60 years' expertise in XPS and EPS manufacturing can bring to your construction project, since the company has stands in both the UK Construction Week and Grand Designs halls.

01204 221089 www.jackon.co.uk

UK CONSTRUCTION WEEK STAND NO B510

The future is JUWO Evolved SmartWall™



JUWO Evolved Smartwall™ is an innovative monolithic clay block system using thin joint adhesive technology, providing a structural, ecological and sustainable solution for all residential and commercial developments. Meeting thermal requirements from

building regulations to Passivhaus, from 0.28 U Value through to 0.11 U value in a single block, with no additional insulation, cavities or wall-ties, the system offers unrivalled performance and aesthetics. The system includes corner, end, lintel-Ring beam U and shaped blocks, insulated lintels, plasters, renders, brick-slips and ancillaries.

0808 2540 500 www.juwo-smartwall.co.uk

UK CONSTRUCTION WEEK STAND NO B502

GEZE launches 'Helping Healthcare to Heal'



GEZE has launched 'Helping Healthcare to Heal' an initiative that recognises that putting patients at the centre of hospital, clinic and doctors' surgery building design can aid the process of healing and recovery. GEZE have produced a comprehensive door, window and security brochure that looks at providing

solutions for the hygiene, safety and well-being of both patients and employees. It reviews each area of a healthcare building identifying their issues – comfort, safety, hygiene, attractive design, sustainability, accessibility or fire safety – and provides advice on overcoming them.

info.uk@geze.com www.geze.co.uk

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Delivering Certified and Predictable Performance

Mitigating Risks in Residential Buildings

Architects are under increased pressure to design safer residential buildings, with greater certainty around programme schedules. Risk, cost, quality and performance, need to be assessed and controlled.

In response to these challenges, light steel frame specialist EOS – part of Etex New Ways, together with Group partners – Siniat, Promat and FSi – have invested considerable time and research in developing a range of non-combustible walling and flooring systems.

EOS are committed to technical excellence and understand the challenges faced by architects and through Etex Group, have some of the best fire experts in the UK on their team. Up until now there has been a lack of a systems-based approach to eradicate the pitfalls surrounding specification decisions. By eliminating uncertainty through rigorous testing regimes, EOS deliver light steel frame systems with certified and predictable performance.

Pioneering a new systems-based approach

Recently presented with Best External Product at the 2021 Housebuilder Product Awards, Thrubuild® is an all-in-one noncombustible certified system exploiting the latest products, technical know-how and manufacturing excellence of the combined team. Providing crucial safety, time and cost benefits, the Thrubuild® range has multiple loadbearing applications for low and medium rise developments and can be used for external or internal walls together with internal and separating floors.

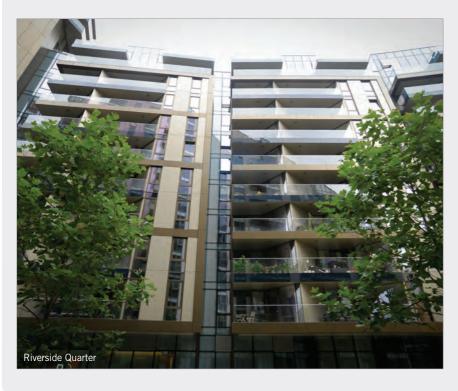
In addition to the Thrubuild® loadbearing range, EOS has researched and developed Thruwall® – fully engineered custom-designed non-loadbearing infill systems manufactured offsite and supplied as a certified kit of parts that can be used with concrete and steel main frames.

Following the outstanding success of Thruwall® – EOS has taken factory prefabrication and preassembly to another level. Developed and rigorously tested,



Pre-Assembled Frames (PAF) are an evolution of Thruwall® which are delivered to site as a unitised non-loadbearing infill system encapsulating light steel framing and external sheathing.

All components and products in the Thrubuild®, Thruwall® and Pre-Assembled Frames system range have been rigorously tested together for fire, acoustic, weathering, airtightness, durability and mechanical performance. Fire resistance periods of 60, 90 and 120 minutes are achievable. When walling and flooring systems are built with Etex Group components and materials, following a validation process – Etex award a 30-year warranty.



OFFSITE EXPO

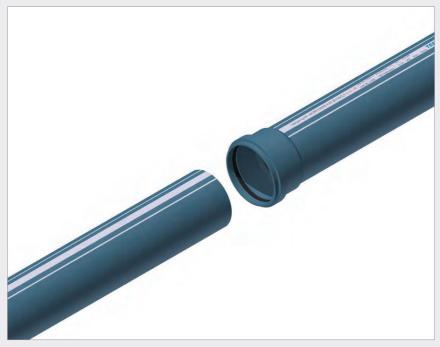
The technical team at EOS will be out in force at Offsite Expo showcasing a pioneering systems approach with a two-storey feature build. Taking place on 21 and 22 September at the Coventry Building Society Arena, visitors to the show will be able to inspect their award-winning light steel frame systems range. In addition, their technical team will be presenting in the following masterclasses on 22 September: Joshua Slack: Fire Protection:

14.45-15.45 Peter Burchill: Light Gauge Steel: 14.45-15.45

01325 303030 www.eosframing.co.uk

Polypipe Building Services launches a new noise reducing drainage system





Polypipe Building Services has launched Terrain Q, a polypropylene, easy-to-install push fit system with multi-layer technology designed for a variety of commercial and high-rise residential buildings. Sitting alongside well-known Terrain drainage systems within the Polypipe Building Services portfolio including Terrain PVC and Terrain FUZE, Terrain Q brings a new dimension to the commercial drainage portfolio in the form of a drainage system that offers both noise reducing and fire retardancy benefits.

Terrain Q has been expertly engineered to feature multi-layer technology which provides a range of benefits.

The pipework's blue external layer is made from PP+UV+RF, providing resistance to attack from UV radiation, fire and impact damage. The black intermediate layer comprises a mineral-reinforced plastic which enables high stability, noise insulation and fire resistance, and the final white internal layer is made of PP+AF, providing high chemical and abrasion resistance and resistance to high temperature waste, (up to 97 degrees). Due to an anti fouling additive the bore is kept clear and resistant to deposit

build up which helps to reduce noise level.

In addition, the fittings have been made with the installer in mind, including features such as angle markers and insertion aids to help keep installation quick and simple, making sure it keeps its great noise reducing properties.

This triple aspect of fire resistance, noise reducing, and anti-fouling resistance sets Terrain Q apart in the market, providing specifiers with a system that keeps bases covered.

Speaking on the launch of Terrain Q, Sarah Cartwright, Senior Product Manager from Polypipe Building Services said: "In today's built environment, fire safety and the environment in which we live, work and play in are of utmost importance. It is essential to our NPD that we develop new products with this in mind. Here at Polypipe, we are pleased to be launching a product that not only reduces noise but has a good fire classification rating, contributing to better fire safety in the building envelope."

Sarah continued: "The industry has also seen a growing demand for noise reducing solutions. Increasingly, these systems are being specified in high-rise commercial apartments to reduce noise breakout. Terrain Q has been engineered to prevent the passage of sound and has a 20dB rating for structure-borne sound."

"Finally, Terrain Q's anti-fouling properties prevent the build-up of encrustations in pipework, ensuring the seamless, uninterrupted flow of water for the benefit of residents, facilities managers and engineers," commented Sarah.

Polypipe Building Services' Terrain Q has been engineered to meet the industry's acoustic and fire requirements. The system has been tested and certified to EN 14366 'Laboratory measurement of noise from wastewater installations', EN 13501 'Fire classification of construction products and design types' and EN 1451 'Plastic pipes and fittings for soil and waste'. The range is available in a variety of sizes to suit project requirements and includes a number of fittings from bends, branches and reducers.

"Polypipe Building Services is delighted to launch such a system that fulfils significant needs within our construction industry," ended Sarah.

01709 770000 www.polypipe.com

The new Stone Age has arrived

Powder coatings are continually evolving with a number of aesthetic finishes demonstrating variations in colour and patination. Realistic alternatives to masonry materials such as GRC, pre-cast concrete and Portland Stone can now be realised.

Not long ago, the mere prospect of powder coated aluminium being proposed in lieu of the aforementioned materials would have been seen purely as a value engineering exercise. Whilst this still holds true to a certain extent, the advancements in coatings technology and creative configurations in aluminium design, have enabled it to compete far more closely than ever before.

The use of a powder coated aluminium panel offers a number of significant benefits for those across the supply chain. From an Architect's perspective, the drive to provide buildings with a sense of solidity and longevity was central to the rise of GRC cladding. By its very nature, it is heavy duty but offers a desired level of refinement.

With a GRC-like powder coating, allied to creative panel design and subsequent fabrication, this design intent can be achieved. Aluminium panels can now be articulated in the form of GRC, ensuring clean lines are achieved whilst retaining the feeling of mass.

Aluminium fabricators and installers forever strive for flexibility and ensuring that complexity is minimised as much as possible during installation. A large part of this stems from the ability to reduce weight. A 3mm pressed cladding panel will typically weigh 8kg/m², whereas this increases to 65kg/m² for GRC. This has a threefold effect; handling is much easier, machinery is reduced, and the supporting framework becomes simpler. Furthermore, should any damage occur during or post-installation, the lightweight nature of aluminium panels facilitates ease of replacement.

Significant savings can be realised in material cost when selecting aluminium over





GRC; appealing to contractors and building owners alike. When this is allied to the reduction in the amount of bracketing support required, it is not uncommon to achieve 300% decrease in installed cost. To put this into perspective, an external package totalling 5,000 m² would yield a monetary saving of £1m.



Concrete materials are inherently more difficult to maintain, with surface treatment and sealant needing to be regularly reapplied. In addition, the risk of efflorescence; a natural occurring phenomenon where unsightly white salts form on the surface layer, cannot be mitigated.

For those wishing to retain natural masonry, a compromise can be achieved. It is not uncommon to find examples of GRC/stone being deployed for ground level

elements, whilst a closely matched powder coated aluminium is utilised for parts that sit comfortably above eye level.

Of equal importance, is the consideration of longevity and overall maintenance requirements. There is rising expectations of a buildings design life and the need for the full façade envelope to offer a longer service life. Ultimately, the goal is to ensure the building looks good for as long as possible without the need to replace or recoat parts: this is the primary function of super durable powder coatings. Acting as a tough layer of sun block, they offer 5x greater protection from UV when compared to standard technologies (often RAL based colours). 40 year guarantees are available providing application is channelled through an approved network of applicators and regular maintenance is adhered to (typically once every 18 months).

In summary, powder coated aluminium offers a strong value proposition to all those involved in the design, fabrication and installation of external facades. The ability to closely mimic natural materials and develop flexible panel designs opens up a wide range of possibilities. A growing number of residential and commercial developments have already reaped the benefits, and with this, a new stone age is dawning.

www.interpon.com/gb

WWW.ARCHITECTSDATAFILE.CO.UK

SIMONSWERK's TECTUS at Regents Crescent

IMONSWERK UK's concealed TECTUS hinges have been fitted throughout the remarkable refurbishment of Regent's Crescent, the UK's only Grade 1 Listed New Build.

Designed in 1820 by John Nash who is remembered for his work on Buckingham Palace, Marble Arch and Regent Street in London. John Nash is one of the



most famous architects of the 18th and early 19th centuries. Due to a combination of damage from World War 2 and poor rebuild in 1960, the Grade 1 listed building has been completely rebuilt to turn the office space back into residential accommodation.

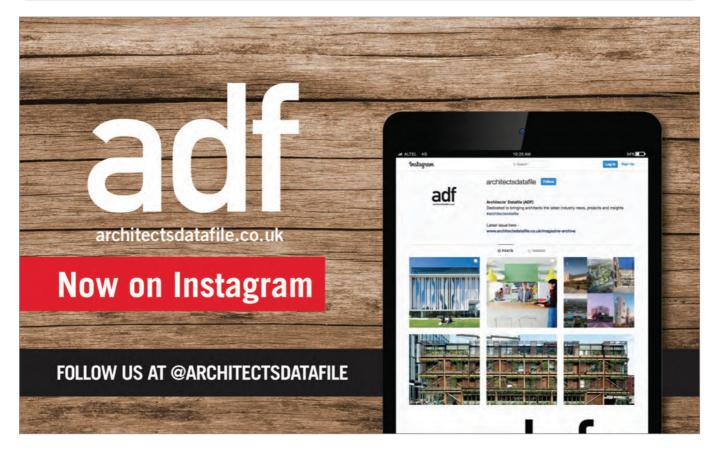
The Regent's Crescent development, involved not only the reconstruction of the facade to match John Nash's original design but also a new contemporary building that sits behind, providing 67 luxury apartments, 9 garden villas, residential amenities, cinema, and spa.

The project required architectural ironmongery of the highest standard incorporating performance and appearance. Leading Architectural Ironmonger John Planck Ltd working in collaboration with Midgard, Millier London & PDP Architects selected SIMONSWERK UK door hinges. In total over 3,500 various TECTUS concealed hinges including the TE340, TE540, TE541 and the TE527 in Bronze metallic finish were specified to complement John Planck Ltd's detailed bespoke door furniture and ironmongery schedule.



SIMONSWERK are one of Europe's leading Hinge Manufacturers with a history spanning more than 130 years in the manufacture of brass, aluminium and stainless-steel hinges for doors and windows.

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IG Lintels plays a part in fine brick detailing

Bespoke brick slip feature arch lintels from IG Lintels form a distinctive element of a sympathetic and prestigious addition to an Edwardian council estate in the London Borough of Camden.

When it came to its redevelopment and the creation of two new blocks consisting of seventy-five mixed tenure homes, Matthew Lloyd Architects in partnership with Higgins Construction, had the architectural challenge of designing and building new housing that responded to the original Edwardian buildings.

Central to the design of the additions is the fine brick detailing which needed to replicate the materials and characteristics of the original architecture. A number of double height brick arches were also created and form a central throughway into new communal courtyards seen elsewhere on the estate.

In keeping with the architect's aesthetic requirements, IG's technical team designed

215 mm high flat gauge brick slip feature lintels accommodating a series of brick spans; 910 mm, 1,360 mm, 1,472 mm and 1,585 mm. All bricks were cut and bonded offsite onto the load bearing lintels.

A consignment of bricks was collected from site to guarantee both quality and reliability in matching the surrounding brickwork. The ceramic bricks were carefully cut in a mitre fashion to conceal the red clay finish underneath and ensure that the ceramic finish on the mitre did not splinter which minimalised brick wastage. All the bricks cut were bonded in a rowlock pattern using BBA approved construction adhesive in a controlled environment without disruption from the natural weather. The patented perforated design of an IG Brick Feature Lintel allows the adhesive to squeeze through the perforations and form a 'mushroom' on the inside, providing a mechanical lock between the steel lintel and the bricks.

Each prefabricated single piece unit



was delivered in line with the build schedule onsite. This reduced health and safety concerns by eliminating the requirement for skilled labour working from height for a prolonged period of time in a busy London area.

The contrasting brick types used on the project add to the new design creating pleasing views that clearly define key routes and boundaries.

IG's lintel solutions have ensured the high quality additions to the innovative Bourne Estate will strengthen the character of the conservation area through careful design and close attention to the articulation of the facades.

01633 486 486 www.iglintels.com



It's time to buy British

A wide range of imported timber products are now hard to come by thanks to various supply issues, but the solution is close at hand, says Tom Barnes of Vastern Timber

arious timber products, including roof battens, structural timber and timber cladding, are in high demand this year, and it is well known that supplies are not keeping up.

Long and short term factors are at play. This year, global demand hit a record high in the post-lockdown housing boom, resulting in many construction materials becoming extremely difficult to obtain. Added to that, over 80% of the timber used in the UK is imported, and these supply chains have been impacted by Brexit, Covid and a changing climate. In the years to come, an increased focus on the carbon footprint of construction will surely lead architects to specify more sustainable materials, leading to yet more demand for wood.

For all these reasons, finding external cladding timber can be challenging at present. Favourites like Canadian cedar and Siberian larch are in very short supply, while prices for these products have risen by 50–100% so far this year. But the good news is that many locally grown timber species are well suited to external cladding, and these are often cheaper, and more readily available, than imported alternatives.

British-grown timber cladding

There are many timber species grown in the UK that are suited to exterior applications. Native western red cedar, larch, oak and sweet chestnut make excellent cladding due to their natural durability. Modern modification processes such as thermal modification can be used to transform locally grown ash, poplar and sycamore – species not normally suitable for cladding – into a durable cladding option. It's becoming an increasingly popular alternative to imported hardwoods among specifiers.

It's gratifying that many customers are choosing locally-grown, thermally-modified timber based on its strong environmental credentials. Thermal modification is a nontoxic process that heats timber in controlled



conditions, producing a stable, durable material that resists rot. Modified timbers have their own characteristics, for example thermally-modified British-grown ash, sycamore and poplar is lightweight and durable, but it can be slightly brittle, so requires more care during installation.

Thermal modification is a toxin-free process resulting in a very stable and durable cladding material. Since 2016 we have used this process to transform British grown woods into a beautiful, long-lasting cladding range which is grown here in our own woodlands.

'Bio-based' materials

Minimising the use of carbon-intensive materials such as concrete and steel and using bio-based materials like timber could be key to achieving a low-carbon economy. With these pressures affecting the whole planet, we in the UK cannot rely on importing 80% of the timber we use. We must aim to be more self-sufficient, which means planting more trees and using more locally grown wood. Let's use these timber

Global demand hit a record high in the post-lockdown housing boom

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shortages as an opportunity to start making the switch.

Much Wenlock Case Study

Recently named one of 'Britain's Greenest Streets,' this Passivhaus development for a local housing association comprises 12 homes of various sizes, clad in thermally modified, British grown timber cladding.

Timber homes in Shropshire are nothing new, but this exemplary development of energy efficient, affordable homes uses locally sourced, natural materials combined with Passivhaus principles and modern processes to excellent effect.

The housing association commissioned leading Passivhaus architects, Architype, for the project. UK sourced natural materials were used, including locally quarried clay roof tiles, local lime render and locally grown cladding. The Treehugger website called the project 'radical simplicity,' but we call it common sense.

Wood Centre for Innovation Case Study

The Oxford Trust's new innovation centre at Stansfeld Park is an inspiring development, providing space for

Many locally grown timber species are well suited to external cladding, and are often cheaper

science and technology start-ups, and teaching facilities for primary-aged science education.

Built in the 'urban wildspace' of a former quarry, these impressive buildings are designed to fit with the leafy surroundings of mixed broadleaf woodland and natural ponds. To this end, all facades are clad in locally grown timber cladding that will be allowed to weather to a neutral grey over time.

The development called for a cladding that would be durable, cost-effective, and sustainable, in the true sense of the word. The order for 1400 m² of our Brimstone poplar cladding was one of the biggest yet, and it's hugely satisfying to see such a large development entirely clad in homegrown timber.

Tom Barnes is managing director at Vastern Timber

"CaberDek does exactly what it needs to!"



When Somerset-based Alan Williams of Apache Carpentry was asked to work on a development of three high-end residential properties near Winsham, Somerset, he knew just the product to call on for the flooring. "We chose CaberDek because it is such a reliable

and easy to use product at a competitive price" said Alan. Having expertly constructed the timber framework, Alan used West Fraser's CaberDek on top of the joists on the first floors of the three buildings. Taking care to space the joists with the board sizes in mind, and using CaberFix D4 adhesive, Alan finds he gets great results every time!

uk.westfraser.com

Preventing the spread of fire in basements



Stopping fires on construction sites and in buildings is nigh on impossible, however mitigating injury or death is a possibility and a design-led approach should be incorporated into every project. Delta Membrane Systems Limited using advanced technologies has developed MS 500 Fire Retardant, a Type C Cavity Drain Membrane with a fire

classification of B-s2, d0 to answer a demand in fire safety in below ground structures. Delta used its knowledge of structural waterproofing to influence a robust, flexible, safe, design-led solution to provide occupants valuable time for escape in the event of fire.

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Avery Dennison Facade Film, Transforming Buildings



Wrapping is not just for interior surfaces

Over recent times the concept of interior wrapping has flourished in both the residential and commercial markets. Covering interior substrates with a self-adhesive vinyl is proving to be a cost-effective refurbishment solution that delivers the same high-end results a traditional method would achieve. Today, you can also update your building by wrapping the exterior cladding or window frames to spruce it up with Avery Dennison Facade Film, a self-adhesive film that can change the whole outlook of your building overnight.

High Adhesion

One of the key USP's of the Avery Dennison Facade Film product lies in its super strong adhesive. Once you apply this film, you want to know it will stay there in the same perfect condition for years to come. Well, once applied the film has a life expectancy of over 10 years, as well as being resistant to UV fading and it also helps to protect the underlying components from weathering.

Having high adhesion onto difficult building substrates such as plastics, aluminium, uncoated steel and reinforced facade panels, Facade film is an excellent alternative to paint.

Easy Application

The application of Avery Dennison Facade Film is a fairly simplistic one for skilled installers. The product can be applied in the wet which allows for the easy installation, and an easy apply adhesive version is now also available in the range which allows for complete bubble free applications, which is particularly useful when you come up against larger areas of cladding.

Not only is the application of the film quick and easy, unlike paint the downtime really is minimised as you only need one coat and once the film is applied you don't have to wait for it to dry.

Transform Windows

Avery Dennison Facade Film is not just flat surfaces, the product can be used to cover window frames to completely modernise old PVC frames or doors. White PVC window frames are becoming a thing of the past with





homeowners and the like looking to change the colours of window frames, with finishes like grey for instance rising in popularity. In Avery Dennison Facade Film you can achieve this look with a wide range of colours available in the repertoire, not forgetting colour matching is also possible. Facade Films short roll offering allows for a quick and easy applications.

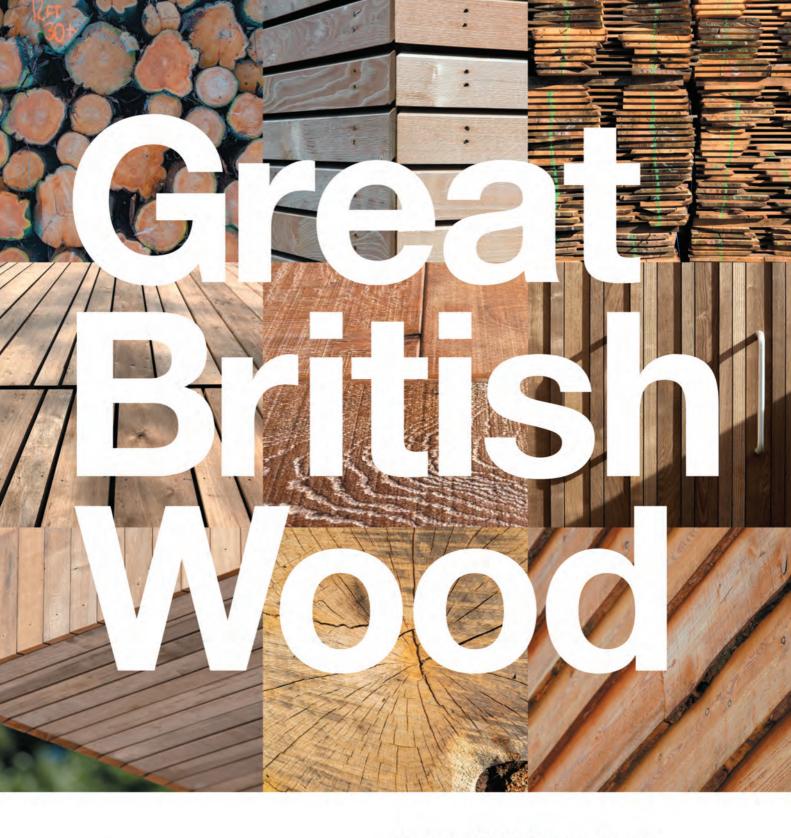
Key features:

- Product meets fire classification B-S1, d0
- Smooth paint like finish for 10 years
- Applied film is dry, surfaces can be touched immediately after application ensuring no interruption to business
- Cost-effective solution improves durability

- of building facades and window frames, reducing property and maintenance costs
- High gloss, lustre or matt finishes
- Available with Easy Apply Liner to facilitate the removal of air bubbles during application on large panels
- Available in a variety of colours, additional colours can be match to industry standards such as RAL, Pantone

Interested in finding out more about Avery Dennison Facade Film or have a project in mind where you think the product could be utilised? Please don't hesitate to get in touch.

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Architectural Powder Coatings – the facts about fire

There has been a great deal of discussion that has taken place of late over the combustibility of the external envelope of some of our high-rise dwellings where aluminium composite panels (ACM) containing flammable cores have been used. These panels are in the process of being removed and replaced to meet stringent new standards. Insurance companies, mortgage providers and other property stakeholders have also had their part to play to mitigate risk and have forced building owners to check for ACM and other issues such as areas of timber decking. All this will ensure a safer building stock for our city's high-rise dwellings.

The surface spread of flame on a high-rise dwelling can cause fire to spread quickly from floor to floor and legislation is now in place to ensure construction designs slow down the spread of a fire through the building envelope, or to stop it altogether, by correctly specifying the materials used in the building project. As a result, new and refurbished buildings deemed to be high-rise, over 18 m in England (11 m in Scotland), will be considerably safer.

Of late members of QUALICOAT UK & Ireland have seen a rising number of powder coating specifications that request an 'A1' classification for combustibility under BS EN 13501-1. When traced back through to the specifier, the origin of this requirement







Anodised Aluminium Sheet - tested to BS 8414

largely stems from property stakeholders who are misguidedly attempting to mitigate their risk by exceeding the current guidance, standards and legislation currently available. This can add both complexity and costs to projects without any benefit or reduction of risk

When applied at standard industry thicknesses, architectural Polyester Powder Coating (PPC) achieves an 'A2-s1,d0' classification. This classification is required for compliance to the amended Building

Regulations 2010 (Approved Doc B: Fire Safety) Nov 2018 and accepted as providing the necessary protection from the surface spread of flame on high-rise construction and other legislated buildings.

Ultimately, PPC does not promote combustibility or fire spread when tested to BS EN 13501-1. This is further supported by the testing required for London Underground approval, often lauded as a barometer of fire safety. This requires compliance to EN 45545, where spread of flame is measured objectively (ISO 5658-2) unlike BS EN 13501-1 which involves visual assessment only. Furthermore, PPC smoke production is extremely low or non-existent (s1) with no flaming droplets (d0). On the chart of combustibility, 'A2-s1,d0' sits just under the 'A1' classification.

It is important to assess the cladding system holistically and not just the performance of the constituent parts under BS EN 13501-1.

The predominant fire test for the whole external cladding system is BS 8414. This provides a route to compliance for buildings over 18m that are outside the scope of Part B regulations. This requires materials to meet the performance criteria given in BRE report BR 135 which measures whether the cladding build up is deemed safe for buildings at elevated height. The test itself involves a 9m high wall with a complete cladding installation, including the fixing







Pre-Coat Aluminium Sheet - tested to BS 8414

of panels and insulation. It is therefore a through-the-wall test.

When tested to these stringent fire safety standards, PPC performs as well as anodised and pre-coated aluminium sheet material. The three images for each of the tests show the cladding after the test, then with cladding removed and then with insulation removed to show the membrane.

A blanket specification of 'A1' restricts the choices of colour for the facade, also it will no doubt incur increased supply costs and shows a lack understanding of the standards and current best practice. But, irrespective of whether aluminium cladding is 'A1' or 'A2- s1,d0' classified, the critical aspect is to ensure the full system is specified, configured and installed correctly. This ultimately governs all safe cladding installations.

In closing, QUALICOAT UK & Ireland firmly believe that the 'perceived' reduction in risk is not necessarily mitigated by moving from 'A2-s1,d0' classification to 'A1'.

Members of QUALICOAT UK & Ireland believe education on the subject is required and will be approaching the relevant property stakeholders, such as insurance companies, local councils, developers and building funders. QUALICOAT UK & Ireland will make representation to protect the industry, to ensure specification freedom and to negate unnecessary surface finish costs.

A more detailed guidance note is available on the QUALICOAT UK & Ireland website.

The next QUALICOAT UK & Ireland members meeting takes place on 19th October 2021, at the Arden Hotel & Leisure Club, Solihull. Please contact the General Secretary, Jan Lukaszewski, via the QUALICOAT UK & Ireland website, should you wish to attend. For details on the availability of various colours and finishes contact any QUALICOAT UK & Ireland member for more information. For updated information about the use and specification of QUALICOAT in the UK and Ireland, please visit the UK & Ireland Association website.

By Angus Mackie – QUALICOAT UK & Ireland Chairman

07834 102701 www.qualicoatuki.org









PPC Aluminium Sheet - tested to BS 8414

Classification	
A1	No contribution to fire. Permissible under Part B Regulations for relevant buildings over 18m (11m in Scotland)
A2-s1,d0	
A2-s1,d1	Very Limited contribution to fire. Non-compliant for relevant buildings over 18m (11m in Scotland) but permissible for non-relevant buildings over/under 18m
A2-s1,d2	
A2-s2,d0	
A2-s2,d1	
A2-s2,d2	
A2-s3,d0	
A2-s3,d1	
A2-s3,d2	
B-s1,d0	Combustible. Non-compliant for relevant buildings over 18m (11m in Scotland) but permissable for non-relevant buildings over/under 18m
B-s1,d1	
B-s1,d2	
B-s2,d0	
B-s2,d1	
B-s2,d2	
B-s3,d0	
B-s3,d1	
B-s3,d2	
С	Combustible. Non-compliant for relevant buildings over 18m (11m in Scotland) and non-relevant buildings over/under 18m
D	
E	
F	

The fire classes stipulated in BS EN 13501

Curved Marmox Multiboards facilitate cylindrical facade for Kent property



The developer building a private property in the town of Westerham, has made full use of the flexible version from the Marmox Multiboard range in creating a two storey, drum-shaped elevation that is being finished using a proprietary render system. THS Homes Ltd. is building the £1.4 million three-bedroom, timber-framed home on a site where a previous dwelling has been demolished. Parker Building Supplies – a major stockist of Marmox products for wet rooms and other applications – supplied 50 of the 20 mm thick, 1250×600 mm boards to THS, whose own workforce fixed them over timber uprights at 300 mm centres, with a Tyvek membrane covering the main structural frame. The Site Manager for THS Homes, Tom Ellison, commented: "For the front elevation where we needed to create the quite tightly curved, rendered wall, we approached Parker Building Supplies as our main merchant. They basically advised us that Multiboard Curved was the only insulation board available which would bend to this sort of radius and offer a suitable substrate for the application of a Weber render system. The boards were easy to cut and fit and have proved ideal for the application."

01634 835290 www.marmox.co.uk

Colour me (any shade other than grey)



Dare you venture beyond the grey? That is the challenge being thrown out by Gilberts Blackpool, in a bid to brighten British buildingscapes, particularly where large banks of louvres are involved. The company – Britain's leading independent manufacturer of internal and external ventilation components- has invested almost £0.5m in state-of-the-art powder coating line that quadruples its colouration capacity, and can apply to any BS or RAL colour. "Look across any urban or built-up aspect, and almost all you see is grey," observes Ian Rogers, Gilberts Sales Director. "Grey clouds, grey concrete, grey aluminium windows, louvres. We have all the colours of the rainbow to choose from. It would brighten everyone's day if they looked around and saw more colour." Gilberts' entire range of architectural and external standard, high performance and acoustic louvres for façades, windows, plant screening and roof penthouses can all be appropriately powder coated in weather-resistant polyester paint, PVF finished or anodised. Adds Ian Rogers: "We love to rise to the challenge: who will be inspired, pick up the gauntlet and specify an impressive bank of louvres in a colour other than grey?"

01253 766911 www.gilbertsblackpool.com/architectural-and-external-louvres



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Decorative facades and sun protection

L'École Internationale Edward Steichen is a high school in Clervaux, Luxembourg, with room for 650 students. Jonas Architectes Associés won the assignment for construction and devised not only a plan for the buildings, but also an idea for decorative facades and sun protection. RMIG ImagePerf made it possible to realise their vision.

As the school is more or less surrounded by woodland on all sides, a striking photo of a spring forest from a nature park

in the Ardennes was chosen as the template for the facade image. Using perforation in various hole sizes, the beautiful image of the forest was transferred on to metal sheets.

Technical characteristics

Raw material: Aluminium EN 5005 Pattern: RMIG ImagePerf Thickness: 3.0 mm

Surface treatment: Anodising Finishing operation: Bending

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Six finishes are available within the new vintage range; Patina Copper, which offers that timeless blueish-greenish layer on the surface of copper that typically comes from age; Industrial Iron, it's changing metallic markings indicative of wear; Coracero offering that rust-like oxidative blend of orange reds; Antique Brass, with its rich brown hues and golden undertone; Rough Concrete, which is typified by its changing streaking from light to dark; and Fresh Concrete for that popular raw and unfinished look.

ALUCOBOND®, with the wide variety of forming and processing methods (roll bending or folding) available to it, opens up almost limitless applications to designers and architects, able to offer the 'vintage look' on all building types including high rise facade applications, due to the panel's lightweight construction.

ALUCOBOND® vintage is available for use on ALUCOBOND® PLUS and



ALUCOBOND® A2 and is both durable and long-lasting being resistant to weathering, erosion or corrosion for a look that will endure the lifetime of the building.

Additionally, when ALUCOBOND® vintage is used together with ALUCOBOND®

A2, the company's non-combustible panel with a mineral-filled core, it meets all the strict requirements of fire regulations too.

Paul Herbert, Sales Manager 07584 680262 www.alucobond.com







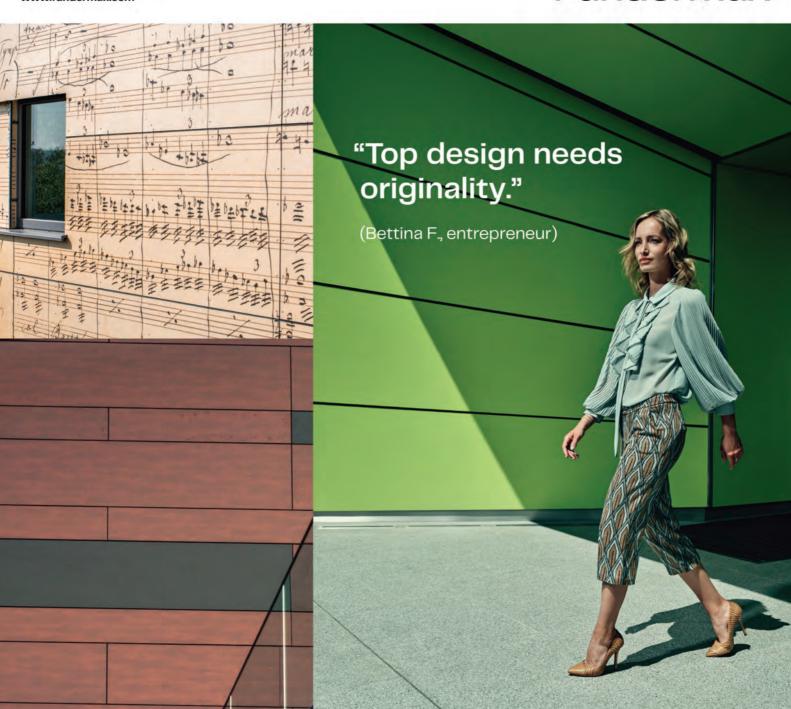
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The long road to remediation

Peter Johnson of Vivalda Group discusses the progress being made on remedying the unsuitable cladding on high rise buildings, and the complex issues which have made it frustratingly slow

hile the frustrations of architects, contractors and residents alike regarding the slow progress being made on the replacement of faulty cladding on high rise buildings is understandable, and there have been teething problems, the working group led by The Ministry of Housing, Communities and Local Government (MHCLG) is at least trying to grapple with the complex issues surrounding the replacement task.

The Grenfell Tower disaster is now universally acknowledged as the UK's worst housing failure. In its grim wake, we've had the Hackitt Review, then the Moore-Bick enquiry, which is now well into its second phase. In 2020, Housing Minister Robert Jenrick announced a fund of £1.6bn to fix affected high-rise buildings. Then in February of 2021 we saw an additional £3.5bn – meant to kick-start private contractors to commence work on unsafe blocks.

Since then, progress from the contractor's perspective has been very slow. While the funds initially sound impressive, it is now widely believed that the £5bn figure will need to increase significantly (some say tenfold) to adequately 'make good' all of the buildings at risk as a result of hazardous cladding.

While the ultimate budget required to fix the 470 plus towers affected by unsafe ACM cladding is still a matter of serious debate, and may need to be increased substantially in the future, this should not be stopping vital remediation projects from moving ahead. So, why are we not seeing the current £5bn fund turning into recladding activity? From our standpoint (sitting between the product manufacturers and the contractors) we know major strides have been taken to overcome most of the practical barriers to the remediation process.

Experienced installers, contractors and developers deserve recognition for their role here, but there is still a way to go. So, what



are the remaining challenges that are holding back the repairs?

Form fatigue

First off, the application process itself is highly complex, making the process to apply for funds slow, expensive and painful. Phrases that have been heard include: "One wrong entry on a page and the application needs to be completely restarted." It is also understandable that there are still significant numbers of project funding applications stuck in the pipeline awaiting further clarification before final approval, or just waiting for that final 'go' document.

By way of illustration, in May 2021 more than 650 projects were in application with only 22 funded projects either started or completed. However, at the same time the volume of ineligible applications, or ones that were incomplete totalled some 1,400. In this regard it does seem at least that we may well need a simpler application process, and perhaps even more proactive support with the correct completion of this onerous and complex application process.



We need to remember while the Government is funding the replacement of illegal cladding boards, this does not include other elements within the facade

Having said that, it does appear many proposed funding contracts are still held in the hands of the landlords and managing agents – resulting from what appears to be demanding contractual clauses regarding future and past liability. While ultimately designed to protect taxpayers, it's clear that a contractual stalemate doesn't exactly help those tenants or lease owners living in unsafe properties.

Liability issues

The contractual details surrounding the process of release of the funding is another issue that appears to be worrying many contractors. Funding penalties relating to late delivery, liability for poor workmanship associated with the original cladding system and its substructure, insurance cover for the project - all have led to contractors questioning their confidence in the funding system and how much risk they are prepared to expose their businesses to. As the economy starts to pick up, we have to remember these same contractors, who are in limited supply, have other options many of which are much more straightforward, and less risky.

In addition, there is the part-funding scenario created when assessment consultants or contractors peel away old cladding material only to find non-conforming insulation, framing and fixings beneath, which need to be replaced. In this regard we need to remember while the Government is funding the replacement of illegal cladding boards, the funding does not include other elements within the

facade system. The overall project can easily double if total replacement is required.

Another hugely significant cost that appears to have been overlooked is that of accommodation for residents while remediation work is undertaken. While not needed in all cases, it can be quite significant. The challenge is enhanced if we consider that it is needed in an environment of a chronic housing shortage.

Skills shortages

Finally, labour shortages mean that the construction industry is struggling to find enough skilled installers to undertake the remediation work. The correct installation of cladding – including fire breaks, insulation, fixings and boards – is not a simple task and requires specialist skills which often come from overseas.

These are projects that must be completed correctly, however skills shortages and the lack of available training within and for the contractor market will surely act as a further brake on progress.

To top it off, it appears there are also major material supply issues, with some contractors quoting 20 plus week deliveries on hard metals, insulation and wood. Not to mention recent volatility in timber and aluminium prices – making cost estimations extremely difficult. Add to this the impact of Covid, the recent blocking of the Suez Canal, HS2 and demand from other sectors of the industry, and it's easy to understand the scale of the challenge facing contractors and this remediation process.

Looking ahead, despite the lack of materials and labour and the ongoing contractual discussions, we will start to see more recladding projects coming on stream. In fairness, the MHCLG has faced a momentous and complex task, and they should at least be given credit for their genuine efforts to bring the industry together to bring non-specification cladding up to standard but it seems their job is far from complete.

I appreciate that balancing the rights of the taxpayer, managing limited budgets and addressing very complex questions surrounding contractor and landlord liability is not an easy task. However, I fear that the glacial speed of recladding potentially dangerous high-rise buildings has done little to assuage the fears of residents or improve the reputation of the construction industry.

Peter Johnson is founder and chairman of Vivalda Group

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Home extension reaches Finish Line

striking home extension is one of the first to be clad in the Finish Line Collection; a high performing timber cladding exclusively available via James Latham. It was developed by Lathams with Accoya Timber, timber engineering company Dresser Mouldings and Canadian coating specialist Sansin.

Paint it black?

The original brief called for charred timber. It was a material that designer Karl Harrison was familiar with, as he was instrumental in bringing the Shou Sugi Ban® brand to the UK. However, with this project he had something else in mind.

"I started using black materials a long time ago because they offer a higher contrast with plantings and landscaping. Any other colour and the greens tend to get lost", said Karl.

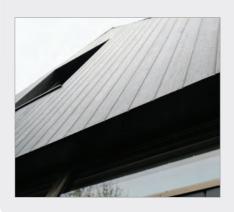
"But the market is saturated with black cladding with a range of black uPVC, aluminium and timber options available."

"With that, comes a sense of sameness. With my designs my aim is to take a trend and push it in a different way."

Looking for something special

When Karl was researching materials for the project he wanted something new and exclusive. Because it was an exterior cladding project, he needed something that would perform well, backed by a quality brand. That was where his relationship with Lathams came into play.

Karl said: "I often work with Lathams and have a great relationship with the team. I knew that there was a new product on the horizon because I'd been speaking to them at concept stage. We had a long discussion about brushing the timbers to change the grain and the kinds of colours that would be most desirable."





"Eventually, this would evolve into the Finish Line Collection. I was keen to use it as soon as I had the right project."

The perfect Finish

The foundation of the Finish Line Collection is Accova timber. With a warranty of up to 50 years when used above the ground, the product is a natural fit for cladding. It is well known for its durability due to the natural modification process (acetylation) and its performance rivals hardwoods.



Karl said: "Accoya is as premium as it gets when it comes to timber. Most timbers run the risk of splits or warps when you start to cut or adapt them. With Accoya, you don't have that worry."

"Once you add Sansin, with their range of colours and quality of treatment, and the unique machining from Dresser Mouldings, you have something that has the potential to be the market leader in cladding."

The cladding arrives on-site factory finished, front, back and ends, effectively encapsulating the timber in a breathable envelope. Additional finishing or touch ups are only required if any cuts are made.

The machining process that Karl refers to sees the Accoya wood profiled, surface

finished and coated by the team at Dresser Mouldings. This creates a key on the timber's face, with tiny variations in texture allowing Sansin's ultra-low VOC coating to penetrate beneath the surface of the timber. The advantage is that this helps to bind it to the cells and prevents peeling and cracking.

"Without this process you're just painting a piece of timber, which anyone can do," adds Karl. "That's fine but you don't get the texture and tactility. Personally, I like what I call 'disrupted materials' - a piece that has been modified to create a new and unique result."

Designing for the future

"I like to try and stay ahead of the curve, bringing innovative products and ideas to the market", Karl continues.

"That's where relationships are important. Working with manufacturers and distributors you can start to look for an edge by getting things created just for you and your clients. You often need materials turned around quickly, so a situation like Lathams buying Dresser Mouldings works very well. You know that they are going to have a good range of stock and the ability to add those finishing touches for you."

Exclusive to Lathams, the Finish Line Collection comes in 12 unique colours. It can be finished either brushed or sanded. and even in a distinctive two-tone effect. For this project, the Brushed Charcoal colour was selected.

Finish Line cladding is available as a standard 145 mm width at 15 mm thickness in LT AC01 and LT AC02 profiles.

info@lathams.co.uk

www.lathamtimber.co.uk/products/cladding/ finish-line-cladding-collection



beautiful cladding for exceptional buildings

Cladding is a serious business at Lathams.

We don't just stock cladding. We make it, we consult on it and we deliver it. From traditional hardwoods to modern modified timbers, unique coatings and factory finishes, even impact resistant High Pressure Laminates, we have you covered. From specialists in our depots to our own in-house machining and coating facility, you've never been better supplied.

For more information on our cladding range, and how we can help support your project, visit **lathamtimber.co.uk** or **email info@lathams.co.uk**

Petrarch makes its debut at the Filmworks

rchitectural Panel Solutions is proud to present Petrarch's debut at the Filmworks. Capturing all the 'glamour' and splendour of the roaring twenties' this latest scheme has now taken the lead in our ever-expanding portfolio. The result of an intensive and delicate restoration, architects TP Bennett have attentively preserved the art deco facade of Ealing's former Empire Cinema and the outcome is outstanding for end client St.George, Berkeley Group.

For a building with such status and heritage, both St. George and TP Bennett turned to a rainscreen solution which would not only project exactly the right image, yet stand up to the most demanding requirements. As a mixed-use development, comprising 209 new homes overlooking a central square, lined with bars and restaurants, and an impressive double-height entrance fover to the eight-screen Picturehouse Cinema, 'the biggest outside London's West End,' it was vital that the chosen rainscreen could withstand numerous vying challenges. Thanks to a comprehensive list of intrinsic qualities; including extreme weather resistance, durability, longevity, impact and graffiti resistance, as well as BBA, CWCT and NHBC 2021 certification, Petrarch ticked all the right boxes and exudes pure elegance with its smooth Alabaster finish.

In the words of the architect – TP Bennett

'A careful infill within an existing urban block, the scheme has been designed as a contextual response to the surrounding buildings in the conservation areas. Each perimeter facade is designed in a subtly different language, depending on the





character of the particular street it is facing. The architectural language changes towards the interior, where the contextual red brick and stone have been complemented with a more contemporary materials palette, including dark blue brick with contrasting green-glazed brick inserts and bronze-coloured cladding laser cut with a distinctive, three-dimensional geometric pattern.'

A showstopper of a development

Tom Walker, the Business Development Manager for the region had this to say about the prestigious project: "We're really pleased to have been able to supply our Petrarch engineered stone rainscreen to the impressive Ealing Filmworks scheme, clearly it captures the elegance of a decadent age and is timeless in its depiction. We are extremely happy to be able to add it to our ever expanding portfolio."

"The cinema and the complementary leisure offering are set to become a new centre for Ealing's wider cultural quarter."

Petrarch – the natural choice

Petrarch reconstituted stone rainscreen is engineered to perform, boasting technical excellence backed with certification and a plethora of finishes and colours; allowing architects and designers to unlock the potential of their design and realise their vision. Versatile and unique, Petrarch is created primarily from natural by-product materials; such as stone and marble. Highly durable and impact resistant, it's considerably lighter than natural stone systems and is extremely weather resistant - designed to withstand the most severe environmental conditions, and like natural stone, it matures over time, giving character and depth to any architectural scheme.

Petrarch reconstituted stone panels are manufactured in the UK where the product has been supplied to the rainscreen industry for nearly 50 years. Thanks to a robust distribution network it also adorns buildings across the USA and throughout Europe. When combined with Downer the original Helping Hand framing system it offers a complete, fire resistant rainscreen solution.

To find out more about the Filmworks project, or to book a CPD, please get in touch quoting ADF08.

01424 852641 www.petrarchpanels.com claddings@architecturalpanelsolutions.com www.architecturalpanelsolutions.com





PROJECT DETAILS

Rainscreen: Petrarch engineered stone rainscreen in Alabaster Smooth; 10mm Secret Fixed. Developer/Client: St. George;

Berkeley Group

Location: London, Ealing **Sector:** Mixed Use & Retail,

Residential

Scale: 8 screen cinema, 209 apartments, retail & restaurants

circa 35,000 sq ft

Architect: TP Bennett

Installers: Richardson Roofing &

The Goldsmith Group

Precision at the Thames Quarter



The Thames Quarter build to rent development comprises of a total of 315 apartments over a part 12 storey building and part 23 storey tower located in central Reading. **Precision's** scope consisted of a total 16,000 m² of insulated Metsec structural framing system

onto which a combination of Corium brick slips, Porcelanosa ceramic tiles and aluminium rainscreen cladding was installed to provide a variety of aesthetic finishes and provide an overall U-value of 0.232 W/m² K. The project was completed during the height of the Covid-19 pandemic still managing to meet the client's programme.

01244 445 020 www.precisionfacades.co.uk

Evoke and Evolve used for modern home



Marley Alutec's aluminium fascia, soffit and rainwater solutions have been utilised for a bespoke new build property in Norfolk. The products achieved an attractive, high quality and durable finish that will require minimal maintenance. Adam Reynolds, Director at Sheringham Windows said: "This was our first experience of installing Marley Alutec products but

after some initial instruction from Alutec on the best practice approaches with regard to the Evoke system, our team got to grips with it in no time." Adam concluded: "The customer was delighted with the finished result and we have already used Alutec products on several other projects."

01234 359438 www.marleyalutec.co.uk

Sika launches total Green Roofing package



Sika has launched a complete Green Roof package, supplying both the high performance roof waterproofing system and the green roof system, all backed by its trusted technical and application support. Specifiers can now go to

Sika's roofing experts for the full spectrum of roofing technologies, from hot melt structural waterproofing and reinforced bituminous membranes to single ply and cold-applied liquid membranes, depending on what is best for the project in question, all of which can now be laid with a Sika Green Roof system on top. The new systems are available in three of the most common green roof types – extensive, intensive and biodiverse.

01707 394444 www.sika.co.uk/roofing

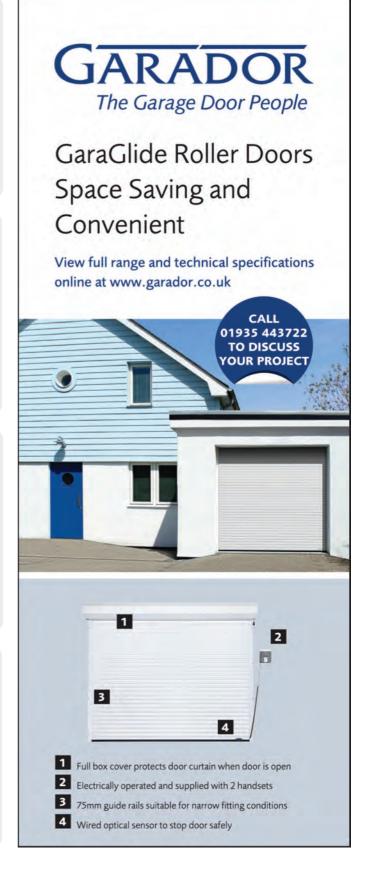
New website for Yeoman Rainguard



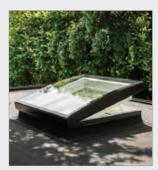
Yeoman Rainguard has launched a new website showcasing their highly acclaimed range of stunning rainwater systems. Along with the renowned XL & SL Aluminium gutters and downpipes, Yeoman Rainguard offer Cast Iron and GRP products also, all in a wide choice of profiles, sizes and

colour options. Rainguard's website now includes the new Squareline Fascia & Soffits options and a buy- on- line facility for the SL gutters & downpipes. Take a fresh look on the website!

0113 279 5854 www.rainguard.co.uk



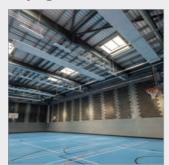
VELUX® introduces a new generation of glass rooflights for flat roofs



VELUX® has announced its new range of glass rooflights for flat roofs; a new generation of innovative and highly competitive flat roof windows with a minimalistic glass-to-edge design, joining the existing portfolio of VELUX domes. The new glass rooflights, fixed or electrically-vented, have a unique, glass-to-edge design which allow for 52% more daylight to enter the home compared to the previous generation. Anti-heat and blackout blinds can be discreetly placed in the base unit construction between the lower pane and outer glass, so as not to compromise on daylight, design or views up to the sky when not in use. Ideal for flat roof renovations and new build projects alike, the glass rooflights are a worthwhile investment for homeowners looking for a state-of-the-art finish to their home. With a hidden sash and slim frame, the rooflights achieve a modern aesthetic when installed. The curved glass rooflight also offers a clear view and drainage with the unique CurveTech design. The indoor comfort and peace of mind which comes with any VELUX flat roof window makes the new generation product offering a market challenger and sets the course for the future of flat roof windows. To find out more information visit:

velux.co.uk/products/flat-roof-windows

Daylight enhances wellbeing and learning



The use of daylight in educational facilities can be a hugely beneficial way to maximise student performance and productivity whilst at the same time helping to lower a building's energy use. By introducing rooflights, including domes, vaults, pitched skylights or panel glazing systems, it is possible to deliver resilient and future-proofed educational spaces that encourage learning, concentration and positive student behaviour. Partnering with local authorities, architects and schools, **Brett Martin** has a deep understanding of the specific requirements of the education sector. Providing expert, impartial technical advice on rooflight specification, the manufacturer's team has access to the widest choice of rooflight products available, in the full range of glazing materials. An intuitive and experienced technical team ensure compliance with Part L and help to achieve higher BREEAM ratings. At the Tauheedul Islam Boys High School in Blackburn, a range of rooflight solutions from Brett Martin are helping to deliver exceptional levels of daylight into the school and sports hall whilst reducing demand for electric lighting, lowering CO₂ emissions and running costs.

youtu.be/uAwCdvzgOpU www.brettmartin.com



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The 20mm AliDeck Junior Board is our most popular decking board, available in ridged and flat specification. Spanning up to 600mm, the cost-effective Junior Board requires less underside support than traditional decking and is non-combustible.

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www.alideck.co.uk



An education on exterior laminate

The new classroom extension to Hob Hill Primary School in Rugeley has been completed using MEG Exterior grade cladding in 781 Ash and 1831 Grey.

Designed by Seymour Harris Architecture and installed by Tetraclad, the extension encompasses new classrooms and staff room increasing capacity at this Ofsted highly-rated CofE and Methodist Primary school in the West Midlands.

The clever use of Ash woodgrain effect laminate fabricated into planks offset against



the darker grey boards which stand proud of the face contrast well together. MEG carries a BBA Agrément Certificate and F1 panels from 6mm and thicker are rated Class B-s1, d0.

This scheme is a perfect example of MEG in action where the need for high performance and durability is married up with low life-cycle costs and aesthetic design. Recent site surveys on several schools a decade after installation have highlighted the remarkable weatherability of MEG with the panels looking the same as when first installed.

The range comprises 58 colours and 29 woodgrains together with 5 concrete and metal effect finishes. MEG is also able to incorporate Abet's digital printing technology. This means that almost any design, photograph or pattern can be reproduced in stunning detail to give architects and designers unparalleled freedom to create unusual and dramatic building facades.

MEG is a self-supporting high pressure laminate (HPL) for cladding the exterior of buildings, balconies and other applications. It



features high resistance to temperature, climate shock, weathering, UV light and impact. Furthermore, its chemical resistant nature and closed structure do not allow paint in spray cans, various inks, emulsion paints, lipstick or pastel paints to penetrate into the decorative layer. This negates the need for any anti-graffiti treatment and makes the surface easy to clean.

020 7473 6915 uk.abetlaminati.com

Helping you to

build your future

Precision Facades is a through wall facades contractor specialising in lightweight steel framing, rainscreen cladding, glazing, EWI and render systems.

We support our clients from early design stages through to the supply and installation of various bespoke systems, whether acting as principal contractor or specialist sub contractor our job doesn't stop there. We also offer support throughout the lifetime of the building via various maintenance and upgrade options.

Our expert team has a wealth of experience, having already successfully delivered projects nationwide across various sectors with values ranging from \$250k - \$8m.











Fassa Bortolo helps transform new Co-op

Italian render manufacturer, Fassa Bortolo has recently added convenience and service provider, the Co-operative Group, to its list of commercial brands completing a new render project at Maypole Garage in Bream, Gloucestershire. With a brief to source a high quality, long lasting render that would suit the store's high traffic environment, following a full specification assessment from the expert team at Fassa, Woodman Brothers, in Bristol, supplied the materials for the Project. The Project was completed with one of the popular Fassarend systems, using Externalight as the render carrier board. The base coats used were Fassa A96 and Fassa before finishing with Fassa RX561 and Fassa PX505 acrylic based siloxane topcoats this gives better performance and maximum resistance to weather and improve overall colour quality. Stephen Gore, Fassa UK area sales manager for the region, added: "We're thrilled that internationally recognized brands are now looking to Fassa Bortolo to specify a render system they can trust."

01684.218305 www.fassabortolo.co.uk

vacuum Insulation Panel fully encapsulated in PIR protective case

ultimate insulation value λ 0.008 W/mk

Insulating where there is no space?

λ 0.006 W/mK VIP core

Epossible

Deck-VQ°

Fully encapsulated Vacuum Insulation Panel, providing ultra-high thermal performance in flat roof and terrace applications.

Say goodbye to issues when installing effective insulation on flat roofs and terraces where space is tight and where height constraints exist. With a thermal performance of the core of lambda (λ) 0.006 – the best performance in the market – Deck-VQ VIP panels allow you to achieve a U-value of 0.18 W/m²K with just 60mm thick board. It's time to think thin.







New ROCKWOOL Red Book released

A 2021 version of the ROCKWOOL Red Book has now been released, capturing a series of key technical updates to ensure that this interactive guide to stone wool insulation will continue to save specifiers' time and make it simple to identify the right product for facade, wall, floor, and roof applications. Launched last year in an all new interactive format, the ROCKWOOL Red Book is a powerful digital tool which provides access to technical data, product certification and a wide range of specification support materials across the ROCKWOOL product range. One of the major updates is the inclusion of British Board of Agrément certification for the ROCKWOOL HARDROCK® range of flat roofing products. ROCKWOOL HARDROCK® Multi-Fix and Tapered were recently certified by the BBA following rigorous testing of their durability, thermal and fire performance. This independent accreditation validates the suitability of these products in a flat roof application.

01656 868 490 www.rockwool.com/uk/redbook

StoSilent Distance brings peace and quiet



The StoSilent Distance system from **Sto** has been installed at the new Prof. Lord Bhattacharyya Building, home of the National Automotive Innovation Centre, on the University of Warwick campus. Over 2,000 m² of the StoSilent Distance system was installed

around the curving balustrades and street level ceilings which feature in the multi-level atrium area. The StoSilent Distance system includes the Sto minimal void SW150 metal profile sub-construction which can be installed and adjusted to suit a very wide variety of application requirements, providing a tremendous range of design possibilities.

0141 892 8000 www.sto.co.uk

Updated online Fan Selection Program



Leading British ventilation manufacturer Vent-Axia is dedicated to making it as easy as possible for its customers to find the product information they need. The company has therefore updated its online fan selection and quotation tool

as part of its continued digital transformation. Vent-Axia's upgraded Fan Selection Program (FSP) is set to further improve customer service by making it even easier for specifiers to use the tool to select the right ventilation for a project. Now mobile and tablet friendly, the FSP offers wider access for customers.

0344 856 0590 www.vent-axia.com/tools-services/fan-selector

Gilberts sets the atmosphere for a new museum for the future...



The atmosphere in a "world class" space for the curation of cultural artefacts, music, song and dance is being set through a continuous linear approach from Gilberts Blackpool. Manchester Museum is currently working towards a £13.5m capital transformation 'hello future', which is optimising existing space between the venue's existing Grade II and II* listed buildings with a two-storey steel frame extension. The ground floor of the new building almost trebles the Museum's special (temporary) exhibitions gallery space, and also features improved visitor facilities including a pop-up coffee shop, circulation space and an indoor picnic area. To ensure the correct atmosphere for both exhibits and visitors, M&E contractor A + B Engineering has chosen Gilberts to provide the solutions. Gilberts' MBD diffusers up to 21 m long run the length of the main exhibition space, strategically located between acoustic rafters in the ceiling grid to provide two-way supply of fresh air without draughts across the floor space. In the new toilets, Gilberts' SX200 and GX100 air valves respectively provide supply and extract. All have been powder-coated in house to RAL9010.

01253 766911 info@gilbertsblackpool.com

AET Flexible Space – A-Void-ing Change



By definition, the word innovation is 'a new method, idea or product' and adaptability is 'being able to adjust to new conditions' which is something we've all had to do over the past 18 months. By using the void beneath the raised access floor, this allows conditioned air

to be easily distributed and subsequently delivered into the space via active Fantile units. In doing so gives landlords, operators and end users with a truly flexible and adaptable solution as well providing numerous benefits throughout the design process and life cycle of the building. Visit the AET Flexible Space website for more information.

01342 310400 www.flexiblespace.com

New Smart Multi-site Control Solution



Panasonic Heating & Cooling Solutions has introduced the Smart Multi-site Control Solution, a twofold, enterprise-wide energy management platform for corporate HVAC installations. This solution offers a dual approach: AC Smart Cloud is designed to be used by business owners and

facilities or energy managers for remote control, reporting and scheduling, while the AC Service Cloud is an ideal solution for HVAC professionals requiring remote access to a system for maintenance and monitoring purposes. The solution is ideal for organisations wanting instant and comprehensive data of building or campus-wide HVAC systems.

01344 853 393 www.aircon.panasonic.eu/gb_en

National Ventilation scores a hat-trick



National Ventilation, a leading UK-based ventilation manufacturer and supplier, designed and supplied ventilation for the Middlezoy Rovers FC clubhouse. The Somerset-based project used a mixture of three fans, which were installed by M-Tech (sw) Ltd:

Monsoon Zone 1 Silent fans, Monsoon ILF inline centrifugal fans, and Monsoon ACF acoustic inline fan to provide effective ventilation in the function room, WCs, the kitchen, club room and changing rooms. National Ventilation's free design service includes unit calculations, a full kit list as well as recommended duct routes.

01823 690 290 www.nationalventilation.co.uk

Royal College of Physicians at The Spine



The stunning £35m building The Spine, has opened as one of the world's healthiest buildings, meeting the WELL Building Standard using Waterloo's industry-leading air distribution products. The high-quality Waterloo CS-F Linear Slot Diffuser was used

as a consistent visual approach for most of the building. A key advantage of the CS-F is that it could be carefully adapted to suit the various feature ceiling types and the plank tile ceiling systems. Swirl Diffusers and Airline Linear Grilles were also selected and finished to suit the high-quality interior design throughout the building.

01622 711500 www.waterloo.co.uk

Stelrad releases latest CPD



Stelrad has launched the latest in a series of CPD programmes designed to help people to utilise radiators in a variety of scenarios and circumstances. This CPD offers a guide to heating a home with heat emitters on low temperature systems, and has been fully accredited by CIBSE and RIBA. Stelrad is future proofing its radiators for the future and they

know that in well insulated homes, if sized properly, their radiators are 'fit for the future' as they move into a phase where renewable heating systems are set to take over and replace traditional boiler driven heating systems. To find out more about the seminars, get in touch.

01709 578950 info@stelrad.com

Gilberts blurs the lines at regeneration



Lexington Liverpool is taking linear development to new levels- through to its ventilation. At 34 storeys high, the Moda Living residential development will be the tallest residential landmark in the £5.5bn Liverpool Waters regeneration of the city's

Docks area. Throughout its public areas, and the six penthouses on the 33rd floor, **Gilberts'** new JSL "jumbo" linear slot diffuser provides "floating" separate air supply and extract. JSL units up to 3000 mm long have been incorporated in amenity zones. The JSL configuration at Lexington provides to 187l/s/m of fresh air supply.

01253 766911 info@gilbertsblackpool.com



DRU Maestro 60 luxury gas fires now in extra tall options



The DRU selection of Maestro premium gas fires has been enhanced by new Tall models for installation anywhere around the home.

The Maestro series features the exclusive DRU Dynamic Flame Burner®, which generates high, dancing flames with the option of new DRU Eco Glow LED generated glowing embers across the entire fire bed. The fires can be controlled using the DRU Eco Wave app for smartphones and tablets, which enables the users to set their own preferred flame pattern and regulate the gas consumption.

The Maestro 60 Tall model has a compact 60 cm width for installation into false chimneybreasts. There are now Maestro 60 Tall front-facing, 2-sided and 3-sided models. The front version has a window height of 80 cms, with the 2 and 3-sided versions having heights of 75 cms. They have black, Ceraglass or matt glass interiors and can be combined with a wide choice of surrounds and frames.

An additional feature is the DRU Easy Release door system. This has concealed hinges at the top of the glass door with a button-operated drop-down facility, which enables cleaning the glass, re-arranging the logs and other forms of maintenance.

All three models have A energy labels and over 90% energy efficiency. Because they are balanced flue gas fires, they can be installed in a wide variety of locations. And with the DRU PowerVent® extended, fan-assisted flue system they are suitable for luxury apartments, hotels, restaurants and other domestic and commercial settings.

The new Maestro 60 Tall series will be available to approved DRU UK fireplace dealers by autumn 2021.

info@drufire.co.uk www.drufire.com





Electric avenues

Following the announcement of the Government's Clean Air Strategy in 2019, Andy Hitchman of Solution Fires discusses how the new legislation supports the positive environmental benefits of electric fires

ew restrictions, forming part of the Government's Clean Air Strategy, mean bagged coal and wet wood of less than two cubic metres cannot be sold, and wet wood in larger volumes must be sold with advice on how to dry it, prior to burning. These changes also mean all manufactured solid fuels must now have a low sulphur content and only emit a small amount of smoke.

These restrictions come on the back of the Future Homes Standard announced in 2019. Part of the standard, which launches fully in 2025, is the introduction of a minimum environmental standard for all new housing, including a commitment to removing traditional fossil fuel heating systems.

There are a variety of alternatives to wood and coal fires, and in the light of the above challenges there are key environmental benefits to be gained from installing electric fires.

Electric fireplaces are considered one of the most eco-friendly fireplace options as they cause almost no direct environmental impact and indirect impact is low-tomoderate for most areas.

Electric fireplaces are set to have a secure future in relation to the Future Homes Standard. Even though this regulation places greater scrutiny on traditional fireplaces, it helps demonstrate that the electric fireplace is going to likely be the eco-friendly option going forward, especially in the hindsight of an electric fireplace being considered more efficient than an average home's main heating system.

Additionally, people with open fires will be required to purchase cleaner fuels, although this is subject to change, as with every source of fuel being burnt causing air pollution, it can be detrimental and harmful to human health. The use of open fires raises health and safety concerns, most notably to people with asthma who have a higher chance of having an asthma attack



from breathing in the toxic fumes.

The government's Clean Air Strategy commits them to put their ambition into action, supported by the words of Environment Minister Rebecca Pow, who said "cleaner fuels are not only beneficial for the environment but also



Electric fireplaces also allow for plenty of design creativity. You can install an electric fireplace almost anywhere you can imagine in a home

consumers, as they create less smoke and soot and more heat".

The Minister also recognised however that there is still a huge amount of work to be done to tackle pollution from all sources, but this is certainly a positive step in making sure future generations can breathe cleaner air.

Reasons to go electric

An electric fireplace can go in any home and work with every style from 'country chic,' to Victorian or modern. Electric fireplaces can be put almost anywhere since they do not require venting, gas lines or wood storage. They are a welcome alternative to installing wood or gas fireplaces, and today, many flats and newer builds often have restrictions on installing traditional fireplaces.

Using an electric fireplace is one of the greenest ways of providing heat for your home. No fuel is burned using this method of heating and they can thus offer zero emissions, reducing carbon and other air pollution.

The latest technology for electric fireplaces can help create the right type of mood or feel. Many offer a variety of

different lighting combinations, realistic logs and flame effects for impressive displays in any room.

Electric fireplaces are designed to be the easiest type of fireplace to install and maintain. It's as simple as 'plug and go.' As fireplaces do not burn wood or emit any kind of smoke or fumes, homeowners can enjoy the benefits of a safer fire, at a fraction of the cost.

One of the key benefits of electric fireplaces for owners is their long life, because they are not subject to any problems like rust or corrosion. They can even look as good as the day they were installed, years later, and require minimum maintenance to keep them looking in mint condition.

Electric fireplaces also allow for plenty of design creativity. You can install an electric fireplace almost anywhere you can imagine in a home. This kind of flexibility provides the opportunity to add a touch of elegance and warmth to a bedroom, den, playroom, bathroom, on an inside or outside wall – sometimes, even in the middle of a room.

Andy Hitchman is managing director of Solution Fires







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Help to make your house a home with our contemporary wood burning stoves. Not only do our stoves offer you a reliable source of heat, but they also can give your room an impressive focal point by adding and creating a beautiful ambience. A contemporary wood burning stove can be a wise investment due to its ability to save you money on your energy bills in the long run, whilst also being an environmentally friendly alternative to normal heating. View the key benefits and other information below.

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 - Carbon neutral
 - 5 year guarantee



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020 7731 5025 | sales@realflame.co.uk www.realflame.co.uk

Take off the pressure with high pressure laminate from UNILIN Panels



UNILIN Panels HPL (High Pressure Laminate) brings cost-effective wood, stone and decorative structures to decorative applications, furniture, worktops and doors. Providing a cost-effective answer to surface finishes, UNILIN Evola HPL is available in 195 looks, unlocking a world of creative finishing in everywhere from offices and hotels to shops and restaurants. The collection has been made to provide furniture manufacturers and interior fitouts with an unmatched range of true-to-life wood and stone finishes, as well as decorative effects such as brushed metallics and a wide spectrum of solid colours. UNILIN Evola HPL is developed entirely in house for original finishes that can't be found anywhere else. Regardless of the look, every UNILIN Evola HPL delivers a cost-effective finish that's hardwearing enough for use as worktops and desks, doors, drawer fronts, shelving and anywhere that needs a tough but beautiful finish. Resistant to UV light, UNILIN Evola HPL is also a breeze to take care of, bringing the look of original materials with none of the hassle. For intense use, HPL is often the go-to product for specifiers, but thanks to the fact that UNILIN Evola panels and edge tape are all colour matched, the entire portfolio can be combined easily.

info.panels@unilin.com www.unilinpanels.com

Winchester City Council goes above and beyond with accessible bathrooms at Park



Winchester City Council has demonstrated its continued commitment to go above and beyond, in providing five highly specified Changing Places bathrooms in its recently opened Winchester Sports and Leisure Park. Pressalit was asked to specify a range of state-of-the-art products for each of the bathrooms that would suit both adults and children in a multi-user, public environment. Working closely with LA Architects, Pressalit responded to the Council's desire to provide enhanced facilities for members of the community with disabilities. For example, three of the five bathrooms benefit from the Pressalit electrically powered height adjustable toilet, exceeding even the recommendations in the British Standard. In addition to the toilet lifters, all five Changing Places facilities include Pressalit's electrically powered height adjustable Matrix Medium wash basin, their award-winning height adjustable Shower Change Table 3000, as well as drop down hinged support arms and grab rails. Cubicles in a number of other communal accessible changing areas also include Pressalit's height adjustable shower seat, along with additional support arms and grab rails.

0844 8806950 www.pressalit.com

Domus Ventilation launch Solis Air Brick™



Domus Ventilation has launched Solis Air Brick™ low resistance, non-combustible metal air bricks that are fully compliant with the revised Building Regulations Fire Safety Approved Document B. Changes to the Building Regulations, which came into force in

2020, requires "Ductwork penetrating through the external cavity including termination to be non-combustible" when above 18 m in England and 11 m in Scotland. The new Solis Air Brick is made from 1.5 mm galvanized steel (fire class A1) non-combustible material to meet these changes to the regulations and ensure compliance.

www.domusventilation.co.uk

Solution Fires – Excellence in Electric



Solution Fires is a new generation of highly efficient, authentic and stylish electric fires. The focus of your living space, these fires have been designed and manufactured with optimal controllability of heat, light and sound as the critical elements. Controllable from your handset, via Alexa or through the app on your

smart phone or watch, you can customise your fireplace to suit your individual taste. No electric fire, currently on the market, has the level of product features or attention to detail that solution fires have as standard, supported by a high level of genuine customer service.

01462 813138 www.solutionfires.co.uk

Knowledge, experience and ability to help



Real Flame sell and install all types of fires including electric, flueless gas fires, log burning stoves and the latest manual and remote controlled bio ethanol fires. Particularly, but not exclusively, where

there is no chimney, flue or gas supply available. Their installers undertake everything from sweep, test and certificate flues, line chimneys, install independent flue systems, fit hearths, surrounds and fires in re-builds and new developments. Real Flame stocks a wide range of accessories such as fire screens, companion sets, high definition logs, pebbles and other fuel beds for gas and bio ethanol fires.

020 7731 5025 www.realflame.co.uk

Complete freedom in chimney design



Exodraft chimney fans allow for complete freedom in chimney design on open flue gas appliances allowing for horizontal flues, multiple changes in direction and wall mounted termination. By powder coating to any RAL colour or incorporating the

chimney fan within a purposely designed structure the exhaust on the roof can be aesthetically pleasing and part of the design. Exodraft fans also provide guaranteed chimney draught on Open Fires and Wood Burning Stoves improving efficiency and reducing harmful particles by up to 80% inside the property and 20% at the terminal.

01494 465 166 www.exodraft.co.uk

Why Schlüter-KERDI-BOARD ticks all the boxes for architects

n absolute must for architects when specifying a wetroom project is ensuring that they have the right products in their arsenal to tackle any situation that may arise. Schlüter-KERDI-BOARD is a prime example of this kind of product – the BBA-certified tile backerboard is a popular choice due to the ease of use and flexibility offered.

Here are just a few reasons as to why it is such a widely specified product for use with tile and stone installations.

It can be a big timesaver

When a product can shave time off without compromising on the quality of a project, it is usually worth keeping around. In the case of Schlüter-KERDI-BOARD, the combination of a foam core with a fleece bonded surface means that it is already fully waterproof without the need for additional finishing processes. Foregoing this step entirely can save valuable time.

There is more than meets the eye

Whilst the backerboard is light enough to transport with ease, it also has considerable strength. Though you may not guess from looking at the lightweight components, Schlüter-KERDI-BOARD can support up to an impressive 60kg/m^2 , making it a great substrate for many different installation projects.

You can get your creative juices flowing

With seven thickness options to choose from, the versatility of the backerboard makes the







possibilities endless. As well as using Schlüter-KERDI-BOARD as an overlay onto an existing substrate, you can create features such as shelves and seating with the boards at the thicker end of the range used as construction panels, allowing you to think outside the box.

It can have a positive impact on the work environment

Schlüter®-KERDI-BOARD accepts screw fixings with washers without breaking, resulting in less wastage than with brittle cement-faced boards. In fact, the whole ensemble is cement-free, eliminating dust and allowing tilers to maintain a healthier working environment as well as increase productivity.

There are plenty of options

Alongside the standard board, there are further variations to meet your design needs. To create a curved feature, use Schlüter-KERDI-BOARD-V which has ready-made grooves specifically for this purpose. Schlüter-KERDI-BOARD-N is a range of fully sealed prefabricated niches to add simple and stylish integrated shelving to a bathroom project.

Whatever your specification requirements, Schlüter-KERDI-BOARD is on hand to aid in the creation of a reliable, CE marked waterproof system. For further information about the products and services Schlüter can offer, visit the website.

01530 447991 www.schluterspecifier.co.uk

Matt Fjord Green and Matt Grey added to Sento - VitrA's Scandi-style bathroom range

Sento, the Scandinavian inspired bathroom range from VitrA Bathrooms, has been extended to include a striking Matt Fjord Green and a stylish Matt Grey finish. The new matt finishes complement existing matt palettes of Anthracite and White. The VitrA Sento range features delicately rounded profiles, with Oak accents in sizes and furniture combinations that can be tailored for small bathrooms and scaled up to suit the largest.

Sento furniture units can be mounted with or without oak legs and there is the option to



mount one of the storage units onto a stylish oak console table. Washbasin vanity units are available in different widths (50 cm, 65 cm, 80 cm, 100 cm) as well as a double washbasin unit (130 cm). The washbasins have deep bowls, a large vanity area and back rim features. LED sensor lighting under the washbasin units adds to the feeling of space and creates a reassuring glow at night. Soft close drawers that fully extend are complemented by non-slip mats in all drawers and glass shelves throughout the range. Stylish storage options include a tall unit, laundry unit, wall cabinet and mid unit.

In addition to the wall-hung WC, there are close-coupled and back-to-wall WC options. The slim WC seats and cistern lids add elegance and clean lines. WC pans with Rim-ex technology are available within the range, which helps prevent the spread of germs thanks to its easy to clean design.

01235 750990 www.VitrA.co.uk





Reflect your lifestyle with Bespoke sliding doors





Transform your space with bespoke sliding doors from Mirror Door Systems Ltd. Established in 1994, the company is known for its quality, workmanship, and efficient delivery. We like to work closely with our customers to explore their ideas and come up with a bespoke solution just for them. With this level of service, it's easy to see why Mirror Door Systems Ltd is a leading UK provider of made to measure sliding doors. The full range now extends to 5 superb systems and 40 colours to choose from.

Contact Mirror Door Systems today on 01268 573357, email info@mirrordoor.co.uk or visit the website for more information





Reflect your lifestyle with sliding doors



Transform your space with bespoke door fronts from Mirror Door Systems Ltd, known for its quality, workmanship and efficient delivery. The company likes to work closely with customers to explore their ideas and come up with a bespoke solution just

for them. They can come to the showroom to get ideas for what they want or come to us with a fully formed idea. Mirror Door Systems Ltd can normally accommodate every customer's preference. With this level of service, its easy to see why Mirror Door Systems Ltd is a leading UK provider of made to measure sliding doors.

01268 573357 www.mirrordoor.co.uk

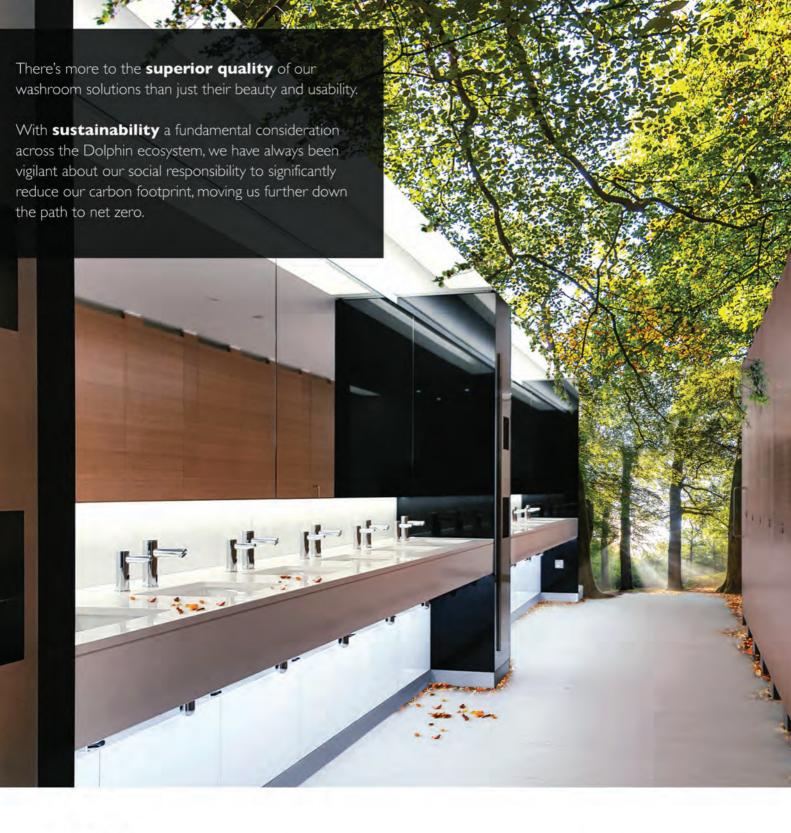
Sanicubic 1GR finds favour in Ireland



A powerful black water pumping solution from Saniflo is helping to provide waste discharge solutions for buildings across Ireland. The floor-mounting Sanicubic 1GR is a product from the Zehnder Pump range, now part of the Saniflo SFA Group. Highly rugged and durable

and available as a single or three-phase option, the 1GR is designed to pump waste up to 39 m from domestic and commercial buildings. The compact unit has a capacity of 55 litres and multiple inlets for connection to up to four appliances and is IP65 verified. A hard-wired control box is supplied as standard for early warning of any issues.

020 8842 0033 www.saniflo.co.uk





Dolphin Solutions Ltd Southpoint, Compass Park, Junction Road Bodiam, TN32 5BS, United Kingdom T +44 (0)1424 202 224 info@dolphinsolutions.co.uk dolphinsolutions.co.uk

Design and value objectives met at Vita Living Circle Square

VC Commercial Luxury Vinyl Tiles have been specified at Vita Living Apartments, Circle Square, Manchester.

Standing on a former BBC site, the new Circle Square neighbourhood is at the heart of Manchester's construction boom. As part of the development, Vita Living Apartments provides high-quality rentable accommodation and a superb range of amenities for tenants wanting vibrant city centre living.

Luxury Vinyl Tiles from IVC Commercial feature throughout Vita Living Apartments. Upon completion of the development, more than 50,000 m² of Belgian-made Luxury Vinyl Tiles will be installed throughout living areas, corridors and amenity areas.

Following on from four other successfully completed projects, Vita Living's own development team selected a range of authentic Luxury Vinyl Tiles that utilise a performance 0.55 mm wear layer construction designed for commercial environments – an



ideal balance between a design that creates a marketable interior and a finish that delivers excellent long-term value.

For apartment living areas and bathrooms, Moduleo 55 Woods was chosen to provide a home-like feel, while Moduleo 55 Tiles and Moduleo 55 Expressive were selected for amenity areas. Creating a stand-out feature around lift areas, Vita Living's development team opted for Studio Moods in a small herringbone laying pattern.

The development team at Vita Living says: "We wanted a floor that underlined our ethos of high-quality accommodation and IVC Commercial's Luxury Vinyl Tiles supported that. The authentic look provides an important connection to natural finishes, while staying easy to care for which is an important consideration. The floor's durability also helps to prolong replacement due to wear, helping us to provide investors with a building that delivers better value."

Moduleo 55 features 50% recycled content from IVC Commercial's in-house recycling facility and is made with renewable energy from the manufacturer's own wind turbines. All raw materials are sourced from a 100% European supply chain for assured quality.

Installed by Active Flooring, the project demonstrates the ability of IVC Commercial to meet the service demands of large-scale projects.

01332 851 500 www.ivc-commercial.com

White Tulip from Duravit



White Tulip is the first complete bathroom range created entirely by Philippe Starck for **Duravit**. The elegant shapes echo the organic silhouette of a tulip in bloom. The design of the free-standing ceramic washbasin is particularly eye-catching

and the corresponding furniture is available in a choice of five highquality colours or as a solid wood finish. Fitted with striking ring pull handles, the drawers feature a self-close action and there is automatic interior lighting when the drawer is opened or closed.

01908 286680 www.duravit.co.uk

Introducing the Superplan Zero



Superplan Zero, is the latest shower floor from Kaldewei and promises a completely floor-level finish. When creating Superplan Zero, Kaldewei took on board the wishes of their customer's creating a product that is totally flat to the floor, with zero steps, zero edges, and zero compromises. Developed by

the award-winning Berlin product designer Werner Aisslinger the Superplan Zero maintains Kaldewei's green credentials with its luxurious steel enamel base it is both durable and 100% recyclable.

01480 498053 www.kaldewei.co.uk

The allure of Aspen



As one of the UK's leading designers and manufacturers of design-led, premium quality wardrobes, room dividers and dressing rooms, **Draks** optimises space wherever it is needed in today's beautiful home. What's more, every aspect of the

project is controlled by the in-house team in Oxfordshire – from design, through to manufacture and installation – and only UK sustainably-sourced materials, of the very best quality, are used. The Aspen collection of beautifully-finished, solid wood, wide frame sliding wardrobe doors is ideal for making a bold statement in the bedroom.

www.draks.co.uk

Hunter Douglas metal ceilings showcased



Hunter Douglas Architectural demonstrated why it is one of the foremost architectural global architectural products companies, when it supplied ceilings for a new £55m sports and science centre at one of the UK's leading independent schools. For the common areas and classrooms, Hunter Douglas Architectural, which was specified

by OMA, supplied 4,600 m 2 aluminium open cell ceilings, Cell 40, module 50, in panel size 600 x 1200 mm. These strong, lightweight tiles are produced from 100% recyclable 0.4/0.5 mm aluminium.

01604 648229 www.hunterdouglas.co.uk

The importance of specifying the correct floor for dance and dance education

hether you are specifying a dance floor for the world's leading dance companies or for classes in schools, colleges or universities, the same fundamental criteria apply. Wherever a student chooses to study dance, it is important to make sure that the learning environment is equipped to professional standards with sprung floors, mirrors and barres.

Sprung floors

Choosing the correct dance surface is vital for dancers' health, safety and artistic performance. All sprung floors are not the same and understanding the differences between various types of floors is important.

Experts in biomechanics have established a link between the quality of a dance floor and the likelihood of injury, demonstrating that a floor with a consistent response and the correct degree of 'traction' is vital.

The Performance Surface

One of the main attributes that dancers look for in a floor is slip resistance or 'traction'. Although athletes share the risk of slipping and falling, they are generally protected by their footwear from floors that might be considered a slip hazard for dancers.

Harlequin floors are the performance floor of choice for the world's most prestigious dance and performing arts companies, theatres, venues and schools. Harlequin's reputation is founded upon the design, manufacture and supply of a range of high quality sprung and vinyl performance floors specified by the world's leading venues.

Case Study Kingston University – The Town House

A recent Harlequin project was the new Town House building at Kingston University.

Designed by RIBA 2020 Royal Gold Medal winner and Stirling Prize nominated Grafton Architects and constructed by Wilmott Dixon Construction, work on the £260m project started in 2017 and was completed in January 2020.

The new facilities transformed the entire estate including a performance auditorium and teaching space and three specialist dance



studios. For the three studios Harlequin supplied and installed a fully floating Harlequin Activity sprung floor with Harlequin Cascade and Harlequin Standfast vinyl performance surfaces totalling over 330 square metres. Harlequin Ballet Barres and Harlequin Mirrors completed the dance studio facilities.

In the Performance Teaching Space, a Harlequin WoodSpring sprung floor system with a Harlequin Standfast vinyl top surface was supplied and installed to an area of over 180 square metres.

Jason Piper, Associate Professor of Performing Arts at Kingston University said "I'm always reassured by the quality and consistency of Harlequin floors. All the floors are of the highest quality and allow teachers and students to move with confidence, happy in the knowledge that resistance and shock absorption is consistent across the entire floor and safe across all expected levels of humidity. The mirrors are huge and provide distortion free reflection and virtually seamless joins".

Ensure correct specification

Harlequin is the global brand leader for sprung and vinyl performance floors and has an enviable portfolio of dance and education clients from top universities and dance schools to the world's leading dance companies including the Royal Opera House and Royal Ballet, Paris Opera Ballet, Houston Ballet and New Zealand Ballet.

Harlequin has over 45 years' experience manufacturing, supplying and installing professional performance floors and offer a wide range of sprung floor systems and vinyl performance floors to meet every requirement.

01892 514 888 www.harlequinfloors.com



Does your Resilient flooring have a hygiene problem?



t Bona we are passionate about finding new innovative solutions in all areas we are involved in and are now able to offer a comprehensive range of sustainable, high-performance products and systems for resilient flooring. We have applied our expertise with coatings and maintenance products to create a totally unique program for caring for and maintaining resilient flooring effectively and with minimum disruption. Our highquality Care program allows the ongoing maintenance of resilient vinyl, PVC, linoleum, and rubber floors to ensure continual performance and also allows floors to be transformed when worn or degraded, rather than replaced. In heavy traffic scenarios surfaces can be sealed for additional durability and long-term protection.

Floors face a range of challenges; from busy airports to hotel lobbies, which require a pristine appearance, to hospitals and kitchens that demand the highest levels of hygiene. Our simple system allows the professional to tailor a maintenance regime to the specific requirements of each floor.

In terms of preserving the life of a floor's surface, regular cleaning is the key. Bona's cleaning treatment works effectively without harming the surfaces or the environment. However, over time and with heavy wear and stubborn stains, an occasional deep clean may be necessary. Using the Bona PowerRemove R with the Bona PowerScrubber solves this issue, reviving resilient floors without the inconvenience of disruption due to renovation.

Over time, repeated deep cleaning and the heavy trafficking regime may diminish the appearance and quality of the surface. The application of a new protective layer restores the original lustre and prolongs the life of the floor. Safe, quick and easy, Bona's protective treatment restores floors bringing them back to life rapidly. Prior to the introduction of the protective layer the floor would be subjected to deep cleaning.

Some resilient floors become damaged and heavily worn, often patchy in appearance. Traditionally this would be the point where the floor is replaced. However, with the unique Bona Recoating treatment, vinyl, PVC, linoleum, and rubber floors can be





resurfaced quickly. This process can involve a complete transformation of the floor as it can be recoloured, using Bona Pure Colour, before protective layers of a transparent coating, Bona Pure or Pure HD are introduced. By renovating the existing surface rather than replacing it, a lengthy installation period is avoided along with the inconvenience of disposing of the old floor.

The Bona Resilient System can also be used for coating new resilient flooring, such as LVT, following installation. The primary difference with LVT compared to other types of resilient flooring, is the fine cracks between adjacent LVT elements. Resilient flooring such as rubber have welds where the sections meet, providing a continuous, sealed surface. This prevents moisture ingress but also renders the surface easier to clean and specifically, prevents microorganisms from occupying these areas of the floor.

A renovated floor also means a healthier floor. Renovating ensures that bacteria and microorganisms are eliminated – even those hiding in joints, scratches, and other hard-to-reach areas. Independent testing verified that a smooth, joint-free LVT surface can be created using Bona Deep Clean and Bona Pure, securing a hygienic floor according to the regulations of Technical Rules for Biological Agents (TRBA).

We commissioned a study on the use of the Bona Commercial System on LVT flooring – typically used in hospitals and other hygiene sensitive areas. The test was carried out in conjunction with the IFR Institute in Germany. The purpose of the test was to prove that a smooth, joint-free surface, as set out in the rules of the German TRBA standard, can be created by over-coating with Bona Pure.

The first step of the test was to install a range of new LVT wood effect flooring. The next step involved dividing the test area into two sections and coating one with Bona Pure, while the other was left untreated. A solution containing fluorescent pigments was then applied daily across the whole floor and cleaned using the Bona PowerScrubber and Bona Deep Clean Solution. Daily contamination with the pigments followed by cleaning was carried out over a period of 8 weeks. At the end of the test period, UV lights were used to expose the levels of contamination on each part of the floor. The part of the floor not treated with Bona Pure showed high levels of contamination. The part treated with Bona Pure showed hardly any. To prove the test results further, the LVT planks were removed to examine for signs of contamination below the surface. On the





untreated area, a high level of contamination was found below the planks due to penetration through the joints. However, the area treated with Bona Pure showed almost no signs of contamination thanks to its protective layer which seals each joint.

With increasing amounts of LVT being installed it is likely that customers are going

to be keen to ensure the surface is as clean and hygienic as possible. The Bona Resilient System offers a simple and effective solution, in addition to extending the life of the flooring itself.

01908 525 150 www.bona.com

Full Mapei system provides seamless finish to London food court





apei products have been specified as part of works to the flooring at Medz Corner Food Court in Kensington, London. The existing cementitious flooring was uneven with cracks and required patch repairs for localised loosely adhered areas. Delta ProFloor carried out work on the project, using a full Mapei resin flooring system to create a level and aesthetic appearance for long-term use.

Prior to creating a level floor to the food court and toilet areas, the existing flooring received diamond grinding for full preparation and calibration. Two component solvent-free epoxy adhesive Mapei Eporip was then used to repair any cracks.



The full Mapefloor System 31 was then used to create a durable, non-slip finish flooring. This multi-layered epoxy system includes Primer SN, a two-component epoxy primer to protect and coat the substrate and promote adhesion. Quartz 0.5 was applied to the primed area while still wet to create a suitable surface key for the Mapefloor I302 SL to bond onto.

Once hardened, any excess quartz sand was removed and Mapefloor I 302 SL was then mixed with Mapecolor Paste in Tin Grey to create a shade to fit the requirements. Once mixed, it was then applied with a medium piled roller for a smooth surface. This two-component, epoxy formulate is suitable for



use in the foodservice industry due to its resistance to deep cleaning, as well as its sleek and seamless finish. Not only does it offer a smooth finish, it is also non-slip to reduce the possibilities of falling and slipping.

For this particular project, Mapefloor I 302 SL was the ideal choice for the flooring finish as it met the full brief provided by Medz Corner; it offers a suitably levelled finish for the stability of tables and chairs, resistance to stains, and an attractive aesthetic for this multi-restaurant food court.

01215 086 970 www.mapei.co.uk

A natural way to welcome in cork



NATURALS is a collection of elegant natural cork floors by Granorte for use in high-end residential and commercial interiors. Using a natural cork veneer and underlay with a strong and stable HDF core, NATURALS brings the unique natural aesthetic of cork in a floor with a high-performance construction that's suitable for commercial use. At the heart of NATURALS lie eight decorative agglomerated cork effects such as Standard and Champagner that echo mid-century cork tiles and the expressive natural linear patterns of Linea and Split. Each is available in a range of colours ranging from white through to dove blue, terracotta, mocha and slate grey. The result is a collection of 28 cork floors that can be used to bring a unique natural aesthetic to projects. Every NATURALS look is protected with Granorte's WEARTOP® finish, a water-based PU lacquer that provides a durable and easy to maintain finish. Beneath, a cork underlay with Microban®antibacterial protection provides additional support, improved acoustics and underfoot comfort. The floor comes in 910 x 300 mm planks featuring a commercially proven Uniclic® glue-free joint for floating installation.

01785 711131 www.granorte.co.uk

Conren celebrate half century



Founded back in 1971, to service the needs of the automotive industry with a range of epoxy resin floor coatings, Conren Limited quickly established a reputation for quality long lasting protective systems and has developed into one of the UK's foremost

providers of surfacing solutions. Focusing on high performance products for a wide range of industries in the construction and refurbishment sectors, the product range further expanded over the years by introducing innovative solutions for waterproofing, safety play surfacing and high friction anti-skid for highways.

01978 661 991 info@conren.com

Apartments incorporate Profloor System

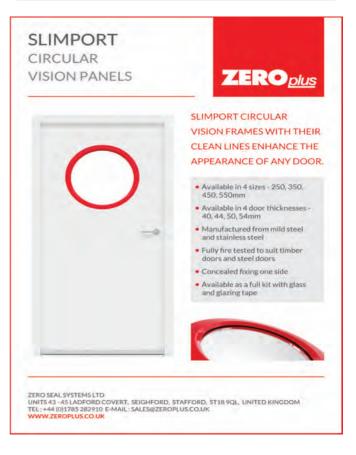


Part of a two-phase development, the first phase of The Park House Apartments, Bath Road, Slough, will benefit from an optimal acoustic performance between floors thanks to the innovative Profloor Levelling System from The A. Proctor Group. The initial phase comprised

24 apartments over three floors, with eight on each floor. Profloor Levelling System was specifically developed to allow a level finished floor to be installed on a cambered, stepped, or uneven sub-floor. The floor is levelled by inserting packers in each levelling base to adjust the level of the timber battens, and create a level finished floor.

01250 872261 www.proctorgroup.com





Altro delivers on style and sustainability



Altro Ensemble™ modular flooring has been used throughout a new development of 21 modern, sustainable holiday homes; part of a new 'eco' hotel complex in Thuringia, Germany. The chalet-style, solid wood accommodation has been built with high-quality natural materials,

and sustainably equipped as part of an ecological construction project. Altro Ensemble has up to 15dB impact sound reduction with added comfort underfoot, making it perfect for front of house areas – any environment where design is key. With four modular sizes, you can mix and match to create unique patterns utilising colour and design.

01462 489 516 www.altro.co.uk/Floors/LVTs/Altro-Ensemble/Gallery

F.Ball delivers flawless flooring



Stopgap subfloor preparation products from F. Ball and Co. Ltd. and the company's Styccobond F44 acrylic adhesive have been used to create a laboratory-standard flooring finish at a new facility for international laboratories operator Tentamus Group, at

Pride Park in Derbyshire. Contractors from JDF Flooring used F. Ball's dual-purpose Stopgap Fill and Prime and Stopgap 1200 Pro levelling compound to prepare 1,500 m² of metal raised access panels over two floors before installing vinyl sheet safety flooring throughout. The upper floor was partitioned to create multiple laboratories.

01538 361 633 www.f-ball.co.uk

Magply A1 boards selected for fit out of London apartments



One of the UK's premier housebuilders has switched to specifying Magply boards as part of the wall construction, within the exterior elevations for an apartment development in a prime West London location, chosen in place of the plywood alternative because of the MgO boards' outstanding physical characteristics and other practical benefits. Royal Warwick Square is a development by St. Edward – a joint venture company owned by M&G Investments and Berkeley. The scheme is part of the Warwick Road Masterplan. With work near to completion, Watford based PIB Contractors has been installing the Magply boards, supplied through MP Moran of Watford as 'pattresses' or backing blocks for fixings, within the light gauge steel wall panels. The pattresses are sized and positioned in line with a pre-designed layout: facilitating the hanging of fixtures and fittings like shelves, radiators and kitchen units. St. Edward is amongst a growing number of sector specialists turning to IPP Ltd. and its Magply range. Backed by BDA Agreement certification, Magply MgO boards present a fire-safe and environmentally friendly alternative to conventional plywood or OSB products.

01621 776252 www.magply.co.uk



Brightening up cancer care with an award winning integrated Forbo Flooring scheme

Combining contemporary aesthetics with exceptional performance, an array of solutions from Forbo Flooring Systems' portfolio have been installed throughout the state-of-the-art Cancer Centre at Milton Keynes University Hospital (MKUH). Designed by Ryder Architecture, the facility brings patient experience to the fore, where the integrated flooring scheme seamlessly guides users through the building. The prestigious project took home the winner's accolade in the 2020/21 annual Fly Forbo competition. The Cancer Centre project was delivered through the ProCure22 Framework where Forbo Flooring Systems is an approved supplier on the scheme. This provides MKUH with the reassurance that all of the flooring solutions that have been installed are fit for purpose and also makes future maintenance a lot easier for the client.

01773 744 121 www.forbo-flooring.co.uk/healthcare



Redefining student accommodation in Leeds with Forbo's portfolio

For The Refinery, a new build student accommodation complex in Leeds, Jasper Sanders + Partners looked to create a fresh and contemporary interior design scheme that underpinned the site's historic significance. With a variety of activity zones, Forbo Flooring Systems' Tessera Cloudscape carpet tiles and Sarlon acoustic sheet vinyl were specified, helping to create a fully integrated and striking space that meets the demands of modern student living. The Refinery was a winning project in the Fly Forbo 2020/21 competition. A spokesperson at Fresh Student Living commented: "The interior captures the level of luxury of student accommodation that today's residents desire. Everything was created to a high specification with students' wants and needs at the forefront. From the welcoming entrance, to each individual flat and room, The Refinery is the ideal accommodation for students to enjoy."

01773 744 121 www.forbo-flooring.co.uk/studentaccommodation

Sustainability from the ground up

Catherine Helliker of Danfloor UK calls on product manufacturers to ensure they understand how they are impacting the environment, and increase their sense of social responsibility to their surroundings

Product manufacturers' philosophy should be to provide a sustainable business for future generations. This is why we should all be closely monitoring our environmental impact, and working towards producing high quality, sustainable flooring – i.e. created with minimal environmental impact.

There are many elements and processes a manufacturer can look at to achieve this, including the use of renewable energy and carbon management. Below are just five ways they can develop products and processes that help work towards a more sustainable future.

ISO 14001

This certification is based around the principles of prevention of pollution, the awareness of and compliance with all environmental legislation, and improving an organisation's environmental performance.

In order to achieve ISO accreditation a company has to implement an Environmental Management System that monitors processes, and ensures an organisation:

- minimises use of energy, water and natural resources
- minimises waste through prevention, reuse and recycling where possible
- disposes of waste safely and legally
- avoids the use of hazardous materials, where practical
- works with environmentally responsible suppliers
- prevents environmental damage and minimise nuisance factors such as noise and air pollution.

Sustainable materials

Implementing sustainable material into products is another way of demonstrating a commitment to a more sustainable future. Sourcing the most sustainable and forward-thinking suppliers is key to achieving this.



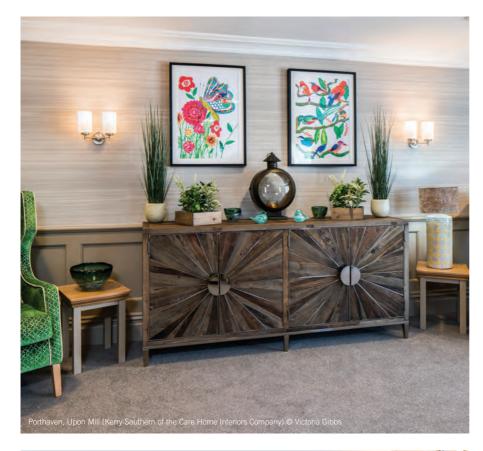
For example, Econyl is a nylon fibre used for many textile products including carpets. The 'regenerated' nylon yarn produced by Aquafil performs exactly the same as 'virgin' nylon but has a very different story behind it. It's made by recovering nylon waste such as fishing nets from the oceans, and turning it into high quality nylon.

Regenerated nylon gives endless possibilities and can be recycled infinitely. It is claimed to reduce the global impact of nylon by up to 80% compared with material produced from oil.

Carpets which incorporate wool are not only strong, static resistant, naturally fire retardant and pleasing to touch, but the wool fibres are also 100% natural, fully sustainable and biodegradable. Making wool another sustainable option for carpet manufacturers.

Product accreditation

Independent product accreditation is the key to provide specifiers and customers It's estimated that energy savings of between 8-13% can be achieved with the installation of a carpet





with the confidence that the products and services you supply not only perform as expected but that meet – and continue to meet – appropriate standards.

Many construction projects undergo BREEAM accreditation – the leading and most widely used environmental assessment method for buildings. Products that have received BREEAM certification represent best practice in sustainable design, and the method has become the de facto measure used to describe a building's environmental performance.

Products that have also received Eurofins Gold Indoor air quality certification demonstrate a commitment to improving the internal environment. As we spend the majority of our time indoors, products must strive to achieve such accreditation.

Energy efficiency

On an energy-saving front, it's important to remember that carpet is an exceptionally good insulating material.

Carpet fibres are natural insulators with low heat conduction values. In addition, the surface pile of carpet with its millions of tiny fibres traps air and further increases its thermal insulation and improves energy consumption.

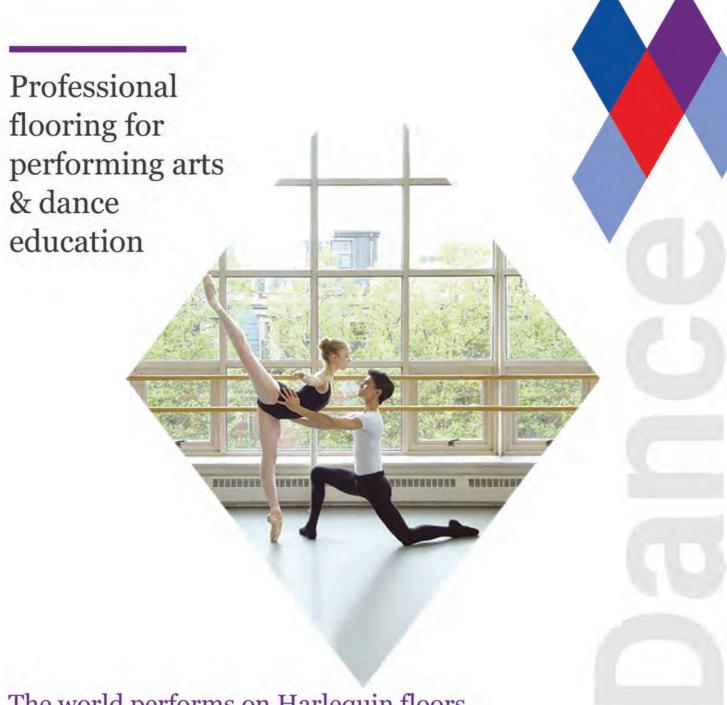
Heating accounts for a large proportion of the average household utility bill and some studies suggest that a home can lose 10-20% of its heat through uninsulated flooring. As a result, it's estimated that energy savings of between 8-13% can be achieved with the installation of a carpet, with consequential reductions in energy costs.

Continuous review

Having these processes and procedures in place is fantastic but in order to stay up to date with current requirements and technological advances, product manufacturers must review what they are doing and how effective their processes actually are.

Through a combination of regular company audits and a schedule of ongoing tests, a company should constantly review and analyse what they do to ensure their products continue to meet high standards. This will help ensure they can deliver sustainable flooring that performs across the board.

Catherine Helliker is marketing manager at Danfloor UK



The world performs on Harlequin floors

Harlequin is the global leader in the manufacture, supply and installation of performing arts floors and studio equipment. Established as the industry choice for architects, building contractors and the world's most prestigious dance and performing arts companies and schools, we continue to carry out site visits in person or remotely and are working with our partners and clients to ensure we can carry out installations following government health and safety guidelines.

For information about specifying the correct floor for dance and performing arts download our RIBA approved CPD online at www.harlequinfloors.com or via the RIBA CPD page.

If you are interested in booking a CPD please contact cpd@harlequinfloors.com













Spiral UK create a 6 storey helical staircase in the heart of London

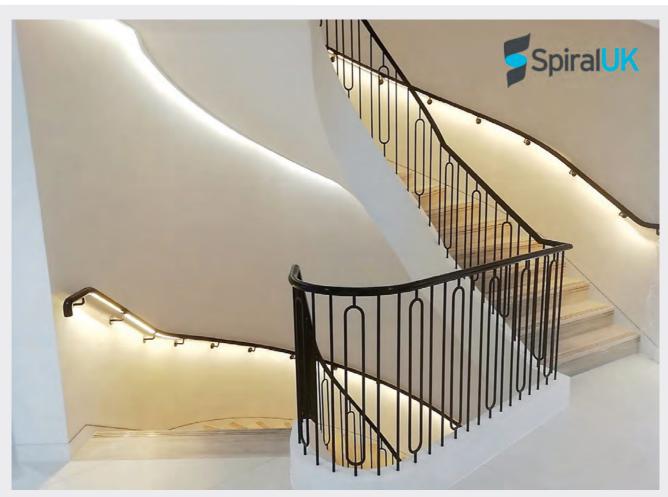
piral UK were pleased to create an incredible helical staircase through the centre of a central London building, built to look like it was part of the original structure but standing out for its subtle detailing and strong form.

The Grade I Listed building at 21 St James' Square was the work of The Ritz designers, Mewes & Davies, in the 1930s, who mirrored number 20 next door, emulating the work of esteemed British architect, Robert Adam, from the 1770s. In 2018 it went through a substantial and thorough redevelopment to become an exclusive and opulent office building.

A study in luxury, the bespoke interior has a stylish, timeless elegance celebrating its historical significance and highlighting opulence and exclusivity. The fit out could not have been any higher in specification and the result is perfection. In the middle of this we installed our helical feat of engineering for private equity firm, Cinven, who made the upper 6 floors their headquarters. Property agents, Allsop, said of the fit out: "21 St. James' Square has been designed to create a striking arrival experience... encompassing







contemporary styling that emphasises the exceptional period design. The offices have been completed to a high specification, with luxurious interior finishes...sought to exceed the expectations of modern occupiers to create light, well configured space, whilst being sympathetic towards the building's classical, regal architecture."

One of the most expensive postcodes in the UK, the previous inhabitant list reads as a 'who's who' of British history, with even the Queen Mother of Elizabeth II residing there from 1906 to 1920.

That is why Spiral UK were honoured to be contracted for the feature staircase that winds its way up through the centre of the old building. A stair of this height is ambitious in itself, but this design was helical in nature, bringing with it a host of engineering and fabrication challenges. Helical stairs appear to be defying gravity as they are through a space and cause tension points where they tether to a structure.

This particular design allowed for hidden support in the surrounding wall, the mild

steel structure cantilevering out leaving an atrium space down the centre of the stair, adding drama and wow factor. Gazing up from the ground floor, the dark balustrading contrasts with the white plaster work, accentuating the shape as it spirals upwards. The outer handrail is underlit by LED lighting cleverly concealed within the timber, mirroring the strip-lighting that curves around the edge of the soffits and reflecting off the brass nosing strips set into the vein cut Silk Georgette stone of the treads.

It is no-expense-spared details such as these that make for such a polished finish, where these contemporary stairs look l ike they have always been a part of the fabric of the building yet manage to integrate modern features.

Overall, Spiral UK are very proud of the outcome and pleased to have been a part of the on-going history of this iconic building.

www.spiral.uk.com 0330 123 2447 info@spiral.uk.com



Armourcoat's Perlata is guaranteed to put a smile on your face at new dental clinic



ecorative specialist, Armourcoat®, was recently chosen to provide finishing touches to a unique and stylish dental and aesthetics clinic in the iconic Battersea Power Station development.

The striking interior was designed by LaVita Style and features Perlata providing a rich, yet elegant finish to the walls in the reception area and corridors. The design uses light and shade to reveal subtle textures and tones resonating a calm and reassuring

atmosphere. Working to a soft colour palette the use of additional custom ArmourFX Granite polished plaster panels to the front desk creates a stunning first impression.

Lucy Walker, interior designer at Lavita Style Ltd comments "We chose Armourcoat for their specialist expertise and creativity and were absolutely delighted with the end results. We wanted to create a striking yet welcoming reception and waiting area and this was achieved using Armourcoat's beautiful Perlata and Granite finishes on the walls and desk panels. Armourcoat realised our vision throughout the whole design process and delivered seamlessly. I would certainly choose Armourcoat for any future projects".

The new dental practice, White + Co, is part of the innovative redevelopment work to convert the Grade II* listed legendary landmark into a unique blend of residential, commercial, and cultural spaces. Armourcoat has also been specified in various other

projects within this exciting development including the Boiler House and Switch House West where Tactite was applied within various bathrooms, ensuites and powder rooms and Embassy Gardens which included Koncrete finishes to entrance areas and columns.

01732 460668 www.armourcoat.com

PROJECT DETAILS

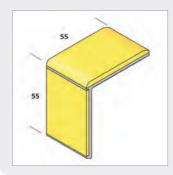
Client: White & Co, Battersea Power Station, London Designer:

La Vita Style @lavitastyleltd Contractor: Apollo Interiors

Photography:

Mark Bolton @markboltonphoto

The next evolution in Stair Nosing design for specification



Quantum Flooring is excited to announce the release of their new and most innovative Stair Nosing to date, which marks a new evolution in Stair Nosing specification. Q-Range DUO measures 55 by 55mm for both the tread and the riser. This complies with BS8300:2:2018, The Equality Act and Part M and Part K of the Building Regulations. Like all of Quantum's Q-Range Stair Nosings Q-Range DUO has an all-over tread design. This helps to reduce the risk of slips on stairways. The Q-Range DUO profiles are available in three different versions: QRd-SF153 is for use with resilient floorcoverings; QRd-SF153r has a ramp back for use with no floorcovering; QRd-HF153 is for use with carpet or carpet tile. This range ensures that these Stair Nosings can be used with practically any floorcovering. Q-Range DUO offers a solid colour for the whole Stair Nosing by matching the riser colour along with the slip resistant tread, which is recommended as best practice. There is a choice of 25 colours, from an LRV of 6 to 81. This offers a wide range of options when specifying for any project. Quantum's great new 55 by 55mm Stair Nosings are available now.

0161 627 4222 info@quantumflooring.co.uk

Et Lorem retailer profile - BLANCO



The new kid on the Berkshire block is Et Lorem, an impressive kitchen designer, retailer and installer already catering for developers, designers, architects and homeowners in Reading and further afield. And BLANCO is delighted to be the exclusive sink and tap specialist for this impressive organisation. Jamie Harding, MD of Et Lorem, is no stranger to the brilliance of BLANCO as he has worked with the

team for years in his previous company. His move into setting up came over 12 months ago and the company is already enjoying success way beyond expectations as the timing was obviously challenging.

www.blanco.co.uk

Greater lighting choice looms large



LED lighting applications and installations are set to be transformed with the launch of an innovative, brand new downlight from **Knightsbridge** – one of the UK's leading brands of wiring devices, accessories and lighting. SpektroLED breaks through the limitations of

traditional LED downlights, offering unrivalled choice in versatility, performance, and style in one unique package, doing away with the need to specify multiple LED lamp types. It is also designed and manufactured in such a way that installation is quick and easy.

01582 88 77 60 www.mlaccessories.co.uk

Exposing the issues

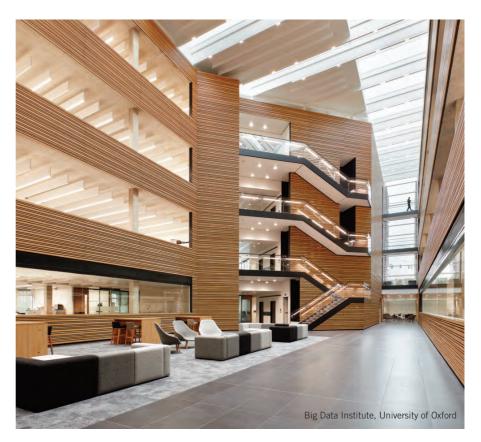
With exposing services continuing to grow in popularity in building designs, there's an increasing focus on how to meet acoustic as well as lighting needs for workspaces, as Mike Attard of RIDI Lighting Group explains

he movement towards the removal of suspended ceilings and the exposing of services and ceiling structures has opened up many interior design possibilities. Unfortunately, it also opens up the prospect of excessive noise transmission, which is particularly unwelcome in an open plan workspace. It also presents challenges for the lighting systems too.

One popular solution is the use of vertical baffles (louvres). These not only have practical and aesthetic appeal, but also offer easy, practical access to the building services. The principle being that you can still allow an open design while giving major consideration to the building users. A perfect example is where the system was used at Newscorp, within The Shard in central London. A combination of reflective glass and open structured ceiling could make for noisy cafe and bar areas. However the specification not only worked successfully in suppressing noise but also tied in very well aesthetically, due to the imaginative use of matching colours taken from the space.

Vertical systems have long proven to be an established way to break down projected sound waves, and as such to be useful in the workspace. Designers can play with increased baffle depths or densities in order to produce the right sound absorption levels. This can be via prescriptive methods or led from the lighting design layout. Ultimately baffles combined with discrete integrated lighting modules provide a perfect 'blank canvas'. There is also the opportunity to inject colour and texture to the space.

The blank canvas approach was successfully illustrated at the Quartermile Q3 Building in Edinburgh. Here all background lighting and acoustic standards alongside the provision of more domestic style fixtures. The result is a balance of professional looking workspace with attractive domestic accents.

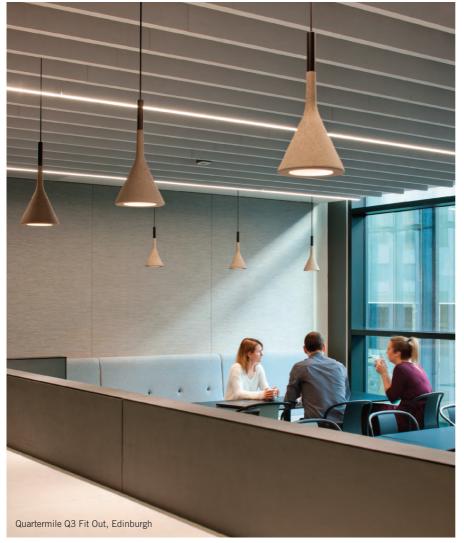


Acoustic baffle lighting systems also work well to delineate various working zones, with the use of varying colours. These are proving popular in breakout spaces where different textured finishes can even be introduced, including real wood veneers. An example can be seen at the restaurant area of an international bank's London base. Though the wood veneers have low acoustic absorption rates, the perimeter edge of the baffles is exposed to allow a degree of noise suppression. As an alternative, printed wood effects could be used which would allow full acoustic attenuation.

Finally, these systems work very well in light wells. They allow artificial light to

Baffles combined with discrete integrated lighting modules provide a perfect 'blank canvas'





illuminate the space by night and act as a solar glare suppressor by day – eliminating screen glare for PC users. Here it was used to good effect at the Humanities building at University of Bristol. A lot of the rooms were subterranean, and utilised large light wells to introduce light into the spaces. The use of baffles allows hidden channels of electrical feeds to run across the glazed area whilst providing a veiling for the potential harsh light. The acoustic value of the baffles is also important where a glass ceiling is used, as glass alone will normally reflect sound.

A vertical argument that stands up

Thermal mass principles are exploited using vertical elements as they allow thermals to pass up and around them and heat or cool the building's concrete structure. Unfortunately, flat acoustic panels will inhibit the optimum airflow in such buildings. When you then combine this with highly efficient and high output matching luminaires, the engineering design case is compelling.

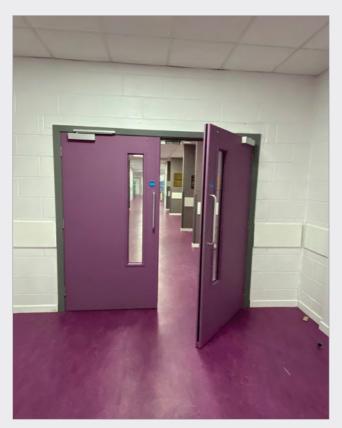
An example of such a project was the Big Data Institute at Oxford University. Here the building was designed to be a highly efficient thermal mass structure, and a lighting/acoustic system was needed that was both elegant and extremely functional to contribute to the building's thermal properties.

The 7,500 m² medical research building, the university's first BREEAM Outstanding building, was designed by Make Architects and can house over 550 people. It includes a concrete 'labyrinth' below ground which draws in exterior air, cooling or heating it using the thermal mass of the ground. Additionally, the thermal mass of the building itself is used as a sink to provide cooling throughout the day. Spectral's Blade, a combined acoustic and lighting system, was chosen as it is specifically designed with thermal mass in mind. The project is one of the first to use the Blade II system, which allows for a continuous ribbon of light.

A vertical baffle arrangement assists thermal mass by allowing warm air to rise between the units and reach the concrete surfaces. The acoustic baffles reduce sound reverberation times; with so many exposed hard surfaces this would otherwise be overwhelming for staff.

Mike Attard is the UK managing director of RIDI Lighting Group

Fire door safety maintained at schools with Yeoman Shield fire door services





est Lothian Council schools, Deans Community High School and Armadale Academy, are maintained by Bellrock Group under a contractual PPP3 project agreement. Taking on this maintenance management for the two school buildings places the Bellrock management team as the Responsible Person when it comes to compliance to fire safety maintenance which incorporates fire rated doors.

With this in mind, Martin Igoe, Senior FM for Bellrock, engaged with Yeoman Shield Fire Door Services when it came to assessing and protecting the condition of the schools' fire doors with an impact protection system.

As a brand name of Harrison Thompson & Co. Ltd. who are a registered FIRAS Warringtonfire (a UKAS accredited scheme for fire door and passive fire resisting products installation) company,

Yeoman Shield Fire Door Team were able to undertake a conformity survey of the doors in both schools.

This consisted of an assessment of the condition of the fire doors, noting remedial work required to improve the doors functionality, replacement of doors where required as well as noting advisory door protection products that could improve the look, condition and extend the life cycle of the doors by solving impact damage problems.

After an itemised quotation for the work had been raised and accepted, Yeoman Shield directly employed fixing operatives carried out the work simultaneously at both school sites simultaneously in accordance to Bellrock's programme.

Remedial work to both frame and fire doors, replacement doors as well as Yeoman Shield Fire Rated Protection products which were Door Protection Panels, Door Edge Protectors and PVCu clad Glazing Beads were fitted by the accredited teams following best practice guidance.

Martin Igoe commented: "Having previously used Yeoman Shield on school projects in Aberdeenshire I was more than happy to again collaborate with Yeoman Shield for the Deans Community High School and Armadale Academy."

"Their door protection products are great; not only have Yeoman shield re-certified the old fire doors for conformity, they have also extended the life of the doors by fitting a hard-wearing cladding to each. This makes them more durable for the rigours of school life, they look amazing and are so easy to clean."

Further phases of the fire door work have been scheduled for later in the year.

0113 279 5854 www.yeomanshield.com

Emergency lighting compliance ensured at Leeds General Infirmary

s a large teaching hospital in the centre of Leeds, the Leeds General Infirmary (LGI) is a specialist centre for a number of services, including the Major Trauma Centre and hand transplants. Following significant improvements to its emergency lighting system, 24 LuxIntelligent panels are ensuring functionality and compliance across many of the hospital's key departments, including general acute services like A&E, intensive care and high dependency units, maternity and state-of-theart operating theatres.

The system comprises of over 2,000 standalone light fittings covering the majority of buildings across the vast hospital site. The recent system upgrade involved the recommissioning of panels and rewiring of loops, to deliver a more robust and reliable system, with significantly reduced device failure rates.

Thomas Barnes, estates officer at Leeds General Infirmary, said: "As a fire protection



measure, it is paramount that we ensure all emergency lighting performs as required. By tackling each panel and loop individually to remedy faults and device failures, our LuxIntelligent system is now delivering both greater performance and efficiency benefits."

LuxIntelligent from Advanced is an addressable, automatic emergency lighting test system, that shows all emergency lights are compliant and functioning, with no engineer involvement required. Each panel has up to four loops each, supporting 249 luminaires, and can be easily

networked to work with existing wiring and luminaires, keeping installation costs to a minimum. The system also offers optional cloud monitoring and system management via mobile and web apps.

Matt Jones, emergency lighting business manager at Advanced, said: "Thanks to the excellent work undertaken by Thomas and his Estates team the LuxIntelligent system is now realising its full potential, and delivering on the requirements of the large-scale, complex LGI site. Throughout the system refurbishment process, our Technical Support team were on hand to provide their expertise in assisting with fault finding, and to make life as easy as possible for the Estates Department. "It's also great to see the hospital adopt the latest in energy efficient technology with the installation of our EasySafe, LED low voltage emergency luminaires and exit signs."

0345 894 7000 www.luxintelligent.com



Keyfix non-combustible cavity solutions set the industry standard



Keyfix is solving the non-combustible challenge with its unique range of external cavity wall solutions. Developed in response to the increasing requirement for non-combustible materials for buildings over 18 metres, the A1 fire-rated components are fully compliant to Building Regulations Approved Document B (ADB). Following incidents involving the spread of fire within external cavities on tall buildings, the updated Building Regulations prohibit the use of combustible materials within certain external cavities of buildings over 18m in height. To address this, Keyfix consulted and worked with industry leaders to develop a unique non-combustible system which meets the needs of regulators, insurers, warranty providers, developers and installers. The Keyfix range of ADB (Approved Document B) compliant solutions includes a Non-combustible Cavity Tray (NCCT) and a Non-combustible Cavity Tray Lintel (NCCTL). The range is completed with a Non-combustible Retaining Disc (NCRD) which works with all standard Type 1 masonry to masonry wall ties, Non-Combustible Weep Vents and a Non-Combustible Damp Proof Course (NCDPC).

028 8676 7508 www.keyfix.com

C-TEC releases revamped toilet alarm kit



C-TEC has released an updated version of its NC951 accessible toilet alarm kit. Stylish, compact and very cost-effective, the new-look kit contains everything you need to create a BS8300 clause compliant single zone emergency assistance system for any building. It also includes a 'Call Accept' function to allow staff to send an intermittent call acknowledgment

signal inside the WC compartment to confirm help is on the way. The kit now features an updated NC807C pull cord unit that can be mounted on a ceiling or wall dependent on the application.

www.c-tec.com

Security and safety with SWF



Steel Window Association (SWA) member, Steel Window Fittings (SWF) specialises in providing quality, design-led fittings for steel window frames. A recent innovation to answer questions of aesthetics, security and longevity is a range of multipoint locking handles. The multipoint locking range is currently

available for windows with door frames following soon. With this new system, security is greatly improved, durability is enforced and larger windows can be designed and produced. The concealed system is driven by a single key-locking or non-locking handle that is available in five different designs and six standard finishes.

www.steel-window-association.co.uk

Resiblock seal solar-powered Park & Ride



Resiblock are delighted to have been specified as the Paving Sealer choice of Leeds County Council at the UK's first solar-powered Park & Ride site in Stourton, Leeds. Stourton Park & Ride has delivered 1,200 parking spaces, across over 8,000 m² which

will be serviced by a fleet of all-electric buses. Leeds County Council needed a sealer that could withstand both large volumes and heavy vehicular traffic. Resiblock were able to demonstrate their historical successes at Southend-on-Sea, Essex, Pool Meadow, Coventry and Martlesham Park & Ride schemes to be specified as sealer of choice.

www.resiblock.com

Pyroguard Protect makes the difference



Engineered to meet specific project requirements, Pyroguard's range of toughened fire safety glass, Pyroguard Protect, in E30, EI60 and EI120, has been specified for one of the most daring architectural creations ever imagined in Paris: Tours Duo. Installed within the reception hall and circulation areas of the

two towers, Pyroguard Protect, which was chosen by fire protection specialists, Pyrometal, has helped architect Ateliers Jean Nouvel achieve his ambitious vision, without compromising on safety.

01942 710 720 www.pyroguard.eu/en

Crazy paving comeback



New for 2021, CTD Architectural Tiles presents a new stone collection comprised of 5 paving ranges. From the white stone effect of Borgogna Stone White and the dark grey-slate look of Esla, to the multi-tonal shades of Canyon and the light shades of Filita, the porcelain tile collections are available in modern colour palettes and are

suitable for both walls and floors. Offering the ultimate flexibility, the collections can be ordered in Cobble, Faux Modular or the highly sought-after Palladiana style, either in pre-formed slabs for easy installation or as individual modular pieces that come in the same box.

0800 021 4835 www.ctdarchitecturaltiles.co.uk

Knightsbridge makes security lighting cool



Knightsbridge is expanding its comprehensive range of outdoor lighting with the introduction of a new series of LED floodlights. The FLN range, which is manufactured in black die-cast aluminium, combines slim looks, optimal lighting performance and operational versatility when partnered with

either microwave or PIR sensor accessories. These additional accessories are easy to attach, providing convenience not just to installers but also to electrical wholesalers, who won't have to worry about stocking PIR/ microwave variations of each model. The range delivers effective, cool white, security lighting from a discrete package.

01582 88 77 60 www.mlaccessories.co.uk

WWW.ARCHITECTSDATAFILE.CO.UK

Norcros Adhesives makes Moregeous even more gorgeous

Sian Astley is an interior designer, TV builder, project manager and renovation expert at Moregeous Design. Her business is based in Manchester in a renovated Victorian villa which combines a super-insulated new build with a sensitively restored existing home.

Norcros Adhesives became involved at Moregeous HQ back in 2018 when Sian attended a trade day at the Mandarin Stone showroom in Wilmslow. They discussed the 45 sqm terrace at Moregous HQ and decided to work together.

Morgeous HQ has a long 9-metre gardenfacing elevation, which is split into one 5-metre and one 2-metre bi-fold section, with a 2-metre section of decorative brickwork. This was designed so that when stepping out of the kitchen, you are straight on to the terrace, which then turns at the end to follow the unusually angled build. Sian was concerned about the effect of extreme weathering and temperatures. She wanted to



reduce any risk of the 1200 x 300 porcelain tiles 'lifting' and ensure easy cleaning and anti-weathering for the external grout.

"It's the products which hold the tiles firm and prevent any water ingress that are really important. If unsuitable, this can cause expansion and contraction during freezing temperatures, leading to movement of the tiles." The products used on the job were Norcros Prime Bond, Pro 50 Levelling Compound, One Part Flexible Adhesive in White and 4 Into 1 Wall and Floor Tile Grout in Steel Grey.

Dave the tiler treated the concrete filled terrace using Prime Bond, a multipurpose water-based synthetic SBR polymer that primed and sealed the concrete ready for levelling. Pro-50 levelling compound was then mixed, with Dave noting it was easy to get a lovely flowing mix. Pro 50 is perfect for use externally, even with the low English winter temperatures, and has great strength due to the polymer strand reinforcements.

To lay the porcelain tiles, Norcros One Part Flexible Adhesive was used. This is a polymer modified adhesive mortar for use on walls and floors in both internal and external locations.

Norcros 4 Into 1 Wall and Floor Tile Grout in Steel Grey complemented the grey timber planks and finished the job well. "The tiles look beautiful" says Sian.

01782 524140 www.norcros-adhesives.com



On the right path with Marshalls



Marshalls Landscape Protection has brought together its range of Active Travel Solutions in a new brochure and website landing page. The collection has been designed to create safer and more inviting urban spaces for cyclists and pedestrians. With a wide range of solutions including surface-mounted planters, bollards and street furniture, Marshalls

Landscape Protection offers numerous options for delineating cycle lanes and pedestrianising areas. For example, the innovative Zicla® Zebra® Zero cycle segregation product can serve as a protective barrier to prevent vehicles on the road from invading the cycle lane.

www.marshalls.co.uk www.youtube.com/watch?v=kpvuNCDNcaY

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