

## CHARLES DONOVAN, MD, Indian Medical Service\*

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Lt Colonel Charles Donovan was born in Bengal on 19 September 1863 in the days of Nawabs, Princes, Shikar and the British Empire. He was the eldest of the nine children of Judge Charles Donovan of the Indian Civil Service in Bengal. He received his degree of MD in 1889 from the Royal University of Ireland and in 1891 was commissioned into the Indian Medical Service as a Captain. He reached Bombay on 26 October 1891 and was soon posted to Mandalay, in Burma, where his first daughter, Helen, was born. In 1895 he was posted back to Madras and transferred immediately to Mangalore.

The journey to Mangalore was arduous in those days, involving travel by train, canal boat and, finally, by pony cart. Donovan lay delirious with malaria in the middle cart with his servant, Chinappa, in the third cart. The first pony cart was occupied by Mrs Donovan who had to beat the reluctant pony cart driver into submission as he was refusing to cross the several rivers at night for fear of crocodiles and tigers. (As the District Surgeon, Donovan was to spend much of his time travelling around by bicycle or pony cart). In Mangalore he contracted cholera and as there was no medical help available nearby, asked his wife to keep pouring whisky down his throat until he improved — which he did.

In 1897 Donovan saw active service on the Gordon Highlanders' Tirah Expedition to Afghanistan, for which he was awarded the Tirah medal. From 1898 until August 1919 he served in Madras. Until 1910 he was at the Madras Medical College and Government General Hospital, a teaching institution dating from 1835. Here, he was the second Physician and Professor of Physiology. In 1910 he was transferred as Superintendent to Government Royapettah Hospital, a non-teaching establishment.

In 1919, at a relatively early age, Donovan decided to leave India and return to Britain with his family and live in retirement at 'Camp House', Bourton-on-the-Water, near Gloucester. The year 1940 saw the death of his wife, Mary Wren Donovan, a descendant of Sir Christopher Wren, architect of St Paul's Cathedral. Donovan continued to live in Bourton with his two daugh-

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ters, Helen and Amy. (Helen became a famous archaeologist and was awarded the MBE). He had one son, Charles Reagh Donovan, who suffered from advanced retinitis pigmentosa. Although he graduated from Cambridge as an engineer, he was unable to reconcile himself to his progressive visual loss and spent the rest of his days in the Arctic Circle, where he died. Donovan's two daughters both died without issue; other eminent doctors continue the family tradition.

Charles Donovan himself died on 29 October 1957 at Moor Cottage Hospital, Bourton-on-the-Water, and was buried in the public cemetery there.

Colonel Donovan was greatly admired and adored by his Indian assistants whom he treated in the most courteous, kind and gentlemanly manner. The Donovans lived in a large house, 'Dunduan', in Nungumbakkam, Madras, and from here he used to drive into the hospital in a brougham. After a few minutes in his office, he would appear punctually on Havelock Ward at twenty past seven every morning. He stayed in the ward for about three hours, spending all his time talking to the patients or students. His bedside manner was perfect and the patients felt considerably better and encouraged as he moved systematically from one bed to the next. Donovan believed in spending more on food than on therapeutic agents of dubious value. He used to enthuse the entire team on his ward, with the result that the blood smears prepared by the sweeper were every bit as good as the ones he prepared himself. He established the Madras Medical College Athletic Association out of his own pocket.

Donovan was rather blunt and outspoken and created more enemies than friends. Those who knew him loved him immensely.

Charles Donovan's contributions to research were considerable. In 1900 Leishman, in the course of a post mortem, had seen certain bodies in the spleen which he considered to be degenerate *Trypanosomes*. In 1903 he felt the parasites represented Trypanosomiasis and reported his findings in the *British Medical Journal* of 30 May 1903. However, in Madras, Charles Donovan had noticed similar bodies *post mortem* on 22 and 24 April 1903. It was on 17 June 1903, a few days after reading Leishman's article, that he made his vital discovery of the presence of the causative agent of Kala-Azar, or Leishmaniasis, *intra vitam*; he then submitted his own paper to the *British Medical Journal* where it appeared on 11 July 1903. Soon after his independent findings, Donovan sent some of his slides to Ronald Ross of Liverpool and some to Laveran at the Pasteur Institute in Paris — where Laveran and Mesnil called the organism *Piroplasma Donovanii*. It was Donovan and Sir Ronald Ross who realised that the parasite was the causative agent of Kala-Azar. Even after the acceptance of Donovan's finding and the naming of the parasite as *Leishmania Donovanii* by Ronald Ross, up to 1904 Leishman refused to acknowledge the significance of Donovan's discovery. A lobbying faction of the Royal Army Medical Corps tried without success to

remove Donovan's name from the nomenclature. Donovan continued to study the disease in considerable depth and much of our knowledge of Kala-Azar is essentially due to his work. Meanwhile, Leishman reached unprecedented heights of fame and was knighted.

Donovan's other major contribution to research was on the condition originally called Ulcerating Granuloma of the Pudenda by Galloway (*British Journal of Dermatology*, 1897), of which the causative agent was then unknown. In 1905 it was Donovan who took crush impression smears from an ulcerating lesion in the mouth and identified the presence of the causative bacteria now called *Donovania* or *Calymmatobacterium Granulomatis*. Donovan's own student, Professor Rajam, published the WHO monograph on the re-named Donovanosis and desired that this name be adopted rather than more confusing terms of Granuloma Inguinale or Granuloma Venereum.

Donovan also made in-depth studies of insects and butterflies in India and Ireland and reported the occurrence of malaria in monkeys. Some of his specimens are housed in the Natural History Museum in London.

Charles Donovan's memory is perpetuated in a number of ways. In 1953 the Havelock Ward was renamed the Donovan Ward and a plaque to commemorate the Golden Jubilee of his discovery of 1903 was unveiled at a function organised and presided over by his former assistants, Captain Krishnasami and Dr D. Subba Reddy. Eighteen years earlier, a portrait of Charles Donovan was unveiled in the Madras Medical College hall by the Governor of Madras. In 1968 a large portrait of Donovan was hung at the Government Royapettah Hospital where he was the first Superintendent. The unveiling was carried out by Sir A.L. Mudaliar, Vice-Chancellor of the University of Madras and one of his old students. Interestingly, Helen O'Neil (née Donovan) met Sir Mudaliar in 1969 during her travels to India and signed the visitors' book at the Government Royapettah Hospital.

Charles Donovan's footprints on the shores of India and on the Sands of Time will remain to inspire all future generations in the medical profession.

#### **SOURCES**

Ross Archives, London School of Hygiene and Tropical Medicine

Wellcome Institute for the History of Medicine, London

Dr Charles Donovan, Hereford (Donovan's nephew)

Dean, Madras Medical College and Government General Hospital, Madras  
Superintendent, Government Royapettah Hospital, Madras

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