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The range with all the outputs you need now has the High Efficiency you need.

As you’d expect, all the boilers in the new Potterton Suprima HE range meet the requirements of impending energy efficiency legislation. They’ve all been put through their high efficiency paces and rigorously tested at our new Product Design Centre. What’s more, they’ll also meet the requirements of all your customers, from the Suprima 30 HE right up to the 120 HE. So whatever the size of property, from a starter home to an executive penthouse, there’s a Suprima HE that’s supremely well suited to the task.

*Suprima 160 HE and Suprima 120 HE will be available Spring 2005.

Key benefits>

- Familiar general layout. Same outputs. Same cast iron reliability.
- Tried and tested Potterton technology.
- Six models to cover every possible output requirement.
- Know one, know them all.
- Designed to meet the impending energy efficiency legislation changes.
- Backed by the best service network in the business.

Potterton Myson (Irl) Ltd
www.potterton-myson.ie
That said, this is a very special publication. Apart from the regular features, it includes a 56-page brochure totally dedicated to Davies Ltd, one of Ireland’s longest-established and foremost bathroom, heating, plumbing and drainage suppliers.

Established in 1933, Davies has occupied a landmark site in Dublin’s Fairview for so long that the company was commonly known as Davies of Fairview. However, such was the year-on-year growth of the business, especially in recent years, that Davies realised it had to move to a new green-field site if it was to serve its customer’s requirements.

Literally years of first identifying a site, and then developing it as a purpose-designed complex, has now come to fruition with the recent move to its new €10 million headquarters in North County Dublin.

The massive site has been carefully designed to accommodate the current and projected needs of the various companies within the Davies umbrella, including an incredible stand-alone bathroom showroom.

This huge investment not only confirms Davies’ standing as one of Ireland’s leading building services supply companies, but is also a declaration of intent and commitment to its future.
Toshiba Switches To Inverters

Toshiba Air Conditioning has taken the decision to phase out production of its fixed-speed equipment with immediate effect. “Inverter-driven air conditioning is the logical choice for Irish customers, offering savings on running costs, power consumption and carbon emissions over fixed-speed systems” says Derek Phelan of GT Phelan.

The vast majority of systems operate at part load for 95% of the time. Inverters are able to match part load conditions in a much more precise and efficient way. Inverter powered units are now available from 1.5kW right up to the largest VRF systems.

Although inverters may be marginally more expensive, the benefits of reduced costs (typically 70% cheaper than fixed-speed) can result in a pay-back period of eight months in certain high-use applications.

Contact: Ken Lawlor or Derek Phelan, GT Phelan. Tel: 01 - 286 4377; www.gtphelan.ie

Carrier Aquasnap Low Noise

Increasingly-stringent regulations and changing market trends have meant a marked increase in demand for low-noise air conditioning units. In response Carrier has devised a low-noise option of its Aquasnap range of chillers which are cost-effective and high performing. In some cases these modifications can be retrofitted to installed chillers.

By incorporating different models of the patented Carrier Flying Bird fans, and by adding sound-dampening compressor jackets, the overall noise levels for most models are reduced to around 50dB(A) at 10m.

Contact: Austin McDermot, Core Air Conditioning. Tel: 01 - 409 8912; email: info@coreac.com

Wood Energy — Fuel of the Future

The promotion of wood energy as a viable alternative energy source for Irish industry, public bodies and consumers must be a key objective of this Government if Ireland is to have any chance of meeting its Kyoto targets, delegates attending the COFORD/SEI, “Wood Energy 2004” Conference in Cork were told recently.

Speaking at the conference, Joe O’Carroll, Operations Manager, COFORD, said: “The development of a wood fuel industry which is adequately supported by an appropriate regulatory and policy environment would have major economic and strategic benefits for Ireland, replacing our over-dependence on imported fossil fuels while creating sustainable rural jobs, in addition to its primary purpose of reducing CO2 emissions.”

David Taylor, CEO of Sustainable Energy Ireland, was another speaker at the conference. Recent studies have shown that the cost/benefit of forest enterprise to the state will be enhanced where the carbon storage value is recognised and where forestry and sawmilling residues can substitute for fossil fuel energy.

Worldwide, wood currently supplies about 15% of the world’s energy demand. Despite the vast potential Ireland’s contribution is less than 1%. Wood is an inexpensive and eco-friendly fuel compared to fossil fuels and is set to be Ireland’s fuel for the 21st century.

Speakers from other European Countries indicated that it was only through concerted Government policies to promote renewable energy alternatives, such as biomass, that these alternative industries have proved viable and have succeeded in meeting domestic usage targets.

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Offer your clients that little bit less...

By combining the latest in DC Inverter technology and the energy efficient R410A refrigerant, the new Sanyo range of commercial split systems offer you and your customers less than ever before!

Less power supply problems – all units are single phase supply

Less power surge problems – only 1 amp start current across the range

Less siting problems – complete range of indoor units

Less restrictions – single, twin, triple and quad options

Less refrigerant – systems pre-charged to 30 meters

Less energy usage – running costs are drastically reduced

Less price penalty – the latest technology for the smallest premium

Less lifecycle costs – essential for any business

Less time for payback – capital difference repaid in year one

Less tax liabilities – EEL Category A ensures ECA qualification

Less power supply problems – all units are single phase supply

Less power surge problems – only 1 amp start current across the range

Less siting problems – complete range of indoor units

Less restrictions – single, twin, triple and quad options

Less refrigerant – systems pre-charged to 30 meters

Specifically designed for commercial and retail applications.

With outdoor unit sizes (3, 4 & 5HP) and 4 indoor types available in six capacities, the choices are endless...

Perhaps with Sanyo less is more!
Sill Line Perimeter Heating

Sill Line offer an extensive range of heating elements which enable them to meet the widest and most exacting heat emission criteria. Tube sizes range from 22mm to 35mm. The element construction is of either the expanded tube or drawn tube configuration.

Sill Line Perimeter heating puts warmth precisely where it is needed, ‘round cold outer walls and windows, spreading the heat evenly, stopping down draughts and helping to create a comfortable working environment. In addition, it may be used to conceal pipes, cable trunking and other equipment to give the perimeter an uncluttered appearance.

Along fully glazed elevations such as conservatory restaurants, Sill Line can maintain a high degree of comfort by creating a wall of warmth; it can also act as a dado barrier to keep seating area clear of full-height glazing. The Sill Line system comprises a steel casing which houses a heating element (a pipe with aluminium fins). As hot water is passed through the pipe, air enters the casing at the bottom, is warmed by the element, rises and discharges into the room through the grille.

The main variation of the Sill Line style is in the position of the outlet, whether on top of the casing, in the front or sloping. The grille can be made of extruded aluminium or punched grille. A few standard component forms any number of options allowing a precise choice of product for a given application. There are output ranges to cover all likely requirements and a wide choice of colours and finishes.

Contact: David Daly, ATP.
Tel: 01 - 885 3792; email: dalymail@eircom.net

DAB Goes Hot and Cold

The DAB CME constant differential pressure centrifugal circulation pump range from Consolidated Pumps is suitable for direct installation to civil and industrial heating, air conditioning, cooling, and domestic water systems.

Particularly versatile because of the use of the Hydrodriver, it offers performance features that can automatically adapt to the various system requirements while, at the same time, keeping differential pressure constant.

The pump body and motor support are made of cast iron with models CME65 to CME 150 incorporating a cast iron impeller and models CM40 to CM50 having impellers in technopolymer.

Mechanical seals are of carbon/ceramic with flanged suction and delivery connections in PN16 with threaded holes for control pressure gauges. The closed asynchronous motor has external ventilation with the rotor mounted on over-sized ball bearings to ensure silent running and long life.

Contact: Roy Tolan, Consolidated Pumps.
Tel: 01 - 459 3471; email: info@consolidatedpumps.com

CIBSE Membership Briefing

CIBSE is to hold a membership briefing in Kevin St College of Technology on Thursday 2 December next at 6pm.

David Hughes from CIBSE UK will be on hand to explain the new streamlined process for becoming a member. He will also outline the new routes to various grades of membership.

Prospective new members — or existing members thinking of moving up a grade — are welcome to attend. Light refreshments will be served.

Institute of Refrigeration Formed

The Institute of Refrigeration Ireland is a new initiative driven by the board of Refrigeration Technology Skillnet. Membership is open to everyone within the profession, from apprentices through to service engineers, wholesale suppliers, and owner managers.

As we went to press a major launch took place in the Lucan Spa Hotel, Co Dublin, and BSNews will have a full report in our next issue.

Contact: Enda Hogan, Refrigeration Technology Skillnet.
Tel: 01 - 878 3773; email: enda.hogan@dit.ie or www.instituteofrefrigerationireland.ie
Darragh Canning and David Corrigan, Axis Engineering

Axis Engineering is a new consulting engineering practice set up by David Corrigan and Darragh Canning to provide a high-quality professional service on all aspects of mechanical, electrical and lift services installations. Operating from offices at 28 Pembroke Lane, Ballsbridge, Dublin 4, there is a full staff complement of highly-experienced and fully-qualified personnel who utilise all the latest IT and CAD systems.

David is well known and respected in the industry, his most recent post being Director/Managing Director of Homan O’Brien Associates and, before that, Director of VMRA. He has acted as principal M&E member of design teams on a large range of projects including the Hewlett-Packard facility in Leixlip, the Earlsfort Centre, and the Backweston Laboratory Campus.

Darragh is a chartered building services engineer with many years experience in the building services sector, and was a senior project manager for both Arup Consulting Engineers and Homan O’Brien Associates. He specialises in the multi-disciplinary design and supervision of commercial, educational, residential and leisure projects, having successfully project managed numerous office and hotel developments in the IFSC and, more recently, the new EBS headquarters on Burlington Road, Dublin.

As the two senior members of the practice, both David and Darragh will maintain a strong personal presence on every project ensuring an efficient, practical and experienced service.

Contact: David Corrigan, Axis Engineering. Tel: 01 - 634 9888; email: dcorrigan@axiseng.ie

1 in every 7 air conditioners sold globally is an LG unit
Put your trust in LG – you won’t regret it.

Core Air Conditioning  Tel: 01 - 409 8912
LG Distributor for the Republic of Ireland
LG Adds Cassette Range

Core Air Conditioning has introduced the new LG 3.5kW ceiling cassette which runs on R410a refrigerant. It is suitable for all types of air conditioning such as leisure clubs, medical practices, pubs, hotels, hospitals, offices, retail outlets, etc.

The unit can provide heating as well as cooling, and features the Plasma air purifying system. Other features include the anti-corrosion gold fin which ensures long working life; turbo fan for fast cooling; an easy-to-clean filter; and auto-start changeover. It also complements the other 10 models in the cassette range.

An important feature is the 4-way grille which gives optimal distribution of cool, clean air. Equally important is the compact size and lightweight design of the units. They are extremely easy to handle and can be quickly installed. For example, Model LT-E1860 FJ/RJ measures just 570mm by 570mm, which is smaller than a standard ceiling tile. Unit depth is only 269mm.

Extra-long refrigerant piping up to a distance of 50m means that these new cassettes can be easily accommodated in multi-story buildings where the condenser is located on the roof. A built-in lift pump removes water automatically from the drain tray, with a standard lift height of 700mm, creating the ideal situation for water removal. This enables a choice of gravity or sump pump drainage out of the building.

In commercial applications where efficient use of energy is a priority, the standard controller allows one to 16 cassettes to be individually or collectively controlled. Controllers can also be linked in series, allowing the control of large numbers of units throughout an entire office block, if required. A central controller is available for use with up to 128 cassette units.

Contact: Austin McDermot, Core Air Conditioning.
Tel: 01 - 409 8912;
email: info@coreac.com

Sub Aqua 1100 From NJ Power

The new Sub Aqua 1100 submersible booster system from NJ Power & Co is designed for powering whole-house or apartment situations. The system works up to 4-bar yielding up to 50cpm.

Because it is submersible, it is one of the quietest booster systems on the market. It has built-in electronic flow control; can work in continuous duty; and has low-level, dry-run protection.

Sub Aqua 1100 is suitable for installation in existing cold storage as a completely new system. Other applications include rainwater recovery systems; light industrial booster systems; sprinklet systems; etc. It is also suitable for use with fountains in domestic, industrial and municipal applications.

Contact: Niall Power, NJ Power & Co.
Tel: 01 - 456 4099;
email: n.j.power@iolfree.ie

CIBSE Celebrity Lunch

The CIBSE Celebrity Lunch will take place in the Bia Bar, Stephen St, Dublin 2 on Friday 3 December next. Keynote speaker is John Cuthbert who is retiring following the sale of his company to White Young Green.

John has served the industry at large — and the CIBSE in particular — with distinction over the years and no doubt he will draw a very large attendance. Early booking is advised as places are limited.

Contact: Michael McNerney, CIBSE Chairman.
Tel: 086 262 9518.

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Kissane & Lynskey Go It Alone

Declan Kissane and Peter Lynskey — who between them have almost 50 years experience in the mechanical and plumbing sector — have established a new business venture called Unitherm Heating Systems. Also joining them in the business is April McHale. She too has extensive experience designing underfloor heating systems.

Both Declan and Peter were instrumental in establishing one of the country’s leading underfloor heating companies, Polytherm Heating Systems, and will continue to represent and offer technical support for the Polytherm system where possible. The Unitherm design office and showroom is based in City East Business Park, Galway, with extensive stockholding being held at its Dublin distribution centre.

Established to promote, design and supply underfloor heating systems to the commercial and domestic markets, Unitherm will also supply manifold positions, pipe layouts, etc.

Contact: April McHale.
Tel: 091 - 380038;
Declan Kissane.
Mobile: 086 833 0062;
Peter Lynskey.
Mobile: 086 833 0051.

Waterford Stanley Introduces Modular Gas Boilers

With 75 years experience in creating quality home heating solutions in Ireland, Waterford Stanley has introduced a new range of high-performance, compact gas boilers for the home.

Reliable, efficient, and economical, each Stanley gas boiler is manufactured to the highest quality standards with all the necessary accreditation and approvals.

There are four fully-modulating models available — conventional, system, combi and combi storage — ranging in output from 8.8kW to 23.5kW. All models are fitted with digital control and fault diagnosis as standard. An optional valve kit ensures quick and simple installation and service.

Each Stanley 30-80 boiler is pressurised and run at operational temperature before leaving the factory. Anti-cycling control and anti-freezing are in-built and prevent the build up of sediment, while optional outdoor climatic control providing more precise temperature control.

Contact: Jim Perle, Waterford Stanley.
Tel: 087 - 219 7008;
email: jperle@waterfordstanley.com
The Art of Noise Control

Greater expectations in respect of health and safety and comfort levels, coupled with ever-more-stringent legislation, have pushed noise control and noise abatement to the top of the building services agenda. It is a critical and sometimes sensitive issue to deal with, the lack of uniform and universally-accepted measurement criteria and authentication procedures adding to the confusion.

Recent years have seen the emergence of specialist companies dedicated to this area, one of the latest being Architectural Acoustic Solutions Ltd. More commonly known as AASL, the two principals are Ray Walsh and Brian Topping, both of whom have extensive experience in this sector. Their respective strengths are in building and architectural acoustics, and acoustic laboratory analysis and testing.

While there have been considerable advancements in the development of new materials to combat noise pollution, perhaps the more critical issue is the correct application of these materials. This is the real strength of the service provided by AASL. Both Ray and Brian get involved in each project right from the outset, liaising with the architect, consultant and contractor and providing a full set of CAD drawings for all to work from. They also maintain a close watching brief throughout the duration of the project and are directly involved in the final testing and commissioning.

As the foregoing illustrates, the art of noise control is about managing noise, AASL does just that by listening.
When devising a solution and specifying the relevant products, AASL is not limited to any one particular brand. It has a close working relationship with all leading-brand suppliers — such as Texaa, CDM and Isolamin — and recommends whatever it deems most suitable given the application concerned. An additional strength is that it can tap into the vast design, technological and research resources of these trading partners when devising specific solutions.
Consolidated Pumps Appointments

Consolidated Pumps has further strengthened the service it provides with two additional senior appointments. Scott Ribey, a Canadian by birth but now living in Ireland with his Irish-born wife, has been appointed Chief Estimator for Contract H&V and Industrial. Scott has been with the company for three years and handles all major contracts with pro duty selection system operating to Floowserv in Pennsylvania.

Meanwhile Chris Dalton has been appointed Product Manager H&V Market Products. Chris is a recent recruit to the Consolidated Pumps' team but has already made a significant contribution to growing its market penetration.

Like To Work for Glow Heating?

Glow Heating Ltd, the leading mechanical services company which has been operating in the Irish market for over 30 years, currently has the following positions available:

- Contracts Manager
- Junior Engineer
- AutoCad Technician

The successful candidates need to be suitably qualified and experienced; to be team players; and to be capable of working in a very dynamic environment.

Applicants can call Glow Heating.
Tel: 01 - 462 6556 or forward CVs directly to info@glowheating.com

Cowman Joins Euro Gas

Euro Gas Ltd has announced the appointment of Kieran Cowman as Administrative Sales Manager.

Kieran, who is well known in the mechanical services industry, will be responsible for promoting the company's comprehensive range of products and providing technical support to engineering specifiers and mechanical contractors.

"The philosophy within the company is to provide an efficient and friendly service, and I'm looking forward to renewing friendships within the industry" says Kieran. Euro Gas is one of the market leaders in condensing gas boiler technology with its range of Remeha and Rendamax boilers. It also offers flue solutions for oil and gas installations, and provides bespoke systems from design to installation for standard and difficult installations using flue dilution or balanced flue systems.

Euro Gas Ltd also provides a wide range of air handling and fan coil equipment, along with direct fired hot water heaters and buffer tanks.

Complementing this line-up is sister company Euro Gas Pak Plant Ltd who specialises in the design and manufacture of custom-built plant rooms for all services applications including heating, cooling and HVAC.

Contact: Kieran Cowman. Euro Gas.
Tel: 01 - 288 8244;
email: sales@eurogas.ie
dynamic solutions

plumbing heating bathrooms drainage
With a pedigree stretching back 70 years, an enviable product portfolio of world-renowned quality brands, and a team of highly-qualified and experienced personnel, it is not surprising that the Davies Group of companies — incorporating Davies Ltd, Absolute Bathrooms, and Drainage Systems Dublin Ltd — is one of Ireland’s foremost bathroom, plumbing, heating and drainage supply specialists.

Established in 1933, year-on-year expansion was solid, continuous and controlled at all times by carefully-devised strategic development plans.

That said, growth has been spectacular in recent years prompting, the move to a new €10 million purpose-designed headquarters in Dublin 5. This is a stunning development standing on a massive four-acre site and incorporating offices, warehousing, a trade counter, and state-of-the-art showroom housed in a separate building.

Ideally located close to the M50, this new facility is accessible from all parts of Dublin, in addition to the main national spur routes serving the north, west, south and south east of the country.

Absolute Bathrooms, the designer-led, top-end, bathroom company, is housed at a separate location in Kilmacanogue, Co Wicklow.

Davies’ management style and trading philosophy is underpinned by an emphasis on professionalism and quality. This applies equally to the products and services provided, and the manner in which these are delivered. Davies is not given to grandiose or flamboyant gestures, preferring instead to focus on customer, and supplier, satisfaction. That, in a nutshell, is the company’s commitment to all its trading partners.
Another versatile Ideal-Standard range which takes modern luxury into new dimensions, Tonic is the brainchild of German designer Pohl Fiegl. Chic yet practical, its ultra-contemporary WC and bidet are both wall mounted, making cleaning easy and reflecting a continental trend that is gaining huge popularity.

M50 Business Park, Ballymount, Dublin 12
Tel 01 - 456 4525
Fax 01 - 456 4505
email americanstandarddublin@aseur.com
web www.thebluebook.co.uk
Davies Showrooms, Dublin

Davies’ Bathroom Showroom is one of the finest such facilities in the country. Incorporating something like 50 fully-fitted bathrooms — ranging from basic models through to more extravagant designs which include jacuzzis, steamrooms and body jet showers — the showroom features all the world’s leading bathroom brands.

Standing on approximately 4000 sq ft with ample car parking, the showroom is open from 9.30am to 5pm, Monday to Friday, with late opening Thursday until 7pm. Closed for lunch 1pm to 2pm. Saturday opening from 8.30am to 1.30pm.

Absolute Bathrooms, Kilmacanogue

Absolute Bathrooms is the prestige bathroom showroom established by Davies and situated in Glencormac Business Park, Kilmacanogue, Co Wicklow, just beside the Avoca Handweavers.

Taking design and luxury to new heights, this purpose designed showroom features a diverse and comprehensive range of sanitaryware products from the finest bathroom designers and producers in the world.
Flair — the Professionals' choice for Glass Shower Enclosures & Bathscreens

the omega collection
luxury bathroom space solutions

the capella collection
the easy to install classic

(Note: Capella products available in clear unprinted — patterned stocks limited)

Flair International Ltd
Ballieborough, Co Cavan

Contact Our Sales Office:
Tel: 042 - 966 5294
email: sales@flairinternational.com
www.flairshowers.com
Bathroom Design Service

Davies Bathrooms also provides an in-house, state-of-the-art, design service which allows the customer to participate in the design process.

More often than not customers enter the showroom with basic ideas and some crude measurements scribbled on the back of an envelope.

Skilled Davies personnel interpret and transform this information into a computerised picture of what the customer’s desired bathroom will look like.

This computer-aided facility also allows for design variations and different product selections to be discussed and viewed by the customer.

After careful deliberation various options are drawn up by Davies’ designers which can be discussed on the customer’s next visit. Full-colour printouts of the suggested layouts are then produced for the customer to take away for further persual before making the final decision.
Bathware to Enhance Your Style of Living

Qualceram

South Quay, Arklow, Co Wicklow
Tel: 0402 - 31288 (reception) Fax: 0402 - 31292 (reception)
Tel: 0402 - 32255 (sales) Fax: 0402 - 32233 (sales)
email: info@qualceram-shires.com
www.qualceram-shires.com
Armitage Shanks & Ideal Standard

These world-leading brands need no introduction. Between them they have a combined history representing literally hundreds of years as product and style innovators in their respective fields.

Today they are all part of the global American Standards Group of companies and, while they each benefit from being part of such a multi-national organisation, they nonetheless retain their established market presence and identity.

Moreover, within each company they have ranges and collections which in turn have very strong brand identity, such as Sottini, Trevi and the special care ranges for the less-able-bodied.

Sottini Collection — The Cassara suite offers elegance and simplicity.

Armitage Shanks Collection — The Doc M Plus Pack range for the special care market.

Armitage Shanks Collection — This hotel bathroom range offers an attractive up-to-the-minute design for the less-abled customer.

Trevi Shower Collection — The Trevi Central Therm for the ultimate showering experience.

Sottini Collection — The Cassara suite offers...
Roper Rhodes Bathroom Furniture

Roper Rhodes Ltd is a leading supplier of bathroom accessories and bathroom furniture. The portfolio includes both traditional and contemporary designs of wall and freestanding accessories, vanity units, furniture, bath panels and toilet seats in a wide variety of colours, materials and finishes.

The continuous product development programme ensures that the range is constantly being updated and refined to reflect changes in demand and style. In all there are over 1,400 standard product items catering for virtually every conceivable requirement.

Flair Shower Enclosures

Flair International, the Cavan-based glass shower enclosure and bath-screen manufacturer, is one of the premier suppliers to the Irish and European markets. A strong commitment to market research and product development has seen its market share grow substantially in recent years.

Innovative designs and styling, coupled with strictly-controlled manufacturing processes, have resulted in a broad range of products suitable for all manner of applications.

These in turn are supported by a dedicated after-sales service network which responds immediately to installer/customer queries.
The distinctive Icon suite is the stunning choice for the modern bathroom. Featuring an innovative integral towel ring, smooth contours and choice of four elegantly designed baths.

For further information please contact us at the following:

Shires Ireland
Broomhill Road, Tallaght, Dublin 24, Ireland
Tel: (01) 404 7600  Fax: (01) 404 7640
www.shires-bathrooms.com
The Mira Montpellier is unmistakable both in its engaging Victorian styling and in its stunning performance. In short, the ultimate showering experience.

Chiltern Invadex
Chiltern Invadex is a major manufacturer of medical care sanitaryware products for aged and less-able people. It has an enviable reputation for innovative, flexible design and a commitment to product development, coupled with responsive customer care programmes.

All Chiltern products are designed to maintain independence, aid mobility and improve the quality of daily life, whether the installation is in the home, a commercial setting, hospital, etc.

All are manufactured from high-quality, durable materials with shower trays guaranteed against breakage for ten years and the virtually unbreakable shower panels against yellowing for five years.

Mira Showers
Established over 80 years ago Mira Showers are market leaders in their field and have been to the forefront in technology since the launch of the world's first ever thermostatic shower in 1937.

Initially, these mixer showers were used in schools, hospitals and in industry. However, in 1959 Mira developed the first thermostatic mixer shower for the domestic sector. Mira Showers' reputation is been built upon innovative design, quality engineering and rigorous attention to detail.

Other products in the Mira portfolio include shower seats, shower enclosures, bathroom fittings, mirrors, etc.

Abbeylee range - available in four sizes (760, 850, 950 & 1050) is a shower tray and enclosure with extra room to accommodate both wheeled shower chair and walk-in users.
DAB Pumps are exclusively distributed in Ireland by Consolidated Pumps Ltd. As part of a global pump manufacturing group DAB boasts 26 years success in producing both hot and cold water electric pumps, along with complete pumping solutions for all domestic, commercial and industrial applications. Offering a “one stop shop” proves very beneficial to installers and merchants who can get all their pumping requirements from the one supplier. This mix of quality-engineered products, competitive prices, and the excellent support services provided by Consolidated Pumps Ltd, have made DAB the preferred choice of all industry professionals.

QUALITY DOESN’T HAVE TO COST
Qualceram-Shires

Qualceram is a highly-focused bathroom manufacturer with locations in Arklow, Co Wicklow, Dublin and Belfast. It also has distribution centres in the UK and sales agents/distributors throughout Europe.

Through Davies Qualceram offers a diverse range of traditional and contemporary bathroom products, including ultra-modern wash hand basins in glass, and electronically-controlled whirlpool baths.

New products are constantly coming on stream, the vast portfolio being divided into three premier categories. These are:— Traditional Bathrooms; Modern Bathrooms; and Contract Bathrooms.

Shires Bathrooms

For more than 60 years, Shires Bathrooms have been designing and manufacturing suites of distinction.

Today Shires are producers of perhaps one of the most comprehensive ranges of bathroom products in the business.

In addition to a fine range of bathroom suites, there are shower products, brassware, kitchen sinks, baths, accessories and sanitary ware.
Caribbean Glow

Basket Fires
Natural Gas & LPG
Standard & Shaped Inset Fires

Contemporary & Traditional Finishes
Manual & Fully Remote Control Appliances
Multiflue Semi-Efficient Radiant Hotbox Fires

For further information contact
Valley Forge, Ravensdale, Co. Louth
Tel: 00 353 42 9371586 Fax: 00 353 42 9380018
Stelrad Radiators

The Stelrad radiator range comes complete with all the features expected from a market leader and more. Combining the most sophisticated production resources in Europe, with substantial investment directed towards testing and verification of performance data, has resulted in the creation of high-output radiators for heating performance that exceeds expectation.

There are designs to suit every conceivable application, be it domestic or commercial, in unique styles which incorporate traditional and futuristic looks. There is also an extensive range of towel rails, again in traditional or futuristic styling.

The Stelrad Optia Towel Radiator by designer Pietro Facheris' — in addition to its stunning appearance this radiator provides excellent heating and towel warming performance (below)

The Stelrad Ladder Towel Rail — a simple striking look that is available with either a straight or curved design (right)

The Stelrad Classic Column — the perfect solution that can accentuate the use of traditional materials or enhance a contemporary appearance (above)

The Stelrad Compact Radiator — bridges the gap between standard radiators and the more expensive designer models (right)
Quality Plastics Ltd

Ireland's leading polythene pipe manufacturer and number one underfloor heating company

Qual-PEX and Qual-PLAST brands and accessory products

P.O. Box 29, Whites Cross, Cork
Tel: 021 - 488 4700  Fax: 021 - 488 4701
e-mail: qpl@qpl.ie
www.qpl.ie
Siemens Control Valves

Siemens control valves are based on the combined expertise of the former Landis & Gyr and Staefa Control System companies who were leading developers and manufacturers in the field. Today’s range offers one of the widest selections of HVAC control valves on the market, ranging from radiator valves up to large DN150 / PN40 valves for district heating plants.

The rooms and zones portfolio comprises a full modular range of 2.5mm and 5.5mm stroke valves. In combination with thermal or electromotoric actuators and on/off, 3-position and DCO ...10V control signals, any preferred choice is available.

The MiniCombiValve, a world novelty for automatic balancing, is the ideal answer for trouble free radiator installations, both new and retrofit.

Ebara Pumps

NJ Power & Co Ltd — principal Irish distributors for Ebara Pumps — was established 10 years ago to distribute a complete range of indoor and outdoor water feature and ancillary products. The range includes polyurethane rock and water scapes, bronze sculptures and artificial plants and trees.

Ebara is one of the most respected pump manufacturers in this sector, with an innovative range of stainless steel products which offer advantages over conventional cast iron pumps. These include high efficiencies thanks to the smoothness of their materials, a feature which in turn eliminates most of the energy loss caused by friction.

Reinforcing the technology-driven features of the Ebara range is the fact that the parent company is the Ebara Corporation of Tokyo, the Japanese multi-national which has a history in catering for the needs of this specialist sector stretching back 80 years.
Siemens Building Technologies makes managing hot water and central heating easier

Innovative Programmer design
There are two new controllers from Siemens — RWB27 for use with central heating systems; RWB29 for dual hot water and central heating. Compact design coupled with innovative features ensures that operation is simple. Simple push-buttons on the front of the controller enable it to be programmed in-situ.

Benefits
- Programming flexibility
- Up to three on/off settings
- Three hour boost facility
- Holiday programme that overrides other settings
- Large liquid crystal, backlit, display

Siemens TRVs
Today’s range of Siemens TRVs is one of the widest selections of HVAC control valves on the market, ranging from radiator valves up to large DN150 / PN40 valves for district heating plants.

The rooms and zones portfolio comprises a full modular range of 2.5mm and 5.5mm stroke valves. In combination with thermal or electromotoric actuators and on/off, 3-position and DC0…10V control signals, any preferred choice is available.

The MiniCombiValve, a world novelty for automatic balancing, is the ideal answer for trouble-free radiator installations, both new and retrofit.
Coppercraft

The Phoenix range of pressurised cylinders from Coppercraft comprises an unvented hot water storage system that is connected to a pumped supply of water. Made of pure copper, all units are suitable for a working pressure of 6Bar and are tested to 12Bar.

The advantages of the Phoenix system are much improved hot water flow rate; can service multi-bathroom properties; balanced hot and cold water supply pressures for effective use of thermostatic mixer valves; rapid re-heat; lower installation costs as less pipework required; fewer connections; piping hot water as all units are fully insulated; and flexible location as the pumped system means the tank can be located in a garage or similar convenient location.

Grundfos Pumps

Grundfos is one of the world’s leading pump manufacturers with annual production of approximately 10 million pump units. It has production facilities all over the world while the products are primarily sold through Grundfos’ own national companies, such as Grundfos Ireland, in addition local dealer such as Davies.

In addition to pumps and pump systems, Grundfos develops, produces and sells electric motors and high-technology electronic equipment to make the pumps “intelligent”, increase their capacity, and minimise their power consumption. This is very much evident in today’s portfolio.

The Group is dedicated to continued research in new materials and processes in order to be able to introduce new, ground-breaking pumps and pump systems that satisfy market requirements.
Our Strength is 'Know How'...

GEBERIT provides complete solutions for domestic, commercial and industrial piping applications.

In addition to our long established Terrain gravity drainage systems for Rainwater, Soil & Waste and Underground, we also offer both HDPE drainage and Pluvia siphonic rainfall systems.

GEBERIT HDPE offers a real alternative to traditional materials, with standard pipe diameters from 32mm to 315mm and a complete range of fittings.

Complemented by a range of traps and laboratory wastes, the high durability, resilience and resistance to chemical attack of this system, coupled with the flexibility of jointing methods, makes GEBERIT HDPE the ideal solution for commercial and industrial applications.

Ask your Davies counter staff for details on...

- Terrain Soil & Waste
- GEBERIT HDPE
- GEBERIT Duofix
- GEBERIT Infrared Flushing
- GEBERIT Infrared Tape

For further information please contact us on +44 (0)28 363 33311 or visit our website at www.geberit.co.uk
Valley Forge Fires

Valley Forge is an Irish company specialising in the production of both contemporary and traditional fires. The range is comprehensive and comprises high-quality basket fires and standard-style and shaped inset fires.

Attractive designs and styling are complemented by a choice of either manual or remote-controlled units.

There are also multiflame and semi-efficient radiant hotbox fires.

QPL Cosy Home

The Qualpex underfloor heating system is perfectly suited to a single area extension or conservatory up to 15 square meters in floor area. It is designed to link into an existing radiator heating system or, alternatively, it can be run as a separate system. It can be used in conjunction with any oil or gas fired boiler, or even a geo-thermal heat pump system.

Supplied in kit form, the system includes a pre-assembled QPL UFH control unit, including thermostatic mixing valve; pump, services valves, mounting bracket and plastic cover box; a single digital room thermostat incorporating three metres of cable; 100 metres of 15mm Red Qual-PEX barrier pipe; and an instruction booklet to facilitate correct installation.

heating
The Thermoflash Digi 2 and Digi 24 — Programmable digital 2-wire room thermostat for control of heating/air conditioning and underfloor heating. Wireless version also available.

The Flash Programmer Plus 1 — Central heating programmer which is easy to programme and includes two special functions, a one hour boost and an advance facility.

The IMMERMAT timer is designed for the timed control of immersion heating, boilers, lighting, watering systems, etc.

CHRONOTHERM CONTROLS LTD

AGENTS FOR
Flash Heating, A/C and Ventilation Time Controls
Sunvic Motorised, Heating, A/C and Time Controls
Thermomess Pipe, Room and Boiler Thermostats

DISTRIBUTORS FOR
Pegler Valves General Domestic Heating Equipment

Sunvic Simplex Programmer — A simple to use and easy to understand central heating controller. 2-channel volt free also available.

Sunvic 2 Port Motorised Spring Return Valve — Designed for installations where a common pump serves both heating and domestic hot water requirements. Also available in 3 port and mono versions.

Sunvic Select XL Programmer — Allows the choice of either 24 hour, 5/2 day or 7 day programming. 2 Versions: 1-channel and 2-channel.

CHRONOTHERM CONTROLS LTD

Tirim House, Jamestown Business Park, Jamestown Road, Finglas, Dublin 11.
Tel. 01 - 864 3793/3797 Mobile: 087 - 255 3703 Fax: 01 - 834 2912
Giacomini Radiator Valves

Giacomini is one of the leading suppliers of radiator valves, underfloor heating and cooling components in Europe. Founded in Italy in 1951, the company has experienced phenomenal year-on-year growth since then and is now Italy's leading manufacturer in terms of numbers of brass production, processing 100 tonnes of brass per day.

The entire range is manufactured and certified in accordance with ISO 9001 and includes straight manual valves; gate valves; thermostat liquid sensor, fully reversible valves; angle "stella" wheelhead valves; globe valves, automatic air vent valves with isolating valves, etc.

The overall portfolio is extensive, with a choice of products to cater for all manner of requirements and applications. Common throughout is a uniform level of the highest quality and unique styling which distinguishes the Giacomini range from similar products in the marketplace.

Techflow Pumps

Since its establishment, Techflow Products has been recognised as a market leader in manufacturing shower pumps — twin-ended, single-ended and negative-head shower pumps — as well as its Maelstrom power shower systems.

All Techflow products are of robust construction and come with a 3-year guarantee.

Techflow is constantly researching issues concerning gravity fed systems, water pressure, negative head situations and other factors which lead to new developments. One of the latest examples is the Maelstrom 2000 thermostatic shower valve.

It is suitable for use on gravity, combination/multipoint boilers, unvented or pumped systems and will compensate for pressure differentials of up to 20:1. Finish options are white, chrome, chrome and gold, and gold.
Making the most of water

Sole Agents

MT AGENCIES IRELAND LIMITED

FEARN HOUSE, UNIT 4, JAMESTOWN BUSINESS PARK, JAMESTOWN ROAD, FINGLAS, DUBLIN 11.

Sales Enquiries: 01-864 3363 Fax: 01-864 3371
Service Enquiries: 01-844 3212 Fax: 01-864 3369
Monodraught

Monodraught was formed 25 years ago, initially to pioneer the development of vertical balanced-flue chimney systems for the domestic and commercial heating market. Since then the company has specialised in the development of natural ventilation systems and low-energy concepts for the building environment.

In 1982 Monodraught launched the WindCatcher natural ventilation system, which encapsulates any prevailing wind to provide energy-free, natural ventilation. The SunPipe revolutionary super-reflective tube that intensifies natural light followed, along with SunCatcher, a combination of the SunPipe natural lighting system and WindCatcher ventilation system.

A significant feature of the Monodraught product range continues to be the high level of architectural design empathy, enabling visually-appealing designs, while achieving an efficient and practicable contribution to the optimum harnessing of our natural resources.

Monodraught continues to lead the field in the development of renewable energy products. The aim is to search continually for opportunities to develop and promote the application of effective natural and low-energy products for the benefit of the environment.
“We aim to be your First Choice”

Saint-Gobain Pipelines aims to become your first choice by developing innovative product and service solutions to consistently meet our customers’ expectations.

Through its range of PAM products, sold to the Utilities, Building Services & Industrial and Civils & Infrastructure market sectors, Saint-Gobain Pipelines makes a contribution that helps to improve the quality of life for people worldwide.

Utilities
- PAM Natural Pipes & Fittings
- PAM Ductile Iron Pipes & Fittings
- Flanged Pipe
- PAM Couplings & Adaptors
- PAM Valves & Hydrants
- Ductile-Iron & Steel Access Covers
- Surface Boxes
- Guardsman Access Covers

Building Services & Industrial
- ENSIGN Drainage System
- Classical Rainwater
- Estate Access Covers
- Timesaver Drainage System
- Steel Access Covers
- PAM Ferex - Industrial Pipes & Fittings

Civils & Infrastructure
- Ductile-Iron Access Covers, Including:
  - Relex, Inter-Ax, Pametic
- Gully Grates
- Estate Access Covers
- Kerb Drainage
- Aquadrain
- Tunnel Segments

For details of products and services ring: Darren Wood or Paul Cassidy on 0862 504 407/0862 269 333 alternatively contact our Distributor Drainage Systems or visit our website: www.saint-gobain-pipelines.co.uk
CIVIL ENGINEERING
This division specialise in the supply of pressure pipe systems in ductile iron, UPVC and HDPE. The range covers sizes from 80mm to 1600mm and all relevant ancillary products.

MECHANICAL ENGINEERING
This division specialises in the supply of soil drain and rainwater systems in cast iron, UPVC, HDPE and stainless steel. A full range of ancillary products — including floor drains, roof drains and bracketing systems — are available.

LINE DRAINAGE
This division provides the design, specification and supply of products for the entire ACO range, Europe's leading supplier of line drainage channels in polymer concrete. Applications — airport runways, petrol station forecourts, shopping centre car parks, business parks, roof and domestic drainage.

MUNICIPAL CASTINGS
This division specialises in the supply and specification of municipal castings to the construction industry and merchant trade. Applications include motorways, bridges, airports, business parks, shopping centres, housing and sewerage treatment plants.

LOCAL AUTHORITY
This division specialises in providing design options to local authorities. The range of products includes street furniture, municipal castings, pipes fittings adaptors and couplings for ductile iron, UPVC and clay pipes.

ARCHITECTS & ENGINEERS
This division works closely with architects and engineers, specialising in new and innovative products. It regularly organises CPD seminars on new and impending legislation, in addition to new products and systems as they become available.

Drainage Systems Dublin Ltd
Drainage Systems Dublin Ltd is Ireland's largest suppliers of drainage and pressure pipe systems. Representing Europe's leading manufacturers, Drainage Systems provides the widest range of high-quality drainage materials to the building services, civil engineering, local authority, and merchant sectors.

Apart from products, Drainage Systems's team of experts provides assistance in the design of system solutions, along with the selection and specification of those products to best satisfy each particular application. There are six primary Divisions within Drainage Systems Dublin Ltd — civil engineering, mechanical engineering, line drainage, municipal castings, local authority, and architects and engineers.
CorriPipe
Twin Wall
Stormwater & Drainage Pipe

JFC Manufacturing Co. Ltd.
Weir Road, Tuam, Co. Galway, Ireland
Tel: +353 93 24066
Email: info@jfc.ie
Web: www.jfc.ie
The New Aquatic Centre in Blanchardstown, Dublin for which Davies supplied all stainless steel channels, gullies & covers, and frames.

Aco Fulbora

ACO Technologies has modern state-of-the-art manufacturing plants throughout Europe producing authentic stainless steel products in grades 304 & 316 to a quality system in accordance with ISO 9001.

Range includes gullies, modular off-the-shelf and purpose-made channels, gratings, grease traps, stainless steel pipes, covers and frames, silt traps, and a full range of roof and floor drains in aluminium. Full design service and site installation assistance is also available.

ACO Polymer Channel Drainage

ACO drain is the world leader in channel drainage technology, providing quality solutions for any loading, whether it be light domestic, medium urban, or the heaviest highway of airport drainage schemes.

ACO has over 30 years of experience of channel installations, with more than five million metres of ACO channel drainage installed between Ireland & the UK, and more than 100 million metres worldwide!

ACO channel drainage complies with the full range of relevant performance guarantees, including BS EN ISO 9001, DIN 19580, BBA Certification (No. 88/2071) and the forthcoming EN1433.
Scotland's (and UK's) leading supplier to Ireland for Ducted Network Solutions

**Product Range:**

- **ESB Duct:** 50mm HDPE x 50 & 100m coils, & 43mm Hockey Stick Bends;
- **ESB Duct:** 125mm uPVC x 6m Duct, Bends & Couplers;
- **GP Duct:** 54mm - 200mm Bends: 54mm, 110mm & 160mm;
- **Ring Seal Duct:** 110mm, 160mm & 200mm RS Bends: 110mm & 160mm;
- **Underground Drainage:** 110mm & 160mm LGS 1977 Specification & EN1401 Kitemarked Pipe. 110mm & 160mm Kitemarked Bends & Fittings;
- **Soil Pipe:** 110mm & 160mm;
- **Waste Pipe:** 1 1/4", 1 1/2", 2";
- **Full Range of Telecom Duct, Sub Duct & Multi-Duct Solutions.**

Emtelle UK Limited
Haughehead, Hawick, Scotland TD9 8LF
Tel: 0044 1450 364000    Fax: 0044 1450 364001
www.emtelle.com
Wade International
With over 40 years experience Wade is one of the leading manufacturers of high-quality drainage products in the world with a reputation for putting technology to practical use to generate innovative ideas and solutions.

Range includes high-quality cast iron, nickel bronze and stainless steel floor gullies; roof outlets and gratings; and a range of actimatic grease converters and sediment traps.

Typical prestigious projects include Georges Quay Office Development in central Dublin, along with the Liffey Valley and Blanchardstown shopping centres.

Ensign Cast Iron Soil & Waste Pipe
Ensign is used in above ground soil, waste and rainwater applications. Pipes and fittings conform to International Standard ISO 6594 and have been approved by the British Board Of Agreement.

Sizes available from stock include 50mm, 75mm, 110mm, 160mm and 200mm; 250mm, 300mm and 400mm are available to special order.

Ensign and Ensign below-ground resists normal domestic effluents up to a temperature of 70°C with peaks of 90°C.

The range of Ensign rapid couplings is quick and easy to install, featuring single-bolt and wrap-around stainless steel bands.
QUALITY DRAINAGE SOLUTIONS SUPPLIED BY DRAINAGE SYSTEMS DUBLIN

Hunter Plastics - A leading manufacturer of quality plastic Plumbing and Drainage products are proud to have Drainage Systems as their leading stockists in Dublin.

Hunter Traps, WC Connectors, Soil, Waste and Underground Systems, Grease Interceptors and Fire Protection products are recognised throughout Ireland as top of the range quality products.

Please contact Drainage Systems for availability and prices.

Why settle for less?

www.hunterplastics.co.uk
Geberit Siphonic Roof Drainage

The Geberit Pluvia roof drainage system is based on completely filled pipelines, which cause a vacuum. Contrary to conventional gravity systems (partially filled pipelines), the Geberit Pluvia system requires no slopes and smaller pipe diameters.

Additionally, a minimal number of outlets and downpipes are used, thus saving on expensive groundworks.

Suitable for roof areas of up to 1000 sq m, it is designed to operate at optimum efficiency and requires fewer and smaller diameter downpipes, and drainage connections, than a conventional gravity system.

Purus

In Sweden, the name Purus is synonymous with floor gullies, a situation which is also fast becoming the case in Ireland. The power of innovation within the Purus Group, along with significant investment, has consistently led to new, better and safer products.

Jan Olsson A/S, the market leader in Denmark in the field of plastic floor gullies, is also part of the Purus Group, as is Västbo Plåt AB, manufacturer of thin-plate stainless steel products.

Taken together, they make for a wealth of experience, knowledge and technical know-how which is translated into an awesome range of market-leading products.

Stormguard Cast Aluminium Gutters

Stormguard is a family run company with over 150 years experience in the rain and draught excluder industry.

Today’s extended range of unique designs and superior quality ensures that Stormguard is at the forefront of providing rainwater solutions for domestic, commercial and industrial applications.

This success has also allowed it expand its range of extruded and fabricated metal rainwater systems.
Howe Green
Access Covers & Frames
Howe Green is the market-leading manufacturer of fabricated floor access covers and frames that are purpose-designed for installation with all types of floor finishes.

The unique designs allow precision manufacturing to order as single covers, duct runs, or for large-span openings without cost premium, and to the dimensions required for application.

Typical applications include airports, factories, hospitals, hotels, offices, railway stations, schools, shopping centres and universities.

In addition to floor access covers, the Howe Green range also includes floor edge trims, matwell frames, and wall doors for accessing pipework and valves behind walls.
Emtelle Ducted Network Solutions

Emtelle is the market leader for telecommunication duct systems for both uPVC main duct and PE duct and sub-duct systems. It produces comprehensive ranges of bends, connectors, adaptors, tees, access fittings and chambers, termination and building entry and testing fittings.

The design of Emtelle's duct systems is dictated by the specification of the cable to be placed within the duct. As new cables, placement techniques and installation methods evolve, so also do the duct systems.

A fully-developed and integrated range of couplings, adaptors, placement equipment and accessories makes for a complete system, simplifying installation, repair, future addition and development.

Typical applications include the 3000k fibre optic duct along the gas pipeline to the west of Ireland.
Prevent a flooding disaster with a new cost-effective solution for the management of storm water. New Wavin Aquacell is a lightweight, high capacity attenuation and soak-away system, that’s easy to install and fully approved by the British Agrément Board. Plan now with Aquacell.
Wavin Plastic Pipe Systems

Wavin Ireland is synonymous with plastic pipe systems, having pioneered the production and introduction of complete plastic pipe systems to the Irish construction industry over the last 40 years. Virtually all aspects of above and below ground requirements are catered for.

Innovative products and systems are regularly unveiled, one of the latest being the Aquacell lightweight, high-capacity, attenuation and soak-away system. Easy to install and fully approved by the British Agrément Board, it provides a cost-effective method to control stormwater by creating an underground storage reservoir or by soakaway.

Naylor Duct Systems

Naylor Duct systems offers one of the most comprehensive and technically-advanced ranges of ducting systems currently available on the marketplace.

Comprising three main components — access chambers, covers (and corresponding frames) and ducting pipes — they are manufactured to exacting standards and comply with all mandatory regulatory requirements. Typical applications include CATV, motorway communications and traffic management, light rail systems, water, gas, electricity, airports, street lights, and traffic signals.

JFC CorriPipe

JFC is a global organisation renowned worldwide for its innovative, quality plastic products. The vast portfolio caters for civil engineering, construction, sports amenity, agricultural and other sub-soil applications. It can also be used for surface, storm water, and land drainage.

JFC's CorriPipe is a twin-wall, high-density, polyethylene pipe manufactured from a blended black polyethylene, by a twin extrusion process. Two high-density polyethylene pipes are extruded simultaneously, one inside the other, and heat-welded together in one continuous process.

The outer wall is corrugated and the inner wall is smooth finished. It is this combination which gives CorriPipe its unique strength.

Plsson Compression Fittings

The first Plsson compression fitting was made in 1965 and today they are the most popular fitting in use worldwide. Plsson manufactures 44 million pieces annually and aim to make the best fitting on the market at a commercially acceptable price.

To achieve a high level of consistent quality, the manufacturing process is highly-automated using the most advanced machinery of its type available. Equally so, only the best materials are used.
sustainable drainage systems

Sustainable Drainage Systems (SuDS) an important initiative, which sets out to effectively manage the natural water cycle by controlling the impact of storm water while, at the same time, retaining more water for our use during prolonged dry periods.

Much of this is achieved by returning water to the water table as close as possible to the original catchment by way of storage and infiltration or, if the ground is impermeable, by storage and a controlled outflow to the mains, ie attenuation.

ACO Qmax High Capacity Drainage

ACO Qmax is an economic, high-capacity drainage system for applications such as distribution centres, airport pavements, highways and car parks.

Qmax offers capacity to satisfy significant levels of attenuation depending on site requirements. The unobtrusive continuous slot channel allows for fast efficient removal of surface water and can eliminate the need for additional carrier drains.

Saint-Gobain PAM

Saint-Gobain PAM is a leading supplier of ductile iron pipes, fittings, valves, manhole access covers, gullies and grates, as well as the leading producer of cast iron above and below-ground drainage systems.

Applications include water and sewerage, telecommunications, highways, civil engineering, construction and housing.

It delivers products and services for the following market sectors — utilities; building services; industrial and civils; and infrastructure.

STAKKAbox Chambers

The Ultima STAKKAbox is a manhole chamber, not a liner. The sections are 150mm deep, manufactured from glass reinforced polyester resin (SMC). Its twin-wall design means the chamber does not rely on surrounding material for strength.

Each unit is capable of unsupported vertical loadings in excess of 40 tonnes and side-wall loadings comparable to those of concrete.

The STAKKAbox chamber is a fast, cost-effective, sensible solution to block-built and cast in-situ concrete chambers, offering significant time and cost savings.
ACO Qmax® - high capacity channel drainage for distribution yards, docksides, airport aprons and highways. It's unique features deliver proven performance under the most demanding site and environmental conditions.

- ACO Qmax® exclusive beam feature provides a unique 'continuous pavement' benefit.
- Water tight seal integral within the channel structure - prevents water leakage or ingress.
- Two point connection system provides fast and accurate channel installation.
- Continuous slot channel provides rapid and efficient removal of surface water.
- Independently tested to Load Class F900.

Lightweight, easy to install and supported by HydroV design software - ACO Qmax® is the only complete high capacity flow and attenuation drainage system available.

**TOTAL Coverage**

- **ACO RoadDrain®**
  The ultimate solution for heavy duty traffic applications.

- **ACO ParkDrain®**
  Ideal for car parks, pedestrian areas, hard landscaping and light traffic.

- **ACO KerbDrain®**
  The award winning combined kerb/channel drain for local/urban roadway applications.

- **ACO Brickslot®**
  Virtually invisible drainage channel for visually sensitive and prestige areas.

Published by ARROW@TU Dublin, 2004

For further information call ACO Drain on 01462 816666

or email marketing@aco.co.uk
A B C D E F G H I J K L M N O P Q R S T U V W X Y Z

New High-Efficiency Potterton

Founded over 150 years ago, the Potterton name is synonymous with top-quality, high-specification products that are easy to install and reliable in service. All Potterton products benefit from world-class manufacturing skills and one of the largest and most experienced research and development teams in the industry. They are designed to be inherently reliable and to meet the needs of the most demanding applications.

With a full range of appliances ranging from traditional to high-efficiency products, Potterton is to the forefront of domestic heating technology. As leading innovators, the objective in introducing new products is not change for change sake, but rather the continuous development of features and technology to meet the ever-changing market and legislative requirements.

The new Suprima HE and Performa HE ranges are a typical case in point. The original Suprima was known for its extensive range of outputs, low lift weight, compact dimensions, extensive flue options and advanced technology. A look at the internal layout of the new Suprima HE range proves that Potterton has remained true to this design concept. Of particular interest is the addition of a cast aluminium secondary heat exchanger. Neatly sited to the right of the primary heat exchanger, with the electrical side of things conveniently re-housed below, it means that Suprima HE remains a truly compact heating solution.

Like its predecessor, the new Suprima HE range is available in six outputs — from 30,000 Btu/h to 80,000 Btu/h. All boilers feature the same basic architecture so, once an installer is familiar with the layout of one, he knows them all. Flue components are also universal across the range.

The six models — Suprima 30 HE, Suprima 40 HE, Suprima 50 HE, Suprima 60 HE, Suprima 70 HE, Suprima 80 HE — suit most domestic applications. Features and benefits include:

- Outputs from 30,000 Btu/h to 80,000 Btu/h;
- SEDBUK Band B energy rating;
- Robust cast iron and aluminium heat exchangers;
- One size case;
- Compact dimensions;
- Minimal installation clearances;
- Low lift weights;
- Simple user interface;
- Push fit concentric & twin pipe flue systems;
- Horizontal & vertical flue terminals;
- Comprehensive flue accessories;
- Flow and return locations compatible with standard efficiency Suprima;
- Optional integral 7-day twin-channel programmer;
- Optional stand-off kit for descending flow and return.

The Suprima 100 HE and Suprima 120 HE models will be available Spring 2005.

The seven new models in the Performa HE range comprise three combination boilers — the Potterton Performa 24 Eco HE; 24i HE; and 30 HE; and four system boilers — the Potterton Performa 12 HE; 18 HE; 24 HE; and 28 HE. "Installers are being challenged to spot the difference between the HE and SE ranges", says Vincent Broderick of Potterton Myson (Ire). "In developing the range we’ve made sure that not only will Potterton Performa remain as a name of well-performing combi and system boilers, but it will live well past 2005 as a high efficiency ‘Performa’.

The efficiency gains are made by the addition of an aluminium secondary heat exchanger.
The latest BTU President's (Ray Byrne) outing at Newlands treated all involved to very kind weather with a golf course in excellent condition.

Bob Daly was host for the day as Valve Control Systems (VCS) were the sponsors. As usual they provided an excellent array of prizes.

Details of the winners are as follows:

**Overall Winner**
Bernie Costello (38 pts);

**Class 1 (0 - 12)**
Winner — Brendan Bracken (36 pts);
Second — Tony Delaney (34 pts);

**Class 2 (13 - 18)**
Winner — Bob Daly (37 pts);
Second — Michael Melligan (36 pts);
Third — Gerry Tobin (34.5 pts);

**Class 3 (19 +)**
Winner — Damien Mooney (35 pts);
Second — David Daly (33 pts);
Third — Kieran Lynch (31 pts);

**Front 9**
Winner — Graham Fay (19 pts);
Second — Ger Hutchinson (19 pts);

**Back 9**
Winner — Derek Whelan (19 pts);
Second — Michael Morrissey (17 pts);

**Visitors**
Winner — B McTiernan (33 pts);
Second — Laurence Byrne (32 pts).

![Image of prize winners]

Winner, Class 3 — Bob Daly of sponsors, Valve Control Systems with Damien Mooney; and BTU President, Ray Byrne

Second, Class 1 — Bob Daly of sponsors, Valve Control Systems with Tony Delaney; and BTU President, Ray Byrne

Winner, Class 2 — Bob Daly of sponsors, Valve Control Systems who won Class 2, receiving his prize from BTU President, Ray Byrne

Second, Class 3 — Bob Daly of sponsors, Valve Control Systems with David Daly; and BTU President, Ray Byrne
This month’s *Down Your Way* trip coincided with Sanyo Air Conditioner’s official announcement in the Innovation Centre, Queens Island, Belfast of its new partnership with the BL Group in Northern Ireland. The appointment forms a key part of Sanyo’s continuing growth strategy in Ireland and heralds the beginning of a new expansionary phase for the company.

BL Refrigeration and Air Conditioning Ltd was formed in 1977 with a small workforce concentrating mostly on service and maintenance. Since then it has experienced considerable growth year on year, to the point where it is now a leading design contractor in Northern Ireland.

In the early 1990s BL, reacting to market demands designed and developed a water-based heat pump system called Aqua 4. This product led to the formation of BL Manufacturing Ltd, which manufactures and markets the Aqua 4 system and associated products in the UK and Ireland to this day.

As the 1990s progressed, many businesses downsized and (or) contracted out of functions which were not core business. Again in response to market demand BL began to offer total maintenance packages. This part of the business grew to a point where a dedicated, focused separate company was the obvious solution and so BL Total Maintenance Ltd was formed.

The three companies in the BL Group complement and support each other offering a complete service, from initial design through to manufacture, installation and life-time maintenance of applied refrigeration, air conditioning and heat recovery systems.

“We are proud to be able to announce this new relationship and I am sure that BL Group has a great role to play in our strategy of growth through strategic partnerships with quality companies,” explained Barry Hennessy, National Sales Manager of Sanyo Ireland. “Sanyo Air Conditioners is fully committed to the market in Northern Ireland and looks forward to a strong, successful relationship. We are delighted to be associated with the established reputation and excellent standard of service BL already offers, and our direct support will serve to strengthen their success even further.”

John Davidson, Managing Director at BL Group added: “This marks a key point in our growth. The development of a direct relationship with a manufacturer such as Sanyo, known for its technical innovation and excellence, will enable us to build a great future for air conditioning in Northern Ireland.”

Over 80 consultants, specifiers and end users attended the reception in the Innovation Centre and the great take-up rate was an immediate reflection of the high regard in which the BL Group is held.

During an exciting and informative evening with a sporting theme, guests were entertained by television presenter John Daly and had the opportunity to win some fantastic prizes. Centre stage was a giant scalextric track where guests battled for the Number One position.

Also creating a point of interest was the much-accredited Sanyo Air Conditioners sponsored world rally car, as driven by 5-times Irish Champion, Austin McHale. One lucky customer even won a prize of co-driving in the Ford Focus with Austin on the Sanyo customer rally day.

The itinerary also included a technical seminar presented by Sanyo Air Conditioner’s Technical Manager, Tony Perry. The presentation served to promote the Sanyo brand to this key target audience and to give an insight into the company’s extensive product range. Tony specifically covered the Sanyo VRF range of systems, including the new R410a ECOi high-efficiency electric systems, as well as the unique 3-pipe GHP VRF which utilises either natural gas or LPG as its main power source.

BL Group’s Engineering Director, David Bailie, Anne Mc Garry, Sales & Marketing, and Sanyo’s Sales Executive, Sinead Duffy, joined John Davidson, Tony Perry and Barry Hennessy for a highly-successful day.

“It’s great to see such a mix of young and old in the audience,” said Barry. “It looks like the future of our industry is in good hands but, it’s also good to see that old dogs can learn new tricks!”
Dr Gerald Farrelly, DIT Kevin St. Department of Electrical Services Engineering. School of Electronic and Communications Engineering. Email: gerald.farrell@dit.ie

Connecting To A Digital Future

An article in the May issue of BSNews by Gerry Farrelly of the Department of Electrical Services Engineering at the DIT opened a discussion on the need to provide increased levels of connectivity for all kinds of data in homes, offices and business premises, with a particular focus on the skill sets required by those involved in the installation of such networks.

This follow-on article examines in more detail the driving forces behind the demand for more connectivity in domestic and business premises, along with a discussion of the pros and cons of the various solutions that are emerging.

For many years the personal computer (PC) has been a common sight in many homes and in almost all business premises. However, many of these PCs existed as "virtual islands", connected at most to a local telephone line for slow speed internet access. This low level of "connectivity" is changing thanks to a number of developments.

Firstly, broadband always-on internet access is now available to a wider range of users at a lower cost. The higher data rate of a broadband connection allows simultaneous internet access at a useful data rate for a number of PCs within a premises. The number of PCs in homes and business premises is also increasing as the PC becomes more and more of a commodity. For example, many homes now have two PCs or more.

Finally, and possibly most importantly, all information from photos to music to office data is in a digital form. Flexible and reliable methods of sharing and transporting this digital information are becoming a priority. A good example of this is music. Digital CDs have become our major source of music, but this is set to change as within a short while the internet will become a major source of paid-for music. How will existing entertainment systems play music downloaded from the internet? Many companies are developing products that digitally interconnect PCs and entertainment systems in different parts of a home with products that are collectively described as so-called "home network" products.

All of these developments will demand greater connectivity between a variety of electronic devices in domestic and business premises. The big questions are what form this connectivity will take and how, when and by whom it will be provided. There are three physical forms this connectivity can take — existing cabling; new cabling; and wireless. It must also be recognised that domestic premises have the least amount of existing connectivity since many offices and business premises have some existing data cabling.

Existing cabling solutions commonly use power line data transmission, which uses the mains wiring in a premises to interconnect devices for data transmission. The big advantage is that no extra cabling is required, and there is little need for changes to installation practice. However, there are concerns about interference, limited data rates, privacy/security, and a lack of international standards.

New cabling solutions involve the deployment of data cabling, similar to the structured cabling solutions in commercial buildings, using copper or perhaps plastic optical fibre. The underlying technology is highly standardised and well understood with advantages that include high data rates and good privacy/security. Many business premises are already well provided with data cabling, but most domestic premises have no data cabling. Thus for domestic premises in particular the high cost of additional cabling and changes to installation/building practice are all disadvantages.

Wireless solutions avoid the use of cabling altogether. Their major advantage is flexibility, as users are not constrained to a physical connection and can easily move equipment. Data rates are high with further increases promised. There are concerns about cost, interference and security that are seen by many as significant disadvantages. It is difficult to predict which of the possible solutions will become dominant, but it is worth noting at present that the highest growth is occurring in new cabling and in wireless solutions. Regardless of which solutions emerge, probably the greatest challenge for the future will be providing personnel who can meet the demand for installation, configuration and maintenance of complex premises networks, that interconnect a huge variety of different devices. This is the immediate challenge facing the educational/training system, and of course the industry at large.
If proof were needed that electrical services engineering has come of age then it was there in abundance at the CIBSE/SLL/DIT Student Awards night in DIT Kevin St earlier this month. Approximately 175 students, lecturers, guests and VIPs packed into the main hall to witness, and participate in, the occasion.

Kevin O’Connell and his fellow DIT colleagues in Kevin St were hosts for the evening and they presided over an occasion which will see 140 part-time and 110 whole-time students graduate with full degrees. This is a remarkable achievement given that the electrical services engineering course only commenced four years ago and now caters for 250 students.

The success of the course clearly demonstrates that it is serving a growing industry need and the fact that the programme is now in modular form and can be tailored to suit individual needs will undoubtedly lead to far greater enrollment.

Awards presented on the night included Best Part-Time Certificate; Best Whole-Time Certificate; and Best Diploma Student. CIBSE Vice-President David Leyzell was the keynote speaker on the night and he also officiated at the presentation of awards.
What is Radon?

Radon is not something that has been created recently ... in fact it has been around even since before mankind. Radon is a naturally-occurring radioactive gas that has no taste, smell or colour. Exposure to radon is not a new phenomenon; epidemiological studies of various groups of miners exposed to source of radon indoors may be pathways and sources that can draw radon indoors. Another source of radon indoors may be released by well-water during showering and other household activities. Compared to radon entering the building through soil, radon entering the building through water will in most cases, be a small source of risk.

At present the two devices which are most commonly used in Ireland for measuring indoor radon concentrations are the charcoal canister and the alpha track detector. After exposure for the recommended period of time they are sent to the laboratory for analysis. The Radiological Protection Institute of Ireland offers a radon measurement service for houses at a cost of €40 per house (two detectors). Additional detectors can be purchased at a cost of €24 per detector. Measurements must be carried out by a measurement service approved in accordance with IS No: 125 of 2000. This means that the measurement services based in Ireland should hold “INAB Accreditation” issued by the National Accreditation Board.

What Is The Law in Ireland?

In May 2000 new legislation was introduced in Ireland to deal with the protection of workers from the exposure to radon in the workplace. This is the Radiological Protection Act, 1991 (Ionising Radiation) Order, 2000 (SI No: 125 of 2000). This order sets down a reference level for radon in workplaces of 400 Bq/m³ averaged over three months. Where, as a result of measurement, it is shown that this reference level is exceeded in a workplace, then the employer must take measures to protect the health of the workers.

How Can Radon Levels Be Reduced in Buildings?

If after an examination of radon levels it is found that the recorded levels are above the “action levels” (200 Bq/m³ in homes and 400 Bq/m³ in places of work), there are a number of options available to reduce these levels to below the “action levels”. The following is a list of options and a guide to the level of their effectiveness:-

(1) Sealing major gaps (effective if level is found between 200 - 400 Bq/m³) — Difficult to achieve
What is Radon?

Radon is estimated to cause about 21,000 lung cancer deaths per year, according to EPA's 2003 Assessment of Risks from Radon in Homes (EPA 402-R-03-003). The numbers of deaths from other causes are taken from the Centers for Disease Control and Prevention's 1999-2001 National Center for Injury Prevention and Control Report and 2002 National Safety Council Reports.

Radon gas decays into radioactive particles that can get trapped in your lungs when you breathe. As they break down further, these particles release small bursts of energy. This can damage lung tissue and lead to lung cancer over the course of your lifetime.

Smoking combined with radon is an especially serious health risk. Stop smoking and lower your radon level to reduce your lung cancer risk.

The foregoing illustrates just some of the methods that can be adopted to reduce radon levels in existing buildings. The least expensive methods should be considered first and afterwards, if levels are not reduced sufficiently, the more disruptive and expensive options should be considered. As mentioned earlier, radon is nine times heavier than air and therefore it is worth noting that radon is not normally a problem in the upper storeys of high-rise buildings.
Grundfos hosted its annual golf outing in the Glen of the Downs Golf Club last month where it entertained 50 participants who, flushed with the excitement of the Ryder Cup which was in progress at the time, put in some excellent performances.

A mix of contractors, consultants and distributors competed in teams of four throughout the day, with a group of five making up the final “4-ball”. Philip Bassett was the overall winner and, just to prove a point, he was also a member of the winning team.

Gordon Barry’s attempt to claim the longest drive — for driving around the course on a buggy taking photographs — was dismissed out of hand.

Most remained on for the meal and presentation of prizes but, on completion, headed straight into the bar, not for the obvious reason but more to catch the remainder of the Ryder Cup on TV.

The course was in pristine condition and the general opinion of participants was that it was one of the most memorable outings to date.

John Smith, Earthtech Ireland with Ray Broughan, Grundfos; Jim McGuire, Heitons; and Pat Kelly, H&V Sales.

Niall Larrigan, Grundfos with Ciaran O’Shea, Leo Lynch & Co; Tony O’Donoghue, VMRA; and Gerry Fitzpatrick, Jacobs.
The CIBSE Annual Golf Outing was held in Edmondstown Golf Club last month. A total of 32 teams took part in the event on a course that was in superb condition. The weather held up well with the exception of one very heavy downpour which lasted 10 minutes.

The outing took the form of a stableford competition with the Chairman’s Prize being presented to the CIBSE member with the best individual score and the PJ Doyle Trophy being presented to the overall individual winner. The main event was a team event with the best two scores on each hole contributing to a team’s score.

The outing was a great success and this was helped greatly by the sponsors who were Control Aer, Mitsubishi Electric, Mercury Engineering and Coolair. Other sponsors were Dornan Engineering, HVAC Engineering, Mark Eire, McGrattan & Kenny, Killarney Plastics, Flogas, GT Phelan, Standard Controls, Grundfos, Winthrop Engineering, Glowtherm and Wilo Engineering.

The overall individual winner was Michael Jacob who recorded an unbelievable score of 46 points (yes, forty-six).

The Chairman’s Prize was won by Eamonn O’Brien, a past Chairman of the Republic of Ireland CIBSE Branch, playing off a handicap of 21 with a good score of 39 points.

The team results were as follows:

First — GT Phelan, 98 points;
Second — L Lynch, 97 points;
Third — Woodleigh Ventilation, 95 points;
Fourth — Eurofluid, 92 points;
Front Nine — Ashbrook Engineering, 47 points;
Back Nine — Lynskey Engineering, 48 points.

Congratulations to all the winners.

The presentation of prizes by the Chairman, Michael McNerney, took place after an excellent dinner. Thanks to the sponsors, everybody at the dinner left with at least some golf balls, which hopefully made winners of them all.

Eamon O’Brien, winner of the Chairman’s Prize with Michael McNerney, Chairman, Republic of Ireland CIBSE Branch

Overall Winner Michael Jacob with Michael McNerney, Chairman, Republic of Ireland CIBSE Branch

First Team — Ken Walsh, GT Phelan with Michael McNerney, Chairman, CIBSE and Rodney Phelan, GT Phelan

Michael Jacob with Michael McNerney, CIBSE Chairman and Finian O’Donoghue

Michael O’Connor with Michael McNerney, CIBSE Chairman and Damien Mooney
Plumb Lines

Heard it on the grapevine ...

**Plumb Lines**

**Grundfos Lift Off**

There is no denying that the new Grundfos headquarters in Dublin is a state-of-the-art building but really, giving everyone modern Scandinavian-style work stations that raise and lower at the touch of a button, whatever next ... talk about getting above — or, as the case may be, below — your (work)station!

**Sanyo Spot The Difference**

Following the success of the Sanyo reader competition which ran for just over a year, the November 2004 issue of BSNews will see the beginning of the Sanyo Spot The Difference Competition.

**Putting People First**

As company owners and business managers — especially in small and medium-sized enterprises — look for increased performance and productivity from staff, there is a very real danger of pushing just that little bit too far. Wellbeing — People, Plant & Profit is the title of the forthcoming NSAI annual conference to be held in the Citywest Hotel on 24 November next. Might be worth attending.

**Oil Leap Dampens Prospects**

— Soaring oil prices will damage Europe’s growth in 2005, according to the EU Economic & Monetary Affairs Commissioner. Apparently, every $10-a-barrel increase in oil prices reduces growth by 0.2 percentage points a year and increases prices by the same percentage.

**Food For Thought**

The King & Queen of hairy green crabs were sold at a charity auction in Hong Kong recently for a staggering $14,000. Not that I ever knew that there were such things as hairy crabs as opposed to ordinary crabs but, apparently there are. So, when you next go to your local Chinese and order crab for starters, be sure to specify the hairy variety.

**Whisper Whisper!**

Brian Topping and Ray Walsh have teamed up to form Architectural Acoustic Solutions Ltd (AASL), a company specialising in, as the name suggests, architectural acoustic solutions. Congratulations on taking the plunge and best wishes for future success.

**Pioneering DIT Kevin St**

— The pioneering spirit and foresight of Kevin O’Connell and his DIT Kevin St colleagues was very much in evidence last month during the DIT/CIBSE Electrical Engineering Services Student Awards. This discipline has come from nothing just four years ago to a situation where there are now 250 students on the course. This is obviously the way forward for building services as a whole given that the traditional distinction between electrical and mechanical services becomes less and less pronounced.

This giant scalextric circuit had grown men, and women, behaving with wild abandon as they fiercely battled one another on the track during the joint BL Refrigeration and Sanyo reception in the Innovation Centre in Belfast recently. It was a tremendous occasion, very exciting and one which brought out the competitive streak in all who participated.

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**Saving Energy Saves Birds**

— Turning off the lights of city skyscrapers is helping to save the lives of thousands of birds migrating across North American cities to their spring breeding grounds. Bird lovers have successfully lobbied building owners that lie on north-south migration flyways to keep their structures dark at night to reduce the number of birds killed when drawn to the light. So, conservationists are killing two birds with the one stone so to speak — saving energy and birds — while, at the same time, actually preventing birds from being killed at all!
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