

peacefully away on the 22nd of August, 1895, in his seventy-fourth year.

Peter Denny was an exceptional man; utterly without vanity or selfishness, he lived a life of activity and usefulness. Successful as he was in all he undertook, it is not known that he had a single enemy. Alike to the humblest of his workmen as to the most distinguished of his friends, he was ever gentle, thoughtful, generous and sincere. Throughout the whole of his business career he devoted his energies as much to the amelioration of the circumstances of those in his employment as to the building up of his own fortune. In providing wholesome and commodious dwellings for his workmen, and affording facilities for purchasing them, he made of his employees one large family, each member of which was interested in the welfare of the town and the prosperity of the business which gave them employment. Time after time did Peter Denny find by the conduct of the workmen, in periods of labour unrest, that the troubles which afflicted shipbuilders elsewhere were not brought into Dumbarton. The awards scheme for the encouragement of inventive skill on the part of his workmen; the generous contributions made by his firm to an accident fund chiefly controlled by the men themselves; the bursaries and medals given by him to encourage education in the burgh schools; and a multitude of other schemes, whereby he allowed his generosity to flow into public channels, all served to satisfy the people he employed that he was no mere exploiter of labour, but a sympathetic leader of industry and a man among the men who worked with him.

In addition to serving as President of the Institute of Marine Engineers, he was a Vice-President of the Institution of Naval Architects and a Member of the Institution of Engineers and Shipbuilders in Scotland.

He was elected a Member of this Institution on the 10th of April, 1877.

RICHARD ELIHU DICKINSON, born in Liverpool on the 16th of April, 1849, began his engineering career as an apprentice in the works of Messrs. Torres, Quiggan and Co., shipbuilders, of that city. He then entered the service of Messrs. Alexander Stephens and Co., of Glasgow, in whose drawing-office he remained for some time. In 1871 he proceeded to Bolivia, where he was engaged on the construction of a mole and piers at Tocopilla, and of a railway to that port from some copper mines in

the interior. On returning to England Mr. Dickinson commenced business on his own account at the Cleveland Engine Works, Birkenhead, where he constructed cranes and other machinery. About that time he spent several months in Portugal in erecting machinery for some mines in which he was interested.

In 1879 Mr. Dickinson closed the Cleveland Engine Works and accepted the post of manager to the Savile Street Foundry and Engineering Company, of Sheffield. At those works there were constructed, under his supervision, compound-engines and pumps, as well as some steam-tramcars, for which absence of smoke and small fuel-consumption were claimed. In 1885 Mr. Dickinson was appointed manager of the Vulcan Steel and Iron Works at Barrow-in-Furness. Two years later he removed to Jarrow-on-Tyne as manager of the Rolling Mills and Steel Works belonging to Palmer's Shipbuilding and Iron Company. There he remained until 1891, when he was appointed managing director to the Bowling Iron Company, of Bradford. During the four years Mr. Dickinson was at Jarrow he was responsible for the laying out of new steel works for Palmer's Shipbuilding and Iron Company. At the Bowling Iron Company's Works he installed a new hydraulic press; and erected at one of their largest collieries a new engine-house, air-compressors and coal-cutting machines, coal-washing plant and plant for the manufacture of steel casks welded by electricity.

Mr. Dickinson died at Bradford, after a brief illness, on the 12th May, 1895, only six weeks after his election as a Member of the Institution, which took place on the 2nd April. He was also connected with the Institution of Mechanical Engineers and with the Iron and Steel Institute.

ALEXANDER FRASER, born in London on the 15th of June, 1823, was articled—after being privately educated—to the late Mr. Henry Austin, then Resident Engineer on the Blackwall Railway, but better known, perhaps, as the brother-in-law of Charles Dickens. In the year 1845 he entered the service of the Southwark and Vauxhall Water Company as Assistant Engineer under the late Mr. Joseph Quick.¹ By the Metropolis Water Act of 1852 all the Companies drawing their supplies from the Thames were required to move the point of intake above the tidal influence at Teddington. Mr. Fraser, therefore, was engaged

¹ Minutes of Proceedings Inst. C.E., vol. cxvii. p. 383.