MILESTONES OF ARMY VENEREOLOGY

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Armed with a formidable battery of safe and effective remedies and supported by modern diagnostic facilities, the venereologist of today must find it very difficult to look back and appreciate the great problems which existed at the beginning of the century. It was not until 1905 that a scientific diagnosis of syphilis could be made. In May of that year the causative organism of syphilis, *Spirocheta pallida*, was described by Shaudinn and Hoffman. A year later the Wasserman Reaction (W.R.), a serological test for syphilis, came into use. The incidence of venereal disease (V.D.) in the Army during the late nineties and the early part of this century was very high; methods of treatment were largely ineffective, so wastage of man-power was heavy. Up to 1910 the main-stay of treatment was mercury given orally, by inunction or by injection. The occasional side-effects of this drug, stomatitis, debility, and a feeling of sheer misery, were often worse than the disease itself. In 1905 Colonel F. J. Lambkin introduced a treatment of syphilis by intra-muscular injection of mercurial cream over a long period. This superseded treatment by mouth and virtually put an end to invaliding from the Army for syphilis. This preparation became widely known as Lambkin's Cream.

In 1905 a series of reports were published by a Committee convened by the Advisory Board for the Army Medical Services to enquire into the treatment of V.D. and scabies. The Committee was unanimously in favour of the administration of mercury in some form over a period of 18 to 20 months in syphilis, and thought that non-mercurial treatment was unsatisfactory. On the recommendation of the Advisory Board the reports later formed the basis of a textbook of V.D. by General Sir Alfred Keogh, Colonel C. H. Melville, Lieutenant-Colonel Sir William Leishman and Major C. E. Pollock. A later edition published in 1913 included additional matter by Colonel (then Major) L. W. Harrison, who rewrote the chapter on the pathology of syphilis and contributed fresh ones on the treatment of syphilis and gonorrhoea.

In 1909, mainly due to the efforts of Colonel Lambkin, a hospital of one of the Guards regiments was converted for research and instruction in V.D., complementary to the Queen Alexandra Military Hospital and the Royal Army Medical College, Millbank. This Military Hospital in Rochester Row was to be for many years the teaching centre for the Army and an authority for the guidance of civilian as well as army venereology. In that same year Colonel Harrison was posted to Rochester Row to fill the post of pathologist, vacated suddenly due to illness. Until then he had had nothing to do with the management of V.D. in troops and had been working in bacteriology. No W.R. had been done at the hospital and no demonstration of *S. pallida* by the dark ground method, but before very long both of these diagnostic essentials were in routine use. Long after this a succession of interested and curious
visitors attended the Rochester Row Hospital to be shown the germ of syphilis. In order to have a source of spirochaetes always at hand, Harrison kept the specimens in capillary tubes, a method which later proved useful for sending serum through the post for dark ground examination.

In 1909 Ehrlich and Hata described Salvarsan (606), which was put on the market in December 1910. Harrison had obtained a supply some months earlier, and treatment of syphilis by the organic arsenicals was investigated at the Hospital during 1910 and 1911. Owing to the facilities at Rochester Row for close observation of patients and careful follow-up, the Medical Staff was able to prove the superiority of Salvarsan, and the credit for most, if not all, of the pioneer work in its introduction to England lies with the R.A.M.C. Lieutenant-Colonel T. W. Gibbard was Officer Commanding, Rochester Row, at this period. The new method of treatment was not without danger, and it took time to learn the correct dose and method of administration. The knowledge gained was very profitably used in the Great War, during which 70,000 cases of syphilis were treated. Very early at Rochester Row it was learnt that the use of arsenic alone invited recurrences of syphilis in the form of cranial nerve palsies, so the method advised by Neisser of combining mercury with the arsenic was adopted. The results fully justified this combined treatment.

Research was also directed to the treatment of other venereal diseases. Harrison did not agree to the use of strong astringent fluids for urethral irrigation and advocated a dilute solution of 1 in 8,000 of potassium permanganate for the treatment of gonorrhœa. Time has shown these views to be correct. The aspiration method he adopted for buboes is still the treatment of choice today. Colonel Harrison retired in 1919 and became the adviser in V.D. to the Ministry of Health and Director of the V.D. Department of St. Thomas’s Hospital.

During the 1920's the Hospital at Rochester Row closed, and the V.D. Centre was transferred to the Royal Herbert Hospital, Woolwich, where, apart from the war years and a short period (1955-58) at Netley, it has remained since. Undoubtedly the most important advance in the management of syphilis was the great discovery of penicillin which became available to the Army in 1944. At first, penicillin was used with arsenic and bismuth, but it was soon realized that the results with the antibiotics alone were just as good; it remains the standard treatment of early syphilis in the Army. The recent development of specific serological tests for syphilis, such as the treponemal immobilization test and the Treponema pallidum complement fixation test, has done much to solve the diagnosis of latent and congenital syphilis and the false biological positives sometimes found in nonsyphilitic diseases.

Unlike syphilis, the treatment of gonorrhœa remained static and largely unsatisfactory until the introduction of the sulphonamides in 1937. They gradually became less effective, notably in the 1939-45 war, and the number of relapses increased. In 1941 a special centre equipped with Kettering hypertherms to produce fever was opened at the Royal Victoria Hospital, Netley, under the care of Lieutenant-Colonel A. J. King, R.A.M.C., who had had previous experience with this treatment at the London Hospital. Fever treatment was given to patients suffering from resistant forms of gonorrhœa, Reiter's disease, neuro-syphilis, and interstitial keratitis. The results were often spectacularly successful. The centre was used intensively during
the war years and many regular and temporary officers of the R.A.M.C. and Nursing Service were trained in this highly specialized treatment. It was soon apparent that penicillin was ideally suitable for the treatment of gonorrhoea and it has been standard since its introduction to the Army. Its cure of gonorrhoea brought to notice the prevalence of non-gonococcal urethral conditions which are not influenced by this drug, and the association of urethritis with arthritis and affections of the eye became more apparent.

An intradermal and complement fixation test is available for the diagnosis of lymphogranuloma venereum. This disease, together with chancroid and non-gonococcal urethritis, readily responds to the sulphonamides and various antibiotics. In 1959 metronidazole (Flagyl) was introduced for the treatment of trichomoniasis. It is taken by mouth, and reports of several investigations suggest that an effective systemic treatment has been found.

The relatively low incidence of V.D. and the reduction of the Army after the war led to a great decrease in work; and it was decided in 1954 to stop training new specialists. The appointment of Adviser is maintained and established venereologists are employed in the Far East and in Germany. In other centres the responsibility for diagnosing and treating V.D. rests with the Medical Specialist. To help him in his duties, short courses of instruction, including practical work, have been made available at the Whitechapel Clinic, London Hospital, and at the Special Training Centre, Royal Herbert Hospital. Lectures in V.D. are given to officers attending the courses at the Royal Army Medical College.

Much work has been done and great advances made during the century. In 1897 the incidence of V.D. among British troops in the United Kingdom was 127.5 per 1,000. In 1960 it was only 5.8 per 1,000. It is fitting that this achievement should be recorded as a tribute to the devoted work of many regular and temporary officers who served as advisers and specialists in venereology. This summary must end, however, on a note of caution. In certain overseas stations, particularly the Far East, the incidence of V.D. is still high and is likely to remain so, and it is by no means certain that the position at home will remain satisfactory. It is therefore essential both for the present and to guard against the future, that selected officers be trained and given the necessary experience to cope efficiently with the problems that are certain to arise.

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