

have been most troubled in the earthquake of June 11, 1909: M. **Jullien**.—The oxydases of the waters of Chaldette (Lozère): F. **Garrigou**.

NEW SOUTH WALES.

**Linnean Society**, April 28.—Mr. C. Hedley, president, in the chair.—The geology and petrology of the Canoblas, N.S.W.: C. A. **Süssmlich** and Dr. H. I. **Jensen**. The Canoblas are a group of extinct volcanoes in the vicinity of Orange, N.S.W. The western tableland here has an elevation of about 3000 feet. The surface of the tableland is a peneplain, above which rise residuals of a still older plain. This peneplain was cut out of a series of folded Devonian and Silurian rocks, and has since been elevated to its present altitude (3000 feet). The Canoblas Mountains proper consist of lavas and tuffs, deposited upon the peneplain.—Observations on the development of the marsupial skull: Prof. R. **Broom**. A fairly complete series of the diprotodont *Trichosurus vulpecula*, and an interesting early stage of the polyprotodont *Dasyurus viverrinus*, have been studied.—Notes on the synonymy and distribution of certain species of Australian Coleoptera, with descriptions of new species of Tenebrionidæ: H. J. **Carter**. The paper comprises notes upon the synonymy and distribution of a number of species referable to the three families Buprestidæ, Tenebrionidæ, and Cerambycidæ, accumulated during a recent visit to Europe, and especially to the museums in Brussels, Paris, London, and Oxford, together with the descriptions of twenty-one species of Tenebrionidæ proposed as new.

CALCUTTA.

**Asiatic Society of Bengal**, May 5.—A *Goniomya* from the Cretaceous rocks of southern India: H. C. **Dae-Gupta**.—*Coptis*: I. H. **Burkill**. The author endeavours to determine the source of the roots of *Coptis* sold in India. Three kinds are sold, one, as is well known, coming from the Mishmi hills, and being derived from *Coptis Tecta*, Wall, the other two imported over-seas, and possibly being, respectively, roots of *Coptis Tecta*, var. *chinensis*, Fine and Gagnep, and of *Coptis anemoneifolia*, Sieb. and Zucc. Plants of *Coptis Tecta* in cultivation at the Lloyd Botanic Garden, Darjeeling, have been studied, and figures drawn from them.—Morphological and physiological differences between *Marsilea* left on dry land and that growing in water: Nibaran Chandra **Bhattacharjee**. *Marsilea quadrifolia* does not fruit when growing in water, but only on dried earth.—Notes on the history of the district of Hughli before the Mohammedan period: Nundo Lal **Dey**.—The drug *astukhudus*, nowadays *Lavandula dentata*, and not *Lavandula Stoechas*: I. H. **Burkill**. It is probable that the importation of *Lavandula dentata* into India began with the Portuguese trade. Before that, *Lavandula Stoechas* from Asia Minor served as the drug *astukhudus* from the time when the Mohammedans introduced it.—The Manikyala tope: H. **Beveridge**.—First notes on *Cymbopogon Martini*, Stapf: I. H. **Burkill**. The two varieties, *Motia* and *Sofia*, are to be distinguished from one another by the absence or presence of the chemical body carvon, by the angle at which the leaves arise, and by different preferences in the matter of climate.

CAPE TOWN.

**Royal Society of South Africa**, May 19.—Dr. L. Crawford in the chair.—The possible existence at Kimberley of oscillations of level having a lunar period: Dr. J. R. **Sutton**. The outstanding seismic feature of Kimberley is the diurnal variation of level whereby the crust of the earth rises and falls once a day under the influence of some solar action as yet uninterpreted. This matter was discussed in a paper read before the Royal Society of South Africa last July. The present discussion is concerned more with variations of level depending upon the gravitational influence of the moon. The observations do not cover a sufficiently extended period to admit of an exhaustive analysis, but, so far as they go, they imply perhaps that when the moon is south of the equator its attractive force causes the whole of the enormous protuberant mass of the earth's crust forming South Africa to oscillate periodically east and west during the course of the lunar day. This oscillation tends to mask whatever true lunar tide there may be in the solid earth. Only

when the moon is nearest to the earth does the pendulum move in such a manner as to suggest that there is such a tide.—The rainfall of South Africa. The possibility of prediction over the south-west: A. G. **Howard**. For this investigation, which extended over five complete years, three stations were selected, so as to secure a triangle of observations, and at each the rise or fall of the barometer in twenty-four hours was noted, together with the direction of the wind at L'Agulhas. From a consideration of the various conditions, which fell under twenty-six heads, and were worked out daily during five complete years, it was found possible to construct a table for prediction purposes. This was applied to the rainfall for the year 1908, and the element of error under each condition of barometer was:—(1) when the pressure was decreasing generally, 5.23 per cent., and (2) when the pressure was increasing generally, about 11 per cent., proving the argument that it is possible to predict rainfall over the district from the date suggested.

DIARY OF SOCIETIES.

MONDAY, JULY 5.  
ROYAL GEOGRAPHICAL SOCIETY, at 8.30.—Captain Tilho's Explorations in the Lake Chad Region: Lieut. Mercadier.  
WEDNESDAY, JULY 7.  
BRITISH ASTRONOMICAL ASSOCIATION, at 5.

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