A medical history of prisoners of war in Ceylon 1900-1903 / by Allan Perry.

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Publication/Creation

Colombo : George J. A. Skeen, 1904.

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MEDICAL HISTORY OF PRISONERS OF WAR IN CEYLON

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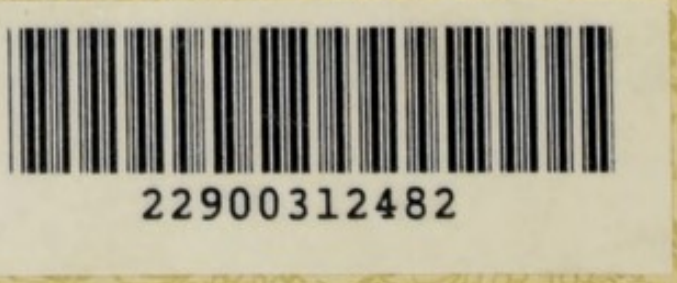

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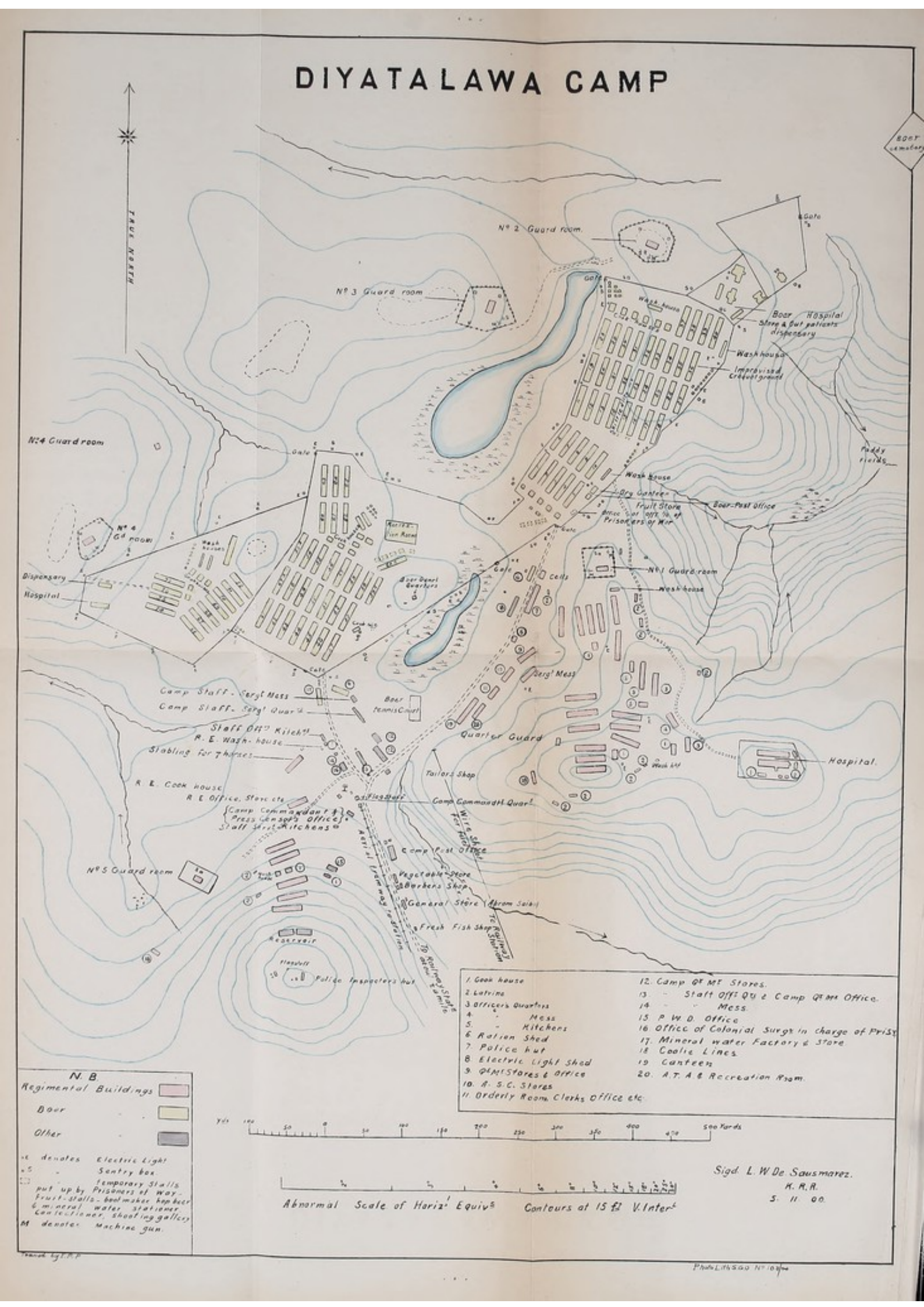

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A MEDICAL HISTORY OF

PRISONERS OF WAR IN CEYLON.

1900—1903.

BY ALLAN PERRY, M.D., D.P.H.,

Principal Civil Medical Officer and Inspector-General of Hospitals, Ceylon,
Principal of the Ceylon Medical College.
(*In Medical Charge of Prisoners of War.*)

COLOMBO:
GEORGE J. A. SKEEN, GOVERNMENT PRINTER, CEYLON.

1904.

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INTRODUCTORY.

THE information contained in the following pages is mainly compiled from my official reports to Government on the health of prisoners of war in Ceylon and from reports and returns furnished by the Medical Officers in charge of the various camps; for the number of prisoners and some other details I have availed myself of the report on "Camps for Boer Prisoners of War in Ceylon, 1900–1903," by Lieutenant-Colonel A. C. F. VINCENT, C.M.G., the Commandant.

His Excellency the Right Hon. Sir WEST RIDGEWAY, G.C.M.G., K.C.B., K.C.S.I., was gracious enough to give me permission before the expiry of his Governorship of this Colony to publish this Medical History, but pressure of work has prevented its appearance earlier. With the consent of the Hon. Mr. EVERARD F. IM THURN, C.B., C.M.G., Lieutenant-Governor, the Government Printer, Mr. G. J. A. SKEEN, has been kind enough to undertake the printing.

The duties thrown on the Civil Medical Department by the advent of these prisoners of war were numerous, heavy, and responsible, the amount of clerical work in addition to the purely professional duties was immense, and I am glad of this opportunity to place on record the good work performed by both the professional and clerical staffs of that Department. The professional staff (which is by no means over strong in numbers) under normal conditions has much to do in ministering to the medical needs of $3\frac{1}{2}$ millions of people; yet it performed the extra work in connection with the Boer Camps with efficiency and enthusiasm, without complaint, and without any interference with the ordinary departmental routine, and at the same time was able to render valuable assistance to the Military Department of this Colony by lending Medical Officers for Military duty at Colombo, Kandy, and Trincomalee.

Colombo, June, 1904. A. P.

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PRISONERS OF WAR CAMP, DIYATALAWA.

A MEDICAL HISTORY OF PRISONERS OF WAR IN CEYLON.

1900—1903.

DIYATALAWA.

DURING Easter in the year 1900 His Excellency the Right Hon. Sir J. West Ridgeway, G.C.M.G., informed me that he had been asked by the Home authorities to accommodate in Ceylon 2,000 prisoners of war from South Africa, and he was pleased to say that if they came he wished me to make the necessary medical and sanitary arrangements.

At that date nothing definite had been settled with regard to a site for the camp; many places had been suggested, and Diyatalawa, which eventually was decided upon, had been already visited by a small Committee and reported upon, I believe, favourably, but the difficulty was with regard to a good and sufficient water supply, which was eventually overcome.

Diyatalawa at that time consisted of a railway station without a staff and at which trains did not stop; of one or two buildings on the hillside which the Wesleyan Mission had put up for use as an Industrial School; and at three-quarters of a mile below the railway, on a small level portion of rolling downs, there was a workshop in ruins and an abandoned small tea plantation. This level patch was destined to be the site of the Boer Prisoners' Camp.

Diyatalawa is in the Province of Uva, 157 miles from Colombo by rail, and 4,140 feet above the mean sea level; it possesses an invigorating and equable climate, with not too much rain.

The valley of Diyatalawa extends over a large area, and is surrounded by ranges of hills which almost enclose it ; those on the south and west act as a bar to the rains of the south-west monsoon, and it is easily demonstrated during that season of the year, on approaching Diyatalawa by train, that on the Colombo side of a tunnel which pierces this range the rain is falling with torrential violence, but there is bright sunshine on the Diyatalawa side. The valley consists of rolling downs, with small low hills covered with a coarse kind of grass with intervening gullies and ravines. There is very little flat land and there are practically no trees.

The camp is dominated by the barracks for the military guard, which are built on ground with a slightly higher elevation.

The climate of Diyatalawa is one of the best in Ceylon. There is only one rainy season, viz., during the north-east monsoon. October, November, and December are the wettest months ; the driest months are from May to September. The rainfall registered during the year 1901 was 54·09 inches, during 1902 77·9 inches ; the amount of sunshine per day is from five and a half to nine and a half hours. The mean temperature of the air is 70° F., and the mean degree of humidity is about sixty-seven per cent. of saturation.

In May, 1900, the work of constructing the necessary buildings for a camp was begun. The Royal Engineers erected the buildings for the military guard, and the Director of Public Works for the Colony the huts for the prisoners and camp officials. In less than four months all the buildings necessary to accommodate 2,500 prisoners with hospitals, quarters for officials, and subordinates, and the military guard, were completed, and in that short space of time a waste had been made into a town with a water service, electric light, a post and telegraph office, wire shoots, and an aërial tramway for the easy transport of fuel and goods, and various shops with everything necessary to supply the wants of the inhabitants. Later on, as our successes in

South Africa necessitated the expatriation of more prisoners, orders were received to extend the camp, so that eventually there was accommodation for over 5,000 of them.

Population.—A British Battalion, 1,000 strong, was employed to guard the prisoners, and there was a large army of Public Works' coolies, scavengers, sweepers, contractors' men, &c., living just outside the camp proper, but under control, which, with the prisoners, must have made up the total population of Diyatalawa to something very near 7,000 persons.

The whole of this vast work was centered in the person of the Governor, and was the outcome of his energy; its success was due to his marvellous attention to detail.

Buildings.—All permanent buildings were made of corrugated iron. The huts for prisoners of war were 120 feet by 20 feet by 12 feet, with ventilated wooden floors. Large doors were placed at either end, and plenty of window space. The huts were arranged side by side in blocks, with wide streets between the various blocks. Sixty-four prisoners were originally told off to each hut, but the number was eventually reduced to fifty-four, which gave a cubic space of about 533 cubic feet to each man. Prisoners of war officers were accommodated in similar huts which had wooden linings. Separate individual quarters were provided for General P. H. Roux and General J. H. Olivier, and also for a (Basuto) Kaffir and a "Cape boy," who, although prisoners of war, were not allowed by the Boers to share their huts.

Kitchens.—Kitchens with iron roofs and open sides were placed at convenient sites. There was a swimming bath and a recreation hall, 120 feet by 40 feet.

Latrines and Conservancy.—The latrines consisted of an iron framework with roofs and sides of corrugated iron, a cement floor sloping to a cement drain, into which slops and liquid excreta were eventually conducted to absorption pits filled with coarse filtering material. These produced no

nuisance, and worked in every way satisfactorily. The solid excreta was collected on the dry-earth principle and conveyed to a pitting ground by a tram rail half a mile away from the camp. At Ragama the solid excreta was incinerated.

Water Supply.—The water supply was obtained from two sources, situated respectively two miles and one and a half mile from the camp. The catchment areas were well protected against pollution, and the water was conveyed by underground iron pipes to the camp and distributed to standpipes placed at convenient points. The quantity averaged over twelve gallons per head per day (exclusive of the swimming bath), and was sufficient even in the dry weather. Its quality was very good, as shown by the regular monthly analysis.

Food supplied.—The food supplied to prisoners of war was on the same scale as the army ration; the quality was good and the quantity ample. The amount of meat was more than was necessary for men doing no work; it was reduced in some of the camps, with a corresponding increase of vegetables, with good results.

Recreation and Employment.—Cricket, football, tennis, quoits, swimming, and route marching twice a week (where available) were the outdoor forms of exercise. Indoor amusement was provided by such games as chess, draughts, dominoes, boxing, theatrical entertainments, and concerts. There were two libraries at Diyatalawa: one contained English literature, the other French, German, and Dutch.

A small amount of paid labour for prisoners was provided in the way of road-making, and encouragement was given to the prisoners to work at their trades, such as masons, blacksmiths, carpenters, shoemakers, tailors, clerks, bookbinders, drapers, stationers, carvers, &c., but the majority preferred to be idle and to sit the whole day smoking their pipes.

Ground for Cemetery.—A cemetery was selected at a distance of about 500 yards from the camp.

Hospitals.—At the opening of the camp there was only one general ward for twenty-five patients and an isolation ward for eight patients. In a short time two more wards of twenty-five beds each were built, a convalescent ward for twenty-four was opened, and during the height of the epidemics ordinary huts were placed at the disposal of the Medical Department by the Commandant, Lieut.-Colonel A. C. F. Vincent, C.M.G., for use as wards ; by these means a total hospital accommodation of 360 beds was made available. The wards were similar to the huts for prisoners of war, only they had wooden linings and gave each man much more superficial area and cubic space. Latrines and bath, store and nurses' duty rooms, were attached. There were out-patient departments, dispensaries, storerooms, and quarters for the Medical Staff, female nurses, dispensers, steward, and orderlies.

The Medical Staff was composed of officers of the Civil Medical Department, and the camp was in medical charge of Dr. C. T. Griffin for the first four months, after which Dr. T. Garvin was appointed ; and it is to his indefatigable exertions that the severe epidemic of enteric fever (to be afterwards described) was successfully combated. The subordinate Medical Staff (dispensers, &c.) were also supplied from the Civil Medical Department. The nursing was in charge of Sister Lucy, assisted by other European ladies, who were ably supported by a loyal band of orderlies recruited from among the prisoners of war themselves ; many of these men had been at the war in association with the Netherlands Ambulance. The equipment was supplied by the Ceylon Government Stores, and the hospital equipment, drugs, and surgical apparatus by the Civil Medical Stores.

SUBSIDIARY CAMPS.

IT soon became apparent that the camp at Diyatalawa was over-crowded, and, in addition to this, that the foreign element among the prisoners of war was likely to give trouble; so in November, 1900, it was decided to establish a second camp for foreigners and troublesome prisoners. This second camp was established at Ragama, a station on the Main Line to Kandy, about nine miles from Colombo, where there were some substantial huts already existing, and it was only necessary to build dining-rooms, a hospital, and the necessary offices and quarters for the military guard (composed of four companies of Infantry) and camp officials. This camp was opened on the 8th January, 1901, and the maximum strength of the prisoners was 360. The hospital accommodation consisted of twenty beds with an out-patient department. The sanitary arrangements were all that could be desired, and the health of the prisoners was remarkably good, notwithstanding the climate, which was uniformly hot and moist throughout the year. Ragama was as nearly perfect as a standing camp could be.

A third camp was established at Mount Lavinia, about seven miles to the south of Colombo, on rising ground overlooking the sea. There was accommodation here for 150 men, who were all convalescents. This camp was managed entirely by the Medical authorities, and there were no guards. The men were on parole. The camp was opened in December, 1900, and closed in January, 1903, and it is a significant fact that during these two years there was no attempt made by any prisoner to escape, nor was there a single instance of misbehaviour, although the temptation to escape was great, being so near Colombo, and the opportunity to misbehave was constantly present from the large influx of passengers of all nationalities who are in the habit of visiting Mount Lavinia during the stay of mail ships in harbour.

A fourth camp was established for political reasons at Urugasmanhandiya, which was situated four miles from the sea about half-way between Colombo and Galle. The maximum strength of this camp was 369. It was opened in September, 1901, and closed in November, 1902.

A fifth camp was established at Hambantota on the east coast; the prisoners were on parole here and at Urugasmanhandiya. Accommodation was provided for them in the old jail buildings. This camp was opened in September, 1901, and was used for ten months. For a couple of months early in 1901 the hired transport Atlantian, moored in Colombo Harbour, was used as a convalescent depôt, and 150 prisoners of war were accommodated in her.

In these subsidiary camps the medical and sanitary duties were performed by officers of the Ceylon Civil Medical Department, assisted by two officers of the Royal Army Medical Corps lent from India for this purpose.

ARRIVAL OF PRISONERS-OF-WAR.

THE camp at Diyatalawa was ready for prisoners on the 4th August, 1900, and the first transport arrived at Colombo on the 8th of that month. On the 9th the second transport arrived ; this was followed on the 2nd September by another. The fourth arrived on the 5th September, the sixth on the 12th of that month, the seventh on the 22nd, the eighth on the 9th November, the ninth on the 8th January, 1901, and the tenth on the 29th May, 1901. The total number of prisoners landed from these various transports was 5,131.

The Principal Civil Medical Officer boarded each vessel on her arrival and arranged for the transport of the sick to the Colombo hospitals. There were fifty-four so landed ; twenty-nine of these were received into the Colombo General Hospital, and twenty-five into the Borella Convict Hospital. The principal diseases for which these prisoners were detained in Colombo were enteric fever, pneumonia, hepatic abscess, meningitis, mumps, malarial fever, and valvular disease of the heart. The military carried out the disembarkation of the healthy and their transport to the several camps. Boys of tender age and very old men were sent back to South Africa by the vessels which brought them here. On the sea passage to Colombo six prisoners of war died.

The transports on arrival presented a melancholy aspect. The prisoners of war crowded the decks and were keenly anxious to see what kind of a country it was to which they had been banished. To many of them this voyage was their first sight of the sea. To all the might of England was forcibly demonstrated. Many of the prisoners were sent on board straight from the battlefield with no change of clothing ; they were dirty, covered with vermin of all kinds, and were dejected and forlorn ; and over all was a dead silence, only broken by military orders to the sentries, with loaded rifles, who occupied every coign of vantage in the rigging, on the superstructures, and the bulwarks.

Nationalities.—Prisoners of war were represented by the following nationalities :—

Free Staters	...	3,718	Russians	...	8
Transvaalers	...	858	Russian Jews	...	5
Natal and Cape Colonists		171	Belgians	...	3
Kafir	...	1	Swiss	...	4
Cape Boy	...	1	Greeks	...	3
British	...	36	Danes	...	4
Americans	...	16	Austrians	...	7
Germans	...	129	Swedes	...	5
German Jews	...	2	Turks	...	2
Hollanders	...	123	Spaniard	...	1
Dutch Indian	...	1	Syrian	...	1
French	...	24	Hungarian	...	1
Corsican	...	1			
Italians	...	5	Total	...	5,131
Polish Jew	...	1			

From the experience gained by the epidemics which occurred among the first few batches of prisoners, it was arranged that those subsequently arriving should be received into a special part of the camp isolated by a double wire fence. These subsequent arrivals were left in quarantine for a month, after which, if no disease appeared among them, they were allowed to mix with the general camp population. This precaution proved to be of the greatest service.

EPIDEMICS.

THE general health of the camp at Diyatalawa remained good and caused no anxiety during the first month of its occupation, but with the arrival in September, 1900, of a large number of prisoners, who surrendered when General Prinsloo was defeated, the health of the camp rapidly deteriorated. These men arrived by the ss. "Ranee," "Bavarian," "Dilwara," and "Mongolian." A severe epidemic of measles broke out, which reached its maximum intensity in October, and at this period sporadic cases of enteric fever became frequent, and these rapidly increased in numbers until they assumed alarming proportions. During November and December, 1900, the outlook was most grave, the sick-rate became alarmingly high, and deaths were of almost daily occurrence.

The general tone of the camp was one of deep depression, which was intensified by the meteorological conditions; there was little sun and a good deal of rain. The men themselves were gloomy and apathetic; they took no interest in anything but the sickness of their comrades, and believed and spread exaggerated reports as to the numbers of the sick and dead. The mental depression was accentuated by their giving up to a large extent their recreations and amusements and by an over-indulgence in religious exercises, which almost took the form of religious mania.

With the new year 1901 a marked improvement in the general health took place; the weather was warm and genial, the gloomy air of depression left the men's faces, their spirits revived, and they became cheerful, contented, and hopeful, and this condition continued for the remainder of the time they were prisoners.

Disease in an epidemic form occurred only at the camp at Diyatalawa; the other camps were free.

Measles.

The first epidemic was measles, which was introduced by a prisoner of war named T. P. Coetze, who had arrived in Ceylon by the ss. "Ranee" on 2nd September, 1900. He reached the camp on 5th September, and reported himself sick on the 6th with fever, cough, and a typical rash. The second case was admitted to hospital on the 11th, the third on the 14th, and by the end of September there were 53 cases in hospital. The ss. "Ranee" landed in Colombo some cases of this disease, so it is easy to trace the source of infection. The following table shows the number of cases admitted, discharged, remaining, and deaths :—

1900.	Admitted.	Discharged.	Remaining.	Deaths.
September	... 53	... 1	... 51	... 1
October	... 189	... 121	... 115	... 4
November	... 9	... 122	... —	... 2

The total number of cases was 251, with seven deaths, a mortality rate of 2·7 per cent. This outbreak extended over a period of seventy days. The largest number admitted on any one day was 14. The last case was admitted on 14th November and discharged on the 25th. The largest number in hospital on any one day was 140. Boers are very susceptible to measles, and it is no uncommon occurrence for the same person to have more than one attack; among the patients suffering from this disease were many old men, and the death-rate was highest among them.

The type of the disease was distinctly severe; in some the rash was almost purpuric, and in most the cerebral and chest symptoms were marked. 126 were serious cases with maximum temperatures ranging from 103° to 105·4°, with delirium, bronchitis, and broncho-pneumonia. This last complication was the cause of six out of the seven deaths.

Acute serous diarrhœa occurred in one case, and was the immediate cause of death. Epistaxis occurred in 33 per cent. Ophthalmia and subconjunctival hœmorrhage were noticed in some of the cases.

The methods adopted to check the spread of the outbreak were daily medical visits to all the huts and early segregation of the sick by their removal to special isolated huts surrounded by barbed wire, disinfection of huts, clothing, &c. A special Medical Officer was resident inside the measles camp.

Prisoners of war arriving subsequently to this outbreak brought measles with them, but by detaining these cases and men with suspicious symptoms in Colombo, and by the quarantine established at Diyatalawa as before-mentioned, and disinfection, a further outbreak was prevented.

Mumps.

A small epidemic of this disease occurred in January and February, 1901. There were 26 cases and no deaths. This disease was brought to Ceylon by a prisoner who arrived by the ss. "Catalonia" on the 12th January. It was fully developed on his reaching the camp, and he was isolated. The 598 other prisoners who arrived by the same ship were put in quarantine for a month, and had their belongings disinfected. The disease did not spread to the other parts of the camp. It was of a mild type, and in only two cases orchitis developed as a complication.

Enteric Fever: First Outbreak.

This disease occurred at Diyatalawa on two occasions. The first outbreak commenced in September, 1900, and lasted until December, 1901. There were 711 cases, with a death-rate of 8·72. The first case was that of H. Oostherizer, who arrived by the ss. "Bavarian" on the 5th September, 1900; he reported himself sick on the 21st of that month, and said he had been feeling ill for ten days. The second case was that of a prisoner who arrived by the ss. "Dilwara" on the 8th September; he reported ill on the 28th September with the disease well advanced. The third case arrived by the ss. "Ranee" on the 2nd September, and reported sick on the 6th October, having felt unwell for some

days. The fourth case arrived by the ss. "City of Vienna" on the 22nd September; he reported himself sick on the 19th October.

Working out the dates of attack according to the generally accepted period of incubation, it is positive that the first case was infected before he arrived in Ceylon, and that the second case probably was infected before arrival too.

The following list shows the names of the transports and the number of cases of enteric which subsequently occurred among the passengers: ss. "Mohawk" 26, ss. "Orient" 4, ss. "Ranee" 84, ss. "Bavarian" 235, ss. "Dilwara" 205, ss. "Mongolian" 94, ss. "City of Vienna" 16, ss. "Ranee" (second voyage) 21, ss. "Catalonia" 6; and although this is not a complete list of all the cases that occurred, it is interesting in demonstrating the fact that the "Bavarian" passengers contributed the greatest number of cases, and it must be remembered that the first case came by this vessel, and that on her arrival 23 cases of sickness were accommodated in the Colombo hospitals, and that among these were some who died of enteric fever.

The chain of evidence connecting this outbreak with South Africa is complete; enteric fever as mentioned above was on the transports; it was also at the camps at Greenpoint and Simon's Town, from which many of our prisoners were brought; it also was raging in the British and Boer armies.

There is no possibility of this disease having been contracted in Ceylon, because—

(1) Diyatalawa is built on virgin soil.
(2) The water supply was chemically pure.
(3) No milk (with the exception of tinned milk) was used.
(4) No uncooked vegetables were eaten.
(5) There were no underground drains.
(6) There were no inhabitants in the immediate neighbourhood of the camp who could have communicated the disease.

(7) The residents nearest to the camp were Malabar coolies, who lived on estates at a considerable distance, and there was no sickness among them; and, further, it is an accepted fact that Malabar coolies are almost immune to enteric fever.

In October the cases became more frequent day by day, until in November and December the outbreak assumed all the features of a very severe epidemic, and was then at its height. There were 566 admissions during those two months. Six-sevenths of the total number of cases occurred during the first three months of the outbreak; the remaining one-seventh were spread out over the subsequent months as sporadic cases. By far the largest number of cases occurred among the Free Staters; the Transvaalers came next and the Uitlanders last, and the deaths were more numerous, in proportion to those attacked, among Free Staters than the others. As a reason for the greater sick and death rates among the Free Staters, it should be mentioned that there was a lack of sociability between them and the Transvaalers, and consequently the infection was more likely to be disseminated among the former. The Free Staters were more depressed; they seemed to feel their position and surroundings more accutely; those attacked with the disease exhibited more hopelessness and nervousness and a greater concern as to their recovery. Another factor which may account for their mental attitude was that they were brought here direct from the field of battle with the sense of defeat and disappointment strongly marked.

Most of the Free Staters were conveyed to Ceylon by the transports "Bavarian," "Dilwara," "Mongolian," and "Ranee," and the deaths from all causes per 1,000 arrivals by these vessels were for the first year 24·01, 26·31, 17·98, and 16·72 respectively.

As to the clinical features of the disease, it may be said the mode of onset generally was slow, the chief

symptoms being malaise, headache, loss of appetite, furred tongue, and constipation. In some cases the onset was sudden, attended by chills, or rigors with violent headache and early delirium. In a certain number of the cases the fever during the first week subsided to normal both morning and evening for three or four days, when it would again rise and assume the typical enteric fever curve.

In the earlier cases epistaxis, vomiting, and diarrhœa were present; in about 3 per cent. of the cases the type of the disease was virulent, characterized by high temperature, severe headache, with cerebral symptoms, tremors, subsultus, dry brown tongue, sordes on teeth and lips, with a tendency to parotid buboes, diarrhœa, involuntary evacuation of excreta, prostration, leading to a condition of meningitis with delirium, coma, photophobia, retraction of the head, and rigidity of the back muscles, which ended in death; or a sudden fatal termination was the result of perforation or hæmorrhage. Those who recovered from these serious symptoms were left prostrate with occasional delirium, and Dr. Garvin remarks of these that some eventually died of a toxæmia marked by slight and erratic rises of temperature, diarrhœa, great emaciation, and failure of the heart. In a few of these (all fatal) blood and albumen were found in the urine, followed by death from coma or convulsions.

The type of the disease had undergone a rapid change for the better by the middle of December, and towards the end of the epidemic it was exceptional to meet with a serious case.

Complications.—Intestinal hæmorrhage occurred in 3·18 per cent.; in this number slight cases are not included, the percentage applies to those cases only in which this symptom was so grave as to cause anxiety. In a large proportion of the cases the hæmorrhage recurred; in some it was single and so severe as to cause immediate death. Eight deaths were due to hæmorrhage. Some cases in a desperate condition from this cause recovered, in one case after five distinct copious bleedings.

Perforation.—The well-known clinical symptoms of perforation of the intestine occurred in 1·44 per cent. of the total number attacked; every case of perforation proved fatal. This complication was comparatively frequent in the earlier stages of the epidemic.

Meningitis.—This complicated 1·44 per cent. of the cases, and occurred during the earlier ones.

Pneumonia.—In 2 per cent. of those attacked with enteric, pneumonia supervened. It proved fatal in two cases.

Parotid Buboes.—These occurred in 2 per cent. of the cases, and went on to abscess formation.

Pyæmia.—There were four cases of multiple abscess, evidently of a pyæmic origin.

Erysipelas occurred subsequent to the enteric symptoms in two instances.

Thrombosis.—This complication affecting the internal saphenous vein occurred in four cases only.

Age Incidence.—The greatest number of cases occurred in men between twenty-one and thirty years of age, then came individuals from ten to twenty years, then in those from thirty-one to forty years, then from forty-one to fifty years, then from fifty-one to sixty years, and lastly from sixty-one to seventy years, in which were two cases.

The death-rate per cent. was highest in men between forty-one to fifty years, then in those from twenty-one to thirty, then in those from thirty-one to forty, lastly in those from ten to twenty. There were no deaths among the cases in the age periods fifty-one to sixty and sixty-one to seventy years.

Relapses.—Among the first cases relapses were frequent, and could in some cases be traced to the mistaken kindness of friends surreptitiously introducing indigestible food into the wards during their visits to convalescing patients. Relapses occurred in 4 per cent. of the total cases treated.

Second Attacks.—There were three men in whom a second attack of the disease developed; one of them died from intestinal hæmorrhage.

Attacks among the Medical and Nursing Staff.—None of the ladies engaged in nursing contracted the disease. One Medical Officer and six of the ward orderlies did so; one of the latter died.

Dr. Garvin draws attention to the remarkable freedom from this disease enjoyed by the Malabar coolies engaged in the camp as sweepers, latrine and ward coolies, of whom there was a very large number; not one of them contracted the disease (*vide* page 14).

Cause of Death.—The following list shows the cause of death in the order of frequency:—

Exhaustion, including Toxœmic conditions.
Perforation of bowel } equal.
Meningitis. }
Hæmorrhage from bowel.
Hyperpyrexia.
Pneumonia.
Erysipelas.

This outbreak differs from many, in the ease with which many of the doubts surrounding an epidemic of enteric fever can be excluded. The bare facts are these. A large body of men were transported from one continent to another; they were located in a perfectly new town which had been built for them, with a good water supply and excellent sanitary and conservancy arrangements, and before they had been there a month cases of enteric occurred which ran through the community at an alarming rate, and the questions are, How was the disease introduced, and how did it spread?

The answer to the first question has already been given, viz., from South Africa.

With regard to the second, it should be stated that—

(1) Direct infection from person to person was possible, particularly in the latrines; a man in the early stage of the disease would use a latrine common to many others who were healthy. A healthy latrine in an uninfected part of the camp may have been visited by a patient in the early stage of the disease and so have infected it; in this way different foci for the spread of the disease may have been established.

(2) Flies were numerous in the camp: the possibility of them infecting food must be recognized.

(3) The habits of the Boers at first were far from cleanly. After defœcation it was usual not to use any means of cleansing the person; in this way the inside of the trousers became fouled, and the dried excrement may have been disseminated in the huts (although it should be remarked that some of the clothing was examined bacteriologically, but no true *Bacillus Typhosus* was found).

(4) There is the possibility of the germs of the disease being in the system (before the arrival of the prisoners in Ceylon) remaining inert until, by deterioration in health and the consequent weakening of the power of resistance, under conditions favourable for their development, they lighted up into activity and produced the well-known train of symptoms.

(5) Dust may have been the vehicle of dissemination.

The Prisoners of War Camp was overlooked by that of the military guard, which consisted of a Battalion of Infantry. A portion of the 1st Battalion King's Royal Rifles landed on 11th August, 1900, and at a subsequent date the remainder of the Battalion arrived. They came with the prisoners in the same transports. This regiment had been exposed to the same danger of infection in South Africa as the Boers, and it had been through the siege of Ladysmith. While at Diyatalawa it had twenty-five cases of enteric fever among the men, with five deaths. The first case was recognized on the 18th October.

The regiment left for India on the 31st December, and was relieved by the 1st Battalion Duke of Cornwall's Light Infantry from Dum Dum. The latter regiment had one case of enteric fever in its ranks during its prolonged stay at Diyatalawa, which case, according to the history, may have been introduced from India. The troops used the same source of water as that which supplied the Boer Camp, and no fresh milk was consumed.

Owing to the exigencies of the situation many of the sentry posts were in the immediate vicinity of the Boer latrines. The King's Royal Rifles were on duty during the height of the epidemic. The Duke of Cornwall's Light Infantry were at Diyatalawa during the prevalence of the outbreak; they practically did not suffer at all from the disease. This fact points to the conclusion that the men of the Rifles were either infected in South Africa or on the transports—in which case the usually accepted period of incubation requires to be re-investigated—or that from the hardships they had gone through they were more susceptible to the poison present in the Boer Camp at Diyatalawa; these remarks apply equally to the first cases which occurred among the Boers.

It has been proved that the *Bacillus Typhosus* can be found in the mesenteric glands for months after a patient has recovered from enteric fever; might not the converse hold good, that the bacilli are stored up in a person's organs and can there remain dormant until favourable conditions occur to light them up into activity?

Prophylaxis.—At first the methods employed to combat the epidemic were the early removal of all cases of fever and febrile diarrhœa from the huts to the segregation hospital —this was done by the Medical Officers inspecting the men in the huts daily; the daily airing of clothes, bedding, &c., and the exposure of them to the sun; dry scrubbing of the huts and weekly washing out with Jeyes' disinfectant; the prevention of the storage of food in the huts and of the hanging

up of clothes within them; the prohibition of the sale of purgatives in the form of patent medicines in the camp; the encouragement of open air exercise and of personal cleanliness; the improved ventilation of huts and the reduction in the number of men occupying them, thus increasing the cubic space per head. Later on it was possible to employ a steam disinfector, through which every man's clothes, bedding, and belongings were passed, and each hut had its walls sprayed with a solution of carbolic acid, and the floors washed with a strong solution of mercuric chloride solution. Latrines which were considered to be too near the residences of prisoners were removed farther away, the latrine buckets were "dressed" with a solution of mercuric chloride before use, and the contents treated in the same way before removal. The level of the sub-soil water was lowered by the draining of two sheets of water; and lastly, urotropine was administered to the patients systematically with the object of reducing the infective power of the urine. These measures were quickly followed by an improvement in the general health of the men and by a marked reduction in the number of those attacked.

Second Outbreak of Enteric Fever.

The camp was free from enteric for four months (the last case of the first epidemic was admitted on the 29th November, 1901, and it proved fatal on the 15th December), when on the 9th April, 1902, two young prisoners were admitted to hospital with the disease of four days' duration; on the 18th of that month a third case occurred. All three came from the same hut.

The history of this epidemic is that a fortnight before the outbreak ten young prisoners were allowed out of camp on parole to visit the neighbouring town (Haputale); eight of the ten sickened, three with enteric fever and five with diarrhœa and fever of short duration. All these boys drank water from a stream which ran along the side of the road past the Post Office. There had been a recent fatal case of enteric

fever in a child of the Postmaster, followed subsequently by a second case in the person of a servant of his. A bathroom and latrine in the Post Office next to the room in which the child died and close to the servant's room communicated with the stream from which the boys drank by an open drain cemented for a part of its length. From the above it would appear to be evident that this outbreak was introduced into the camp from this source. The hut in which the boys lived was in perfect order, and was one of the best kept and best ventilated in the camp.

The number of cases that occurred was 44. The last case admitted to hospital was on the 15th November, 1902. There were six deaths, giving a mortality rate of 12·7 per cent. The deaths were due to hyperpyrexis in three cases, perforation of the intestines in two cases, and exhaustion in one case.

The same precautionary measures to control the spread of the disease were carried out as during the first epidemic, with satisfactory results.

At the Ragama Camp three cases of enteric fever occurred, with one death ; all these cases could be traced to Diyatalawa. Ten cases were received into the Colombo hospital from the transports. There were two cases treated at the Civil Hospital at Kandy ; these were in prisoners of war officers who were living in the town on parole.

The above account of enteric fever includes all cases that occurred among the prisoners of war in Ceylon, and is characterized by its virulence, the extent to which it reached, its low mortality, and rapid control.

During the gloomy outlook in November and December, 1900, the Camp authorities and Medical Staff had an anxious time. The prisoners were dejected and desperate ; they knew that many of their comrades were suffering from a dangerous infectious disease, and that funerals occurred almost daily ; they were helpless ; what wonder, then, that vague rumours got about that they meant to escape by making a rush for liberty—to get away from what they looked upon as a

pestilential hollow, even at the risk of their lives—for death to many would have been a relief to the everlasting mental worry of exposure to the vague enemy of disease, which was confined within the narrow area of a barbed wire fence. Fortunately no attempt at such an extreme measure was made, and I have little doubt that the cheerfulness of the Medical Staff, the taking of the men into their confidence and explaining to them the exact state of the health of the camp, and the way they could help themselves by improved personal hygiene, had not a little influence in preventing organized disturbance and active insurrection.

GENERAL HEALTH.

WITH the exception of the epidemics, the general health of the prisoners of war was on the whole good, and the sick and death rates would, I think, compare favourably with any similar body of men placed under similar conditions elsewhere.

General Diseases.—The admissions to hospital in all the camps were principally for the following diseases:—Dysentery, malarial fever, debility, dyspepsia, and diarrhœa. Of the more important disease, there were 5 cases of cerebro-spinal meningitis, 221 of dysentery, 168 of malaria, 12 of mania and melancholia, 5 of appendicitis, 5 of hydatid of the liver, and 2 of hydatid of the lung.

Special Remarks on the above Diseases.—Of the cases of cerebro-spinal meningitis, four occurred at Diyatalawa and one at Mount Lavinia. No cause can be assigned to the former, but the latter was thought to be due to exposure to the sun. There was no lumbar puncture made in any of these cases for the examination of the cerebro-spinal fluid bacteriologically, and the diagnosis rests entirely on the clinical symptoms.

Bowel Diseases.—These gave a fair number of admissions, especially at Diyatalawa and Ragama. The type of the disease was mild, especially at the latter camp, but towards the end of the time Diyatalawa was occupied the disease assumed a more severe character, and was the factor that contributed the greater number of the deaths.

Cases of diarrhœa and dyspepsia were common to all the camps, and were due to errors in diet and inefficient mastication of the food owing to the neglected condition of the men's teeth.

Malarial Fevers.—I do not think that any case of malaria originated in Ceylon. There were 92 admissions for

this disease at Diyatalawa during the first year. Diligent search was made for the anopheles mosquito, but only one specimen was found during the whole time the camp was in existence. The history in by far the great majority of the cases was that they had had previous attacks of this disease in South Africa. During the second year at Diyatalawa there was a distinct falling off in the number of cases—32 as against 92 in the year previous. Every precaution had been taken by the drainage of swamps in the vicinity of the camp, the filling up of hollows to prevent the formation of pools of stagnant water, the improvement of the drainage, and the removal of articles likely to hold water, so as to reduce the breeding grounds for mosquitoes. In the other camps where the conditions for the development of malaria would appear to have been more favourable, there were no cases, and at Ragama it was said there were no mosquitoes of any kind. All the cases yielded readily to quinine, and there were no deaths.

Debility.—The cases admitted under this head were fairly numerous; in many instances the diagnosis was made for the want of a better term. They happened mostly in the elderly and infirm. The cause is not far to seek when it is remembered under what conditions these men lived.

Mania and Melancholia.—Considering the mental attitude of the prisoners, it is astonishing there were not more cases requiring special treatment in an asylum. In addition to the number so treated, there were many who were admitted into the camp hospitals suffering from mental depression, who refused their food and exhibited fits of lacrymation. The complaint of many of the men was the confinement within such a limited area, and they regarded the wire entanglement which surrounded the camp as the main exciting cause of their lowness of spirits. In many cases home sickness and the enforced absence from their families contributed to this condition; many of them were sorely worried by the knowledge that their wives and families

left behind were in need of the common necessaries of life. The Boers are a very domesticated race, and it was touching how they took one into their confidence and showed with pride the photographs of their wives, children, and sweethearts. They were most appreciative of a little sympathy.

Hydatid Disease.—This disease is unknown in Ceylon, and from a medical point of view it is interesting, because those cases which necessitated operation were the first of the kind to come under the observation of local surgeons for operative interference. The instances of this disease of the lung gave the greatest amount of trouble and anxiety, and they remained in hospital for months.

Inflammation of the External Auditory Meatus.—There was a remarkable "epidemic" of inflammation of the external auditory meatus, which occurred among the prisoners who first occupied Ragama. The cases could be numbered by hundreds. After a few months it entirely disappeared. No cause could be assigned to this outbreak. The water was of good quality, and only contained four parts per 100,000 of total hardness.

Venereal Diseases.—The prisoners were remarkably free from these diseases, the reasons being, I suppose, early marriage, the fondness of home life, and to the fact that these men had lived all their lives under primitive pastoral conditions, and that they did not come from the large towns. There were no instances of the later manifestation of the disease contracted in early life. A very few cases were treated, which occurred in men who had been allowed out on parole.

Sudden Deaths.—Of these there were five. They all occurred at Diyatalawa, out of hospital. The causes of these sudden deaths were: one from gunshot, which happened to an Austrian prisoner who attempted to get through the wire entanglement late at night; he was challenged by the sentry and duly warned, but as he persisted in his attempt was

fired at and mortally wounded. One, from an assault committed by a fellow-prisoner in a passion ; the victim received a heavy blow with the fist over the heart and fell down dead. There were two sudden fatal cases of heart disease and one from cerebral meningitis, which were confirmed by post-mortem examination.

Operations.—The Boers are a suspicious race, and this characteristic was noticed with regard to operations. During the first year very few patients consented to any cutting operation, and the surgical work in the hospitals was confined to the removal of a few fatty and sebaceous tumours, a case of herniotomy for strangulated rupture and incision with drainage of a hepatic abscess, and a few minor operations ; but during the second year, when they had gained confidence in their medical attendants, there was less difficulty in persuading the men to submit to surgical interference—in fact, many came voluntarily to be relieved of varicocele, varicose veins, hernia by radical cure, various tumours, and for two cases of cancer. Other cases operated upon were for hydatids of the liver, disease of bones, hæmorrhoids, fistula, fragments of bullets, and hydrocele (radical cure).

Vaccination and Smallpox.—At Diyatalawa during the first year cases of smallpox occurred in the villages and on an estate not far removed from the camp. As a precautionary measure it was decided to protect by vaccination all those prisoners who had not good marks. 872 men were vaccinated, 75 per cent. of whom were successful ; there were 668 primary vaccinations and 204 re-vaccinations.

At Ragama in 1901 a prisoner who returned from Hambantota, where he had been on leave on parole, developed smallpox. He was isolated, and the other prisoners were vaccinated ; there was no other case.

STATISTICS.

THE following information has been obtained from the Admission and Discharge Registers of all the camps with the exception of Hambantota, where a register was not kept.

As Diyatalawa was the principal camp, with the largest number of inhabitants, it naturally shows the greatest amount of sickness and death. These figures refer to cases admitted to hospital, and do not include those attended at the outdoor dispensaries and in their huts, of whom at Diyatalawa during the first twelve months there were 29,965 and during the second twelve months 7,943.

DIYATALAWA.

First Year.—For the period from 9th August, 1900, (the date the camp opened) to 8th August, 1901, there were 1,651 admissions to hospital, which gave a hospital admission rate of 386·76 per 1,000 of average strength for the year. The death-rate per 1,000 average strength from all causes was 22·25. The death-rate per 1,000, exclusive of deaths from infectious diseases and accidents, was 6·79.

Second Year.—From 9th August, 1901, to 8th August, 1902, number admitted to hospital from all causes, 693. The hospital admission rate per 1,000 of average strength was 159·04. The death-rate per 1,000 from all causes was 4·82. The death-rate per 1,000 exclusive of infectious diseases and accidents was 3·21.

Third Year (five months).—From 9th August, 1902, to 31st December, 1902 (when from a medical point of view the camp may be considered closed), there were 354 admissions to hospital. The hospital admission rate per 1,000 of average strength was 132·04. The death-rate per 1,000 from all causes was 5·22. The death-rate per 1,000 exclusive of infectious diseases and accidents was 4·47.

Ragama.

First Year.—From 8th January, 1901 (the date the camp was first occupied), to 8th August, 1901, there were 88 cases admitted into hospital, which gave a hospital admission rate of 282·05 per 1,000 per annum of average strength. The death-rate per 1,000 average strength from all causes was 3·20. The death-rate per 1,000 exclusive of infectious diseases and accidents, nil.

Second Year.—From 9th August, 1901, to 8th August, 1902, the number admitted to hospital was 125. The hospital admission rate per 1,000 average strength was 382·26. The death-rate per 1,000 from all causes, nil.

Third Year (a little over three months).—From 9th August, 1902, to 20th November, 1902 (the date of closing the camp) the number admitted to hospital was 30. The hospital admission rate per 1,000 average strength was 303·03. Death-rate, nil.

Mount Lavinia.

First Year.—This camp was opened on the 28th December, 1900, and all the sick requiring hospital treatment were sent to the Colombo hospitals until the 29th October, 1901, after which date a ward was established at the camp. From the opening of the camp until the 8th August, 1901, nine cases were transferred to the Colombo Hospital, giving a hospital admission rate of 90·64 per 1,000 average strength per year. The death-rate per 1,000 from all causes was 20·02. The death-rate per 1,000 exclusive of infectious diseases and accidents was 20·02.

Second Year.—From 9th August, 1901, to 8th August, 1902, the number admitted to hospital from all causes was 41. The hospital admission rate per 1,000 strength per year was 279·72. The death-rate per 1,000 from all causes, 7·04. The death-rate per 1,000 exclusive of infectious diseases, 7·04.

Third Year.—From 9th August, 1902, to 15th January, 1903, the number admitted to hospital was 11. Hospital admission rate per 1,000 average strength per annum was 156·72. The death-rate, nil.

URUGASMANHANDIYA.

First Year.—From 11th September, 1901, to 8th August, 1902, the number admitted to hospital from all causes was 242. The hospital admission rate per 1,000 average strength per annum was 738·80. The death-rate, nil.

Second Year.—From 9th August, 1902, to 5th November, 1902, when the camp closed, there were 78 admissions to hospital, which gave an admission rate of 217·27 per 1,000 average strength per year. There were no deaths.

Admissions of Prisoners of War to the Colombo General Hospital.

First Year (9th August, 1900, to 8th August, 1901).

Total	51
Deaths	5
Death-rate per 1,000 (prisoners of war) admitted ...	98·82
Death-rate per 1,000, exclusive of infectious diseases	58·62

Second Year (9th August, 1901, to 8th August, 1902).

Total	57
Deaths	4
Death-rate per 1,000 (prisoners of war) admitted ...	70·17
Death-rate per 1,000, exclusive of infectious diseases	52·62

Third Year (9th August, 1902, to 24th November, 1902).

Total	11
Deaths	Nil

Cases of Enteric Fever among Prisoners of War treated in the General Hospital, Colombo.

First Year.

Admissions	10
Deaths	2
Death-rate	20 per cent.

Second Year.

Admissions	5
Deaths	1
Death-rate	20 per cent.

Third Year.

Admissions	Nil
Deaths	Nil

MEDICAL MEN AS PRISONERS OF WAR.

AMONG the prisoners of war were four medical men who were employed in the Netherlands Ambulance. They were taken prisoners on account of certain despatches found in their possession. They were well-trained scientific doctors, and always ready with good advice on sanitary and medical matters. In September, 1900, they offered their services during a small epidemic of cholera which broke out near Kandy, and in November of the same year they volunteered their services during the bad epidemic of enteric at Diyatalawa, but on neither occasion was it necessary to employ them. Their names were Drs. Costa, Pino, Rykens, and Van Houten. The last was a bacteriologist, and in August, 1901, he was given leave to live in Colombo on parole, where he was anxious to work at leprosy at the Government Bacteriological Institute.

Formerly, in 1896, he had been assistant to Professor Spronck of Utrecht University, who published a paper on the culture of the lepra bacillus and its sero-diagnostic behaviour in "La Semaine Medicale," 1898, 49.

Professor Spronck sent Dr. Van Houten a culture of his lepra bacillus to Ceylon.

At the Berlin Leprosy Congress held in 1897 the German Professor Sticker read a paper on the result of his investigations on leprosy, which lead him to the following conclusions :—

(1) That the nose is the chief place from which the lepra bacillus is given off.

(2) That in that organ the first effect of the bacillus is produced.

Dr. Van Houten's first work was to carry out at the Leper Asylum here similar experiments to those made by Sticker. Writers with large clinical experience had said that the leprous affections of the mucous membranes of the upper air passages occur in a very early stage of the disease, but that in the

large majority of cases leprosy attacks the skin much earlier, and this is the experience noticed in Ceylon. Dr. Van Houten remarks that, even if the skin is generally first attacked, it is possible that the bacillus enters the body through the nasal mucous membrane without causing any changes there, and that as long as we know nothing of the saprophytic existence of the lepra bacillus we can come to no definite conclusion on this point.

Sticker's bacteriological examination of the nasal secretion gave the following results :—

Form of Disease.	Number of Cases examined.	Bacillus Lepræ found in	Percentage.
Tubercular ...	57 ...	55 ...	96·5
Mixed ...	28 ...	27 ...	96·4
Anæsthetic ...	68 ...	45 ...	66·2

The most remarkable circumstance in the above table is the large number of anæsthetic cases in which the bacillus was found, for generally in these cases it has been demonstrated only in small numbers in the affected nerves. Van Houten set himself to confirm, if possible, Sticker's observations, with the following result :—

Form of Disease.	Number of Cases examined.	Bacillus Lepræ found in	Percentage.
Tubercular ...	51 ...	46 ...	90
Mixed ...	88 ...	83 ...	93·2
Anæsthetic ...	66 ...	Nil ...	Nil

He made two films from each patient, and in the cases of tubercular and the mixed disease with negative results he re-examined them.

With regard to the presence of the bacillus in the nasal secretion in the tubercular and mixed varieties of the disease his conclusions agree with Sticker's, but Van Houten was unable to find the bacillus in a single case of pure anæsthetic leprosy, although his examinations were most carefully made on patients diagnosed as belonging to the anæsthetic class by Dr. Meier, the Superintendent of the Asylum, who has had over twenty-five years' experience of this malady.

Van Houten remarked the fact that in applying the platinum loop to the nasal mucosa of the anæsthetic cases he felt it to be perfectly smooth, whereas in the other forms of the disease it was uneven and hard, and sometimes there was considerable difficulty experienced in passing the loop through the stenosed nostril. Van Houten's results are entirely in accordance with clinical observations, viz., that the nose is never affected in the pure anæsthetic form of the disease.

Among the 205 cases examined by Van Houten were two of particular interest: one of these was an anæsthetic leper, aged 56, with a history of the disease of five years' standing, a few bacilli were found in the nasal secretion, and an internal examination of the nose revealed a general thickening of the mucosa with red spots. In this case the anæsthetic form was taking on the mixed variety. The other case was a girl of sixteen years with a history of tubercular leprosy of six years' duration. She had some infiltration of the skin just below one eye. The examination of lymph obtained from this source showed the presence of the bacilli, but the nasal secretion was free, and on internal examination the mucous membrane was found to be healthy.

The concluding research of Dr. Van Houten was on the cultivation of the *Bacillus Lepræ* outside the body, and is published in the "Journal of Pathology," Vol. VIII., No. III., page 260.

He excised a tubercular nodule from a leper patient, and from the bacilli contained in it grew others in pure culture in fish broth. After many failures a sub-culture was obtained by inoculating a glycerine beef agar plate with the original fish broth culture. From this sub-culture others were easily obtained in fish broth and on glycerine, glucose, and ordinary beef agar.

He did not try to produce leprosy from the bacillus he isolated.

His conclusions are as follows:—

"(1) That he had cultivated from leprous tissue a bacillus that differed from Hansen's bacillus in staining reactions and in size.

"(2) These bacilli mixed with diluted human serum showed the Pfeiffer-Bordet reaction *in vitro*. Leper serum reacted much more markedly than non-leper serum.

"(3) The reaction of leper serum is brought about by the concurrence of two substances present in leper serum, viz., the sensibiliser and the alexins. The reaction of non-leper serum is only to be attributed to the alexins.

"(4) This sensibiliser, which attached itself to the described bacilli, only occurs in leper serum.

"(5) Experimental research of various workers has proved (*a*) that the sensibiliser is a specific substance; (*b*) that a causal connection exists between micro-organisms or cells and their sensibiliser; (*c*) that the occurrence of a sensibiliser is a general law in immune sera.

"(6) The bacilli that he cultivated and described are the true morbid agents of leprosy, because leper serum, and leper serum alone, contains a sensibilising substance for them.

"(7) The susceptibility of lepra bacilli to the action of leper serum even in weak solution gives a plausible explanation of the numerous failures to cultivate these bacilli."

This work that Dr. Van Houten carried out is most interesting and instructive, but competent critics say that he has not made out his case, and that the Van Houten's bacillus is not the bacillus of Hansen or the true bacillus of leprosy, because of its different staining qualities: and the fact that Van Houten's bacillus did produce agglutinizing properties is no proof, because his bacillus having been obtained from a leper would be affected by *that* sensibilizing substance contained in the leper's serum, which was peculiar to the Van Houten bacillus. Dr. Van Houten's paper is well worth reading, and he is to be congratulated on his investigation and on the excellent way in which he has expressed himself in a (to him) foreign language.

REPATRIATION.

THE news that peace had been declared in South Africa arrived in Ceylon on the 2nd June, 1902, and was immediately communicated to the prisoners of war, who received it with the greatest enthusiasm. On the 7th of that month the terms of peace were communicated to the prisoners, whose opinions on the question differed considerably. A certain number of them believed the official interpretation of the terms and were quite willing to accept them; the majority refused to believe; while others looked upon the terms as incomplete, and continued to live in the hope of the matter being settled by arbitration by a foreign power.

The first batch of 400 left Ceylon for South Africa on 5th July, 1902. On 7th August another batch of 400 men, who had declared allegiance, left. All foreigners were handed over to their respective Consuls for disposal. The next large batch of Boer prisoners, 1,001 in number, left for South Africa on 22nd October. The delay was due to the disinclination of the prisoners to take the oath of allegiance, but in October a marked change came over the political feeling in the camps, due to the influence of their leaders and from the letters they received from home, with the result that from 200 to 300 came daily to take the oath. By the end of December 56 prisoners only were left in Ceylon, and 19 of these were allowed subsequently to go to Java; the remainder eventually took the oath, with the exception of three, who were released and are now in Ceylon and not allowed to return to South Africa without declaring allegiance. Their only means of subsistence is a small allowance which is given to them daily from the Imperial Government funds.

This history may be fitly concluded by quoting an extract from a letter from a Boer prisoner of war who had been in

Ceylon and is now in South Africa ; with the sentiments expressed all right-thinking Britons and Boers will agree:—

"I am glad to say that the Boers who returned to South Africa from Ceylon are getting quite reconciled to British rule. A good percentage of the claims have been paid out, and the promises made to us in Ceylon have been amply fulfilled, so that we have no cause for complaint with the Government. I trust in course of time the war and everything connected with it will be forgotten, and that Briton and Boer will work together for the common good of the people and country."

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