These cases of *peri- or retro-uterine hæmatocele*, as they are called, have only attracted attention of late years. Respecting the precise nature of the accident, all are not agreed, even as to the immediate source of the blood poured out.

The practical fact to bear in mind is that a suddenly occurring attack of profuse menstruation may be associated with this dangerous accident. The presence of uterine hæmatocele—that is, of the tumour constituted by the effused blood behind the uterus—is to be ascertained by vaginal and by abdominal examination. The tumour so formed is often of very considerable size.

The uterine hæmatocele is not, it must be recollected, the *cause* of the excessive menstruation. The cause of both the excessive menstruation and the uterine hæmatocele will be found, probably, in some predisposing general condition of the patient.

It is unnecessary here to describe in detail those *local conditions* here referred to, which may occasion *profuse menstruation*, because the conditions in question are all, almost without exception, capable of giving rise to discharges of blood at other times than the menstrual periods. Hence the *local causes* of *profuse menstruation* and the causes of *unusual loss of blood at other than the menstrual periods* will be conveniently considered together.

Most of the conditions with which these irregular hæmorrhages, of various degrees of intensity, are usually associated, are insidious in their mode of origin; profuse menstruation is generally the forerunner of these hæmorrhages, and arises from a similar cause.

A BLOODLESS AGE. "Stomachs and nerves, they say, are growing weaker as the world grows older. Railway travelling, and modes of life and speed of labour scarcely less rapid and exhausting, have reduced us to a condition of melancholy degeneracy compared to the robustness of our fathers. In old times, if men died, it was, so to speak, from excess of life and irregularities of strength. Fulness of blood, fevers, inflammations, apoplexies, carried them off. The lancet was in constant requisition, and the chief labour of a medical man was to prevent his patient from being too hale and hearty. At one time, men and women were bled—not for illness, but simply to repress their redundant vigour—once in the spring and once in the autumn of every year. They knew little or nothing of quinine and steel, and they shunned the seashore as poisonous. And such as their health was, such were their habits. We speak in tones of virtuous reprobation of their debauched and intemperate practices. It is no doubt a gain that we are freed from the dominion of such habits. But it is a cheap morality on our parts. We could not imitate their excesses if we tried. We make a virtue of necessity, and speak contemptuously of three-bottle men; but our dyspeptic, bilious, bloodless generation would no more be equal to indulging in three bottles of port at a sitting than to swallowing the glass that contains them. We live in what is delicately called an atonic age. Medical science is devoted constantly to the task of fanning into a sickly flame the sparks of life which are ever threatening to go out. Every disease is a disease of weakness; and almost every medical prescription harps upon bark, iron, stimulants, and change of air. Philosophers wonder that enthusiasm is dead in England, and that we have fallen upon a grovelling and materialistic age. But enthusiasm is the luxury of well-filled veins and healthy stomachs. A generation that lives on tonics has no strength left for superfluous sentiment." (*Saturday Review*.)

Illustrations

OF

HOSPITAL PRACTICE:

METROPOLITAN AND PROVINCIAL.

SOUTH STAFFORDSHIRE GENERAL HOSPITAL, WOLVERHAMPTON.

CASES OF STRICTURE OF THE URETHRA.

By VINCENT JACKSON, Esq., Resident Surgeon to the Hospital, and late House-Surgeon to University College Hospital.

THE following cases of stricture of the urethra I wish to record, on account of their proving the extreme usefulness of a plan of treatment not so generally adopted as it might be. In each and all, dilatation was effected by means of graduated metallic instruments. For my own part, I have been for a long time convinced that the best instrument, as a rule, to employ in these cases is a metal one. To a practised hand, the urethra can with it be more perfectly, more easily, and more safely explored, its condition determined, and the seat and orifice of a stricture most accurately learnt.

It appears to me that one of the great difficulties in curing tight strictures is, in many cases, that the orifice is situated at some point outside the urethral centre. When the aperture of entrance has been found, the future progress of the case is in the hands of the surgeon; and for this purpose I think no instrument equals the metallic one. Yet, with such an instrument as No. 4 (no larger than a large-sized needle), I admit that great delicacy and care is required in its manipulations; for, if the force used in its guidance be too great, a lesion of the mucous membrane is sure to occur. Still I do not regard this as in any way negating the employment of fine metallic sounds, but rather the reverse; for in these cases *arte non vi* ought never to be forgotten.

In one of the examples I record, I had extreme difficulty in finding the entrance to the stricture. I then resorted to a plan of treatment recommended by Mr. Henry Thompson of University College Hospital, which is, I am sure, of extreme utility. On the day when it is intended to attempt the passage of an instrument, the patient should be kept in bed, and desired to hold his urine for about two hours before the visit. A glass syringe, holding six drachms, should now be filled with olive oil, and injected into the urethra. When the syringe is removed, the passage should be well nipped, to prevent any escape. The instrument is then introduced, and carefully passed down to the stricture; and efforts are made to guide it into the bladder. Sometimes no success is obtained for a considerable time; but one case, in which an hour elapsed before the instrument reached the bladder, has emboldened me to persevere, provided the patient do not resist too much. These long continued attempts ought never to be thought of, if the previous history of the patient and the examination of his urine should lead one to suppose that the kidneys are extensively diseased; for it has fallen to my lot to see a man die twenty minutes after a No. 8 catheter had been passed into his bladder by a surgeon. The kidneys, at the *post mortem* examination, were found extensively diseased.

My set of stricture-instruments consists of six, and are thus constructed.

Number 1, made of silver, is hollow. These very

fine instruments always should be hollow ; so that, when we fancy we have reached the bladder, a drop or two of urine flowing through it will be an additional proof, as well as very satisfactory.

Number 1. Commencing as No. 1 catheter (Coxeter's scale), and graduated to No. 4.

Number 2. Commencing as No. 3, and graduated to No. 6.

Number 3. Commencing as No. 5, and graduated to No. 8.

Number 4. Commencing as No. 7, and graduated to No. 10.

Number 5. Commencing as No. 1, and graduated to No. 12.

These latter five are made of solid steel, and highly polished; and, as a means of measuring the distance of the stricture from the meatus urinarius, a scale of inches and half-inches may be marked on them. The cost of the whole set is little; but I think their usefulness is great.

CASE I. Traumatic Stricture of the Urethra: Previous Dilatation: Subsequent Contraction: Cure. R. H., aged 51, was admitted as an out-patient Sept. 20th, 1860, with stricture of the urethra. Sixteen weeks previously, he was discharged from the Hospital, having been admitted for a wound in the perinæum, produced by a fall in a fit, which had opened the urethra. Instruments were passed up to the time he left, as far as No. 8; and he was desired to attend occasionally as an out-patient. This he neglected to do; and, since his discharge, he had had increasing difficulty in micturition, until at last he could hardly pass urine at all. A surgeon had frequently made attempts to pass instruments, but had never succeeded. On his admission, there was considerable hardness in the perinæum along the line of the urethra, but very little pain on pressure. After considerable trouble, I passed No. 4. An alkaline sedative mixture was ordered to be taken three times a day, and a warm bath every other night. On Sept. 24th, he had had no rigors after the last attempts; and I again passed No. 4, and afterwards No. 1. On Sept. 27th, the stream of urine was improved. Nos. 1 and 2 were passed on this day, and again on October 1st. From this period the treatment was continued uninterruptedly and satisfactorily. A note on April 15th, 1861, says that No. 5 (equal to No. 12) was easily passed, there being no narrowing, nor any difficulty.

REMARKS. The graduated instruments were very efficient in this case; for not once was any inconvenience or pain complained of. This, I think, is to be entirely accounted for by their regular progressive form.

CASE II. Slight Organic Stricture: Retention of Urine several times previous to Admission: Cure. J. H., aged 31, was admitted April 30th, 1861. He was by occupation a labourer; and was married. He said that, seven or eight years previously, he had gonorrhœa twice. On both occasions he took medicine, and the discharge disappeared. About four years ago, he noticed that his stream of urine was smaller; and he passed water oftener, and was longer about it. After exposing himself or drinking, the difficulty was greatly increased. The stream of urine became very fine; and on August 15th, 1859, he had retention. Attempts were made to pass a catheter, but with no success; and at last he came to this Hospital, and Mr. Jackson passed an instrument, and thirty-two ounces of urine were drawn off. The stricture was situated five inches from the urethral orifice. He continued to attend as an out-patient until October 17th, when Nos. 10 and 11 silver catheters were easily passed.

On Jan. 1st, 1861, the patient presented himself, having had difficulty in passing urine for the last three days. His habits had been temperate. The bladder contained urine to some extent. I introduced No. 6 catheter after a little trouble, and drew off one pint

of urine. An alkaline aperient sedative mixture was given.

On April 16th, the patient again came, having had difficulty in micturating on the previous day. I passed No. 3 catheter, and drew off his urine. There was no perinæal nor prostatic pain. The bowels were free. On April 19th, I passed Nos. 2 and 3 graduated sounds. On the 24th, I passed No. 3 sound without difficulty; but during the night I was called up to see him. I found him unable to pass urine; and every now and then he had violent straining efforts to do so. A No. 3 catheter was passed. I advised him to become an in-patient; and he accordingly on April 30th was admitted. He was ordered to go to bed, and to have a warm bath, a dose of castor-oil, and the following draught three times a day.

R. Potassæ bicarbon. 3ss; sodæ potassio-tart. 5i; tinctur. hyoseyami ℞; aquæ ʒi. M.

May 3rd. He was now able to pass his urine more comfortably, and had had no retention since his admission. I passed a No. 3 graduated sound. On May 6th, I passed Nos. 3 and 4; and on May 9th and 13th, Nos. 4 and 5; and on May 21st, he was discharged.

Sept. 8th. The patient visited the Hospital. He was now quite free from all symptoms, and was looking well.

REMARKS. A considerable time elapsed before a satisfactory result was obtained; but, although the habits of the man were temperate, yet his occupation obliged him to expose himself much. There was generally a good deal of congestion about the urethra, as well as irritability of the canal.

CASE III. Very Tight Organic Stricture: Cure. T. Moore, aged 42, presented himself September 12th, 1859. He was a shoemaker, married, but had no family. In his youth he was intemperate, but latterly had not been so bad, though at times addicted to drinking. About twenty-five years ago he had gonorrhœa, and a gleety discharge continued for fifteen years afterwards. About five years ago he had gonorrhœa for the second time. Twelve months since, after a debauch, he had retention of urine; an instrument was passed; and he was relieved. Afterwards he had frequent desire to pass urine, and the stream was very small. On Sept. 12th, he came to me complaining that his urine ran from him. On examination, his shirt was found much wetted; but there did not appear to be much urine in his bladder, as ascertained by percussion over the pubes. There was no induration in the perinæum; no pain in the loins; and he had never had any. His general health was good. I passed No. 6 catheter along the urethra until it was arrested six inches from the orifice. I tried other and very fine instruments; but nothing passed. Aperient medicine was given, and a warm bath ordered. On Sept. 19th, the patient had passed urine better. He had no shivering after the last attempt. I was enabled to pass No. 4, and to draw off a little urine. From this point the treatment continued without any interruption; and on Oct. 10th he ceased to attend.

CASE IV. Retention of Urine: very tight Organic Stricture: Dilatation of Stricture up to No. 7 Catheter. R. Hadley, aged 51, married, a puddler, came Sept. 21st, 1859, with retention of urine. Four years ago he had gonorrhœa. A short time afterwards, he observed that the stream of urine was diminished. He had frequent desire to micturate by day and by night. For the last twelve months he had had severe lumbar pains. About eighteen months since, he had retention; and an instrument was passed. Since then the stream had become very small, and each attempt to pass urine was accompanied with much straining and pain. At present there was slight suprapubic prominence. The percussion-note was dull midway between the bladder and umbilicus. A well-marked hardness was felt in the perinæum along the urethra, but no pain. A No. 6 silver catheter

was arrested five inches from the orifice of the urethra. Smaller instruments, down to No. $\frac{1}{2}$, were used, but unsuccessfully. He was ordered to have a warm bath, and forty minims of tincture of opium immediately. In a very short time he was relieved. On Sept. 23rd, I was enabled to pass No. $\frac{1}{2}$ partly into the stricture. Alkaline purgative medicine was given. On Sept. 26th, the retention of urine had been relieved by the warm bath and opium. On October 3rd, a No. $\frac{1}{2}$ catheter was passed into the bladder; on October 6th, a No. 1; and on the 13th, Nos. 1 and 2. The treatment was continued for some time, until about No. 7 was passed.

I met him the other day; and he said he was quite free from his unpleasant symptoms.

CASE V. *Organic Stricture of the Urethra: Dilatation: Cure.* J. Ward, aged 30, was admitted April 11th, 1860, under Mr. Coleman, with ulcers on both legs. Shortly after his admission, he informed me, he had a bad stricture of the urethra. Six years ago he had gonorrhœa; and, about six months afterwards, he noticed the stream of urine to be smaller. Three years ago he had retention; and a surgeon passed an instrument for him. Twelve months since, retention occurred again, and he was brought to this Hospital; and many attempts, he said, were made to pass an instrument, but with no success. Leeches were ordered, and he was placed in a warm bath. Urine was passed in the bath. Eventually an instrument was passed through the stricture, and No. 5 catheter was reached; but beyond this nothing could be passed, although many efforts were made to do so. On April 17th, I passed No. 8 silver catheter into the urethra; and it was arrested five inches down. I then passed Nos. 4, 5, and 6 silver catheters. The treatment was continued with the graduated sounds, and No. 5 was at last passed.

CASE VI. *Retention of Urine from Congestion of the Urethra: Slight Organic Stricture: Cure.* Richard Brookes, aged 30, was admitted Nov. 30th, 1860, under Mr. Nesbitt. He was unmarried, by occupation a gas-fitter. The patient was suffering from retention of urine. The attack commenced a week previously. After he had been working all day in the wet, he went home, and found he was unable to pass urine. A surgeon saw him, and attempts were made by him and three others to pass a catheter; large and small sized silver and gum-elastic instruments being used. Eight years since, whilst living in Liverpool, he had gonorrhœa; and four years ago, after drinking freely, he had retention of urine. Eight months since, he contracted a second gonorrhœa; and since then he had noticed the stream of urine to be smaller, and had had to micturate oftener. At present he was in great pain; and the bladder was much distended, and the perinæum tender. I passed No. 6 silver catheter, and evacuated the urine. On December 1st, the patient had passed urine several times; but on each occasion he had felt great burning pain in the perinæum. A linseed-meal poultice was applied to the perinæum. On December 9th, he felt much better, and had no pain when he passed urine. I introduced No. 3 graduated sound. On December 12th, I passed No. 4 graduated sound. On December 13th, he was made an out-patient.

CASE VII. *Retention of Urine: Stricture of the Urethra: Dilatation: Cure.* James Stuck, aged 58, was admitted Dec. 13th, 1860, under Mr. Coleman's care. I could gather very little about the patient, as he was deaf and dumb. I made out, however, that retention of urine had lasted some days; a little water, however, now and then passed from the urethra. Frequent attempts had been made to pass an instrument, but with no success. After each attempt, blood flowed freely. The bladder was prominent above the pubes; and percussion was dull from the umbilicus downwards. The perinæum was tender; but no lump nor hardness was perceived. The prostate was enlarged, especially on the

left side; it was not tender. On passing a No. 8 catheter, it was arrested five and a quarter inches from the meatus. Smaller instruments were attempted, and at last I passed No. $\frac{1}{2}$; and, after gentle efforts for nearly half an hour, it entered the stricture, and passed on into the bladder. The urine flowed *guttatim*, the instrument being blocked up with ropy mucus. The catheter was tied in. On December 14th, the patient had been pretty comfortable. The urine flowed by the side of the catheter. I withdrew No. $\frac{1}{2}$, and passed Nos. 1, 2, and 3 silver catheters. He was ordered to take fifteen minims of tincture of hyoscyamus in an ounce and a half of infusion of buchu three times a day; and to have a hip-bath. On December 15th, he had a good deal of perinæal pain; and a linseed-meal poultice was applied. On December 27th, I passed Nos. 1 and 2, after a little difficulty with each. The urethra was very rough about the stricture. On December 31st, I passed No. 3 graduated sound. On January 29th, 1861, he was discharged quite well. No. 5 being easily passed.

CASE VIII. *Perinæal Abscess: Stricture of the Urethra (Traumatic): Cure.* John Rhodes, aged 43, was admitted March 4th, 1861, under Mr. Coleman's care. Twelve years ago he received in the perinæum a kick, which, from his statement, must have ruptured his urethra. He was treated by a surgeon, and attempts were made to pass an instrument; but none were ever passed into the bladder. The stream of urine soon began to diminish in size; and at last it became very small, and he had to micturate with great straining. About a week since, after great difficulty in passing urine, and having constantly to strain much, he felt a lump in the perinæum. Sometimes the swelling was larger than at other times; but it was not always painful on urinating. After evacuating his bladder, the enlargement decreased. There was now distinct evidence of a recent perinæal abscess; that is to say, there was great induration and swelling in the perinæum; and there was a small opening through which the urine occasionally passed. He had had no previous lumbar pain. I passed No. 8 silver catheter, and it was arrested six inches from the meatus. After a little management and care, a No. 1 graduated sound was passed. A linseed-meal poultice was applied to the perinæum, and the following draught ordered to be taken three times a day.

R. Potassæ bicarbon. 3ss; sodæ potassio-tartrat. ʒi; tincturæ hyoscyami mx; aquæ ʒi. M.

On March 8th, I passed No. 1 sound with difficulty, and left it in the bladder. On March 9th, the patient had had no shivering during the night. He made several attempts to pass urine. The instrument was withdrawn, and No. 3 graduated sound was passed. On March 10th, the patient had been very comfortable. He passed urine more easily, and in a large stream. I passed Nos. 3 and 4 graduated sounds. On March 24th, I passed Nos. 4 and 5; and on April 2nd, he was discharged.

CASE IX. *Retention of Urine: Spasmodic Organic Stricture: Cure.* J. Price, aged 56, was admitted June 1st, 1861, under Mr. Coleman's care. He was by occupation a labourer. He was married, but had no family. His habits were regular, on the whole. About twenty years ago, he had gonorrhœa, which, he said, "ran itself out". About six years since, he noticed that the stream of urine was decreasing; and from this time it gradually lessened. He never had retention before admission. He had had very little lumbar pain. Retention of urine had continued for eight hours; and instruments had been frequently employed, but with no success. I found that No. 8 silver catheter was arrested five inches and three-quarters from the urethral orifice. I tried other and smaller instruments, but I could not succeed. He was ordered to have a warm bath, and forty minims of tincture of opium immediately. He

was soon relieved. On June 15th, I passed No. 1 graduated sound (olive oil having been previously injected into the urethra). On June 18th, I passed Nos. 2 and 3 graduated sounds; and on June 26th, Nos. 2, 3, and 4. On July 2nd, he was discharged cured.

Transactions of Branches.

EAST ANGLIAN BRANCH.

IRIDECTOMY IN GLAUCOMA.

By SOELBERG WELLS, Esq., Savile Row.

[Read June 28th.]

BEFORE considering the treatment of glaucoma by iridectomy, permit me to glance at the symptoms of this disease. My excuse for doing so must be found in the fact, that cases are still occasionally spoken of as glaucoma, which are not glaucoma at all. Such errors in diagnosis can but bring the operation of iridectomy as a cure for glaucoma into undeserved disrepute.

Von Gräfe divides cases of glaucoma into three groups. I. The ACUTE. II. The CHRONIC. III. The CONSECUTIVE.

Premonitory Stage. About three-fourths of the cases of glaucoma are preceded by premonitory symptoms, which are often but slightly marked, and occasionally almost unheeded by the patient if his other eye be healthy.

There is a rapid and marked increase of any previously existing presbyopia. The patient complains of periodic obscurations or dimness of sight, which come on after meals or any violent exercise or excitement. He sees rainbows round a candle, the latter appearing to be surrounded by a bright blue halo. During these attacks he experiences more or less severe pain around the orbit and down the side of the nose. All these symptoms appear periodically. At first, perhaps, at intervals of weeks or months, but the more the disease advances the shorter do the intervals become, and when these attacks occur every day or every other day we must consider the outbreak of the second stage as imminent. During these premonitory attacks the pupil is generally somewhat dilated, the aqueous humour discoloured, the field of vision narrowed, the eyeball hardened.

These premonitory symptoms may exist for days, months, or years before the commencement of the second stage. Von Gräfe has mentioned a case to me in which, if I mistake not, they had existed for fifteen or sixteen years. Sometimes this stage passes over insidiously, almost imperceptibly, into chronic glaucoma.

I. ACUTE GLAUCOMA. The patient having passed several sleepless nights, is suddenly attacked, generally in the evening or at night, by a most excruciating pain in and around the eye and temples, which passes down the side of the nose. He feels often, also, exceedingly sick. Everything appears to be swimming in a sea of bright coloured light. Vision may be either much impaired or destroyed as at one *coup*. The eye is much inflamed. There is often a good deal of serous chemosis, which hides the deeper subconjunctival injection, and pink zone around the cornea. The latter is nebulous, and its posterior surface is often studded with small opacities, the aqueous humour is clouded, the iris pushed forward and discoloured, the anterior chamber small, the pupil somewhat, perhaps irregularly dilated. The eyeball abnormally hard, and the cornea perhaps slightly anæsthetic. We may also see that peculiar sea-green reflex from behind the pupil which used to be considered pathognomonic of glaucoma. This however, is an error, for we may have glaucoma without this reflex at all.

The latter is thus produced. Glaucoma generally attacks elderly people. Now, after the age of forty, the lens normally assumes a yellowish hue, and if the eye is attacked by glaucoma the cornea becomes clouded, the aqueous turbid and of a dirty bluish-gray tint, and this blue-gray mixing with the yellow of the lens causes the green reflex, which is the more marked as on account of the dilatation of the pupil more light is reflected from the lens, more particularly its periphery. That this explanation of the green reflex is correct may be easily proved by two facts. 1. If we tap the anterior chamber and let the turbid aqueous flow off, the green reflex disappears at once. 2. If a youthful eye is attacked by glaucoma this green colour is never seen, for at this age the lens is not yellow, in such a case the pupil therefore looks of a dirty bluish-gray colour.

The inflammatory attack may pass off after a few days, either spontaneously or after a course of anti-phlogistics, mercury, etc.; leaving the sight but little impaired, the anterior chamber remains perhaps a little small, the iris slightly discoloured, the pupil somewhat dilated, the field of vision perhaps narrowed. But the disease is not cured. Either the acute inflammatory attacks recur again and again, until vision is ultimately destroyed, or the disease insidiously progresses without any fresh inflammatory attack—the field of vision becomes narrower and narrower, the fixation perhaps eccentric, the subconjunctival veins dilated and tortuous, forming loops around the cornea, these were formerly called abdominal veins. The sclerotic becomes waxy white in colour, the eyeball harder, the cornea more and more anæsthetic, the iris discoloured, the pupil dilated and immovable, the aqueous and vitreous clouded. If the refracting media be sufficiently clear to permit us to see the fundus with the ophthalmoscope, we find that the optic nerve is cupped, and that there either is an arterial pulse, or that it may be produced by the slightest pressure on the eyeball. There are frequently also ecchymotic spots on the retina and choroid. There is generally no cupping of the optic nerve, or arterial pulse after the first acute attack, if it has not lasted too long. Sometimes there is no remission at all, the inflammation continues until the sight is permanently destroyed.

Von Gräfe considers acute glaucoma to be “a choroiditis (or irido-choroiditis) with diffuse imbibition of the vitreous body (and aqueous humour), and in which increase of the intraocular pressure, compression of the retina, and the well-known series of secondary symptoms, are produced by the increased volume of the vitreous humour.” (*Archiv. vol. iii, 2, 481; New Sydenham Soc. Transactions, vol. v, p. 363.*)

We sometimes meet with a subacute form of glaucoma, in which the inflammatory symptoms are all much diminished in intensity.

II. CHRONIC GLAUCOMA. The premonitory attacks become more frequent, the intervals between them shorter and shorter, until this stage passes often insidiously over into chronic glaucoma. There were, perhaps, no repeated inflammatory attacks, but the eye gradually attained the same condition, which it did in the acute form after repeated inflammatory attacks. But an eye suffering from chronic glaucoma may be seized with an acute inflammatory exacerbation.

In chronic glaucoma we find the eye hard, the subconjunctival veins dilated and tortuous, the sclerotic of a waxy white colour, owing to the atrophy of the subconjunctival connective tissue and diminution in the calibre of the subconjunctival arteries. The cornea is anæsthetic, and flatter than normally, the anterior chamber smaller, the pupil dilated and immovable; at a later stage, when the tissue of the iris becomes atrophied, the pupil is widely dilated, so that only a very narrow rim of iris is apparent. The iris is pushed forward, grayishly discoloured, and its fibrillæ obliterated. Excavation of the optic nerve shows itself at an early stage,