

has carried out the programme of his journey, though he found the summit of the Namuli Hills inaccessible, and in addition traversed the whole region a second time, striking into the interior from Kwilimane, and emerging at Ibo on the Mozambique coast (*Proc. Roy. geogr. soc.*, June).

America.

Under the auspices of the Italian geographical society, Count Ermanno Stradelli from Piacenza, who has travelled for many years on the Amazon and its tributaries, is going to explore the head waters of the Orinoco, which were visited in the beginning of this year by Chaffanjon (*Boll. Soc. geogr. Ital.*, May).

Prof. Dr. R. A. Philippi writes to *Petermann's Mittheilungen* that the Chilean government has sent out two expeditions to survey the boundary between Chili and the Argentine Republic from Rio Palena to the pass of Villarica. It appears that the Cordillera is situated in Chilean territory, while the watershed between the Atlantic and Pacific oceans, which forms the boundary, lies east of the mountains, about 1,600 feet high. One of the expeditions will cross the Ranco pass east of Valdivia, and return by the pass of Villarica. The time allowed to the expedition is from two to two and a half months.

HEALTH MATTERS.

YELLOW-FEVER AT KEY WEST. — The existence of yellow-fever at Key West is officially recognized and declared epidemic by its board of health. In a proclamation issued by that body, it is stated that an effort is being made to conceal cases, and to resist the health officers. The board announces that a bulletin will each day at noon give the status of the epidemic, naming new cases, deaths, and recoveries. Reports are required from every householder of any sickness which may occur in his family. Unacclimated persons are required to remove from the infected district, and are advised to leave the island. Proprietors of saloons are especially called upon to refuse drinks to those inclined to abuse the use of the same, since such persons taken with fever are nearly hopeless cases, and their deaths add to the mortality list, and tend to increase mortality among others.

PLEURO-PNEUMONIA IN WESTCHESTER. — There has been an extensive outbreak of contagious pleuro-pneumonia among the cattle near Golden's Bridge, Westchester county, N.Y. In one of the affected herds there are two hundred and sixty head of cattle. In addition to this, several smaller herds are affected. The cattle have been appraised under the direction of the U. S. bureau

of animal industry, of which Dr. D. E. Salmon is chief, and are being slaughtered. It is the hope of Dr. Salmon to eradicate the disease from the county.

NOTES AND NEWS.

AN *Archiv für Geschichte der Philosophie* will shortly appear in Berlin. The editor-in-chief is to be Prof. Ludwig Stein of Zurich.

— The *Athenaeum* announces that the well-known Swedish botanist, Prof. Johan Edvard Areschoug, died at Stockholm on the 7th of May. He was born in 1811, and worked under Agardh and Fries at Lund. He was made reader in botany at that university in 1839, and in 1858 was appointed to succeed Elias Fries as professor of botany at the University of Upsala. Among his numerous publications, those best known are his 'Symbolae algarum florum Scandinaviae,' his 'Iconographia phycologia,' and his 'Phyceae marinae.' Areschoug retired from his chair in 1876. On the same day the Swedish statistical writer, Dr. Fredrik Theodor Berg, died in Stockholm, in his eighty-first year.

— Messrs. John Wiley & Sons, New York, have issued an admirable catalogue of their publications, which cover every department of the mathematical sciences and of engineering.

— The second number in the series of monographs on political economy and public law, edited by Prof. Edmund J. James, and published by the University of Pennsylvania, will shortly appear. It treats of the anti-rent riots in New York, 1839-46, an important but hitherto almost entirely neglected chapter in American economic history. The author, Mr. E. P. Cheyney, instructor of history in the University of Pennsylvania, finds the source of the difficulties, which in many respects resemble the present Irish land-troubles, in the peculiar land-tenures of early New York. A vivid description is given of the rise and progress of the riots, and a full account of the numerous and important changes in the constitution and laws of the state, which followed as a result of this movement.

— On Friday, May 13, the Hon. Ion Grant Neville Keith-Falconer died at Aden, and with him one of England's most promising scholars passed away. Mr. Keith-Falconer was born in 1856, and graduated at Trinity college, Cambridge, in 1878, attaining high honors in Semitic languages. After a period of study in Germany and the east, he became Hebrew lecturer at Clare college; and on the resignation of Professor Robertson Smith in June, 1886, he was appointed

lord-almoner's reader in Arabic for the University of Cambridge. His published writings are principally on philological topics; and the article on 'Shorthand,' in the 'Encyclopaedia Britannica,' is from his pen.

— The twenty-second volume of the 'Encyclopaedia Britannica,' completing the letter 'S,' is now ready. The principal literary and scientific articles are, 'The sonnet,' by Mr. Theodore Watts; 'Sophocles,' by Professor Campbell; 'Spanish literature,' by M. Morel Fatio, the first Spanish scholar in Europe; 'Swedish literature,' by Mr. Gosse; 'Syriac literature,' by Professor Wright; 'Dean Stanley,' by the present dean of Westminster; 'Socrates,' by H. Jackson; 'Stoics,' by D. Hicks; 'Slavs,' by Mr. Morfill; 'Slavery,' by Dr. Ingram; 'Skeleton,' by Prof. St. George Mivart; 'Sponges,' by Dr. Sollas; 'Steam-engine,' by Professor Ewing; 'Sun,' by Mr. Lockyer; 'Surface,' by Professor Cayley; 'Surgery,' by Professor Chiene and three other contributors; 'Spiritualism,' by Mrs. Henry Sidgwick; and 'Sword,' by Prof. F. Pollock.

— The issue of the *Home journal* dated June 15 contains a most complete summer-resort guide. Where to start from, how to go, what it costs to stay, the natural attractions of the different regions, and the accommodations offered by the various hotels at the summer-resorts, are all very clearly and faithfully set down.

— Hon. David A. Wells will contribute to the July *Popular science monthly* the first of an important series of papers on 'The economic disturbances since 1873.' Mr. Wells proposes to review the history of these disturbances, and to point out agencies to which such wide-reaching commercial depression may be properly attributed.

— The two latest monographs issued by the American historical association are 'History of the doctrine of comets,' by ex-President Andrew D. White of Cornell; and 'William Usselinx, founder of the Dutch and Swedish West India companies,' by Dr. J. F. Jameson of Johns Hopkins university.

— The progress made in educating the negroes of the south will be set forth in *The American magazine* for July. The Rev. S. W. Culver, president of Bishop college, Texas, describes the methods of instruction, and the measure of success attained.

— Prof. M. Max Müller's three lectures — 'The simplicity of language,' 'The identity of language and thought,' and 'The simplicity of thought' — given at the Royal institution, London, last March,

have been secured for the columns of *The open court*, Chicago. The first of these remarkable lectures was contributed to the May number of the *Fortnightly review*: the other two have not been published, and will be printed for the first time in *The open court*, and from the author's manuscript. The publication of these lectures commenced in *The open court* of June 9.

— The *Harvard university bulletin* announces that the corporation have authorized the publication, through Charles Scribner's Sons, of a memorial edition of the late Prof. E. A. Sophocles' 'Greek lexicon of the Roman and Byzantine periods,' under the oversight of Prof. Joseph Henry Thayer.

— Charles L. Webster & Co., the publishers, sent Mrs. Grant a check for \$33,384.53 last week as additional profits on General Grant's 'Memoirs.' She has received thus far nearly \$400,000, which is probably the largest amount of money ever earned by the writing of a single book.

— Cupples & Hurd have in preparation a life of Commodore Matthew C. Perry, who was so instrumental in opening the ports of Japan to the world. It will give a complete history of this 'typical naval officer' from the time when, as a midshipman, he served in the war of 1812, to the treaty with Japan.

— Messrs. Macmillan & Co. have published 'Dynamics for beginners,' by Rev. J. G. Lock. This work has been written in the hope of supplying a want, which many teachers have felt, of a book which explains the elementary principles of dynamics, and at the same time illustrates them by numerous easy numerical examples suitable for use in schools with boys of ordinary mathematical attainments. It must be regretted, however, that the author has seen fit to suggest names for the units of velocity and acceleration, as the science of physics threatens to be overburdened with an unnecessary nomenclature.

LETTERS TO THE EDITOR.

**The attention of scientific men is called to the advantages of the correspondence columns of SCIENCE for placing promptly on record brief preliminary notices of their investigations. Twenty copies of the number containing his communication will be furnished free to any correspondent on request.*

The editor will be glad to publish any queries consonant with the character of the journal.

Correspondents are requested to be as brief as possible. The writer's name is in all cases required as proof of good faith.

The Charleston earthquake.

THE admirable paper on the 'Charleston earthquake' in *Science* of May 20, by Messrs. Dutton and Hayden, is an illustration of what may be accom-