# LIGHTINGSOUND International

THE ENTERTAINMENT TECHNOLOGY MONTHLY



HE FLAME BAR AT THE VOODOO LOUNGE

PHOTO: ADRIAN WILSON

- London's Voodoo Lounge Casts its Spell
- An Acoustician's Art: Lucerne Culture & Congress Centre
- Live in the Sky for the Power of Houston
- Definitive Coverage of PLASA 98 the Industry Event
- Touring Circuits: Mike Oldfield and Embrace
- Plus, 13 pages of news from across the industry



OCTOBER 1998



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Whirling, twisting, threatening to swallow all that came near.



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The earth lay torn and savaged

by passing battles.

Primitive the carpet may be, it covered the dirty floor well enough.



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The views expressed in Lighting+Sound International are not necessarily those of the Editor or the Professional Lighting and Sound Association



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# LIGHTING SOUND News

"By combining the forces of

Unison and Irideon, ETC

positions itself as one of the

most comprehensive sources

of product for architectural

and themed projects."

#### **ETC To Acquire Irideon from Vari-Lite**

Electronic Theatre Controls Inc recently announced that it has signed a letter of intent to purchase the architectural lighting company Irideon Inc from Vari-Lite International Inc of Dallas. Texas.

ETC is an industry leader in entertainment lighting and the acquisition of Irideon, with its previous success in the global architectural market, will greatly enhance the international launch of Unison, ETC's architectural lighting control system in early 1999. Unison has already proved itself amongst architectural lighting designers in the US and the acquisition of Irideon

further complements ETC's architectural systems with pioneering automated lighting technology.

Built on Vari-Lite's seminal technology in automated lighting, Irideon Inc has been a pioneer in the market for motion and automation in architectural

lighting. ETC company founder and president Fred Foster told L+SI: "We're excited to be able to demonstrate to the global market the incredible synergy of the combined ETC and Irideon technologies. We now have a unique system which offers the most complete solution to the architectural lighting industry."

By combining the forces of Unison and Irideon, ETC positions itself as one of the most comprehensive sources of product for architectural and themed projects, capable of serving the full spectrum of small-to-large-scale jobs. It allows Irideon products to build on ETC's strength as a project-oriented company and ETC's industry-leading service, support and distribution network will expand on Irideon's market

presence. ETC will also continue to work with existing Irideon distributors throughout Europe.

The two companies have already established a strong working relationship, which includes projects as diverse and high profile as lighting solutions for the Los Angeles International Airport's themed building and restaurant; the Irvine Spectrum Cell Tower, California; and the Entel Tower in Santiago, Chile.

ETC will be showing a number of new Irideon products at LDI in November. The company's control products will also be highlighted, to demonstrate the high potential offered by their

integration with the Irideon product line.

Chairman and CEO of Vari-Lite, Rusty Brutsché, told L+SI: "The growth opportunities for Irideon are tremendous as the application of automated lighting technology in the architectural market continues

to expand. ETC is ideally suited to maximise Irideon's potential."

The change will allow Vari-Lite International to focus attention more fully on development of the Vari-Lite and Showco product lines and growth of the newly-established Vari-Lite Production Services network.

In a separate announcement, Vari-Lite have confirmed the acquisition of French distributor, Vari-Lite France, from Video Communication France, SA. This will become the sixth Vari-Lite Production Services office in Europe. Jan Lambrecht, formerly with VLPS Brussels/EML, will head the Paris-based company, with Jöelle Novic, who has been with Vari-Lite France for 10 years.

# 21st PLASA Show is a Record Breaker



The 21st PLASA Show welcomed a record number of visitors to Earls Court last month, with a total of 13,953 coming through the doors over the four days of the show, including a record 3,012 visitors from overseas (figures subject to ABC Audit). These figures represent an increase of over 1,000 on the previous year, and exhibitors accordingly noted a significant increase in the amount of business taking place at the event.

PLASA chairman Paul Adams commented: "It's always a positive sign when exhibitors choose to launch their new products at an exhibition, and this year there were 470 new products, 72 of which were entered into the PLASA Product Excellence Awards. PLASA is now seen as the annual industry show."

The 21st anniversary celebrations (pictured above) were held at the Natural History Museum, where 464 exhibitors and guests enjoyed the stunning surroundings of the main hall as it was transformed into a party venue. Paul Adams presented an award to each of the four companies who have exhibited at every show since 1977. Peter Brooks stepped up for Zero 88, Tony Kingsley for Multiform, Ken Sewell for Pulsar and Andrew Harvey accepted the award on behalf of Rick Wilson of Le Maitre.









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#### PLASA Welcomes Chinese Delegation



The Chinese delegation on the Celco stand, pictured with PLASA's Anna Pillau (centre), Linda Wang (second left), Celco's Pete Sarson (left) and Colin Whittaker (second right).

The recent inward trade mission from China, organised by PLASA and P&O Events for PLASA 98, proved very successful. The main aim of the visit, featuring heads from cultural business and trade associated principals in Shanghai and Beijing, was to strengthen relations with Chinabased sponsors of PLASA Presents Light & Sound Shanghai. It also aimed to enhance the awareness of PLASA/P&O's role within the industry, present the range of products available in the UK and demonstrate the use of entertainment technology in Western Europe. The visitors met with over 40 PLASA member companies, as well as a number of trade associations including VPLT and ESTA. The group were also given the chance to see some of the technology in situ, with visits to Oklahoma at the National and to the Royal Opera House.

#### Lisbon Update

In our feature on the Lisbon's Expo 98 last month, we stated that Forte Systems was responsible for part of the technical installations in the Olympic, Russian and Namibian Pavilions. We should point out that Forte Systems were subcontracted by Certame Westsun Lda, who were responsible for the installations on those Pavilions.

## AVAB Transtechnik Reorganisation

transtechnik GmbH of Holzkirchen, Germany, has recently undergone a major reoganisation of their lighting division. Avab's production department now operates from the German site whilst the company's Presto, Tiger and Panther control consoles are rolling off the production line at the new Buchleburg factory near the German/Czech/Austrian border. This state-of-the art production facility operates under the ISO 9000 standard and also manufactures a number of transtechnik lighting products.

The facility based in Gothenburg now deals with service enquiries, product and customer support, as well as provincial sales. In addition, AVAB have also recently opened a Scandinavian office based in Stockholm which is responsible for sales and development within the region.

#### **Gary Whittington**

Staff at High End Systems are mourning the loss of their West Coast sales manager, Gary Whittington, who died on September 12th in California, following a threemonth battle with cancer. Gary began in the industry



working at numerous entertainment venues in Las Vegas, moving to the rental department at High End Systems in 1994. He became chief technical operator, responsible for technical lighting aspects and crew training for a number of major tours, including U2, Mariah Carey, Moody Blues and Metallica. In lieu of flowers, the family asks that donations be made to assist his children; these can be sent care of High End Systems.

# CJ Spencer at Festival of the Sea



A spectacular last night show completed 1998's International Festival of the Sea in Portsmouth recently. Production company CJ Spencer Associates, which was also responsible for the design and co-ordination of a daily construction crane ballet at the four-day festival, was appointed to create and stage the heart-stopping production - Myths and Legends of the Sea.

The production, working through the history and folklore of the sea, conjured up the Creation, Ulysses, Columbus, Captain Cook and the Titanic, as well as pirates, mermaids, sea monsters, pearl fishermen and battleships. Each scene was illustrated by local actors, gymnasts and dancers, a 100-piece choir, a carnival band and 100 children. The tightly co-ordinated show was accompanied by a mix of pre-recorded and live music by the Royal Marines Orchestra, with Capital Sound responsible for the audio.

Creative Media Technology supplied two visual elements for the show, including scrolling Pani BP4 projectors, projecting a number of images of the sea onto the choir stalls, and the 40W Infinity beam Yag laser, creating a 360° grid effect over the site, which was visible for a 15 mile radius. Midnight Design were responsible for the lighting system, which included elements from Vari-Lite, with lighting design was by David Bryant.





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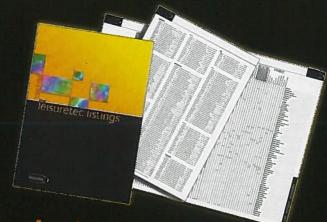
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#### **NYT's New HQ**



The NYT's refurbished headquarters in London's Holloway Road formally opened on 15th September. Designed by the architects Arts Team, as part of a £1,750,000 Arts Council of England's National Lottery funded project, it is the centre for all the NYT's work, including their season's productions.

For the first time in its 42-year existence, the NYT has purpose-designed accommodation inside its Victorian building. The project was conceived by ex-NYT member Barry Pritchard, a partner in the Arts Team and created by project architect Jane O'Connor assisted by Miles Wilkinson.

The 1872 building was originally the Holloway Hall; a spacious, but gloomy structure that didn't provide the right conditions for the NYT's work or reflect its identity. It has now been heavily modified to provide a series of practical spaces and a bright stimulating environment.

The rebuilding of the central stairwell has affected all areas of the building, opening up new views of working spaces and introducing natural light throughout. Robust and colourful finishes are another unifying feature. Externally, the locally listed facade has been restored while the forecourt has been repaved and enclosed with new balustrading specially constructed by the artist craftsman Peter Parkinson.

#### **Truss Theft**

When Optikinetics arrived at Earls Court on the morning of September 10th 1998 to collect all the Trilite truss which had been supplied to various exhibitors at the PLASA Show, they found that the Trilite hired for the Great American Market stand had apparently already been 'collected' from the hall.

So far enquiries have not revealed its whereabouts, but Optikinetics are now offering a reward to anyone with information leading to its recovery. Meanwhile, lock up your truss.

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#### **ABTT North**

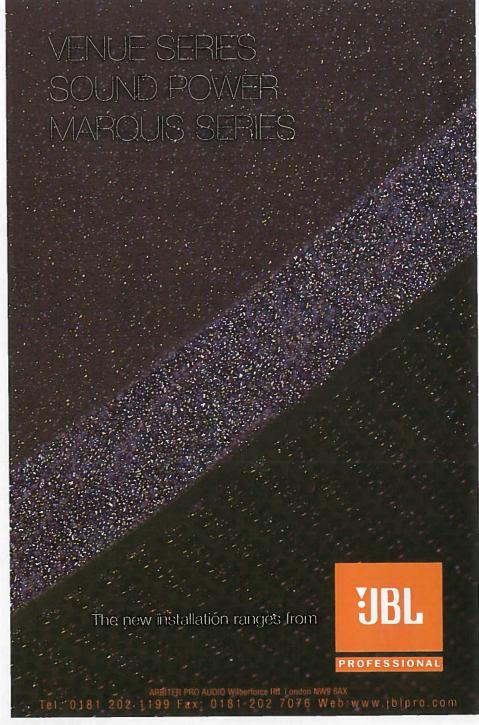
The ABTT North annual trade show and seminar programme is taking place at The Royal Hall, Harrogate, on Wednesday 11th and Thursday 12th November, 1998.

A programme of seminars runs concurrent with the show at the nearby George Hotel and topics include Sound 2000: Science Fiction or Reality chaired by Ric Green, technical director of Opera North; CAD in the theatre, chaired by Tony Bond of TTTS; An Audience with Ivor Dykes chaired by Philip Edwards. The second day of the programme is dedicated to Edwin O Sachs and will take place at the The Majestic Hotel near The Royal Hall.

Entrance to the seminars is free. For further details on these and the trade show contact the ABTT in London on +44 (171) 403 3778.

#### Mackie Points to Synergy With RCF

Representatives of Mackie and RCF Spa appeared together at a press conference held during the PLASA Show in London, the first joint public press event since the recent acquisition of RCF by Mackie. Greg Mackie, CEO of Mackie Designs Inc, and Arturo Vicari, managing director of RCF Italy, appeared at the joint briefing where Mackie explained that his company's interest in RCF began at last year's NAMM show when he was enormously impressed with the sound of the RCF speaker designs. The move to buy RCF, he explained, came only after Mackie had looked into the possibility of manufacturing their own speakers, but had been deterred by the level of specialisation required. RCF, as one of the world's major players, were seen as an ideal partner.



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#### **NEWS IN LIGHTING+SOUND INTERNATIONAL**

#### Strand Provide RSC Network



RSC board operator Keith Cookson (left) with Strand's Colin Cuthbert at the new 550i lighting console.

The Royal Shakespeare Company at Stratford extended its commitment to running its stage lighting from Strand consoles when it recently replaced its Galaxy with a sophisticated Strand networked lighting control system to support the theatre's development into moving light technology.

The RSC is one of the largest arts organisations in the world and this latest acquisition - which is the largest networking system in the UK - has been accomplished with support from National Lottery funding. The RSC's requirement was to achieve flexibility of the lighting management, based around two Strand 500 Series desks; a 550i, situated high up in the control room, to operate the conventional lighting, with a second 520i controlling the moving lights from a position in the stalls, linked to two PCs with 233MHz Pentium II processing, running GeniusPro 2.1a software. The full set-up includes the two consoles and PCs and two ethernet nodes to provide a DMX output, with a further PC providing full tracking back-up. All shows are saved on a central file server using Windows NT, backed up on lomega Zip Drives.

All information is linked in a central file server so that any one of the consoles can link into any show contained on that server. The two desks can be configured independently or work in sync, and using Server software, different levels of access can be achieved for different users. Network channel partitioning is another key feature, and when the 'Record' button on the 520i is hit, only the moving lights will be stored. The ethernet system is wired using Category 5 cabling. Industry standard internet protocols (TCP/IP) are used to theoretically allow remote control of a show taking place on the other side of the world via the internet.

Strand's technical representative Colin Cuthbert, in conjunction with the RSC's chief electrician Clive Morris, oversaw the design and commissioning of the system, which was supplied by White Light and installed by The Service Company.

The RSC's main theatre also features a number of other Strand fixtures, such as Brios, Altos, Cantatas and Toccata effects projectors and LD90 dimmer racks. The new system debuted on the summer rep shows and the RSC expect to be realising the benefit of the network by the time the Winter season kicks in.





#### **Grass Roots Projection**



Artists Heather Ackroyd and Dan Harvey used a Pani BP2.5 projector plus lens, supplied by Production Arts Europe, in a more idiosyncratic context for their live art installation, Photosynthesis.

This was commissioned by Hull Time Based Arts and Photo 98 and executed at The Ice House in Hull, an old Salvation Army Citadel. The back wall of the auditorium space was coated with a layer of clay and grass seeds. Wyatt Enever of DHA worked on the computerised random dot technique to develop a black and white negative image on Agfa Lith film for the projector which was positioned in front of the layer of clay and seeds and which projected in negative form for eight hours a day over a two week period. The grass, fooled into thinking this was sunlight, produced chloroform and grew in yellow and green positive tones on the wall. Visitors flocked to view this crafty aesthetic and technical feat!

#### PSL's Video is Still A La Mode

Five years after establishing big screen video on major concert tours by launching Barco 5000 Series projectors onto Depeche Mode's awardwinning Devotional tour to portray Anton Corbin's stunning visuals, the Concert Division of PSL have again been contracted to provide the video reinforcement for the current European leg of the band's '86-98 The Singles' tour.

Commissioned by production manager Lee Charteris, they are now providing Barco 9200 projection onto a three-side screen - forming half a hexagon and hung in 8 x 6 portrait blocks - at centre stage. The source material consists of the videos produced at the time each of the singles was originally released.

PSL's projectionist is Ed Moore. Visuals are controlled using Dataton Trax on an Apple Mac laptop, fired by MIDI from a new sequencer controller on stage. The MIDI fires each song's time-line in the Trax programme via a Smartpax, and tells the CRV Disc players what to do and when. Seven separate notes are sent, each relating to a song, and this enables the running order to be changed without affecting the programme. The tour kicked off in Riga, Latvia and tours Scandinavia and Eastern Europe before arriving in the UK on September 29th for dates at Wembley Arena, Manchester NYNEX and Birmingham NEC. At the end of October the tour sets off for North America. The show is also serviced by Britannia Row (sound) and Vari-Lite Europe (lighting).

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#### KF860 Makes Star Debut in Thames Spectacular



Two ground stacked arrays of EAW loudspeakers in situ on the Pier.

No more rigorous test could have been lined up for the European debut of EAW's KF860/KF861 Virtual Line Array system than the recent Thames Festival, which took place along 1100 metres of the Capital's river, broadcasting live and playback sound down the Embankment into a wind gusting at 25 knots.

Specialist audio design and implementation company Canegreen Commercial Presentations - who were contracted to provide and engineer the PA - realised that they would need to deploy a system that could run coherently over incredible distances in a windy environment. The scene was perfectly set up for a first outing for the new rig, which they had acquired from EAW's UK distributors, Sound Dept.

Regular EAW system users, Canegreen also ran the Thames show last year when the Spectacular involved acrobats walking on a suspended wire across the river. Building on that breathtaking feat, a crowd of 25,000 again assembled between Waterloo Bridge and Blackfriars Bridge as Canegreen's system engineer, Andrew Frengley - a highly experienced live sound mix-man - set out his stall on a pier at Bernie Spain Gardens. The Festival programme commenced with an evening procession called River Alight, featuring several thousand people dressed up in carnival costume and tissue paper sculptures. This was followed by a spectacular series of touring pontoons in a floating pyrotechnics show along the Thames. From their base on a pier at the mid-point, Canegreen had to cover the entire amphitheatre.

The performance of the KF860 line array PA system, run four-way mono and underpinned by six SB1000 subs, left no doubts whatsoever. The subs were divided into two's - pointed upstream, downstream and across the Thames, and forming three sides of a square. Meanwhile, Sound Dept's role in the event's success was further accentuated by the fact that they also supplied the 12 Crest Professional Series 8001 amplifiers from which the system was powered. The music programme comprised a combination of 'warm-up' CDs and samples as a curtain raiser to a performance of new music by ambient composer and Mango recording artiste, David Lowe, who performed from a position immediately behind the PA rig and mix station, which in turn was mounted on a Steeldeck platform aboard the 10-metre jetty. The ambient playback was primarily through 10 or 15 line level channels fed from the CDs and samplers and culminating in a version of Take Me To The River.

Frengley told L+SI: "The floor-stacked design - which we refer to as 'sharks' in view of their shape - consists of a puck welded to a stand. We experimented with them successfully in the workshop but it was a different experience when we got on site because we had a 30ft drop, and we were relying on brute force and a knowledge of gravitational influence." KF860 and KF861 modules extend Virtual Array Technology in a new direction; by integrating Tuned Dipolar Array cancellation effects with proven line source and waveguide principles, arrays of at least three VLA modules can provide outstanding pattern control in both planes to well below 100Hz.

Complex signal processing is required to properly integrate the systems for optimum LF directivity and Frengley was also eager to compliment the digital powers of EAW's proprietary MX8600 management system, which he describes as a great tool. "Once you get into it - which took us less than an hour - you can easily and accurately predict how you can tune the KF860s to perform in the actual environment."

In addition, an MX8600 was assigned to each of the KF860s and KF861s to store EQ and time alignment settings. Summarising the show, which was production managed by Jonathan Bartlett and promoted by Adrian Evans of Thames Festival, the Canegreen director concluded: "The KF860/KF861 design is a highly-usable technology. It's the fact that it is a complete PA in its own right that makes it such a functional tool - and on top of that the sound is just fantastic."

## LMC Gets Larger in Leeds

LMC Audio Systems Limited, the independent pro audio resellers, have expanded their UK operation with the opening of a third outlet in the dynamic city of Leeds. The new office is conveniently located at the top of the M1 close to the city centre. This new venture builds on the firm foundations of LMC's London and Birmingham branches. Chris Smith heads the Leeds office, ensuring that the North of England and Scotland are serviced more effectively. He has been with the company for a number of years, initially in London, then with the Birmingham office.

A new recruit to LMC, Anton Dunbar, will be supporting Smith with the smooth running of the operation. Dunbar, formerly of Yorkshire Audio and the West Yorkshire Playhouse, will be using his local knowledge to help increase LMC's profile within the area.

Paul Hinkly, LMC's managing director, told L+SI: "LMC's ultimate aim is to supply responsive sales and service back-up to all our UK customers within a maximum of two hours. Opening the Leeds branch will bring us closer to this objective."

The company's new office address is Suite 20, Brooklands Court, Tunstall Road, Leeds LS11 5HL. Telephone 0113-272 7508.

## Motor School Success for PCM

PCM's 1998 Motor Schools, held immediately following the PLASA Show at the company's Wirral headquarters, were the most successful to date, with a total of 107 attendees. The level of success can be gauged by the fact that the first Motor School, held in 1992, was attended by just four people.

The Schools, led by Wally Blount from Columbus McKinnon and Tony Dickson from PCM, are aimed at helping owners and users of Columbus McKinnon Lodestar motorised hoists to become fully acquainted with all aspects of these products. This year, the courses were also extended to include a session on trussing, presented by Mike Garl of James Thomas Engineering.

The free sessions are attended by representatives from a variety of disciplines within the industry. The response from attendees was very positive. John Jones of PCM, fresh from picking up a Commendation Award for Product Excellence at the PLASA Show for the Columbus McKinnon ProStar, said that many more requests for future schools were received at the show.

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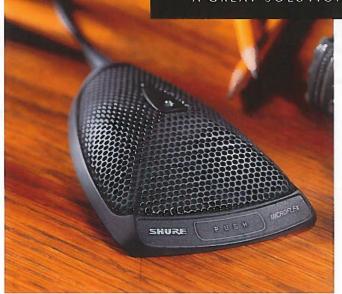
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#### NEWS Shorts

Smithfield Electronics has recently launched Smithfield-Online, a Web site offering an auction area for users to sell products, a discussion forum, a games area for light relief and an advertising section, as well as a fully interactive guestbook and product directory. You can find the site at www.smithfield-online.com

High End Systems' Studio Spot has made its debut on the autumn US tour of Christian artist Michael W Smith. Eight Studio Spots, along with 14 Technobeams, 12 Technorays, 24 Studio Colors and eight Cyberlight Litho fixtures, were specified by CK Productions.

ARX International, the London-based subsidiary of Australian ARX Systems has appointed Raper & Wayman as its distributor for the UK & Eire. ARX manufacture a diverse range of signal processing equipment, amplifiers and loudspeaker systems.

#### **Repeat Performance**



Since the early 1970s, the Belgrade Theatre in Coventry has looked to CCT Lighting to fulfil their lighting requirements, and when they were given the opportunity recently to upgrade their lighting system, it was to CCT that they turned once again.

An extensive array of equipment was required, among the list elements from the award-winning Freedom range including Freble 600 - both Fresnel and Pebble - and the Freedom 800 profile lamp house with interchangeable 20/40° and 15/32° lens tubes. Also supplied by CCT were a Compulite Ovation dimmer control console complete with monitors and remote control system, rack-mounted dimmers (2.5kW and 5kW), Martin PAL 1200 scanners, ColoRocket scrollers, standard and short-nosed Par cans and a number of Starlette 1kW four-square Cyclorama Floods. Given that the CCT Silhouettes which were replaced have served the theatre well for over 25 years, it looks as though CCT's luminaires will last well into the next century.

#### Marquee Kits Out York's Theatre Royal

The current production of *The Boyfriend* at the Theatre Royal in York has received a boost in the form of a new FOH sound reinforcement and 100V line announcement system, designed and specified by Shepperton Studios-based Marquee Audio.

Matt Savage of the Theatre Royal explains: "We had a fixed budget and the new FOH system had to be not only value for money, but because of the style of the Theatre's auditorium it had to be discrete."

Thus Marquee's Scott Wakelin recommended a Renkus Heinz system, and arrived on site with the latter's representative, Peter Child, to carry out the survey and auditorium design. He explained: "We had to do our shopping judiciously. There was a fixed budget of £50K, and the Soundcraft Series 5 desk accounted for around half of that. In addition to the main FOH system and 120m of Van Damme cable we also had to keep some budget for the 100V line Tannoy announcement system for each reception area on the three different levels."

The main system supplied by Marquee Audio includes six Renkus Heinz TRC121/9 passive two-way units which have been custom-finished to match the interior decoration of the auditorium. The TRC121/9's compact design, standing only 58.4cm high, enables them to be easily hidden among the architecture.

Marquee Audio also included two Renkus Heinz DSR18-1 subwoofers, four Renkus Heinz amplifiers - three P2700s and a P3501 - and two X24 system controllers, as well as a Spirit 328 digital console and RCF Monitor 3 infills.

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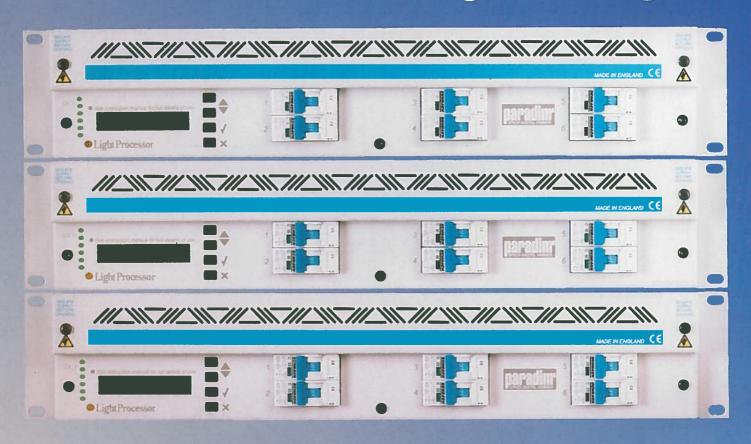
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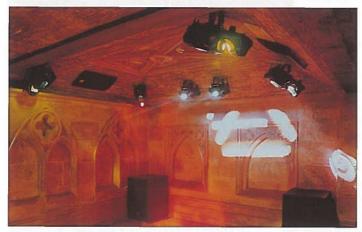




LightProcessor

#### **NEWS IN LIGHTING+SOUND INTERNATIONAL**

# Portobello's in Dublin is World's First JBL Marquis Installation



The world's first installation of the new Marquis Series from JBL is in Portobello's Nightclub, one of Dublin's newest clubs. It is an installation where the sound system components are an integral part of the architectural design plan that melds Irish pub features with contemporary sound system elements.

The Irish pub, which is the theme of the central room at Portobello's, features six JBL Marquis Series MS112 cabinets and four JBL Marquis Series MS 125 enclosures as subwoofers. "These new speakers were the best choice for this kind of environment," explains Frank Murray, managing director of Audio Tek, the firm that completed the installation at Portobello's.

Another interesting feature of Portobello's sound system is the use of 12 JBL EON self-powered speakers in the main floor's lounge. "The lounge is a relatively tight space," explains Murray, "so it required a speaker that could work in recesses built into the walls in order to maximise floor space. The active EON speakers eliminate the need for a lot of cabling, which made placing them much easier." Other JBL components used in the installation include JBL M552 crossovers and JBL M712 limiters.

Meanwhile, as Belgrade's Sports Café themed restaurant franchise prepares for expansion, one of the key elements of the chain's success to date has been the high emphasis placed on the audio/video entertainment systems. At the chain's flagship restaurant in the Yugoslavian capital, JBL Professional's Control Contractor Series components are at the very heart of the audio/video system.

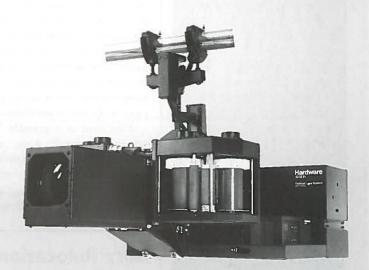
Designed, specified, wired and installed by AVC Professional of Belgrade, the 70v audio system in the 5,920sq.ft Sport Café is mainly designed for the reproduction of background music and live audio feeds from broadcast of various sporting events.

Featuring a total of 28 full range 5" JBL Control 25T speakers, the Café's central space and VIP lounge house the main Sony video display which features 13 suspended local 29" TV monitors, five 21" monitors and a 37" rear-projection LCD display, which are built into the space of the bar counter. The gift shop and the restrooms have a 14" monitor each. The smaller Galleria area of the Café features four full range 8" JBL Control 28T speakers, with two JBL Control SB-2 dual coil 10" subwoofers. The Galleria has a centrally-located 50" rear projection TV, three 21" monitors built into the cabinetry surrounding the counter space and six suspended 21" monitors in the sitting space around the gallery. A total of 12 full range 5" JBL Control 25T speakers cover The Sport Café's upper gallery and main entrance space, which has a 37" rear projection TV, and two suspended 27" monitors. Special video and audio input boxes are provided at the entrance to the restaurant for outdoor presentations based around an additional 200" Sony screen.

#### **Avesco Buy System Technologies**

The international services group, Avesco plc, have announced the acquisition of Belgian-based giant screen company System Technologies - distributors for Canadian-based Saco giant video screens. System Technologies are highly regarded for their expertise in display systems design and have packaged screens for many of the world's major manufacturers including Sony, Panasonic and Pioneer. The company have recently completed a number of projects in the horse racing industry which include building trailer-mounted screens for the Tote in Britain and the Victoria Racing Club in Australia.

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#### NEWS Shorts

A new on-line service listing technology-related events throughout Asia has been launched by EWC & Associates of Singapore. The list is updated by a number of events organisers, and can be accessed on go-events.com

Organisers of The Event Show and publishers of the White Book and Access All Areas, Inside Communications, have acquired ShowExpo. The show, which is aimed at the exhibition industry, will now run alongside the Event Show in London in January.

A **Cerwin-Vega!** Intense! sound system was supplied by Lamba recently for a charity festival at Belhus Park, Thurrock, providing the sound reinforcement for a range of bands. The rig consisted of T-250 mid-high and T36/750 bass cabinets, incorporating an advance horn-loaded design, and was sourced by Bubbletronics of Essex.

#### Ocean Colour Screen

OptiScreen, the new LED screen from Gearhouse Group, recently made its debut at three Ocean Colour Scene concerts held at Stirling Castle. OptiScreen is the result of many months of research and development into the limitations of existing large-screen technology.

The system features enhancements including the use of Virtual Pixel Technology, which doubles the perceived screen resolution. The visible screen is made up of rows of modular self-addressing panels, each measuring 1280mm x 960mm, the standard 4:3 television aspect ratio. 16:9 ratio screens can be constructed by varying the number of panels in the vertical and horizontal dimensions.

When used as a portable 'touring' system, the lightweight aircraft grade aluminium supports automatically engage and lift the OptiScreen panels into position, whilst all permanent installations feature a low-cost steel matrix support system as standard. Each panel is again crafted from aircraft quality aluminium, and



weighs less than 70kgs. Signal input to the OptiScreen panels is via a single fibre-optic cable, which offers considerable advantages in ease of handling, maintenance and reliability.

The employment of this technology provides complete isolation of the signal path and reduces EMC emissions and susceptibility. The OptiScreen system complies with current CE and EMC regulations.

#### **Blitz Relocation**

Following the Purchase of Blitz Vision, TP Sound Services and Interactive Television by TeleCast Communications as reported in last month's L+SI, the newly-formed Blitz Communications Group has relocated to Elstree, Hertfordshire, creating one of the largest single-site AV suppliers in the UK.

The new premises, fitted out at a cost of £750,000, will house over 100 staff and cover 34,000sq.ft and include demonstration theatres, workshops, maintenance areas, quality control facilities, operational space and storage. The company can be contacted on +44 (0)870 162 1000.



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- 4-colour mixing (CMY + Amber).
- · Gradual colour temperature correction (GTC)
- 3 levels of diffusion (max, aperture 50°).
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- CMY colour mixing.
- · Continuously variable frost (up to 50°).
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#### NEWS Shorts

Flame Productions Red provided the sound system for the live stage at the Royal Welsh Show recently. Around 4,000 people gathered to watch the live bands each night, using an Ohm TRS touring system consisting of BR-218, BR-12S, BR-15MS and LE15-2 speaker cabinets, driven by eight Ohm FL 1400 amps and processed by the new Ohm CRED digital processor. Lighting for the stage, also supplied by Red Flame Productions, came from Ryger Electronics fixtures.

DJ Willrich, the AV and multimedia systems specialist has moved into new premises in Hampshire. The company can now be contacted at Beufre Farm, Bucklers Hard Road, Beaulieu, Hampshire SO42 7XA, telephone +44 (1590) 612603.

#### **Vari-Lite Dance**



Vari-Lite Europe Ltd have sponsored the lighting for Siobhan Davies Dance Company's newest work 'Eighty Eight' which tours the UK during October and travels to Slovenia in November.

This is the first such sponsorship for a contemporary dance company. The lighting for the show, designed by Peter Mumford, includes six VL5 Arcs and four VL6s from the Series 300 Vari\*Lite luminaires. The only conventional lighting is a dance side light rig, designed to shed a small amount of additional light onto the dancers' bodies.

#### Slick Expansion Spreads to Oz

Following the opening in November last year of their new manufacturing facility in the USA, Slick Systems have announced the establishment of manufacturing facilities in Australia.

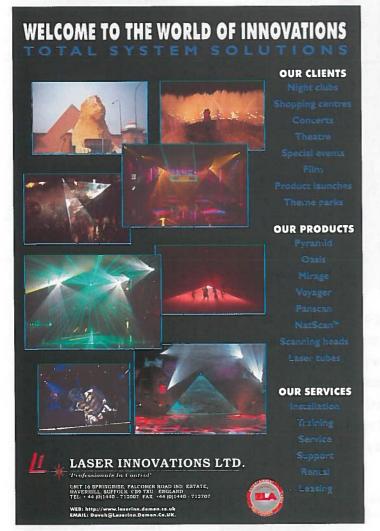
The new Sydney-based division will manufacture the entire range of Slick product, as well as contributing to future research and development. The new venture is headed by an Australian, lan Messner, who has 27 years of engineering experience, the last 16 of which have been spent in the entertainment industry.

Michael Wood, group chairman, told L+SI that the company will concentrate on the Australasian market, ensuring a continuance of product quality, standards and pricing, together with a simultaneous commitment to customer service in the Pacific Rim.

#### **New Loading Tower for RAH**

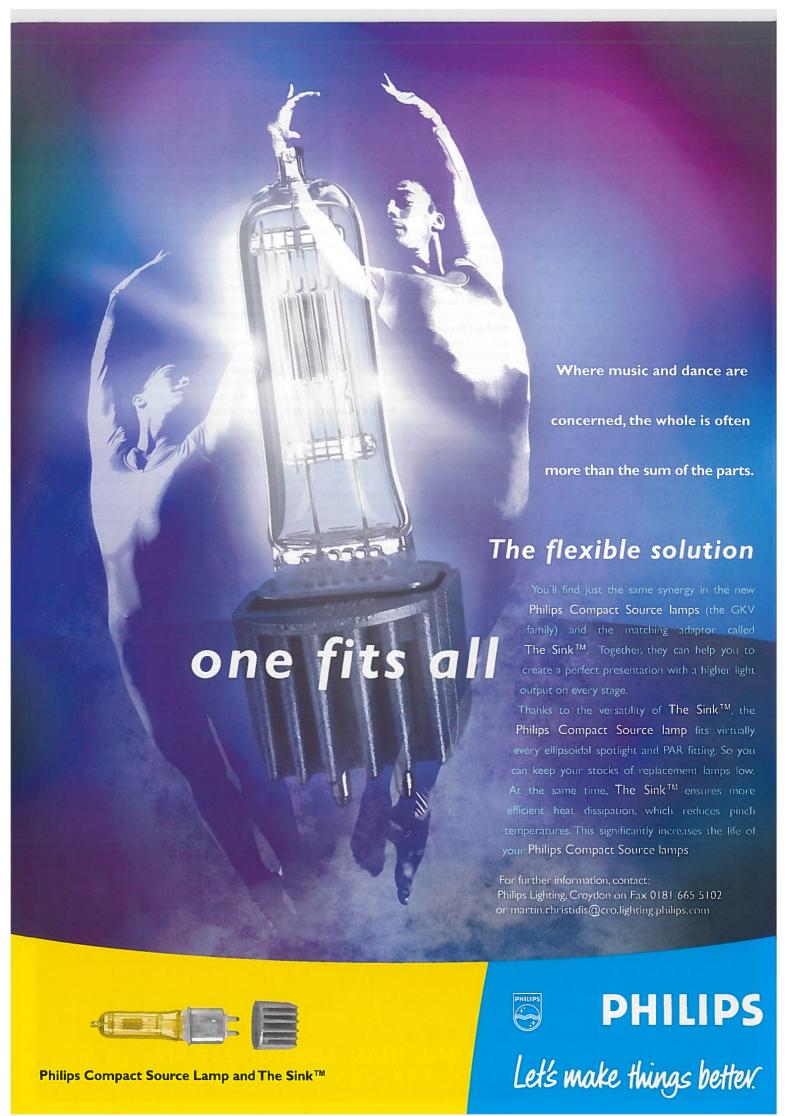
Maltbury Ltd has recently completed an unusual and complex job for The Royal Albert Hall. To simplify and accelerate the loading and unloading of equipment into the building, the staging specialist has constructed a 16ft high mobile loading tower for Door 11. The tower provides access to three trucks simultaneously and affords a degree of protection from the elements for the hundreds of crew members who brave a windy corner at all hours of the day and night. Clad in maroon canvas, specially padded in order to dampen the noise of feet and flight cases, the 12' x 12' tower has been named 'the padded cell' by RAH staff.

Fax your news to PLASA Publishing on (01323) 646905









#### **People News**

**Bruno Wayte**, the long-serving head of JBL Professional division at Harman Pro Audio and subsequently Arbiter Group, has left the company to join the UK arm of Italian loudspeaker manufacturer RCF. RCF have also appointed **Phil Pell**, formerly of Celestion and, more recently, JBL, to take on the role of sales manager for the company's MI division.

Tannoy has appointed industry professional Sean Martin as export sales manager of its pro audio division. Martin, who joins Tannoy Professional from Turbosound, has an extensive sales background in the professional audio industry. He takes over from Richard Gainsborough who moves to a newly-created post of business development manager.

**Rob Berg** formerly with Jansen & Jansen Holland has joined Controllux Lichttechniek from Zwanenburg. Controllux is the Dutch dealer for ADB and Pani.

Light & Sound Design have appointed **Kevin Forbes** a director of the company. Forbes has been with the company 17 years, having joined back in 1981 for a Black Sabbath tour.

Staging specialists Maltbury have appointed two new members of staff - **Tom Dickinson**, who joins as hire manager and **Esther Neve**, a technical theatre arts graduate, who takes on the role of administrator.

Sennheiser UK have promoted **Shabaz Younis** to product manager of the Anchor Audio range of portable sound systems. Younis, who has been







Phil Pell.



James McKeown.

with the company for three years, takes over from **Simon Jones**, who is now Sennheiser's area manager for the Midlands.

Following the recent buyout of Blitz Communications by TeleCast from Caribiner, company founder **Charles Beddow** is to continue in the role of chief executive officer, while **Michael Breen**, previously finance director, has accepted the position of chief operations officer. Meanwhile, **Richard Rogers** and **Dave Perry** of TP Sound, which was also purchased by TeleCast, will remain directors of the company.

Ontario-based Westbury National Show Systems have appointed **Brock McGinnis** as sales manager. McGinnis, formerly of Novatec, brings more than 15 years of audio and lighting sales experience to the company.

**Howard Ball** has been appointed managing director of Nexo SA. Ball, who comes to Nexo from a background of European manufacturing, takes charge of the company's Paris-based facility and the UK-based international sales office.

**Graham Burgess** has joined Avesco plc as managing director of their recently-formed large screen sales company. The new company will

distribute the Saco range of products into the key large screen markets of sport, music and rental applications.

lan Knight has joined Central Theatre Supplies as technical manager. Knight has spent 11 years working as a lighting technician at venues in Coventry, and will now look after all technical aspects of the company, including hire and installation.

Coe-tech have appointed **Chris Rolph** as sales director. Rolph, who has been with the company for a number of years, will have responsibility for the UK sales team. Other new additions to the company include Alison Bucknell, who is now part of the sales co-ordination team and **James McKeown**, formerly of Turbosound, who becomes key accounts manager.

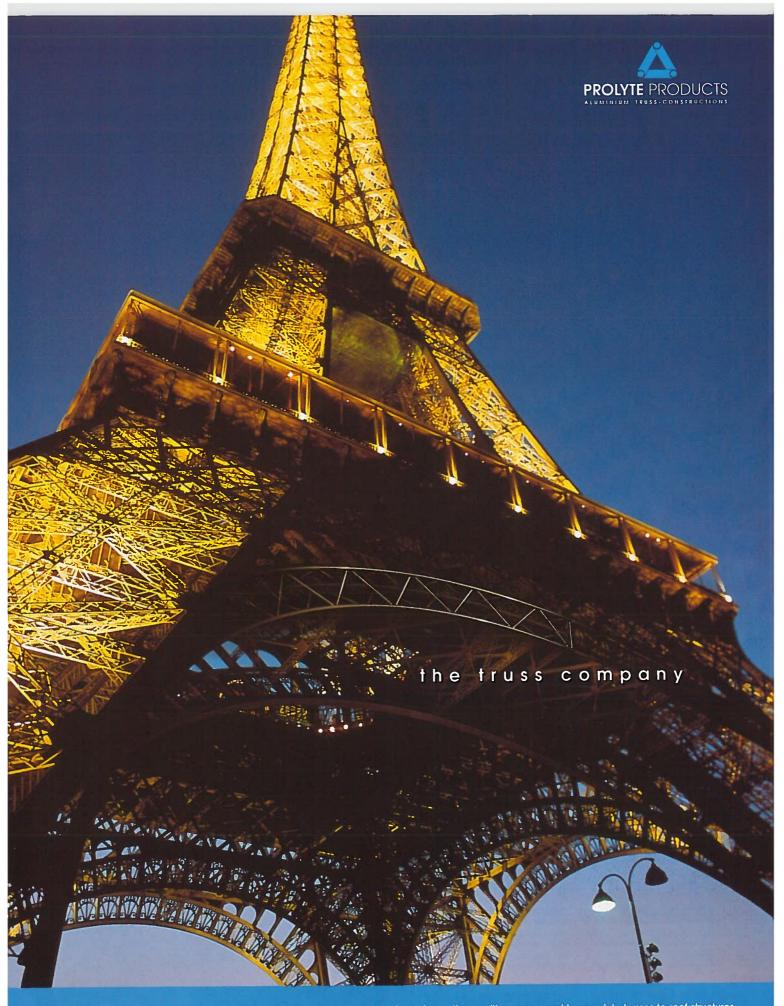
Staying in Northampton, Apollo Spectrum Lighting have taken on **Paul Russell** as sales manager for UK and export territories. Russell joins the company from Optikinetics.

Zero 88 have appointed **Malcolm Davis** to their sales team. Davis, who joined the company in August will be tasked with strengthening the company's UK network.

**Paul Sharman** has joined Stage Electrics, Birmingham in their hire department. Sharman was previously deputy head of lighting with Opera North in Leeds.

d&b audiotechnik has appointed **Stephen Hogg** as after-sales service manager. Hogg has taken responsibility for all d&b's UK demo stock and has plans to further enhance the company's service and repair system.





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#### NEWS Shorts

Harkness Hall have been listed in a recent Plimsoll report among UK companies who have made substantial gains in efficiency in recent years. According to Plimsoll the companies have been able to improve on 'their rate of sales return on assets (stability) and pretax profit return on assets (profitability) while expanding staff and increasing salaries over the last four years.'

Pulsar have released an addition to their range of brochures. The new catalogue, Masterpiece Control Systems, supports the company's Masterpiece 108 controller and is available free on request.

Nu-Light Systems have been appointed sole distributors of the HSL range of products and controllers worldwide. The range includes Win Commander and the recently launched Pixelscan DMX Video Image Projector system.

#### **DHA Bat Back**



With regard to the recent article on page 55 of September's L+SI, entitled 'PLASA gives DHA a Sporting Chance', we feel obligated in the name of moral rectitude to state that they did nothing of the sort and we must set the record straight!

We fully appreciate and respect PLASA's tact in withholding the names of the 'rubbish' team since, had our own victories previously been limited to thrashing teams with the average age of school children, we would be inclined to do the same. As it is, we found our more mature approach paid dividends - at least in advertising terms. We would therefore like to take this opportunity to thank PLASA for allowing us to shame them on their own home ground and dent their supposedly dignified league reputation. We agree with PLASA's statement that 'sometimes there are good losers and sometimes there are poor losers'. It just remains for us to point out that the final score was in fact DHA - 98, PLASA - 66. Evidence of this can be seen in the photo above - a glorious projected glass gobo which featured on our PLASA stand.

The entire team at DHA Lighting

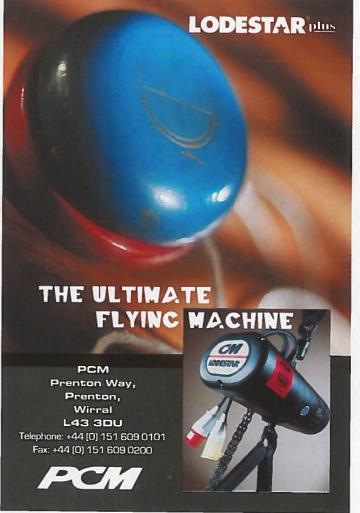
## Port Theatre Consults Auerbach + Associates

US-based Auerbach + Associates have recently been contracted as theatre consultant for the newly constructed Port Theatre located on Vancouver Island, USA. Designed as a multipurpose venue, the 806-seat Port Theatre is suitable for a range of applications including local and touring performing arts groups (featuring acoustic and amplified music, drama, dance and musical theatre) as well as conferences and symposia.

Auerbach + Associates collaborated with architectural firm Wade Williams Young and Wright on the planning and design, and provided the performance criteria affecting the building's operation as a theatre. The company's comprehensive approach to this project included needs assessment, programming, conceptual and schematic design, detailed theatrical system design and extensive consulting with design team members as well as co-ordination with interrelated construction trades.

To support production, the company designed and specified a number of theatrical systems including a counterweight rigging system, computerised theatrical lighting controls and fixtures, an orchestra pit lift to extend the apron stage and theatrical and acoustical draperies. The theatrical systems allow for ease of change from one production to another, and can be easily adapted to future technologies.









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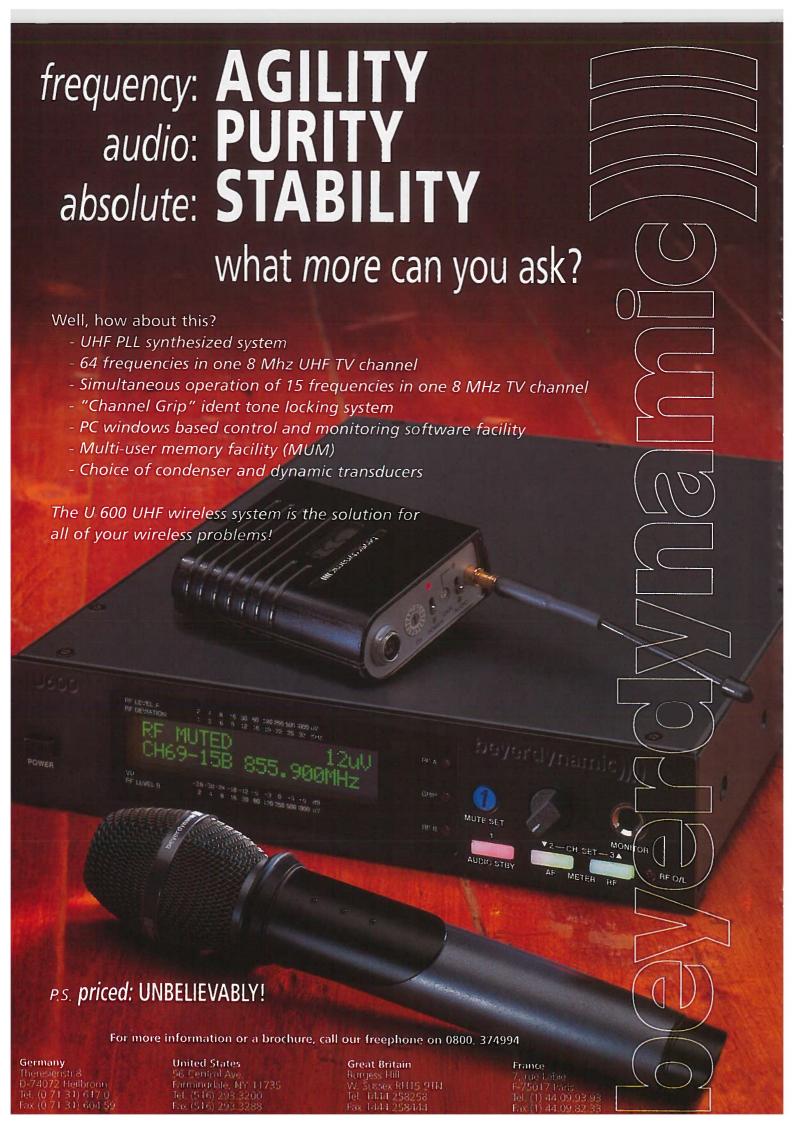


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#### **Lumenation and the Tower of Light**

Lumenation have recently been involved in a unique job - the Black Country Route Special Features. The project, undertaken by the Birmingham-based Public Art Commissions Agency in conjunction with Wolverhampton and Walsall Boroughs, is aimed at rejuvenating derelict and under-used land along the Black Country Route, a major highway linking the A4123 Birmingham New Road with the M6.

This entailed extensive landscaping and the use of special features, mainly in the form of sculpture, at critical points along the route. One of these, the 'Tower of Light' at Bilston, is a futuristic design from sculptor Ellis O'Connell, and consists of a spectacular tower constructed from stainless steel mesh and interwoven with Lumenyte fibre-optic cables, supplied by Lumenation.

The 16.5m high sculpture is transformed at night with 400ft of FC501 side-emitting fibre and 22ft of SEL500 end-light fibre with five Monolyte DMX light sources (150W HQI lamp).



#### **UK Produces Another World Champion**

The London Hippodrome was the venue for the 1998 World Light Jockey Final which took place during the PLASA Show. Organised by Clay Paky & Pulsar, the event was host to some dynamic disco lightshows.

A professional performance by Greg McLenahan clinched the World LJ title for the UK, displaying an all-round talent for programming and creative delivery of an artistic lightshow. The other finalists, all national champions of their own countries, were Daniel Cardenas of Spain, Alessandro Aiello of Italy, Eric Le Guilly of France, Ron D Lite of The Netherlands and Mario Hoffken of Germany.

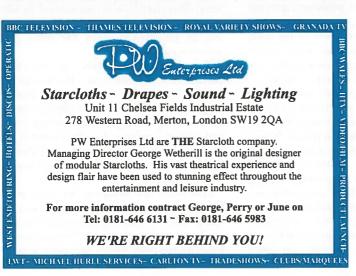
#### NEWS Shorts

Northampton-based **Coe-tech** recently took part in a moving-head lighting product comparison at Elstree Studios, home of Top of the Pops and Eastenders. The Coemar CF1200 and the NAT MM Zoom joined in the comparison along with other leading moving head fixtures. Ian Brown was giving away nothing about the positive results.

Following successful negotiations with Lampo srl of Italy, all UK and Eire sales of Lampo products will now be handled exclusively by Lampo UK - part of the R&G Group.

The Code of Practice for Outdoor Events, first published in 1993 by the National Outdoor Events Association (NOEA), has been updated in the form of an addendum. Copies of the Code can be ordered from NOEA, telephone 0181-669 8121.







# **VOODOO ARTS**

L+SI finds out how Voodoo Lounge has set out to provide a lively, creative space with a unique and self-styled atmosphere in the heart of cosmopolitan London

Voodoo Lounge sits adjacent to Hippodrome, perhaps Leicester Square's most enduring landmark, built into the same distinctive pink brick Edwardian building complex. Smack bang amidst the tacky souvenir shops, burger joints and transient bustle of London's premier tourist spot, it nestles elegantly alongside the insouciant buzz of London streetlife. Buskers, performance artists, 'statues', Big Issue vendors and the endless stream of globally diverse human traffic that traverses those well-worn paving stones.

Voodoo Lounge is the creation of Michael Pemberton Jnr, who operates and co-owns (with the Rolling Stones) the venue. Pemberton's ambitious project seeks to provide an interesting assortment of spaces in which a diverse 'salad' of people can gather, relax, converse, co-exist, chill, imbibe coffee, alcohol or whatever they wish, eat, dance, hear cutting edge music, hang out, relax . . . and even hold semiformal business gatherings.

It's a new, refreshing and original concept for a society that Pemberton is convinced values its

leisure time. The alternative is a world of venues increasingly dominated by repetitive, hyperreal, themed environmental spaces, all looking and feeling exactly the same, and vast shed-style entertainment complexes devoid of character, style or imagination.

The building itself was stumbled upon three years ago by Michael Pemberton Snr, a self-made entrepreneur who has been in the hotel and hospitality business in one shape or form all of his life.

Originally built at the turn-of-the-century as an office block to complete the 'island of buildings' after the Hippodrome indoor circus was complete, what is now the Voodoo Lounge served as HQ for the Stoll Moss theatre empire for many years.

It has Grade II listed status and retains many classic original features such as fireplaces, the open lift shaft, tiles and, of course, the slightly oddball collection of rooms and corridors. It's easy to imagine the space as a rambling, shambolic old office, stuffed with yellowing archives, fusty Orwellian clerks and dilapidated office machinery from yesteryear.

Pemberton Jnr returned from New York, giving up an inappropriate job in the financial world ("I was always crap at maths!") to throw himself enthusiastically into development of Voodoo Lounge. He initially worked with



architects Design LSM and in particular lead architect Simon McCarthy.

Three years later, with Voodoo Lounge a reality, the building has been sympathetically preserved and transformed into an expressive upbeat, modern space, filled with an eclectic mix of furniture, objects, art, surfaces, colours, textures, sounds, materials, people and atmospheres. Opening hours are from 11.30am to 3.30am during which time the Lounge changes in ambience like a chameleon, depending on the current inhabitants and time of day. All these are unique, constantly shifting moods and moments, different by the hour, day, week, month and year, never to be repeated. The temporal complexities are exactly what Pemberton wanted to capture.

Earnest, charming and totally committed to his concept, Pemberton Jnr studied at Chelsea College of Art before decamping to New York to live for a while. During that period, he was taken with the cosmopolitan urban charisma and immense energy of the city, which prompted first thoughts of opening a Lounge space in London. It was to be a place that was not specific to any one entertainment function or assemblage of people, but somewhere where a melting pot of individuals could spend time talking, debating, relaxing and being themselves.

The building, with its collection of interlinked high-ceilinged, but relatively intimate offices leant itself perfectly to the idea. The Voodoo Lounge entrance is on the ground floor. One of the most stunning features, and certainly the first to impact on the visitor, is the lift shaft, around which the original staircase winds, dark steel outlined by a diffuse blue UV glow on each step.

The powerful sound of rushing water dominates as it gushes down the lift. The water feature was developed by Aquatic Design. The original lift cage is locked off on the fourth floor with five chains dangling from it, right the way down to the basement, to which the water clings. Each chain is wrapped around its own colour-changing, side-emitting fibre optic, glowing morphing hues in surreal fashion. The first floor is a general public area featuring two bars, a lounge and an eating area. The post lunch salad of the day might typically include sporty types in shorts clutching skateboards, trendily suited business women sipping champagne, unashamed tourists and Friday afternoon

chillers about town. The second floor is a VIP area for members and their guests. This includes a Members Lounge and bar, Cigar Room, Supper Club and VIP meeting room.

The toilets are also situated on the second floor, a feature in their own right as well as an excellent means of getting people circulating round the building to appreciate its many facets. The public toilets are a fusion of metal (Armitage Shanks prison and hospital spec) and backlit tortoiseshell panels, complete with some classy decorative accourtements. As with the rest of the rooms, Terry O'Neill signed, original photographs from the sixties and seventies adorn the walls.

The mens' toilet features an incredible portrait of the Queen over the fireplace - grinning knowingly! The VIP toilets feature shapely modernist bowls and bathroom fittings from Philippe Starck plus Bauhaus-style chairs and original fireplaces. As with the rest of the Voodoo Lounge, everywhere you look there is something interesting, provocative and new on which to feast the eyes.

Pemberton Jnr designed the Lounge in consultation with interior design advisors Sedley Place whose graphics department also produced the Voodoo logo. This presides in large, frosted glass 'letters' that can also be lit and coloured, mid-corridor, on both floors.

The pièce de résistance is perhaps the Flame Bar on the first floor. The effect was produced by south London-based Flame Light and consists of both front and rear panels of the bar containing tensioned sheets of silk, fanned to wave in the wind. These are then dramatically up-lit with colour-changing light sources.

Although the aesthetic ideas were in abundance, Pemberton Jnr had no previous experience in running a venue or working in the entertainment and leisure industry. Apart from assembling a strong creative technical team whilst overseeing the planning and building work and developing the design, he went to work as a waiter and a wine waiter at Daphne's Restaurant. He also worked as a barman in a club to "Get into the vibe".

He realised at the outset that audio and lighting would be of pivotal importance to the project. Colour and the ability to flood different areas in different colours at varying times was fundamental to the fluid visuality, mood and overall ambience of Voodoo Lounge.

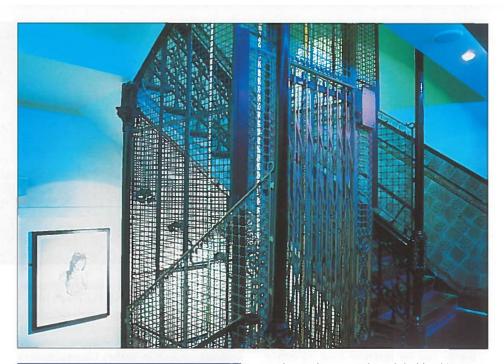
Halifax-based The Sound Workshop, owned and run by David Mitchell, were the sole suppliers and installers for all sound and lighting technology. Mitchell was also instrumental in the audio and lighting design which he developed with Pemberton Jnr. The Sound Workshop has worked on other projects for Michael Pemberton Snr, and Mitchell was approached with an approximate brief stating that, for obvious reasons, they wanted the ultimate sound system for this venue!

The result is an incredible feat of audiology! It's also possibly one of the largest stereo sound systems to be installed in a club-type environment. Ninety percent of the speakers are concealed around the building, and it was prerequisite that however loud the music was turned up in any area, audible conversation was still possible and that people felt comfortable.

The sound system is based around a Cloud CX233 Mixer Zoner controlling 34 channels of Cloud and Bose amplification. This drives 36 Bose speakers in stereo and nine in mono - the latter serving the entrance and toilet areas. It was vital for each area of the building to have its own individually controllable audio zone.

There are 34 Bose 203s with five Panarays. These reside in a first floor room that can also be utilised as a dancing area if required, although Pemberton Jnr is keen to emphasise that Voodoo Lounge is not specifically a place for dancing. Mitchell explains the difficulty of the brief: "Nothing like this had been done before! It needed to sound punchy and rock and roll, not like being in a disco or club, but definitely like being in a restaurant with a disco feel. I specified a system that would deliver plenty of power, high quality and the necessary amount of stereo channels." The variance in sound levels around the building also had to range between 80 and 108dB.

Music is provided from a Databeat system containing three 200-slot CD players. The music itself is carefully and specifically selected and programmed by Velote Music, a new company launched simultaneously to Voodoo Lounge. This is run by two acquaintances of Pemberton Jnr who have a keen ear for new and experimental music. The Lounge's music is a collage of rock, blues, disco and dance



"Audio and lighting would be of pivotal importance to the project. The ability to flood different areas in different colours was fundamental to the fluid visuality and overall ambience of Voodoo Lounge."

classics with a heavy emphasis on new music particularly from acid jazz, hip hop and trip hop genres. Velote Music also import new music and many tracks heard at Voodoo Lounge (particularly Friday nights) will be prerelease.

The aorta of both sound and lighting systems is locked away in an air-conditioned room on the fourth floor of the building, above the offices. All sound and lighting had to be fully automated, robust and capable of running with minimal maintenance and without a resident technical manager. The only visible controls behind the bars are for volume and settings according to the time of day.

The windows of Voodoo Lounge are shrouded with simple white muslin drapes and the walls painted in white and neutral shades. Pemberton Jnr's design concept demanded that each area within the Lounge should be able to change colour continually throughout the day and evening, depending on the mood and the ambience at any given moment.

Another unusual element of Voodoo Lounge is the extent of lighting provided by fibre optic sources - about 85 percent of the total. Fibre optic lenses are hidden at floor level behind the muslins in each window bay, and further openended fibres are used to intensify colour washes on the walls of each room.

The central corridor of each floor is lit via a concealed dark blue 110ft argon source, encased in special blue glass to give it an ultradark UV quality. Colour-changing fibres also emanate from a 'crack' (cut into silver-coated MDF board) in the ceiling.

The steel stairs are lit with hidden blue LEDs mounted in blue tubes which give off a distinct inky glow. More conventional Abstract colour changers act as stairwell wall washes.

Other special lighting effects include mirror flecked panels at the rear of the first floor bar, with colour-changing fibre optic uplighters sitting underneath the bottle parking area. The back row of bottles change colour, shape and distinction, depending on the bottle-of-themoment, with the multifarious range of Vodkas producing the most dynamic looks.

The only white light in the building is used for non-public areas and in the toilets. Tortoiseshell panels in the toilets are backlit by discrete low voltage fixtures and a myriad of other low voltage sources abound throughout the building. The main public use of spotlights is for illuminating the various art scattered throughout the Lounge. Apart from the impressive crop of Terry O'Neill photographs, there are some original lithos by Ronnie Wood. Additionally, in New York, Pemberton Jnr managed to source and purchase a set of 10 original Andy Warhol portraits of Mick Jagger. These were in pristine condition, signed by both Warhol and Jagger, and packed for preservation in a sealed box by the artist, unopened until the day they became Pemberton's.

All the fibres were custom-designed and made for Voodoo Lounge by Lumenyte, based in Irvine, California. These were supplied to The Sound Workshop by Lumenyte's UK distributors Lumenation, co-ordinated by Graham Barron. For Barron, the most exciting aspect of the Voodoo Lounge was the huge emphasis put on lighting originating from fibre sources. This totalled nearly 500 feet of side-emitting fibre and over 3,000 feet of endemitting fibre. All fibres are coated in Stayflex, a development of the jacket that allows them to remain flexible under the influence of UV or sunlight, and all the harnesses contain quartz rods to randomise the light across the fibres.

The fibre optic projectors were manufactured by Apollo in Northampton - over 40 in total. The Sound Workshop commissioned 'Marky' Mark Blackwell of Dial Sound and Light to programme lighting settings



via a Pulsar Masterpiece 108, subsequently downloaded on to two Pulsar Masterpiece Replay units for automated control. Each individual fixture is separately addressed for total flexibility.

Scenes can be replayed from 12-button outstation units behind the bar with automatic programme selection and changing. For Blackwell, a skilled club programmer, Voodoo Lounge was an altogether different experience! The original settings were then tweaked by Pemberton Jnr once the Lounge had opened and the true nature of the atmospherics became apparent.

At about 10pm nightly, muslin drapes drop down and flap in the wind across the entrance to Voodoo Lounge. The stairwell is bathed in an intense blue glow to add an air of mystery, and the Jem ZR 22 smoke machine fires up, shooting its plumes upwards into the lift shaft.

The Sound Workshop were on site a comparatively short six weeks, fitting all the various technology, and working alongside building contractors Withey Constructions to get the Lounge prepared for its September opening, which took place amidst a customary blaze of publicity. The company also provided a Sony video projection system which projects films onto the Voodoo logo letter panels on the first floor landing from a Panasonic video cassette player. To complete the package, Sound Workshop also supplied and fitted the complete telephone and communications system throughout the building.

The multiple personalities of Voodoo Lounge alter radically yet seamlessly with the flow of

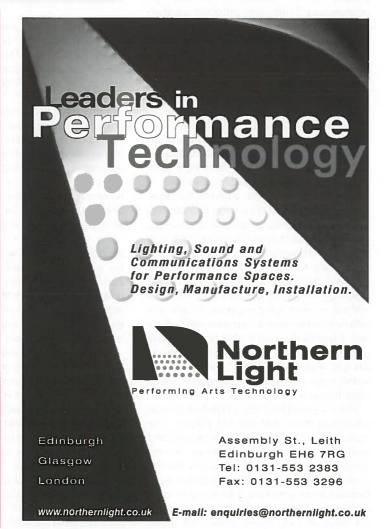
clientele and changing external elements such as natural light. After dark, from the outside, the windows all appear as different colours. The attraction is simple but effective. Pemberton is also a firm adherent of the 'less is more' philosophy. He believes the most spectacular visuals can emanate from the most uncomplicated ideas.

Being just a stone's throw from the more formulaic rigidity of Planet Hollywood and The Fashion Café, Voodoo Lounge has set out to provide a lively, creative space with a unique and self-styled atmosphere in the heart of cosmopolitan London. Somewhere completely different for its pan-dimensional stream of visitors to pass their time out and make theirs for the hours of their occupation!

photos: Adrian Wilson

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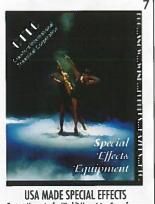
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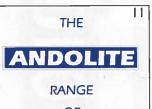
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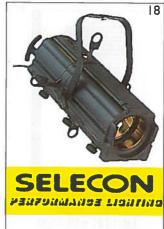
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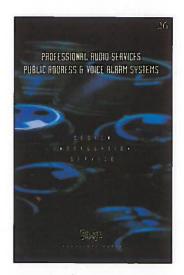
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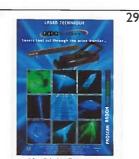
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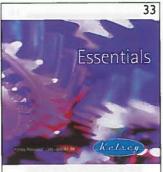
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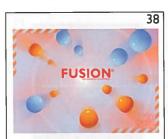


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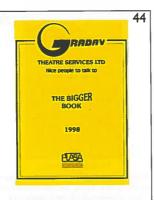


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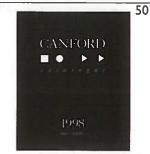
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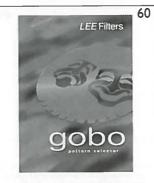


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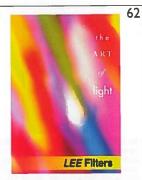
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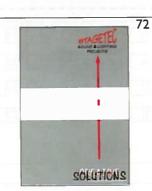
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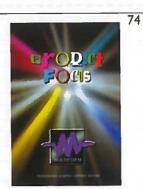


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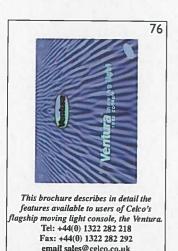
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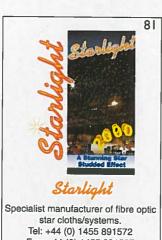








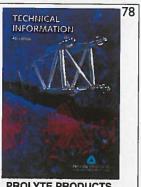








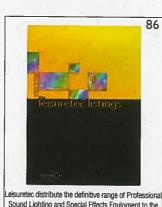




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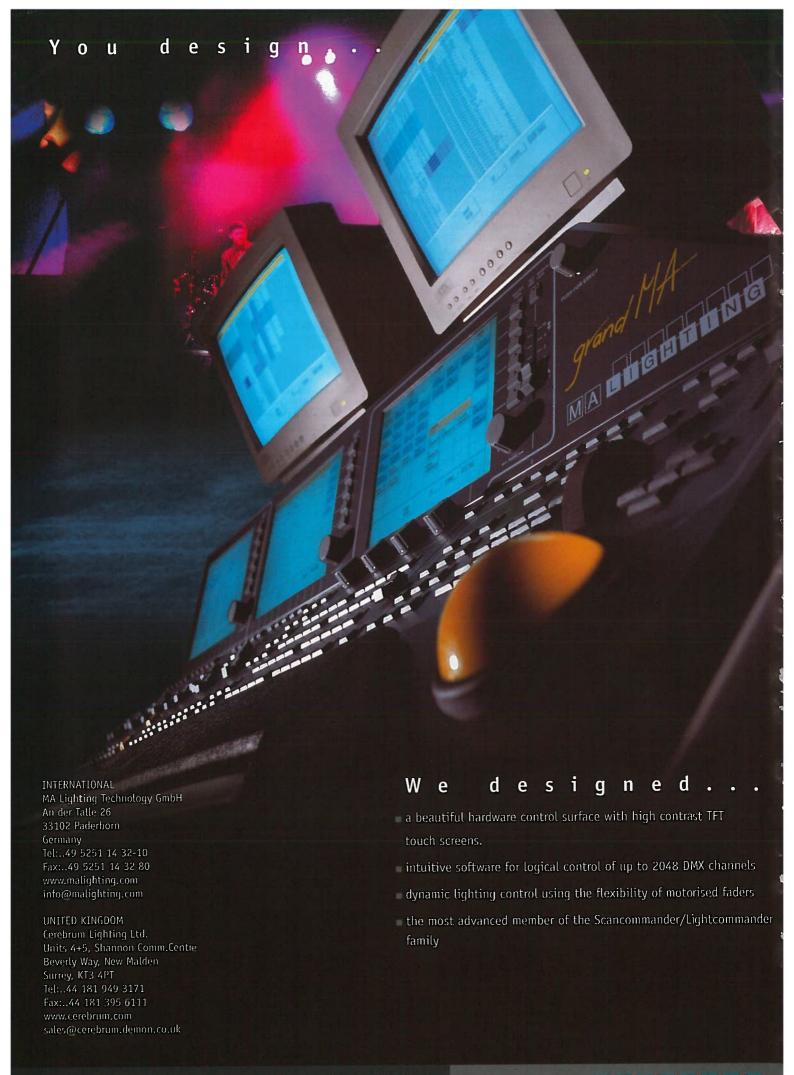


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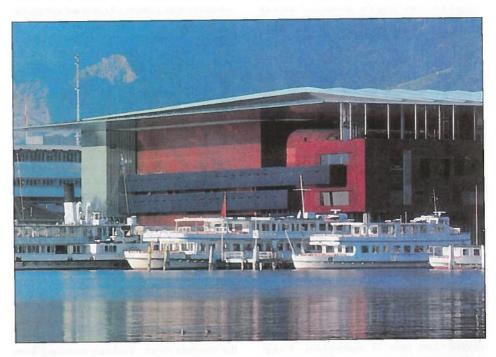
## **ACOUSTIC CULTURE**

In August this year, three years after construction work began, the Lucerne Culture and Congress Centre is being hailed as a masterpiece of balance. Steve Moles reports

Maybe it was the chocolate and cheese, or even the stiflingly hot weather. Either way, an ostensibly flat piece of reportage about admittedly, a marvellous new concert hall in Lucerne Switzerland, turned into an adventure of unexpected new pleasures. "Ein Fahrkarten fur Lucerne bitte," I proffered at the oh-so-convenient railway station buried beneath Zurich airport. "Yes sir, and would you like a return ticket?" It's embarrassing just how many languages these people speak - French, Italian, and, of course, German (Swiss German). But you may be surprised to discover that English is taught as the second language in school here. Generally adults are competent in all four languages.

As I settle into my carriage we quickly leave the suburbs of Zurich behind and are at once in the beautiful pastoral setting of rural Switzerland. Lush rolling green fields, impossibly pretty brown cows and, as the track skirts the Zurich See, hoards of laughing children can be seen splashing in the crystal clear mountain waters. At Zug, first stop past Zurich Hauptbahnhof, I'm joined by Petra. Archetypal Tank Girl, Petra wears figure hugging black combat pants, black vest and has peroxide blonde hair close cropped. "What are you doing in Switzerland?" she enquires having discerned from my weak request to the passing drinks trolley for 'Ein caf, bitte' that I'm neither Swiss nor German. I tell her of my quest and without guile she asks: "What does an English technical magazine have to learn from a new concert hall in a regional Swiss City?"

I had the answer within moments of arriving in Lucerne. Perched on the edge of Veirwaldstatter See, nestling at the foot of the Pilatus mountain, it's a setting that would make the angels draw breath. The Lucerne Koncert and Kongress Centrum (KKC), stands right outside the station. Now I've seen Bridgewater Hall, outwardly a speck in the eye of Manchester; The Birmingham Symphony, less a speck, but still struggling for recognition amongst many a downtown Birmingham edifice, and the Waterfront - well OK, at least the people of Belfast having something that approaches a piece of dynamic architecture. But KKC is . . . well, it would not be overstating the case to say KKC is as breathtaking as the mountains that surround it. Not out of proportion, nor over-stated, architect Jean Nouvel has spawned a masterpiece of balance, both contrasting and complementing its surroundings. The building is very angular from the outside, massive blocks intersect one another, or perch above vertical walls of glass, but what sets the tone is the roof. The 35m cantilever that extends to the north and east sides is otherworldly. So sharp are the edges, so precise the 90 degree corner, that it cuts the sky like a razor. Nouvel's achievement is that it looks neither heavy nor unwelcoming. Such bold statements don't come cheap and latest



estimates put the KCC at £100m. What some may find surprising is that 50% of the cost comes from local city taxes: "We are very democratic here," explained my host Daniel Meyer of Studio M&M who supplied the hall's audio system. "The cost of the new concert hall was put to the local vote, and agreed." The other 50% came from commercial and domestic donations big and small, £20m from the Konzerthaus Foundation, and astonishingly, another £10.5m from the Canton of Lucerne.

Apart from the annual International Music Festival, which is the main justification for such a hall, Lucerne is home to a burgeoning tourist industry, many small, high-tech engineering companies, and Schindler AG, one of the world's largest manufacturers of elevators. Inside the KKC, the atmosphere is unexpectedly different. The foyer and corridors are painted like the outside, in deep blood red, midnight blue and the patchy green of dark, burnished brass. Like all modern concert halls, the auditorium sits detached from the main building fabric, a cell within a cell, but again Nouvel has dared to be different.

Taking his motif from the many pleasure steamers that ply the lake, the inner cell resembles the curvaceous hull of an old sailing vessel, an effect enhanced by the fact that the whole external surface is clad in tropical hardwood planking. In the local press the hall is referred to as the MS Nouvel (Swiss equivalent of SS, and I don't mean the dudes with the natty black uniforms), though the workers give better credence to its scale by calling it the Titanic.

#### **ACOUSTICS**

I never thought in my wildest dreams that I'd ever say anything like this, but I'm beginning to understand Stockhausen and what all those whistles, parps and pieces of disjointed musical expression are all about. Andres Bosshard was the man who turned my head, composer of modern music, film scores and things that defy definition, and the gentlemen chosen to expose the hidden delights of Lucerne's new concert hall. L+SI was there to attend a trial run for the grand opening in late August.

To start at the beginning, Russell Johnson, acoustician extraordinaire, embarked on a path to creating the perfect classical music venue many years ago. His evolutionary path along the route of manipulating space and resonance was detailed last month where he featured in our Profile section. What he's done here is take that development one stage further, positioning the reverberance chambers not just above the rear of the orchestra, but also along the sides and lower level of the hall. In so doing he has turned yet another possibility into the realms of performance.

It's one of the first things that strikes you. You enter the auditorium as I did, and there's eight or nine people busily at work, Bosshard amongst them, setting a 16-point surround sound PA system. There's also a couple of SMs making the stage look untidy, and a TM fighting with the computer desk that controls the huge concrete doors to the various portions of the reverberance chambers. The computer desk also controls the electric curtain system that can glide out from storage points in the walls to cover most of the several thousand specially designed (by Johnson, of course) acoustic tiles that cover the walls.

The hall is very quiet, as expected, yet the whirr of a computer cooling fan is easily discernible amidst the steady murmur of the many individuals already mentioned. This is the kind of audible detail we might expect in a hall like this, but it's indicative of another

character to the room. Certainly Andres Bosshard thinks so, and as a composer he's better placed than I to assess its virtues.

"We are looking at wind and the horns high up the balconies where the sound is dry. The strings are lower down where it's foggy and damp." These ecological metaphors punctuate Bosshard's speech, but it's a useful lingua franca for conveying the abstract of such an environment. He also likes to turn things on their head. "What we create in these halls is a kind of super studio environment, reverb at one end, dry at the other. Sometimes you have to look at the room, the reverb behind the orchestra and ask, who's it for? That's why I'm putting the orchestra into the audience."

This, it has to be said, only by virtue of the surround system, apart from a harmonium and a violin solo, the opening concert he has written features no other live instruments. But despite his obtuse argument about who should be at what end, Bosshard had warmed to this hall as soon as its sound character emerged from its dusty infancy. "This room, for example, is very quiet - 17dB and it's pretty constant. This is only the second time I've encountered such a sound."

Wait for it, especially Chris Beale at SSE (you're going to love this), but audio engineers and even set designers of Mark Fisher's ilk might care to ponder Bosshard's next observation. "The first time was at a hydroelectric dam here in Switzerland. It was perhaps 100m high, a perfect parabolic reflector. I hung three speakers, nothing special, just 3 x 40W of power. We had effects travelling for 10 kilometres. This was a turning point for me; since then I've only used reflected sound." Which, if you take what Russell Johnson does to its logical conclusion, is his pre-occupation also. "I don't believe in the direct sound from a speaker, or from the stage indirect is what the ear expects to hear."

Now this is a fairly strident assertion, and later he does admit to me that direct sound is important for emphasis, but he has his reasons for taking this stance, though they're not easy to qualify. "You can make a recording of a train passing by. Play it back through a multiple speaker system in a theatre and with the right delays you can recreate the same effect. But

what I do is record using a series of microphones down the track, then play it back using speakers positioned in the same relative positions as the microphones. You get the same spatial effect and whatever your location your ear interprets the sound as a train passing. That's a factor of indirect sound."

I don't know how true that is for a theatre surround-style system. Do defined effects like the passing of a train sound the same backstage as they do where they've been carefully planned to do so out in the audience? But that's another argument; Bosshard's hypothesis at this point depends upon open air, but we're in a concert hall and yet he believes it's possible to hear the same result.

It's in the detail of the interior building fabric that this becomes possible. The Johnson walltiles themselves come in a multiplicity of designs, each shaped to modulate reflections of different frequencies. Even the handrails on the balconies have been thought about, they are in profile shaped like an aeroplane wing, and then angled to encourage the right reflection. Above the stage, Johnson has had installed a substantial variable deflection panel. Fractured and layered in appearance, it has two broken but concentric rings of acrylic to further capture and model specific frequencies. The acoustic is, to characterise it, stress-free, an assessment made possible by listening to the opening section of Bosshard's composition for the opening event - birdsong recorded from multiple sources relayed out through the surround system. What the listener hears is many different noises from many sources, at some considerable level, in a very natural way. Russell Johnson has created a room that gives all sounds the space to be heard and understood, in their proper context.

#### **TECHNICAL**

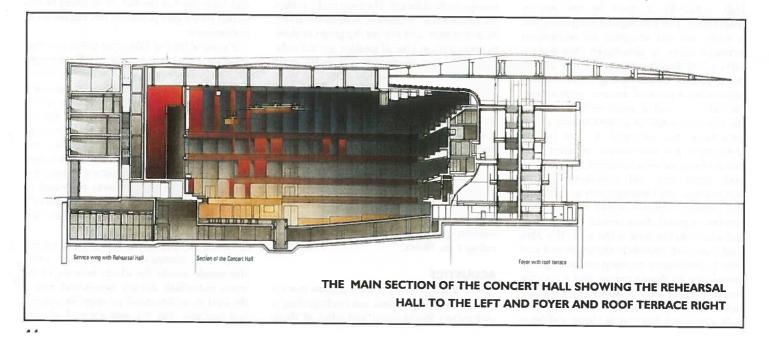
Andreas Brennwald of Bild & Ton (B&T) is a pivotal figure in the installation of KKC's audio and visual systems. A relatively small company, just 12 individuals including the boss, they beat off rival proposals from some big hitters: "I think there is a real desire to use Swiss expertise wherever possible," said Brennwald, talking of the City Council's close supervision of what is their baby. It's an observation backed

by Daniel Meyer of Studio M&M who installed the PA system. "The wish to use Swiss expertise holds good throughout." There's National pride to consider here - though it must be said Meyer was extremely complimentary about the level of expertise and talent he finds in the UK - in spite of which, there's no doubting the ability of those chosen. Switzerland may only be populated by six million people, but talent at Bosshard's' level, or Brennwald for that matter, is not in short supply.

The AV system is much as you might expect for a state-of-the-art concert hall: a Stage Tech Nexus software platform is used for matrix routing on the audio side and, in this instance, the system is split in two between stage and director's box. Brennwald has devised a functional configuration for the system that reflects the hall's primary purpose. The PA specification features a system from d&b audiotechnik. "I called d&b," explained Daniel Meyer, "and they simulated the hall, and came up with a planned system using F2. A natural choice as it's a widely liked system in opera and concert halls in Germany, and I've used it here in Switzerland myself many times. But then Andreas [Brennwald] decided to go for the 402. I felt that the F2 was the more suitable for classical music." It's a conclusion anyone might fall to; there's no doubt which of the two systems was tailored for what purpose, but Brennwald's decision is quite deliberate.

Truth is, the acoustics of the hall are so malleable that any resort to sound reinforcement for classical music performance could only come about through laziness and a failure to use the hall's natural facility. So it is that each side of stage has a cluster two wide, four deep and alternate rows of tops and subs. In the middle, hung from the huge reflector that hovers above stage, is a central cluster - a 602, 902 and a pair of E3s each side with another E3 behind facing the choir stalls. Other than that there are E3s, 902s and a few Max wedges stored backstage for monitoring and near fills when the occasion demands. Brennwald has a pair of BSS Omnidrives in the control booth to EQ the system, and the Nexus subordinates d&b's propriety ROPE System Management package.

The video side brings attention to the



Crestron system, a software platform that allows the user to define all the interfaces and control parameters they desire: "Oh yes, I have written 14,000 lines of code for this installation," Brennwald stated casually. His ability is not to be doubted. This young man (I'd guess he's not yet 30) not only wrote the instruction programme for the Crestron, he designed the whole AV front end, drafted the system cabling diagram for the building, drew up the work/installation schedule, planned out the full budget and costing programme and found time to oversee the entire project.

"You can use the Crestron system to control everything, except the air conditioning." Only - he admitted ruefully - because they didn't want him to, not because the system couldn't. "We have three touch-screen panels for use by visiting speakers, vision staff or whoever. I have built up different screens for different uses, working on the principle of always keeping it as simple as possible." For more complex presentations there's virtually no limit to what parts of the system operators can access. Multiple audio devices, projectors, and video machines, as well as levels and lighting. "It's our own design for control of Dia' projectors, a four wire system, power, earth and two lines for data, that allows control of two projectors. At the time of my visit a Barco 9200 was in place, though this is not likely to stay, Brennwald rightly construing that there's little point trying to keep up with advances in projection equipment, better to just have the control facility and either rent in or allow visitors to bring their own. There is a massive 12m by 6m high gain screen at the back of the main stage. So big that it had to be lowered into the shell

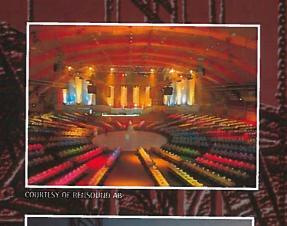


of the building before the roof was put on, it sat there cocooned in plastic for several months before it was finally winched into place. The screen is motorised to roll out from its housing, the housing apparatus itself also being winchmounted so that it can be raised up beyond the main deflector above the stage and out of sight.

Brennwald has already installed comparable wiring networks to the two adjacent, smaller halls still under construction but due for completion next year. He fully expects these to offer the same level of control although this is not yet confirmed. I'd be very surprised if the two halls don't match the exacting quality of everything found in the main hall.

The KKC has not been realised without controversy; stories of financial impecunity are legion, but my favourite shows just how great men can marshall their achievements with a little compromise and humility. The KKC's newly contracted resident conductor saw the dark blue painted interior of the concert hall, something flagged by Nouvel several years ago when the hall was just a collection of drawings, and commented. "I'm not performing on that. Too dark. White, I need white." And so it was that several days later, and 100,000 Swiss Francs lighter, he returned along with Jean Nouvel who reportedly said, "Yes I see what you mean."





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### No Comment

s promised in the September, pre-PLASA Show issue, L+SI editor Ruth Rossington, myself and PLASA managing director Mathew Griffiths, duly met Jere (Jerry) Harris and Steve Terry to hear their side of the Production Resource Group story, during the exhibition. As you would expect, Harris put up a stout and forthright defence of his motivations for turning Production Resource Group into the acquisition-hungry corporation that it has become in recent years. In the course of this candid explanation, Harris was entirely dismissive of the role played, or any future role that might be played, by the 'suits'. Indeed, some colourful language was used to emphasise his distaste for the banking and financial fraternity.

ertainly, Jere Harris has a story to tell. So, in order to bring some balance into the discussion, which seems only fair, and to give Jere Harris the opportunity to set out his stall and to answer the criticisms I and others have levelled at him and his policy, L+SI will publish a 'Jere Harris Talks Back' featured interview in the November issue of the magazine. Then, readers can judge for themselves. The actual interview, with me asking the questions, will take place this month and the edition will be published to coincide with LDI'98 in Phoenix. Order your copy now while stocks last!

ast month's piece in No Comment about the current fashion for bars, and the threat they pose to our existing discotheque industry, must have been a bit of inspired inspiration - just call me Mystic Fred! No sooner had that issue hit the mean streets, than along came a serious piece of research from Mintel to support my assertion. Pointing out that both the number of clubs and the number of clubbers has dropped quite substantially in the last two years (clubs by 11%, clubbers by nearly three million), Mintel is warning of further attrition to come. Their leisure analyst, Chris Butcher says: "When people have the choice of staying at a late licensed bar which does not charge admission, or moving on to a nightclub which does, you can see why operators will find themselves facing stiff competition." Makes sense to me.

t is perverse, is it not, that just at the point when the pundits are promising hard times for disco, that Hollywood should be embarking on a nostalgia trip. I refer of course to the concurrently arriving films - 'The Last Days Of Disco' and '54 -The Movie'. For those of you who weren't there at the time, here is a brief resumé . . .

Sometime in the late seventies disco, which had existed in Europe since the war in numerous subterranean guises, managed to export itself to the United States and was,

specifically, taken up by the pink market [is this PC?] in the major cities, especially New York. The fact was that, typically, they not only did it better but created a genre all of their own. In fact, I am sure that they belived that they had invented disco and not just reinvented it.

t wasn't long before the DJs started remixing old soul records, and the record industry saw what was happening on the dancefloors and they started taking an interest too. When Billboard Magazine saw what was happening, their chart editor started tracking the music on a weekly basis. Suddenly, as can only happen in the USA, disco was mainstream, it was hip and it was high fashion. You could dress disco, paint your face disco, drink disco, eat disco, watch disco, star disco, whistle, sing and buy disco tracks.

hen came Saturday Night Fever, with that appalling white suit and very tacky underlit dancefloor, some even worse movies staring the Bee Gees, and eventually the opening of the famous and infamous Studio 54 in Manhattan - without doubt the unsurpassed zenith of disco, 'without the polyester', as founder Steve Rubel was prone to tell us.

hen, at the beginning of the eighties, that same chart editor, short of something to say on a breakfast television interview in LA, told the world, in this case the American public, that 'Disco is Dead'. And they believed him. The bubble had burst and it was all over, bar the final bust at 54 which came later. So, despite the fact that disco never died on these islands, or in the rest of the world for that matter, here we have Hollywood wallowing up to their knees in nostalgia for the days before the music died at their own hand. The king is dead, long live the king.

et's hope that a good dollop of nostalgia gives disco in Britain the intravenous injection it may need to shake off the present threat of what is beginning to look like a more and more uncertain future.

t is pleasing to know that, while other sectors of the industry may be in the doldrums, the party or 'industrial' business is alive and kicking and on the resurgent. Mind you, this deduction is based on a survey of one, so it's not very scientific! Never mind, it makes a good intro to the anecdotal story that follows. So here it is.

s a result of my involvement with the RazorHead searchlight project, I was present as an observer at the launch of Sky Digital at Battersea Power Station. Take it from me, no expense was spared to entertain the 3,000-odd guests and assembled VIPs (you can get the full story in the next issue of L+SI), at the so-called 'Party of the Century' organised by Freud Communications.

n the product front, The Spot Co emptied their warehouse of every conceivable moving fixture, Capital Sound installed a Martin Audio rig, Unitek one of their Megascreens and freelance production manager Mark Ward commandeered a couple of RazorHeads for the 'sky' effects (no pun intended). Anyway, there was a set-piece finish planned to close the presentation, which was televised, at which Rupert Murdoch and the great and the good exited the hall in stately procession amid a blaze of lights, by way of a footbridge.

The 'blaze of lights' was to be provided by the two RazorHeads 'following' this progression, which was all fine and dandy, but clearly unrehearsed with live camera. The tracking was spot-on, though I say so myself, but there followed one of those exquisite moments - when camera met 7ks, and Murdoch et al were instantly evaporated in the bleach-out - something which others have been trying to achieve for years, or so I'm given to believe.

y colleague at the next column, John Watt, would have had apoplexy. Or perhaps not, depending on his position regarding the demonisation of the great tycoon.



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## **SKY POWER II**

Houston's Sky Power II was a 20-minute show on an unprecedented scale, and is seen as a blueprint for the millennium. L+SI looks at what it took to bring the show to life



Above and below: two spectacular views of the Houston skyline during last month's Sky Power II show.

Pictures: Angel Art.

Imagine a project: an exterior setting, involving lighting, lasers and pyro, with a large live audience. It's been done before a thousand times? Piece of cake. OK. But let's elaborate a bit: 'exterior setting' means 144 downtown blocks of a major US city, spanning three miles; 'lighting' means over two million watts, including 1,600 individual fixtures, ranging in size from 1000W to 16kW; 'lasers' means the largest concentration of laser light ever used at a single event - 460W of optical power, and 'pyro' (you probably won't be surprised to learn) means 25,000lbs (12.5 tonnes) of explosives, with 20 pyrotechnicians operating, and no less than 50 firemen keeping a jaundiced eye on the proceedings. Oh, and the audience? Three million - on site.

Far from your average son et lumière then, we are in fact talking about what is in all likelihood the largest show ever staged. And where could such an event take place? Would you believe it was Texas? Would you believe it was anywhere else? Well, it was in Houston, to be exact - the show 'Sky Power II', which took place on September 12th, being part of the city's celebration, 'Houston Industries Power of Houston 98'.

The set-up period for the event was spread



over three weeks and took in over 70 physical sites, ranging from ground level to the tops of skyscrapers. In fact, so much equipment was installed on the very lofty rooftops of Houston that 170 helicopter lifts were required to get it all in place - you can imagine the budget

whirring skywards alongside them. All the sites were computer-controlled and linked by 15 miles of control lines to enable the split-second timing required, with one central voice and data comms HQ was responsible for the control of the entire 20-minute show.



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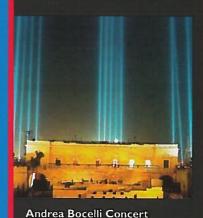
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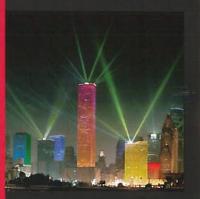
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More facts: the creative design team consisted of 10 leading designers and engineers from across the United States, each with between 20 and 30 years' experience in the production and entertainment industries. For the period of operation, 70 highly skilled technicians were on the team; these were joined by a further 80 support crew for setup and strike. The working hours spent on design and planning number around 5,000, while the actual set-up and staging of the event required a mere 20,000 additional hours. At the show's peak, the combined equipment in use was drawing 22,000 amps at 120V - equivalent to the requirement of 500 typical households.

Co-ordinating the technical production for event producers JW Productions, was LD Systems, a Houston-based company, who were also responsible for lighting the event. Their previous large-scale architectural work has included lighting the ancient ruins of Chichen Itza in Mexico, and the Houston Economic Summit. The many powerful searchlights were an integral part of the show, and these were supplied by Syncrolite of Dallas and Skywatcher of Conroe. Almost 100 searchlight fixtures were supplied by Syncrolite for the event, including SS7K and ST7K units, as well

as a number of their brand new automated DMX-controlled SX3K units (3000W Xenon) - the first time these versatile yoke-mounted units have been used.

"... representatives from Atlanta, Chicago and Toronto were witness to the event, as a possible blueprint for their own spectacular events to mark the turn of the Millennium."

The laser systems were supplied by Laser Media of Los Angeles, and included 14 highpower lasers. Laser Media's portfolio includes the Hong Kong handover ceremony in 1997 the film Batman and Robin and the New Year's celebrations in Times Square. The pyrotechnic elements were put together by Performance Pyrotechnics Associates of St Louis - an awardwinning company whose previous projects have included The Rolling Stones' Bridges to Babylon tour, the North American tour of Lord of the Dance, the Atlanta Olympics and the occasional Superbowl.

With such a well-seasoned line-up of expertise behind it, it's perhaps no surprise that Sky Power II went off in such spectacular fashion and without a hitch. Interestingly, on

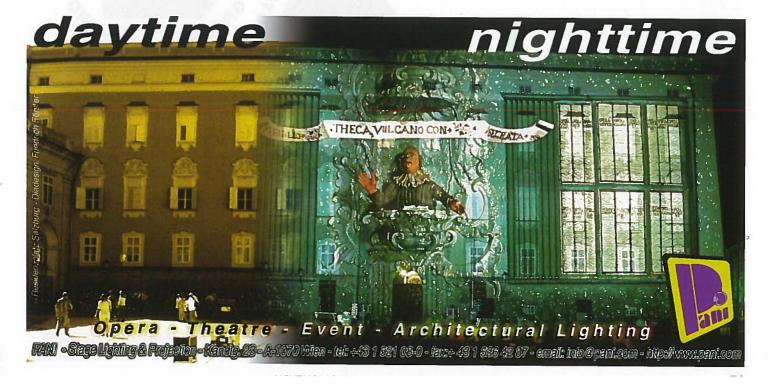
the same night as the show was staged, the Themed Entertainment Association were honouring its predecessor, Sky Power (which took place last year, but is knocked into a cocked hat, so to speak, by this one) with their Award for Most Outstanding Spectacle at their annual awards banquet.

What is also interesting, is the fact that representatives from Atlanta, Chicago and Toronto were witness to the event, as a possible blueprint for their own spectacular events to mark the turn of the Millennium.

As Kevin McCarthy of Laser Media commented: "They did not leave disappointed."

With major cities all over the world looking to celebrate the new Millennium in perhaps just such a memorable way, this could indeed be seen as a benchmark. As Syncrolite's Jack Calmes told L+SI: "This is the Millennium preview, and it sets the standard for 'big'."

It will be interesting to see how the wider world reacts to the Texas 'standard for big', as the preparations continue for a hundred thousand other Millennium celebrations.





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tap me, gentle readers, I think I've seen a miracle. Trawling gamely through the ton of Saturday newspapers for reviews to stick in Theatre Record, as is my wont, I come across these words from Michael Billington, no less: 'Watching this production [Bill Alexander's Birmingham Rep Hamlet, lit by Tim Mitchell] and the recent Phèdre, it struck me that lighting in the British theatre has never been better.' I nearly fell out of bed.

ow I haven't seen Tim's work on the Hamlet, but I know from his super RSC touring Romeo and Juliet and the recent New Directions season at Hampstead, not to mention hearsay reports of his steady work at Brum Rep, that Tim is a coming man, someone with some very special ideas on what to do with light. I know, too, that Mark Henderson is the lighting man's lighting man, and usually one of my favourites too. I also know that the national reviewers seldom notice who's done the lighting for any show, except as someone sourly noted at a recent SBTD/Directors' Guild panel on the critics' attitude to design - when it's bad. So this is terrific news: Critic Notices Lighting; no, better still, Leading Critic Notices Lighting; no, best of all, Leading Critic Notices Lighting And Says it's Never Been Better.

wish I were happier with Michael's second example, though. Looking down the list of Mr Henderson's London stage achievements this year I don't see much to smile about. Yes, the atmospheric time-travel from dawn to dusk across Bob Crowley's Hopper-tunity Saloon in the Almeida's magnificent Iceman is as good as anything he's done. Yes, Copenhagen scores highly because the lighting states are so deliciously invisible. But there are serious blemishes elsewhere. Anyone who didn't spend the whole of Naked looking at Juliet Binoche (me, f looked at the wallpaper, and wondered idly why it was moving) will not have been all that thrilled with the show's uninteresting lighting. Anyone who could tear themselves away from the moments of titillating nudity that opened each act of The Judas Kiss (easy enough, apart from that, to tear yourself away from Liam Neeson's big, wellintentioned extraordinarily and performance) will not have been too happy at a sun that rose and set in the same direction and some rather tawdry recycling of known Henderson trademarks. Worst of all, Phèdre. 1 wasn't surprised to come out of Jonathan Kent's production seething at another speeded-up Almeida classic, but I was shocked to come out reeling at how bumptiously over-lit it was. What impressed Michael scared the hell out of

f course, I don't know how much of my horror is at Mark's work and how much is caused by Jonathan Kent's



Hamlet at the Birmingham Rep - "lighting in the British theatre has never been better."

misuse of it. The lighting states are fine, but the logic behind them is very questionable. We are plunged into and out of darkness at a (stage or lighting?) director's whim; standard - and, of course, highly visible - Henderson shafts pour through the long windows of Maria Bjornson's fine monumental corridor of a set (a natural for a Henderson shafting if ever there was one); significant elements of that set get their specials, which come on when the director wants us to see them but with no other reasoning behind the sudden cue for a pinspot; actors find themselves opportunely in steaming great pools of light for their big speeches. Yes, but why? What's happening to the weather in this event-filled, but strictly time-sensitive classic? Sure, Racine's Phèdre was descended from the Sun god, but she's getting rather more than ancestral help here. If big flashy lighting is good lighting, OK, but this set-up, like so many elements of Kent's production, seemed to be drawing attention to itself rather than serving the text of a play which is difficult enough without all these blinking distractions.

nd of moan. Apart from that, I would agree with the guru of The Guardian that this is a pretty good time for lighting design in this country, though perhaps for different reasons. Not because of the hyperactive plotting I've been going on about, but because of several other positive factors: our resident expats, Messrs Hersey and Fisher, have each had a sensational show at the Olivier this year in Flight and Oklahoma!; Hugh Vanstone has superbly lit large and small spaces with Dolittle and The Unexpected Man, and now The Blue Room; Paule Constable has added the Katie Mitchell Vanya and the Tim Supple Twelfth Night to her Young Vic portfolio; Simon Corder has done for London

Cuckolds what he did for Enfants du Paradis but this time got praised for it; Nick Richings has lit the most varied range of shows you could dream of and served them all well; Nigel Edwards (Cleansed), Mark McCullough (Whistle Down the Wind) Paul Pyant (Richard III) and Johanna Town (Our Country's Good) have all lit memorable shows, one or two of them more memorable for the lighting than anything else. Old hands Robert Bryan and Chris Ellis have done the cleverest things in the Bridewell. Not a bad year so far at all, and I'm sure you lot out there would like to add some nominations; do, please, and I'll pass them on to the Olivier panel, who can take them or leave them. Unfortunately, the Critics' Circle, whose collective arm I can shake if not twist, doesn't have an LD of the year award, but that's another story.

ust in case all this seems to be too much flagwaving, let me add that some of the most fascinating lighting I've seen in London this year has been by overseas designers, especially thanks to the Barbican's groundbreaking BITE season, which is just coming to an end. Not so much Andreas Fuchs, Robert Wilson's board collaborator in his rather predictable Monsters of Grace, but certainly Tamotsu Harada for the surprisingly traditional, utterly thrilling Ninagawa Hamlet, James Ingalls for Peter Sellars' Peony Pavilion and the astonishing Japanese collective Dumb Type for [or] - honestly, that's what it's called. Their lighting, and indeed their sound, was enough to blow you out of your seat at times, but (rather differently from Phèdre) it clearly served their weird, but very exciting, purpose.

lan Herbert is the editor and nublisher of the

(CHINA, NATURALLY.)

In 1998 PLASA Presents Light & Sound Shanghai established itself as the professional exhibition for lighting, sound and display technology for the entertainment industry in China, with 4,895 buyers coming to the event.

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## PLASA AT 21

The definitive round-up of PLASA 98 as witnessed by Tony Gottelier, Rob Halliday, Steve Moles, Ross Brown and the full L+SI in-house editorial team

This year the PLASA Show finally made it to maturity, at least by Western cultural milestones, and achieved a level of professionalism commensurate with its new status. Yes, this was a very grown-up Show for an industry which has long since grown out of short trousers. Consequently, as an Association, PLASA could celebrate the event in the self-satisfaction of the certain knowledge that their exhibition has become the premier European showcase for entertainment technology and a first amongst equals globally.

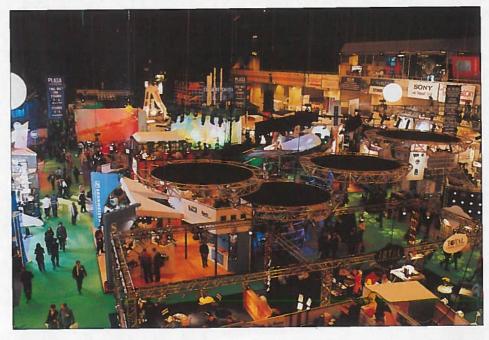
Nearly 14,000 visitors, of which 3,000 were international, more than 1,000 up on last year's total, is a significant achievement in anybody's book, and the exhibitors must continue to be delighted with their exposure. Many improvements had been made over previous years to cheer exhibitors and visitors alike, your reporters particularly noted the improvements in the franchised catering services, which have resulted in a wider choice and generally higher standard of food, plus significant improvements in signage, which made the awkward geometry of the hall much easier to cope with.

There had to be a party to mark the occasion and P&O Events, the show organisers, laid on a glittering black-tie affair for exhibitors and guests in the Central Hall of the Natural History Museum. Central Hall was the original site of the Museum's great collection of dinosaur skeletons and still with the odd Brontosaurus hanging overhead, it has in recent years assumed a new role as a banqueting space. Some of the guests who have been around since the genesis of our industry may have felt a common bond with this Jurassic specimen but if so, they kept it to themselves. Nevertheless, several were rewarded during the evening for their staying power, having been consistent exhibitors since the prehistoric BADEM period.

As usual there were numerous after-hours and associated parties; those that came back with the best reports from our intrepid sampling group of party animals (motto 'we never sleep') were: ETC's at the Theatre Museum; Jerry Gilbert and Paul McCallum's joint birthday party at the 100 Club; Martin Professional's at Strawberry Moon's; Lumenation's at The Voodoo Lounge; and, of course, L+SI's own bash for advertisers and friends at The Canteen in Chelsea Harbour. All of which offer plenty more reasons to visit London during PLASA week.

Exhibitors are given the prior opportunity to submit one or more of their own new products that are going to be on show to a judging panel for consideration for the prestigious PLASA Product Excellence Awards. The intention of these awards is to celebrate those products that the committee feel, in their judgement, will make a significant overall impact on the two major sectors of our industry in the coming years, without denigrating the numerous innovations of individual exhibitors, each of which may be impressive for any number of other reasons. Obviously, everyone thinks that their new product is the bees-knees, so the panel has an unenviable task in reaching its decisions.

This year, of the 470 new products, 72 were



nominated by their progenitors. The panel selected, in Lighting: The Focus Finder by Avolites, as a major breakthrough in easing the agonising problem of programming and reprogramming moving lights, especially in touring situations. Doubtless many other board manufacturers will want to emulate this one. The Solution Sine from Bytecraft of Australia, as the first PWM low noise dimmer pack that 'looks like it could actually happen'. As the name suggests, because this novel dimmer's inputs and outputs are in the Sine Wave form, it offers significant reductions in harmonic pollution. Bytecraft are sensibly seeking licensees for the technology outside their native Australia, so we could see sine wave dimming under a number of brands in the years to come.

In Sound: The judges were impressed by Wharfedale's LoudPanel, because the ceiling speaker is ubiquitous in modern life, and although speakers-in-ceiling-tiles are nothing new, speakers which are ceiling tiles certainly are. By using the reinforced back of the tile as a resonator, rather than the push-me, pull-you of the conventional ceiling cone, Wharfedale have come up with an industrialised product with the potential to revolutionise our everyday lives. Also, they sound surprisingly good, and cost very little. Although the technology employed is licensed from New Transducers Ltd, it was felt that as the company that had brought the first commercial product to the marketplace, Wharfedale thoroughly deserved the accolade. Soundcraft's Spirit 42 input, 8 bus digital sound console really took the panel's collective breath away, and bearing in mind that some of the members came from the lighting discipline that was quite an achievement. For creating a console-based control surface which truly bridges the gap between analogue and digital mixers, retaining all the hands-on appeal of the steam-driven system while adding the best of the new, such as instant recall, moving fader automation and onboard Lexicon effects, this one

was irresistible as an award winner. The lighting guys were left asking, can we have one for lights? All were impressed that a second mortgage was by no means a prerequisite to bagging a Spirit.

Commendations were awarded to ETC for the Source 4 Zoom, Le Mark for their Slipway cable covering tape, PJ Lighting for their Multi Truss adapter, DNH Worldwide for the Aqua 30 underwater speaker and PCM for the CM Prostar compact chain-hoist. Meanwhile, Best Stand was won by Lighting Technology for their 'Day at the Seaside' and, although winning this award is becoming a bit of a habit for the Acton-based company, it has to be said that they do put a huge effort into it. The runner-up was Pioneer. Best Small Stand was given to Indu-Electric Gerber, the German manufacturer of heavy duty connection boxes for the entertainment industry, and Best Use of Space went to Rosco, all of which emphasised the cosmopolitan nature of the Show. Mind you, had you asked the LDs, adjacent exhibitors and assembled journos, Bandit Lites would have won all these awards by a long yard of stout. Their dispensary of Ireland's finest export proved to be a most effective lubricant for many a weary pair of tonsils, as was duly noted by your reporters!

As usual there was a full programme of accompanying seminars covering a wide range of topics - from the audio side there were sessions on LANs, voice evacuation, public address, the Pop Code and system adjustment. From the AV sector, the eponymous magazine-sponsored sessions on both indoor and outdoor screen applications. When it came to lighting, the ALD stimulated a debate about theatrical lighting applications in architecture, while other subjects included remote source lighting and finally David Staples of Theatre Projects Consultants gave his presentation on trends in new theatre and arts structures which was sponsored by L+SI. (More detailed coverage of the seminars will appear in the next issue of L+SI).





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Colin Whittaker and Keith Dale of Celco.

#### LIGHTING, AV, EFFECTS ET AL

On the Show floor, Ampro Lightwave video projectors were blazing away on the TDS stand, the latest model generating an astounding 12,000 lumens. So, for Ampro, 4,000 ANSI lumens output is everyday stuff and they had the projectors to prove the point. TDS themselves are a one-stop shop for video projection from home cinema to stadium applications. Barco, whose video projection systems have become a touring industry standard, were demonstrating their Reality 9200 high resolution LCD projectors with three lamp settings from a maximum of 1800W, through 1500 and down to 1200W for silent operation, and thus commensurately 5,000, 4,000 and 3,000 ANSI lumens output. The high light output is due in part to the triple LCD panel architecture that the Reality 9200 utilises having a higher than usual aperture ratio. Barco also has a LCD light-valve video projector, called the BarcoVision 9200, which delivers 5,000 ANSI lumens as standard, and this is the technology which has the real potential for even higher brightness in future models embodying ever bigger lamps. Barco's big competitors Digital Projection, the millennium successor to the old Rank AV company, had a minimal presence on the Dataton stand, which just shows that companies associated with the new TI DLP projection technology are not taking this side of the entertainment technology industry too seriously, which is a shame because Digital, in particular, have some extraordinary products.

Sharing expenses on someone else's stand we were pleased to find old friends Cameleon who have emerged revitalised from a period of introspection following personal tragedy. Jean-Yves Moran showed us the Teleprojector 6, compact 6kW HMI scenery projector and son of the unit which famously graced Pink Floyd's Division Bell tour. This latest version sports a revolving, double film scroller capable of projecting overlapping 75mm square images plus remote focus, remote horizontal and vertical framing, and CMY colour mixing. Cameleon continue with their range of Telescan moving mirror lights alongside, now up to Mk V with the 2.5kW HMI unit.

Keith Dale at Celco told us that the Fusion rackmount dimmer, launched in the spring, has



High End's Mike Wood, Robert Mokry and Bob Schacherl.



Carlo Galeazzi (left) and Bruno Dedoro (second right) with George Bailey, Chris Rolph and Ian Brown of Coe-tech.

proved to be their most successful new product in recent years with first orders recorded to Gearhouse XTC in Sweden, EW Sound and Light for Estonian Television, plus multiple units going to Stage Electrics, L'Eclairage and Essential Lighting in the UK. By bolting a brand new front-end featuring soft filtering onto their proven Fusion dimming engine, Celco have produced a compact and economical DMX dimmer which will handle all sorts of tricky loads. Meanwhile, their Ventura desk continues to attract attention from Celco fans around the world.

Clay Paky announced that they are now delivering their range of moving yoke products, first trailed at last year's LDI, and then launched at SIB in the spring. In fact, CP have cleverly identified the gaps left by both High End and Martin's moving yoke units, and designed their heads to plug the holes. The range consists of three Stage Color washlights, one of which is a 1k Halogen, two 1200W discharge interchangeable wash-to-profiles and two smaller 300W dedicated wash and profile units. Some of the special features are four-colour mixing in the washlights, and zoom optics in the 1.2k profile. Enrico Caironi, CP's cheerful marketing manager, told L+SI that following the successful introduction of the products at SIB earlier this year, their main problem had been to fulfil the backlog of orders they had received while implementing the new

Their national competitor Coemar, represented by their local distributor Coe-tech, presented their Ferrari-style, Formula One stable of lightweight carbon fibre moving heads in 1200W discharge wash and profile versions, the latter with 5 to 40° zoom, plus a new Halogen version for those warmer applications. The NAT TM 1200 Power and NAT TM 4000 were also shown at PLASA for the first time. The 4kW was accompanied by a splendid video of 16 of them bathing in the full glory of their global beam excursions at the opening ceremony of the Stade de France prior to this year's soccer World Cup. Finally, the Pilot 1200MSR short arc followspot also made its debut

FAL, whose public face is the ever popular Ivano Burato, reinforced the products launched at SIB earlier this year with production-ready versions of their Proscan and Opera products.



Marcello Bertini (left) of La Novalight with Richard Garrett of RAG Leisure (centre) and Gareth Balderstone of Fly.



The Pulsar/Clay Paky team.

Also in evidence was the Paul Dodd-conceived Lightmaster lighting control panel. FLY, on the other hand, seemed to be shifting their product emphasis towards the dance market and their big new products are the Sun 575D and 1200D scanners. These products were shown on the RAG stand alongside the La Novalight range for which RAG are also the distributors. While in Little Italy, Griven's new products were being talked through on the Multiform Technology stand, while their new architectural product, the Kolorado, an 1800W colour changing exterior floodlight, was being demonstrated in the architectural lighting display on the second floor. Of course, the industry in Italy is incestuous and highly competitive, so it was inevitable that Studio Due, whose City Color was launched at Rimini earlier in the year, wouldn't be able to keep this idea to themselves - even though they claimed to have a patent - and this is bound to be just the first of a 'flood' of lookalikes that will surely follow.

Another of the major Italian lighting companies, SGM, was also in evidence at the show. They were showing their Giotto moving head, which has been upgraded to include more control options since its launch in Rimini earlier this year. New from SGM is the Powerlight 612 dimmer rack, a versatile 2U rackspace unit giving 12 amps per channel, available with either Socapex or terminal block connections. Also on stand, the Studio 12 and 24 control desks for conventional lighting, and the 12 and 24 Scan Control versions for the company's moving lights.

High End Systems were relieved to be able to announce that deliveries of their Studio Spot had commenced in the summer and were proudly showing the production model with Lightfactor Sales, their UK partners. While Stu' spot has all the automated mechanical advantages of its half brother, Studio Color, this hard-edged spot adds rotating gobos and effects to the attributes, and the boys from Texas are particularly proud of the quality of the interchangeable focusing lenses which are described as 'high-definition'. 13°, 18° and 30° lenses are available, the standard being 18°, all feature advanced aberration correction, to overcome chromatic shifts, image distortion and spherical astigmatism. The result is a gorgeously flat field which will certainly be appreciated in the upper echelons of the market. Meanwhile,



The Griven lighting display on the Multiform Technology stand.



Per Lundgaard and Poul Dalsgaard of Martin Professional, Denmark.

Lightfactor have added another notch to their bow by taking on LDR, the Italian stage lantern manufacturers who offer a wide range of fresnels, PC Spots and floods.

If you've ever wondered where to get those loony, towering, air-driven figures known as Fly-Guys for shows and demos, look no further than Laser Entertainment who are based in Milan. LE are the European and Middle East distributors for the American, West Coast manufacturers, Air Dimensional Design.

If Graham Barron of Lumenation was fazed by the aforementioned exterior colour-changing flood, he certainly wasn't showing it. He was really buzzing with his combined product line of Lumenyte side-emitting fibre and now the full range of Studio Due luminaires. While it was the novel chromatic floodlight called City Color which re-focused our attention on Studio Due at SIB this year, we have often pointed out that they make an extensive range of toys which belie their cost and physical size. Perhaps that's why their little 150W discharge automated yoke luminaires are called Giant.



Ivor Green of CTS (left) with Rajkumar Mitra of Nirmal International, India and SGM's Franco Zaghini (second left) and Ermanno Tontini (right).

Judging by the vastness of their stand and, in particular, the weight of their literature package (which had to be over 2kg), the post-Peter Johansen Martin Professional has still got lots to shout about. The Mac 250, the baby of the range, which now represents an astounding 55% of the Group's sales, using the MSD/2 lamp, made its debut. It has a number of special features which include motorised focus, high speed rotating prism/or variable frost, gobo 'shake' and various on-board macros in software, on top of all the usual bells and whistles you would expect in such an automated yoke luminaire. Lighting Director, Martin's radio-mic based 3D tracking system, has also spawned a 'son of'.

While MLD continues for top-end and touring applications, SoloSpot is the simplified version for fixed and small stage installations, the simplified single button press operation (after setting up by a provider) enables up to four individuals to be tracked by up to four automated lights. ProScenium DMX is the Danish company's latest



Richard Willis and Julie Garton of Bandit Lites.

'soft' control package, which comes on CD-ROM for 120mHz desk or laptop PCs and has the potential to be as much of a show controller as a lighting tool. On the disco front, the Martin Light Jockey DMX is a soft version of their 3032 controller with a Windows front-end, but dedicated to their own products. The unique feature is the incorporation of a CD time-code input (Denon), which allows programming of repeatable lightshows synchronised perfectly to the selected track. MP also announced the SynchroZap, a new beam generator, and the Roboscan Pro 918, a compact 575MSR scanner which replaces the Roboscan 1220.

**Pulsar** who, of course, are both Clay Paky's distributors and their electronics providers, have found time within their busy development schedule to bring significant new innovations to their Masterpiece controllers. A prototype of the Masterpiece 216 was shown at PLASA which will offer 216 channels of control patchable to 512 channels of DMX outputs, eight shows can be stored in memory and memory cards will be offered for up to eight additional shows. In parallel

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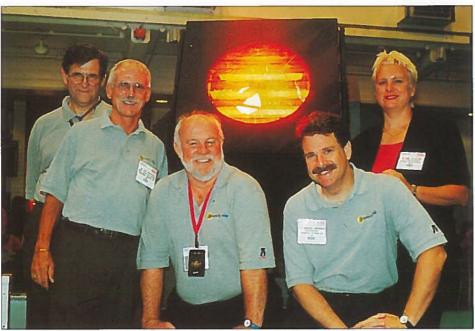
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Xenotech-Strong's team, left to right: Jack Schmidt, Jack Johnston, Richard Hart, Michael Friedman and Mary Jo Kuehne.

with this expanded system, Pulsar plan to offer a free upgrade for the Masterpiece 108, enabling the possibility of patching the 108 available control channels to 256 DMX output channels. All of which shows a mastery of the black art of numerosity.

PLASA 98 proved to be a highly significant year in the development cycle of the VL range of automated lights produced by Vari-Lite. For the VL7 is a giant step forward, even for the company which has often been the barometer of fulfilment of the lighting designer's current dream luminaire. First spotted, if the pun may be forgiven, at LDI last year in prototype form, the VL7 has since developed into a luminaire of seismic consequence for the rigs of the millennium and beyond. It not only looks a lot sexier than it did at LDI, but its performance attributes have been significantly enhanced also. The VL7 has 8:1 zoom/focus optics, giving it a 5 to 40° fully programmable beam spread, it has an unusual method of colour mixing using two graduated and overlapping colour wheels which allow a virtually full colour spectrum from pale tints to deep hues. Rusty Brutsché believes it is this seamless crossfading colour facility which will have lighting designers across the globe beating a path to their nearest Vari-Lite offices. In addition, the VL7 offers both fixed gobos, of which there are 11, and rotating gobos, of which there are five - these can be morphed and, of course, these gobos don't get squeezed by the zoom as they do when irised down. In addition, there is a remote iris and a dimming shutter with strobe facility. Another first on a Vari-Lite fixture!

Xenotech Strong International, the big beam people from the USA, had two new items on show under their banner. First they have set up a division to market their Nocturn range of Ultraviolet effects, which encompasses both dedicated fixtures for their wavelength-tuned UV-A lamps, which have been developed to their requirements for the Nocturn project, plus a whole gamut of fluorescent scenic paints and materials. Xenotech were also demonstrating a prototype of WWG's Chromascope searchlightsized colour fader, which uses a convolving system of dichroic blades to achieve its effect. This 600mm diameter attachment, which is controlled from DMX, has been designed for use on both fixed and moving searchlights such as WWG's

RazorHead for which Xenotech hold the American rights.

More UV effects were on show from CLD Distribution (reporting their best PLASA Show ever), who have added to their regular range of lighting and sound products with a new range of UV active point of sale products aimed at the promotional markets. These include paints, inks, soft and hard plastics and cast acrylics. There are more strings to their bow: CLD also manufacture their own custom cases, racks and cabinets.

There were a number of exhibitors showing both flat and big video screens and for the purposes of easy reading we have grouped them all together. Steljes, who are a major provider of presentation products have recently been appointed sole UK distributor for the Fujitsu Plasmavision - probably the most successful flat screen monitors on the market today. It was surprising, from the makers of Jumbotron and other well known big screen products, that Sony had a stand without a sniff of a video product even as an attention-getter (their audio kit is reviewed elsewhere in this report). Screenco, another first-time visitor at the show, are well known as one of the market leaders in big screen rental, perhaps best known for their huge inventory of Sony JumboTron screens. However, they chose this year's PLASA to emphasise that they have also embraced the new LED screen systems. Screenco currently have some of these out with Janet Jackson and Rod Stewart to name but two, and hold over 155sg.m of this technology. Both InVision and Unitek Displays showed their eye-riveting bright LED screens. InVision had a new controller on show as well as two new screen types, while Unitek are continuing to promote their Megascreen.

Newcomer, the **Sports Bar Development Company**, run by old hand David Read, sported an eclectic collection of video display tools of which most are well known, but not the optical fibre fed big screen displays from Inwave Corporation of BC, Canada, which are certainly a different solution. Their latest in stackable cubes, called TELEmax 30 offers 62 x 85 pixels per cube using 5,270, 1.5mm fibre points, and using a 100W metal Halide lamp from a VGA projection source, delivers a brightness of 4,000 Nits.

Avolites chose this year's PLASA to launch a new direction in their products for the lighting





Matthew Cano, Stephen Brown and Andrew Eastwood of Ryger Electronics.

designer. To give designers more time for the creative process, and spend less on the purely functional tasks, they have produced the Focus Finder, a tool for updating lamp positional data relative to pre-set focus - as a semi-automated process. Stage Visualiser is a virtual programming software package with simple and intuitive tools for the user, complete with the extensive intelligent fixture library Avo' have built for their consoles over the past five years. Fast and easy to build rigs, and with the ability to position lamps in virtual space (rather than inputting scenic or truss elements to hang them from), plotting in new lighting designs is simplicity itself.

Sapphire 2000 is a natural inheritor to the Sapphire mantle. With fully featured graphics display, electronic focus and group select, and a built-in graphics tablet, the desk has everything for the operator: 2048 channels, 100 pages of 20 playbacks, 120 fixture library which allows full control of hundreds of different intelligent fixtures.

Constella have two new intelligent lights, in two variants. Denoted by the prefix names Ark (150W) and Astra (250W), both come in Scan and Star versions. Scan, as the name suggests, is a scanning head, Star is a rotating multi-facet drum mirror. Both have 10 dichro' colours, 19 gobos, vari-speed strobing, and many other features, all fully DMX controllable.

The Smoke Company, like several others, launched a new remote smoke and haze system aimed primarily at the install market. The Power Fog System is a central pumped reservoir that can run up to five remote heads, either smoke or haze (not both in the same system). Daisy-chained together, with dedicated first and last position heads, the system gives full control over output density, time, etc, from one central source. Also new, the Eclipse, a DMX-controllable smoke machine with 2kW stainless steel heater that can be used to provide smoke or haze output, determined by fluid types. Hydrahaze II is a discrete free-standing haze generator designed for the larger stage and club environment.

Opera 4 is an Italian design consultancy for the club, retail and theatre market. They provide design service from empty room to full furnishing, theme and decor development, plus lighting and



Mark Thompson, Kim Brant and Gordon Cooper represent SES Film & Television.

sound. With a 20-year history in their own territory, and an impressive portfolio of clients, notably Heineken, Labatts and Coors, they're a useful addition to the themed outlet market.

Smoke Design Ltd had Swefog guesting on their stand, their V-Tec Ultimate II being this Swedish company's latest product. A compressorbased haze cracker, it produces three levels of output, DMX controllable, and runs on just 1/2 a decilitre per hour on full tilt. Smoke Design themselves had several new products. The Par 64 hazer, which is again a multiple head system (up to four on one unit) that runs from a central reservoir. Fond of mounting smokers in Par lamps, Smoke Design also offer the P36 Hazer and P36 Smoker. Perhaps most interesting was the Aroma 400 and Aroma 280.

A small company, but a big lamp: Jazz's CP150 Projector comes with a scanning or fixed head and is designed as a branding tool for putting gobos and company logos onto walls, floors and ceilings in retail and similar environments.

Ultimate are a special effects company with a long history of working with artists like David Copperfield producing . . . well anything really, but specifically magic, and the machinery needed to go with it. A consultancy for anything out of the ordinary. Also on the Ultimate stand was ACE, a smoke machine manufacturer who were at PLASA for the first time. Their latest product, a smoker mounted in a Par 64, features automatic venting, giving precise stop control over smoke emissions.

Cardiff Disco, a club supplier and support service, added the Antari S100 to their stock this year. Their most popular new product however, was the Blizzard snow generator from Merlin. Water-based, the snow output is entirely biodegradable, making this the ideal mess maker.

**Lightmasters** filled their stand with **Fal** products, most noticeably the Three-Sixty miniature intelligent lamp - a 250W MSD lamp with seven colours and gobos, strobe shutter in a moving yoke head with 360° rotation and 300° tilt - and the range of Fal lamps with built-in electronic ballasts. The Proscan XLD 1200, 2.5kW and the Roulette are all available with this new ballast, although the larger instrument, the 2.5kW is a bit of a handful. The general ease of



The Owl team of Chris Frost, Sue Phelan and Philip Beck.

installation through not having to find a home for an external ballast makes this a welcome improvement for club and theatre installers like Lightmasters.

An AV supplier of some stature, **Owl** were demonstrating two powerful new video image systems aimed primarily at the commercial market user, though with some application in the leisure industry. The Thompson Plasma screen widescreen TV now joins the battle for supremacy in this burgeoning market, Owl offering it as a complete package with DVD player and complete surround-sound PA.

The big screens around the Owl stand were being filled by the remarkably bright new DLP projectors from Sèleco. Utilising the latest mirror chip technology, these projectors have a 575W lamp source and produce a remarkably bright, high definition image, even under adverse light conditions. Owl have the sole distributorship for Sèleco products in the UK and this could be the ultimate machine for the domestic home cinema market, though at £27,000 a pop it may be a while before we see one in every home.

**Penn Fabrication** launched a new outdoor canopy for the exhibition and trade fair market. Available up to 3m by 6m, the Penn Performer is free-standing and is assembled from basic two-dimensional trussing from the Penn range with special top joints to form the pitched roof. The canopy is easy to erect, two people being able to manage even the largest cover.

Ryger demonstrated the latest version of their Showlite software. Linked to your PC through their own-design control board (via internal or external serial port) this software lighting design and control tool can run up to 1200 DMX channel outputs, supports MIDI and SMPTE and is compatible with eight and 16-bit technology. The biggest feature is the Easytime screen; a resource based on an Excel-type spread sheet format, Easytime makes replication of multiple lamp operations fast and easy to manipulate.

**Lightstorm Trading**'s most obvious product was the truss range from **MEC**. A presentation type truss for use in retail and trade show markets, the MEC system uses a cast aluminium sexless end connector. The cross section of the standard box



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Laura Piattelli of Coef and Arun Kalro of RK International with the MP250.

section - 250mm by 250mm - is maintained as a building block for all other truss types, the triangular version being the diagonal dimension of the box on one side, the standard 250mm on the other two, rather than equilateral. There's also a heavy load MEC truss that uses the 330mm dimension (the diagonal of the square) as its vertical side. With custom shapes being MEC's forte this integrated dimensional aspect makes for a usable system.

SES are a well-established custom mains distribution builder who were proudly showing the variety of mains panels that will shortly be residing in the new Royal Opera House. One notable feature about this job is the development of black plug housings for standard C-form connectors. Although the identifying colour caps prevail, the plug boards are mainly to be positioned overhead, thus when plugged up and in use the connectors will be almost invisible from below, removing any visual distraction.

The Columbus McKinnon stand featured their latest product, the Pro-star. Similar in format to the standard CM hoists, this mini version is rated at 300lbs lift, and like all other CM hoists, has the usual flexible features that make it easy to vary speed or lift capacity through double reeving.

Buehnenbau Schnakenberg had two excellent new products. Both derivatives of their well-established staging system, the Nivoflex Air Stage has the kind of gas springs used for the tailgates of hatchback and estate cars, built into the scissor-type mechanism of the staging. With top deck ports to access the lock control, and with the added lift of the gas springs, these decks can be raised and lowered by anyone. The top port also makes permanent enclosed installation an option. The Light deck, as the name suggests, is a simple extremely light stage deck, that uses thin ply strengthened with polymers, to give a simple, yet strong, work surface.

Maltbury was the biggest product on service company Mushroom Lighting's stand. The Metrodeck has been around for some time now;



Lite Structures' Leanne Ripley with Steve Watts of Abstract.

originally built for the Barbican Concert Hall, this low profile version of standard steel deck has proved very popular with other users. Mushroom presented a brand new price list for their entire range of products and services.

Doughty's new trigger clamp will be a welcome discovery to anyone who's ever struggled to hang a bloody great scanning lamp on their own. The clamp will support a load of 250kgs and is selfhanging: once you've slung it over the rigging pipe, the clamp will support the load securely while you lock it down. Doughty shared their stand with Prolyte who had two new products to add to their range of truss systems. The S36 series now has a new box corner that can be built to lock in any configuration by hidden Allen key connections. For the F series folding truss there is now a fully floating variable end connector that allows flexible truss movements in space thanks to structural hinges articulating in two planes. The so-called 'Cardonic Corner' allows movement in any direction.

**Cirro-Lite** have amazed us with bigger and more powerful Lightning Strikes strobes over the past few years. Next year they promise the launch of a range of equally powerful flood lights under the SoftSun banner...

Jem, rubbing shoulders with their owners on the Martin Professional stand, had the new Club Smoke and Stage Hazer on display. The Club Smoke is a compact, twin-head device running from a central reservoir, a common feature this year. The Stage Hazer is a development of the Techno Hazer which gives twice the output but, retains the standard features of timer and density control on board, or remotely via DMX. Hot out of the factory, so hot, in fact, that it didn't yet have a name, was the new Jem fan. An enclosed, high velocity, vari-speed device, the fan is ideal for use with any of the Jem smoke products. Although not 100% tolerant of the fluid coating such work incurs, the fan is easy to disassemble and service.

Abstract were showing their VR range of intelligent mirror lamps. Although only the VR8 is



Steve Higham shows off the memorabilia of Bygone Times.

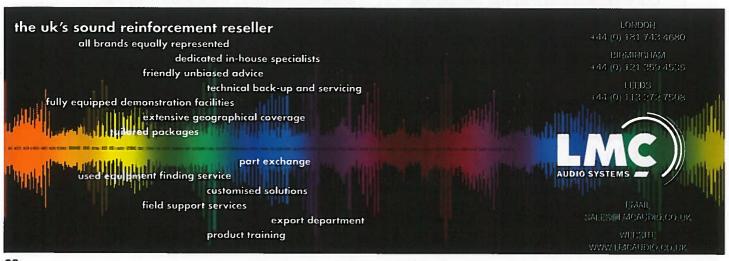
currently available, the VR12 and VR4 will soon join it. The VR8 is a 150W discharge lamp with 12 colours, eight rotating gobos and is fully DMX-controllable.

PCM Pfaff Silverblue had the CM Lodestar ProStar on display, but gained most attention with their hoist assembly blindfold challenge. Intended to draw attention to the PCM Lodestar training schools, the challenge underlined just how easy these hoists are to service. Also on show was the latest high speed hoist from Swiss manufacturer Gis.

Unusual Rigging took a casual approach to this year's show, no visual rigging dynamics, but an inviting stand that saw many enquiries to a well-known practitioner of this dark art. Not known as a product-led company, they did announce that Unusual Manufacturing which provides a re-furb' and new build service to the theatre flying industry, has had its busiest year yet, which must be some reflection of the industry as a whole.

Dealers Batmink had a broad range of new product to show, from right across the spectrum of its manufacturers. American DJ led the way with the V2000 - a 2 x 400W into 4 ohm stereo amplifier; XDM 2221 - a two-channel DJ mixer; the DCD 200 - a twin CD deck and the more fully-featured Pro 300, also a twin CD but with BPM, jog and direct track access. From the Genius lighting range was the Psycolight (that's how they spell it in the brochure), an oil wheel projector that gives gobo overlay and has a zoom focus lens, and the Genius Color Pro, an MSD 200W CMY static colour change lamp with iris, zoom and gobo. Also on stand, the Nexus 3, a 575W HMI scanner fully featured with six static and seven rotating gobos.

From Next was the highly functional X Light, a completely self-contained light system for the entry level musician. The unit comes complete with stand, four Par 56 lamps mounted directly to a dimmer module that forms the T-bar of the stand and optional programmable four-channel controller, hand or footswitch operated, with the





Karen Cronin of Total Fabrication with the canopy and PA tower plan of the Eros Ramazzotti 1998 world tour.

whole lot packaged in its own flight case. For the fun lovers, **MBN** had two variants of their foam generators on the Batmink stand, the F300 pumps out 6.5m3 per min, the F670 30.0m3 per min.

Lamba, like Batmink, had a full range of products on show. From HSL came the latest version of Win Commander; currently in Beta testing, the full update will become available around Christmas. Improvements drag and drop for all options, video playback and altogether better cue environment. The Pixel Scan has undergone another metamorphosis; the tilt and pan head has now been made into a platform device designed to support a standard data projector, integrated with Pixel Box, the improved output of the projector (over the previous 1200W HMI LCD device) and greater resolution make for a more usable tool. Also on show were products from Next, GMR, KAM and Stanton. Coef's latest light is the Mp 250, a moving yoke lamp fitted with a 250W MSD bulb. A smooth runner, even at slow speeds, thanks to 16 bit resolution, the lamp features full 450° pan, 270° tilt, 10 colours plus white, rainbow effect, blacklight filter, six metal and two dichroic rotating gobos.

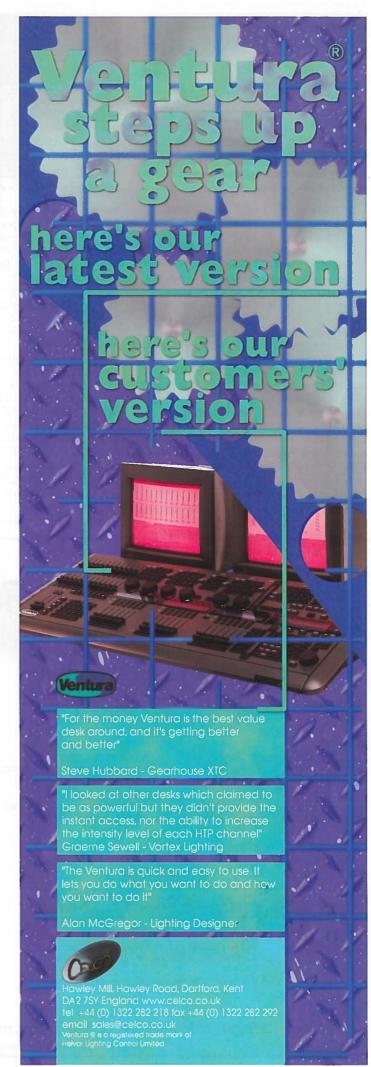
Le Maitre showed off the prototype mock-up of what will be a new range of Pyro controllers. The Sure Fire is a 24-channel board (A or B configurable giving a total of 48 outputs) with Chase fire with variable speed control down to five second intervals, and Step fire mode which allows manual stepping through a predetermined sequence. Le Maitre's award-winning Neutron Star Hazer has just received full patent approval. The machine uses a unique low voltage pulse heat to generate the haze from specially developed fluid. Non water-based, the fluid is 100% active ingredient, produces no residue, and a 2.5 litre tank-full will run for over 100 hours.

There were no new products on the **Slick** stand, but an example of what specialist service the company can provide in the form of three trees for an avant garde theatre production at the Scarbeus Theatre. Each seven metres tall, they not only had to resemble trees, but be strong enough to support an aerial gymnast. As you may have seen in this issue's news, Slick are expanding rapidly: just a year after the opening of a manufacturing base in the USA came the announcement at PLASA 98 of the establishment of a new manufacturing facility in Australia. Ian Messner, formerly of Jands Electronics, will head up the Australian branch for the truss innovators.

NJD once again surprised everyone by introducing more innovative products to the lighting world. A happy spin-off from the Rap 100 launched last year is the MMB, a mirror ball mounting that when used with the lamp produces a startling full half sphere of segmented colours. Chroma 50 is a pinspot light effect, 50W with seven colours plus white, whilst the Quartet and Spectre are similar colour mixing floods with one radical difference - both use 500W collared bulbs in varying proportions to produce a massive range of colours. The Vortex, a helicopter-style effect, has eight beams, direction control, seven split colours, pitch variance and four gobos. The Vortex employs no brush gear and is altogether a quieter more usable lamp than its old predecessors. Lite Structures were also to be found on the NJD stand launching a new range of budget trussing available exclusively in the UK through NJD. The no-frills Showcraft trussing is designed to be comparable to other similar systems, but is specifically aimed at the low-end marketplace.

**Total Fabrications** had the Arena Deck on central display. A simple system to deploy the use of square base design  $(4 \times 4, 5 \times 5 \text{ or } 1.5 \text{m} \times 1.5 \text{m})$  gate-leg type interlinks makes this a foolproof erection system, and as such it's fast to use with just four components including the deck. Also on display was an exploded model of the planetary gearbox that makes the Verlinde Compact hoist such a quiet runner.

Lane Lighting, the independent company established to distribute the Starlite V, were displaying an improved version of this professional end high spec moving yoke lamp. A new optical path gives a whopping 20% greater light output from an already powerful 1200W lamp.





Robert Bell of Cast Lighting demonstrates the WYSIWYG system.

AC Lighting had several new products on display. Version three of the software for Flying Pig's Wholehog II desk gives XYZ 3D programming; just plot four positions of stage and all the lamps in your system and the software will re-plot all other cues from that positional data. Used with the Beacon, a wire-fed light sensor similar to the Avo Focus Finder, and the lighting operator has an automatic system for doing the above while he goes for a nice cuppa.

Also on the AC stand was the Jands Echelon, launched earlier in the year. A Jands platform for the Hog II software, the desk has a 1000 channel output and cue data is fully interchangeable with standard Hog desks, but comes in at half the price of the Hog. In the Tourmate mains connector range, comes a new black plug body for all inline Ceeform-style connectors. There are three new scrollers in the Chroma Q range - a 1kW, 2kW and eightlight unit. These feature all the same facilities as the original Par 64 device, but in a metal casing, instead of the extruded polymer.

Manfrotto had two new products: the Wincher is a wind-up lift stand that can raise 190kg to a



Lighting Technology's award-winning stand.

height of six metres. The Stacker Stand, is a three-leg stand for half inch spigot, with the top hinge in line, enabling closed stands to be clipped together for neat free-standing storage. There were two new followspots from **Spotlight**, both using a 1200W HTI source with two focus lengths. The big lamp in the Spotlight area was the PC50 a 5kW lamp little bigger than a normal 2kW fresnel mounted to a moving yoke.

Coffing are a new face to PLASA. A US hoist manufacturer owned by CM Lodestar, the Coffing range appears, at first glance, to be very similar to the CM range, but has an oil-filled transmission which gives it a greater duty cycle. Coffing already has a parts and support infrastructure in place through its takeover of Yale hoists in Telford.

Tomcat offered a new range of hoists to the PLASA visitor. Built by Hoffman in Germany and badged as Logic Lift, the hoists conform to VGB German standards for use of lift devices overhead. The aptly named VBG70 comes in six weight load/speed configurations and has a variety of add-on safety options, including double braking. Tomcat also displayed a prototype hoist controller,



Celebrating 20 years in business - Cheryl Bereznyckyj and Monica Saunders of ADDA Super Cases.

in four channel version, but with six and 12-way units promised when full production commences at the end of the year.

Color Kinetics' LED-based lamp uses RGB mixing to produce a very low-powered long life variable colour wash lamp. Although candle power quickly reduces over long throws, for close placement work these 24v DC lamps are a very exciting tool for the retail display, and possibly domestic markets.

Lighting & Electronics had four broad angle floodlights on show which were nothing revolutionary, but certainly well-made dependable items. The 2kW scoop for cyc' lighting (and the 750W variant) come with a simple backplate connector that allows ganging up in any combination the user wishes, making for a flexible wash lamp. The Micro-Fill is a small, nook light type lamp for squeezing into tight corners.

Lighting Technology Group had several new items to show. Locked away upstairs in a glass case, taking pride of place, was the new moving yoke lamp from Mad named Axis. The lamp features a 575W lamp (MSD or HSR) cold beam

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### More than just a box



The Martin Experience



Paul Adams presents Avolites' Steve Warren (left) and Rick Salzedo (right) with their product award for the Focus Finder.

reflector, two full colour wheels, two further wheels giving the option of either one more colour plus gobo, or two gobo wheels, a good quality fresnel lens that can be automatically dropped in for wide beam and a scissor-type shutter device for high speed strobing. Pan and Tilt is fully auto-correcting, and the drive motors used are extremely powerful for what is a small, compact lamp.

The Mad IMP (Image Marketing Projector) is just as the name suggests, a branding tool for projecting logos and other images. The lamp takes six interchangeable E-type gobos and has a moving mirror head for image positioning. It also features a six colour wheel, shutter and fresnel, and will operate remotely via infra red if required. The Slide Scanner is similar to the IMP but features a rotatable, fully indexed holder for three 35mm transparencies (alternatively three D size gobos can be used).

For Cerebrum the central exhibit on their part



Fred Foster of ETC collects a commendation from PLASA Chairman Paul Adams for the Source 4 zoom.

of the stand was the new Grand MA lighting control desk from MA Lighting. With all the facility you might expect of this well known manufacturer, the Grand MA's most notable feature is its flexibility in configuration. The user can literally assign functions to wherever they want. Three touch screens, plus full hard surface buttons and faders are laid out for ease of access, with the three screens on a tilt up panel. The desk has built-in control surface diagnostic that gives instant indication should a button jam or whatever, and show which button it is.

Anytronics sported new products for the lighting market. The Mini-Desk comes in six and 12-channel versions, each giving 120 and 240 channels of DMX respectively. Accessed in blocks of six or 12, the desks can be formatted to present every function of lighting control you could wish for. Obviously with limited physical control surface, the desks are designed as a catch-all and it would not be possible to operate the desks for a



Paul Adams with Anna Western and Mark Beasley of Rosco, and their award for most imaginative use of stand space.

show say, and be able to easily access through all the functions. But as a flexible, re-usable desk, the Mini-Desk offers most of what you'd want. The Cross-Fade 8 is, as its name suggests, an eight-channel cross fading control.

Lite Puter announced their achievement of ISO9002 accreditation for quality. On show at PLASA was the Junior DMX512 dimming console which has 40 scene store, six definable submasters and is priced to attract the school or small club buyer. The DX-1220, a 12-channel dimmer pack, has been upgraded to include new switching PSU for greater stability, and better heat control for longer use through enlarged heat sink.

Stage One were making their first visit to PLASA. A well-established scenic builder Stage One had their Q Control system, a fully developed motion control system on display. This system is already widely known in the conference/trade-show industry where it regularly choreographs complex car launch spectaculars. Its

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John Drummond-Montgomery of Bytecraft with the Solution Sine dimmer.

appearance at PLASA attracted much interest from TV companies visiting the nearby big screen exhibitors. Not to be confused with Stage One were **Stage 1 Enterprises**, who offer staging systems and dance floors from Simplex, Trilite trussing from Optikinetics and themed sets from Hollywood Themes.

Lighthouse Technologies are a Hong Kongbased manufacturer of large screen LED technology. Manufacturers only, they sell directly to rental companies. One module is 960mm by 1280mm and comes in two types: a Fast Rig based on a King-Pin assembly for a self hanging temporary install, and a more substantial permanent installation type rigged to custom steel framing.

Oxtron had three products heavily featured, plus an interesting 'virtual lighting desk' under development on the Internet. DCA digitally controlled audio is a neat little network-style controller for large building installs such as hotels and conference centres; Marc AV is a software-based platform giving simple access to controlling complex audio and visual equipment configurations, whilst Music Box is another software product designed to give easy control over a mass of data.

It was the first time at PLASA for German hoist manufacturer Chain Master and not a shy try-out. A big stand gave ample room for this company to demonstrate not only its range of hoists, but also its control system. They are the first, and currently the only, hoist company in Germany to gain VBG70 for their products, including cable, connectors and computer control. Their computer control platform software will run up to 900 separate hoists (or any other motorised device) and can be integrated with a comparable load cell software display for load monitoring. Chain Master's neatest product is the frequency converter, a device they can fit to all their chain hoists that allows variable speed operation, anything up to 20m/min.

**ESP** Smoke Pro have completed the development of infra-red control for all nine smoke machines in their range. All controllers give access to smoke density and timed release control. ESP have also developed a haze fluid for use with their smokers.

**Comm-Tec** are an AV specialist providing advice and service as well as products. On show



Tommy Stephenson and Colin Walters of TMB Associates.



Pete Hodich, Tony Beresford and Sid Rogerson of Star Hire.

for the first time in the UK was the Digital Audio Machine from Alcorn McBride. A broadcast standard Mpeg 2 device, the DAM will give instant real-time access to a store of up to 24 hours of digital audio. It is designed for the most rigorous environments, 'even a rollercoaster' they claim, and can operate from a normal 12v car battery.

ACE Visual & Sound are a new company founded only last August. Coming from a background in Cable TV, they have addressed a gap in the control market around the small rural theatre, school am/dram society. Show Magic is a software-based lighting, special effects and sound controller all in one. A virtual lighting desk with direct access (not menu driven), the control surface includes drag and drop copying for building lighting cues (DMX output up to 1536 channels), plus it also allows control and mix of multiple sources, fades, starts, stops and stereo balance for all channels.

ESTA maintained their familiar presence at this year's PLASA and training was the big issue of the show and discussions with PLASA, the PSA and VPLT, who are pursuing similar goals, meant a fruitful exchange of information. On the ESTA Pavilion, TMB had the Wildfire range of UVsensitive products on prominent display. UV technology has been developing rapidly, as have its uses and applications so it was no surprise to find that TMB also hosted a useful seminar on the applications of the product. Also on the ESTA pavilion were a few examples of the new Altman TV line of fresnels, though no product information as yet. Viddessence is a competitor to the Kino Flo range of tube-based flood lighting for cinematographic work and the company claim the same uniform colour temperature for their panels. The Mega-Claw from Light Source is another instant-grab hanging clamp intended for use with the larger moving mirror lamps. Rated at 500kgs, the Claw hooks instantly, allowing easy lock down by a single operator, though goodness knows how many technicians can lift a 500kg lamp unaided.

Star Hire, Star Rats and Stage Line are three closely related companies at PLASA for the first time. Attracting the most attention was the Stage Line range of 45ft trailer-mounted instant stages. Built in Canada by Stage Line, five are currently owned by Star Hire in the UK. Self-contained units with hydraulic canopies capable of supporting full-scale rock and roll lighting rigs, the

## **DMXtra**

why buy several boxes when one can do it all? 10 functions in one unit:



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Enliten's team of John Simpson, Peter Simpson and John Anderton.

trailers are literally a 'drive up, open up, and do the show' kind of device.

Star Hire announced that they will be enlarging their stock, particularly with the smaller trailers Stage Line build. Star Rats took the opportunity to introduce themselves to the few members of the rock and roll industry who've spent the last eight months in Siberia and were unaware of the rigging services they provide.

A gel manufacturer stocking a full range of colour media, Colourlite also produce shrink-wrapped fluorescent tubes. New for PLASA is the Ultra range, featuring Ultra 2000 - a 4ft strobing UV tube system and Ultra 2001 - a strobing colour tube system, both with custom controller.

Technotronics were showing an improvement on last year's Octilight; the Octilight P is a self-powered version giving a 2kW output. The FR6 and HR6 are simple six channel hand (H) or foot (F) controllers for use with Octilight, Nimbus or Stand Pack, and are aimed at the performer who needs to control lighting themselves while on stage. The new Nimbus is a four-head P36 lamp with a rotating mirror above each bulb to give rotating coloured beams which can be synchronised, and, in turn, Nimbus itself can be set to master/slave mode.

The Z series of smoke machines from Antari is becoming widely known now since its launch earlier this year. From 800 to 3000W, these machines all boast re-designed pumps and heaters, with ease of service for the owner a major feature. The two smaller models come complete with basic hand remote, while the top-of-therange models have LCD display remotes which give access to functions such as time release, density and intervals between burst. The screen also allows access to DMX addressing.

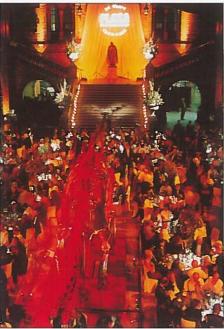
CCS Controllers have improved their Light Controller with dedicated software upgrade '3D Moving Head Control'. A free upgrade, 3D gives graphic on-screen representation of the moving head/heads, and allows positive indication of what th lamp is doing.

DiscoTech Prolight concepts had the Beetle, a type of centrepiece effect featuring four beams from a single 50W halogen source with four gobos and four colours. The ColourTech 150 is a simple seven-colour changer spot with five gobos built-in and two multicolour effects.

Nulight, the laser supplier to the mobile DJ and small club market, announced the arrival of DMX control for all their laser systems. The three-colour 250mW Argon has DMX as standard. Two new scanning lasers, red (60mW) or green (5mW), both use diode technology and carry the Proscan label.

**Elektralite** proffered their CP100 lighting controller on stand. Designed for the budget moving light controller, the CP100 gives 1024 DMX channels, 500 cues, 100 chases and an extensive lamp personality library.

Well known for their budget fibre optic light



Over 450 exhibitors and guests attended the PLASA Show's 21st anniversary celebrations, which were held at the Natural History Museum.

products and bubble tube lights, **Light Engineering** further expanded their range of the weird and wonderful with mirror shapes. The company are offering a custom service whereby they will build any kind of mirrored device ranging from mirrorball to the most complex helical spiral for installation.

Caire are a French company offering turnkey services for theatre installs, including engineering and maintenance and supply of scenic equipment, stage machinery, lighting, sound, curtains and seating.

City Theatrical had the EFX Plus 2 effect disk system, which effectively turns a Source Four profile spot into a Patt 252-style linear effects projector. Only better: the motor unit contains two interchangeable disks that have independent speed and direction control from DMX, and the beam can be cut to shape using the lantern's shutters rather than a fiddly mask. It's brilliant because its simple, effective and nothing else (give or take a few home-brew projects) can do what it does. Interestingly, Wybron, a close neighbour in the ESTA pavilion, were also making a move into effects projection: their Proscenia projection system uses a variation of their established scroll technology, allowing you to apply images to clear scrolls. They also had the Watchdog system for gathering data from large scroller rigs, and new dousers for HMI lamps.

The EFX Plus 2's lightsource became more flexible at this year's show, when ETC launched their long-awaited Source Four Zoom. ETC's usual fresh approach to a problem was on show: the two lenstubes (15-30 degrees and 25-50 degrees) are designed to be focused one-handed, using a combined sliding/rotating control that operates a bit like the zoom lens on a camera. And they're still bright! ETC also had new variants on their Sensor dimmers: a CE-spec touring rack, and revised modules for the permanent rack featuring dual-pole disconnect and RCD per channel with fault reporting. And Obsession 2 was still turning heads a year on . . .

ETC weren't the only people with a new profile on show, and **Selecon**'s Pacific range was the most interesting rival. While others have basically copied ETC's axial bulb/dichroic mirror system,



Claire Adams and Mike Earnshaw (right) of Technotronics with Jakob Egham of Dan DiscoLight, Denmark (centre).

the New Zealanders have taken a different approach, mounting the bulb base-down and bouncing the lamp off an angled dichroic mirror to keep the heat away from the lamp base. The result looks like an upside-down Patt 264 (though Selecon and distributors AJS were clearly sick of hearing that!), but with a choice of two zoom lenses. The lamp is also safe, disconnecting power as the lamphouse is opened for bulb changing.

CCT also expanded their profile range, launching two condenser versions of Freedom. Both have identical optics, but one lamphouse is as compact as possible, while the other is the size of existing Freedoms, allowing it to take the slot-in dimmer module - this now uprated to 1000W. CCT were also showing the Comspec colour mixing twin-scroller, which was producing some great colours.

Interestingly, the architectural lighting world seems to be discovering the joys of profile spots. Indeed, architectural lighting as a whole played a more prominent role at this show than in previous years, perhaps because this was really the last PLASA aimed at Millennium-project specifiers. Newcomers Enliten, part of the White Light Group, sponsored an interesting seminar on the whole subject of lighting buildings as well as presenting their product range on an amusing outdoor-themed stand complete with flowerbeds and water feature. They also launched Callisto and Juno, their own weatherproof outdoor profiles, as well as showing perhaps the lowestfeatured products at the show: 'fake' theatricalstyle lanterns for dressing shop windows on a budget.

Across the aisle, parent company White Light had brought back their popular bar, complete with special White Light beer! A range of products from White Light and The Moving Light Company were on show, including a teeny-tiny smoke machine from The Smoke Factory that could be hidden just about anywhere and WYSIWYG3 - now available for pre-programming shows at MLCo.

White Light also had four of DHA's new Digital Beamlight 2s on show, though their official launch was being held next door on the DHA stand. Redesigned from the version previewed at PLASA two years ago, these new units seem much more robust while still retaining the superb optics of the original. They may not do much in comparison to the 'rock and roll' lights, but nothing else can do what they do. DHA were also showing new glass gobo designs, a redesigned and very elegant fibre optic lightsource, and DimDat, a device for controlling their varispeed animated effects using a conventional dimmer.

In addition to the VL7 covered earlier, Vari-Lite also had one of the smallest moving lights - though, since it is an Irideon architectural product, it was tucked away on Lighting Technology's amusing, award-winning seaside-themed stand rather than Vari-Lite's own. This repackages the



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#### Peter Aarinson, Bally's Hotel, Las Vegas:

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Bryan Raven, General Manager, White Light:
By purchasing over 150 Chroma-Q units we have expanded the number of our clients who have access to colour changer technology tremendously.

#### Kevin Forbes, General Manager, Light & Sound Design Ltd:

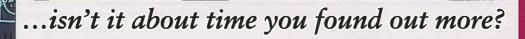
The 200 Chroma-Q colour changers we own are one of the best rental investments we have made.

#### David Milly, Theatrical Lighting Systems:

I purchased the very first Chroma-Q units ever produced and I must admit, I don't treat them very well. When I use them on tours I don't even store them in cases; I just hang them on fixtures stored in pre-rig truss. They work reliably and being able to store them in this way saves my crew critical time every day.

#### Peter Miles, The Boss, Spot Co.:

The Chroma-Q gives customers of The Spot Co. a lot more show for their money. Consistency, reliability and ease of use makes it great for us too.



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Zero 88's Freddy Lloyd with Alan Hickmott of Sibca Electronics from the UAE.

innards of a VL6, plus a moving mirror into a package that can be recessed neatly into walls or ceilings, giving a near-invisible moving logo projector.

What is proving interesting is the development of moving lights better suited to theatre applications. The biggest omission so far has been proper beam control - the equivalents of shutters or barndoors, which only the Martin PAL 1200 has offered. **Amptown** were showing a soft-edged equivalent to this, with a new shuttering system for their versatile Washlight. This allows bits of the beam to be lopped off at any angle exactly as per a set of barndoors. The Washlight is available in tungsten or discharge versions with or without beamshaping.

Control for all of these lights remains an issue, though console manufacturers are catching up. Strand chose PLASA to unveil the latest version of their GeniusPro software - not a revolutionary change, but a series of useful improvements including a mode that allows WYSIWYG to blind-preview cues in 500-series desks. The software also adds SMPTE support, this inspired by the new 510i rack-mount console in a box. Rather than building a stand from scratch, Strand just drove their touring showroom-in-a-truck into the hall: its air conditioning offered a welcome respite from the heat!

While most of the manufacturers continued to evolve their control and moving light software -AVAB's Panther, hidden away on the upper level of the show, is still a very versatile looking system that deserves more attention in this country. ADB have thrown everything away and started from scratch. Their new Phoenix console borrows the wooden-surround styling of the AVAB desks, and the new software developed for it will also run on the older Vision consoles. ADB were also introducing ISIS (Integrated Software for Intelligent Systems) at PLASA. This is a new software platform structured around a powerful real-time 32-bit operating system. The software has now been formally released, and will be issued as a free upgrade to all Vision 10 owners.

The most complete range of controllers was from Compulite, on the Stagetec stand, who seem to have a console to fit any budget, all with moving light support. They launched version 1.5 of the CompuCAD design package, which adds support for moving lights and can link to any Compulite console via Ethernet to transfer show data or visualise lighting states.

Other competition has long been promised from the MA grandMA console, which still looks fabulous but still isn't quite finished. ShowCAD, a long-time competitor in this field, was on show once again and now has a company - ShowCad Control Systems Ltd - named after it! Leprecon were showing their LP1600 and new LP3000 consoles. And at the lower end of the scale, Zero 88 have been continuing to evolve their Sirius 250 (which now also has a PC-based off-line editor), but have also expanded their popular collection



Tom Mannings of Decoupe pictured with Stephane Simon of Cameleon Telescan and the TP6 teleprojector.

of lower-end controls with the two 12-channel DMX desks, the Elara and the Alcora.

With or without moving lights in the rig, these desks will usually end up talking to dimmers, and this is the area that won **Bytecraft** an award. Their new Solution Sine's claim to fame is that it dims cleanly, showing a constant sine-wave on an oscilloscope. The less technical but more effective demo was a pair of Par cans - one sung out like, well, like a dimmed Par can. The other was silent . . **IES** were making similar claims for their dimmer range and launching a new 72-channel touring rack, while **LightProcessor** were showing their

range and launching a new 72-channel touring rack, while LightProcessor were showing their new Paradim\* range, which replaces the older QPack, and LSC introduced the TS touring dimmer range, as well as the version 2 software for the Axiom desk and a new corporate logo. Elsewhere, ESP were showing the RVE range of dimmers alongside Mobil Tech's stands and trussing with built-in flexible links, whilst AVAB Transtechnik had their Dawn Trader dimmers as well as their Red Rebel lanterns on show alongside the AVAB desks. Finally, Zero 88 had their Contour dimmers; the touring racks use a neat, locking three-pole connector.

There's then the increasingly complex problem of distributing data to a mix of dimmers, lights, scrollers and the rest, which a number of companies are now tackling. Artistic Licence were celebrating their 10th year by supplying a new DMX data distribution system to the Cottesloe at the NT, with all of the connections made through RJ45 'ethernet ready' connectors and cabling. Upgraded versions of the Microscope DMX tester (with moving light personalities editable on a PC) and DMXDongle were also on show. FPF had similar DMX PC cards on show, along with the BackTrack DMX back-up system, also available from XTBA along with their comprehensive range of splitters and mergers. LxDesigns had a combined DMX merger, splitter and conversion box along with a 'replugging' box whilst Howard Eaton Lighting Ltd had their DMX distribution products alongside a new DMX relay pack and their fibre optic and electroluminescent lighting systems.

PRG were at the show, mainly in-and-around the stand of Production Arts Europe though rumours of further acquisitions followed Jere Harris wherever he went! Production Arts were mainly demonstrating their range of Pani projectors, including Pani's new ARC2 architectural products, and E\T\C's single-sprocketed scroller; E\T\C's full range was on display on their own stand, and projection was also the centrepiece of the Hardware for Xenon stand, with the company showing their own system of scrollers. Diap' Assistance were on hand, as always, to actually make the films for all of these projection systems.

**Decoupe** also had projection, having added the powerful Cameleon Telescan range of projectors to their slightly esoteric product line alongside the now-familiar Robert Juliat range of profile spots,



ADB's Brenda Dunsire and Nick Mobsby.

Copernik Par cans and MDG Atmosphere smoke and haze machines, these now CE marked and with 10-year warranties. Showing a range of followspots similar to that from Juliat were Lycian and Xenotech Strong, who were showing their products in the ESTA Pavilion. More lighting products were on show on the stands of Thomasnew variations of Par cans with built-in reflectors, as well as new lightweight conference truss - and Kupo, with their comprehensive lantern and accessory range.

Alongside their familiar fixtures and effects, including the innovative Colourbox system, **Teatro** were showing their new Onda range of 500W fresnels, PCs and profiles. Also on show was a new version of the Versadisc colour changer, this one a 150mm model, suitable for 1kW spotlights.

The show is now a true 'backstage' show, with many stands having little or no direct connection with lighting and sound. There were complete show control systems from Dataton and Avenger Showcontrol, rental management systems from Rental Management Systems and Navigator Systems, and CAD products such as Stardraw (with Starlite promising to add more lightingspecific functionality in the new year) and GAM's GelFile colour database program, claiming to include data on dichroic as well as plastic filters; GAM also had their gobo, colour and animated effect products on show. Glantre had a little lighting - theirs were the only stand with Patt 23s in the rig - but were really showing the Spiralift and Steeldeck staging system (with Steeldeck themselves) while talking about their recent projects throughout the world. Curiously, lighting hire company Stage Electrics had even less lighting equipment on-stand than Glantre, concentrating instead on handing out their new, comprehensive (and heavyweight!) combined hire-and-sales catalogue.

Telestage provide design, commissioning, manufacture, installation and maintenance of mechanical equipment for theatres, concert halls, studios and conference centres. On top of this, they can also offer presentation and AV packages.

Canadian company **Great Performance** manufacture a range of lighting and associated products, including followspots, dimmers, clamps, stands, portable stages and cases.

Elsewhere, Stage Technologies were showing a variety of their automation products, with the development of the Nomad portable multi-user console seemingly running slightly ahead of the development of the Royal Opera House that it is destined for. Highlights were a new off-line programming system and a cunning way of defining complex movement paths that will be appearing in the desk shortly. Triple E introduced Unitruss, a combined truss-and-track, along with a new portable power flying system, while Harkness Hall had a new system for controlling curtains and masking and Telestage Associates were discussing their full range of products and services. Verlinde had a quiet stand tucked away



Mark Ager (left) and Nikki Scott (right) of Stage Technologies flank Jere Harris of PRG.

in a corner showing their range of chain hoists.

Through its subsidiary, **Black Cat Music**, **British Harlequin** represented Wenger Corporation's Vision Stage. With an unsupported span of 12ft and power-levelling of its four telescopic legs, a 60ft x 40ft stage with sound wings can be assembled in less than two hours. Also on stand, the Wenger V-Rooma modular sound-insulated cabin, popular UK universities' music departments.

Exhibiting in their own right for the first time, US-based **Theatre Effects** had a number of new products on show. These included Mega Mortars - confetti/streamer cannons designed for stadiums and large venues, Megafetti-giant-sized confetti for the Mega Mortars and the LVTEST quick checker - a continuity tester for pyrotechnics.

**Mico Lighting** were once again promoting their comprehensive range of lamps and lighting accessories. The company can now offer over 5,000 branded products from leading manufacturers to the disco, theatre and leisure industries

Ceep's ranges of multi-pin circular connectors were also on show. The company offer a substantial range of standard fittings, as well as 7-pin, 22-pin, 37-pin, 39-pin and 43-pin planforms also available, in either black or nickel finish. Operating on similar ground were connector and cable manufacturer Litton Veam, who were showing some of their established ranges at the show, including the Powerlock range for power distribution, the USC socapex compatible 19-pin connector for concert lighting and the LK Audio series. Italian manufacturer Link introduced the Power Box range with 32 and 63A CEE inputs, and magnetothermic/differential breakers on each 16A output. Also on show, the 500A unipolar Power Link connector, with impressive safety features and improved waterproofing. More interfacing was available from Klotz, who have around 50 new products including various cable types and multicores, a range of connectors, patchbays and associated cases and drums.

Fibre optic specialist **Par Opti** launched Crystalens at PLASA. This prismatic lens resembles a chandelier crystal, but produces a rather more decorative effect even from small fibres. Paul Raymond says they'll be all over the place by the Millennium. Watch this space. A new lightsource, an high output HQI 150W lamp with dichroic reflector, 9000 hour lamplife and DMX dimming was previewed. **Technology Connections** was formed just over a year ago and markets two new concepts in electronic messaging systems - the Magicball 3D display and the Panoramic system. That David Nibbs received a good response is an understatement as his order book from the show will testify.

PLASA always produces a slew of flightcase companies and 5 Star Cases, Adda (celebrating their 20th anniversary this year - more on that next issue), CP Cases and International Hardware were all at the show. Many of these manufacturers were featured in our flightcase survey earlier in the year. Praise indeed from Giraffe, the Lancashire-based manufacturer of flightcases, stands and associated hardware, who had a pretty bloomin' good show. 'We wish we'd been doing PLASA for the last 10 years', they said. Aw, shucks.

Effects were on show on a wide range of stands, including **Skyhigh Stage FX** - a merger of JEM Pyrotechnics, Blakes Fireworks and Skyhigh Pyrotechnics. **Rosco** were combining lighting and non-lighting elements; an 'overflow' display on the opposite side of the hall had a large Roscomural backdrop, while their main stand featured the Horizon PC-based lighting controller and new Alpha 900 smoke machine alongside their startlingly effective Clearcolour invisible fluorescent paints. UV seemed to be another 'in thing' this year, with UV lanterns on show from **Wildfire** on the **TMB** stand, **Nocturn** and **Enliten**.

Rosco also had their traditional colour media on show, as did **Lee Filters** who were proudly handing out swatch books containing the new 700-series of colours, created 'hands on' by lighting designers (and magazine editors!) as documented in this pages a few months ago. Many of these colours look incredibly useful - try them out when you get the chance!



## Designers on Colour

RICHARD PILBROW

"Fractured white light reveals colour. Part of the magic of stage lighting is taking complex multi-directional palettes of colour and re-combining them into lucid, dramatic light for the stage.

When I began lighting only about fifty shades of Cinemoid were available. I often used them two and three to a frame seeking new possibilities. Then I discovered Rosco and first brought this wonderful range to Britain. Now the possibilities are almost limitless.

Colour brings life, texture and vibrancy to the stage. I love it."

"An incredible dance finale in Show Boat uses a vivid colour palette, at times moody, rich and at times blazing. The dancers are tracked in three dimensions by moving light curtains simultaneously rolling scrollers of Supergel 73 Peacock Blue, Lux 44 Middle Rose to Supergel 19 Fire and 21 Golden Amber."





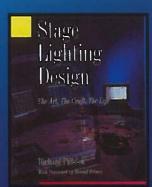
superqu

"Cy Coleman's *The Life* brings the tawdry old 42nd Street back to life. Garish neon (Supergel 26 Red, 388 Gaslight Green) conflicts with back alley chill (Cinegel 1/2 and 1/8 Blue) and cheap hotel squalor (Cinegel corrections and Supergel 337 True Pink and 57 Lavender)."

A copy of the current Supergel swatchbook is available, free for the asking, from Rosco or your Rosco dealer.

Widely regarded as the dean of lighting designers for both the West End and Broadway,

Richard Pilbrow also heads Theatre Projects Consultants. His second book "Stage Lighting Design - The Art, The Craft, The Life" was named LDI Product of the Year.



r sco

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Bob Harrison of Beyerdynamic shows off the ZA 4-4 control unit.

### **AUDIO**

First launched last year, this year **Acoustic Sound Systems** added two new speakers to its Spektra range - the SPM12 and SPM15 floor monitors. The SPM12 has, surprise surprise, a 12" (plus a 1") horn, driving 250W, whilst the SPM15 has a (yup) 15" (plus 1") horn, again for 250W.

Meanwhile, AKG was pretty damn proud of its new WMS60 selectable VHF radio mic system - unleashed at PLASA - which has five selectable frequencies and can be used with a wide range of AKG heads. Also being introduced to society was the Discreet Acoustics Mk2 range of modular installation mics. With five capsules and six installation mics in the range, the range features a useful phantom-powered LED ring (to check if everything is connected and working).

Amek gave the first UK airing of a 56-channel Recall RN live performance mixing console. With a mic amp and EQ section designed by, as the appended initials suggest, Rupert Neve, the Recall RN offers cut and boost of +/- 18dB on each of the four frequency controls.

Things were damp with Community, which launched its new WET series of loudspeakers. Engineered for long-term survival under extreme environmental conditions, the WET series features heavy-duty, one-piece hand-laminated fibreglass enclosures to keep the elements at bay, with diaphragms made of fibre, mylar and polyimide materials. The first product to be launched in the series is the WET228, a two-way system with dual 8" carbon fibre cone LF drivers and a 1" HF exit-compression driver. Rated from 50Hz to 18kHz, with a sensitivity of 94dB at 1W/1m, it handles 250W RMS at four ohms.

The AT4060 vacuum tube microphone was the cream of the new products launched by **Audio-Technica** at PLASA. With low noise and high max SPL capability, the AT4060 was designed with the input of a number of recording engineers to produce a mic' suitable for many uses - from strings to guitar cabs.

**Sellmark**'s full range of electromechanical components were on show - potentiometers, faders and switches. Shown for the first time was the AudioGlow electroluminescent front panel.

Fed up of a myriad of controllers and protocols? Tired of trying to co-ordinate audio, video, lighting, pyrotechnics, MIDI systems, computer-driven equipment and electromechanical devices? Isn't everyone? Well down at Autograph Sales they just might have a paracetamol-style solution for those headaches - The Conductor, a 4U cage card, with on-board processing which can operate as either a stand-alone unit or as part of a larger system using the wonders of Ethernet. One man band with a keyboard and a lot of lighting cues? Simple. Theatre or museum with interactive displays? A mere bagatelle.

SoundLAB, on the Altai stand, were showing a range of DJ Kits to suit a range of budgets. Each incorporates twin decks and a mixer from SoundLAB's own product range, with the



Chris Edwards of CIE Audio and the Inter-M pro sound amp range.

cheapest package making a very affordable starter kit for budding DJs.

CIE Audio showed the new ranges of amplifiers, mixers and loudspeakers from Inter-M too numerous to cover here, the full wireless microphone and portable PA ranges from Chiayo and the award-winning Wharfedale LoudPanel. The company also launched their new DEDCAT (Dedicated Catalogue) - which has almost doubled in size - at the show.

Gemini featured the BPM250 and BPM1000 DJ mixers. As the names suggest both mixers have on-board digital BPM displays with offset indicator to allow monitoring to sync two tracks. All the Gemini turntables received an upgrade this year, giving them faster stop/start responses. (Also on stand was a complete new range of intelligent lights from LyteQuest). For the top-of-the-range PA user, Gemini had three new power amplifiers on show - the XPM 600, 900 and 1200 (watts) are all high end, Mosfet stereo amps.

The now fully resurrected **Cerwin Vega!** on the **Lamba** stand had the new V series speakers on show, a low cost portable DJ or band PA system. Most prominent in the range is the V-152, known affectionately as the Wok, thanks to its bright metal spherical wave guide, which is basically a two way box, 15" and what CV refer to as a bimorph tweeter.

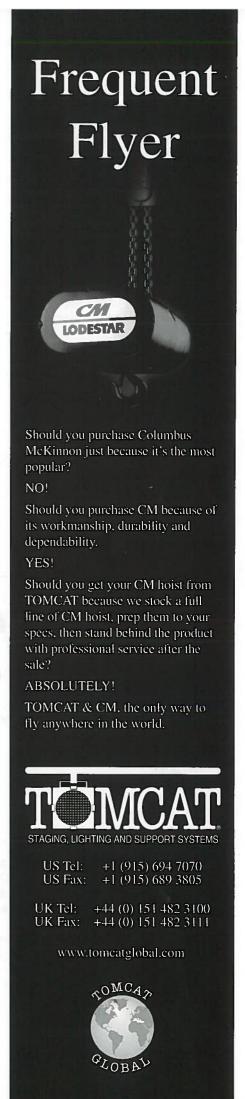
**StudioMaster** are now producing a range of speakers to complement their well-known range of self-powered control desks. The VT series comes in three types - 1x12" with horn, 1x15" with horn and 1x15" bass bin - all are 350W boxes with Speakon connectors, into four or eight ohms, all are pole mountable. Another departure for StudioMaster are the new SEQ 311 and SEQ 152, a 31 band mono, and 15-band dual channel graphics respectively.

For Beyerdynamic, MCS does sound snappier than Microphone Conference System - and it would be a shame to tarnish a good series of products with such an unwieldy name. Composed of either a discussion control unit (hardware) or the modular discussion control unit (for PC manipulation), the idea of the system is simple, perm one from the following: MCS-1011 delegates microphone, MCS-1013 chairman's microphone, MCS-1021 delegates mic with loudspeaker, MCS-1023 chairman's mic with loudspeaker, MCS-1031 delegate's mic with loudspeaker and foreign language selection or the pièce de résistance, the MCS-2041/2-43 delegate/chairman mic with mic button, loudspeaker AND five multi-function buttons. Good, eh?

Promising uses for event organisers, mobile DJs or anyone needing high quality sound in a compact, active powered box, DAS unveiled the DS-15a. Bi-amplified via an on-board 150W bass amp and a 50 HF module, the DS-15a is constructed from mineral-loaded polypropylene.

Club audio manufacturer Deco Leisure/Dare Pro Audio (now with ISO9001 accreditation)

LIGHTING+SOUND INTERNATIONAL OCTOBER 1998





Dave Allen, Matt Chidzey, Nick Halliday and Steve English of Cray Acoustics.

launched six new products at the show. These included the TX8 full-range column speaker, with integral flying points/brackets; new coloured versions of the stylish Eclipse speakers which were launched last year, plus the SC3E controller for the Eclipse series, and Dare SC4D digital controller. Deco (the distribution arm) also introduced the new MC750 amplifier from MC, which joins the 450, 650 and 1250 in the MC range. Apart from th products, Dare also launched their new customisation service, offering designers the facility to manufacture customised audio systems from a various materials to suit any application.

BSS Audio, meanwhile, launched the Opal FCS 966 Constant Q Graphic Equaliser - the fourth addition to this successful series. As well as the traditional EQ faders, the 966 also has separate low and high frequency contour fliters, to change the overall sound balance without disturbing the detail contained on the faders. Each fader has +/-15dB of adjustable gain and input into the 966 can be via either XLR, 1/4 inch TRS jack or Phoenix/Combicon screw terminals.

The Club Series from Cray Acoustics has been



Mike Gentle (left) and Mike Reay (right) of EMO Systems.

prepared for the mobile DJ and smaller venue market. With three speakers in the range currently - the CS12-3A and CS12-3P wide dispersion full range speakers, and the CS15-B bass bin - there was a bit of a buzz around the stand, as the combination of power and price appeared to be popular. The bass enclosure is fitted with an active/passive switch on the connector plate, allowing a system comprising bass and mid/high cabs to be operated by a single amp.

Musicalement Votre had two new product types on show. The CD 100, 200 and 400 are CD players for the live DJ with the top-of-the-range 400 featuring high speed search, variable speed pitch control, plus jog and shuttle. To complement the company's range of DJ source machines are four new mixers - the M100, 200, 300 and 400, the latter having a six-input, three output conformation (third channel to allow for monitor) with five-band EQ and in-built memory banks for sampling.

The T Mix from **ESO** is a very close access mixer for the DJ who really knows his tricks. Ergonomically designed, the T Mix lays out the



Canford Audio's Mark Cunninhgam and Amanda McCall.

control surfaces as closely as possible to allow hand manipulated scratching in double quick order. The ESO Shape allows the DJ to compensate the vocal pitch when varying speed, whilst the ESO Web has a built-in beat counter which allows calibration across two machines to cross mix exactly on the beat with any source.

Storacall Voxman were showing additions to their Orater range, as well as their new Orater MiniCall announcer system - ideal for promotional, information and security announcements in public places.

Monacor displayed several new products at the show, including a new range of lighting, three new mixers and a competitively-priced twin CD player. Also shown for the first time was a new range of Stage Line ABS rack cases with back and front lids and racking strip.

EMO Systems showed their latest products the C-600 series (16A and 32A)mains distribution panel featuring Ceeform-style connectors for mains inlets.

New products from **Behringer** included the 48channel Eurodesk MX9000, the MX3242X rack

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New for Plasa are the 'Touring' version of the Atmosphere and the all in one Ice fog - low fog generator.

# Professional Tools from Decoupe

Contact: Tom Mannings, Tel: 0181 885 2400 Fax: 0181 885 2423

mountable 32-input mixer with 24-bit stereo multi-effects processor, as well as a new range of DJ mixers and the Pro series of outboard processing units.

Canford Audio's display included a range of new modular stageboxes and the Canford Quickcheck Test CD - a simple tool for audio engineers. More importantly, though, they had their catalogue - The Source - containing over 13,000 products.

International Cellulose produce a sound insulation product SonaSpray that gives dependable control over noise and reverberation. SonaSpray can be spray-coated up to 100mm thick and claims a typical noise reduction of minus 8-15dB with reverb' cut by up to 80%.

Suppliers of large infra-red sound transmission systems for a variety of venues, **Wintonfield** demonstrated a new frequency feedback shift controller, the WIRTX10. Used in conjunction with a public address system, this enables the hearing impaired to fully enjoy a trip to the theatre, cinema or even church.

C Audio was promoting the fact that its GB 402 and 602 amps had recently been granted THX approval - allowing the company to add a TX to the amps' names. (For those of you unsure what we're talking about, THX is Lucas's company which continues to pioneer improvements in cinema sound). The 402 is rated at 400W per channel from 10Hz to 40kHz (with 60dB channel separation) and the 602 is rated at 600W, handles from 10Hz to 40kHz (again with 60dB separation). May the force be with them.

Carpet crawlers (very bad Genesis joke - Ed) will have appreciated the carpet-covered QX range from Celestion International. Bass drivers in the two-way QX102, 122 and 152 use proprietary direct drivers, removing the need for a passive crossover. The QX153, uses a 6" direct driver for increased mid-range clarity and presence and the QX151X uses passive crossover components to maintain excellent bass response. The upshot of all this jiggery-pokery is that the dB is more sensitive, the sound more dynamic and you can drive them pretty hard before distortion occurs.

The word 'slew' comes to mind when considering the number of new products that Fuzion cast before the PLASA audience. The pick of the bunch was Sabine's new Graphi-Q - all equaliser, feedback exterminator, compressor and delay. Features include 31 digital filters per channel (+/- 6 or 12dB boost and cut), feedback typically eliminated in 0.3 seconds at 1kHz, attack variable from 0.5 to 100 milliseconds, delay from 1.4 to 1001 milliseconds, 70 user-defined save and recall configurations and, last but not least, frequency response from 20Hz to 20kHz. Fuzion also had a raft of new new processing tools from Symetrix - the 581E distribution amplifier and the 565E dual compressor/limiter/expander, as well as the 300 Series of flexible half-rack audio tools which are



Celestion's Richard Wear (left) flanks Fabio Zacarias of Brazil-based FZ Audio.

ideally suited to building-block style effects systems in high performance audio environments. From **Crown**, the compact new CP660 six-channel power amplifier, which will replace three standard dual channel units, but still fill a 2U space.

**Proel** demo'd their popular Smart and Templar PA systems and as distributors for a number of products, played host to **FBT** (a new line of Pick-Up mixers with digital effects), **Selenium** (known for their range of innovative subwoofers, woofers and exit compression drivers) and **BST** (launched a new twin CD player).

West Yorkshire's **Chevin Research** unleashed its new M Series of amplifiers into the world at PLASA. The M600 Studio Standard is a 300WPC amp, whilst the M900 PA Standard handles up to 425WPC, both at four ohms in 1U format.

**Performance Light & Sound** were showing the new 15KX and 12KX co-axial speakers from Beyma. These include a newly-enhanced 2" compression driver, with reduced harmonic distortion, that will drive smoothly up to 20kHz and still deliver 100dB.

Renkus-Heinz loudspeakers were represented on the stand of their UK distributor, Audio Projects, along with other respected product ranges such as Carver Professional Amplifiers and Furman power conditioners and signal processors. Being demo'd on stand was the E.A.S.E audio simulation packge and E.A.S.E Jr, a less sophisticated version, and of course the package you listen to them with, E.A.R.S.

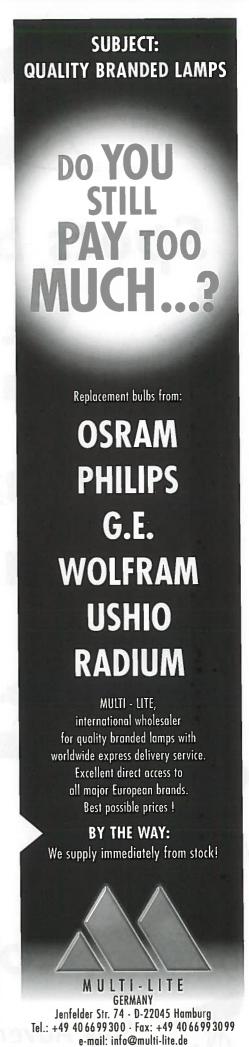
Across at Cipex International there was a veritable cornucopia of new products, from Lax Sonic Solutions whom Cipex was representing at the show. Two new crossovers (the SC 902 and the SC 902L), which can be utilised in a variety of pro sound applications - large concert systems, recorded playback, or stage monitor use in biamped configurations. The all-new Lax MA Series Class H amplifiers, each incorporating an advanced PMW power supply design, TCL circuit protection and NLR circuit design. Add a couple more amps and some sound enhancers and you've got far too many products to list in one go.

Getting away from Cloud Electronics' stand was pretty difficult. Not so much to do with the comfy seats - more the appearance of the Matrix 4. A zonable mixer incorporating pretty much everything that a hotel or similar environment could require. The Matrix can accept up to four XLR-style mic inputs (for mics from 200 to 600 ohms), four separate music inputs (combined to form four mono output signals), has independent EQ for each music channel and is available as a mixer only or with a built-in amplifier.

Spanish company Ecler launched a variety of products at PLASA, including the MPA 280 four-channel multi-purpose power amp. A combination of four separate amps (each of 70W through four ohms), it offers six different combinations: from two bridged channels to produce a conventional stereo amp, four stereo



Paul Ward of Fuzion (centre) with Stewart Graham (left) of Terry Tew Sound and Light and Spencer Brooks of Marquee Audio.



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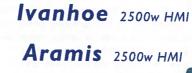




























Silly Advert - Very Serious Followspots





Martin Audio's MD David Bissett-Powell (left) with engineering director Bill Webb.

channels, four mono channels - and everything in between. All made possible by a little switch on the back!

With the opening to Pink Floyd's *The Wall* blasting the eardrums, **Court Acoustics**, on the stand of distributor Delta Sound, demonstrated the power of its new Cube series. A very clean bass (as our fillings will attest), even at low levels, the highs were sharp and separation was clear. Composed of a 15" bass bin and matching twoway high bin, Court is hoping that the Cube will fit snugly between simple PAs and fully professional rigs. And, take it from us, it's very, very loud.

More thunderous demonstrations were being given upstairs by Thunder Ridge, whose extremely highly praised loudspeaker systems have recently been installed into London's a.k.a - the restaurant/bar extension of The End nightclub (which also features a TR system). The new Series 2000 range was on show - if you like your sound clean and loud, you'll like this.

A raft of new mixers appeared on the Allen & Heath stand, highlight of which was the MixWizard WZ12:2DX (snappy name guys). Listing some features should give some idea why: 16 mic/line inputs (XLRs and TRS jacks on all channels), 48v phantom power, four band EQ (all with +/- 15dB cut and boost), constant power pan controls, separate balanced L and R jacks on each channel pair and, to complete this little round-up, peak and PFL LED and switch.

Crest Audio added to its X-range of consoles with the X4 and Xmonitor, as well as the all new P8002 - the first in its new Pro II series. Drawing current throughout the entire voltage sine wave, means that these PowerLok equipped amps require much lower peak/RMS current than traditional designs. This should allow for smaller gauge wiring in power distribution systems, less susceptibility to flip breakers and, always useful, the ability to power more amplifiers from a single circuit

Forget the world's first ever twin DJ MiniDisc recorder (the DN-M2300R), the unique single DJ



Allen & Heath's Bob Goleniowski (right) entertains (L-R) Li Jin Xin, Li Zhi Liang second left and Cai Ti Liang of the Chinese delegation along with Interpreter Linda Wang.

MiniDisc recorder (DN-M2000R), the pre-launch of the company's hard disc replay system - in fact, you can even cast to one side the exquisite DN-2000F Mk3, because the highlight of **Denon**'s stand had to be three yellow and red plastic boxes. Composing two Fisher Price-esque turntables and a similarly-styled mixer and aimed at the pre-bedroom DJ market (soon to be created, no doubt), it boggles the mind that this piece of equipment would a) elicit serious enquiries (it did) and b) take up the entirety of Denon's mention in the post-PLASA report (it is). (See the Sept/Oct issue of L+SI's sister publication S+CSI for more on the hard disc replay system).

When next campaigning for power, one could do a lot worse than visit **Eagle**. Hanging around on its stand was the latest addition to its range of megaphones - the P636w and the P636x. The 636x reaches 20W RMS with a 40W peak, whilst the 636W reaches the giddy heights of 35W RMS and 60W peak.

Sing it loud, sing it proud, sing it full-powered, sing it through a trapezoidal Baltic birch cabinet -EAW debuted its KF400a three-way loudspeaker. The first powered full-range loudspeaker from EAW, the KF400a uses a class H, Close Coupled Power Module, a linear power supply and vertical N-channel Mosfet output devices. The horns have been especially designed - so they don't sound like horns! With an open and clean sound, they sound cleaner than your normal horn, something EAW was keen to plug. With a single 15" woofer, an 8" cone-loaded mid-frequency section and high frequencies handled by a 1.4" exit compression driver (on a constant directivity horn), the KF400a handles frequencies from 62Hz to 20kHz and peaks at 126dB.

Mach Systems' TX series of speakers take as their role model the Danish company's larger speakers to provide a cabinet ideal for mobile discos and small gigging bands. Each of the four



Ken Berger (left) of EAW with the company's product manager Corin Myatt.

speakers in the range (TX12,TX15,TXS15 and the TXS18) is a trapezoidal design in MDF with a strong carpet cover, heavy steel grill, integrated handles and protective metal corners.

Martin Audio showed their new highlyefficient Wavefront Longthrow concert enclosures which, they claim can project further than was possible before, even frequencies above 5kHz. The system includes the W8CT, which includes six 1" exit HF drivers arranged vertically in line and optimised for high efficiency from 3.5kHz upwards, plus three high-mid 6.5" devices take care of the band from 750Hz up to 3.5kHz. The W8CM features two vertically-aligned low-mid horns, each with a 12" driver. This system is well worth a look.

Fane Acoustics added three new drivers to its Colossus range: the 12MB (a 450 (AES) bass/mid driver), the 15B-600 and 18B-600, both high output bass drivers in ported enclosures and capable of handling peaks in excess of 2400W.

"Plug in, turn on, shout out" should be **Fohnn**'s marketing slogan for its new EasyPort FP1 Plus. It's a battery-operated active speaker system, with built-in wireless microphone capability - and can, of course, also accept wired mics. Oh - and it's got a line input too for background music. Music peak is 60W, peak SPL is 114dB, response goes from 70Hz to 20kHz and the whole thing only weighs 6.5kg. The built-in lead gel battery runs for between six and 12 hours and is recharged via the mains. All it needs is a built-in telescopic stand and it'd be perfect.

Knocking the traditional 'black box' on its head, HZ International unveiled its new Sigma series of speakers. Based on its HE range, the speakers have a mottled colouring (or white marble, millstone grey and sandstone if you prefer) and are available in two ranges - handling either 100 or 200W RMS (with average SPLs of 115dB and 118dB respectively). A three-position horn intensity switch (at -6dB and +6dB), auto bass saturation limiter and, if you really want it, conventional black and white boxes.

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Chris Scott with Helen Coleman on the Logic System Pro Audio stand.

GAE Sales UK brought to the party its PA Master DSC28, a digital speaker management system. Combining the functions of crossover, equaliser, delay and limiter in a one rack-space enclosure, the DSC28 is a remote controllable (MIDI) stereo-control unit for up to four-way, high-power sound system applications, with two analogue inputs, a digital in and output which can also be used as a digital insert and four analogue outputs (sub, bass, mid and high) per channel.

John Hornby Skewes unveiled the latest addition to its pro-audio range - the R-Series PA system. Expanding the normal parameters of such systems, the R-Series produces precise directivity patterns when arrayed at either 25 or 50 degrees simply by stacking them appropriately. The RT-112 handles 300W RMS, has a frequency response of 150Hz to 16kHz, maximum output of 140dB, through eight ohms and weighs only 69kg. The more powerful RT-118 pumps 600W RMS from 40 to 250Hz, with 138dB maximum (through eight ohms again) and weighs 36kg.

Neutrik look set to make a big impact with their new Minirator MR1 - a professional audio generator which can produce sinusoidal, square, white noise, pink noise and polarity test waveforms, from a single hand-held unit, at a price which makes it easily available.

Over on the **Arbiter Group** stand, **JBL Professional** was shouting about its MPC Series of power amplifiers, with six recent additions to match with its existing range of loudspeakers. The MPC200, 300 and 600 are all, respectively, two-channel amps offering powers ratings of 225, 300 and 600W per channel into four ohms.

Promising live sound engineers and system designers total control over professional sound reinforcement systems, **Klark Teknik**'s new DN 8000 Loudspeaker Processor was given an airing at PLASA. Combining a five-way crossover with comprehensive digital multi-processing, the DN 8000 is ideal for FOH systems, with 32 user-memories with memory protection and passworded user lockout, two inputs and five fully configured outputs.

The spade we took along to LA Audio's stand proved to be a waste, when we swiftly discovered that the Dig in DigEq actually referred to digital (it was a long show). This has simultaneous 24-bit processing by dual 31 band 2/3rd octave graphic, parametric and shelving EQ, with variable high and low pass filters, compressor/limiter and noise gate. And, to make life simple in this myriad of controls - each of the DigEq's main operating modes can be accessed with a single key press.

Lincolnshire-based **Logic System Pro Audio** unveiled a variety of new products, including its CS1090 cabinet. A fully horn-loaded, two way mid/top cabinet with a 1" cone transducer and a 2" exit compression drive on CD flare. Derived from its continued development of the CS1290 system, the CS1090 promises excellent vocal projection with a remarkably tight output.



LA Audio's Sean Turk (left) with managing director Julian Blythe.

Swedish amplifier gurus, Lab Gruppen were keenest to let attendees know about their Customer Assurance Scheme - for both existing and future owners of its power amps. The Scheme provides Lab Gruppen customers in the UK with the option to extend the standard three-year warranty period up to a maximum of five years without additional expenditure. Once this period had expired, customers can then take advantage of a single, fixed-price repair charge.

Leaf swore that 90% of their products on show at PLASA were new - and they wouldn't lie, would they? The most arresting were undoubtedly the Slim and Phat mixers, through the company's ForceG brand. Aimed at the bedroom DJ (although we can imagine many a style-conscious semi-pro wanting one), both are available in garish (but charming) yellow and also in powered or unpowered versions. As the name suggests, the Slim is the smaller brother of the Phat and features two music channels (phono or line selectable), mic channel, 12-way LED monitoring, fast swop button, cross-fader and 50W per channel stereo power peak. Meanwhile, across on the Phat, add bass, mid and treble cut/boost on all music and mic channels and the master output.

LMC Audio Systems are apparently 'The UK's Largest Independent Reseller of Pro Audio Equipment', but you can read about AKG, Allen & Heath, ASS, Audio-Technica, Beyerdynamic. Beyma, BSS, Crest, Crown, Denon, DDA, EAW, Klark Teknik, Logic System and Shure elsewhere. Suffice to say that LMC offer a 'one-stop shop' through its branches in London and Birmingham.

Millbank were promoting their range of voice alarm and longline communications systems which the company have successfully installed in a wide range of venues. New are the DMS/4/9 digital message store (up to four prioritised messages at 12kHz bandwidth), the FPI/10 fire panel interface (providing integration of fire detection and voice alarm systems), the FS3M fault scanner/controller and the ACD4 Series of Adaptive Class-D amplifiers.

**Precision Devices** were exhibiting their range of loudspeaker drivers, ranging from the high-end professional range (100W to 750W), the Prestige Series (18" and 21" monsters with low-weight neodymium motors) and the Budget Series of 8", 10" (both 100W) and 12" (150W) drivers.

More drivers were on show on the stand of Eminence Speaker Europe. Having recently reengineered and re-packaged their entire product range, the US-manufactured units are now grouped by nominal power rating, from the 100W Alpha to the 1000W RMS Kilomax, which features a medallion-like, slotted aluminium heatsink which exploits air cooling from cone movement.

Eminence drivers also featured on the stand of **Deltec**, a UK company who have been manufacturing rugged, portable MI loudspeakers for more than 20 years. All models in the range are 'slot' ported which the company claim



Steve Wakelin of Neutrik with the MR1 portable audio generator.

provides a higher quality performance in the lower bass frequencies. The range includes 150W, 200W and 300W RMS power-rated cabinets.

The PSW-6 mid-bass reinforcement loudspeaker from Meyer Sound took its first tentative steps at PLASA. With a frequency range of 35 to 125Hz, max SPL of 140dB, two 18" and four 15" cone drivers - man, could this baby take some bass. Think of Barry White with a cold and you begin to get the idea.

The book (yes, book) outlining the features of the XL4 broadcast console from Midas does indeed paint an expressive picture of what is likely to be a popular console. In a paragraph, let's leave it at this: 48 mic inputs, direct outputs, 16 audio sub-groups, separate Hi-Z line input with its own dedicated gain control, XL3 equaliser built-in, input metering covering 60dB in 3dB steps, and VCA and mute busses. Smokin'.

One of a variety of new CD-based DJ units, **Numark**'s CDN-34 unit offered a variety of features sure to become basics on competitors' machines in the near future: seamless looping, on the fly stuttering and, handily, 12 seconds of buffered anti-shock memory - great for mobile use, as well as the occasional installation.

A DJ mixer manufacturer of some 20 years standing, **Elvins** have produced the V808 DJ or 'Vampmix' this year. Unique, touch-sensitive surfaces allow intuitive control for the nimble fingered DJ over high and low cut. Soft switching make this a silent operation and could well represent the future for DJs.

In addition to a stand littered with all manner of speakers, **OHM Industries** was launching its new TRS touring system onto an unsuspecting UK public. From the TRS 112 and 115 multi-purpose, mid-high cabinets, through the TRS 212 (two high-power 12" drivers coupled with a 1.5" compression driver mounted on a 60 x 40 CD horn) and finally to the TRS 218 - with its twin 18" bass cabinets.

The prize for second largest press pack went to **Opus Audio** this year - medical bill for bad back in the post lads. The company was shouting loudest about the launch of its new Contractor Services Department, created to "build a useful bridge between contractors, installers and the experience of the Opus design team." As for new speakers, cream of the Opus crop was the HB121 Sub Bass cabinet. When combined with the company's Focus Wave proprietary pressure guide technology, the cabinet promises that two adjacent HB121 cabinets, when correctly coupled, will output in excess of 140dB peak at one metre. Ouch.

A new concept for audio control was promised by **Outboard Electronics**, and talk of the psychoacoustic phenomenon known as Precedence or the Haas Effect was used to substantiate it: the theory that Outboard's new TiMax system works on will make sense to most ears. TiMax has the capability to route up to 32 inputs to 32 outputs,

with each of the 1024 matrix crosspoints having unique level and time delay settings. This allows for the vagaries of the majority of large fixed installation sound systems, where a time delay is essential to ensure that things don't sound extremely strange indeed.

Audio Design Services launched a totally flame-resistant ceiling loudspeaker for use with voice evacuation systems. The critical factor here is the use of phenolic polymer in the cone of speaker which gives it a heat resistance up to 204 degrees for an hour. It also has o a phenolic backbox to prevent the notorious 'chimney' effect.

CP Sound were exhibiting at PLASA for the third year, following two highly successful previous shows, each one followed by a frenetic year of business. Prominent on the stand were examples of recent CP Sound installation and supply projects - reflecting the diversity of their work.

Metro Audio were entering an entirely new market for them, with the launch of the MA-PMZ88 prgrammable mixer-zoner. Based on DSP technology, the competitively-priced MA-PMZ88 offers fast and easy set-up of all inputs, outputs and other parameters via a menu-driven front-panel LCD display.

Adastra were showing a new amplifer range, the 2000 series, consisting of the 60W, 120W and 240W models, all featuring balanced inputs and zoning facility. The range is complemented by a 250W power/slave amplifier. Also on show, in their attractive, upgraded livery, were the already established range of A55, A56, A68 and A70 mixer amplifiers.

Ampetronic meanwhile, had their new ILD15BB induction loop driver designed especially for use in lifts, where the loss caused by



Sean Griffin of Pioneer accepts the runnerup award for best stand from PLASA chairman Paul Adams.

the the usual metal cage construction prohibits the use of a standard amplifier. The newly-opened Trafford Park shopping centre in Manchester features 18 of the new Otis lift-based systems.

A little-used word is 'matrix'. Thankfully, Peavey decided to call the word out of semiretirement with the release of PageMatrix, a new generation of MediaMatrix and the all new MediaMatrix Cab Series. Used together, they provide an integrated and flexible approach to audio paging applications, offering up to 99 paging zones from one PageMatrix controller and 16 simultaneous paging to different zones at one time. The new generation of MediaMatrix is a full 32-bit application for use under Windows NT. This improves security because of NT's advanced file system (NTFS), as well as offering TCP/IP networking on selected models. Meanwhile, MediaMatrix's Cab Series provides a bridge from analogue audio to Ethernet: the CAB 8i is an eight-channel, input only, 24-bit analogue-todigital converter whilst the CAB 80 provides output only.

Trantec were getting a good response to their new in-ear monitoring system, the S5000 IEM. This UHF stereo wireless system features a half-rack 1U transmitter with a menu-driven LCD control panel displaying both channels of audio level, operating frequency, input level and user name. A user-configurable five-band EQ is incorporated, and LEDs indicate operation of left and right AF limiter circuit and stereo/mono setting. The aluminium-cased receiver runs off a 9V PP3 and has an LCD display for frequency info (64 frequencies in four banks available), while volume control, frequency selection and power and mute LEDs are accessible on the top panel.

Not so much a stand, as a hands-on multimedia adventure in music, **Pioneer**'s stand was a popular hang-out for pro-DJs, semi-pro DJs, bedroom DJs and blokes in suits who wish they (still?) were DJs. Where to start? Picking two of the many new products at random: the EFX-500 is a self-styled "studio range of sound effects" for use in a DJ-set. The EFX-500 features (among others) three-band kill switches, BPM counter (and associated effects - delay, echo, autopan, flanger and autotransform), a digital jog break and a MIDI in/out for controlling the clock signal of attached MIDI instruments. Following on from the success of its CDJ-500 series, Pioneer also launched the CDJ-100s slot-in CD player.

QSC Audio's new PLX range of amplification was around to cool things down - through its use of an Advanced Thermal Management (ATM) system. Using a high-output variable speed fan, ATM pulls cool air from the rear of the amp and propels it through the heat shroud to flow it over the heat sinks - and out of the amp! The PLX range itself includes four amps, the PLX1202 (200W per channel at eight ohms), PLX 1602 (300W per

# STAGING

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Tel: 0171 252 3700 07000 MALTBURY channel), PLX2402 (425W per channel) and the PLX3002 (550W per channel) - all into 8 ohms.

Adam Hall were displaying for the first time the LX Series of professional power amplifiers from German company Palmer, which they recently acquired. These amps utilise high speed mosfet transistors, and all models feature built-in crossover filters, integrated clip limiter, soft start, two-stage temperature-controlled fan cooling and overheating protection. Also from Adam Hall, the new Defender II cable crossover system.

**Formula Sound** were celebrating their 25th anniversary at the show, and even after all those years, it seems that their products are doing better than ever. In particular, the FSM-600 fixed-format stereo production mixer continued to cause a stir at the show, and has, by all accounts, been shifting in large numbers.

One of many visitors from across the Pond, Rane Corporation was showing off its new TTM 54 performance mixer. Built for the DJ market, the TTM 54 includes previously unavailable features such as Hamster and Contour controls for both the active channel faders and an active crossfader - as well as an accelerated-slope EQ which eliminates bass and treble without affecting the vocal midrange.

As well as announcing its recent acquisition by Mackie, RCF also managed to find time for the world launch of its Vision series of speakers. With a total of six speakers in the range, RCF intends to make a sizeable dent in the contracting market. In brief, the PA281 had one horn-loaded compression driver and a constant directivity polynomial horn, the PA261 had two 6" carbon fibre woofers and a horn-loaded titanium tweeter, the PA180SW has an 18" low frequency transducer with a 4" voice coil and response down to 35Hz, the PA152 has a 15" low frequency transducer (4" voice coil) and a 2" titanium compression driver, the PA151 has a 15" low frequency transducer (3" voice coil this time) and a 1" compression driver, meanwhile last, but not least, the PA121 has a 12" low frequency transducer (3" voice coil), 1" compression driver. RCF were also joined on stand by background music providers, Databeat.

It was like the second summer of love all over again round at the **SCV London** stand. Of the wide variety of products the company was demonstrating, Acieeed or (to be more accurate) Acid from Sonic Foundry was the most exciting. A sample sequencing product, Acid contains enough snazzy features to ensure its success: preview any loop before adding it to your mix, automatically match the tempo and key (in real time), click and drag to add or delete loops and because it uses the wonder that is Microsoft Windows (in either 9x or NT 4 flavours), multiple real-time effects can be applied using DirectX audio plug-ins.

Of all the products on show at the Sennhesier stand, the one that caught the eye most was the Neumann TLM 103 condenser mic. A large diaphragm cardoid mic, the 103 is aimed at both home recording and professional studios - with a price more commonly associated with the former than the latter. With a flat frequency response up to 5kHz, a frequency range from 20Hz to 20kHz, 50 ohm impedance, max SPL of 138dB and a rated load impedance of 1000 ohms - start saving up, or speak nicely to Santa.

Kelsey Acoustics were understandably understated at this year's show, following the recent tragic death of their managing director, Richard Vickers. However, a new range of cables were on show, including the Super JTC multicore and the SPL speaker powerline. Features include oxygen-free copper, flexible neoprene jacket, internally ribbed and lubricated overall sheath to prevent twists and kinks.

Electro-mechanical and infra-red equipment supplier TW Electronics were showing products from a number of companies including Ruwido Electronics (infra-red remote controls), Taiwan Alpha (rotary and slide potentiometers), Toneluck (push-button and key switches), Diptronics (tactile switches) and Shia Chyuan (jack/DC/DIN/ phono sockets). Get 'em while they're hot.

London-based distributor PC Werth were showing StarSound infra-red hearing system, manufactured in the US by Phonic Ear. The company were demonstrating the benefits of Phonic's StarSound and Easy Listener FM systems, which are particularly suited to cinema, theatre and concert environments, as they transmit a clearsignal direct to the listener.

Not content with winning the World Cup, French-based L'Acoustics on the Showcom Audio stand, also produced a very nice little monitor in

the shape of the 115FM and brought to Earls Court by Showcom. Capable of up to 130dB SPL, through frequencies from 80Hz to 18kHz, the 115FM uses a 15" speaker and a 1.5" neodynium compression driver to produce a good quality sound. Shaped to offer both near and longer throw capability - expect to see the feet of your favourite rock star astride these in the future.

Install mixers were new for PLASA from those nice Chicago boys at **Shure Bros** (well, via the equally nice folk at **HW International** anyway). The SCM262 offers two mic and three stereo line inputs, stereo output, tone controls for that master output, an internal power supply (goodbye bulky external transformers) and a defeatable ducking function for stereo sources. Meanwhile, across on the SCM268, Shure offers four mic inputs (with phantom power), transformer balanced inputs and output, switchable mic/line level output, LED output mixer and locking XLR connectors. Both mixers are a compact 1/2-rack design.

**Sound Dept**'s merry little band of pro-audio brands (**Community**, **Crest Audio** and **EAW**) are all mentioned elsewhere in this report - but nice stand chaos.

"Our strongest FOH console yet," someone at **Soundcraft** (may have) said (probably the PR person). That noted, there is little doubt that the Series 5 is a great-sounding, fully-featured and (in the great scheme of things) affordable live sound console. Available in frame sizes of 24 to 56 input channels, Series Five is likely to be suited for (almost) any use with a features list including: LCR panning, auxiliary master levels on 100mm faders, full-spec stereo modules, four-band fully parametric EQ on both mono and stereo inputs, eight sub-groups and FX returns.

Looking like a cross between a superstore security camera and a deranged Dalek (personal opinion and not necessarily an insult), **Soundsphere**'s range of spherical speakers demonstrated their omni-directional ability - with recent installations in stadia and shopping centres across the world used to demonstrate their effectiveness.

**Spirit by Soundcraft** attempted to seduce attendees with the Digital 328: a console-based interface that, according to SbS should finally bridge the gap between analogue and digital mixers. Designed to operate like "your old



Jon Ridel and David Harman of Soundcraft show off the Series 5 FOH console.



Sandra Cockell of Formula Sound with Philippe Lecomre of Audia, France and the ETA award-winning FSM-600.



Tony Besgrove (left), Sally Haseman and Martin Gadgil on the SCV stand.

analogue 8-bus console and not like a computer with faders," the team promised that you don't even need to read the manual to begin using it. Its wealth of extraordinary features includes: 16 full spec analogue mono mic/line channels (each with their own balanced XLR connector), inclusion of two Tascam TDIF and two ADAT optical interfaces as standard (allowing 16 tracks to be recorded in digital domain straight away), two onboard Lexicon effects units, Spirit's own UltraMic+padless preamps, motors on all the 100mm faders and the ability to read and write MTC - as well as read all SMPTE frame rates. Not bad huh?

Tannoy ran demonstrations of their new Electronic Cinema system developed in partnership with Barco and SAIT Videohouse. E-Cinema, which uses satellite broadcast and computer technology to transfer audio and visual program material worldwide, will bring major changes to feature film and multi-media distribution. It will also have a major impact on the rest of the entertainment industry, giving brewery chains, for example, greater control over the way sound and vision is used in their pubs, clubs and bars. The company also showed the new T300 SuperDual, its complementary TX3 controller and the TX1 controller for Tannoy's i8 and CPA7 systems.

**Baldwin Boxall** came to PLASA to launch two important additions to their product portfolio. The BVR20 (big brother to the VIGIL Compact) is a 20 x 20 digital processor-based audio routing matrix whilst the Talkback or M2000I, accompanies any integrated 100V line amplifier with a minimum of two inputs and a chime tone generator such as the M2120M.

Signet AC launched two new products for the voice alarm market - the Psiren, a combined



Andy Farmer of Spirit collects the product award for the Spirit digital console.



Turbosound's Alan Wick and Martin Reid with the Floodlight TFL - 760 H5 system.

graphic equaliser and ambient noise compensator which measures ambient noise and adjusts the volume of an announcement system accordingly and the Soundvault, a digital audio store which allows editing of messages via Windows 95. Joining Signet on stand were a new company in the voice alarm market, Clarity UK, who have already taken on exclusive distribution of Signet's SigTEL fire telephone system.

At the loudspeaker end of the emergency

audio market were **Next Two**, who had their comprehensive range of loudspeakers presented on their very welcoming stand, and their salesmen were pleased to see the usual high content of overseas visitors at the show.

**DNH World-Wide**, apart from picking up their product award for the Aqua 30 underwater speaker, were also showing the new MD200 stadium speaker.

**Penton** showed several new products for the PA and voice evac' market. The MSH 30T, which was shown at PLASA last year in prototype form, is a high performance horn speaker, now in full production. A new range of three coaxial ceiling loudspeakers - the RCS5, 6 and 8, offer high quality full-range music reproduction.

Italian PA manufacturer **Paso** were on the stand of industrial loudspeaker specialist **Delta Sound**, showing their new conference system, a new digital message store and arange of slimline column speakers.

To be honest with you, products seemed to be taking a back seat to people at **Turbosound** hardly a surprise considering the recent news. When the management buy-in/buy-out by an investment group comprised of existing and former Turbosound management and two principal customers was announced, eyebrows were cocked at a jaunty angle. The stand promised a "dedication to hospitality" and it would have been rude not to take the new management up on such a kind offer.

The world's first MiniDisc wallet wasn't, fortunately, the only thing that **Ultimate** had to shout about. The company had just got its hands on a set of AKG UHF wireless headphones. Proclaimed as the first of their kind, other than the absence of a wire the sound was equivalent to a



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Mackie's Brian Stan with Martin Warr of Key Audio and the Digital 8 Polls.

good pair of quality headphones - the type of which you might pick up in Dixons: you wouldn't complain about the sound but there's just something missing.

Wow! is the only word to use for **Vestax**. A new reference monitor, styled by the people responsible for the Maclaren F1? Suits you sir. How about a lowered tone arm on the PDX A1 Mk 2, ensuring you don't lose your place when spinning back those black platters? Lovely. But the crème de la crème has to be the Federation BPM FX four-way effects unit. Modesty would forbid Vestax shouting about everything in it - but how does this sound: instant spatial panning, with the bass, mid and treble chasing each other across the stereo mix - and matched to the BPM. Do you want one or two?

**Volt** was displaying its 12" and 18" loudspeaker chassis, using its patented radial chassis combined with a rear-vented magnet. With two cooling systems, the new design offers a massive improvement in loudspeaker performance.

WA Professional Audio exhibited four new additions to its range: the W15B Low Frequency Horn System (600W continuous RMS, 35Hz to 250Hz response and 99dB sensitivity), the W18B extended sub-bass Loudspeaker System (600W continuous RMS, 28Hz to 200Hz response and 98dB sensitivity), the W12F two-way full range loudspeaker System (300W continuous RMS, 55Hz to 20KHz response and 99dB sensitivity) and, finally, the W15F three-way full range loudspeaker system (400W continuous RMS, 45Hz to 21KHz response and 101.5dB sensitivity).

As well as boasting (with good reason) about its repair and refurbishment facilities (one of



Scott Wakelin, Alison Taylor and Paul Fawells of Marquee Audio celebrate the company's 10th Anniversary.

Europe's largest), **Wembley Loudspeakers** was also promoting a number of new speaker flares, including a mid range pro-pack and a dedicated guitar version of the same.

The DS800, an 8-input, 32-output self-contained audio distribution system was launched by XTA Electronics. Each input features a remote activated pad, adjustable input gain, mic/line switch, 48v phantom power, five-segment LED metering and, to top it all off, a 'listen' facility. Oh, and headphone output and associated gain controls also come with the package, naturally.

Marquee Audio were one of several companies celebrating a landmark anniversary in PLASA's 21st year - in their case the 10th. Champagne flowed down almost 100 industry necks when their success was celebrated on stand. The company now have a truly comprehensive product base and a great portfolio of installations to help them into their second decade.

The most exciting unveiling at Yamaha had to be its DS2416 digital mixing card. Stereo digital and 20-bit analogue inputs and outputs, the ability to cascade two cards and eight tracks of simultaneous recording normally slows the performance of all but the most powerful PCs but the DS2416 runs on its own CPU, not that of the host PC, allowing all of the card's functions to be available simultaneously.

Amex came to PLASA from the Slovak Republic, showing their range of mechanical components, 19" racking products and customised panels and cases.

Matrix Audio added a big brother to their UK Power series of amplifiers with the UKP1300, which joins the already available 500 and 1000



Terry Clarke, MC2's technical director, shows off the MC2 amp rack.

models, and was on show for the first time in the UK. The UKP range is aimed at use in pubs, clubs and small rigs. Matrix also revealed an upgraded version of their STR3000 amplifier, which now includes twin, thermistor controlled fans.

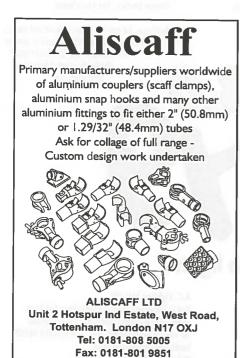
US manufacturer **Mackie Designs** were showing their range of mixers and power amplifiers, including the sound reinforcement series of mixers, SR 40-8, SR 56-8, SR 32-4 and SR 24-4, and the M1400 and M2600 amps. Also on stand, some loudspeaker representation from the company's new acquisition, RCF.

MC2 Audio's range of professional amplifiers for studio and fixed installation applications includes the MC series - 450, 650, 750 and 1250 - offering power from 450W per channel RMS into 40hms to 1250W per channel RMS into 40hms. Parameters in all models are monitored by microprocessor, and can be controlled from a PC.

MTR's comprehensive British-made product portfolio includes their own brand of mixers, power amplifiers, stereo headphone amplifiers, active DI boxes, phantom boxes, pre-amps, etc, as well as the products manufactured by McGregor and Dynamix.

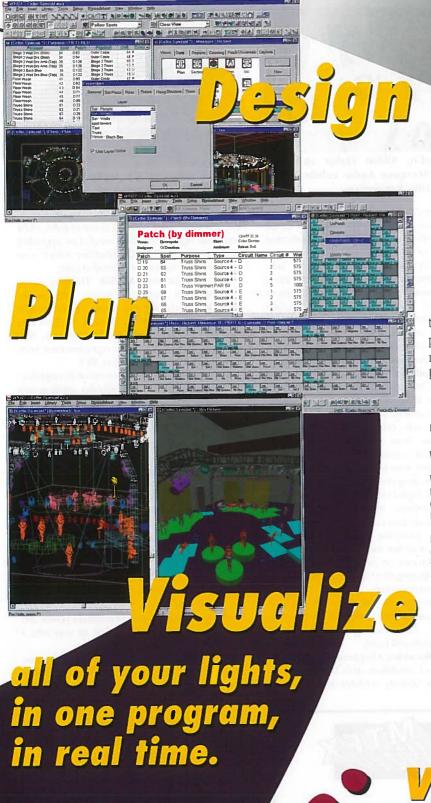
According the men at **Yorkville**, the "latest, greatest and sexiest" was undoubtedly the Hooter B1. In a very (un)subtle shade of yellow, this mic amp/compressor/limiter/gate is intended mainly for home use but - with a built-in limiter, switchable functions, 48 volt phantom power and two outputs - it's likely to find its way into a number of smaller installations.

All in all a good year, and a worthy 21st show. PLASA '99 should be an absolute cracker. Make sure you're there.









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# Second Take . .

# John Watt's view from beside the camera

only had one spare day to visit PLASA this year. Annoying, isn't it, when work gets in the way of your social life? I had planned to make best use of the time by setting off early by train, but arrived at the station only to discover there had been "a fatality on the line" just north of me. Do you feel as out of control as I do once you abandon the car and entrust yourself to what was British Rail? It's illogical I know, but it's rather like an automatic crossfade, you can't influence events once you've set them in motion, but you know there's going to be a dip somewhere.

tting on an autumnal platform, my thoughts fell to the victim who had unthinkingly delayed my start and wondered what had driven him to the ultimate act of desperation. I couldn't stifle the thought that he may have been a lighting man who had snapped when the 'star' of the show turned up once again in a peak white shirt after a month's holiday in the sun at his Caribbean hideaway. Or, alternatively, he may have been an oldfashioned director, dedicated to public service broadcasting, who had just walked out of the 'news unit' because he couldn't bring himself to edit the Clinton stuff from Washington, which exhibited the sort of colour matching which results from a bomb in a paint factory. Either Peter Sissons changes his suit between shots, or they have abandoned white balances (I liked the plum one the best).

The American fit-up studio stuff is a fine example of a set-up organised by terribly clever people unencumbered by a designer, or common sense either. Why else have the seating glued to the backing - can't any one use an iron. Haven't we had enough half empty offices as backgrounds? I know it's news and we are deemed to need it relentlessly on several channels morning noon and night, but does it have to look crap?

nyway, I digress. I eventually arrived at Earls Court intent on finding the difference between a VL5 and a VL7, and determined to find out if a Wholehog is the best thing since sliced bread or whether it's just a curly tale. Once inside, all thoughts of self-improvement vanish under a tidal wave of social intercourse - a bit late for most varieties of either I hear you say. Too many coffees in, plus the odd glass, I realise that I haven't seen a single light or control system. I've heard that there's now a Source Four Zoom, so I trek along to ETC Europe's stand expecting to be given the treatment as I reckon I use more of the fixed beam type on TV than most. Once there, I play with that one intriguing knob, but with neither power nor a salesperson I can't work out whether one is better than two - I'll come back later! Off to Lightfactor, where they know that the likelihood of selling a dozen Studio Colors to yours truly is nil, but Mike Wood is over from the States where he runs R&D for High End and it's great to see him and catch up. Mick Hannaford too, busy as hell but glad to see me. An hour later I get back to ETC

and finger the knob once again; they seem to all be having a jolly time, but like Frank Windsor says on that health insurance commercial for over sixties, you will not be pressured to buy and no salesman will call - I'll come back later.

search for ARRI's stand but it appears I've got to go to IBC to catch up with them. The same applies to DeSisti - the length people go to to avoid me! Strand had a sort of garden got confused over the date of the Chelsea Flower Show I suppose - there may have been lots of lovely Quartzcolor gear in there, but I couldn't see it for the trees. Glantre provide an equipment-free zone, as they can't afford an ocean liner-sized stand, but commodore Gilbert runs a tight ship on the upper deck where first class passengers like me are entertained. An hour later via an ebullient Don Hindle and CCT (more dinky lamps than you can shake a tweaking pole at) I arrive at ETC; a busy stand with lots of people looking at high tech' control systems. I give that single knob a surreptitious tweak and sneak off undetected. I'll pop back later.

eatro provide the obligatory Italian cheese, whilst Francis Reid and I attempt Mike Lowe's 'Red' which, with the simple addition of a copper and silver plate would be good for a couple of volts on anybody's Avo. My teeth haven't looked so good since Mum ran out of sugar for the rhubarb pie. Just time for a quick circuit past ETC's stand on my way to Vari-Lite's do. A disembodied voice announces the exhibition is now closed so I leave a card in case they ever run a free draw, and wipe away a tear for a love affair that really never had a chance. Coral (Vari-Lite's 'come up and see me some time' girl) says that she will give me private lessons on what makes moving lights tick (wondered what the noise was). She's got cards all over town promising to do just that, so I won't knock it till I've tried it. It's only a matter of time before they appear on inserts to the news from the green outside of the Commons, smoke provided care of London Transport.

n the interests of fair play I've done another show at TV Centre (they couldn't pin anything on me last time, not even the visitor's pass) and it was a good experience everything worked, from the car park to the rig. So they have a hoist system like dogs have fleas, but it's a challenge that the ever-willing crews have learned their way around. It is hard working with double enders lamped with three-and-three-quarter Kilowatt lamps when five Ks are built into your head. Julia, my first ever lady racks op', pretended not to notice the resultant low levels - any other sexist remarks will be edited by my lady editor. We should never have given them the vote.

ction Times 'Who Wants To Be a Millionaire', took my breath away with the potential value of its prizes indecent somehow - maybe my unease stems from my lack of general knowledge, not that this inhibited the contestants. I can only hope that some of this record budget filtered through to the lighting department. I thought it looked fabulous, a great set lit immaculately by the indefatigable Laird (the spellchecker says try 'lard') of Bournemouth, Brian Pearce. We had lunch recently at Teddington, which says something for the man's forgiving nature, during which he attempted to convince me that all LDs share the same problems (I wish). Not strictly accurate, as he is a bit of a thousand pounds a shot man, whereas I'm more of a thousand shots a pound bloke. But still his skill might be contagious, like German Measles, so I stayed close and the sparks passed by muttering "Who's that sitting with John Watt?"

ent to the David Hersey platform at the National, which preceded a party to mark his departure on a two-year sailing trip around the world. Yes, he sails too. I'll try to be more versatile when I grow up. He was endeavouring to explain his philosophy on lighting and the part it plays and I commend his definition as quite the best I've ever heard. He said it's the glue that holds a show together. Well, in his time he's produced some rather special 'glue' as we all know, but I shall unashamedly pinch that phrase whenever anyone asks me what lighting is about.



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# ON TOUR

by STEVE MOLES

# **AND PRODUCTION NEWS**



# Mike Oldfield

Horseguards Parade

LD: Steve Nolan

SD: Gary Bradshaw

Mike Oldfield has changed little since the days when he first toured, back in the late seventies. He still approaches the stage like a stockbroker who's had his meal spiked with psilocybin at an uproarious City party. Smart suit, stiff back, but on his face a slightly bemused expression - like the world doesn't quite look how he remembers it today. Well, bemused he might look, for having turned out what, by general concensus, is his best piece of work for 20 years, he's promptly dumped on by the weather. It had been threatening all day and an hour before the show it began. Slow, steady drizzle at first, light enough not to bother covering your head even, but the type of drizzle that if it persisted would soak you through in an hour. Well, an hour later and it had developed a decided muscularity - only a madman would have wagered it would pass.

Oldfield hit the stage as 7,000 Englishmen (I use the term loosely, without sexual . . .) sat getting quietly drenched. A compressed Tubular Bells 1 opened the show; a brief 15 minutes of reverie, it sounds as soporific now as it did then. Then Oldfield raised his right index finger skyward. You're never quite sure with this man whether he is signalling the audience to 'spin on it' or pointing

to the rain, but then explanation comes as loud thunder cracks resound from the PA. Tube 3 starts and, as if in harmony, the rain increases to Mancunian ferocity. Some 20 mintues later, as we all sit wet but (it must be said) entertained by an eclectic mix of styles and sounds, the lighting power over stage goes off. Water and electricity never mix, but this was a biggy - it was at least 10 minutes before illumination was restored, and cripes, the show was being taped for broadcast, and being transmitted live to Spain. Much embarassment for VLPS and Generator Co, both of whom should know better. But water will find its way. The thing is, this was a great setting -Horseguards Parade behind, St James Park opposite, long lingering camera shots revealing the Westminster skyline, Big Ben, Nelson's Column, and with only the most powerful residents in England to contend with, no sound level problems. There's a market there for a 10,000 seat temporary structure with a transparent covering.

### SOUND

I lied about the sound level problems, there were loads, but none for the performance. Trouble was, on the first night of full rehearsals (world premiere don't forget) Parliament was unexpectedly recalled to pass anti-terrorist legislation. Very contentious, apparently the proposal was to pass a law akin to giving Local Authorities the right to set sound level, police them, and then also have the right to decide guilt or not and impose sentence.

When rehearsals were permitted, a catalogue of errors made these less than they might be. Just as the green light was given, the main sound generator and its back-up were being synchlocked, and of course, promptly fell over. And so it went on. Steve Nolan, who production managed the event, reported that a full run-through only finally happened the night preceding the show. But then, as Oldfield's long-serving boffin Richard Barrie pointed out: "When we went on stage in Edinburgh a few years ago to do Tube 2, no-one had ever played it all the way through before."

Gary Bradshaw was the man charged with bringing full CD fidelity to Oldfield's detailed and finely textured output, and he had a few helpful props that more than compensated for the shortcomings. "We did have two weeks of band rehearsals in Park Royal," though so crowded that Bradshaw's control area was a corridor outside the rehearsal rooms. "And best of all, we had his 48- and 24-track digitals, so I was able to take recording from the rehearsals, route them exactly into my XL4 as I would for the show, and set up accordingly." Now that is a luxury. Plus Bradshaw had completed a tour with Hank Marvin a couple of years previously, so he was well used to an aeging guitar lothario.

The big thing for Bradshaw, and Oldfield for that matter, was the use of the now well known V-dosc PA system. A familiar story of Lars Brogaard's involvement unfolds. "In the early days, Lars was the production manager for the show (increasing commitments with Rod Stewart prevented completion) and he recommended I try V-dosc for



this show," said Bradshaw. "I'd used the system a couple times on festivals, most recently at the Water Fest in Scandinavia for Simple Minds. Just eight cabinets a side, graphics flat, and I'd found good low end though there were no dedicated subs in the system, and great vocal sound. I thought then, 'any opportunity I get I'd like to use this', so I took Lars' recommendation."

The opportunity was also realised by the new Vdosc UK dealer, part of the growing V-dosc Network. Not the first show for Paul Nicholson who runs the 'franchise' (for want of a better word), it was certainly the most prominent. The nice thing about this show, and it's worth pointing out, is the nature of the Network. "We're a stand alone company," explained Nicholson. "A dry hire facility, though we will provide a system engineer if you need one," as indeed was the case here. The thing is, everyone in the Network has the same pricing structure, although I've got 42 main system cabinets (and 16 of the dedicated SB218 Subs) I can cross hire from other Network members at the same price." As was the case here, the system coming from Westfalen Sound, who also provided Christian Schmidt as systems engineer and, coincidentally, both Brogaard's XL4s from the Eros Ramazotti tour.

Bradshaw had a couple of interesting observations on this show, as opposed to guesting on a festival system. "It [the PA] does behave differently. The coverage is really, really good. Normally when you walk away from the desk you find pockets where there's a drop in level. With this it's all even. There's no need to compensate like you'd normally do."

Something to bear in mind if you don't get the oportunity to 'walk the room'. "Being able to use the rehearsal tapes to playback directly into the desk channel it came from was a big help in building up a mix without the band. But also it means the artist can come and hear exactly what you're doing. Oldfield likes to be deeply involved at all levels." And as Bradshaw reminded me: "When he first went on tour he used to come out and mix the opening act," an assertion I can vouch for, having been there myself.

There's enough been written about V-dosc to warrant saying little about how it sounded. Impervious to the light winds and rain, the performance was relayed as Oldfield had programmed it. Which is perhaps one of the

failings of the show - not the system. Oldfield is such a perfectionist that the 12 musicians on stage were almost superfluous, often doing little more than providing the triggers for a complex network of MIDI links and samples. That might be the way Oldfield originally recorded it, but does it really make sense for percussion to be triggering keyboard sounds? It makes the listening experience akin to watching live animation - a cartoon of itself.

### LIGHTING

Nolan was already in place as lighting designer when Brogaard had to pull back his involvement with the show. Nolan's track record in production made him a natural successor, though it was a hairy ride to pick up a production so late in the day. "The trouble was Lars was in the US with Rod [Stewart] and mainly on the West Coast, so I'd encounter questions that needed to be answered on a daily basis, which of course had to wait until evening before I could contact him for an But as for lighting, "I'd been answer." recommended to Clive Banks [Oldfield's manager] by Dave Hill who'd done the last tour but was now busy. I went down to Oldfield's house and he went through the album with me, explaining what he was thinking when he wrote each piece. The music has clear moods, there are distinct effects, like the thunder and lightning, that make it easy to interpret in a literal way."

There are really two elements to Nolan's remit: lighting the stage for the cameras, and lighting the auspicious surroundings, also for the camera. VLPS was his chosen production company, a big system of VL5s and 6s on stage, plus plenty of Pars, towers decked with Pars to light the audience, NAT 2.5kWs [from SpotCo] and VL5Arcs for the buildings and trees. "The Orbit roof [from Serious Structures] is perfect for this kind of show - you can wrap the performance area with lots of back and side light for the cameras, which is exactly what I've done. There isn't a place on stage where the camera looks into darkness," he said, tempting fate a little too much on this occasion.

Because of Initial TV's involvement, the running of the show is a big operation. Aidan McCabe had an Artisan for the building lights, Theo Cox from

SpotCo ran the NATs off a Wholehog 2, and Nolan brought in the ubiquitous Mark Cunniffe to programme and run the main Vari\*Lite system for him. Nolan took care of direction and operation of the Avolites Diamond 2 for the conventional system with input from TV lighting designer Daryl Noad.

What appeared on stage was thick and luscious: nice colours, especially some well-chosen metallic tints that really suited the ethereal Indian vocal passages which punctuated the proceedings. Note should also go to the NATs, throwing powerful gobo patterns onto distant trees with considerable force. A shame it all went so embarrassingly wrong.

Still, the music was well received and for me personally this is the most exciting thing he's done in years, and you have to acknowledge that he is a craftsman when it comes to integrating musical styles. Combining the rigours of drum and bass (no doubt picked up during his relived hippy era in Ibiza over the past couple of years) with Indian folk chants sounds a recipe for disaster, but not with this man. In the end, not a great live performance, but a good tune. Perhaps he should get out more?

# **Embrace**

# Doncaster Dome

# LD: Steve Somerville SD: Millward/Guerin

Wallowing in the vacuum left by Oasis, Embrace take a more measured approach to their chosen task as guitar band heroes. Rushing in to fill a void is not all it's cracked up to be, but a slow steady trickle into the cup of fame may see this creamy band rise to the top. Oasis makes for a wary comparison - there are several bands who might aspire to that mantle, the Stereophonics being worthy contenders for one, but whatever the competition, Embrace do fulfil the essential criteria. The guitar base sound is the same, though the solos tend to be more rocky, the complexity of musical texture is deepened by the addition of keyboards, and the vocals . . . how did it go? "You're my wonder wa . . au . . aul."

Embrace do have more to offer, and talking with their tour manager Gary Robinson, it seems they are in no rush to burn out on the way to getting recognition of that fact. "The good thing is we are at a point now in the UK where the group are about to move to bigger venues, but instead we are going off to do America and Japan. Although they do good business in Japan, America is still a club circuit with band and crew on the same bus and a bit of gear in the bay."

Keeping their metaphorical feet on the ground may be a factor of their management, personified in Tony Perrin, whose steady hand (he's looked after All about Eve and the Mission in the past, to name but two) determines which markets they play when. But there's an ethos here too, both Dave Millward and Dave Guerin on FOH and monitors attest the accessibility of the band: "It's a family thing and you can tell them to behave." You get the feeling that next year, when they return to Europe and a possibly much grander tour, they will not be going through the usual, 'oh we're in the big league now' and the subsequent 'time for a new sound engineer' scenario. Let's hope so, because they'd be hard-pushed to improve on what they've got.

### SOUND

One of the benefits of a couple of hits beneath the belt is the money to spend on gear. Embrace are a loud stage act and as such this has coloured the house mix in the past. The obvious solution is to go the 'in-ear' route, which is what Guerin and Millward have persuaded them to do this time around with a Shure system. "The guitars are still very loud," said Guerin, "but for the keyboard player I use just a couple of E3s which puts everything he wants right in his face. The drummer has a combination of Max wedge, inears and a shaker, and I've got four Maxs for the rest of the band."

The d&b Maxs are an unusual wedge to see with a rock and roll band, or rather, a rare one, but Guerin specified them and considering the loudness of the band on stage they appeared more than happy. The drummer's shaker is the latest from Aura and Guerin finds it a less usable beast than its predecessor: "Its seems to work around 100Hz, whereas the old one was lower, around 20Hz where a sub-harmonic effect seemed to give it more kick, this seems more suited to a home cinema system."

Which may, of course, be exactly what Aura are aiming for, but that doesn't help here. Guerin is using a Midas XL250, a desk he's not entirely happy with - some niggles about the ergonomics of the stereo pots - but significantly this one sounds a bit of a rogue, with cross talk all over the place (something Midas were in the process of rectifying). But he copes admirably, and the band looked happy enough in performance. As did Millward, who's been mixing front-of-house for the band for two years now, "from when they had no money," and is evidently not afraid to take a punt. Wigwam supply his system of choice, a d&b 402, which he's "really into using since I first came across their F2 systems when touring small German clubs. I also like the L'Acoustic Arcs, though I've yet to use them as a main system. The 402s are speakers you can point and know they're going to cover."

Millward has a relative newcomer for a front-of-house desk, the Soundcraft Series 5 (Guerin is eagerly awaiting the monitor version, too). "I chose it for two reasons; something that had a MIDI controller, or could be controlled by MIDI. It's not that the effects set-up with this band is especially complicated, but if you've got to change even three different things between songs then you're thinking about that rather than mixing the show. This lets me concentrate on what I'm supposed to be doing. The other thing is I've been a fan of Soundcraft since I started, the Series 4 was my favourite older desk."

Both of which may have been contributing factors in Wigwam's decision to buy one for the tour, an indulgence by them when you consider the number of Recalls they've recently purchased. With the Series 5 fresh out the box Millward is, in his own words, "having a lovely time. It's proving more flexible than I imagined, the matrix is straightforward, and having 10 VCAs is great, though I've already found I'd like 11."

Which is ironic as Millward admitted that when he first specified the desk, he wondered what he'd fill them with. He hasn't got onto the Data-Fade facility yet, but this was just seven shows into the tour and judging by his enthusiasm, he will soon.

As for the mix, he found the vocal straight away and never lost contact with it, despite starting the show at a fairly blistering level. The guitars were



very loud - I suspect barely in the PA a lot of the time, but it was quite evident when he brought them forward for a solo, the quality of their sound actually improved at volume. He's working with good material too - I didn't hear a poor song.

### LIGHTING

Steve Somerville has been designing for Divine Comedy of late, and will be returning to them shortly, so in terms of the Embrace family, a bit of an interloper. However, this was not a strap-on generic light show - two simple trusses with roughly two dozen each of VL5s and 6s (VLPS being the supplier of all things lighting) were used with considerable imagination to provide an interesting and varied show. "I do a lot of asymmetric looks to keep the crowd's attention, that's why the rear truss is low, so I can shoot beams up as well as down. All the show work is done by the 5s and 6s."

This last statement is slightly disingenuous: Somerville also had six bars of Par 36 ACLs standing vertically on stands back of stage, and just a few Par 64s on the front truss, both of which he worked quite hard. Couple that with the six Diversitronic strobes, reinforced with heavy strobing from the VL6s, plus 60 egg strobes and a Starcloth, and you've the makings of a textural repertoire for what was essentially a bare stage. He uses an Avo Pearl 2000 for control: "I always use one. It's fast to programme - once you've got your initial cues in it's easy." Which makes light of just how hard he worked the desk, switching from big multi-colour looks, to angular beamy patchworks, or just simple cross-colour fades between the VL5s split into two groups.

Then there was the coup de grace to end the show on a high. Built by Brilliant Stages for the band's Glastonbury performance, the EMBRACE sign - comprising some 108 DWE Par 36 bulbs - fills the full stage width and when it blasts out for the finale, leaves a subliminal message burnt into the retina for all the fans as they trudge their weary way home. This is rather a short lighting comment, but that doesn't diminish Somerville's work, lots of ideas, plenty of fireworks, I look forward to seeing him use a bigger system.



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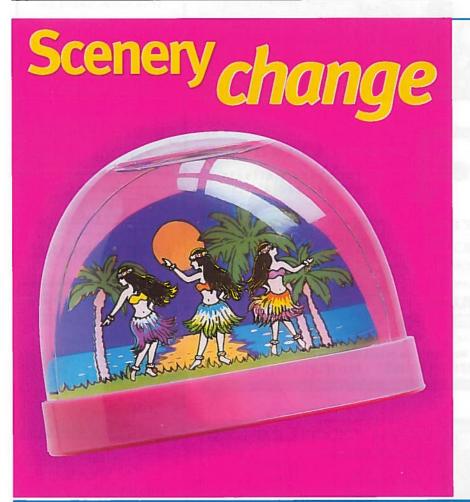
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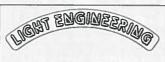
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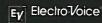
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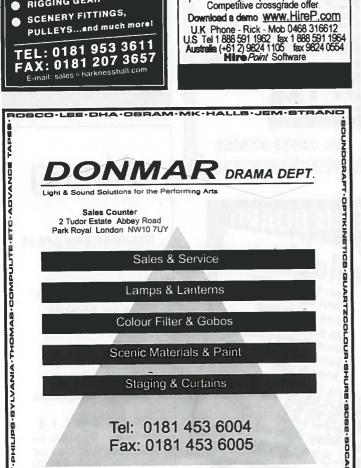
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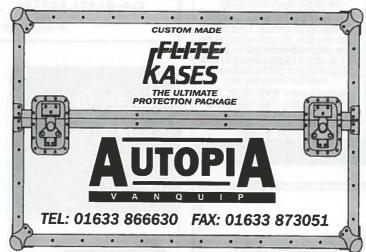


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# Kyle Nelson-Cook talks to lighting designer, Peter Barnes

Not one to shine media light on himself, Peter Barnes usually allows his work to do the talking. But, while in Dallas recently on the final US date of the Spice Girls' 'Spice World' tour, Barnes openly conversed about his views on the professional lighting industry and his place within it. As show producer for the 'Spice World' tour, Barnes created a 'space age' set that some have criticised as being overly commercial, with its flashy images and warp speed feel. Truth is, the show was perfectly suited to the glitzy gals of glamour and their mostly teen-aged audience.

"A lot of people think it's not credible doing a show like this," conceded Barnes, who, at 43 is secure enough in his person and profession to take the criticism. "I think it's quite fun. For a lot of kids seeing the Spice Girls, it is their first show. That makes it fresh. It's like when you're a kid and you liked getting presents at Christmas - as you get older, you like giving presents to other kids. Both are equally rewarding, it's just a different thing."

Father of a 10-year-old girl, Joanna, Barnes is in touch with today's youth and what captures their attention. Not only does he understand and respect the power of pop culture, he makes no apologies for feeding its appetite. "I like what is new - what's happening now around you," he explained.

As a result of both his youthful outlook and 25 years of lighting experience, Barnes has developed a keen sense of what it means to give people what they want. "In a certain way, we are all prostitutes of our profession. We all have to sit down and really think what the audience would like and what the band is trying to put across," he said. "To succeed in this industry, you have to be adaptable. It's difficult sometimes, because you do tend to get typecast for doing certain types of bands, and bands tend to hire you when your portfolio includes a band they like."

Born in the north London suburb of Enfield, Barnes was the youngest of two children. While his father worked as a factory production manager, his mother cared for him and his older sister. Barnes got his start in the



entertainment industry at 16 by literally working his way through the gate at local shows including David Bowie, Deep Purple, Genesis and Lynyrd Skynyrd. "I figured out, if you gave the guys a hand with the equipment, you could get in."

Barnes managed to save some money by working in a local factory, then he and two former school mates, Colin Jones and George McDuff, purchased equipment of their own and opened Chameleon Lighting. Barnes' first tour was with Alexis Corner in 1975, but it was the opening act, Back Door, that provided him with his first real break. "They invited me to continue touring with them full-time, doing monitors and looking after their gear. But I wound up tour managing and everything else."

A tour with the legendary James Brown soon followed, as well as work with punk bands like Magazine and Sham 69. Though he tends not to reminisce or romanticise about the past, Barnes remembers the punk era as an especially exciting time: "It was very live and very real," he said. "I think these days we could do with a bit more live energy. Now we do more with computer programming - which there is nothing really wrong with - but it was a lot more fun in those days, because everything was really, really live."

Barnes' first American tour was with Renaissance in 1978. He spent the eighties with bands such as Big Country, Siouxsie and the Banshees and Bros, while continuing operations at Chameleon. This decade's tours include East 17, EMF, Eternal, Kula Shaker, Lisa Stansfield and, of course, the Spice Girls. Chameleon was sold to Meteorlites in 1992 (subsequently bought out by Bandit Lites), and Barnes continued working for the company. Through Meteorlites he began in television and film work, lighting the Royal Variety Show, ballroom dancing and Smash Hits. After 18 months he left Meteorlites to become an independent agent, and now feels liberated. "No longer when my phone rings at home do I worry that it's someone in a remote part of the country with a blown lighting desk," he said. "Now, it's somebody offering me work or

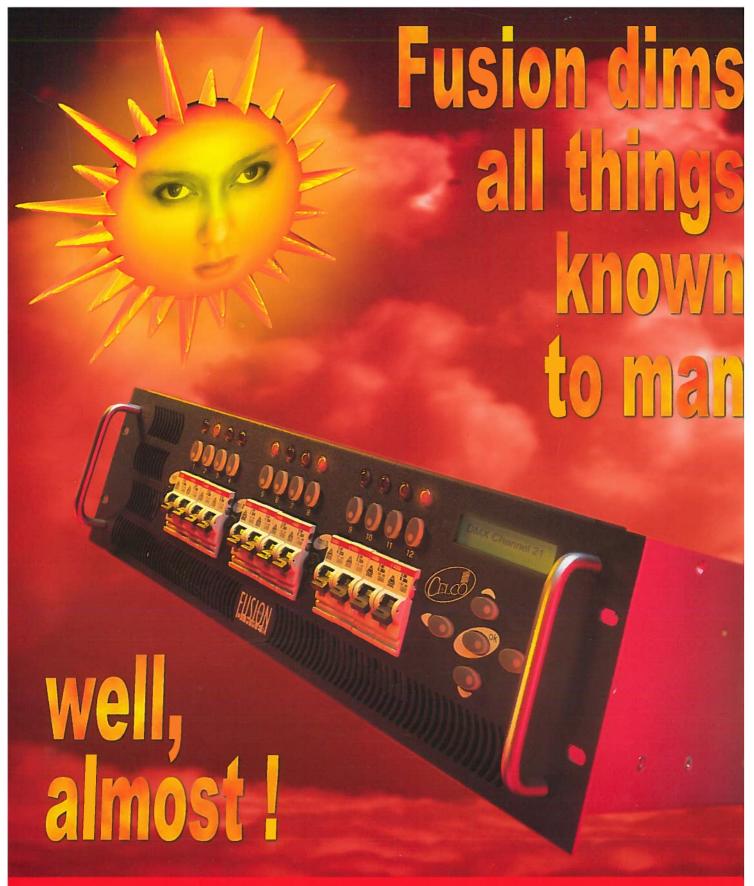
inviting me out for a drink. I much prefer it this way."

Barnes says working freelance also affords him greater job opportunities. "When I first started in the industry, the band hired the lighting system and the guy who came with it was the guy who operated it," he recalled. "Whereas now, virtually everybody wants a 'name' designer or sound engineer. When I was running my own business, people who wanted to use me had to use my company. That tended to negate me from some jobs, because many tour managers and production managers obviously have their favorite companies. Maybe that's one of the reasons I'm now able to do larger acts."

With a marina residence on the River Thames in Brentford, Barnes is comfortable, but not over-confident. "I guess right now I'm doing well, but you never can tell," he surmised. "I always keep my feet on the ground. Some people may think they've made it when they get an act like the Spice Girls, but you can never tell what's going to happen."

In fact, when he was 25, Barnes told himself he would be out of the business by age 30. The plan obviously didn't hold. "It's a bit like growing up, isn't it? I don't know if I want to grow up. I'd rather be Peter Pan. What's wrong with that? Many people - particularly in this industry - their hearts are sill 18 though their bodies may be 50, and I think that's quite nice to see. I don't like to see people who are all grown up and trying to be young in other ways. I'd rather grow old gracefully."

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