

# STRANDLIGHT

THE INTERNATIONAL JOURNAL OF STRAND LIGHTING

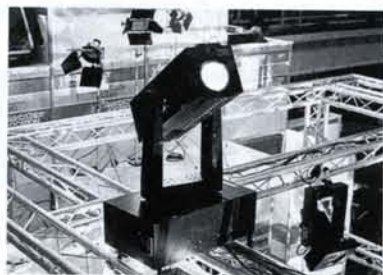
## Litescan and Task Master New at USITT & BKSTS

The latest Strand automated lighting system was launched on the U.S. Market at Minneapolis at the U.S.I.T.T., and in Europe at the B.K.S.T.S. show at Brighton.

### What does Litescan Offer?

#### The Lights

400 watt HTI lamp source  
Individual control of:  
Pan — 340° Tilt — 335°  
Colour — 16 different frames of colour  
Iris — with auto zoom focus  
Focus — hard edged from 20' to 70'  
Speed — variable control. Point to Point programmable from 2 to 15 seconds  
Blackout Douser — smooth dimming over 255 steps  
Gobos — 5 gobos plus clear  
Repeatability to ±1%  
Individual Indicator lamps for fans, motors and ballast.  
Ballast selectable for world voltages. Single cable carries power and control signals.  
Covered by Strand Service for world wide back up.



1. A 400 W. HTI Lite Scan. Units can be mounted to shine upward or can be suspended. Pan — Tilt — Colour — Zoom — Gobos — Dimming — can all be remotely controlled and memorised.

#### The Control

A Task Master desk can be engineered as part of a Lightboard M memory system, or can be used as a stand alone controller.

Designed as part of the Lightboard M series of consoles, Task Master allows integrated control of standard dimming and of the entire show-changer range.

#### The Task Master Offers.

99 control channels  
250 memories



2. A Task Master desk-top section of console, above a Lightboard M1 — can control any number of lights on 99 channels with 250 memories. Left of centre is the track ball for pan & tilt setting.

Track ball position control with push button selection to give pan or tilt individually or both simultaneously. Will control unlimited number of Litescans, Parscans and Colour Scrollers.

Will control Litescan Iris, Douser/Black Out, Gobos and Focus. Programmable speed of movements and of colour change.

Control of up to 16 colours. You pre-select colours and order.

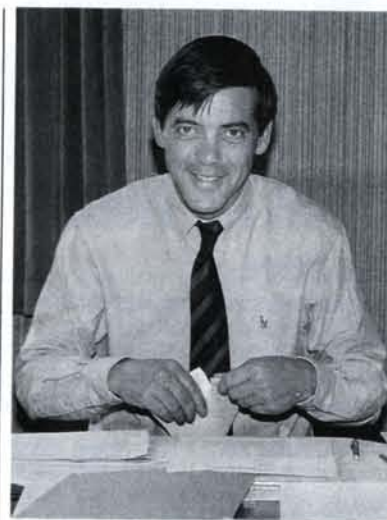
Will control up to 5 gobos and clear on Litescan.

Optional disc drive unit for library storage.

Back up by 45 day capacity battery.

Special Note: This is a system which can be purchased. Some competing units may only be hired and often with operator only.

Your own staff can operate Litescan and your Strand Agent can service it — if ever necessary.



## Michael Jukes, New Managing Director of Strand European Operations

Prior to joining Strand Lighting Michael Jukes spent 21 years involved in the design, manufacture and marketing of electronic components to the Aerospace, Defence and Information Technology industries. The last nine years he held positions of Managing Director of ITT Cannon for 7 years and of Amphenol Products for 2 years.

An engineering background and quali-

fications gained through an Engineering apprenticeship were the foundations of his career, which has included extensive international experience.

Married to Patricia, a Cordon-Bleu cookery teacher, with two grown-up sons, Matthew and Simon, he has homes in Kent and in London.

## Galaxy & Light Palette: Two World Beaters

by Bob Anderson

Bob Anderson B.Eng., C.Eng., MIEE, MCIBSE, is a very widely experienced theatre and television consultant. He was a member of the BBC Capital Projects department where among other duties, he specified studio lighting controls. He later joined Theatre Projects Consultants and now practises independently. He seemed to us the ideal person to sort out, and pronounce upon, the world's two leading Memory Systems.

Looking round the theatre and television lighting exhibitions and trade shows in the western world one is struck by the number of different lighting control systems on offer. Everyone, it seems, who can write a few lines of Basic, immediately moves on to production and promotion of a prototype memory system in the innocent belief that the 'big boys' have still not woken up to the simplicity of the problem. Ask even the more established of these companies how many systems they have sold, however, and it becomes apparent that the market rarely responds with enthusiasm to the simplistic ideas of what lighting ought to be about that come from computer specialists; the successful systems rely on in-depth knowledge of the problems of rehearsal and performance and have been built up on experience developed over twenty years or more.

Strand undoubtedly have this sort of background and, as a consequence, have not one, but two world beating lighting controls to boast about, Galaxy and Light Palette.

The two systems are microprocessor based and offer all the helpful facilities that have come to be expected from big top-line memory boards, but they are very different in detail and satisfy the needs of two different markets, for the simple reason that that is what they were designed to do.

Galaxy was developed in London by the team that had moved memory control from

electromechanical relay systems to mini-computer based electronic systems. IDM was launched in 1966 and was soon followed by DDM and MMS, initials that will be remembered, by those who used these systems, as milestones in the progress from erratic and expensive novelty to affordable, reliable and essential lighting tools. Names such as David Baker, Martin Moore and Dave Bertenshaw must be credited with the technical work, aided and occasionally irritated by the wealth of wisdom always on offer from Fred Bentham and, though cleverly concealed, by the ambitious demands from their more eloquent customers. The customers, indeed, determined the main characteristics of the ensuing development. At first, only television could spend the necessary amounts of money and so the central philosophy became concentrated on plotting, refining and storing lighting states, with performance facilities in second place. Then, Richard Pilbrow, head of Theatre Projects, the consultants for the British National Theatre, challenged Strand with his specification for a theatre biased system. The result was the original Lightboard, a supreme theatre system that was also, unfortunately, too expensive for the majority of theatre customers. Naturally, a cost cutting exercise had to follow and the result, at an affordable price but with very few compromises in performance, was Galaxy, which was launched on the market



in the summer of 1980.

Meanwhile Strand Century, at that time a separate company with Broadway as their main focus, had been doing their own thing to satisfy the needs of the American lighting market. Led by the late Chuck Levy, Strand Century went to the leading lighting designers and asked them what they wanted from an ideal memory lighting control.

Legend has it that Jean Rosenthal, at an earlier date, had asked for the then infant computer systems to give her what six touring boards and three very good electricians could provide:— six lighting moves separately controlled, moving at different speeds all from a single 'go' command on the stage manager's cue. Hence were born multi part cues with independent manual access. The board designed in America was optimised for performing complex cues, with six part fades, memorised delay and follow on times, immediate access to fade times and — most significantly — a rolling electronic cue sheet detailing all the active information on a black and white television screen. With

continued overleaf....

## New Control Systems at the National



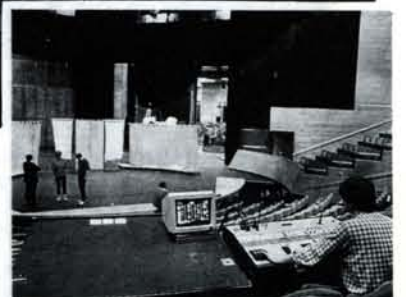
In the Olivier Control Room.

To me it seems only the day before yesterday that the National opened. However, it has been long enough for Britain's No.1 drama theatre — which must be the Olivier — to decide to take advantage of the latest control system technology by purchasing a Strand Galaxy.

#### System Specification

768 Channels.  
4 Theatre Playbacks  
Programmable Effects Panel.  
3 Channel Controls.  
2 Group Masters.  
2 Memory Output Channels.  
768 Channel Memory Back-Up.

For the Cottesloe's much smaller auditorium the National Theatre chose a Strand Gemini.



The Olivier Galaxy stalls control in use during a rehearsal. The table is meant for lighting plots!

## STOP PRESS

The National Theatre have ordered their third Strand Memory control system. A 528 channel Galaxy 2 Premiere for the Lyttelton Theatre.



# FROM THE EDITOR



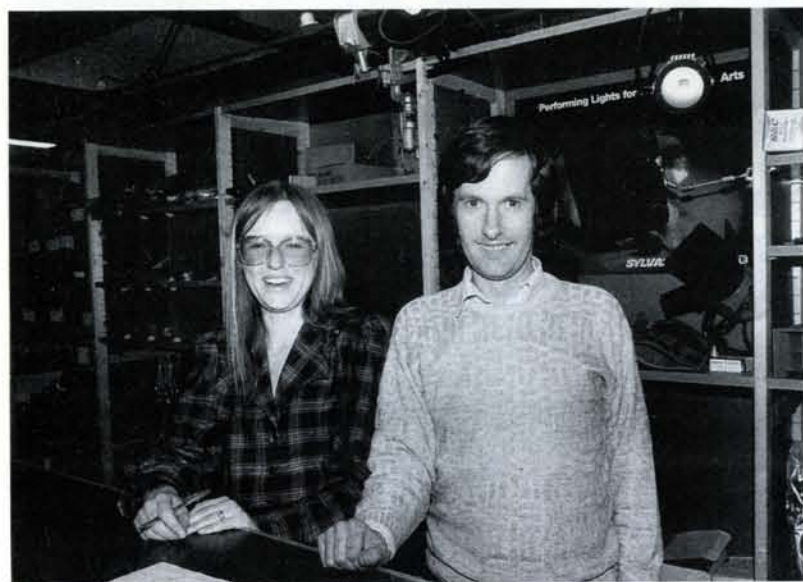
## Great News from Granada

Granada Television, based in Manchester, have decided to follow the mainstream and have chosen a Galaxy for their Studio 8.

Their system has a special pod incorporating memory and output panel channel control, studio playback, pre-set masters and programme effects panel. There are 240 channels, with the delightfully named, by some poet in R. & D., "Personality Prom" to convert circuits 231 to 240 to non dims.

Colour Monitor? Naturellement! Designers Panel? Certainly! For their Studio No.2 Granada have selected an M24 plus effects desk.

Granada have always been one of the independent companies who have gone for the best. I remember them being the second T.V. organisation to choose M.M.S. many years back. The BBC led off the great success of that system, many of which are still in use world wide, with T.C.5 and Cardiff and the Granada installation followed these. I seem to remember that unlike the Beeb, who chose a special grey finish and C.R.S. who went for very handsome matt chrome panels, Granada accepted Strand Green without even a comment.



June Sharvall and Graham Kerr await your call at the Lighting Shop at Brentford.

## Jack Sheridan

It seems remarkable in today's U.K. climate of finance-first, that none of the well-known characters during the first fifty years of Strand Electric's existence had anything to do with that side of the business. Strand was started by two practical West End theatre electricians in 1914, Philip Sheridan and Arthur Earnshaw, and the rest of us were stage people at heart. We knew what theatre needed and how to design, make and sell or hire it. Fortunately there was one person,



## Canada Calling!

Spotlight '87 will be held, in Montreal, October 4th to 8th 1987.

This is an international lighting symposium and trade exhibition covering film and television lighting, organised by the Society of Television Lighting Directors. A full programme of events includes a visit to Panavision's new film facility, a tour of Montreal's latest T.V. studios at Television Quatre Saisons and at Maison de Radio - Canada and various other happenings.

For further information contact:

Tom Nutt  
C.B.C.,  
7925 Cote St. Luc Road,  
Montreal H4W 1R5  
Tel. (514) 485 5441

## Open All Hours!

Well, nearly.

The Brentford Strand Lighting Shop is now open over extended hours.

Graham Kerr and his staff are now happy to wait upon gentlemen callers - and others - from 8.30 a.m. to 6.00 p.m. every week day.

The Lighting Shop has been one of our great successes. June 1987 was the biggest month for sales they ever had. The actual amount? Ah, modesty and commercial judgement forbid. But we move a great deal of kit, both Strand and Quartzcolor.

I believe the main reason is that we carry a very large stock. Its size can best be judged by the tongue clicking of our accountants, but we believe it is being able to hand the goods straight over the counter that brings you in in ever increasing numbers.

## Call Graham Direct!

The Sales Counter now have a direct line phone. Call the sales counter anytime 8.30 a.m. and 6.00 p.m. on 01-847 1033.

## It's so easy

No parking problems at Brentford. When you are visiting our Lighting Shop just drive in through the Boston Manor Road entrance. No meters or double yellow lines to worry about.

Lamps, colour, spares and the full Strand and Quartzcolor ranges - plus knowledgeable assistance.

That's what's made the Lighting Shop such a success.

# Galaxy & Light Palette: Two World Beaters

A Typical Galaxy.



continued from overleaf

acknowledgement to the system devised by Pilbrow, though emphatic that the American design was a totally original piece of work. Strand Century named their new system Light Palette. It was first demonstrated at USITT in 1978.

So it came about that the Strand organisation had two potential top class memory controls by 1980, and the world's customers had a choice to make. It turned out to be fairly easy. On the American continent lighting people were principally Broadway oriented and took readily to the new 'Computer road board'. Encouraged by the ready availability of salesmen, 110 volt 60Hz dimmers and competent operators, they chose Palette. In Britain and the parts of Europe and the near- and far-east where London based salesmen had their territory, British ideas about lighting prevailed. 240 volt 50Hz dimmers could be offered in the package and operators were already experienced with the similar MMS system, so Galaxy was preferred. What is more, on both sides of the Atlantic, customers preferred the Strand-Century product to those from most of the competing companies. Sales of Light Palette and Galaxy boomed.

My experiences with the two systems were while working as electrical consultant with Theatre Projects around 1980 and later. Coincidentally, the first example I saw of each system was for the then still unfinished theatre for the RSC at the Barbican. Originally, in 1977, an MMS system had been ordered as being the best obtainable system in the absence of money to afford Lightboard. Then Richard Harris (our editor) returned from seeing the first Palette at USITT, full of enthusiasm and offering an attractive deal commercially if one could be substituted for the MMS. Faced by demands for more detail, Strand invited a small party including John Bradley from the RSC to New York to see for ourselves. We liked it, but there was much hard bargaining. For a start, the Barbican needed 480 channels and although Palette could cope, it was at that time unacceptably slow. Strand agreed to speed things up. Then, there was the problem of going back during rehearsal and introducing new cues or altering levels. Richard tried to shame us by telling us that Broadway designers know what they want first time round and do not expect to do this, so Palette only accepted such changes reluctantly and caused the operator and lighting director some inconvenience in the process. The technical reason followed from the use of the memory to record only the changes from cue to cue, not complete states. This saved memory but the complete lighting picture at any time was built up from the result of many previous cues so as a change to cue 20, for example, appeared in all following cues unless deliberately undone in the next cue. But America understood our problem and changed the software introducing a button called 'This Cue Only'. Eventually we were satisfied, the order was changed and Strand made the board and I accepted it on behalf of TP and the RSC. But the theatre was still not finished when along came Galaxy. Now Richard Harris suggested another change and again we agreed. Galaxy really did offer UK lighting designers more than could be

squeezed out of Palette at that time and, again, amazingly, there was a small cost advantage. The Galaxy was installed and is still in use. Indeed, the RSC now also has Galaxies in the main Stratford theatre and the new Swan theatre.

From the outset, Galaxy had wheel control for channel level and fade speed and offered both group masters using wheels with latest-takes-precedence action and preset masters with levers and highest-precedence mastering. Other features carried over from Lightboard included floppy disc library storage that also served for system back-up, formatted video layout, remote designers and riggers controls, text, and up to 24 simultaneous fades.

Although the Barbican reneged on its order for Palette, several other UK theatres took delivery including one for the famous Old Vic theatre, but thereafter the old world wanted Galaxy.

In the new world they were equally sure that Light Palette was top system. Because of the comprehensive VDU display and the 'Command line' concept Palette was seen as a system that 'speaks English' by the new generation already into home computers and video-screened office equipment, unlike old fashioned systems where you needed to read and learn the handbook before pushing buttons. As in the early years of all engineering development, improvements were rapidly added and a Mark 2 version was launched in 1984.

Light Palette 2 was offered in separate Theatre and T.V. versions. The T.V. Palette gave greater emphasis on cue setting and less on complex cue playback, while the theatre version had extra facilities added that were suggested by theatre folk and by consultants.

A colour VDU display was the most apparent improvement but memory size and operating speed had been increased and group mastering had been extended so that each studio area could, when required, be summoned on a single lever.

Strand Century also pioneered their programmable special effects unit with this version. This allows the operator to build up sequences of chases and sound to light and all the other disco tricks and then link them into the main cue sheet without losing control of either the main lighting or the added effects. This must have been an important factor behind the four year's of T.V. Emmy Awards to Bob Dickenson of the Klages Group for his lighting for the Paramount Studios 'Solid Gold' show using extensive special effects closely timed to music and controlled, of course, by a colour Light Palette.

Galaxy has also progressed through several stages of improvement. Being basically a television system when launched, a theatre version had to be offered and this was delivered in 1984. The television and theatre options differed most obviously in the way that the cross fade operated. Then, because the theatre version had improvements that television thought it could use, the television system was re-engineered with special attention to the demands of the BBC who set the standards for many other broadcasting organisations at home and abroad.

Unlike rival systems, Galaxy can have up to four channel controllers working simul-

taneously so that two or more operators can work independently and balance light against light in rehearsal and during performance. Galaxy II also had its programmable effects system, multiple fade speeds with separate manual override, and a colour VDU screen. The messages on the screen could now include, with the usual dimmer level, cue number and speed information, extensive typed messages memorised with the plot about the cues themselves or, for the pre-show check in repertoire, about the focusing and colour plot and other details that used to be written out long-hand. Another innovation was that the board could learn fade profiles by memorizing the operators actions and then reproducing it precisely for every performance. Behind the front panel, so to speak, there have been continuing improvements to the computer hardware, updating each part as new and better products become available. Tony Brown, the Strand R. & D. Manager, in charge of Galaxy and other lighting development, tells me that there is now virtually nothing left of the first design, despite the similarity of old and new panels and operating routines. Today's designs are known as Arena, Studio and Premier versions of Galaxy II.

But Galaxy III is about to appear. Again it will look and work very much like the earlier versions, but one of the improvements leaked to me is that it will be the first big enough to run over 1000 dimmers independently. To do this new techniques for splitting the computing work between several processors have been developed. The new Galaxy is also rumoured to be able to control colour change and pan-tilt-focus mechanisms from memory and keep an automatic fault log from messages transmitted from a new range of 'intelligent' dimmers.



The author at a Light Palette.

Light Palette III has already been launched, at USITT in April this year, and it also has capacity for 1536 dimmers with proportional patch to 999 channels. Internally it uses the latest microprocessor technology though externally it looks very like its predecessors. This time, say Strand U.S. it is neither a theatre nor a T.V. board. It is whatever the user wants, since controls and operating routines to satisfy the most exacting needs of both have been built in and are obtainable by selection from the displayed menu.

So, to the future. Policy for control system development for Europe rests in the capable hands of product manager Susan Dandridge, now transferred to London after extensive experience in the States. Her mission includes a determination to devise a common approach to control that will be equally welcome on both sides of the Atlantic so that Strand and its customers can reap benefits from the total world market. Strand technical design is now also to be coordinated from London by Dave Bertenshaw, the designer of the MMS of the 1970s who left Strand for a while but who has now been enticed back. (Come to think of it, he had little switches hidden in that system so that each customer could select their favourite response. Are there no new ideas?)

Oh yes, the unbelievable answer to the fundamental question posed in the first paragraph is that Strand have sold 291 Palettes to date and 236 Galaxies. Who can beat that?

## New Manager & Sales Team for Strand Lighting's Operations in Italy

Andrea Molinari has joined Quartzcolor Trading, the sales arm of Strand Lighting in Italy, as General Manager.

Andrea, 32, has a Doctorate in Mechanical Engineering from Rome University's Technical Institute. He joined the old Quartzcolor company eight years ago where he was the Product Manager for Quartzcolor lanterns. For the last four years he has been with Avion Interiors, a large company manufacturing aircraft components, where he was North American Sales Manager and latterly Export Manager.

A new sales team for Strand Italy has



been recruited over the last few months. Massimo Aramini, aged 25, will cover Milan, Turin and Genoa, Massimo Mossini, aged 24, will cover Venice, Verona and Bologna, Fabio Sebastiani, 26, covers Florence, Perugia and central Italy, Maurizio Abatini, aged 26, who is also based in central Italy looking after Rome and Naples, while Giovanni de Sario, 30, will cover Bari, Reggio Calabria, Palermo and the south.

With Strand luminaires for the theatre, Quartzcolor for Television and Galaxy, Gemini and M24 for both, how can they fail?





# Strand Dealers Calling!

In every issue of Strandlight we intend to bring our readers up to date with the latest news from our dealers.

This issue is all U.K., but we hope to get news from overseas dealers which we can publish in future issues.

## J.B.E. Move to New Larger Premises

For over 27 years, JBE Stage Lighting and Equipment Company have been operating from Essex and during most of that time, they have been connected to the name of Strand Lighting by selling and hiring Strand products.

The new address of JBE is 7 Rose Way, Purdeys, Rochford, Essex, the telephone number will remain Southend-on-Sea (0702) 545826. The new premises are much larger: a bigger sales area and many more parking spaces for customers.

About 15 years ago I invited Robin Barnes to visit me in my lair at King Street, to suggest that JBE Stage Hire should stock a couple of hook clamps, a safety chain or two and thus become the first Strand stockists: Robin said "Yes please" and with Strand products, they have gone from strength to strength.

Elaine and Robin Barnes supply local drama clubs, small church societies, repertory theatres, West End theatres, T.V. studios with all types of theatrical supplies as well as lighting.

## Stage Lighting Centre are Now Strand Agents for Eire

Pat Walsh and Pat Farrell, both of whom were with Bourke Strand Electric, our Dublin agent for many years, have now formed a new company — The Stage Lighting Centre, 108 Pearce Street, Dublin 2, where they are now Strand Lighting's agents in Eire. All Strand equipment can be demonstrated in their showrooms, and there are hire and service departments.

A recent contract was for the supply of a Gemini 120 plus PIP dimmers for Dublin's National Theatre.

Environ commercial dimming and Quartzcolor Studio Lighting are supplied, and Hall Stage Equipment is offered. A drapes manufacturing service is also available.

## Robert Luff's new showroom/demonstration studio

Luff Sound & Light of Gautrey Road, Nunhead, South London — where, as they never cease to tell me, there are no parking problems — have opened a new sales and demonstration area in the basement of their hire warehouse.

One great advantage of a basement, as



Robert Luff's new lighting showroom and demonstration studio in the basement of Gautrey Road, SE15. Colin Andrews is waiting to serve you.

Strand showed many years ago in King Street, is that blacking out is no problem. We have all had the experience of trying to judge how impressive or otherwise a gobo may be either by holding it up to the light or by looking at its wan image fighting the noon day sun. No more of this at Gautrey Road. A projection screen which allows gobos to be projected over about twenty feet permits judgement in very real 'stage' conditions. The superb optics of a Harmony can be appreciated at the same time.

Luffs offer Triple E stage equipment, smoke machines, pyrotechnics and a gamut of spares and accessories.

Should the visitor peep through a discreet archway into the rest of the basement, he will actually see star cloths being made.

If he is a glutton for punishment he can subject his tympanums to sound equipment demonstrations of various mixers or some quite devilishly powerful loud speakers. Contact Luff sales on 01-639 7705.

## A Useful Dealer Invention

Light Relief, of Cardiff, recently showed me a very neat 15A socket which they have designed and patented. It consists of a standard round pin 15A front plate and socket mounted in a metal box which clamps round a standard barrel. A plastic plug inside locates in a hole opposite the cable exit hole so that the socket cannot rotate round the barrel. I noticed these in the Welsh Museum Dinosaur Exhibition described in the article in this issue. A very tidy method for plugging in lanterns in rigs where are in public view. These sockets are also available from Strand Theatre Services.



The neat Light Relief barrel clamping 15A socket.



Light Relief of Cardiff's premises in the oddly named Wentloog Road, Rumney.

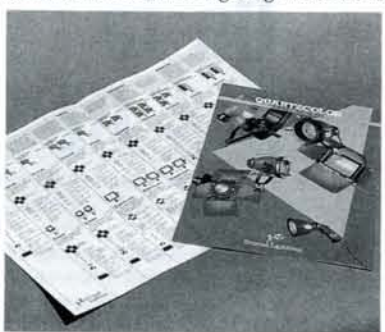
## Two Redheads or a Double Blonde?

I was accused the other day by a Senior Lady Marketing Executive of having "a whole bunch of sexist bones in my body".

This made me really proud.

But, as the French say, back to our muttons.

We have just introduced ten different Quartzcolour Portable Lighting Kits and two



# Hong Kong Hires

A recent large scale hire contract for lighting was awarded to our company in Hong Kong.

This was for the installation, set up and maintenance of the lighting at the Hong Kong Trade Development Council Exhibition which was opened by H.M. The Queen during her recent visit.

The exhibition acted as a showcase for all types of Hong Kong manufactured products.

The Strand lighting project was managed by Jimmy Cheung and engineered by Simon Ng.

The large scale rig included 77 Codos, 124 Harmony F's, 12 Harmony 15/28's, 72 Harmony 22's, 92 Parblazers and 100 x 5k dimmers all controlled by a Gemini.



Mysterious Oriental Shapes. Actually, they house a recent Hong Kong Trade Exhibition.



Gobos galore! How to liven up a dull ceiling. The interior of one of the Mysterious Shapes.

# The Mayflower Theatre, Southampton

by Eric Baker

The refurbished Gaumont sits half way along Commercial Road, Southampton now happily in its new mantle as the Mayflower Theatre. In spite of its grand modern sign the outside appearance is still that of the fine 1930s cinema which it was when it was created. However, once inside, and past the art deco ornamentation, the auditorium with its 2250 seats on three levels soon makes clear its attraction to presenters and punters alike. This large capacity, all with a clear view of the stage, must be what every touring impresario is looking for.

The Theatre has been completely refurbished and re-equipped under the management of Rank Technical Services, led by Hugh Corrance, with Brian Andrews, Architect and under the watchful guidance of Tony Easterbrook of John Wyckham Associates, Theatre Consultants, on behalf of the City. The refurbishment was part of a deal with the City and Tony was, I think, employed to see that we as The Rank Organisation did not pull any fast ones! Tony was not directly responsible for design but produced an outline specification of all aspects of the conversion. I was delighted when I read the section on lighting to find that he and I had come to the same conclusions quite separately.

The first view of the Theatre during refurbishment, without seats and with an enormous hole where the orchestra pit was to be, brought to mind immediately a single name — Cadenza! If any lantern was going to work effectively at those ranges, it would have to be at least a 2kW profile.

Immediately one comes up against the physical facts of life — a narrow angle lantern is long, a 2kW lantern is big! Having faced these facts the problem then becomes can we fit them in and still stay friends with an Architect who is rightly bent on preserving the 'sacred' features of the building? The colour sketches we had been shown of the auditorium depicted lanterns as tiny bright spots the size of pinheads with beams like searchlights but with the lanterns themselves totally unobtrusive. After much calm discussion and sketching with Tony Easterbrook, Bob Leggett produced a splendid drawing showing that it was just possible to suspend these lanterns on the front of the upper circle and under the side slits. At first the steel suspension was fixed in an arbitrary position to suit the steel at present in the building. This led to some not so calm discussions with the builders and finally it was resited. The result of all this effort can be seen in the photographs provided by our Editor and Len Greenwood of the John



The Mayflower Theatre, Southampton.

Wyckham practice. The lanterns are all completely accessible for positioning, colour changing and the like without the use of access equipment and they do not intrude into sight lines.

Positioning the Galaxy Premier 2 was to produce arguments. Ray Abbott, who has been at the theatre for many years and had been retained by the City throughout the closure, had it firmly in his mind that he would have the control right in the middle of the dress circle together with the sound desk. I lost the argument and there it now sits in gracious splendour in a sort of well formed by removing seats and part of the floor of the balcony.

My main objection to the position was on the grounds of humanity, as any poor operator must sit thus enclosed if not for a whole performance then certainly an Act, whatever his or her needs may be. But, Eric Butler, the Chief Electrician, says he enjoys operating from this position and there have been no complaints or comments from the public other than the occasional offer of toffees! As can be seen from the photographs, it is on the whole a very neat solution about which I personally still have some reservations. The Galaxy System comprises, as well as the normal, one Theatre Playback, Pre-set Master, Programmable Effects, Memory Back-Up and Designers' Remote. The electronics crate has been housed remotely in the Dimmer Room, which is in the usual sub-stage rear of house position, as there was very little room for it in the control space. There are 300 Permus wired-in Dimmers, 48 of which are 20 amp the remainder 10 amp. These together with 14 separately controlled non-dimmed circuits should, as the man said, be enough for anyone. I wonder!

The stage, which has been completely refloored, in nicely coloured shiny hardwood,

making it more suitable for a ball-room than the working surface for which it is intended, has been suitably trunked to convey cables neatly from the 4 main stage level plugging positions in each corner. Permanent lighting platforms, remnants from the days of manual control, have been removed in order to give more space in the wings. A very welcome improvement.

A new Orchestra Pit has been formed to accommodate 100 Musicians in full unrestricted action. The total area of 141 square metres is divided into two lifts on screw jacks which rise to stage level. This, with the sacrifice of some seating, provides a usable forestage 8.35 metres deep. The lifts were designed and installed by Theatre Tec of Epsom.

New lighting positions in the stage boxes and on the dress circle front ensure that this Theatre form can be adequately lit. The stage grid has also been re-organised and now has as full complement of 68 counter-weight sets ensuring that flying scenery will not cause undue problems or strain.

This cannot be said of the improved 'get-in' at the rear of the scene dock. No lift is provided from car park to stage level, only a fairly steep ramp up and down which every back breaking piece has to be manhandled, rain, hail or whatever. And Southampton has its fair share of all those.

Behind the stage area the twenty Dressing Rooms ranging from single 'Star' to chorus rooms for twenty four have been completely rebuilt, furnished, equipped and brightly painted. Most rooms have showers. There is a large wardrobe and a laundry room fully fitted on the 4th level. The image of the 'Back-Stage slum' has been completely banished — let's hope for ever!!!

Shall I go on to describe the colour scheme in the Auditorium? Well, it is bright and our Editor loves it but as a local dignitary remarked, "It ain't your sittingroom is it?" No, it is not, it is a Palace of Entertainment and I'll go along with it.

It is sincerely hoped that Southampton City Leisure Ltd., formed by the City to administer The Mayflower, are happy with their Theatre and as proud of it as the Rank Organisation has cause to be of its own contribution. Let us hope too that it will attract the large productions it can undoubtedly handle and certainly deserves.



The operators — both light and sound — have a fine view.



A fine sweep of 2kW Cadenzas



## U.S.I.T.T. '87

Chairman Mao told us that a journey of a thousand miles starts with a single step. My journey of about twenty eight thousand miles started with a single 7 a.m. taxi ride to Heathrow. My first destination was the 1987 U.S.I.T.T. conference and exhibition, held this year at Minneapolis.

Because I was on a round-the-world ticket I could not leave the embraces of British Airways or Qantas if they covered a route. This meant a change at Detroit. Detroit airport was like an overturned bee hive, with quite a bit of stinging going on. Apparently since de-regulation all the competing American airlines try for the popular time slots, so with only a few minutes between scheduled landings one delay wrecks time keeping over a spreading area as the knock on effect widens.

But eventually, there below is the home of the Tyrone Guthrie Theatre and of our conference.

Although, as an Englishman, I hate to admit it, U.S.I.T.T. is now the world meeting place for technical theatre. It is not just the scope of the exhibition itself — about three to four times the size of our own ABTT show, but much more important is the number and variety of the various papers given and seminars held. A hundred papers on just about every possible aspect of technical theatre and theatre management.



Larry Nelson, left, who represents Strand and Quartzcolor in the Western United States, at U.S.I.T.T. Exhibition. The man he has such a firm grip on is Clive Salmon of Thorn Lighting.



On the Strand booth, Laurence Kellerman Associates who represent us in New York. Laurence is the tall distinguished one on the right, Michael Connell is the shorter distinguished member of the firm on the left.

## Dimming Discussed

Among those enjoyed was a particularly lively evening meeting on the specifying of dimmer characteristics, chaired by Martin Moore — sometime Strand chief of R. & D. and the father of Strand's MMS memory control (MMS = Martin Moore System). In the audience of about seventy I spotted almost every senior dimmer and control system designer of any note in the world. The discussion was lively in the extreme with a good deal of verbal knock about. Your Editor, being handed an opening by the chair, was able to contribute a few grossly unfair comments.

## Products Displayed

The Strand Lighting exhibit featured Show Changers and the ever popular Leko range — now increasingly being specified by lighting designers in Europe such as Andy

Bridge who used two hundred for "Phantom of the Opera" — plus the new and very successful Lightboard M, our mid range contender in the memory system stakes as well as Litescan — see elsewhere in this issue.

## At the Guthrie Theatre

One of my happiest memories of this year's conference was the visit en-masse to the Guthrie Theatre of USITT lighting folk. It is hard to believe that this fine theatre is over twenty five years old. I suppose to many readers Tyrone Guthrie must now be a little known name, but back in the forties and fifties he was the great influence on theatre design. All the Chichesters and Stratford Ontarios are the brick, timber and concrete monuments to his revolutionary idea of breaking with the traditional proscenium theatre.

Minneapolis has cherished its Guthrie Theatre which has been lovingly maintained.

The Editorial Pentax was focused on the foyer's magnificent leaping fish and subsequently on a thirsty throng of leaping USITT delegates who took over the stage. The volume level of conversation even rivalled the ABTT bar at Riverside. And that takes some rivalling.

Two Non Theatre footnotes.

Minneapolis is unique in my experience of having a "young persons curfew". Anyone under fifteen who is spotted out after 10 p.m. by the local gendarmerie is promptly escorted to the nick until a parent comes to bail them out. Shepherds Bush and Tower Hamlets please note.

Has anyone but me ever pondered on the fate of all the waiters and waitresses in America over about thirty? Either they all marry customers and retire or there must be an enormous cemetery somewhere. I have never seen any staff member that could be called even middle-aged anywhere in the country's hotels.



The Guthrie Theatre, Minneapolis. 25 years on and still looking great. Light Palette and Lekos.



The Leaping Fish in the Guthrie Lobby.

## The Editor Visits the Latter Day Saints

My next stop was Salt Lake City, famous for being the home of the Mormons and for motor speed records on the nearby salt flats.

A fine warm Saturday evening found me strolling the 132 foot wide thoroughfares of the town. This enormous width was fixed by Brigham Young, when he founded the city in 1847, reputedly so that he could turn his waggon and team without backing up.

## Parisian Thoughts

As I wandered round I kept thinking of Paris. On the face of it an unlikely conjunction. Why did Etoile and the Grande Boulevards come so strongly into my mind in the very heart of Utah and in such a different mental atmosphere? Then suddenly I knew. Salt Lake City, just like the City of Light, runs water along its gutters every evening as a street cleaning exercise.

Rippling sounds and a slightly damp right foot gave me the connection.

## A Royal Brougham Rejected

As I had to get around during my stay I made an early call on a car rental company. The names given to American Cars! There was a Royal Brougham or a Grand Marquis. Actually, not knowing one model from the other I declined both and simply took the cheapest on their list. And when this wouldn't start was given the keys to the next grade up for the same fee, so full marks to Mr Hertz.

## The Mormon Tabernacle

Thanks to introductions arranged by Strand's local representative, Rick Christiansen, I was given the courtesy of a technical tour of this most remarkable building, sited in Temple Square at the heart, in all senses, of Salt Lake City.



Inside the Salt Lake City Tabernacle, the home of the world famous Mormon Tabernacle Choir. Lighting by Strand, control by Light Palette.

Although built a hundred and twenty years ago its appearance would have been almost conventional in 1960. It is a long flat sided oval in plan, with an elongated metal-sheathed domed roof. The walls are of random stone. It seats six thousand, and is the home of the Mormon Tabernacle Choir. When I was there I heard — literally — a pin drop in an acoustic demonstration and a very fine short recital on the organ, built, the programme says, by "a Britisher".

## No Metal Used

When originally constructed the whole of the timber roof framing was held together by strips of rawhide which when doused with water shrank to tighten all the timber roof joints. However, my very courteous guide let slip that a few nuts and bolts have crept in over the years.

The choir are placed in rows on stepped rostra in front of the organ. The Tabernacle ceiling follows the shape of the domed roof, so, in effect, one has a cyclorama behind the choir and organ. And this was in 1860!

Strand floods are set behind the rostra and organ casing and Lekos are mounted, without wishing to sound the least irreverent, "front of house". A Light Palette is in a special control room to one side of the organ. Because of the superb standard of the hardwood joinery throughout the building, including the T.V. and lighting control

room, which displays craftsmanship of the very highest order, this must be one of the most handsome Light Palette installations anywhere. Any European who thinks only in terms of U.S. mass production should examine the work of these master craftsmen.

The Lekos have been specially painted white by the Tabernacle staff and the colour has lasted very well for ten years use, with surprisingly little discolouration for 1kW units.

A number of Showchangers, this time finished in a special brown, were awaiting installation at the time of my visit. These units seem to be fast becoming the North American standard where remote control of luminaire and colour is needed.

## You Must Look for Yourself

### A Railway Diversion en Route

Before leaving Utah I made a long hoped for visit to Promontory Point, the spot where the Union Pacific finally joined up with the Southern Pacific some 120 years ago to complete the rail link across the continent.

The famous photo, showing the two locomotives, cow catcher to cow catcher, with top hatted notables preparing to drive the last — and golden — spike had somehow led me to expect a wide and featureless prairie as the site of the great event. Not at all. The event took place in a pretty valley not unlike the countryside of the Scottish borders.

Nearly everything in the world, when you actually see it, differs from one's preconceptions. Last year I was staggered at the size of the Stratford Festival Theatre, finding it at least twice as large as I anticipated. Later on my current trip I found some surprises in the Sydney Opera House in spite of its oh so familiar outline.

The very interesting little museum at Promontory Point tells us that because the U.S. Congress had decreed very valuable land rights for every mile of track the two companies completed, they actually overlapped by 116 miles and had to be sharply reigned in by the government.

One final word on Salt Lake — anyone from Europe must be vastly impressed by the rigours endured by the pioneers who first settled the west. In spite of all the Hollywood myths it remains a tremendous story. One brief, but impressive, thing I learned, from our lady guide in my Temple Square visit — "You will all have seen in the movies pioneers setting out in covered wagons," she said. "Well, many did. But the covered wagon was the Cadillac of its day. Most of our ancestors, including my own great grandparents, walked here pushing handcarts. They actually came from England in 1847, but by the time they reached Missouri their money had nearly run out, so the last thousand miles was done on foot." The sculpture group commemorates extraordinarily determined pioneers.



Pioneer statue in Temple Square, Salt Lake.

## On to LA & OZ

Business took me to Los Angeles, via Calgary, then a fourteen hour non-stop to Sydney.

Anyone finding themselves, as I did, with a spare few hours to spend in L.A. should visit the Variety Arts Centre, below 9th on Figueroa Street.

# How the World Theatrical Light

The Editor reports on a round where lighting is now and — going to.

This has a delightfully unstuffy collection of film, theatrical and vaudeville memorabilia, housed in an old variety theatre. Deadly good taste is kept firmly at bay. It even boasts a collection of 150,000 jokes! My main pleasure came from the old theatre posters. I fear that once photographs could be turned into posters a whole art form was lost. The old heavy black outlines and solid colours had great charm. The Variety Arts Center collection helps us to remember many great personalities of American stage and screen and the shows and films they were in. Well worth a visit, but phone first as opening hours of the collection are erratic.

My flight across the Pacific was enlivened but twice. At a point I estimated would be over the equator, I adjourned to the rear of the 747 and filled a wash basin with water. I intended to fulfil a long held desire to see the water run away, convoluting in the reverse southern hemisphere direction. I paused for a dramatic moment, pushed the waste stopper lifter button and simultaneously realised that waste water is sucked from aircraft basins, so yet another of life's disappointments.

The second enlivenment occurred when a passenger from the business class peered through the dividing curtain, regarded with horror our economy slave deck with its rolling beer cans and the odd passenger slumped across the aisles, and remarked to his unseen companion "My God — it's a zoo in there!"

## The Editorial Foot Touches a New Continent

The first time on a new continent is always a thrill. I had wanted to see Australia during all my years with Strand, but somehow never found the time. The problem is, of course, that Australia is not on the way to anywhere. One needs to make a conscious decision to go there. And well worth making it was.



# Goes World's atre ting?

the world foray to try to decide  
more important — where it is

## Strand is Alive and Well Down Under

After a plane change at Sydney an hour's flight onward brought me to Melbourne, where our local head office has been re-established. Having read that Australia was a very democratic country, I wondered if the offer of a gratuity to my taxi driver would result in any unpleasantness. I tentatively fingered a couple of dollars, only to have them twitched away in a second with the phrase "Sweet as a bun, mate".

## Five Strand Projects - And One That Wasn't - But Is Now

My first visit was to the Victorian Arts Centre Theatres in Melbourne. Opened some two years ago, these were about the finest



This enormous lift lowers lorries full of scenery down to stage level at the Victorian Arts Centre, Melbourne.

buildings I saw in Australia. The Sydney Opera House has the better site and its almost too famous profile, but theatres should be judged for their inside, and here Melbourne wins.

I spent some time thinking about this and I now realise it is mostly thanks to Mr John Truscott, the interior designer, who has achieved that most difficult feat, real richness of colour and materials without any feeling of going over the top.

I first saw his work in the film version of Camelot, for which he won Oscars for Art Direction and Costume Design, and I know he did notable work in theatre design for Sadlers Wells at home. A walk through the Victorian Arts Centre is a constant visual pleasure.

One example must suffice of the style. The ceiling in one of the foyer bars is copper — not copper coloured paint, but actual thin copper foil — and magnificent it looks, too!

Glen Hughes, the Lighting Master, was kind enough to devote an afternoon and most of an evening to showing me round, and this was followed by an hilarious couple of hours in the green room with his crew while theatre anecdotes flew thick and fast.

## Galaxy, Galaxy, Galaxy

I have obviously been well aware of the success our top memory systems enjoy — most recently Galaxy's replacement of the original Lightboard in the National's Olivier. But one needs to travel the world's theatres to appreciate how overwhelming both Palette and Galaxy's success has been. Up to April this year 236 Galaxys controlling in total 55,000 channels, have been installed. And Australia boasts an especially fine crop. The Victorian Arts Centre, for example, has four systems. 120 ways in the Concert Hall, 180 in the Playhouse, 240 in the State Theatre and 100 in the Studio. The lanterns throughout are a selection of Preludes, Harmonys and Cadenzas, with an obligato of Pallas's, Pollux's and Castors providing the typical larger theatre rig.

## A Gambit for Ambit

Ambit's is the brand name for our Australian made Strand range of dimmers. The recent Australian government proclivity for import duties led us to adapt Strand's standard U.K. dimmer cards for production in Melbourne.

This is obviously helpful in maintaining our competitive position, although the really high tech products in the range, such as memory systems, continue to be U.K. made, although if demand continues to increase, my own feeling is local production would be very well within the capacity of the local Melbourne team.

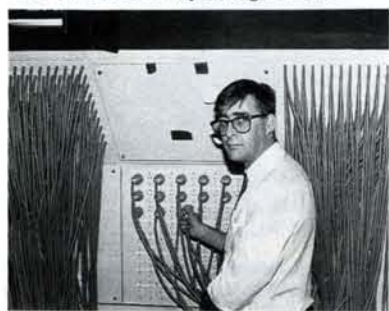
One Ambit project I visited was the Melbourne Hyatt Hotel. This is typical of the well equipped conference centre and commercial presentation type of hostelry. A property auction — a large Melbourne department store was due to go under the hammer that afternoon for an estimated fourteen million — was well within the ballroom's scope. M24 controlled the lighting, if not the bidders on this occasion, while other Ambits dealt with a multiplicity of dimming in side meeting rooms and suites.

Rodney Currie, the Strand man who handled our work at the Hyatt, then took me out, through Melbourne's infuriating traffic, to see the Nunawading Arts Centre. This 400 seat first floor theatre is very similar to the sort of local auditorium one finds throughout the U.K. 60 way M24 plus effects, Harmonys on two FOH lighting bridges and three on-stage internally wired bars with Harmonys and Coda 500's.

Dimmers — Strand Australia built Power Pack 5k's and Mini Pack 2k's.

On the way back from Nunawading, Rodney and I discovered a mutual enthusiasm for film projection equipment of the golden age. This emerged when your Editor remarked on the sound track speed of the excellent but long discontinued Horizontal Vista Vision system and was firmly if politely corrected. Probably only two men in the Antipodes would know enough to risk a tossing and goring from the Editor on one of his favourite topics. Twenty minutes later, having discovered this mutual enthusiasm, we were at the home of

the second Antipodean man concerned, where I was able to admire the finest collection of early film projection equipment I have ever been lucky enough to see.



Anyone got a comb? Patching, Australian style at the Hyatt Hotel, Melbourne.



Strand Lighting in the Melbourne Hyatt.



Neatly done! Rodney Currie, of Strand, with Hyatt local lighting and sound panel.



M24 at the Melbourne Hyatt.

8, 9.5, 16, 17.5, 35, 55 and 70 millimetre are all represented. As this is rather off our subject I will limit myself to merely noticing how often American engineering practise goes for the practical over the aesthetic. There is no reason why a film projector spool box should be made circular, and thus more expensive to manufacture just because the reel inside is circular. Early U.S. makes used cheaper to produce square spool boxes. The observant can find this same approach in car and locomotive design again and again. Strength and low cost rather than visual elegance is the American way. And if you are the one to pay the bill, who is to say they are wrong?

## Brisbane - and Closer to Real Australia

Two hours north to Brisbane, and a very noticeable increase in temperature. Brisbane, Queensland's capital, is really Australian looking. The shops have wooden verandas built over the pavements and the houses, all single storey, are raised up on stilts to promote air circulation. I suppose the advent of air conditioning will do away with this local style. A pity, at least for the visitor.

My first call was at the Brisbane Entertainment Centre, where Alan Colegrave, the Technical Manager, gave up a morning to taking John Rippin, our State Sales Manager, and myself round. I would guess that the population of Brisbane is less than

a million, and yet it has the enormous Performing Arts Complex and the Entertainment Centre, which can seat 14,000 in the main auditorium and still absorb another three and a half thousand in the exhibition hall! 1296 Par Cans and 672 dimmers, controlled by a Galaxy — what else?

And this for a city a twelfth the size of Los Angeles and an eighth the size of London.

The Entertainment Centre has an in-house CCTV colour system and a professional standard video production suite. There is also a very elaborate audio set up. Phrases like digital reverberation, comp limiters and four channel digital delay lines are flung about and accepted by your Editor in good faith as being the very latest and best.

The Performing Arts Complex includes the Lyric Theatre, 240 way Galaxy and 600 lanterns, comprising Cadenzas, both 9 x 15's and 12 x 22's, Harmonys and Polluxs with cyc. lighting by both Iris and Pallas.

The Concert Hall has a 120 way Galaxy, with Cadenzas, Harmonys and some 5k Polluxs, while the small Cremorne has a 60-way Galaxy and a range of Strand lanterns. Dimmers throughout Strand Australian built PAM 5k's and 2.5k's.

One point worth mentioning. The Performing Arts Complex publish the most comprehensive guide for incoming artists and companies I have ever seen. Seating plans, Plans and Sections through the

its own sake, that I did not even bother to turn the Editorial Pentax on its famous exterior.

But there are many surprises within for the visitor, particularly when he has the privilege of a guided tour by Peter Marshall, acting Lighting Master of the Opera House and a Galaxy wizard.

First, David Kentish and Frances Taylor of Strand New South Wales took me to meet an old friend, Keith Yates, who I knew as Chief at the London Palladium. Now his office looks out across Sydney harbour. This has to be an improvement on Argyle Street, W.1.

Because the Opera House is so famous I am going to limit myself to just a few items that may be new to some of my readers.

The first impression of the interior is of how exactly the inside reflects the shape of the outside. The soaring ribs of the concrete shells are there to be seen, quite unadorned, by audiences. I am so used to theatres where the interior has only a vague resemblance to the exterior that Sydney's honesty comes as something of a shock.

The next strong impression is of the almost complete absence of wing space. This arises from the changes of use of the two main auditoria, decreed well into the course of construction. As in all well run theatres and opera houses I am quite sure no member of an audience ever realises the enormous practical difficulties that the technical staff must overcome on a daily



Brisbane Performing Arts Complex by night.



The Concert Hall.

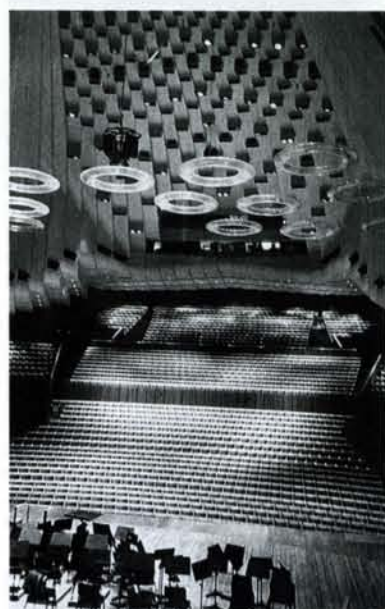


The Lyric Theatre.

auditoria and stages and full technical details. This must be a real bonus as advance information for groups such as our own R.S.C. who have played in Brisbane.

## Sydney, Some Opera House Surprises

My final port of call in Australia was Sydney. Theatrical speaking, the Opera House dominates. It is now so world famous visually both as a symbol of the city, and for



Inside Sydney Opera House. The flying saucers are acoustic discs which can be raised out of sight.

basis.

Readers of our old 'Tabs' magazine may remember the Editorial delight when three years ago Galaxy replaced a German system that had been purchased years before the opera house opened. The original decision had been quite a blow for Strand. Obviously over our seventy-four years we have had a few blows but the recovery of Sydney's Opera House was the Galaxy success that gave us the biggest thrill.

After this tour, adjournment to the Green Room for odd tinny was well in order.

That evening saw a visit to the Sydney Theatre Company, whose theatre has an excellent restaurant and is built on a wharf no longer required to ship wool out or to receive immigrant Poms in. This Pom votes it an excellent change of use. SP30 Board, 2 Minipak 12 way dimmers and 30 Preludes, mixed 16/30s and 28/40s plus two CSI follow spots.

continued overleaf....



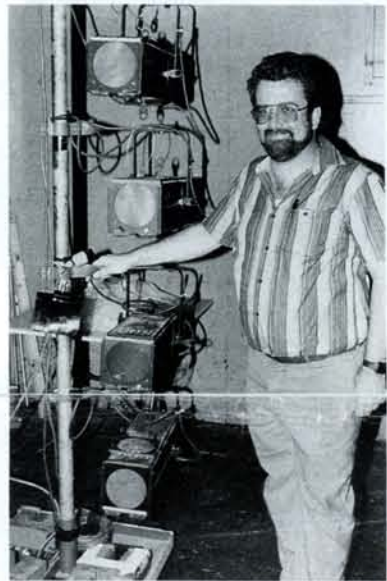
# How Goes the World's Theatre Lighting?

continued from overleaf

The next day, Sunday, was spent with Phil O'Donnell, Strand's supremo for his part of the world, and Ian Basey who looks after our sales of Rosco products in Australia where we are the distributors of the famous colour filters, scenery paints, smoke machines and explosive devices.



The very wide stage in the Sydney Opera House Drama Theatre.



Peter Marshall, acting Lighting Master at Sydney Opera House.

Sydney is not unlike Liverpool in spirit. The area where Phil and I were staying, The Rocks, is the oldest part of the city and has a wealth of extremely crowded and vigorous pubs alternating with dark cobbled streets and dock gates. The saturnine humour of the locals is distinctly Liverpudlian. Sydney may be only seven hundred miles from Melbourne, but in atmosphere it is as far as Glasgow is from Cheltenham.

Viewers of BBC comedies will be delighted to learn that there is a large department store in Sydney called Grace Brothers, although they seem far busier than their fictional namesake.

Let me now recommend to visitors a type of refreshment so far as I know unique to Australia and certainly unknown in China. This is the Mongolian Barbeque. The diner makes his own choice of beef, lamb or pork,



Why do Strand personnel stay in the excellent Park Royal Hotel? Partly because of the Atrium lighting by Harmonys.

all cut very thin, and various vegetables. He then adds to his bowl sauces in ascending order of violence. The bowl is passed through a hatch into a glazed booth containing one steel circular plate and two Mongolian gentlemen. All three are heated, the steel plate the most, by butane flames. The contents of the bowl is thrown onto the hot-

plate where everything cooks in about two minutes flat.

Now comes the cabaret. One of the Mongolians holds the bowl a good yard away from the heated steel and using a giant chop stick sends the food through the air, catching about ninety per cent of it in the bowl, which he then passes to the diner through another hatch. Very tasty indeed with the sole disadvantage that after cooking everything, from beef to carrot, comes out the same colour and consistency.



Managing Director of Strand Lighting Asia, Phil O'Donnell.

## Australian Lighting

To sum up stage lighting in Australia. It is very much U.K. influenced, with frequent interchanges of personnel between countries. And Strand Lighting holds a very strong position in the market, with both locally manufactured and Brentford and Kirkcaldy built equipment in evidence in every significant venue.

Two footnotes (U.K. readers only!). We have all heard of Australia's sunshine, but the first items I saw in the airport shop were an excellent range of Australian manufactured macintoshes and sou'westers known as "Driza Bone".

A yuppie suburb of Melbourne is called Toorak. Hence the Aussie for a Range Rover is a "Toorak Tractor".

## Hong Kong

Once again the by now somewhat over-familiar pilot's announcement "Doors to Automatic" as your Editor, and four hundred other souls were lifted into the Sydney morning air.

Nine hours later the dramatically short runway surrounded by mountains and high buildings ensured a thrilling landing in Hong Kong.

Thirty degrees of heat and terrific humidity after Sydney's pleasant autumn breezes. Captured by a local taxi driver with what must have been the first ever Toyota made. Before I can say a word we plunge off into the traffic. Kidnapped for immoral purposes? A flicker of hope courses through the old editorial glands. But no, after a few minutes a microphone is thrust into my hand. I give my hotel's name, the lady at the taxi office translates this into Cantonese for the driver and we duly get there shaken if not stirred.



Jimmy Cheung, Manager, Strand Hong Kong.



George Mo, Strand, Hong Kong.



Bibi Khan, Strand, Hong Kong.

My first morning is spent at the Strand Lighting office in Kowloon where Jimmy Cheung, Bibi Khan, Tommy Chan and George Mo make me welcome and tell me of the jobs I am to see.

My guide is Ng Kwok Wai, a young electronics engineer who puts up with my constant questions with true oriental courtesy.

## Size is the Surprise

I don't know how many people live in Hong Kong — I would guess about five or six million — but the theatres and concert halls are gigantic by European standards.

My first visit was to the still building Tsim Sha Tsui Cultural Centre on a magnificent site on the water front.

My photo does not give any true idea of its size. I just could not get far enough away. Even using my widest angle lens I had to crouch embarrassingly outside a gentlemen's convenience to get any picture at all.

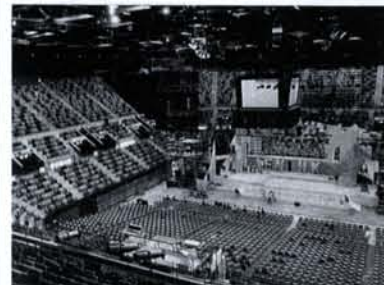


Tsim Sha Tsui, Cultural Centre. Growing in a forest of bamboo scaffolding.

Astonishingly the whole tremendous concrete shell is rising behind bamboo scaffolding. We are told that the giant Panda depends on the bamboo forests for his well being so resolve to take this up with John Wyckham, who is the theatre consultant, on my return to Bookham. Far too soon to form a judgement of how this project will turn out, but Mr Wyckham and his Associates have not been linked with any failures to date, so hopes must be high.

In the afternoon to see the Hong Kong Coliseum. Gigantic in the Brisbane Entertainment Centre manner. Full house Galaxy.

Next by tram to see the still very new Hong Kong Academy for Performing Arts. Obviously very fine auditoria, but not easy to see round or to get a true picture as locked doors everywhere. Martin Carr and Peter Angler were the Theatre Consultants. But I did like the idea of the open air auditorium. This must make sense in the local climate. Galaxy's again the order of the day.



Hong Kong Coliseum, and Galaxy again.

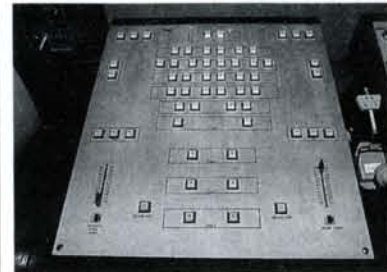


Hong Kong Academy for Performing Arts. Galaxy yet again.

Then by air conditioned train to the New Territories to see Sha Tin Town Hall. One large thousand seats auditorium and a smaller space called rather intimidatingly the Cultural Activities Hall.

This building was, I was told, typical of the newer projects, this one having been open about a year. A very high standard of finish throughout the building. Marble floors and walls in the entrance hall and balcony foyer.

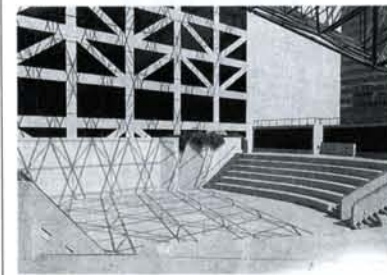
Hardwood gleaming in the main theatre. Wall lighting booms in chromium, making our Harmonys look very work-a-day. Once again, Galaxy's in control.



Strand locally built control panel at the Performing Arts Academy.



Galaxy plus locally Strand built manual wing at the Academy.



The Academy's Open Air Auditorium.



Inside Sha Tin Town Hall. One guess at the control system — yes G—y.



Sha Tin Town Hall.

## Some Hong Kong Notes

The four T.V. stations are named 'Jade', 'Pearl', 'Gold' and 'Diamond'. Two broadcast in English, two in Cantonese.

Seen in Kowloon — a nightclub called 'The Volvo'. The Ferrari might be a possible name for a haunt of fun and frolic, but 'The Volvo'?

If one requests a gin and tonic the tonic arrives in the glass and the gin comes in an accompanying jug — no less.

And Chinese dinners begin with tea and end with soup. But Chinese food is definitely better in Hong Kong than in Bookham.

## The Summing Up

In my twenty years with Strand I have never enjoyed such a comprehensive view of our company before.

There is no question but that the influence of British technical theatre really is world wide. And British and American ideas on how a stage should be lit are growing ever closer.

America has now almost completely accepted that every control channel should have a dimmer and actual lighting design is now truly transatlantic — and that means world wide.

I believe future lighting products must inevitably reflect this world view.



Unusual seat numbering at Sha Tin.

## David Bertenshaw



David Bertenshaw B.Sc(Eng), A.C.G.I., M.I.E.E., C.Eng has recently rejoined Strand Lighting as Director of International R. & D. in the U.K. and U.S.A.

A graduate from Imperial College, London University in 1970, he completed an apprenticeship with G.E.C. (Telecommunications) and joined Rank Strand Electric as a development engineer. Progression

in Strand through to Development Engineering Manager, encompassed design and management experience in controls, dimmers and luminaire development, concluded by leaving in 1984 to gain alternate experience in the computer peripherals industry.

Married with two young children, David lives in Surrey.



# A.B.T.T. 1987



## The Show was very busy!

The scene was once again Riverside Studios for another vigorous ABTT Show.

This year Strand's U.K. dealers manned the stand. And very smart they all looked, in scarlet sweaters, tastefully 'Gongmanned' so they would not be too useful in their private wardrobes.

Across the aisle, Northern Light, Strand's distributors for Scotland, had their exhibit and were all tastefully arrayed in blue sweaters, emblazoned with their own logo.

A good show with brisk business reported. Especially, it appeared to the editor, in the bar.



The one and only Hughie. Yes, Hugh Leslie of L.H.S., our South West London dealer.



Down from Scotland the Boys in Blue — Jack Breslin, Johnathan Allen and Mike Smyth of Northern Light.



The West Country Comes to Town. Graham Puxley of Stage Electrics, Strand dealers, Exeter.



A serious threesome. Bryan Myers (Centre) of Strand and Kevin Bourke (Rt) of Dublin chat with another visitor.



On the Northern Light stand. Mike Smyth, (L) Northern Light Sales Director chats with John Wyckham, a leading British Theatre Consultant.



Colin Andrews, Sales Manager for Luff's Light and Sound, Strand's South London dealers.

## Dinosaurs from China

Not a description of some archaic bracket handle resistance board from Shanghai, but real dinosaurs recently displayed in a Welsh museum and lit by Strand lanterns plus M24.

A fine day last spring found the Editorial barouche headed for Welsh Wales to inspect an exhibition of dinosaur skeletons loaned by the Chinese Government and displayed in Cardiff's National Museum of Wales.

Light Relief, our South Wales agents, had been called on to supply the lighting for this exhibition. The ladies and gentlemen whose bones I was now gazing at were trotting around during the span of time from 220 to 65 million years ago.

Mr Ian Kane, the Head of Design at the Museum was the deft and dramatically guiding hand who designed the exhibition,

while Ian Holden and Mark Satchell of Light Relief attended to the lighting. And real drama the lighting brings to the gallery, too.

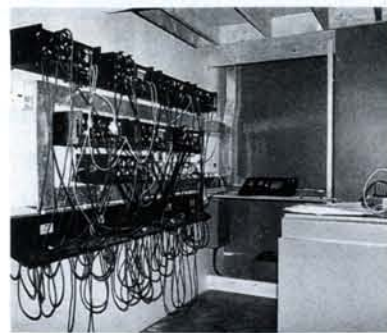
A recorded commentary, with effects and music, is linked to a 48 channel M24 controlling Act 6 dimmers. The lighting, by 32 Harmony F's with barn doors, 20 Harmony PC's and assorted Minims and Codas, lights each skeleton and its setting in turn as the commentary progresses. Pale blue and yellow, with the odd green, red and purple for emphasis.

A most impressive exhibition with fine lighting making a tremendous contribution to the impact.

I had assumed that all dinosaurs were large and flesh eating. Too many viewings of 'King Kong', I suppose. It turns out that they were, in themselves, a complete animal world. Some were vegetarians and browsed gently on grass, while others were the ancestors of lighting manufacturers and preyed on the remainder with much bone crushing and flesh eating. And not all dinosaurs were large. Some of the skeletons on display are only the size of a large dog.

A most interesting exhibition, greatly enhanced by the lighting.

M24 controlling Dinosaurs — or rather their lighting. Light Relief, Strand's South Wales dealers lit this most impressive exhibition at the National Museum of Wales. The M24 is linked to the sound commentary and effects track as well as controlled the Strand lanterns.



Behind the scenes.

The Editor and Friend. I am just tall enough for the Guards, although forty years too old, and this shot shows that not all Dinosaurs were large.



## Good Lighting Moves

The Editor visits the Prince Edward Theatre and sees Environ Fluorescent dimming taking centre stage — literally.

The Prince Edward Theatre, formerly the London Casino, has now been the home for over a year of the very successful production 'Chess'.

Everyone who has seen the show cannot but remark on the giant illuminated chess board that almost completely fills the stage.

Not only do its squares light up, in a number of permutations, but the whole board tilts to 25° in any direction, rises a metre above stage level and then revolves — for up to four complete revolutions. In sober fact, only four revolutions, because too heavy a current is involved in the floor lighting for slip rings to be used, so the current is fed by cable, and cable can only wind so far.

The very effective dimming of the fluorescent tubes in the translucent chess board squares is by Strand Environ fluorescent dimmers, the actual tubes being controlled by Environ ballasts.

Originally the red lighting in alternate squares was by coloured fluorescent tubes, but in practise the white tubes, when alight, reflected off the red glass of the coloured tubes and gave a pinkish tint to what should have been whiter than white squares. This problem was eliminated by substituting red neon for the red tubes, as the small cross section of a neon tube provides no significant area for light to reflect from.

The show's lighting control is by London's so far sole Light Palette 2, several hundred of whose cousins are controlling theatre and television lighting in the western hemisphere. Just in case any of my European readers are completely new to the world of

lighting for entertainment, I will simply mention that Light Palette is manufactured by Strand Lighting North America at their plant in Rancho Dominguez, the Latin Quarter of Los Angeles.

This particular example is a 456 channel model, with 356 dimmers connected. The dimmers are a mix of Environ and S.T.M., on hire from our South London Dealers, Robert Luff.

The whole show is, in the modern manner, highly technical. A computer on the fly gallery controls the stage machinery, while a battery of television screens to either side of the proscenium carry both recorded and live images to the audience.

Instead of providing a list of inevitably tedious numbers, I can give an idea of the size of the complete lighting rig by a few statistics:-

Re-colouring and re-focusing takes four men three days — and happens every six weeks.



Alistair Clement at the 'Chess board' — a Light Palette 2.



Chess: Scenic Design by Robin Wagner. Lighting Design by David Hersey.

Electricity consumption is 10,000 units a week, which translates into £2,000 per month. I heard of a fabled Sunday, spent by the lighting team from 8 a.m. to 8 p.m., and known simply, but most impressively, as 'The Re-lamping Sunday'.

Anyone who still believes that fluorescent

dimming is a mysterious art can take comfort from the fact that thirteen thousand people a week depend for some part of their enjoyment of a hit show on that very technology.

But then, the producers did consult the experts.



Alistair and a section of the floor.



The tubes and Environ ballasts beneath one of the 'white' squares.

## Good Morning, London!

Limited Head Room Gives Light Rig the chance to show its Paces

In our last issue we proudly reported that A.B.C. Television had chosen Light Palette for their studio from which 'Good Morning America' is produced in New York City.

Now A.B.C. News have completed a model installation of Strand Light Rig in their London News Studio.

Because this is on the 4th floor (strictly speaking the third, but once within A.B.C.'s hospitable portals you are in America) of a London office block rather than a studio with the height any purpose built studio would have, a fully flexible lighting suspension system that could be used really close to the ceiling was needed.

And because the studio is, quite literally, one end of their very busy newsroom, floor space itself is at a premium. We all know that central London office rentals means that it costs thirty pounds per annum to accommodate a waste paper basket.

"One end fixed — t'other end floating"

That is really the key to the design of Light Rig.\* Lights are suspended on 'carriages' that run along aluminium channels which can pivot as required.

Lighting bars no longer need to be horizontal to each other. Think of the freedom for placing lights this gives to the small video studio.

All the usual pantographs, curtain runners, end stops, etc. are available, and standard tubular hangers allow a level system of bars to be used where the ceiling itself is at several different heights above floor level.

For full details, send for the comprehensive technical leaflets.

\*Not offered in U.S.A.



Head height at a premium! Light Rig channels installed just below the ceiling in A.B.C. News London Studio.

## The National Museum of Photography, Film & Television at Bradford

The Editor visits the Wool Capital of the West Riding and finds a surprisingly located but very interesting collection.

Strand Lighting's connection with the National Photographic Museum is really not a lot greater than with the British Museum, where Minims light the Elgin Marbles or with the Science Museum where Environ dimmers control the lecture theatre fluorescents.

My visit was really for my own interest, although a little poking about and chatting to the museum staff revealed that Strand does have a strong presence.

Why Bradford for this important collection? There is a tenuous West Riding connection with the film industry — Leeds was the home of Britain's finest projection equipment, Rank Kalee, and James Mason was born in Huddersfield, but photography? and television?

Perhaps a whole gaggle of Yorkshiremen will write and put me to shame, but for the present I can only assume that the location

arose because a suitable building was available.

I remember first visiting the then empty shell of this theatre some twenty years ago.

However great things have been accomplished. The old auditorium circle has been turned into Britain's first — and so far only — Imax Cinema. Galleries are devoted to all aspects of photography, as diverse as a Victorian photographer's studio and a six foot high model of a modern single lens reflex camera. I now have some idea of what goes on inside the Editorial Pentax.

A new Kodak gallery is being equipped to house that company's own very comprehensive collection, and there is a new Television gallery, whose opening last year marked the fiftieth anniversary of the day — 2nd November 1936 — when the BBC's Alexan-

continued overleaf....



## The National Museum of Photography, Film & Television at Bradford

### continued from overleaf

dra Palace Studios began the world's first regular high definition television transmission. (Strand was there, of course. The studio lighting control was by a Grand Master, just as today's television studios have their Galaxys, Geminis and Light Palettes.)



Visitors Entrance to the galleries and the Imax cinema.

For anyone interested in the technology of show business, and that presumably means every 'Strandlight' reader, a visit to Bradford is well worth while. And to see how far Cinema, speaking technically, has come a visit to the Imax Cinema is a must.

This Canadian invented system uses 70mm film (twice the standard film stock width) but it projects it horizontally, thus allowing an actual frame size ten times the normal. This means that even when the image is projected on the Bradford screen, which is 52 feet high by 63 feet wide, there is still very high definition.

There are several very clever Imax design features. There is the use of 68% shutter, in place of the normal 50% shutter, thus allowing full screen brightness, even at this screen size, from a 4k Xenon. The film is transported horizontally through the gate in a series of waves and the frame actually being projected is held on registration pins by vacuum suction, keeping the film perfectly flat and exactly in focus. To me that seems about three really new and brilliant ideas.

The sound is six track magnetic recorded on a separate 35mm tape, interlocked with the projector.

The sequence covering the take off of a Shuttle rocket is really something to see. To give an idea of the detailed information the Imax format gives the viewer, did you ever wonder at the large clouds of white vapour that appear to accompany every rocket launch? I can now tell you that this is because the whole launch pad is deluged with water from about fifty four-inch mains pipes before and during ignition, and this water instantly turns to steam.

And the soft lighting between these dramatic Imax events? Yes — the ever useful Harmonys — I spotted them.

Within the museum is a very well equipped video studio. Strand Quartzcolor lighting controlled by a Tempus 6.

This studio is used by various local groups and is operated by the local education authorities.



Collin Harding, the Curator of the Kodak Gallery with a recently installed Environ rack.



Philip Hunt, the A.V. Technician, poses in front of a Redhead — an 800w one, of course.



Barry Barnes at the Imax projector — the public can see into the projection room and be suitably impressed.

### Footnote

Turning to my favourite bedside book, the Kinematograph Yearbook, 1938 edition, I find that Bradford then had no less than 40 cinemas, one for every 7300 Bradfordians, so perhaps the cinema connection at least was stronger than I appreciated. ■

# A Television & Theatre Lighting Guide for Australia

Some examples of Strand Lighting's special product range manufactured in Australia



A Minipak 2: Twelve x 2.5k dimmers.



A Minipatch: This is a 48 way, 24 and 60 way versions are available as standard.



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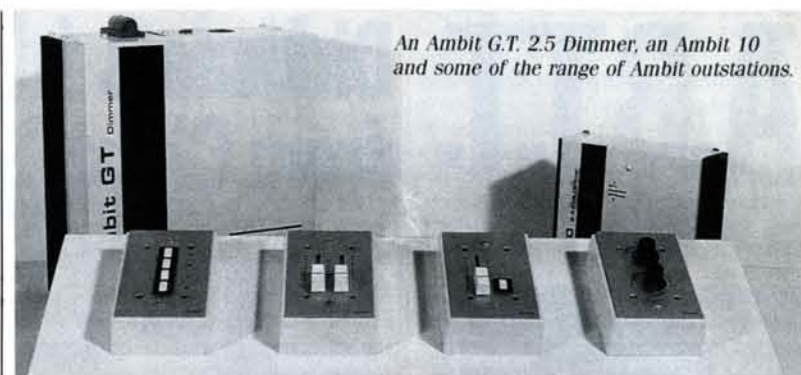
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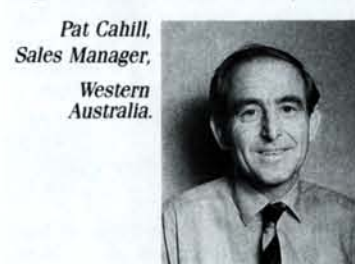
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