

a natural disinclination to abandon views to which he had committed himself in print. Our sympathies may well go out to a man who puts up a good fight for his own work, for it means that he has had his heart in it and believes in it. I am reminded of an anecdote about Ramsay (Geikie's predecessor in office), who by a rare mistake had shown upon his map of North Wales as a lava a rock that was obviously a volcanic ash. Years after, brought face to face with the rock in the field, he opened a discussion with the remark, "Whatever else is wrong, my map cannot be." True it is that in the memoir already mentioned (*v. footnote 2*), which was edited by Geikie, full justice has been done to all who took part in the controversy. It is true also that, in a preface to the original report by Peach and Horne, Geikie confessed that he had been wrong. Yet one could have wished that in his last book, in which, near the close of his life, he relates his own personal experiences, and from which posterity will judge what manner of man he was, he had taken the opportunity of expressing some more generous appreciation of the labours of his fellow-workers.

I have spoken plainly, I hope not too plainly, of the part taken by Geikie in controversies, but there remains the great mass of his original unchallenged work, which for many years to come will keep his memory fresh as one of the greatest of geologists. Outstanding among his original researches are those upon volcanic phenomena, to which reference has already been made, but his papers on the Old Red Sandstone and on the glacial phenomena of Scotland are also classics. He was the first to give a connected account of the glacial deposits of his native country, and to advocate, in advance of the general opinion of his time, the agency of land-ice as a distributor of drift. In South Wales he utilised his experience of Lower Palæozoic and Archean rocks in correcting some generalisations by Dr. Hicks, himself a pioneer in that branch of geology, but prone to impetuous solution of difficulties by calling in many a *Deus ex machina* in the shape of faults. But I venture to think that he derived almost more pleasure from the writing of biographies of men he had known and worked with, and whose characters he could portray in his own kindly way. These books not only appeal to the non-geological reader, but also provoke the expert to explore literature he might have overlooked. Geikie himself was indefatigable in delving into the earliest records of geology. The "Founders of Geology" and "The Love of Nature among the Romans," to mention but two, could only have been written by a man who had read deeply in modern and ancient literature and had remembered wisely. In his "Reminiscences," his "Sketches," and his "A Long Life's Work" his pen was not fettered by the constant endeavour to avoid the use of technical expressions, and his easy, graceful language testifies to the value of his early training in the humanities and of his appreciative reading of good authors. With his keen sense of humour he could never be dull.

As a companion he was interesting and delightful, full of experiences, and charged with racy anecdotes which could be readily drawn from him, but were never forced on an unwilling listener. During his travels he made friends everywhere and he never lost their affection. In all parts of the world where geology is known, his loss will be felt as a personal bereavement.

The career now ended has indeed been a remarkable one. Adopting geology as his life's work, without interest and rather to the consternation of his father, he rose by his own exertions to the highest scientific posts Great Britain can offer, and received honours innumerable at home and abroad. Untiring industry directed by great sagacity was the keynote of his success.

A. STRAHAN.

MR. HARRY INNES PERKINS, I.S.O., died at Sydney on October 24, at sixty-three years of age, having retired in 1919 after a long and useful career in the Colonial Service. The son of Major-General E. N. Perkins, he was born at Simla, and educated at the King's School, Rochester. He held for a short time a post as Clerk to the Director of Public Works in Trinidad, and at the age of twenty obtained an appointment on the survey staff in British Guiana, where he ultimately became Acting Crown Surveyor. In 1884-1885 he took part in an expedition to Mount Roraima, and prepared a map of the mountain for the Royal Geographical Society. In 1895 he was appointed Acting Commissioner of Mines. Early in that year his "Notes on British Guiana and its Gold Industry" was published. In these notes, Perkins prophesied that valuable diamond deposits would one day be discovered in the Mazaruni, which has since become an important diamond-producing area. While Acting Commissioner of Mines, he served as one of the British Commissioners appointed for the demarcation of the British boundary between British Guiana and Venezuela, and in 1901 wrote a report on the geological features of the district traversed by the Commission. In some of his geological work he was associated with Sir J. B. Harrison, whose "Geology of the Goldfields of British Guiana," published in 1908, included contributions by Perkins. He received the I.S.O. in 1904, and in the following year was appointed Surveyor General of British Honduras, where he later became a member of the Executive and of the Legislative Council.

WE regret to announce that Gerard Kalshoven Gude, the authority on tropical land mollusca, died on November 8. Born in 1858, he was of Dutch parentage. Acting as secretary to Messrs. Veitch of Chelsea in earlier years, he had for several decades devoted himself to the study of land mollusca, contributing a volume on that subject to the "Fauna of British India." Mr. Gude also studied and arranged the important series of Tertiary land and freshwater shells of Europe for the Geological Department of the British Museum. A constant visitor to the Museum, his information was freely at the service of his colleagues, by whom he was greatly esteemed. He had been secretary and president of the Malacological Society of London.

WE regret to announce the following deaths:

Sir Maurice Fitzmaurice, C.M.G., F.R.S., president in 1916-17 of the Institution of Civil Engineers, and formerly a member of the advisory council of the Science Museum, on November 17, aged sixty-three.

Dr. Gustav Jaumann, professor of physics in the German Technical High-School in Brunn, and a foreign associate of the Vienna Academy of Sciences.