

a second time, and well mixed with saliva, it penetrates into the *manipulus*.

"The mechanism by which aliment accumulated in the first stomach is carried back to the mouth, is also very simple. When regurgitation begins the reticulum contracts and presses the alimentary mass against the slit-like opening which terminates the œsophagus; then this opening enlarges so as to seize a pinch or portion of the alimentary mass, compresses it, and forms it into a small pellet, which engages in the œsophagus, the fibres of which contract successively from below upwards, to push forward the new alimentary ball into the mouth."—*Ruschenberger's Elements of Mammalogy*.

General Science and Miscellany.

British Libraries.

1. *British Museum Library, London*.—There is probably no other public institution in Great Britain which is regarded with so great and general interest as the British Museum. By the variety of its departments, this splendid national depository and antiquities, meets in some way the particular taste of almost every class of society. The department of Natural History, in its three divisions of Zoology, Botany, and Mineralogy, contains a collection of specimens unsurpassed, probably unequalled, in the world. The department of antiquities is in some particulars unrivalled for the number and value of the articles it contains. But the library is the crowning glory of the whole. If, in respect to the number of volumes it contains, it does not yet equal the National Library of Paris, the Royal Library of Munich, or the Imperial Library of St. Petersburg—in almost every other respect, such as the value and usefulness of the books, the arrangements for their convenient and safe keeping, and, in fact, in every matter pertaining to its internal arrangements, the library of the British Museum, by the concurrent testimony of competent witnesses from various countries, must take rank above all similar institutions in the world. Well may the people of this country regard the Museum with pride and pleasure. The liberal grants of parliament, and the munificent bequests of individuals, are sure indications of a strong desire and purpose to continue and extend its advantages.

Some idea of the magnitude of the Museum, and of its vast resources, may be formed by considering that the buildings alone in which this great collection is deposited, have cost since the year 1823, nearly £700,000; and the whole expenditure for purchases, exclusive of the cost of buildings just named, is considerably more than £1,100,000. Besides this liberal outlay by the British Government, there have been numerous magnificent bequests from individuals. The acquisitions from private munificence were estimated, for the twelve years preceding 1835, at not less than £400,000. The latest considerable bequest was that of the Right Hon. Thomas Grenville: his library, which he gave to the Museum entire, was valued at £20,000.—The annual receipts of the institution of late years, from parliamentary grants and the interest of private legacies, have been about £50,000. The number of visitors to the Museum is immense. In the year 1848 they amounted to 897,985, being an average of about 3000 visitors per day for every day the Museum is open. On special occasions there have been as many as thirty thousand visitors on a single day.

This noble institution may be said to have originated in the bequest of Sir Hans Sloane, who, dying in

1752, left his immense collections of every kind to the nation, on the condition of paying £20,000 in legacies to different individuals; a sum considerably less than the intrinsic value of the medals, coins, gems, and precious metals of his museum. This bequest included a library of 50,000 volumes, among which were 3566 volumes of manuscripts in different languages; a herbarium of 334 volumes, other objects of natural history, to the number of six-and thirty or forty thousand, and the house at Chiswick, in which the whole was deposited. The Harleian collection of manuscripts, amounting to 76000 volumes, chiefly relating to the history of England, and including, among many other curious documents, 40,000 ancient charters and rolls, being about the same time offered for sale, parliament voted a sum of £30,000 to be raised by lottery, and vested in trustees, for the establishment of a National Museum. Of this money, £20,000 were paid to the legatees of Sir Hans Sloane, £10,000 were given for Harleian Manuscripts, and £10,000 for Montague House as a receptacle for the whole. Sloane's Museum was removed thither with the consent of his trustees. In 1797, George III., by an instrument under the great seal, added the library of the kings of England, the printed books of which had been collected from the time of Henry VII. the manuscripts from a much earlier date. This collection was very rich in the prevailing literature of different periods, and it included, amongst others, the libraries of Archbishop Cranmer, and of the celebrated scholar Isaac Casaubon. His majesty annexed to his gift the privilege which the royal library had acquired in the reign of Queen Anne, of being supplied with a copy of every publication entered at Stat oners' Hall; and in 1759 the British Museum was opened to the public.

The value of the library has greatly been enhanced by magnificent donations, and by immense parliamentary purchases. In 1763, George III. enriched it with a collection of pamphlets and periodical papers, published in England between 1640 and 1660, and chiefly illustrative of the civil wars in the time of Charles I., by whom the collection was commenced. Among other valuable acquisitions may be mentioned Garrick's collection of old English plays, Mr. Thomas Tyrwhitt's library, Sir William Musgrave's collection of biography, the general library of the Rev. C. M. Cracherode, the libraries of M. Ginguene, Baron de Moll, Dr. Burney, and Sir R. C. Hoare; and above all, the bequest of Major Arthur Edwards, who left to it his noble library, and £7000 as a fund for the purchase of books. Four separate collections of tracts, illustrative of the revolutionary history of France, have been purchased at different times by trustees, in the exercise of the powers with which they are invested. One of these was the collection formed by the last president of the parliament at Bretagne, at the commencement of the revolution; two others extended throughout the whole revolutionary period; and the fourth consisted of a collection of tracts, published during the reign of the Hundred Days in 1815—forming altogether a body of materials for the history of the revolution as complete in regard to France as the collection of pamphlets and tracts already mentioned is with respect to the civil wars of England in the time of Charles I. Another feature of the Museum Library is its progressive collection of newspapers, from the appearance of the first of these publications in 1588. Sir Hans Sloane had formed a great collection for his day. But to this was added, in 1818, the Burney collection, purchased at the estimated value of £1000; and since that period the Commissioners of Stamps have continued regularly to forward to the Museum, copies of all newspapers deposited by the publishers in their office.