The legacy of Sir Charles Hercus

Your excerpt from Dr Colquhoun’s paper of 1910—100 years ago—showing the complete mystery of the cause of Graves’ disease, is a timely reminder of the monumental contribution made by Sir Charles Hercus, Dean of the Otago Medical School. He fostered research by setting up disease-removing full-time research units, manned by hand-picked people with especial research talent.

In this way, Hercus got rid of:

- Hydatids,
- Iodine-deficiency goitre and its associated cretinism,
- Ricketts, by milk in schools,
- Bovine tuberculosis, by Pasteurization of milk

…And discovered the cause of Graves’ disease. It is an autoimmune disease and has pioneered discovery of this great category of diseases, which are now ripe for prevention or cure by negating the microbial triggers or selective destruction of the pathogenic forbidden clones.²

This is a wonderful legacy from a very great man, whose methods should be copied by today’s leaders.

Hercus was descended from Shetland Island Vikings. The Vikings invading Normandy, found the French language better than their own, so they adopted it! They also copied the French in riding horses. This virtue of preserving and adopting anything good that was better than what they had themselves, contrasts strikingly with the Mongols. As well as plaguing the Chinese, the Mongols ruthlessly destroyed anything different from their own, including the great, civilised Muslim Arab Empire set up by Mohammed.³

Endowed with Norman virtues, Hercus was fearless in seeking to use all available talented people for getting rid of disease. His greatest asset was Dick Purves, with Honours degrees in Physics and Chemistry, who could take medical problems back to their basis in mathematics, physics or chemistry.

Hercus and Purves abolished New Zealand’s goitre endemic, saving countless thyroid operations and the birth of cretinous children. Then with Walter Griesbach and Tom Kennedy, Purves solved pituitary cytology, developed Endocrinology, discovered antithyroid drugs for medical treatment of thyrotoxicosis and set up the research with radioactive iodine that led to discovery that Graves’ disease of the thyroid is an autoimmune disease. These were monumental research achievements.

For seeking talent Hercus applied to the medical course the formal university tradition of a Bachelor’s degree, based on attendance at lectures followed by passing an examination, then a Master’s degree, based on writing a thesis which contributed to knowledge. Accordingly, Hercus had his medical students write a thesis in the 5th year of the course, its great virtue being that the student chose the topic, rather than
having it suggested by a supervisor. This enabled originality to be shown. I wrote a thesis on asthma that showed fledgling research ability and caused Hercus to recruit me as an apprentice to Purves 3 years later.

Duncan Adams  
Honorary Research Fellow in the Faculty of Medicine (Previously Director of the MRC Autoimmunity Research Unit)  
University of Otago, Dunedin

References:

