18. *Action of Cod-liver Oil, and the Substitution of Ordinary Fats in Food.*—Dr. EDWARD SMITH, in an interesting paper (*Edin. Med. Journ.*, Jan., 1858), urges the profession to reconsider the question of the administration of cod-liver oil, with a view to determine if the good which it effects cannot be brought about by ordinary articles of food.

The following are his deductions in reference to the effect of the administration of the oil in phthisis:—

- "1. It does not remove the disease.
- "2. The cases of arrest of the disease are very few.
- "3. Commonly the disease progresses.
- "4. In about a half the progress is lessened.
- "5. The patient may report himself both stouter and stronger, and yet the disease silently progress.
- "6. When it disagrees, it is chiefly from its influence upon the digestive organs.

"7. When it agrees, it is chiefly by improving nutrition; but in an appreciable number of cases it is believed by the patient to have a local influence, more or less apart from the state of general nutrition.

"8. This local influence is most important in the pharynx and other parts of the mucous tract, and there results from the direct application of the oil to the mucous surface.

"9. It acts almost exclusively by its fatty elements supplying a nutritive material of which the system has been in defect.

"10. In this respect, it has no advantage over the fats used in food, and may be rejected by the appetite like any other fat.

"11. There is a large class of cases in which it is not beneficial, and it is our duty to administer it with discrimination. As a rule, it is more commonly beneficial in those cases in which there is an appetite for the ordinary kinds of fat, and is rejected when ordinary fats are rejected; and hence the substitution of ordinary fats for the oil in equal quantities is not difficult.

"12. Upon the well known and beneficial principle of separating food from physis, it is our duty to supply this desideratum as an ordinary article of diet, to be selected from those which are commonly used in food, and to instruct the patient that we administer it as food.

"13. Although we may thus supply an important element in nutrition, and thereby avert many evils, we do not touch the essence of the disease, or do anything which shall necessarily remove the deposition which maintains the disease and tends to its further progress; and, in fact, we leave the disease much as we found it. It is not, therefore, a specific remedy, but an adjunct to treatment; and the great temporary good which it has so frequently effected proves the great importance of fat in the animal economy.

"My own practice may be readily inferred from these statements. If I desire to produce a local effect upon the throat, I often employ the cod-liver oil, either alone or in an emulsion, giving it in small quantities, and directing that it be swallowed slowly. If I have reason to believe that the patient has diminished the quantity of fat, either with or without other kinds of food, I direct him to increase it; but I do it with moderation, and by substituting a form of fat which he likes for one which he does not like, to take a moderate quantity of some kind of fat with every meal. An increase in the quantity of butter, and also of suet, when added to rice or other puddings, or when boiled in milk, is that which may be the most easily effected; but if the quantity directed is unreasonable, as, for example, the common plan of boiling half an ounce of suet in half a pint of milk, it often disgusts the patient, defeats the object, disturbs the digestion, and is wasted by the bowel. I recollect an instance in which having asked an Irishman the usual questions about fat meat, butter, suet, milk, and bacon, and directed him to increase the quantity of all of them, he mixed them all together and took them, to his great delight and benefit.

"In the foregoing paper, I have not discussed the mode by which fats exercise so beneficial an influence over the system, but have assumed that this benefit is admitted. I purpose to defer this inquiry, and, consequently, the

consideration of the relative value of various other oils and of cod-liver oil. I may, however, state that the patients' objections to many oils, viz., the flavour and the ill effect upon the bowels, do not, in any degree, apply to the ordinary fats of food, for the simple fact that they are such implies that the flavour and general effect are commonly good and agreeable. The best contrast is, therefore, not that of cod-liver with other medicinal oils, but with such ordinary fats in food as nature has provided for us and made agreeable to us; and it is to this contrast alone that I have desired to direct attention.

"The chest diseases, other than phthisis, in which I have found cod-liver oil beneficial, are some states of chronic bronchitis and various pharyngeal affections of a more or less acute form. In these cases, it produces its immediate action upon the mucous membrane of the pharynx, and, if properly administered, certainly relieves the cough, with the expectoration and its train of evils. In the latter class of diseases, which often closely simulate phthisis, its influence is often exceedingly marked, and impresses the mind very deeply with the importance of the condition of the throat, in reference directly to the production of cough, expectoration, and slight hæmoptysis, and indirectly to the degree of irritability of the general system. Indeed, I have no doubt that the most serious disease often originates, or first manifests itself, in that locality."

19. *Rottlera Tinctoria* in *Tapeworm*.—In our last No. (p. 522) we noticed the efficacy claimed for the kameela in the removal of tapeworm. Further evidence to the same effect has since been adduced.

Dr. BALFOUR stated to the Medico-Chirurgical Society, of Edinburgh, that during eighteen months' extensive experience in India there had been no recurrence of the worm after removal by this article. The kameela acts as a purgative, and brings away the animal dead.

Dr. WARWTON BEECHIE said he could corroborate the statement of Dr. Balfour regarding the effectual manner in which the kameela acted in the removal of tapeworms, as that morning two drachms, obtained from Dr. Balfour, had been given to a patient in the infirmary, under his care, and a considerable portion of the worm had been already discharged. In a paper, by Mr. Hanbury, published in the *Pharmaceutical Journal* for February, 1858, very strong testimony was borne to the efficacy of the kameela in tapeworm by several Indian practitioners.—*Edinburgh Med. Journ.*, March, 1858.

20. *On the Absorption of Medicinal Substances by the Large Intestine*. By M. BRIQUET.—The object of M. Briquet's two memoirs is the study of the absorption of medicinal substances introduced into the large intestine by means of clysters. The following are the general conclusions he has arrived at:—

1. The fluid constituting the injection may easily reach as far as the cæcæum, and consequently may be brought into contact with a very large extent of absorbing surface.
2. The mucous membrane and the fluids that bathe its surface do not exert any chemical action upon the substances so introduced into the large intestine, where all that is absorbed is that which was previously in a state of solution.
3. When a clyster of the soluble salts of quinine, in doses less than 15 grains, is administered, rather more than a third of the quantity so administered is eliminated, and has consequently been absorbed.
4. When large doses are administered, they are ill-supported, and only a fifth or a sixth of the quantity is absorbed.
5. In whatever dose the quinine may have been given, it generally gives rise to cerebral symptoms only very slowly and to a slight degree.
6. Traces of elimination, and consequently of absorption are only met with an hour after the administration of a clyster, and even then the elimination is inconsiderable.
7. The duration of the elimination is usually short—two or three days at the utmost.
8. The greater or less dilution, within certain limits, the more or less viscous nature of the liquid, or the addition of the salts of morphia to the cinchona alkaloids do not exert any sensible modification on the absorption.
9. Absorption takes place more readily in the young than in the adult; and is performed with difficulty in the aged of either sex.
10. The salts of quinine, administered in clysters in doses of less than 15