signs in the CSF in case 2. In multiple sclerosis, although eye movement abnormalities and bilateral internuclear ophthalmoplegia are frequent, a “one and a half” syndrome⁵⁻⁸ or a complete unilateral conjugate gaze paralysis¹⁰ are rare. To our knowledge, there are no previous reports of complete bilateral horizontal gaze paralysis in multiple sclerosis. Thus, these two patients seem to be unique, both in the course of the ocular motor abnormalities, in three successive stages, and with a probable demyelinating cause.

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NEUROLOGICAL STAMP

Charles Robert Richet (1850–1935)

Although he had a preference for literature the French Physiologist Charles Richet studied medicine to please his father, a distinguished surgeon. As a medical student in Paris Charles Richet became interested in hypnosis. This led to the publication of his first paper *Du Somnambulism provoqué*. His experimental work covered a large field—the physiology of nerve and muscle, respiration, body temperature regulation, liver function, and dietetics. In 1885 he found that a small centre within the brain responding to bacterial toxins and foreign proteins was responsible for the accompanying fever. In 1888 he demonstrated that animals injected with bacteria developed antibodies and in 1890 he was the first to employ serum therapy.

His most important work began in 1901. Richet joined a marine exploration with Paul Jones Portier (1866–1962), a professor of comparative physiology at the University of Paris. The exploration was led by Albert I of Monaco, a

specialist in oceanography. Their ship, *Hirondelle II*, was equipped with a laboratory. Richet and Portier found that injections of the fluid from the nematocysts of *Physalia*, the Portuguese man of war, and the tentacles of the sea anemone *Actinia*, could induce a violent reaction in dogs that had survived an earlier injection without distress. If 22 days later a second injection was given the dogs became severely ill and died 25 minutes later. Richet, with Portier, had discovered anaphylaxis, a term Richet coined in 1902 to mean the opposite of phylaxis or protection. By 1903 he had shown that any protein could produce the same effect if there were 3 to 4 weeks between injections. Richet later found that small doses given at frequent intervals could immunise the animal and that susceptibility to anaphylaxis could be transferred by transferring blood from an animal at risk to another. He also found that mixing the blood from the sensitised animal with the substance that had produced the hypersensitivity caused anaphylaxis when injected into the new animal.

The work had profound implications for the newly emerging science of immunology. In 1912 Sir Charles Sherrington wrote of Richet “To honour him is to honour the spirit of physiology in its most graceful, most eloquent and inspiring presentment....” Richet also wrote poetry, fiction, and drama. His poetry was published under the name Charles Ephyeyre. In 1913 Richet was awarded the Nobel prize for physiology or medicine.

In 1953 to commemorate the 50th anniversary of the discovery of anaphylaxis Monaco issued a set of stamps on which the *Hirondelle II* and *physalia* are shown, along with Albert I, Richet, and Portier (Stanley Gibbons 475–477, Scott 303–305).

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