prescribing for each case according to the circumstances and peculiarities, for which he had a quick discernment; and certainly he was not addicted to any "extremes in practice".

His Thursday evening lectures on Chronic Diseases were equally the result of a wise and judicious application of his experience as to diagnosis, prognosis, and treatment. He always insisted much on the importance of discriminating between inflammation and irritation; and disapproved of the word *fever* being applied to mere quickness of pulse. He insisted also on the necessity of distinguishing between patients from Spitalfields and those from the country.

The syllabus of Dr. Fordyce's lectures on the Practice of Medicine was an octavo volume of 376 pages, a copy of the sixth edition of which I have before me. It comprehended a sketch of human physiology, or, as he styled it, the "natural history of the human body"; and, I have no doubt, was then conformable to the newest and best elements of that branch of science.

In the history of the phenomena of diseases of the general system, or of particular organs, he seemed to have a pleasure in incorporating as much physiology and pathology as he could to illustrate his subjects.

In the doctrine of diseases, he was very clear on the subject of fevers, respecting which he was writing the results of his observation and experience on the symptoms, the distinctions, the diagnosis, the prognosis, and indications of cure, with the appropriate remedies. The same course of procedure he followed with respect to inflammations; and interspersed are fifty-five formulæ of medicinal compounds.

The Thursday evening lectures on Chronic Diseases were always, with their attendant circumstances, looked to with especial interest and pleasure. Dr. Fordyce's lectures on the *Materia Medica* were chiefly drawn from the *Pharmacopœia*, making more or less use of the *Materia Medica* of Cullen. The lectures on Chemistry were more pharmaceutical than scientific. He, however, rendered due homage to Black, Priestley, Cavendish, and others.

Many bodies hitherto considered to be elementary—that is, never having been decomposed—he had no doubt were compound bodies, and would some day prove to be so. For example, he had no doubt that the alkalis were compound bodies; and, shortly afterwards, Sir Humphry Davy touched them with his magic wand, and proved them to be so.

In lecturing, as well as in conversation, he retained his broad Scotch accent, apparently never having wished to get rid of it; but the delivery of his lectures was always attractive, from its being characterised by correctness and propriety of language. I always considered myself fortunate to have lived in the time of my venerable friend Dr. Fordyce, and to have enjoyed the benefit of his professional wisdom and knowledge; and, so long as I am spared, shall entertain for his memory sentiments of the highest honour and gratitude; presuming also that these few reminiscences of an eminent teacher may not be unacceptable to the readers of this JOURNAL.

In reference to the Borough school of the years 1796, 7, and 8, I may mention that tobacco-smoking was entirely unknown among all the officials of the hospitals, the medical staff and students, and, as I believe, among the patients, excepting a few old sailors and soldiers, who smoked their pipe after dinner. The subject was never mentioned, or in any way adverted to. We had a few Americans and West Indians, and one Dutchman (Dr. Outyd); but they never took the liberty of smoking, or ever mentioned the subject.

PRACTICAL REMARKS ON THE TREATMENT OF CONGENITAL CATARACT.

By GEORGE LAWSON, Esq., Assistant-Surgeon to the Royal London Ophthalmic and the Middlesex Hospitals.

IN the treatment of congenital cataract, the extent of the opacity of the lens, and its form, whether nuclear or striated, will influence very materially the mode to be adopted. In certain cases, the opacity is entirely nuclear; the eye, in a moderate or rather bright light, possesses very imperfect vision; but in twilight, or with the eye shaded, the sight is very materially improved. Such an eye, examined by oblique illumination after the pupil has been fully dilated with atropine, will exhibit a nuclear opacity of the lens, whilst its circumferential matter is quite transparent. The size of the central opaque portion varies considerably; and upon its extent will depend, in a great measure, the choice of the operation to be performed.

If it be not large, and a clear circumference exist, the operation of *iridodesis*, first introduced by Mr. Critchett, is called for. By altering the shape of the pupil, a clear portion of the lens is exposed, sufficient to allow the rays of light to permeate and to form a correct image on the retina. This application of the operation of artificial pupil to the treatment of certain cases of congenital cataract is an undoubted advance in ophthalmic surgery. It is an operation which, if properly performed, is perfectly free from danger. If, from an error of diagnosis or any other cause, it fail to give the benefit anticipated from it, it in no way precludes any other mode of proceeding which may be deemed advisable. If it succeed, as in well selected cases it will, it enables the patient to see and perform all his ordinary duties without the aid of spectacles; but this is not all, for the patient, seeing through his own lens, possesses a power of accommodation for near and distant objects; whereas, if he had to use spectacles, he would only have two distinct points of vision, his near or reading, and his distant sight.

There is yet another congenital state of the lens in which the operation of *iridodesis* is followed by very excellent results. The central and posterior part of the lens is opaque, but very limited in extent, and there are marginal striæ, but between these striæ there are clear and tolerably large interspaces, and the vision is materially improved when the eye is shaded sufficiently to cause a moderate dilatation of the pupil. Such an eye is qualified for the operation, but it requires to be performed with neatness and dexterity, for the new pupil must be made to correspond exactly with one of the large intervals between the striæ.

The operation of *iridodesis* having been decided on, the question is, in what position should the artificial pupil be made?

There are many points which influence the answer.

1. Supposing the eye to be a healthy one, with a normal fundus, a good range of movements of all the muscles, with control over their action; perfect steadiness in fixation, and without any of the oscillatory movements which are not uncommon in congenital cataract; a good field of vision, and a nuclear cataract, but with a perfectly transparent, broad, circumferential portion—then the position of the pupil which gives to the patient the best sight is slightly downwards and inwards.

2. If the lens exhibit opaque striæ, the choice of the situation of the pupil will be influenced by them. An interval as large as can be found between the striæ will be best suited, and the pupil should be

made either downwards and inwards, or downwards and outwards, according as the case permits.

3. In all cases, a careful examination of the eye should be made, to determine whether the fundus is healthy, and to ascertain the exact state of the field of vision, in order that a pupil may be so placed as to throw the image on the most healthy part of the retina.

It should be remembered that eyes afflicted with congenital cataract are, as a rule, congenitally weak eyes. They are usually below the standard in size of healthy eyes, and occasionally are very small. When both eyes are affected, which is commonly the case, one may be smaller than the other, and the small one is the most imperfect. Oscillatory movements of the eyes are frequent in congenital cataract; they always indicate a more or less unsound state of the fundus, and such are more prone to do badly after operation than eyes which are free from this defect.

Operations for getting rid of the opaque lens in cases of congenital cataract are by no means free from danger; for such eyes, being naturally weak, require to be dealt with, with even greater care, if possible, than eyes not similarly circumstanced; as they are often unable to resist the active inflammation which even a well performed operation sometimes occasions. A proper selection of cases, a judicious choice of the operation best qualified for each individual case, and a strict attention to minute details, will, however, in skilful hands, generally produce favourable results.

Against selecting iridodesis for the relief of congenital cataract, it might be urged, that a cataract once commenced in a lens will continue to increase until the whole is opaque. Such is usually the case in the cataracts of advanced life, but not in the congenital form. The opacity which was present in the lens at the time the child was born, may continue unaltered until he dies. Sometimes, however, after remaining stationary for many years, the nebulosity from some cause or other, difficult to explain, increases, and the whole lens becomes cataractous.

Iridodesis may, therefore, be performed in all cases which are fitted for it, without anticipating the future, as should the lens in time become more opaque, the artificial pupil will in no way interfere with the efficient performance of solution or linear extraction.

Linear Extraction. The operation known as Gibson's operation is well adapted to the large majority of cases where it is desirable to remove the opaque lens. It is, however, an operation which requires great care and great delicacy in the manipulation. The whole chance of success depends on the manner in which the different steps of the operation are performed, and on the careful fulfilment of every detail. It has been said that this operation is not nearly so successful as that commonly known as keratonyxis, or solution of the lens, by allowing the aqueous to permeate its interior through a small puncture of its capsule. Possibly, there may be truth in this assertion; but I believe that a large amount of the failures have depended on a want of a due appreciation of the difficulties which beset it, and a consequent neglect of the precautions necessary for a proper performance of it.

The operation may be divided into two stages.

1. To break up the anterior capsule of the lens so as freely to allow the aqueous to act on the lenticular matter.

2. To remove, by the smallest opening, the broken down lens from within the eye.

Prior to performing the operation, the pupil should be fully dilated with atropine, so that the whole of the lens may be under the observation of the oper-

ator, and the iris may be drawn away as far as possible from the chance of injury.

The first stage of the operation is to break up with a fine needle the anterior two-thirds of the anterior capsule of the lens, and by carefully moving the needle through the soft lenticular matter from point to point, so to break it up that every portion of it may be brought into contact with the aqueous. Often this may be best effected by giving to the extremity of the needle after it has entered the lens, a sort of stirring movement, during which pieces of soft matter will often float into the anterior chamber, and not unfrequently the nucleus or harder central portion will also come forward.

1. Great care must be taken not to injure the posterior layer of the capsule of the lens, as by so doing the hyaloid membrane will be ruptured, and the vitreous, mixing with the particles of the lens, will materially interfere with the due action of the aqueous humour on them, and also render more difficult the second part of the operation.

2. In breaking up the anterior capsule with the needle there is danger, if it be tough, of rupturing the suspensory ligament of the lens, so that the lens within its capsule can be freely moved at the point of the needle.

3. It is of the utmost importance not to bruise the iris, in the frequent movements of the needle.

4. The aqueous humour must be maintained within the anterior chamber until the termination of the operation.

To fulfil all these objects, this, the first part of the operation, may be performed as follows. The patient lies on a couch with his face towards the window, the pupil of the eye to be operated on having been previously thoroughly dilated with atropine. The surgeon stands behind and at the head of the patient. The needle to be used should be a fine one, with a short spear-shaped point, to allow of an easy entrance. The shaft should be perfectly cylindrical, slightly conical—that is to say, slightly thicker two or three lines from the point than at the point itself—and highly polished. Tried upon the drum, it should perforate without sticking, and, on attempting to withdraw it, should raise the leather-work with it. In short, it should fill the aperture in the cornea which it makes so completely, that no aqueous humour can escape, until its withdrawal from the eye at the finish of the operation.

The lids being kept apart by a spring-speculum, the needle is made to perforate the cornea obliquely one or one-and-a-half lines within its margin, so that during its movements it may not in any way injure the iris.

Mr. Bowman is very urgent on the advisability of penetrating the cornea well within its margin, and of the great importance of maintaining the iris untouched during the operation. The distance within the cornea at which the needle should enter will depend partly on the extent of the dilatation of the pupil; as, if not widely dilated, the needle should be made to penetrate nearer the centre. Different operators follow different plans of breaking up the anterior layer of the capsule of the lens. The object to be attained, is to tear up the anterior two-thirds of the lens capsule, without inflicting any injury on its posterior layer; to destroy, in fact, that portion of it which occupies the pupillary space, even when the pupil is slightly dilated.

One method is, having introduced the needle, by a series of movements of the point of the instrument from the circumference towards the centre of the lens, to destroy the anterior layer of the capsule within the pupillary space, and then by a semi-rotatory or stirring motion to break up the lenticular

matter, and urge it, as it were, forwards into the anterior chamber.

Another mode of proceeding is to act first on the central portion of the anterior layer of the capsule, and to proceed gradually towards its circumference.

A third method is merely to prick the capsule very freely, first by a series of punctures around the circumferential border, and then to make two or three in the central part, so as to allow the aqueous humour to well in and act upon the lens-matter.

The first action of the aqueous humour on lenticular matter is to render all which is transparent, opaque; and, in so doing, to cause it to swell and occupy more space; then it acts as a solvent, gradually melting it down prior to its absorption.

After the operation is completed, the needle is withdrawn, and the pupil is to be kept widely dilated with atropine; the patient should be in a darkened room, but not in bed; and a solution of atropine, of the strength of a grain to an ounce of atropine, should be dropped into the eye twice a day.

[To be continued.]

Transactions of Branches.

BENGAL BRANCH.

PRESIDENT'S ADDRESS.

By EDWARD GOODEVE, M.B.

[Delivered at the First Annual Meeting, Feb. 2, 1864.]

GENTLEMEN,—It was my intention to have occupied the chair to which you have called me, without saying more than my thanks for the honour which you have done me; but some of my native friends have expressed a wish that I should address a few words to you—a sort of confession of my faith as regards the Society. I beg, therefore, to make a few observations to my old friends and pupils.

In the first place, I have to thank you for the honour which you have done me in electing me to the presidency of your Association for the ensuing year. The gratification which I feel, however, is tempered by the fear that want of health and leisure and want of acquaintance with public business of this sort, will cause me to be but a poor substitute for my able predecessor in this chair. I regret that I have been so little able to attend our past monthly meetings. My absence, I assure you, must be attributed to anything else but indifference towards the Association and its objects. The Society has, indeed, my most cordial wishes for its continuance and prosperity. I have been rejoiced to see the formation of this Association; because I think that the time has certainly come when the European and native representatives of Western medicine should combine together for the cultivation of professional subjects. It has been resolved that this Society should become a Branch of the British Medical Association. This resolution has, I know, caused some discussion and difference of opinion; but as the majority of our associates have so willed it, I hope that many of our members who still hold aloof from enrolling themselves as members of the British Society, will encourage me in the step that I have taken, and add their names to the English list; and, also, that many of our brethren who have not joined the institution, either as members or associates, will give us the advantage of their co-operation.

I said just now that I heard with pleasure, during my absence from Calcutta, of the formation of this Society, under the energetic advocacy of its founder,

Dr. Chuckerbutty. I have since willingly joined it, because I look upon this Association as a fitting sequence to the establishment of the Medical College itself, and as an evidence of the great step that has been made in India since the opening of the dissecting-room of the College in January 1836, when my old friend, Madoosuddun Gooptoo, whose portrait now adorns this hall, made the first irrevocable step which committed the modern Hindoo to the practice of dissection, and, by this act, led the way to link together the Eastern and Western nations in the pursuit of the same medical science.

I feel certain that the institution of such an Association as this must be a gratifying circumstance to those first pioneers of English education in this country, by whose energetic representations the mode of teaching medicine in India was changed from that of the system of the old School of Medicine in Calcutta to that of the new one. To such, the growth of an Association such as this, the effort of the manhood of the pupils of older days, must be a source of legitimate gratification, also to those of the original teachers of the College who still survive. By those teachers who first embarked in what was then thought to be a frail ship, bound on a doubtful voyage, on a sea of prejudice and superstition, the formation of this Society must be hailed with the greatest satisfaction, as a proof that their labours have not been unavailing.

But it is not merely as proof of success of the efforts of past days that we must look upon this Society; but we must chiefly consider the advantages which it may give to us in the present time.

The cultivators of all branches of science find a necessity for union in the different objects of their study; hence, in all parts of the world, and for all branches of learning, there spring up societies, academies, and institutions. Medicine, not less than these, demands the same means and the same methods; and, perhaps, there are peculiar circumstances connected with medicine which call strongly for this union. Medicine, now as ever, is assailed by all sorts of scepticism, and opposed by all sorts of rivalry, contending for superiority in the cure of disease. Many of these rivalries spring from pure imposture; many from the overstrained use of some fragment of therapeutic knowledge; means which may be useful in some particular state being applied in an universal manner.

We are too often judged of in the world by persons who have no knowledge whatever which may serve them as a basis from which to judge us. We see daily that men gravely commit themselves, and those nearest and dearest to them, to those of whose worth they absolutely know nothing, and whose pretensions they cannot measure. To have our art assailed in this way is, indeed, depressing and painful; and it requires all our confidence in its resources to enable us to bear up against the reproach which is thus made to us.

The antidote to all this, as far as our own feelings are concerned, is in the thorough instruction of ourselves. We may be assured that, the more versed we are in our own study, the better prepared we shall be to meet the attacks to which we are exposed, and the more satisfied we shall be of the value of our own calling. If we knew no better, we might feel sorrow when we are told that all medicine is empiricism, and that our art has no better claim for consideration than any other scheme which asserts its own merits. We might, indeed, feel humiliated if we were ill informed of the mode in which medicine is really studied; if we were ignorant of the force of intellect which is at work on the great questions of physiology and medicine. To few questions have greater minds