NATURE

No. 3818

SATURDAY, JAN. 2, 1943

Vol. 151

Page

CONTENTS

Machinery of Government: Methods and Men	Ĭ
A Great Ethnologist. By Dr. C. S. Myers, C.B.E., F.R.S.	4
Colloid Science By Prof. H. W. Melville, F.R.S.	5
Museum Presentation of Geology. By D. A. A.	6
G, ,	0
Evolution in Astronomy. By Sir James Jeans, O.M., F.R.S.	7
Prevention and Treatment of Anti-social Behaviour.	9
A Physiological Theory of Colour Perception. By Prof. Ragnar Granit	:1
Darwin's Health. By Sir Buckston Browne, F.R.C.S.	14
Scientific Centenaries in 1943. By EngCapt. Edgar C. Smith, O.B.E., R.N.	15
News and Views	17
Letters to the Editors:	5.3
Vitamin C Saturation Test of Harris and Abbasy. —Dr. W. R. G. Atkins, O.B.E., F.R.S.	21
Vitamin C Saturation Test: Standardization	
Measurements at Graded Levels of Intake.— Dr. Leslie J. Harris	21
Vitamin C Intakes at a Residential Home.—Dr. Leslie J. Harris and Mamie Olliver	22
Stability of Ascorbic Acid in Dehydrated Vege- tables.—Dr. W. R. Aykroyd	22
Urea Synthesis in Mammalian Liver.—Dr. H. A. Krebs; Dr. S. J. Bach and S. Williamson .	23
Growth Stimulators in Urinary Extracts.—J. H. Thompson, Dr. P. F. Holt and Dr. R. Forbes	
Jones	23
The 'Age' of Terrestrial Matter and the Geo- chemical Uranium/Lead Ratio.—F. F. Koczy	24
Effect of Air Currents, Light, Humidity and Tem- perature on Slugs.—Mrs. Barbara H. Dainton .	25
Discoveries by Accident.—Dr. Norman R. Campbell	25
Research Items	26
Frace Elements in Relation to Health. By Prof. T.	
Dalling and H. H. Green	28
Star Magnitudes and Image Diameters in Photographic Photometry	31
Ultra-short Radio Wave Propagation	31

Editorial and Publishing Offices
MACMILLAN & CO., LTD.,
ST. MARTIN'S STREET, LONDON, W.C.2.
Telephone Number: Whitehall 8831

Telegrams: Phusis Lesquare London

Advertisements should be addressed to
T. G. Scott & Son, Ltd., Talbot House, 9 Arundel Street, London, W.C.2
Telephone: Temple Bar 1942

The annual subscription rate is £4 10 0, payable in advance, inland or Abroad All rights reserved. Registered as a Newspaper at the General Post Office

MACHINERY OF GOVERNMENT METHODS AND MEN

R ECENT criticism of the Civil Service, so far as it is not superficial or biased, is largely an expression of a fundamental concern with the whole machinery of government in Great Britain. That concern has been fed from numerous sources: for example, the examination of our whole organization of production and supply for war purposes, and the related question of the general direction of our war effort; the difficulties raised by the recommendations of the Scott and of the Uthwatt reports and in attempts to co-ordinate the planning of reconstruction. The statement on a national policy for industry issued by a group of industrialists, following on Mr. S. Courtauld's paper on "Government and Industry" in the Economic Journal, stimulates further thought on the mechanism by which the necessary control of industry is to be exercised, a field to which Prof. Cushman's admirable study of the Independent Regulatory Commissions has directed attention in the United States. The report of the President's Committee on Administrative Management is another stimulus to fundamental thinking about the functions and machinery of government which can fairly be compared with the Haldane Committee's report on the Machinery of Government in Great Britain.

The Planning group (PEP) has, of course, addressed itself to the problem, and the fundamental issues were well stated in the broadsheet issued in July 1941. though that was limited to the Civil Service itself. So far as the Civil Service is concerned, there are two fundamental aspects to be considered-methods and men. First, are the methods in use in the Civil Service to-day adapted to handle the new and wider range of problems with which it is called upon to deal in the service of a new and more positive conception of government? Secondly, is its personnel, by recruitment, training and tradition, competent to handle those questions constructively, imaginatively and efficiently? A committee of Ministers and an inter-departmental committee of permanent heads of departments is understood to be at work considering, inter alia, the machinery of government. The men who are in charge of departments, with all the prejudices and interests as well as the duties of their office, are so clearly the wrong men to conduct such a survey at the height of their war-time activity that far less value is likely to be attached to their findings than to those of the Sub-Committee on the Reform of the Civil Service appointed by the Industrial and Social Reconstruction Committee of the Liberal Party, or of the Sixteenth Report from the Select Committee on National Expenditure, which deals with the organization and control of the Civil Service.

The Sub-Committee presenting the former report had as its terms of reference: "to consider Civil Service Reform in relation particularly to the allegation that the Civil Service as at present constituted has proved wanting in the powers of rapid decision and action". It gives a glance at the question as to what machinery more suitable than the Civil Service can be found, where in the interests of the community

as a whole it is necessary to remove particular industries or undertakings from private profit-making to public ownership or control, but the major part of the report is concerned with the reforms required in the pre-war Civil Service to modernize it and bring it more into line with the modern art of administration. That is also the main theme of the Select Committee's report, which, however, passes over the question of administration of nationalized industry, but includes a survey of the functioning of the Central (Technical and Scientific) Register and the General Appointments Register of the Ministry of Labour and National Service and a review of professional and technical staffs in Government Departments

The Sub-Committee of the Liberal Party opens its report with a review of the pre-war Civil Service and, as in other recent reviews of this matter, tribute is paid to the excellence of the Civil Service for the purpose for which it was originally designed. That much has never been in dispute. The difficulties arise from the fact that it was not contemplated when the Service was created that it would ever be called on to engage in trade directly, to control in detail the processes and operations of commerce, or be responsible for social services and direct contact with individual services. It was instituted to serve fundamentally a negative conception of Government, and the characteristic defects which it has tended to develop have to some extent rendered it inherently unfitted to serve the more positive conception of government to-day.

While this is true, it must also be remembered that its defects are minor compared with the virtues of its freedom from corruptibility and its devotion to the State, as opposed to party or personal interests, and they are also due not so much to the Service itself as to what public opinion insists upon in connexion with it. The policy of safety first is a direct result of insisting that every action of every Civil servant at every hour of the day shall be open to challenge. Furthermore, the Civil Service to-day is the product of Governments which in recent years have been characterized by an unparalleled timidity, vacillation and lack of vision. This inevitably accentuated the bias of the Service to expose the weaknesses, risks and disadvantages of new proposals, rather than to seize what was good in new ideas and embody them enthusiastically in speedy and decisive action.

The tendency to refer to higher authority by minute, and of higher authority to evade or postpone the issue or to consult other authorities before coming to a decision, is thus inherent in the system of Parliamentary questions. Accordingly, among its important recommendations to speed up and modernize the service, the Committee suggests in regard to this first point, while upholding the principle of Parliamentary questions, that reform might proceed through a recognition both in Parliament and in the Civil Service that modern government is too complex a subject for the simple device of the Parliamentary question to be equally applicable to all aspects of it.

Whether or not new mechanism is required to make ministerial responsibility effective without impairing the efficiency of the administrative machine, it is essential to maintain that responsibility. Some of the criticism of the system of public utility corporations has been on this very point of nebulous ministerial responsibility, although it is admitted that the system has to a large extent withdrawn the staffs from the constant stream of Parliamentary criticism. Until such fundamental issues are resolved, however, mere reforms in the method of recruitment of the Civil Service, in training and grading or in operating methods are unlikely to secure a keen and vital Service characterized not only by integrity and the capacity to take a wide view, but also by initiative and the readiness to accept responsibility.

In regard to recruitment, the Liberal Party's Sub-Committee recommends that the practice of grading entrants to the Service by their method of entry should cease and that there should be a system of post-entry training. Engineers and other professional specialists should no longer be regarded as inferior in status to administrative officers and should be remunerated on a scale sufficient to attract officers able to meet on an equal footing the leaders of their respective professions outside. They should be regarded as available for administrative posts. In the senior grades, there should be much more emphasis on systematic interviewing, and provision for an adequate inflow of officers from the lower grades.

With this insistence on a complete ladder from the bottom to the top, the Sub-Committee stresses the importance of post-entry training. The absence in it of a centrally prescribed scheme of training for officers after their entry is a fundamental weakness of the present Civil Service—though a like criticism might equally be advanced of much of the industrial organization of Great Britain. The Sub-Committee recommends the institution of such central courses of instruction by the Civil Service Commission, as well as of departmental courses, and it advocates strongly the establishment of a staff college for the Civil Service analogous to the staff college for the Army, through which those officers likely to be the future holders of the highest posts in the Service should pass. The Committee, moreover, is unanimous that if such a college for teaching, in effect, the art and science of administration were established for industry and commerce generally, it would be even better that the selected Civil Service officers should pass through it than through one established for the Civil Service only. This proposal should meet Sir Warren Fisher's objection that a staff college would accentuate the academic character of the Service. Contact in this way with the future leaders of commerce and industry should facilitate a better understanding of the needs and outlook of commerce and industry and check the narrow professional outlook sometimes attributed to the present Civil Service.

This proposal for a staff college, already advanced by P E P in its broadsheet, is reiterated by the Select Committee on National Expenditure, which makes the same point as to the importance of actual contact in this way of the Civil Servant with commerce and industry and with the work of local authorities, public utility companies, social services, etc., and in

particular with those levels of government activity at which Departments come into direct touch with the life of the community, such as the Inland Revenue and Public Assistance. The training thus provided should be of special value in helping to meet the increasing demand for promotion to the administrative grade of selected members of the executive and clerical grades. The Select Committee considers that, subject to tests of character, ability and merit, opportunities of graduating to positions of authority should be open to those who qualify from the school of experience in the Civil Service, equally with those whose qualifications are mainly academic. Moreover, it stresses the value of such a project in providing the training and opportunities needed by Civil Servants who wish to specialize in organization and methods

Beyond this recommendation, the Liberal Party's Sub-Committee contemplates a complete reorganization of the Civil Service Commissioners and wide extension of their powers. It endorses emphatically the recommendation of the Planning broadsheet regarding the divorce from finance of the management and control of personnel. This is regarded as a central function, which cannot properly be discharged by any special department such as the Treasury, and it recommends that the present Civil Service Commissioner's Department should be made into a true central department by removing it from the control of the Treasury, and making it directly responsible to a Minister without Portfolio, who should be the Deputy Prime Minister. The present Establishment Branch of the Treasury would be transferred to the re-organized department, which would be staffed as soon as practicable with officers trained in the modern technique of management. Much importance is attached to method of selection and term of tenure of office of the permanent head of the re-organized Commission. This appointment should be made from within or without the Service by the Prime Minister on the advice of the Minister immediately responsible, and of an advisory committee independent of the Service, and tenure of the office should not exceed five years. As in the report of the Planning group, the importance of eliminating unsuitable officers at any stage in their career is emphasized, while caution is advised in regard to the introduction of outside blood in the more senior grades, on account of the dangers of political pressure and nepotism.

If the Liberal Party's Sub-Committee has relatively little to say about welfare work and office planning, though their importance is noted, the latter in particular is a main theme of the Select Committee's report, which is very largely a review of the whole work of the Organization and Methods Division and the re-organization of the Treasury in regard to the control of the Civil Service. It points out that, following the recommendations of the Haldane and Bradbury Committees, an Establishment Department was erected within the Treasury and establishment officers appointed in most Departments of State throughout the period 1919–39; nevertheless there was no overt sign that the Treasury or, the departments accepted the proposition that the organization

of administrative machinery was a subject requiring expert and specialized study, or that any lessons in the art of management could be learned from industry and commerce either in Great Britain or abroad. As a result of this twenty years of neglect, the outbreak of war found the Treasury insufficiently equipped to deal with the problems of administrative organization which were forced upon it. There was no core of expert knowledge which might have been built up if the systematic and periodical overhaul of the whole of the machinery of government had been undertaken. Such a body of knowledge might at least have supplied standards by which proposals concerning the staffing of new and expanding departments could have been examined and tested.

The Select Committee considers that control of establishment matters should continue to be exercised from the Treasury for three reasons. First, risk of duplication and waste through the interposition of a new authority between departments and the Treasury, because the Treasury's control on expenditure would still remain. Secondly, it is convinced that the advantages arising from the central position of the Treasury, with its unique knowledge of the general activities of Government, should be retained and utilized. Thirdly, it considers that the view that the association of the functions of finance and supply with those of establishment is bound to be detrimental to the interests of the latter is ill-founded. It bases its recommendations on a conception of economy which is identical with the promotion of efficiency. The ideal control of the Civil Service must be regarded as concerned with the systematic study of the means and methods by which the work of government may be carried out with the maximum efficiency and the minimum waste of time and money. Recommendations are accordingly made for improving the organization of the Treasury.

It is not necessary to accept without question the Select Committee's argument for the retention of Treasury control in order to appreciate the lucidity and precision with which the essentials of the problem are laid bare. The value of that analysis is unaffected whether the ultimate decision is to retain Treasury control or to establish a new central department, as suggested in the report of the Liberal Party's Sub-Committee and elsewhere. The Select Committee's own opinion, however, that, so far as the Treasury was concerned, the period from 1919 until 1939 was marked by an almost complete failure to foster the systematic study of organization as applied to Government departments is possibly the strongest argument against its own recommendation. The re-organization suggested cannot wisely be left in the hands of the same men or in those of similar outlook.

Fundamentally, the problem is one of men and not merely of methods. In any event, either plan of reform might prove equally effective, given men of the requisite imagination, personality and ability. The effectiveness of a staff college, for example, depends on the type of men who teach there, and the vital purpose by which it is informed, and there is no a priori reason why a Treasury Department, staffed by men of the right outlook and understanding,

should not prove brilliantly successful in securing that the machinery of government is maintained at the highest efficiency and adapted continuously to the purpose to be served. Sir Warren Fisher is unquestionably right in stressing the importance of the problem of the selection of men. As the Select Committee points out, however, expert knowledge of organization is not a monopoly of business men, and it does not regard the commercial world as even the principal source from which efficient organization officers should be recruited. There is a considerable field of recruitment among existing Civil Servants, many of whom possess the vigorous personality and the profound conviction that the study of organization and methods is worth while.

In the long run, however, the spirit and efficiency of the Civil Service are a reflection of the temper and interest of the community it serves. No matter what machinery we devise, we cannot expect a Civil Service of the highest ability and integrity, imbued with vision, initiative and enthusiasm, unless there is mutual understanding and respect between the Service and the community whose interests it serves and safeguards. The biased and irresponsible attacks on the Service by those seeking to promote their own selfish interests under the cloak of a return to the old intolerable muddle of laisser-faire do disservice to the State as well as to the Civil Service. It is a great merit of this sixteenth report of the Select Committee on National Expenditure—a report which may well take its place as a great State paper alongside the Haldane Report on the Machinery of Government for its creative analysis-that it provides not only a critical appreciation of the Service, for which Civil servants themselves should be grateful, but also an interpretation of the Service which should promote good understanding and closer and more fruitful co-operation between Whitehall and the public. Here is indeed trenchant criticism and the searching exposure of weaknesses. Here, too, is generous appreciation of good qualities, and an attempt to hold the balance and apportionate blame or responsibility fairly.

No one who attempts to think constructively and creatively about the exceedingly complex problems of modern government, the machinery to be called into being to serve the purposes of the War or of reconstruction in the new order to follow, can disregard this report and its elucidation of some of the fundamental issues upon which our machinery and our philosophy of government must be based. The wide interest in the larger questions of the general control and organization of the Service and the construction of further machinery to increase its efficiency displayed in the recent House of Lords debate, where Lord Hankey lent the weight of his authority to propositions substantially the same as the recommendations of the Select Committee, is one of the happiest indications that we are applying ourselves to a task which will tax the best ingenuity as well as the utmost intellectual resources of either British or American democracy, and in which each democracy may well contribute much towards the solution of the other's particular problems.

A GREAT ETHNOLOGIST

Haddon, the Head Hunter

A Short Sketch of the Life of A. C. Haddon. By A. Hingston Quiggin. Pp. xii + 169 + 7 plates. (Cambridge: At the University Press, 1942.) 7s. 6d. net.

PORN in 1855, A. C. Haddon died at the age of eighty-five in 1940. He richly deserves this exquisitely written life-history. For he achieved a great work and he was endowed with a unique personality. In the selection of her abundant material, Mrs. Quiggin is to be congratulated on her wise judgment. She knew Haddon intimately from the year 1904 when she began to help him, not only in secretarial work, but also in "the concocting of syllabuses and lecture notes, the abstracting of papers, the making of lantern slides and the writing of minor reviews".

Her sketch of his life is not overwhelmed, as so many biographies are, by excessively long extracts from correspondence. She throws much light on his ancestry and early life, which will be welcomed to-day by those who only knew him in middle-age and later. He was descended from three generations of John Haddons, all most ardent Nonconformists, the first a gentleman-farmer of Naseby, the second who founded in 1814 the printing firm of John Haddon & Co. in London, and the third who, failing to inherit the business abilities of his father, allowed the prosperity of the firm to suffer until he was supplanted in 1888 by an abler cousin. The thus dwindling fortune of A. C. Haddon's parents caused frequent family removals from suburb to suburb. It was his fate to be sent to "any school which happened to be in the neighbourhood", and he thus received but a scrappy and desultory formal education. When quite a child, he showed his first interest in acquiring skulls. By then he had already begun to collect minerals, plants, butterflies, eggs, etc., and soon he became busy with dissection and microscopy. At the age of fifteen, he entered the family printing office, where he served five years of "duty and drudgery", hating the work, until his father fortunately came to realize that it would be more economical to send his son to Cambridge, as he would never make a business man of

At Cambridge Haddon came under the influence of Michael Foster, McKenny Hughes, Alfred Newton and especially of Frank Balfour, "his beloved master and friend", as he styled him, in a subsequent dedication of his first book, an "Introduction to the Study of Embryology". From his childhood he had shown a fondness for sketching; and while at Cambridge he attended the lectures on art of the Slade professor, Sidney Colvin. This early interest in design was to receive later development in an unexpected scientific direction. He met at Cambridge Holland Rose, a fellow undergraduate, later the distinguished Napoleonic historian, who married Haddon's younger sister. Haddon was appointed professor of zoology in the Royal College of Science, Dublin, in 1880; and a year later he married Rose's sister, whose devotion as mother and wife, self-sacrifice and courage throughout her husband's many hardships and disappointments made her a perfect helpmate.

At Dublin, Haddon felt himself soon "perishing for want of research". He became more and more dissatisfied at having to lecture on coral reefs and tropical fauna which he had never seen. So, in 1888,