

measures preventing the breeding of this insect are facts of prime importance from the point of view of public health. We therefore welcome the appearance of a second edition of the illustrated brochure on this insect which has been recently issued by the British Museum (Natural History). The author, Major E. E. Austen, has revised and expanded the text of the first edition and has brought the pamphlet thoroughly up-to-date. Its full title, "The House-Fly, its Life-History, Importance as a Disease Carrier, and Practical Measures for its Suppression," sufficiently explains its scope. It may also be added that the author deals with the insect under other conditions besides those met with in the British Isles, and has incorporated the results of experience gained through the operation of sanitary measures in the War. The pamphlet is obtainable either from the Natural History Museum, South Kensington, or through booksellers, price 1s.

APPLICATIONS are invited for the following appointments, on or before the dates mentioned:—A demonstrator in the Department of Inorganic and Physical Chemistry, Bedford College for Women—Secretary, Bedford College, Regent's Park, N.W.1 (July 3). Part-time lecturer in sociology, Bedford College for Women—Secretary, Bedford College, Regent's Park, N.W.1 (July 3). Research chemists for the Fuel Research Station, East Greenwich—Secretary, De-

partment of Scientific and Industrial Research, 16 Old Queen Street, S.W.1 (July 3). Analysts for work in connexion with the Physical and Chemical Survey of the National Coal Resources of Great Britain—Secretary, Department of Scientific and Industrial Research, 16 Old Queen Street, S.W.1 (July 3). Half-time assistant in the Department of Mathematics, University College of Swansea—Registrar, University College, Swansea (July 9). Two junior scientific officers at the Royal Aircraft Establishment—Superintendent, Royal Aircraft Establishment, South Farnborough, Hants (July 10). Assistant lecturer in physics, University College of Wales—Secretary, University College, Aberystwyth (July 13). Lectureship in chemistry in the University of Durham—Registrar, Armstrong College, Newcastle-upon-Tyne (July 17). Assistant agricultural chemist in the Department of Science and Agriculture, Barbados—Secretary (Appointments), Colonial Office, 38 Old Queen Street, S.W.1 (July 31). Senior laboratory assistant in the Department of Entomology, London School of Hygiene and Tropical Medicine—Secretary of the School, 23 Endsleigh Gardens, W.C.1 (July 31). Head of the Chemistry Department, Borough Polytechnic Institute—Principal, Borough Polytechnic Institute, Borough Road, S.E.1. Several inspectors of agriculture for the Sudan Government—Controller, Sudan Government London Office, Wellington House, Buckingham Gate, S.W.1.

Our Astronomical Column.

RECENT SOLAR ACTIVITY.—For several weeks there has been an absence of very large sunspots, although smaller ones, averaging half-a-dozen daily, have been of interest to observers with moderate telescopic means. In addition, faculae at both limbs of the sun have been present on most days, some of the areas being of considerable extent. Traces of the faculae related to the great spot of last December and January in north latitude 22° were seen about a fortnight ago. On June 21, a group of spots, the development of which had been watched since June 16, was of sufficient size to be a naked-eye object on the disc. The group consisted of a roughly circular spot as leader closely followed by a close cluster of small spots, which on some days linked up with one another to form a composite companion to the leader. On June 15, Mr. Newbegin, observing with his spectroscope at Sutton, Surrey, noted a metallic prominence (that is, one having a spectrum containing metallic lines) at position angle 63° , which corresponds almost exactly with the position of the newly forming spots then at the sun's east limb. This prominence, of the 'rocket' or 'splash' type, appeared as if the gases were being expelled from a common centre. Such prominences, according to Evershed and other observers, are very frequently found connected with sunspots, either during their active development, or at other times when great changes are taking place.

Particulars of the large spot are given below:

No.	Date on Disc.	Central Meridian Passage.	Latitude.	Area.
7	June 16-(28)	June 22.0	25° N.	1/1400

(Area expresses the proportion covered of the sun's hemisphere.)

NEPTUNE'S SATELLITE.—Prof. Eichelberger's and Mr. Arthur Newton's exhaustive researches on this satellite have already been mentioned in NATURE.

Their paper is printed in the March issue of *Mon. Not. Roy. Ast. Soc.*, and deserves a further note. It is curious that though no certain markings have been seen on Neptune's surface, we now know the position of its axis nearly as accurately as that of Mars. The position of its north pole is given as R.A. $295^\circ.2$, N. Decl. $41^\circ.3$ (equinox 1900.0): the pole of the satellite's orbit describes a circle of radius $20^\circ.1$ in 585 years, the annual motion being $0^\circ.62$. The observations indicate a considerably greater motion for the major axis of the satellite's orbit, from $1^\circ.5$ to $3^\circ.0$ per annum. It moves in the opposite direction to the node, as it should, but the observed motion is probably too great. Owing to the very small eccentricity, about 0.005, it is very much more difficult to determine the position of the apse than of the node. Dr. J. Jackson deduces 1/66 and 19 hours as the probable values of the compression and rotation period of Neptune.

TEMPERATURE OF MARS.—*Astr. Nach.* No. 5448 contains an article by W. W. Coblentz comparing the measures made by Lampland and himself at the Lowell Observatory with those made by Pettit and Nicholson (100-inch at Mt. Wilson). It is noted that the receiver used by the latter covers a Martian area 50 per cent. larger than that used by the former; this would make the measures more nearly average ones for the whole surface, and less affected by the particular regions in view. The measures show that dark areas are hotter than bright, and that the afternoon side of the planet is hotter than the morning side; the latter point is not so plainly indicated in the measures of Pettit and Nicholson, but terrestrial analogy makes it reasonable. Radiation near the east and west limbs was found to be respectively one-third and one-half of that at the centre. The article closes with a note of satisfaction that the two sets of observations are on the whole accordant.