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4.—SIR WILLIAM ADAMS
(1760-1828)

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THE passport of fame to posterity is the achievement of some act or discovery by which succeeding generations benefit. Thus does the memory of a man who has performed a valuable State service ever remain a distinguishable feature of the national life. He is never forgotten: it is a mark of ignorance not to know why he is remembered. The reverence paid to the name of Nelson, the glory with which the name of Harvey is associated, the deep and enduring sense of gratitude environing the name of Lister, may be recalled as instances of men whose work has gained for them an immortality of remembrance—as long, indeed, as time shall last. Then, in the distance, from the merits of such deeds, and the names with which they are associated, we come to the life-history and the work of the subject of this notice. A beginning may be made by stating that Adams was an ophthalmic surgeon occupying, in his day, a distinguished position: a man of renown, full of good work as an exponent, in his line, of the immeasurable value to humanity of the art of healing, and yet, despite his distinguished position in the sphere of his activities, continued by his successors, for generations he has been forgotten. His literary productions are all that remain to us of his name. These alone are available for

gleaning something of the story of his life and work, and this story, as I shall endeavour to unfold it, will be found to contain points of interest and importance worthy of recognition and remembrance in these days.

Emphasis is added to the oblivion which has befallen him by noting the omission of his name from the *Dictionary of National Biography*—that Valhalla of British greatness. That Adams should have been excluded from this national record is remarkable. As we shall see, the work he accomplished, and the distinction he gained, justly entitled him to the honour of a biographical notice. Not less curious is the fact that Pettigrew, who seems to have had an open mind in the selection of his biographies, also excluded Adams from his list. Why was this? That is a question to which it is difficult to find an answer, especially when we reflect that Adams was perhaps the most representative ophthalmic surgeon of his day, in view of his official position, and the State work in which he was engaged. Moreover, it must be remembered that Adams was the first English ophthalmic surgeon to be honoured with a title, an honour conferred upon him solely for his ophthalmic work.

Of his personal life, however, little is known. Of his birthplace, his parentage, of the domesticities which befell him in after years, we are entirely ignorant. No contemporary records dealing with these matters are extant. On the other hand, of his official and professional life he himself has provided us with ample information by means of his books. That information throws into strong relief the active life that he led. He began his ophthalmic career as the pupil and assistant of Saunders. This was an exclusive appointment: that is to say, Saunders made of him a confidant in his work. The point is not without significance. It was a complaint of Ware's that Saunders showed some secretiveness in regard to his operative *technique*; in other words, that he was averse to the dissemination of the knowledge of his operative methods. Thus it happened, after Saunders' death, that Adams was the only person to whom those methods were known. It is recorded that upon one occasion Adams invited some of his contemporaries, including Ware, to be present at his operations, at which the *technique* practised by Saunders was demonstrated. Meanwhile it was then unknown that Saunders had already purged himself of the reproach of concealing what he knew. In his book, published some months after his death, a full explanation was given of the details of his practice, and of his operative methods.

At length the time arrived when Adams was required to come to a decision in respect to his own career. The matter was settled by his determination to leave London and engage in general practice in Exeter. But the spirit of eye work, nevertheless, remained in him; it became even stronger and more keen on finding himself

amid a field of cataracts, waiting for skilled treatment, which the county town and the district of Exeter provided. His previous ophthalmic training soon resumed an active form. He set to work to promote a scheme for founding an eye hospital in Exeter, a hospital modelled upon the lines of the City of London Infirmary for Diseases of the Eye. This scheme at first was hotly opposed. The opposition was vehemently supported, and mostly led, by the medical men of the locality. That this hostile professional attitude should have been assumed only goes to confirm our knowledge of the pervading antipathy against medical specialism current in the profession at the time. Adams, however, in the end accomplished his object, mostly by powerful lay support, and thus there came into being the West of England Eye Infirmary, an institution which still exists, more than a hundred years after its foundation, as a veritable witness of his energy. He was duly appointed surgeon to the Institution, as was natural. After two years' service he resigned the post, and his resignation introduces an interesting episode in his life. He left Exeter, returned to London, relinquished general practice, and became a pure oculist. From that time onwards his career attained distinction, inasmuch as he made the most of the opportunities which presented themselves for the achievement of that object. It happened that in the year 1813 an accumulation of cataract cases had taken place among the old pensioners in Greenwich Hospital. For twenty years previously the old men with cataracts had been operated upon by the medical staff attached to the hospital. But the results had proved so ghastly, so notoriously deplorable, that at length the old men rebelled; they refused all operative treatment, preferring blindness to the loss of their eyes. At this juncture the facts came under the notice of the Board of Directors. The decision was arrived at that some intervention was necessary, in the old men's interest. By some means, of which there is no record, the Board came into communication with Adams. In the end he was invited to place his services at the disposal of the Board, and to undertake the necessary operative treatment. The invitation was accepted, and this it was which led to Adams leaving Exeter for London. With his cataract cases he made a good start. In all, these amounted to 31, but no mention is made of the period over which the cases extended. He claimed 29 successes: one eye was lost, and one patient was discharged for inveterate drunkenness. The cases were divided by him into three categories: (1) those considered unexceptional; (2) those considered incurable by other oculists; and (3) those in which other oculists had failed. In one of the latter cases, he claimed a "perfect" result, even after thirteen operations had been performed upon the man's eyes on former occasions by another surgeon. The directors, we are informed, personally and minutely examined the

cases, and apparently they were impressed with the achievements of Adams. Their impressions took the form of a report which was incorporated in the "official papers," and the publication of these documents proved highly beneficial to Adams; indeed, he himself assigned the beginning of his reputation to this action of the Board. In a few years' time, however, Adams was not content to confine his services solely to the old pensioners at Greenwich. He conceived a new scheme upon a much larger basis; the War Office was approached, presided over by Lord Palmerston, and the suggestion of Adams was submitted to the approval of the Government, "that a central institution should be founded, for the treatment of the blind pensioners belonging to the army, navy, and artillery." The proposal was favourably received, and in 1817, a wing of York Hospital, Chelsea, was set apart for the reception of the cases. Adams drew up a schedule of the diseases which he considered applicable for treatment, namely: "(1) granular lids and opaque cornea; (2) cases for artificial pupil, whether arising from ulceration of the cornea, inflammation of the iris, accidents, or the unsuccessful termination of previous operations; (3) opacities of the cornea, with or without vascularity; (4) cataract, conical cornea, accidents, and, in short, every species of disease which admits of material relief." And Adams was pushful. He never seems to have lost opportunities where his interests were concerned. He writes, "placed as I was at the head of this institution, I considered it due to the confidence reposed in me by Government that everything connected with the treatment of the pensioners should have the most complete publicity: and that the profession at large, should, therefore, be invited to inspect, and estimate the practice which was to justify that confidence." Accordingly he issued a circular letter to the profession, inviting all medical practitioners and students interested in the subject to attend his lectures and witness his operations. This appeal was successful. He tells us that an attendance of from twenty to fifty was, upon occasions, present. Thus, well within a period of half a dozen years, this ophthalmic surgeon, formerly in general practice in Exeter, promoted and gained for himself in London a hospital appointment, established a teaching centre for medical practitioners and students, obtained the ear of the Government of the day, and brought himself into personal contact with many powerful official supporters. Further still, within that period, he gained a knighthood; was appointed oculist extraordinary to the Prince Regent, in the reign of George III; was oculist in ordinary to their Royal Highnesses the Dukes of Kent and Sussex; a corresponding member of three learned societies abroad, and probably by virtue of these Royal appointments won for himself a commanding position as the leading ophthalmic surgeon in this country. His connection with the Court is noteworthy, and establishes a

record. He was the first ophthalmic surgeon to be honoured by the distinction of oculist to the English Royal Family.

From all this it will be gathered that his advancement was phenomenal. How was it that he, formerly a general practitioner in Exeter, was able to out-distance his contemporaries in London and accomplish so much within so limited a period? We, as posterity, must concede to him credit for the success of his activities. Without a full knowledge of the facts we can only judge of the results. These are indisputable: they remain as the records of history, even if we may not regard them as landmarks in British ophthalmology. And yet, despite the position he attained, Adams has passed out of remembrance: his name and the work he accomplished have only come down to us by means of his books. Without his contributions to ophthalmic literature it must be confessed that the compilation of a biography would have been impossible. But here an unpleasant reflection emerges from this survey of his life. He seems to have been regarded askance, if not even to have been ignored, by his contemporaries. This could scarcely have been due to any prevalent conviction of his want of capacity or lack of skillfulness. On the contrary, both in skill and capacity, the evidence is all in his favour. Was, then, jealousy owing to his rapid success the cause of his contemporaries' demeanour towards him? Or was his personality at fault, leading to disapprobation of the methods of engineering his professional life; or, again, was it his habit to "magnify his office" at the expense of his colleagues? To us it matters little by what means he failed to establish himself as *persona grata* among his contemporaries. Suffice it, however, to add that in the ophthalmic books of his day Adams' work was passed over without notice. By Travers he is ignored; by Ware his name is mentioned once, and then only in connection with the incident to which allusion has been made. Mackenzie, scarcely a contemporary, alone breaks the rule by assigning to Adams the credit of introducing the "V-shaped" operation for ectropion, the idea for which is nevertheless attributed to Antyllus about the fourth century. There seems, therefore, to have been established against him a conspiracy of silence, despite the many opportunities he afforded, furnished by the books which he published, of comments, critical or otherwise, upon his work.

And thus we come to his books. Attention may be drawn to two of these, from which something more may be gleaned of his life. He published in 1817: "*A practical inquiry into the causes of the frequent failure of the operations of depression and of the extraction of the cataract as usually performed, with the description of a series of new and improved operations, by the practice of which most of these causes of failure may be avoided.*" Candidly, devoid of any

captious feeling, the admission must be made that this book is in one respect displeasing. It contains a blemish—a blemish which conveys a moral, and at the same time invites a reproach. Its pages are literally suffused with the personal pronoun “I.” This pronoun, gaily, unblushingly, predominates almost upon every page.

A display of personal efflorescence, of such conspicuous intensity as this, is destructive to efficiency of effort. It diverts the attention of the reader from the substance to the man, until the effect is boredom, creating in the end a feeling of hostility towards the perpetrator of so unnecessary a practice. Neither in print nor in speech does this habit magnify the importance of a statement or add to its effectiveness. In short, it constitutes merely a method for the evaporation of self-glory, implying a claim for superiority manifestly more disposed to excite ridicule than to gain respect. Moreover, it tends to accentuate hostile criticism, which a display of dogmatism may possibly have already called into activity. The exuberance of egoism may be compared to a heterogeneous proliferation of a normally benign tissue, the effect of which is destructive to the natural discharge of its functions. Here is an example, taken at random, of the author's style, “But in cases where the lens is so hard as to resist division, *I* do not now, as formerly (and as *I* have recommended in *my* work on diseases of the eye) subject *my* patient to the chance of repeated operations, but *I* at once extract it.” Obviously in these few lines the limelight is turned, not upon his work, but upon the author himself, casting, by contrast, the former into the gloom of inglorious shade. The statement would have gained in effectiveness had it been written as follows:—“But in cases where the lens is so hard as to resist division, I do not now, as formerly, subject the patient to the chances of repeated operations, but at once proceed to perform extraction.” The author's personal effusiveness probably excited the ire or irritation of one, at least, of his readers, if we may judge from the pencilled criticisms which appear in the copy of the book before us. This copy is the property of the Bowman Library, the Royal Society of Medicine, whence it was obtained for the purpose of this biography. These criticisms, of which there are several, thus inadvertently transmitted to our time, invite some comment. Upon the inside cover of the book we read “For Dr. MacKinnon with the kind and best wishes of his friend the author.” But to most of the hostile pencilled notes, all in the same handwriting, the initials “McK.” are appended. This is a somewhat suggestive coincidence. Was MacKinnon the author's friend, and was “McK.” MacKinnon? There is evidence, at least, that “McK.” was a contemporary of the author's, and was upon terms of intimacy with him. In the first note the critic

obviously gains a point over the author. The matter under discussion is polyopia — not then known as such — with which ophthalmic surgeons are nowadays familiar, as accompanying the early stages of opacity of the lens. This disturbance of vision Adams says “can only be attributed to a morbid action of the functions of the retina.” The critic replies, “Indeed! surely Sir William Adams, if he knows anything of the laws of light in respect to the vision, cannot but know that these false appearances may be produced by the very opacity of the lens which he describes, without any morbid action of the retina itself.” In another paragraph the author declaims as follows: “Cheselden’s operation [for artificial pupil] was tried and condemned by Sharpe, Warner, Ware, Wathen and others in England; by Richter, in Germany; Menzel and Janin, in France; and from the opinion of the latter, was held up as an operation of no utility by Professor Scarpa, in Italy. Indeed, some French writer even disputed the veracity of Mr. Cheselden; and Professor Assalini, in reply to this unjustifiable suspicion, in a very ingenious work on artificial pupil, took some credit to himself, for deeming it possible that Cheselden did succeed by the method of performing the operation which he described. . . . But it is almost impossible that Cheselden’s operation could ever succeed . . . until I conceived the possibility of improving it.” As is well known, it was not customary among our forefathers to “mince” words, or pay allegiance to the amenities of social intercourse, where differences of opinion prevailed. And so we find the critic freely unburdening himself in respect to the author’s observations. “A most illiberal,” he writes, “and insidious notion. The continental spawn doubted the reality of Cheselden’s operation and Assalini did so and so. Sir William—this may do with fools and dolts, but never with professional men, who know what you are, and what you would be at.” A third and last quotation may be given. Speaking of his own operation for artificial pupil, Adams writes, “A considerable degree of delicacy and dexterity of hand, is, however, absolutely necessary for the successful execution of this operation; for unless the iris is divided, as I have already said, as it were fibre after fibre, it will become partially detached from the ciliary ligament.” But his critic remorselessly trounces him in regard to this statement. He writes: “This, Sir William, is downright quackery—or what is worse, vanity, vanity.”

It is obvious that these criticisms were conceived in no friendly spirit. At the same time they do not display an animus unreasonably based; nor is any intention apparent in them to convey more than what the critic believed to be the truth. They are quoted here as containing the only hints in our possession of the personality of Adams, furnished by one of his contemporaries.

Adams in this book makes as the chief theme the establishment

of his claim to the introduction of certain operations described by him as "novel." The book, therefore, mainly consists of arguments, and the discussion of points in favour of these, emphasizing that, in his opinion, the "novelties" were improvements upon the old and usual methods. His method of operating for hard cataract may be mentioned. The description of this is too detailed for quotation. Summarized it is as follows.—The operation is divided into two stages. The first stage is performed with a two-edged needle; the latter is made to puncture the sclera, a line behind the iris, and is carried onwards until its point reaches the nasal border of the pupil; its edge is then turned backwards, and the lens and its capsule are freely divided. If the nucleus be too hard for division, the needle is slightly withdrawn, and its flat surface is employed to displace the lens into the anterior chamber, through the dilated pupil, by which further laceration of the capsule becomes possible. The second stage of the operation is then proceeded with. This comprises a corneal section, allowing for the extraction of the lens with a hook. With reference to soft lens matter remaining in the anterior chamber, Adams states "I am not, however, very solicitous to remove every fragment of the cataract, for if some of them are so small as to elude the hook or scoop, I allow them to remain . . . where they usually dissolve before the opening in the cornea has healed sufficiently to admit of the eye being used." This method of operating the author claims to be "attended with peculiar advantages, and to exempt the patient from many dangers." Its advantages, according to his view, place it in the position of superseding depression, and of avoiding the causes of the failures of the usual extraction operation. The first stage was the discission operation generally practised by our forefathers. Only rarely was the cornea selected for penetration by the needle. The opacity resulting from the passage of the needle was held to be an objection, especially when the defect could be avoided by making use of the scleral route. The author based his operation upon a principle evolved from his practice. He held that cataract at all ages should first be needled. By this means the consistency of the lens-substance was revealed. If the nucleus could be broken up, absorption was allowed to proceed in the ordinary way; if not, a corneal section was performed, followed by extraction. His "new" operation was practised upon the 31 cases of old pensioners at Greenwich Hospital, to which reference has been made, and he seems to have adopted it exclusively in his practice afterwards. There are several other "new" operations described in this book upon which much stress is laid; but space is running short, and there is still the other book which Adams wrote to be noticed. To this publication we will, therefore, now proceed. The title is as follows:

"A treatise on artificial pupil, in which is described a series of improved operations for its formation, with an account of the morbid state of the eye to which such operations are applicable."

The date of publication is 1819, and, included in the volume is the first annual medical report of the Blind Pensioners Hospital for Diseases of the Eye, furnished by Adams for the War Office. In the dedication to Lord Palmerston, Adams writes in fulsome strain, while endeavouring to "discharge the deep debt of gratitude I owe your lordship for the confidence you have been pleased to repose in me, and the kind protection which I have received at your hand." Again, in the preface, Adams throws some further light upon his continued activities. Therein he announces his intention to deliver annually a regular course of lectures upon ophthalmic surgery, and, he proceeds, "as I shall practically illustrate the effects of my peculiar operations and modes of treatment upon the chronic cases in the ophthalmic hospital, and upon the acute ones among the patients of a dispensary, which I propose immediately to found for the treatment of diseases of the eye, the united practice of these two establishments will form a complete school for teaching ophthalmic surgery, exceeding, in its operative department, any institution of the kind in this or any other country."

It is conceivable that Adams was an optimist: he must have been an enthusiast: he was certainly an idealist. It was his habit to take time by the forelock; to ignore the possibilities of misadventure befalling his ideals; to press forward with energy unabated in the pursuit of that upon the success of which he had firmly set his mind. These are the attributes which make for success, attributes which, in his case, must have greatly assisted him in his career. The conception of founding an ideal school for the teaching of ophthalmic surgery was good; nothing of the kind could have been better at the time in which he lived. But, unfortunately, the matter ends with his statement, so far, indeed, as we are concerned. It would have been interesting to learn to what extent his scheme succeeded. The fact, however, remains that from this time the veil falls upon Adams and his work. He ceased to write; new editions of his books were uncalled for; no obituary notice of him exists in the literature transmitted to us; and thus he passes from the limelight into the shade, leaving us destitute of all knowledge of the remaining years of his life.

His book, the title of which is given above, contains much which is of historical interest. It may not be generally known that around the subject of the operation for the formation of an artificial pupil, a controversy arose which was spread over many years. Cheselden, as has already been said, was the first in the field in 1735. But his operation, after having been received with acclamation both in this country and abroad, was destined to

fall quickly into disfavour. Ultimately it was abandoned, and it was not until fifty years later that his suggestion and practice again attracted notice. The principle of the Cheselden operation was approved, but the method was held to be defective. Then came a modification introduced by Wenzel; his revival of the subject led to a host of followers, among whom were Pellier de Quinsgy, Plenck, Janin, Beer, Gibson, Demours, Maunoir, and Scarpa. But the modifications advocated merely amounted to "tinkering" attempts to solve a simple principle; a principle, nevertheless, which to our forefathers presented a difficulty, owing to their mistaken convictions, based upon imperfect knowledge.

Then, amid this chaos of operative *technique*, Adams appeared on the scene with a "novel" operation. With the whole field before him, comprising the attempts of others to solve the problem which had proved so difficult, Adams nevertheless found a loophole by which he was able to render his "novel" operation distinctive. He revived the discarded, discredited method of Cheselden. This at once attracted attention, the more so as it was known that Adams had himself admitted failure with Cheselden's *technique*. He tells us that it occupied him nearly a year before it was possible for him to render Cheselden's operation feasible, satisfactory, and trustworthy. The defect in the procedure was the ill-adapted instrument by which the operation was performed. Cheselden employed a spear-headed knife, whereas the instrument necessary for the purpose was a "curved iris scalpel." This was the "novelty" which Adams introduced, by means of which his many successes were secured. In brief, this operation consisted of passing the special iris scalpel through the sclera, behind and then through the iris into the anterior chamber, and dividing two-thirds of the transverse diameter of the iris as the knife was withdrawn. Our forefathers admitted the peril of injury to which the lens and its capsule were exposed by the procedure. To pass a cutting instrument into the eye, between the iris and lens, and yet avoid injury to a transparent lens, would be conceivably hazardous. But Adams dismisses the matter quite lightly. "Should the lens or its capsule be injured," he writes, "there is no alternative than to remove them." Throughout his book he maintains the superiority of his operation. It is dovetailed into all the varying conditions in which the formation of an artificial pupil is indicated, and upon this basis, every other suggested operation for an artificial pupil is held to be objectionable. But Adams does not escape criticism. The gauntlet is thrown down by Scarpa.

Between Scarpa and himself vicious warfare ensued. The controversy is largely reproduced in the book, the virulence being mostly on Scarpa's side. In one passage he indirectly suggests that Adams is an "inexperienced oculist." Whatever may have

been the cause of the cleavage between these two contemporaries does not concern us, nor is it profitable to follow the devious ways by which each of them seeks to defend his position. Two final points may be referred to before concluding these references to Adams's last contribution to ophthalmic literature. The first is that Assalini apparently practised iridectomy upon the lines followed in the present day; and, secondly, that Adams reports three cases of conical cornea treated by extraction of the lens, by which "he restored good and almost perfect vision" to each patient. Adams, it is stated in the Surgeon-General's Catalogue, was born in 1760, and died in 1828. But whence this information was obtained I have failed to discover. His books show that he was a member of the Royal College of Surgeons.

This survey of the life of Adams places us in the position of venturing some conjectures, merely personal, upon the record which he has left us. Without prejudice it may be conceded that he was a skilful, if not a brilliant, operator; that his results were as he claimed them to be; that he possessed conspicuous powers of organization; that he was enterprising and displayed originality in his work; and, finally, that the position he attained was justified by his capacity and skill. Notwithstanding, however, all this, there remains the misgiving inspired by the action of his contemporaries towards him. That misgiving is emphasized by the fact that his reputation does not seem to have been in his favour. We may muse and speculate upon the reasons of this, and yet the solution would appear to be suggested by the criticisms already alluded to in his book on cataract, and by his works generally. He may have been a man whose spirit of science was submerged by his spirit of commercialism—a man by whom the dignity of science was exploited for commercial purposes, thus ostracizing him from communion with those who, rightly or wrongly, believed that in science there reigned a dignity with which commercialism can form no true alliance. His contemporaries may have withheld from him their esteem, in consequence of their disapproval of the means by which he accomplished his meteor-like and successful career. Of this, however, we have no certain knowledge—nor again, to us, does it matter much. Only in fairness, therefore, to Adams, it should be added that he achieved for British ophthalmology, a record in public recognition which must have materially contributed to its advancement. That is the point which mostly concerns us, his successors, and that is the point—whatever he may have been otherwise—which, above all, remains established to his credit.*

* It has been found impossible to include a portrait with this biography. After full inquiry at all available sources, no portrait of Sir William Adams appears to be in existence.