

Dudeney, Henry Ernest

(1857–1930)

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Dudeney, Henry Ernest (1857–1930), compiler of mathematical puzzles, was born in Mayfield, Sussex, on 10 April 1857, the third child and second son in the family of three sons and seven daughters of Gilbert Dudeney (1825–1877), a schoolmaster in a Methodist school at Mayfield, and his wife, Lucy Ann, *née* Rich (1831/2–1882). Gilbert Dudeney's uncle, John Dudeney (1782–1852), began his working life as a shepherd, but taught himself mathematics and became a printer and schoolmaster. In 1860 Dudeney's parents moved to Burnham-on-Sea, Somerset, where they ran a school; they subsequently kept a school at North Curry, near Taunton, where Dudeney was a pupil. By the age of eight he had become interested in magic tricks, conjuring, and puzzles, and devised puzzles for the amusement of his brothers and sisters. He won five shillings from a boys' paper for a puzzle submitted to them when aged nine. He taught himself mathematics, showing a particular interest in geometry.

After his father's death Dudeney's mother ran a school in Harlington, Middlesex, where Dudeney lived while working as a ship broker's clerk. He found the work dull, and in his spare time wrote short stories and articles for periodicals, including *Tit-Bits*, and joined the Authors' Club (at the suggestion of Arthur Conan Doyle). There he met an aspiring young author, Alice Louisa Whiffin (1864–1945), whom he married on 3 November 1884. They lived in rooms in Bedford Row, Gray's Inn, London, where their first child, Phyllis Mary, was born in September 1887, but died in infancy. Although the child's birth certificate described Henry as a 'journalist', he was not supporting himself completely with writing until about four years later; in 1891 he was employed as a secretary to a civil engineer. A second child, Margery Janet, was born in May 1890. After living for two years at Billingshurst, Sussex, they moved in 1897 to Littlewick Meadow, Horsell, Surrey.

By 1895 Dudeney was earning his living entirely from supplying puzzles to a large number of magazines and periodicals, and was the first person to support himself completely in this way. He produced puzzles and articles for *Blighty*, *The Captain*, *Cassell's Magazine*, *Girls' Realm*, and two more prestigious periodicals, the *Daily Mail* and the *Weekly Dispatch*, where he wrote under the pseudonym Sphinx. His puzzle column 'Perplexities' appeared regularly for twenty years in *The Strand*, whose proprietor, George Newnes, became a friend.

Dudeney's interest in chess led to a collaboration with Sam Loyd in America. Loyd had a regular chess column in the *New York Times* for the American Chess Association. On one occasion a prize was offered for any solution in fewer than fifty-three moves. Loyd was confident that his fifty-three-move solution could not be bettered, but Dudeney produced a fifty-move solution which won the prize. They agreed to exchange puzzle ideas, but this turned into a one-sided affair because Loyd's mathematical knowledge was limited and he never acknowledged his source of material. A particular example which caused Dudeney great anger involved a dissection puzzle in which a piece of wood shaped like a mitre was to be cut into five pieces which could be reassembled as a square. Loyd changed the dimensions of the mitre when passing the puzzle off as his own in the New York press, thus unwittingly rendering it impossible to solve because he had not understood the geometry involved. The partnership was dissolved in acrimony.

Dudeney's most famous dissection puzzle required a triangle to be converted to a square by cutting it into four pieces. The beauty of his solution was that the four pieces could be hinged to fold in one direction into the square and in the other into the triangle. He demonstrated this to the Royal Society on 17 May 1905.

While continuing his massive output of new puzzles, which earned him the title of 'the Puzzle King', Dudeney began arranging his previously published puzzles into volumes. His first book, *The Canterbury Puzzles* (1907), based around a group of pilgrims setting puzzles for each other, was followed by *Amusements in Mathematics* (1917), which was frequently reprinted and remained in print in the early twenty-first century. He also devised word puzzles and put together a selection of these in *The World's Best Word Puzzles* (1925), including variations on the crossword, a recent import from the USA. Another collection, *Modern Puzzles*, appeared in 1926. Some of his most notable puzzles were discussed by the mathematician Rouse Ball in *Mathematical Recreations and Essays* (1922). He maintained an interest in the theory of numbers and achieved various prodigious feats of calculation.

In 1911 the Dudeney's marriage foundered as a result of Alice Dudeney's relationship with the artist David Paul Hardy. Littlewick Meadow was sold, and Alice—who was by then a successful novelist—and their daughter moved to Angmering, while Dudeney moved to London. A reconciliation took place and in 1921 they purchased Castle Precincts House, Lewes, where they settled. Dudeney's health began to deteriorate in 1929 but he still continued his puzzle columns without a break. Brought up a Methodist, he was drawn to high Anglicanism, and became a church organist. He was described as 'tall and handsome, with brown hair and brown eyes, a slightly aquiline nose, and, in his later years, a grey moustache and short chin whiskers' (Gardner, ix). He died at Castle Precincts House, Lewes, on 24 April 1930, and was buried in Lewes cemetery. Alice Dudeney contributed a foreword to a collection of his *Puzzles and Curious Problems* (1931), revised by James Travers, headmaster of Peterborough College, Harrow. Later the American puzzlist Martin Gardner edited the contents of Dudeney's *Modern Puzzles* and *Puzzles and Curious Problems* as *536 Puzzles and Curious Problems* (1967).

Sources

- The Times* (26 April 1930)
- A. Dudeney, preface, in H. E. Dudeney, *Puzzles and curious problems* (1931)
- M. Gardner, introd., *536 puzzles and curious problems* (1967)
- A. Newing, 'Henry Ernest Dudeney: Britain's greatest puzzlist', *The lighter side of mathematics*, ed. R. K. Guy and R. E. Woodrow (1994)
- Mrs H. Dudeney, *A Lewes diary, 1916–1944*, ed. D. Crook (1998)
- census returns, 1861, 1871, 1881, 1911
- b. cert.

Likenesses

- photograph, 1931, repro. in Dudeney, *Puzzles* (1931), frontispiece
- photograph, repro. in *The Captain* (Dec 1899), 314
- photograph, repro. in www.daviddarling.info/encyclopedia/D/Dudeney.html

Wealth at Death

£5280 12s. 9d.: probate, 11 June 1930, *CGPLA Eng. & Wales*