

JUNE 1978

**Marconi
Radar**

ECHO

The internal newspaper of Marconi Radar Systems and its people

FLYING VISIT

ADMIRAL Sir Richard Clayton, KCB, the Controller of the Navy, literally "dropped in" at New Parks, Leicester, on May 23 for a review of latest developments.

The Admiral, seen here after arriving on the site by Royal Navy helicopter, was welcomed by Managing Director John Sutherland (right) and Marketing Director Peter Way.



AT WORK ON 800 SERIES - see centre pages

The naval connection

THE pictures in this edition of ECHO underline the strong links between Marconi Radar and the Royal Navy and other navies overseas.

We provide virtually all the radars for the ships of the Fleet and we have recently been discussing programmes of development and production of naval equipment for the Ministry of Defence stretching well into the nineteen eighties.

You will all have seen pictures of the SEA DART radar at Leicester and the SEAWOLF radars at Chelmsford, and many of us in the Company have worked on these projects. These are the key elements of two superlative weapon systems which will be protecting the ships of the Royal Navy against attack for many years to come.

Advanced

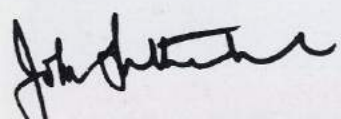
We are also developing, and will soon be producing for the Navy a very advanced new surveillance radar system which will give the earliest possible warning of the approach of a potential enemy.

It will be built as a 'family' of radars from which just the right combination of units can be chosen to fit the requirements of each class of warship.

Orders

The radars for the Royal Navy have been developed under contracts from the Ministry of Defence. In parallel, we have been investing Marconi Radar's own money in the design of a range of 'private venture' radars aimed at weapon systems for smaller vessels, and we have already won orders valued at over thirty million pounds for these equipments as part of the export business of British shipyards.

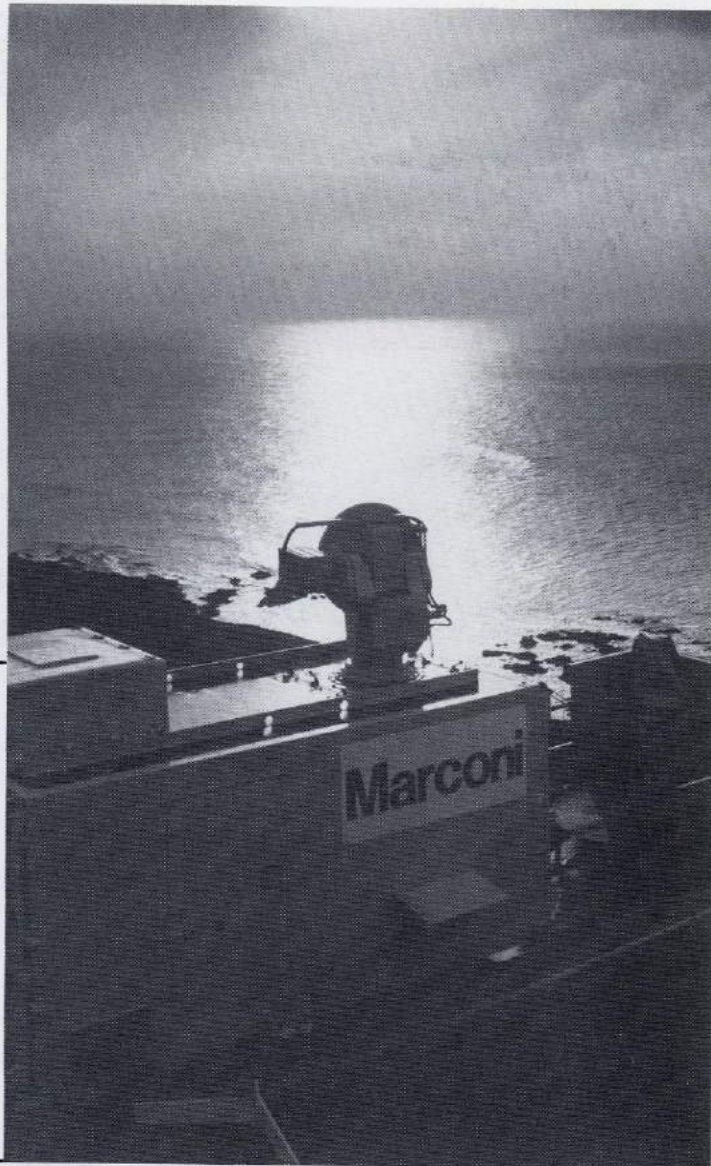
We can all take pride in our achievement in the naval field, and can enjoy the close association we have built up both with the Royal Navy and with foreign navies who look to us for their defence.


JOHN SUTHERLAND,
Managing Director.

ON THE RANGE

THE ST802 radar at HMS Cambridge, the Royal Navy gunnery range, after the first successful 'live' firing trials of the Sapphire lightweight gun-fire control system. Production of the 800 series is now well under way in our factories.

FULL REPORT
AND PICTURES
— see pages 6 and 7



In the Far East

MARCONI RADAR was represented at two BMEC Naval Forums recently, one held in Manila and the other in Singapore. Our picture shows H.E. The British Ambassador to the Republic of the Philippines, Mr. William Bentley (left) greeting Commander Bremer Horne, the Company's Naval Adviser, on the Marconi Radar stand in Manila.



Letter of thanks

THE Managing Director has received the following letter from Mr. S. F. Neal, Secretary-General of the Royal Air Forces Association.

Dear Mr. Sutherland,

I was able to report to our Homes Management Committee yesterday of your most generous donation of a colour and black-and-white television to Sussexdown. This at the specific request of Group Captain Sir Douglas Bader.

The sets have now been installed at our Home and are much appreciated by all residents, and we are indeed most grateful to you for so readily acquiescing to Sir Douglas's wishes.

Yours very sincerely,
Frank Neal.



Sir Ian Gilmour at Leicester

SIR IAN Gilmour, MP, Shadow Minister of Defence, recently visited the Company at Leicester. On arrival at New Parks he was met by John Sutherland, Managing Director, and Colin Latham, Development Manager, Leicester.

Sir Ian was given a review of some of the latest developments in naval radar, simulation and control systems, and later toured the Blackbird Road factory.

Our picture shows Sir Ian (second from right), accompanied by John Sutherland and Works Manager Owen Jones, talking to Sam Gill, Works Convenor.

"Hullo" girls say goodbye ...

JUST before her official retirement a surprise party was held at the MASC Chelmsford for Gladys Huggins, chief telephone supervisor. She had been with the Company for 48 years.

"Hugs" or "Huggy", as she is known to her girls, knew nothing of the party plans and was quite overcome when she arrived, expecting to have a quiet meal with four supervisors, to find 60 past and present telephone operators ready to give her an evening to remember.

Three of the "old" girls had travelled from Dovercourt and had not seen each other or "Huggy" for twenty years. There were girls from the GEC-Marconi establishments at New Street, Writtle Road, Gt. Baddow, Writtle, Rivenhall, Witham and Basildon.

Party

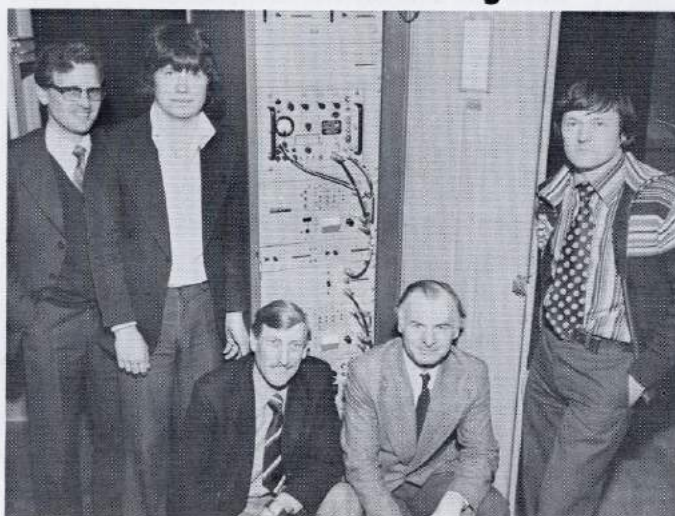
Pat White, New Street supervisor, made the arrangements, which started as a small get-together and finished as a large party as news of the event spread on the telephone grapevine.

Miss Huggins was obviously delighted with the electric sewing machine which Pat presented on behalf of the girls, and the girls showed their appreciation and affection for Miss Huggins with their hearty rendering of "For She's a Jolly Good Fellow."



Gladys is seen here (centre) with David Harper, Manager Central Administrative Services, who presented her with a radio on behalf of colleagues and friends.

Success story for new unit



THE first of our S6028 Interrogator Responder Racks, a major element of the Company's new S464 Secondary Surveillance Radar system, having passed final test is now on its way to site.

Pictured here with the equipment are (left to right) John Marrs, Rod Reader, Harry Cole, Alan Cheese-wright and Ken Mould.

Rod and Ken, both of Radar Test Department, worked long and hard to get the unit through its tests ready for successful acceptance by the customer. They were backed up by John and Alan, Systems Design Engineers responsible for the test specification.

Harry Cole did the systems design for the complete radar S464, and nine of these have been sold so far.



The C.S.A.S. team of authors working under the direction of (left to right) Dennis Melling (Senior Author), with Jimmy James, Ken North and Jim Welcomme.



(Left to right): Barbara Pring, Anita Hurd (Chief Tracer), Janet Mallett (sitting), Judith Forrest, Anne Urry and Sarah Cooper provide an excellent D.O. service.



F Doug Clarke, Chief Technical Author and Office Manager, and Myra Leonard, Office Administrator.



Lynn Blackburn, Receptionist and Telephone/Telex operator, and Catherine Chandler, I.B.M. typist.

SPOTLIGHT ON NORWICH

A close look at one of our newest outposts...

*** WE continue our review of the Company's outlying locations by turning the spotlight in this issue on to one of our youngest outposts — an extension of our Technical Information Department which was established at Norwich in November 1973.**

The office was opened at Queen's Road with a locally-recruited staff of 17 — mainly technical authors but including some drawing office staff — under the overall supervision of T.I.D. Manager Ken Stoker, Support Division, Chelmsford. Managing 'on the spot' at Norwich is Chief Author Doug Clarke, formerly of Writtle Road.

As the Company's order book continues to grow, so more technical publications are required. In September of last year the Queen's Road staff, which had grown to 30, moved to new and more spacious premises at St. Peter's House, Cattle Market Street. At present they



St. Peter's House from the city car park; T.I.D. occupy the second floor.

occupy about half of the second floor of this well-appointed office block, but expect soon to take over the whole floor to give them a total space of some 8,000 sq. ft.

Campaign

The present staff, in addition to Doug Clarke and office administrator Mrs. Myra Leonard, consists of 2 senior supervisory authors, 10 senior authors, 12 authors, 8 trainees, 4 test programmers, 2 computer programmers, 5 D.O. staff including the chief trainer, an IBM typist and a receptionist/telephonist/telex operator. The recruiting campaign for more staff continues under Ken Holliday of T.I.D. and George Ellis of Personnel.



TACAN and a proportion of in-house documentation is produced by (left to right) Ken Seago, Mike Addison, John Hughes and Ian Lilley.



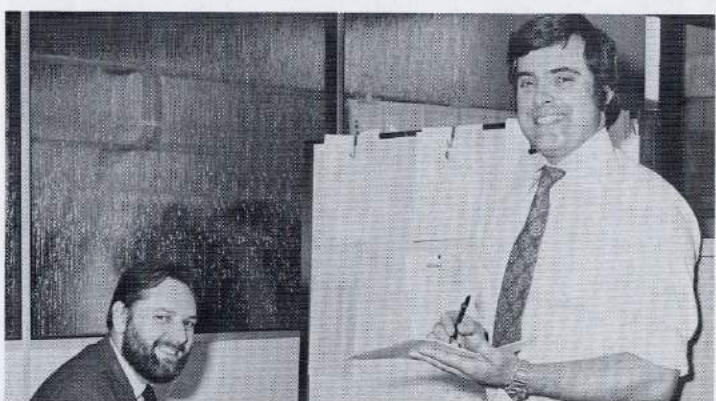
(Left to right): Ivan Morley, Peter Howell, Christine Collins, Fred Hill and Cliff Banham. Ivan, Peter and Fred are Test Programmers, Christine and Cliff are Computer Programmers — all involved with M.A.L. A.T.E.



The NIMROD A.T.E. team of authors: (Left to right): Mike Carn (Project Controller), Pete Searle, Dave Scott, Jim Skillern, Gordon Kellaway, Martin Darke, Henry Vincent and Slim Taylor.



GWS 25 and Software team of authors: (Left to right): Alan Gilkes, Arthur Clarke, Tania Watson, Brian Coles, Derek Smith and Ron Wells. Alan, Tania, Brian and Derek are senior authors.



(Left to right): Fred Watkins (Project Controller) and Dick Sumser form the nucleus of the "Tornado" A.T.E. publications team.



(Left to right): John Fraser, Jim Tufnail, Chris Healey, Ken North and Harry Holt prepare M.O.D. P.D.S. documentation under the guidance of Jim, who is a senior author.



The A.F.D.S. team of authors—(Left to right): Brian Brunger (Senior Author), Pete Hawes and Doug Trower.

AT WORK ON



● Members of the Sales/Operations Department in conference. (Left to right)—Norman Rome, Senior Project Manager; Peter Mackness, Naval Sales; Max Stothard, Operations Manager; David Pott, Naval Sales; and Terry Deane, 800 series project office.

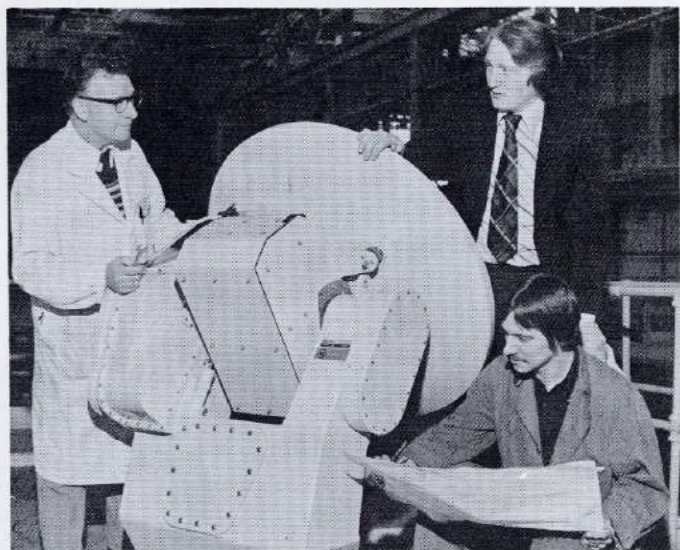
* **INVESTMENT** in Research and Development within the Company amounts to some £13 million annually.

About half of this work is Government-sponsored and weighted towards naval equipment, while the other half consists of private venture development of new products and updating existing ones.

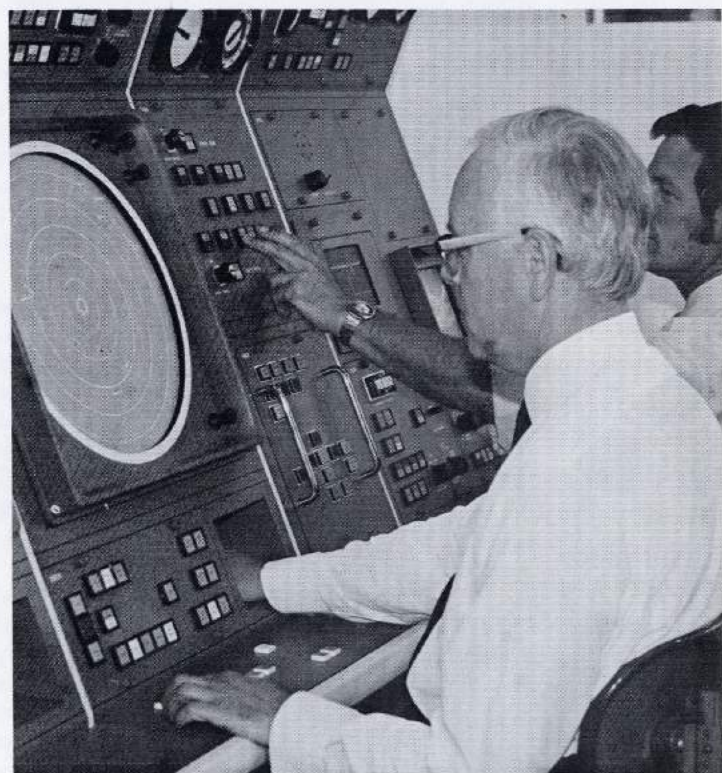
Lightweight

One of the Company's major private venture developments has been a range of lightweight radars, the 800 series. This is the basis of many modern weapon systems for the small naval vessels — fast patrol boats, corvettes and frigates — and also finds application in ground fire control systems. Sales of the 800 series at home and overseas already amount to over £30 million.

Many people throughout the Company — at Chelmsford, Leicester, Gateshead or other locations — are involved in the development and production of 800 series radars, and on these pages we show some of them at work.



● Left: (Left to right)—George Smitten, Tester; Neil Branston, Production Controller, and Keith Bacon, Fitter, with an 800 series director at Blackbird Road.



● Roy Manser, Section Leader Draughtsman (left) and Ron Cole, Technical Illustrator, are seen here demonstrating the 800 series control console mock-up made at Watford for ergonomic assessment.

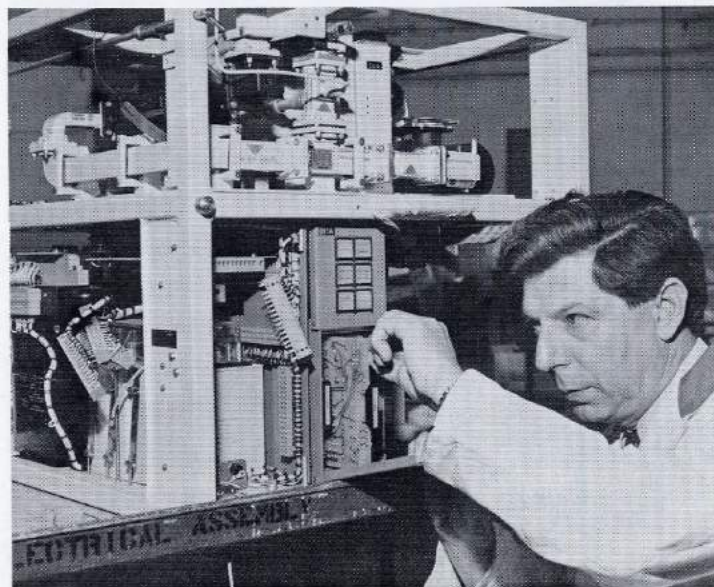


● Artist's impression of a 46-metre Vosper Fast Patrol Boat fitted with Marconi S810 and ST802 radar systems.

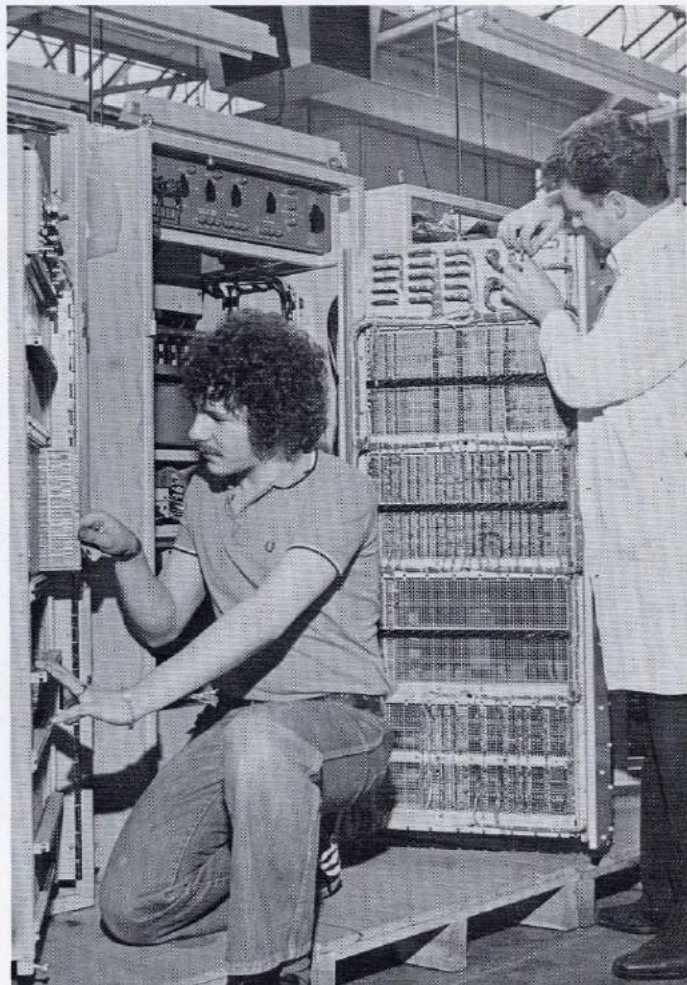
800 SERIES



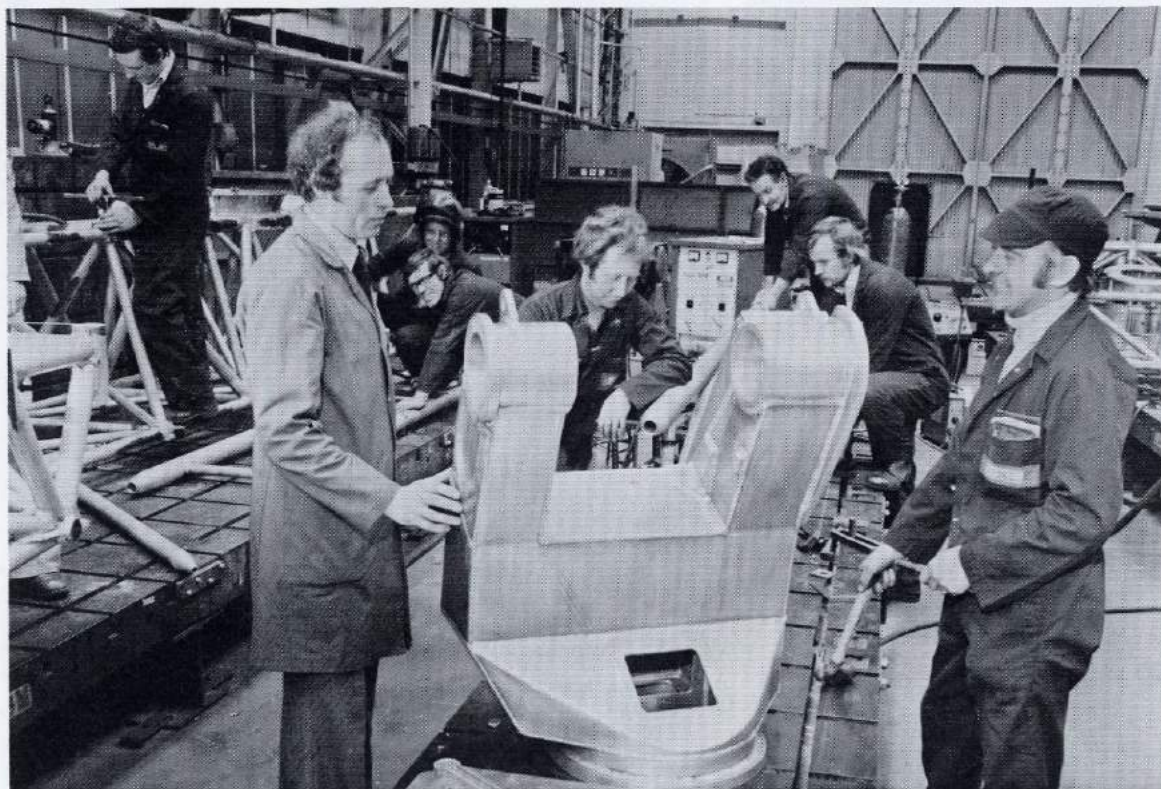
● Model of Hovermarine Transport HM5 Hovercraft, fitted as fast attack craft with Marconi S820 and ST802.



● Frank Beckham, Foreman, Electrical Assembly, Blackbird Road, puts the final touches to a transmitter sub-unit.



Above: Prototype wiremen Mick Colman (left) and Vic Pyatt working on a signal processing unit at Leicester.



Below: A hive of activity at Gateshead with, in the foreground, Neil McOnie (left) and Stan Cable at work on a radar yoke assembly. In the background (left to right) can be seen Brian Weathersson, Dave Forrest, Ronnie Charlton, Keith Morland, Stewart Brittain and Dave Atkinson.

EDDIE'S FAREWELL

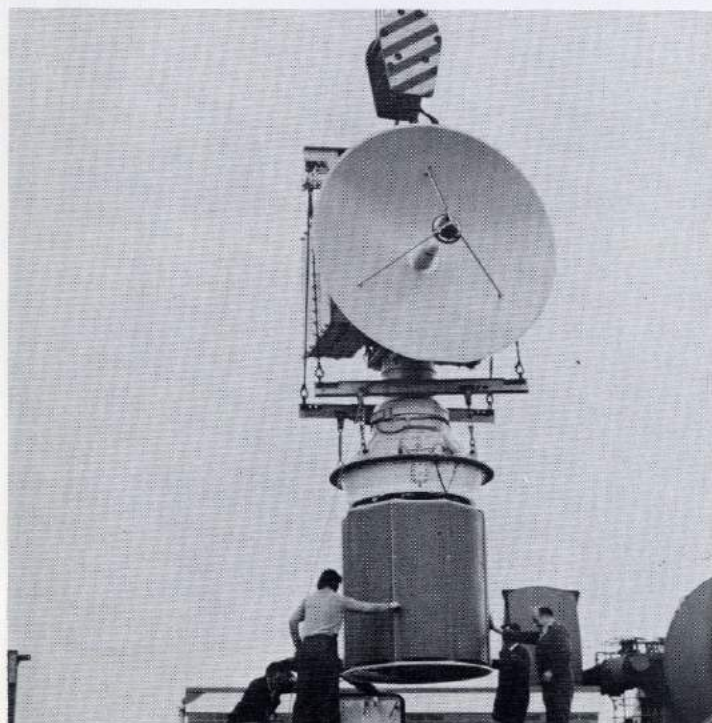
EDDIE Crooks, Group Chief Mechanical Engineering with Technical Services Department at Baddow, recently left the Company after 11 years' service to join the Health and Safety Executive as an Inspector of Factories. Eddie is seen here with Ian Butler, Director and Manager of Support Division, who presented him with a digital watch on behalf of his colleagues.



ON THE MOVE

TWO large transporters recently made an early morning journey through the outskirts of Leicester with a Type 909 (Sea Dart) radar system on board. The radar was being moved from Blackbird

Road factory to New Parks laboratories, where development work will be carried out. Our picture shows the equipment being re-assembled on arrival at New Parks.



Gateshead Awards

AT a recent presentation at Gateshead, Works Manager Bill Henderson presented a number of employees with Veterans' Association ties for 25 years' service and gold watches for 40 years.

In our picture are (left to right): Messrs. J. R. Dunn (25 years), R. Cox (40), R. Hedley (40), L. Zissler (40), W. I. M. Henderson, S. H. Leask (40), J. Nicholson (25), T. H. W. Hill (40), F. H. Holloway (40) and D. G. Young (40).

General at Writtle Road



GENERAL Sir Hugh Beach, Master General of the Ordnance, Ministry of Defence, toured the Writtle Road site during a recent visit to Chelmsford.

The General was welcomed by Roy Simons, Technical Director, and was given a presentation on

the Company and its products by Mr. Simons and John Brindley, Business Manager, New Parks.

Our picture shows the General with John Brindley (left) and Sir Robert Telford, Managing Director, GEC-Marconi Electronics.



Tank firing demonstration

THE Marconi Simplified Fire Control System SFCS 600 was recently demonstrated to a group of visitors at the Gunnery School and trials range of the Royal Armoured Corps at Lulworth Camp, Dorset. The Centurion

tank in the picture, with Marconi equipment installed, will form the Company's exhibit at the British Army Equipment Exhibition at Aldershot from June 19 to 23.

WORLD CHAMPIONS

THE WORLD professional modern dance champions, Richard and Janet Gleave, show how it should be done during their demonstration of Latin/American and Ballroom dancing at the Marconi Club, Chelmsford. The occasion was the Spring Gala Dance of the Modern Dance Section of the M.A.S.C.

After the demonstration, a presentation of Alex Moore Ten-dance Awards was made by

Richard and Janet to three pupils of the Eden School of Dancing, the successful school run by Edna and Denis Cattermoul who are the resident teachers of dancing at the Club.

The Modern Dance Section meets on Thursday evenings throughout the year, with a short break during July and August. The new session will start on September 7, and new members are welcome.



He's the Greatest

THE lady in our picture is Mrs. J. Downey, Deputy Mayoress for the Borough of South Tyneside, who is employed at our Gateshead Works. Mrs. Downey and her husband the Deputy Mayor are seen here with a distinguished visitor to South Shields. The visitor's name escapes us, but we think he may be from the Ministry of Self-Defence.



Bruce's new boat



BRUCE Long, Section Leader, D.O. Services, T.I.D. at Writtle Road, is seen here hard at work on his new boat which he intends to enter in the 18-footer skiff open world championships at Plymouth starting on July 8. He has built the boat by himself in just over four months, with help from Company apprentices under the guidance of Brian Henderson and John Davidson, who have produced some of the specialised fittings.

Bruce has already made two trips to Australia, having raced at Brisbane in 1975 and Sydney in 1976. But this year he has an

added incentive to do well, for the boat is being sponsored by Marconi Radar and will sport the Company's name on its sails and hull. The boat is also being partly sponsored by Windmaster, who have contributed the sail cloths.

Several countries will be represented in the championships and some exciting racing is expected. Because of their speed and size these boats are well worth watching in action — with all gear set they can fly along at 20 knots. We wish Bruce and his two fellow crew members the best of luck at Plymouth.

DESIGNS ON GLASS

ONCE HOME at the end of the working day after supervising the development of Marconi TEPIGEN (Television Picture Generator) at New Parks, Terry Rowley, Chief Engineer Computer Applications, will more likely than not turn his hand to creating pictures of a very different kind.

Entirely self-taught and with no formal training, Terry has mastered the technique of engraving intricate designs on glass. He already has more than 20 finished items to his credit, ranging from brass rubbing designs on window panes to delicate engravings on crystal goblets and glasses.



● The engraved glasses are difficult to photograph, but this scene of a harvest mouse in a cornfield gives some idea of the delicate work involved.

Terry's graduation from window panes to the more delicate crystal pieces came after seeing the work of Lawrence Whistler, considered to be the greatest living glass engraver. Terry joined the Glass Engravers Guild so that he could compare notes with other engravers, and soon many people who saw his work were commissioning items of glassware for special presents.

"The West Midlands is famous for its crystal production and so good glass is easy to obtain in this area," says Terry. "I still have a lot to learn, but I find that as more people request special designs, such as holiday views and favourite pets, so my technique is improving all the time."

"The engraving on crystal is done with a hand-held diamond mounted in a holder. The technique is to tap the glass with the diamond to form little spots, or to scratch it for lines. The average piece takes me about four or five hours to complete, but I find it an absorbing hobby and an ideal form of relaxation."



Terry at work engraving an intricate design — in this case the coat of arms of Market Bosworth, his home town — on a crystal goblet.

Lunchtime meetings

THE Writtle Road Christian Fellowship meets each Monday lunch-time in 'D' Building Reception, at 12.35. Programme for the next few weeks:

JUNE 12: 'The Bible and Work' — study on the teaching of Jesus, led by Peter Miles.

JUNE 19: Follow up discussion.

JUNE 26: Visiting Speaker: Revd. John Kemp.

JULY 3: 'Dust or Destiny' — another in the series of Fact and Faith films, to be shown in the Waterhouse Lane Canteen. A bookstall will also be available.

JULY 17: 'The Bible and Work' — study on the teaching of the Apostle Paul, led by Melvyn Sach.

JULY 24: Follow up discussion.

These meetings are open to anyone to come and discuss matters concerning the Christian faith.

Further details from the Secretary, Doug. Jones, on extension 2291.



A date for your diary

MARCONI Radar will again be one of the sponsors of the Donkey Derby organised by the Lions Club of Maldon at Elm Farm, Creeksea, Burnham-on-Crouch, on Saturday, June 17th.

Last year the Lions were able to donate £700 to local charities from the Donkey Derby profit. This year they have decided to support the Maldon and Burnham branches of the WRVS, who are sponsoring the building of sheltered accommodation for the elderly and less able members of the community.



Percy cheques out!

● PERCY CARTER, who joined Field Services in 1956 and subsequently served in various places throughout the world, including Norway, Austria, Cyprus and Saudi Arabia, retired at the end of April.

Percy, seen here receiving a cheque from Maurice Burrage, Controller local systems testing and training, was also presented with a clock by Bob Horton (right), Test Site Controller at Rivenhall, on behalf of his colleagues.



Tom Atkinson retires

TOM Atkinson has retired after completing a total of 24 years' service with the Company, first at Trafford Park, Manchester, and subsequently at Blackbird Road and New Parks, Leicester.

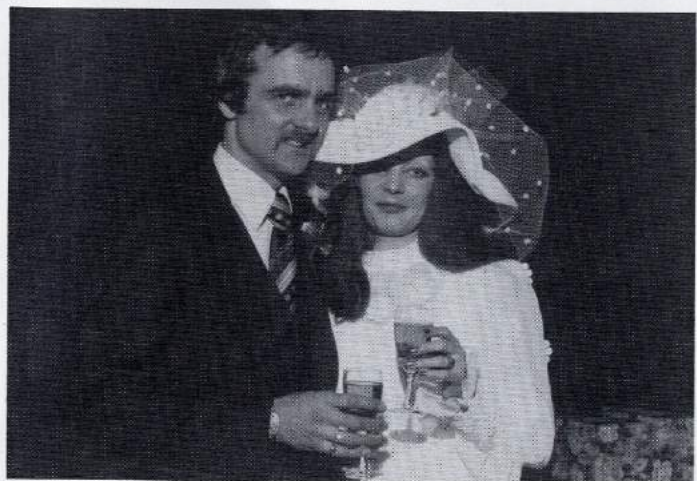
Tom joined the Radar Engineering Department of Metropolitan Vickers at Manchester in 1946 after serving throughout the Second World War in the RAF and reaching the rank of Flight Lieutenant. Over the next four years he travelled widely, installing and servicing 'Sea Scan' radar.

Returned

In 1950 Tom joined Ambassador Radio Company as Works Manager of their domestic television factory, but returned again to Metro-Vick in 1958. With the expansion of the marine radar business at AEI Leicester in the early 1960's, he was invited to join the team at Blackbird Road responsible for setting up a world-wide radar service network. Working closely with the Marine Radar Trading Group's chief engineer, Ian Christie, he was responsible in 1970 for the installation of the world's first commercial navigation radar controlled by computer into the passenger liner 'QE2'.

In the early 1970's Tom joined Contracts Department at New Parks and worked on naval radar contracts as a Senior Contracts Officer. He spent his last six years on this type of work for MOD (Navy), working for the last two years in the Operations Department under Bob James.

GIFT FOR THE BLIND



Marconi people help out

*THIS Frigidaire automatic tumbler dryer, with a value of over £360, will be put to good use by the Torch Trust for the Blind at Hallaton, Leicestershire, thanks to the Marconi (Leicester) Employees Charities Scheme.

Pictured here at the presentation with officials of the Trust are Marconi committee members David Paterson, Ken Lacey, Margaret Berry and Harold Wright.

JANE Albrecht and Brian Highton are pictured here after their wedding at Market Drayton, Shropshire. Both work for the Company at New Parks: Jane is secretary to John Brindley, Business Manager, and Brian is an electronics engineer in Control Systems. Jane's sister, Doreen, travelled from Toronto in Canada to be at the ceremony.

CHEERS !

Happy event for Maureen

OUR congratulations to Mrs. Maureen Doolan, visual aids assistant at New Parks, who recently left us in anticipation of a happy event. Maureen is pictured here with some of her colleagues, including John Parr, the Company's Chief Publicity Officer (far right), who presented her with farewell gifts on their behalf.



UP FOR THE CUPS!



Members of the Football Committee with President-elect Tom Mayer at the presentations. (Left to right): Treasurer John Knight, Radar Accounts; Chairman Phil Champion, Radar Contracts; Tom Mayer; and Committee members Ray Pitt and Mick Downes, MCSL.

Football trophies presented

THE Marconi Inter-Departmental Football Competition has just completed another very successful season. Unfortunately, Radar teams were not among the Cup and League winners this time. Marconi Marine carried off both the Cup and League Champion's trophies, to complete a brilliant double.

Presentations

The trophies were presented by the competition's new President elect, Mr. Tom Mayer, Managing Director, MCSL. After the presentations a disco was held, which was very well supported by officials, players and their guests.

Season

The A.G.M. will be held at M.A.S.C. on Wednesday, 21st June, 1978 and any department at Chelmsford which would like to join the competition for season 1978/79 should contact the Secretary:

Harry Bradshaw,
Supplies Department,
'C' Building,
Writtle Road Works,
as soon as possible prior to the A.G.M.

P. H. E. CHAMPION

Seven-a-side success for the 'Heavies'!

AN interdepartmental seven-a-side football competition was held at Leicester during April. The competition was organised on an inter-site basis and attracted eight teams from New Parks and eight from Blackbird Road.

All the games were played on the Company sports field at Dorset Avenue and the contest culminated in an inter-site final between Heavy Assembly of New Parks and Sub-Contracts of Blackbird Road on Sunday, April 23. The eventual winners, after a hard fought final, were Heavy Assembly, who won by three goals to nil.

The referees for the competition were Mr. J. Jeacock and Mr. D. Cox, each of whom officiated for one half of the final.



The Heavy Assembly team after their victory. Back row (left to right): Steve Oakley, Brian Kindred, John Marriott and Brian Schroder. Front row (left to right): Chris Root, John Toseland, John McCallum (Capt.) and John Robinson. David Hill and Lee Norman (not in the picture) also played in the competition.

GOLF

Annual meeting

THE society's Annual General Meeting on March 21 was well attended.

Tom Mayer (MCSL) was elected President, Fred Robertson (MRSL) Captain, and Joe McCarthy (EEV) Vice Captain. Eric Marshall (Research) was elected Treasurer and Ernie Wardman (Research) Secretary.

After the retiring Captain, Roland Crompton, had given his report, the meeting went on to discuss the coming year's events. Matches have been arranged with Cable and Wireless, Sadds, Maldon Golf Club and Channels Golf Club.

Our Captains/Presidents Day opened the season on May 6 and we have arranged two open days — one at Thorndon Park, which is the Essex Championship course, and our final event at Maylands in October.

New members to the society are welcome. For further details contact the Secretary, Ernie Wardman, at Baddow, Room 54A: telephone internal 469, external 73331, ext. 107.

BOWLS

Grand opening

MARCONI Bowls Club are proud to announce the Grand Opening of their spacious new club house at Waterhouse Lane on July 15th, 1978.

Activities commence in the afternoon when Sir R. Telford, Club President and Managing Director of GEC Marconi Electronics, will field his team in opposition to a team selected by Club Captain Arthur Spooner of MCSL. Support for either team will be most welcome at the green during the afternoon when the facilities of the club house will be available to all visitors.

The official Grand Opening ceremony will be performed by the Club President during an evening of entertainments restricted to Bowls Club members.

Why not contact Club Secretary Dr. G. Richards at the Great Baddow site, Chelmsford telephone number 73331 extension 71, for details of the club's activities, including non-playing membership, friendly matches, etc.? All enquiries will be appreciated

STOP PRESS

● We extend our congratulations to Robert Telford, Managing Director of GEC-Marconi Electronics, on the knighthood bestowed on him in the Birthday Honours List, news of which comes to us as we go to press.

More about Sir Robert, who has been honoured for services to export, will appear in our next issue.