WITH WHALES AND SEALS

BY

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Surgery and medicine on Arctic or Antarctic expeditions are very different from the routine of practices and hospitals in cities. In lands where icebergs drift quietly by in the summer twilight and the world next day may be one howling gale, you are your own radiologist, pathologist, and theatre sister, and for a second opinion you have the nearest penguin or polar bear. When an operation has to be done, the ship's fifth engineer will probably be first assistant and one of the wireless operators anaesthetist. Then the patient so often gets back to duty in much less time than he would at home, for the air is pure and he knows his mates are waiting for him.

Surgeons and biologists on whaling operations, and those who come in contact with the lesser-known sealing expeditions, soon realize that behind the popular sagas of hardships and bravery in these industries lie killing methods which over the past hundred years have, for excesses of cruelty, been surpassed only by the horrors of fur trapping.

Whaling in the Antarctic

My introduction to the real state of affairs in whaling was in the Antarctic in the 1946-7 season as surgeon with a Scottish whaling fleet of 14 ships, comprising the parent factory ship the size of the *Empress of Australia*, 10 foraging harpoon vessels like squat trawlers, two oil tankers, and a supply ship plying between the mother ship and the United Kingdom during the season. Six hundred men had to be catered for medically. It was a year when the accident toll was heavier than usual, one catching-vessel being lost with only one survivor, and the fleet hospital on board the mother ship was kept in action with such as broken limbs and ribs, eye damage from a tank explosion, and, by the way of variation, injuries to a flenser who fell inside a blue whale's mouth as the carcass was being turned over on deck. Trapped with only his boots sticking out as the jaws came together, he got off with a moderately crushed chest and emphysema from the neck to the waist, but was back on his job in six weeks. In a factory ship crammed from stem to stern with machinery for processing the whales, with little room for men to move around, accidents were to be expected, but mangled feet and hands were very few. In view of the antiquated explosive harpoon still used in the killing, which bursts the whale intestines, a large supply of anti-gas-gangrene serum was taken, but little was required in spite of whales having to be handled at times in a very putrid condition.

A whale-factory cutting-deck, which for space resembles the flight deck of a small aircraft carrier, when in full action is a blood-soaked welter of entrails, massive vertebrae, ribs, jaw bones, and five-ton lumps of red meat being dragged in all directions. The whale being dismembered may have been well over 100 tons in weight, the equivalent of 150 oxen. The surgeon acting as biologist in the pursuit of whale pituitaries, ovaries, pancreas, or thyroids has to find his specimens with the minimum of delay in this battlefield if he is to secure them before they disappear through the deck manholes into the factory cookers below. And if his feet go out from under him on a piece of slippery whale tongue, then the mirth of those seeing him sitting in six inches of blood and entrails is anything but half-hearted.

The ship's hospital equipment was good. There were eight normal beds, two extra isolation cabins for emergency,

and an operating theatre equipped for every possibility; a portable x-ray plant was a great asset, and, in addition to its use for humans, was used to diagnose damage done to the foot of one of the many king penguins we brought back from South Georgia for the zoos in Britain.

The whaling surgeon is likely to be busy at any time in the day or night throughout the three to four months' active whaling season. During daylight most of his work will be with the factory hands, but at night catching-vessels will come alongside to take on bunkers and stores and get any sick men attended to, for only with very serious cases will they interrupt whaling operations. In addition to accidents there are always the few dental cases requiring fillings or extractions. The fevers also crop up. A week out from home we had a case of scarlet fever on board, and towards the end of the season one of the worst cases of chicken-pox I have seen. During the season the doctor may transfer to the catching-vessels for a few days at a time, keeping in touch with the mother ship and the other catchers by radio-telephone.

The method still used in killing the whales to-day is antiquated and horrible. Since the last war radar, asdic, and even aircraft have been added to the whalers' equipment, in addition to faster catching-vessels, but the sad fact remains that with all these inventions the actual killing with the explosive harpoon is more cruel and economically unsound than was the original iron harpoon at the dawn of the industry hundreds of years ago—more cruel than it would be to a man, for, in a whale, wound shock gives no relief; and economically bad, for the explosive harpoon is the most wasteful weapon possible. The delayed-action explosive head usually bursts the intestines and spreads putrefactive organisms throughout the circulation during the long time taken for the creature to die. Only in the comparatively few cases when the whale is speedily and humanely killed by a harpoon striking a vital spot altogether away from the intestines can satisfactory meat be produced. Only when this primitive explosive harpoon is given up altogether—superseded by a modern humane method such as electrocution—will whale meat ever really come into its own as a valuable food for man.

A whale swimming is a wonderful sight, just the poetry of majestic motion, and to see one of these beautiful creatures pouring blood and gasping along on the surface towing a three-hundred-ton catching-vessel on the end of a harpoon rope is pitiful. Anything up to an hour is the usual time taken for them to die, but time and again it takes two or three hours and three, four, or more harpoons to tear and blast the life out of one of them. In one extreme case I witnessed five hours and nine harpoons were required to kill a female blue whale in advanced pregnancy. These mother whales fight desperately for their lives and those of their babies. I am glad to say research to correct this is at long last going ahead to make the industry one of which we need no longer be ashamed.

Sealing Expedition

Last Christmas brought me to Newfoundland and a base at Twillingate Hospital in Notre Dame Bay, an institution of 130 beds serving an area of 3,000 square miles and presided over by Dr. John Olds, a graduate of Johns Hopkins. There we discussed the plight of the harp seals and what could be done. Like the whales they are helpless against uncontrolled commercial exploitation. The sealing fleet this past spring included 25 ships from Newfoundland, Norway, Canada, and the United States, and one was fitted as an emergency medical ship. Two spring months were spent in the drifting pack with the seals, our little wooden vessel

Codroy with her crew of 43 men at times lying immovably jammed and helpless in a silent world of drifting snow, or on other days with the pack grinding and battering at her sides in a heaving ocean swell. Three ships were lost—one wooden Newfoundlander, from which the crew escaped, was crushed by heavy inshore rafting pack, and two steel Norwegian ships were lost by fire and heavy seas, the crews of both missing.

The conditions of medical work differed from those on the whaling expedition. Other ships of the fleet could not come for medical help, being often frozen fast in the pack and possibly 50 miles away from us. So we treated over our radio transmitter their cases of pneumonia, damaged ribs, and exposure. A mild form of snow blindness was common in men who neglected to wear dark glasses while working in bright weather out on the ice pans. Seal finger, sometimes known as fat finger, is found occasionally in men working with adult seal pelts. Dr. Olds has probably studied this more than anyone. In appearance the lesion is not unlike a tuberculous finger; it is confined to the joint and does not spread, and there is no accompanying lymphangitis. But there is ultimate necrosis and atrophy of the bone, when amputation is the only effective treatment. Investigation by Dr. Olds has shown that in cultures from such fingers, as well as from the seal parts involved, the dominant organism is frequently a staphylococcus, but the bacteriology so far is not conclusive. I found a break in the skin was not a necessary preliminary. Very often the fingers involved are those hooked into the eye-holes in dragging the adult pelts over the ice, and possibly mechanical pressure forces the organisms of the skin through to the deeper layers. I have never seen a similar condition during any whaling operations. In the three typical cases of seal finger brought to me penicillin was injected into the joint area and streptomycin systemically. The two with which I was able to keep in touch cleared up well, but the third patient lost his life by drowning.

Unnecessary Cruelty

As in whaling, unnecessary cruelty is inflicted on the seals. The baby harp seals (whitecoats) born out on the pack ice are helpless, and are taken mainly for their fat; often, instead of killing them properly by a blow on the skull, sealers just daze them with a kick before cutting the little bodies out of the pelts. The mothers climb back on to the ice and wonder why the bleeding carcasses cannot suck from them.

Days I spent with ciné and other cameras strapped around me jumping ice pans; with the ocean swell, footing was not always safe. Many times I subsided into the icy water, when first thought had always to be for saving the cameras, and fortunately only one of three came to grief. On one occasion a harp seal being chased close by was caught between two closing pans and burst like a ripe tomato. I was more careful than ever after that. In this work, often miles away from the ship, I found drinking raw seals' blood and eating the hearts raw to be the most sustaining food of all. It is the Eskimo way.

The shooting of the adult seals later in the season is the worst of all, when any man who thinks he can shoot is allowed to mutilate these creatures. Some seals may die at once, but others shot through the neck or lungs writhe about until they may flop over the edge of the ice to die out of sight. I have seen as many as five seals from one pan disappear leaving bloody trails, while others crippled lie in pools of blood. Three hundred thousand seals are involved annually off Newfoundland alone, and international control is urgent.

Why has nothing been done in the past towards humane whaling and sealing? I find so many of the whalers, sealers, and trappers in their hearts are sick of the practices of these industries, so often glamorized in print. As medical science seems to strive towards the survival of the unfittest, and wider famine areas result from the excessive increase in human numbers, consideration for the other animals that are helping us out now is more than overdue.

Everywhere I have been apart from Arctic and Antarctic expeditions the great cry both in the cities and the remote backwoods is for all-round doctors, with a grip of medicine and surgery as a whole—men to whom the people can come knowing they will be taken care of mentally and physically and not just pushed on to someone else. There are so many vast areas where a Highlands and Islands Medical Service as we knew it in Scotland is an urgent need. But the people living bravely in the outposts of this world will for ever resent any so-called free service. There they rarely complain of their lot. They may be lonely, but the general doctor can do much where the city specialists' ideas cannot meet the requirements. These people have faith in what they are doing, and courage. Working with them you will get back again your faith in the human race.

AUREOMYCIN AND CHLOROMYCETIN

We published (November 19, p. 1171) a memorandum from the Ministry of Health on the subject of "aureomycin" and "chloromycetin." The Department of Health for Scotland has now made the following announcement:

Supplies of aureomycin and chloromycetin are now available for use in Scotland. Owing to the fact that they are scarce and costly their use can be justified only for conditions in which they are likely to be beneficial. Until supplies become more plentiful the Medical Research Council has advised that the use of the drugs should be confined to the following conditions:

Aureomycin.—Suspected cases of ornithosis; proved cases of undulant fever (brucellosis) and lymphogranuloma inguinale; severe cases of atypical pneumonia in which there is good reason to believe that the cause is a virus.

Chloromycetin.—Suspected cases of ornithosis; proved cases of undulant fever (brucellosis), lymphogranuloma inguinale, typhoid fever, paratyphoid fever (severe), salmonella septicaemia.

These categories are under constant review and may be added to from time to time in the light of current expert advice.

All available supplies are being purchased centrally and will be distributed through the following centres:

Region	Distribution Centre	Telephone No.
Northern ..	The Medical Superintendent, Raigmore Hospital, Inverness ..	Inverness 681
North-Eastern ..	Dr. J. Smith, City Hospital, Aberdeen ..	Aberdeen 2242
Eastern ..	Dr. Wm. Jamieson, King's Cross Hospital, Dundee ..	Dundee 85241
South-Eastern ..	The Chief Pharmacist, Western General Hospital, Crewe Road, Edinburgh, 4 ..	Edinburgh 30271
Western ..	The Chief Pharmacist, Central Pharmaceutical Store, 112, Ingram Street, Glasgow ..	Glasgow Central 9600