

CHARLES DARWIN AND STRZELECKI'S BOOK "PHYSICAL DESCRIPTION OF NEW SOUTH WALES AND VAN DIEMEN'S LAND"

By LECH PASZKOWSKI

Readers of the *Australian Zoologist* do not need any introduction to Charles Darwin. His fine, honest, observing and modest mind of true scientific greatness has influenced not only the Natural Sciences but also human thought in general. One could expect that Darwin's biographers would have combed and recombed all the libraries of the world and to have published all his precious manuscripts. But even so, from time to time, some material is still found.

An unknown letter by Charles Darwin was found in 1957, and what is more interesting, its contents refer to the book about Australia, *Physical Description of New South Wales and Van Diemen's Land* by Paul Edmund de Strzelecki.

The letter was found at the Yale University Library during a search made at the request of Mr. Wacław Slabczyński, a Librarian at the National Library of Warsaw, and an eminent biographer of Sir Paul Strzelecki. Slabczyński devoted a decade to his well-documented biography* recording material and documents held in no less than two hundred libraries and institutions from all over the world. He rightly suspected that there had been some personal contacts between these two scientists. Firstly, Strzelecki's book was illustrated with some fossils borrowed from Darwin's collection (four specimens) and secondly, Darwin, in his *Journal of Researches into Natural History and Geology of the Countries visited during the Voyage of H.M.S. Beagle round the World . . .*, London, 1870, quoted Strzelecki (p. 448).

The Letter by Charles Darwin

Darwin's letter consisting of three octavo pages was written at Down, Bromley, Kent in the middle of 1845, and was in the form of an acknowledgement for a copy of Strzelecki's book. It reads as follows:

Down Bromley Kent
Sunday

My dear Sir

I received a few days since your kind & valuable present. I am exceedingly obliged to you for it, though I feel that I have no claim on so magnificent a present.

I congratulate you on having completed a work which must have cost you so much labour & I am astonished at the number of deep subjects which you discuss. I must be permitted to express my sorrow that there are not far more copious extracts from 'M.S. Journal'. I hope some day to see it fully published.—You speak of your unidiomatic English; I heartily wish that one quarter of our English authors could think & write in language one half as spirited yet so simple. Once again allow me to thank you very sincerely & believe me dear Sir

Yours very faithfully

C. Darwin

You were so good when I last saw you as to say that you would take trouble of informing me (as a guide for myself) what you paid for the engraving of the shells alone. The plates appear to me admirable.

* Paweł Edmund Strzelecki. *Podróże—Odkrycia—Prace* (Paul Edmund Strzelecki. Voyages—Explorations—Works), Warsaw, 1957.

In the first instance Darwin referred to "the number of deep subjects" which he found in the book. What, then, are these "deep subjects" which "astonished" the great scientist. Certainly the climbing of Mt. Kosciusko was not the issue impressing Darwin, but perhaps it was Strzelecki's philosophical reflections on humanity, the beauty of nature, the conquest of free people, slavery, change of nationality, difficulty in learning English, the lot of Aborigines, the behaviour of so-called savages, projects for the improvement of Australian agriculture and the irrigation of New South Wales.

"Mon Journal" and Strzelecki's Literary Style

Many of these reflections were given in the footnotes to Strzelecki's book and taken from his "Mon Journal" written in French. Darwin expressed his regret that only a few pages of the "Journal" were included and hoped that this work would be published one day.

It seems most probable that this precious "Journal" is still held in the archives of the London Appeals Court, as it was consulted by this Court in 1877, four years after Strzelecki's death, when his relatives in Poland attempted to probe the validity of his last will. As it is not the custom of the British Courts to destroy papers and documents, there is a fair chance that "Mon Journal" will be found one day and no doubt it will cause a major sensation among Australian scientists and historians.

The next important fact in the letter is Darwin's remarkable praise for Strzelecki's literary style. As Hume Dow in his excellent Selection of English Prose, *Science Speaks* (Cheshire, Melbourne, 1966, 3rd Edition), pointed out to the students of English, "Darwin had a feeling for words and exercised care in the way he used them. However, his comments on writing are rare" (p. 87).

From the postscript we can perceive that the two scientists met from time to time and assisted each other in the field of Natural History.

The Chapters on Botany and Zoology

The chapter on zoology in Strzelecki's book consists of 73 pages and starts with the following words: "To the vegetation to which the physiognomy or general aspect of Terra Australis owes its main features, must now be added, in order to complete the delineation of that physiognomy, a notice of the Zoology of the country. Variety, beauty, and elegance, in forms and colours, and in their combinations, characterise some of the zoological classes; while striking and wonderful peculiarities of external and internal organisation distinguish others. All the classes may be said to offer, in their physiological structure, subjects for most interesting and instructive study."

The chapter is divided into two sections: "Fossil Fauna" (53 pages) and "Recent Fauna" (20 pages). Beside his own introduction, general notes and few descriptions Strzelecki was helped by two scientists, John Morrison and William Lonsdale, who examined the collection which he brought from Australia. Morrison, apart from describing all Fossil Flora, gave an account of the fossil *Mollusca* found in Strzelecki's collection, while Lonsdale covered a good deal of Fossil Fauna including *Polyparia*. Lonsdale also stated (*Physical Description*, p. 262) that "The examination of Strzelecki's collection of fossil *Polyparia*, from Van Diemen's Land, has extended the knowledge of the corals, for which the name of *Stenopora* was proposed in the Appendix to Mr. Darwin's work on Volcanic Islands . . ." and "It is not to allude to the occurrence of a *Favosites* and an *Amplexus*, in Strzelecki's collection without soliciting attention to the additional evidence they afford in support of previous inferences respecting the age of the deposits in which fossil polyparia were found by Mr. C. Darwin; or to the curious increase of agreement thus presented the *Palaeozoic Fauna* of Europe and extinct *Faunae* of New South Wales and Van Diemen's Land" (*ibid.*, p. 268).

In this chapter there are also quotations from J. Sowerby and R. Owen. While the "Fossil Fauna" was a collective work by Lonsdale, Morris and Strzelecki, the "Recent Fauna" was mainly provided by John Gould who prepared the list of Australian mammals and birds.

It is perhaps worth mentioning, that one of the very first findings by Strzelecki, in September, 1839, was a fossil tooth of a mastodon. Sir Richard Owen published an account of this in the "Description of a Fossil Molar Tooth of a Mastodon discovered by Count Strzelecki in Australia" in the *Annals and Magazine of Natural History*, October, 1844, vol. XIV, pp. 268-271. Strzelecki actually bought the tooth from a native while exploring ossiferous caves in Wellington Valley. "The native stated that the fossil was taken out of a cave further in the interior than those of Wellington, and which Count Strzelecki was deterred from exploring by the hostility of the tribe then in possession of the district." The incident was also mentioned by Strzelecki himself in the *Physical Description*, p. 312.

While in Australia he also collected a lot of other curiosities and objects of natural history, which he sold to the Museums of Europe. Strzelecki stated that he spent about £5,000 on exploration in Australia, but his whole income during those four years amounted to no more than £1,200. Therefore, his earnings from the sale of the Australian natural objects were really astounding.

The Praise of a Geologist

As his interest was mainly directed to Australian mineralogy, geology and agriculture, the chapters on these subjects seem to be the most valuable, especially for palaeontologists. Dr. A. N. Lewis, an eminent Australian geologist, evaluated the work of Strzelecki in these words:

"Strzelecki was the first writer to publish a systematic account of any scientific studies in Tasmania. The records of his work are practically entirely contained in his *Physical Description of New South Wales and Van Diemen's Land*. This book is a classic and held the field as the important work on geography and geology of Tasmania until superseded by R. M. Johnston's *Geology* published in 1888. Now, 100 years later, it is appropriate for us to pause to consider Strzelecki's real contribution to science as far as he dealt with Tasmania. This contribution, even considering the virgin field in which he worked, was outstanding. My personal tribute to Strzelecki is that 100 years after he wrote, I make constant reference to his book and I have found help thereby which has materially aided my work in the same field.

"The descriptive paragraphs opening Chapter III are as good to-day as they were when written and form an admirably concise statement of the physical description of the country which has never been bettered in published literature.

"It is in the department of palaeontology that Strzelecki's work had assumed prime importance. I have no direct evidence that he possessed any particular knowledge of this branch. He handed his collections to Lonsdale and Morris for description. The results are printed in the *Physical Description* and form the real basis of Australian Palaeontology, unimpaired by the passage of time. Strzelecki, however, did the collecting. The collection was remarkably complete and shews a wide grip of the subject to enable such a comprehensive and well located group of representative fossils to be got together. It shows a painstaking labour for which Australian geology will always be grateful.

"The other chapters on Botany and Zoology, the Aborigines, Agriculture and Soils are now mainly interesting as historical records but shew that Strzelecki was a keen observer and, above all, a writer remarkable for the brevity and lucidity of his descriptions. The book is not much read now but still raises a feeling of amazement in the minds of those students who spare time to dip into it. A scientist's claim to fame rests not so much on the final truth he discovered as on his contribution to the distance he carries their knowledge towards the final goal. According to this test Strzelecki still stands first amongst Tasmanian scientific writers." (Quotations from "Strzelecki in Tasmania" by A. N. Lewis, *Royal Australian Historical Society Journal and Proceedings*, vol. XXVI, part 1, Sydney 1940, pp. 76-78).

The Reviews

The *Physical Description* was published in May, 1845, and almost immediately was warmly received by many reviewers: *Journal of the Royal Geographical Society*, 1845, vol. XV, pp. LVII-LVIII; *The Atheneum*, 19.7.1845; *The Times*, 8.10.1845; *Sydney M. Herald*, 20.1.1846; *Sydney M. Herald*, 28.1.1846; *Quarterly Review*, Feb., 1846; *Launceston Examiner*, 7.2.1846; *Sydney M. Herald*, 16.3.1846; *Port Phillip Herald*, 17.3.1846. The list of reviews was not confined to England and Australia, as the *Berlinische Nachrichten* of 2.5.1846 and even *Calcutta Englishman* discussed the book.

Without doubt the reading of *Physical Description* induced an American, James H. Perkins, to express the following enthusiastic opinion: "Strzelecki . . . has done more to make New South Wales and Tasmania scientifically intelligible than all other inquirers" (*North American Review*, 1850, vol. LXX, pp. 196-197 and *The Memoir and Writings*, Boston 1851, vol. II, p. 499).

However, there was not a single review of Strzelecki's book in Poland. At the time the Poles, occupied as they were with the main task of national survival were not at all interested in Strzelecki. They simply did not care about the fact that one more able man had left the country.

Perhaps the best tribute to the book is, that after more than a century two new editions of *Physical Description* have appeared in recent years. In Poland the Scientific Publishers produced a fine translation by Dr. J. Flis (*Nowa Poludniowa Walia*, Warsaw, 1958), while in Australia a splendid facsimile edition was published in 1967, by the Public Libraries Board of South Australia, and is available now for the modest price of \$6.

Scientific Names in Honour of Sir Paul Strzelecki

The English writers, F. Boase (*Modern English Biography*, London, 1901, vol. 3, p. 806) and Thomas Seccombe (*Dictionary of National Biography*, London, 1909, vol. 19, p. 70), stated that several species among Australian fauna and flora were named after Sir Paul Strzelecki.

Mr. J. H. Willis, Assistant Government Botanist of Melbourne informed me that we have no accepted plant name commemorating Strzelecki, although, in 1857, Ferdinand von Mueller did name a new genus, *Strzeleckya*, in honour of Sir Paul, but this has long since been abandoned, as a synonym for *Flindersia*, genus of the "native teak", "cudgerie" and "crow's ash". Later Mueller described the species *Flindersia strzeleckiana*, which too was long ago superseded by the name *F. maculosa*, "Leopard tree".

I was not able to trace any names referring to living fauna, but there are at least three names of fossils: *Pleurotomaria strzeleckiana* (Gastropod), named by John Morris in 1845; *Brachymetopus strzeleckii* (Trilobite), Prof. Frederick McCoy in 1847 and *Spirifer strzeleckii* (Brachiopod), named by the Belgian scientist L. G. de Koninck in 1877. Mr. F. Hadzel, a geologist of Canberra, informed me also that another three trilobites were given the adjective *strzeleckiensis* by the Polish palaeontologist Zygmunt Grzybowski.

It would seem that the geographers were much more generous to Sir Paul, as, in his biography, Mr. Slabczyński lists fourteen official names of geographical features named after Strzelecki (one in Canada and thirteen in Australia). I have found another four, not to mention several street names: however not all of them are official.

Little Boys' Dreams

It is interesting to note, in passing that, as little boys, both Darwin and Strzelecki liked to draw the attention of their elders to their actions. This "showing off" was quite normal and a healthy indication of the future intelligence and individuality of both boys. While Darwin was stealing apples, or pretending to do so, and running away fast in order to arouse the admiration of adults, Strzelecki charmed his family and servants with very talented declamation and composition of speeches and sermons. In both cases the boys made a success of their lives.

Darwin's Remarks

In 1958, W. Slabczyński traced the original copy of *Physical Description* presented by Strzelecki to Darwin. At present, the book is held in the Library of the Botany School, Cambridge University. It bears Strzelecki's autographed dedication: "To Charles Darwin Esqr M.A. from the author 19th of May." and the ex-libris of Sir Francis Darwin, who received his father's book collection. Subsequently Sir Francis offered the copy, along with many other of his father's books, to the University of Cambridge.

At the end of the afore-mentioned copy there are inscriptions in pencil, which, according to the opinion of Mr. Alexander Watt, the Librarian at the Botany School, Cambridge, were most probably made by Charles Darwin himself. The inscriptions are as follow:

"So that animals cannot have pressed [*sic. passed?*] from one island to another, recently"

"143—Van Diemen's long an island for coast elevated 100 ft"

"254—Proteaceous leaf *Bulinus* & *Helix*"

"296—Van Diemen Carboniferous Series—Morris (?)"

"p. 302 *Diprotodon* Marsupial. Pachyderm Fossil to 312 (not important)"

"347—Sterility of one race of mankind with another"

"p. 352 Number of natives Van Diemens Land."

Slabczyński twice published photographs of Darwin's letter: the first time being in the Polish scientific periodical *Kosmos A* (Warsaw), vol. VII, 1958, part 4, pp. 379-383 and the second time in a book under his editorship *P. E. Strzelecki—Pisma wybrane* (Selected Writings of P. E. Strzelecki), Warsaw 1960, Scientific Publishers. The latter volume was reviewed, mentioning Darwin's letter, in *The Australian Geographer* (March, 1962) and also in the English and German periodicals: *The Times Literary Supplement* (29.12.1961), *The Geographical Journal* (London, vol. CXXVIII, part 4, pp. 557-558) and *Petermanns Geographische Mitteilungen*, 1962, part 2, p. 119.

The Contrasting Opinions

In spite of his many services to Australia Sir Paul Strzelecki has not always received fair treatment from Australian historians and writers. For example, in contrast to Darwin's unreserved praise of Strzelecki's literary style and ability an Australian lady novelist, when referring to the *Physical Description*, wrote in her "Story" of Paul Edmond (*sic*) Strzelecki that, "It is grammatically correct; it is in the Victorian manner, and probably appreciated by its first readers; but, all the same, it is the heavy writing of a not very imaginative mind, using conventional images without freshness. It makes the reader wonder about the praise given his childish compositions; it is in a foreign language, but it has much in common with his French letters, which are also extremely heavy, and, even making allowance for language, it is hard to understand the praise some critics have given to his style."

The reason for such contrasting opinions could be attributed to the lack of a satisfactory English biography of Sir Paul of a high scholarly standard along the lines of Joselyn Baines' *Joseph Conrad: A Critical Biography* (London, 1959). But without doubt, it will be written one day.

It is worth recalling, that the Australian writer, who, by remarkable intuition first associated Darwin with Strzelecki, was John Reynolds of Hobart. Many years before the previously discussed letter of Darwin was found at the Yale University, Reynolds published in the *Illustrated Tasmanian Mail* of 12th June, 1929, a fine and penetrating article in which he stated: "Strzelecki belongs to that great band of men which made the Nineteenth Century so remarkable. With Humboldt, Franklin, Darwin, and Wallace, he must be regarded as one of the leading scientific explorers of his time."

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