## NOTES ON THE EXTINCT CHELONIAN MEIOLANIA, WITH A RECORD OF A NEW OCCURRENCE.

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(Plates xxx-xl, and one map.)

## INTRODUCTION.

The somewhat complicated history of the genus *Meiolania* has been skilfully disentangled by Dr. Smith Woodward<sup>1</sup>, so that a brief statement will suffice to bring our information up to date. It was originally discovered in the Pleistocene of the Darling Downs, Queensland, and described by Owen<sup>2</sup>; this species was subsequently called *Meiolania oweni* by Smith Woodward<sup>3</sup>. A second form from Lord Howe Island was described by Owen as *Meiolania platyceps*<sup>4</sup>. In 1889 R. Etheridge, Junior, recorded fragments consisting of a small horn core, part of a caudal vertebra, and segments of a tail sheath from the Canadian Lead, Gulgong, N.S. Wales (? Pliocene)<sup>5</sup>, and again in 1893 the same author described as meiolanian two horn cores found in the superficial (Pleistocene) deposits of Coolah, N.S. Wales<sup>6</sup>

In 1898-99 the bony ring of a tail sheath, the skull and mandible, portion of a carapace, and other fragments of a similar animal were found in the Chubut beds of Patagonia, which are probably of Eocene age. These were described by Smith Woodward as Miolania argentina, and the author discussed the significance of its distribution, suggesting that, as Meiolania was undoubtedly a terrestrial or marsh chelonian, its occurrence in Patagonia and the Australian region offers support to the hypothesis of a former land connection between South America and Australia by way of the Antarctic. He considered it just possible, however, that "if the direct ancestors of Miolania were known, this remarkable chelonian would prove to have originated not on any old Antarctic continent, but in some other region of the globe, from which scattered survivors wandered into the lands now named South America and Australia, respectively."

<sup>&</sup>lt;sup>1</sup> Smith Woodward—Ann. Mag. Nat. Hist., (6), i, 1888, pp. 85-89.

<sup>&</sup>lt;sup>2</sup> Owen—Phil. Trans., clxxi, 1880 (1881), pp. 1037-1050.

<sup>&</sup>lt;sup>3</sup> Smith Woodward—Loc. cit., p. 89.

<sup>4</sup> Owen—Phil. Trans., clxxvii, 1886 (1887), pp. 471-480.

<sup>&</sup>lt;sup>5</sup> Etheridge Jr.—Rec. Geol. Surv. N.S. Wales, i, 1889, pp. 149-152.

<sup>&</sup>lt;sup>6</sup> Etheridge Jr.—Rec. Austr. Museum, ii, 1893, pp. 39-41.

<sup>&</sup>lt;sup>7</sup> Smith Woodward—Proc. Zool. Soc., 1901, i, pp. 170-176, 182-183.