ANNUAL REPORT

Edinburgh and S-E Scotland
Regional Blood Transfusion Service

March 31st 1973 - March 31st 1974

The Thirty-Eighth Annual Report of the Regional Executive Committee of the Edinburgh and South-East Scotland Regional Blood Transfusion Service is of especial significance. In the first place we must record the retiral of the Regional Director, Doctor Robert A. Cumming, on January 20th 1974; the death of Mr. Andrew J. Dobbie, our Honorary Regional Secretary and Treasurer; and finally note that this will be the last report on a regional service operated jointly by the Scottish Home and Health Department and the Scottish National Blood Transfusion Association, for on 1st April 1974 the management of the Service was transferred to the Common Services Agency.

Doctor Robert Cumming was appointed Regional Director in April 1948. Since that time he steadily built up a community blood transfusion service, ably assisted by many devoted colleagues, which many people all over the world regard as unique and which we can be justly proud. At a national level he was responsible for the development of the Scottish National Plasma Fractionation Centre (originally housed in the Royal Infirmary). The magnitude of his vision and the consistent effort expended in this area of blood transfusion has produced an organisation which is one of the foremost in Europe and of incalculable value to the peoples of Scotland. Above all he rightly regarded the blood donor as the key to a successful transfusion service, and spent all his professional life in Edinburgh seeking out ways and means to make the very best use of each donation and laying the foundations for developments which could influence the lives of many patients in the future. He instilled into his staff the philosophy of service to the community and believed that as the voluntary donor system could meet all needs, it was the task of those in the Centre to see that no patient was denied access to blood or blood products whenever there was good reason for administration. Robert Cumming is a kind and generous man with a talent of making all his staff feel important members of a team. It is, therefore, with delight and a sense of pride we learn that he has been made Honorary Consultant to the Scottish National Blood Transfusion Association and we would take this opportunity of wishing him and his wife, Marion, a long, happy and productive retirement. Doctor John D. Cash has been appointed to succeed Doctor Cumming.

The Service has lost a great friend and staunch supporter with the death of Mr. Andrew J. Dobbie on November 30th 1973 - his 67th birthday. He became its Honorary Secretary and Treasurer in succession to Mr. Charles Gumley, W.S. when the latter was appointed Honorary Secretary to the Scottish National Blood Transfusion Association in 1940. Mr. Dobbie was meticulous in all he did and those who were privileged to work with him were aware of the effort and care he expended in ensuring that the arrangements for each meeting and the compilation of the Annual Report and accounts were carried out with the utmost precision. He was respected and admired not only for his able conduct of its secretarial and financial affairs, but also for the deep affection he held for the Service and for blood donors. Mr. Dobbie was a most warm-hearted, generous and unassuming person. Now that he has become part of our history, the Service wishes to record with sorrow at his passing and its affection and gratitude for his work, wise counsel and the privilege of his friendship. Sincere sympathy is extended to Mrs. Dobbie and the family in their great loss.

There is no doubt that we have had an anxious time this year watching the final arrangements made for the transfer of the Blood Transfusion Service to the Common Services Agency; a newly established administrative machine conceived as part of a reorganised Health Service. The anxiety stems, at least in part, from a natural fear of change in any form. However, at the present time, we have no reason to believe that the Edinburgh and South-East Scotland Blood Transfusion Service will not continue to operate as it has done in the past. Nevertheless, this would be an appropriate occasion for the staff of the Regional Centre to assure our honorary donor organisers, our many blood donors and patients that we intend to continue to work together and serve them with the same enthusiasm and single mindedness of purpose as has been our habit in the past. To this end we welcome the appointment of Major General H. Jeffrey, National Medical Director and Miss Morag Corrie, National Administrator of the Scottish National Blood Transfusion Service and look forward to a happy and fruitful association.

One of the most important recent developments within the Blood Transfusion Service in Scotland has been the building of a large complex at Ellen's Glen Road

on the south side of Edinburgh for the fractionation of plasma from all over Scotland. This is converted into a variety of products which are essential in the management of patients with such conditions as haemophilia, and in the prevention of certain infectious diseases such as hepatitis and tetanus. This development will have two important consequences for the Edinburgh and South-East Scotland Service. In the first place it will provide us, along with the other regions in Scotland, unlimited capacity for plasma fractionation. Secondly, with the final transfer of our colleagues from the Royal Infirmary to Ellen's Glen Road, we will, at last, have the accommodation necessary to meet the needs of the work in the Regional Centre.

Study of the statistical section of this Report shows that the number of donations received during the current year was 59,326, which was slightly up on last year (58,427). It should be emphasised, however, that we are making satisfactory progress in using our donations more effectively: in the current year we obtained 80% more plasma than last year, and plans are now well advanced to develop this aspect of our work even further. This trend is inevitable if we wish to make full use of the new Plasma Fractionation Centre and in doing so use the voluntary donation to its maximum.

One of the disturbing features in the past 12 months has been the introduction of commercially derived plasma fractions into the United Kingdom from professional donors, often from countries less well endowed than our own. Although this development has made little impact within Scotland itself, there is little doubt that it represents a significant future challenge to our voluntary donor system. As Scotland now has excellent fractionation facilities our ability to compete with commercial interests will rest on our success at obtaining further supplies of plasma. Much can still be done, along with our clinical colleagues, in making even better use of what we already receive from the donor, but it seems inevitable that we will once again have to make the effort to raise the number of donations collected throughout the whole region. We would, therefore, like to appeal that our 'old donors' make a special effort to attend their local sessions and that in 1974-75 they double their endeavours to make new recruits.

Within the Centre itself, more than anywhere else, the efforts of our Honorary Local Donor Organisers and their many helpers are perhaps most clearly appreciated. It is appropriate in this Report that we should offer, on behalf of the many thousands of patients, our sincere thanks to them. It is particularly important to stress this aspect of our Service because just as we are facing up to the reality of losing Robert Cumming we will be saying farewell, later in the year, to Miss Helen White our Regional Organising Secretary who retires at the end of July 1974. Next year's Annual Report will contain our formal farewells to Helen White, but it is essential in this Report to exhort our Honorary Local Organisers to 'standfast' and continue to give their loyal support to a Service which means life or death to so many patients in the South of Scotland. Miss White will be succeeded by Miss Anne Hunter.

We would like to take this opportunity of welcoming Doctor A.B. Kay to the Regional Service, and to congratulate him on his appointment as full-time Consultant, which began on 20th January 1974. Doctor Kay comes to us with a major interest in immunological aspects of health and disease and it is in this area that he will take up his service responsibilities as well as undertaking further developments of what we believe to be an aspect of blood transfusion which has considerable future potential.

Apart from the essential direct and indirect patient services supplied by the staff of the department, research and development is not entirely neglected. This, unquestionably, has an important leavening effect on all members of staff and now results in our attracting a steady flow of postgraduate students from the various parts of the world. The scope of our interests can be partially expressed by the list of publications which have appeared in the 12 months, March 1973-74.

PUBLICATIONS

J.D. Cash, "Monitoring Fibrinolysis".
Postgrad. Med. J., 37-39 Aug. Suppl. 1973.

M. Cunningham and J.D. Cash, "Bacterial Contamination of Platelet Concentrates Stored at 20°C".
J. Clin. Path., 26, 401, 1973.

J. DaCosta and A.G. White, "Effects on Ethacrynic Acid on Human Red Blood Cells". Transfusion, 13, 305, 1973.

P.C. Das and R. Hopkins, "A Tanned Cell Haemagglutination Test for the Detection of Hepatitis-Associated-Antigen (Au-Ag/HB-Ag) and Antibody (Anti-Au/HB-Ab)". Abstract in Proceedings of the Joint Meeting of the European Societies for Immunology, held in Strasburg in September 1973.

A.M. Davison, A.T. Lambie, A.H. Verth and J.D. Cash, "Salt-Poor Human Albumin in Management of Nephrotic Syndrome". Brit. Med. J., 1, 481, 1974.

W.G. Dennyson, I.G.M. Cleator and J.D. Cash, "Transection of the Duodenum Following Blunt Trauma". J. Roy. Coll. Surg. (Edin)., 19, 19, 1974.

A.M.A. Gader, J.L. Anderton and J.D. Cash, "The Fibrinolytic Response to Venous Occlusion in Hypoproteinaemic Patients". Thrombosis Research, 3, 219, 1973.

A.M.A. Gader, A.R. Clarkson and J.D. Cash, "The Plasminogen Activator and Coagulation Factor VIII Responses to Adrenaline, Noradrenaline, Isoprenaline and Salbutamol in Man". Thrombosis Research, 2, 9, 1973.

A.M.A. Gader, J. DaCosta and J.D. Cash, "A Vasopressin Analogue and Fibrinolysis". Lancet, p 1417, Dec. 22, 1973.

A.M.A. Gader, J. DaCosta and J.D. Cash, "The Effect of Propranolol, Alprenolol and Practolol on the Fibrinolytic and Factor VIII Responses to Adrenaline and Salbutamol in Man". Thrombosis Research, 4, 25, 1974.

A.M.A. Gader, J. DaCosta and J.D. Cash, "1-Desamino-8-D-Arginine Vasopressin and Fibrinolysis in Man". Scot. Med. J., 19, 56, 1974.

A.M.A. Gader, J. DaCosta, S.M. Parker and J.D. Cash, "The Systemic Release of Plasminogen Activator to Intravenous Adrenaline in Man: Dose Response Studies". Thrombosis Research, 3, 51, 1973.

A.M.A. Gader, S. Parker, G.K. Crompton and J.D. Cash, "Fibrinolytic, Factor VIII and Pulse Rate Responses to Intravenous Adrenaline During Chronic Oral Salbutamol Administration". Thrombosis Research, 3, 137, 1973.

R. Hopkins and P.C. Das, "A Tanned Cell Haemagglutination Test for the Detection of Hepatitis-Associated Antigen (Au-Ag) and Antibody (Anti-Au)". Brit. J. Haematol., 25, 619, 1973.

R. Hopkins and P.C. Das, "Latex Agglutination Test for Detection of Australia Antigen (HB-Ag) Among Blood Donors and Patients". J. Clin. Path., 27, 40, 1974.

R. Hopkins and P.C. Das, "Australia Antigen (HB-Ag) Subtyping by a Sensitive Tanned Cell Haemagglutination-Inhibition Technique". Brit. J. Haematol., 27, 501, 1974.

M.S. Hoq, J.L. Anderton, A.R. Clarkson and J.D. Cash, "Urinary Excretion of Heterophile (Sheep) Haemagglutinins and Fibrin/Fibrinogen Degradation Products After Renal Transplantation and in Proliferative Glomerulonephritis". Lancet, p 1029, May 12, 1973.

M.S. Hoq and J.D. Cash, 'Studies on a Direct Latex Agglutination Technique for the Semiquantitation of Fibrin/Fibrinogen Degradation Products".
Thrombosis Research, 2, 23, 1973.

D.G. Jones and A.B. Kay, "Passive Sensitisation of Guinea-Pig Skin In Vitro for the Antigen Induced Release of Anaphylactic Mediators".
Clin. Exp. Immunol., 16, 213, 1974.

S. Moore and D.S. Pepper, "Platelet Specific Release Products to Monitor Function In Vivo".
Scot. Med. J., 18, 54, 1973.

D.S. Pepper, "Hudsoneering - A New Pastime for Discovering Old Hampshire".
Hampshire Mag., 13, 51, 1973.

D.S. Pepper, "Laboratory Dryer for Use with Multiple Fractions of Aqueous Organic or Corrosive Solvents with Recovery in Very Small Volumes".
Lab. Practice, 22, 538, 1973.

D.S. Pepper, "Dual Purpose Light Scattering and Centrifuge Cell for the Production of Dust Free Solutions".
Lab. Practice, 22, 493, 1973.

D.S. Pepper, H.D. Blume and I. Palin, "The Development of Albumin Containers for the Storage of Blood in Liquid Nitrogen for the Immunisation of Rh- Volunteers".
J. Clin. Path., 26, 550, 1973.

W.S. Uttley, H. Maxwell and J.D. Cash, "Fibrin/Fibrinogen Degradatinn Products in Children with Renal Disease".
Arch. Dis. Chldhd., 49, No.2, 1974.

A. White, R. St. C. Barnetson, J. DaCosta and D.B.L. McClelland, "The Incidence of HL-A Antigens in Dermatitis Herpetiformis".
Brit. J. Dermatol., 89, 133, 1973.

A. White, J. DaCosta and C. Darg, "The Zygosity of HL-A Antigens on Lymphocytes Determined by the Rate of Release of Radioactive Chromium".
Brit. J. Haematol., 25, 282, 1973.

STAFF NOTES

The following professional qualifications were obtained :-

Doctor of Philosophy:

Doctor M.S. Hoq July 1973 (Visiting Research Fellow)

"The Development of Fibrin/Fibrinogen Degradation Products and Heterophile Haemagglutinin Assays for Application in Renal Disease".

Ordinary National Certificate:

Mr. A. Jordan

Miss A. Cowell

Miss E. Thomson

Mr. B. Ghosh

Mr. J. Barclay

Higher National Certificate:

Mrs. E. Graham

Fellow of the Institute of Medical Laboratory Technicians:

Mr. R. Dunmow	-	Haematology and Blood Transfusion
Miss A. McCardle	-	Haematology and Blood Transfusion
Mr. A. McGill	-	Bacteriology

Doctor John DaCosta our Senior Registrar resigned in March 1974 and has gone to Canada to take up an appointment. Doctor DaCosta was a very popular, energetic and valuable member of our medical staff and he will be greatly missed.

RESEARCH AND DONOR COMFORTS FUND

We use this fund, in particular, for maintaining contact with our donors and associates during times of illness. This year 40 donors received small gifts and it has been very clear that these small tokens of our concern have been deeply appreciated.

BADGE PRESENTATION

Our badge presentation ceremony was held on the 8th November at the Assembly Rooms, George Street, Edinburgh. This is a special occasion in the year when we have the opportunity of formally acknowledging donors who have given more than 25 donations to the community, and to renew our close and historic links with the City of Edinburgh.

The badges were presented by Baillie James Cook. During the year 762 donors received a bronze badge for giving 10 donations, 387 a silver badge for 25 donations and 27 a silver-gilt badge for 50 donations. In thanking those who were able to attend (25 recipients of silver-gilt and 120 silver) Baillie Cook reminded us all of the importance of the blood donor for the survival of large areas of the Health Service.

The following donors received silver-gilt badges in 1973-74 :-

Mrs. Lily Allan, Bonnyrigg.

Mrs. Margaret Anderson, Broxburn.

Mr. James K. Blaikie, Edinburgh.
Mr. James Bogie, Kirkcaldy.
Mrs. Margaret Bonnington, Musselburgh.
Mr. George Borthwick, Hawick.
Miss Catherine Burt, Edinburgh.
Mr. Thomas S. Cartmill, Armadale.
Mr. Walter J. Colbeck, Edinburgh.
Mr. Alexander G. Cumming, Hawick.
Mr. Lawrence Y. Davison, Falkirk.
Mrs. Mary P. Denham, Lauder.
Mr. Thomas L. Gibson, Hawick.
Mr. George Lawson, Longniddry.
Mr. Andrew Linton, Hawick.
Mr. Donald Lomas, Edinburgh.
Mr. George C. Miller, Edinburgh.
Miss May Mitchell, Loanhead.
Miss Margaret H. Morris, Edinburgh.
Mr. George R. Morton, Portobello.
Mr. Arthur McKerron, Edinburgh.
Mrs. Christina Nisbet, Currie.
Mr. George Smart, Edinburgh.
Mr. Thomas D. Smith, Edinburgh.
Mrs. Mary Tait, Edinburgh.
Mrs. Mary Ward, Newtongrange.
Mr. William Webber, Edinburgh.
Mr. John S. Wilson, Hawick.

It is a traditional feature of this ceremony that a distinguished person who is actively involved in some aspect of the Blood Transfusion Service is invited to address those present. We were particularly honoured this year to receive Professor Anthony E. Ritchie, M.A., B.Sc., M.D., F.R.S.E., Secretary and Treasurer of the Carnegie Trust for Universities of Scotland. Professor Ritchie is no stranger to our Service; he is Chairman of the Central Consultative Committee of the Scottish National Blood Transfusion Service and has played a major role in the development of the Service in the past 5 years.

His address is given below in full :-

"The Scottish Blood Transfusion Service, all its aspects taken into account, is a very complex and costly affair. It involves hundreds of employees, mostly

highly expert, and costs nearly a million pounds a year. The biochemistry and immunology is some of the most intricate in the world. There is a tendency to say nowadays, "Oh, they do these things better elsewhere"; well, let me tell you that indeed they do not - the Scottish service is the best in the world, and the whole system is based on yourselves, the actual donors and producers of the raw material. I'm coming back to that later.

Transfusion of blood must have interested people from time immemorial, because it is so obviously a vital fluid, and its loss by accident, wounding or disease is so evident a cause of disability or death that some sort of re-administration must have been tried over and over again.

One of my teachers in the Edinburgh Medical School, the late Professor Sir James Learmonth - who himself made important contributions to our knowledge of transfusion - used to tell us about one of the early examples. One of the high dignitaries of the Church, in medieval times, after some serious illness or catastrophe, was transfused with the blood of two lambs and a small boy, and - as Sir James put it - the mortality was 100% all round.

Transfusion isn't easy. Blood looks all the same, but it is not; it differs from one person to another, in microchemical detail, and no one person's blood is an exact match for anothers. Moreover, it is difficult to handle - it clots (an important protective mechanism) and it doesn't like being heated or cooled.

It is an extremely complex fluid which has taken around a thousand million years to evolve, and as scientific researches on it have only been goin for about fifty years, it is not to be expected that we know more than a very little. You may care to realise that as you sit here you are producing red blood cells, in your own systems, at a rate of something around a million cells each second, quite apart from all the smaller structures, like protein molecules, which are so important.

In the early days of transfusions, whole blood, more or less as withdrawn from the donor, was the primary substance. There are many medical drawbacks - incompatibility, and possible transmission of disease, for example, and serious

economic ones, in that whole blood cannot be kept for long and much had to be wasted.

With advances in knowledge and in technical expertise, it gradually came to be seen that there were not in fact very many cases where whole blood is required, and that - if we know enough - we could use appropriate fractions for the right sort of disease or damage. The advantage of using blood components after separation are very great. It's much safer to use fractions; most of them can be stored for very long periods at low temperatures, and of course the blood from one donor - one of yourselves - can be used to treat several patients. Indeed, one of the most important advances in recent years is the discovery of how to sort out specific elements in blood which can be used to treat particular cases. The conditions which can be treated may be deficiencies - some of the bleeding conditions - or infections - some forms of hepatitis, smallpox and others.

The treatment of disease by specific antibody therapy is really just starting and the Scottish Home and Health Department together with your own Association and the experts who work for it have gone the length of designing and building a very large complex near Liberton, which is to be called the Protein Fractionation Centre. All being well, this Centre will open towards the end of 1974 and will replace and greatly expand the scope of the similar work now going on in the Royal Infirmary of Edinburgh.

Of one thing I am absolutely sure - that this new Fractionation Centre will, in ten years time, be producing substances of therapeutic value which are at present undreamt of. It has been planned on past experience, obviously; flexibility for development and change has been built in; but the real fascination to many of us is the certainty that, in a reasonably short span of time, it won't be doing quite what it was designed to do, but something different and better.

To come back to yourselves. We can discover new uses for blood components and devise more efficient and more economic methods for getting them - we must add that the present methods are extremely expensive, but the basic material is fresh blood and that comes from the donors and it is always in short supply. Please don't think that these new developments make blood less necessary, - it is quite

the other way, for more and more will always be needed.

In some countries blood donors are paid, which all too often encourages the desperate, the diseased and the drug addicts. In some countries blood is drawn from prisoners, and there is little enough 'voluntary' aspect to donation. Again, in one country blood donors get preferences at cinema's and shops - an incentive scheme.

Virtually all British blood donors are true volunteers - there is no tangible reward, no penalty for refusing and no discrimination as to whom the blood may be given. There are many reasons why this works so well - a sense of obligation, one's awareness of the need (which I hope I have emphasised in an outline way), perhaps the feeling that oneself may one day need the products of the Blood Transfusion Service. There is undoubtedly a common spirit of mutual sense of duty amongst donors, and tonight's ceremony is a public manifestation of it."

PERSONAL NOTES

Miss Catherine Sutherland has been Honorary Donor Organiser for the Methil and Leven area of Fife since 1961, and we are extremely sorry that she has decided to resign. She has maintained the high level of blood donations in this growing district and we are greatly indebted to her for the help she has given to the Service and for the efficiency with which she arranged the donor sessions. We are delighted to report that she is going to continue to take part in the work in a less 'official' capacity.

Mrs. G.R.K. Black became Honorary Donor Organiser at Portobello in 19 at a time when the need to increase the donor panel in response to the growing requirements of medicine had become of the greatest importance. Part of the programme for increasing the supply of blood involved increasing the number of 'local' sessions in and around the City of Edinburgh and its success was largely dependent on the efforts of the local organisation. Mrs. Black brought energy, enthusiasm and skill to the work and the Portobello sessions have remained among the most successful in the Region. The Service and the community owe her a great debt and we extend our sincere thanks to her.

APPOINTMENTS

We extend a very warm welcome to the following ladies who have very kindly agreed to take over the duties of Honorary Donor Organisers :-

Mrs. Joyce Allan (Leven and Methil District)
Mrs. R.C.F. Bettison (Portobello District)
Mrs. A.L. Simpson (Penicuik District)

OBITUARY

Mrs. B.S. Aikman: It is with the deepest regret that we record the sudden death of Mrs. Aikman on 8th November 1973. Although she became Honorary Organiser for the Penicuik district in 1960, Mrs. Aikman had taken an active interest in the Blood Transfusion Service from the early years of the war and gave outstanding service in encouraging the recruitment of donors and in assisting at blood withdrawal sessions. She had the facility of promoting friendship and both donors and staff enjoyed her company and the warmth which made the Penicuik sessions enjoyable and successful. Her passing removes a loved and respected friend and colleague who gave devoted service to blood transfusion for over 30 years. Our sympathy is extended to the members of her family.

ACKNOWLEDGEMENTS

The Service receives help from many sources and is especially indebted to the following :- Honorary Donor Organisers and their teams of helpers, Management and staffs of industrial firms, the Royal Navy, Army, Royal Air Force, Government Departments, Corporation Departments, Offices, Church, Civic, Masonic, Miners' Welfare, University and School Authorities, Napier College, The Art College, the School of Commerce, Telford College, Stevenson College, Queen Margaret College, the Dunfermline College of Physical Education and other Colleges in the region. Greatly appreciated assistance has again been given by members of the Red Cross Society, the St. Andrew's Ambulance Association, The Womens' Royal Voluntary Service, the Toc H. Association, the Rotary Club, the Round Table, the Girl Guides, the Boy Scouts, the Boy's Brigade and Youth Clubs. We are also

greatly indebted to both local and national press for publicising the needs of the Service and the location of withdrawal sessions.

STATISTICS FOR 1973 - 74

		ATTENDANCES	DONATIONS
MIDLOTHIAN.....	LOCAL SESSIONS	3,688	3,206
	SESSIONS AT FIRMS	732	612
EAST LOTHIAN.....	LOCAL SESSIONS	1,753	1,532
	SESSIONS AT FIRMS	291	250
WEST LOTHIAN.....	LOCAL SESSIONS	4,206	3,688
	SESSIONS AT FIRMS	2,950	2,434
BERWICKSHIRE.....	LOCAL SESSIONS	1,419	1,306
	SESSIONS AT FIRMS	-	-
PEEBLESSHIRE.....	LOCAL SESSIONS	806	710
	SESSIONS AT FIRMS	-	-
ROXBURGHSHIRE.....	LOCAL SESSIONS	2,330	2,158
	SESSIONS AT FIRMS	351	306
SELKIRKSHIRE.....	LOCAL SESSIONS	1,808	1,701
	SESSIONS AT FIRMS	-	-
FIFE.....	LOCAL SESSIONS	6,933	6,121
	SESSIONS AT FIRMS	4,037	3,348
		31,304	27,372
ROYAL NAVY, H.M. DOCKYARD, ROSYTH. (This figure includes volunteers from H.M.S. CALEDONIA, H.M.S. LOCHINVAR and the ROYAL NAVAL ARMAMENT DEPOT, CROMBIE.....		2,704	2,369
ARMY		213	171
		2,917	2,540
EDINBURGH			
GOVERNMENT DEPARTMENTS		4,183	3,355
UNIVERSITY, NAPIER COLLEGE OF SCIENCE AND TECHNOLOGY, ART COLLEGE, COLLEGE OF COMMERCE TELFORD COLLEGE, STEVENSON COLLEGE, QUEEN MARGARET COLLEGE and MORAY HOUSE...		3,516	2,795
EDINBURGH FIRMS		5,357	4,360
EDINBURGH DISTRICT		4,665	4,022
EDINBURGH CENTRE		15,949	14,882
		33,670	29,414
GRAND TOTAL		67,891	59,326

NUMBER OF SESSIONS - 566

JW/HD.

SNBTA - ANNUAL REPORT, 1973 - 74

The year under review has been the most difficult, and, in spite of the difficulties, the most successful in the illustrious history of SNBTA. Indeed it has been a triumph over adversity. The early weeks of 1974 were a time of great industrial strife, of heating restrictions and of major hardships. Donors, both industrial and general public, responded magnificiently, and at no time during the weeks of crisis were hospitals short of blood products. It is impossible to praise too highly the wonderful altruism of blood donors during this national crisis. Similarly, the finest efforts of our staff must be acknowledged to the full.

There is surely a lesson for all of us in these events. The blood transfusion service, no matter the form its management structure may take, is utterly dependent on the response of the public to donate blood. A system of voluntary blood donation has stood the test of time well during the past 34 years of rapid growth, and never better than during the critical weeks at the beginning of 1974. Continuous success must surely depend on the retention of the voluntary system of donation, and on the preservation of the identity of the "transfusion service" in the minds of the community.

My report for the year 1972-73 mentioned the introduction at the end of that year of the new mobile blood collecting unit. The great potential of this new system of blood collection was confirmed in practice during the current year, and particularly during the weeks of crisis. The vehicle has operated in city centres, small towns, factories and hospitals. During the crisis the civic authorities gave permission for the vehicle to be parked in pedestrian precincts in Glasgow.

The success of our service has been due in no small measure to the loyalty of staff such as George R. Milne, M.B.E., who has just retired after 34 years of devoted service. From 1940 to 1946 Mr. Milne served in a voluntary capacity, and then latterly as deputy regional director. Mr. Milne is continuing to help the service as an Honorary Consultant. In addition to his long years of endeavour, Mr. Milne has given a fine example to others by his professional integrity and by his great humanity. Our service welcomes Dr. Angus Munro as successor to Mr. Milne. It is surely significant that SNBTA selected someone who, like Mr. Milne, had had a thorough training in chemistry before developing an interest in immunology.

Another important senior appointment made was that of Dr. Heather Dick, Consultant in Clinical Immunology, Western Regional Hospital Board as an Honorary Consultant in Tissue Typing to SNBTA. This formalises an arrangement which has been operating for several years past in the West of Scotland, whereby the regional transfusion service helps the regional immunology service by providing tissue typing reagents. This co-operative effort is likely to develop further with the introduction of bone marrow transplantation and supportive therapy. Dr. Dick's appointment will facilitate further progress.

The closer involvement of the transfusion service with immunology is illustrated by the proposed establishment of an Antibody Production Unit which would provide a variety of specific antisera for NHS laboratories. The proposal was accepted in principle by the Western Regional Hospital Board, the University /

University of Glasgow and SNBTA in November, 1973. The practical work would be undertaken by the regional transfusion service and the University Department of Animal Husbandry. Implementation of the scheme was postponed because of reorganisation, but authority to proceed has now been given by the Department. Thus a development planned by SNBTA will now be implemented.

The concept of component therapy has been developed further. Of the total blood collected 40 per cent has been processed within a few hours of donation. In this way platelet concentrates and cryoglobulin precipitate have been produced regionally in amounts sufficient to meet the clinical demand. Large volumes of plasma have been sent to the Protein Fractionation Centre. It should be noted however that there has been an increased clinical demand for dried plasma, so that the volume of plasma available for fractionation has been less than estimated. One reason for the clinical popularity of whole plasma is the awareness among users that all donations are thoroughly tested for the hepatitis B antigen. There is also a new demand for fresh dried plasma to replace the large volumes of plasma removed from patients undergoing intensive plasmapheresis in the management of their clinical condition. This clinical requirement for fresh dried plasma is likely to increase as more continuous flow cell separators become available in hospitals. The use of red cells recovered from the frozen bank has continued to expand. Several hospitals in Glasgow having seen a subsidiary bank of frozen red cells established at the Western Infirmary are planning, with the help of the regional transfusion service, to do likewise.

Teaching is now a heavy commitment. Courses for medical practitioners and for technicians are extremely popular which is a clear indication of the high standard of tuition provided by my staff. Examination authorities recommend schedules of in-service training which are time consuming for pupils and tutors, but must be undertaken if the laboratory is to be approved as a training centre. In particular the Joint Committee on Higher Medical Training (Haematology) will only grant accreditation for specialist training if the laboratory facilities are adequate, and the scientific and technical standards are high.

In addition to these essential commitments, members of staff have continued to undertake developmental and original work. Miss Marian Izatt and Mr. Graham Templeton are pursuing their studies for the degree of Ph.D. Mr. George Milne and Dr. Elizabeth Gray with the help of a new medical development grant have evaluated microcalorimetry in measuring antigen-antibody reactions in blood group serology. Dr. Donald Hopkins has successfully completed the first phase of his work in computerising donor records and statistical returns while Dr. Ruthven Mitchell continued his interest in frozen red cells.

Members of staff gave papers on a variety of subjects at conferences at home and abroad. The following publications appeared during the year.

"Australia Antigen in Blood Donors" - J. Wallace, Lancet 1,1002, 1973.

"Hepatitis B Antigen in V.D. Clinic Patients" - J. Wallace, British Medical Journal 3,347, 1973.

"A Study of Hepatic Disease in Australia Antigen and Antibody-Positive Blood Donors" - R.I. Russell, D.M. Goldberg, J.C. Allan, R.M. MacSween and J. Wallace,

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"Hepatitis /

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