having secured for its next President so distinguished a representative of obstetric medicine as Dr. West. Dr. West's name is as familiar with us as a household word, and it is respected throughout the world where gynaecology is cultivated. To our new President I am personally indebted for the most unselfish services, during a period of severe illness and anxiety, which any one brother physician can render to another, and its recollections of these is always vividly before me. I can only say that, had I known Dr. West could have been persuaded to accept the Presidency of the Obstetrical Society at any earlier period, I would gladly have postponed my term of office until I could have had the advantage of his example and precept as my predecessor.

CASE OF ACUTE ARSENICAL POISONING FROM THE USE OF GREEN PAINT.

By JOSEPH FARRAR, L.R.C.P.Ed., Bradford.

A YOUNG man, aged 22, was taken very ill on the night of December 13th, 1876, with vomiting and purging, accompanied with pain in the abdomen of a colicky character, and so severe as to be best expressed by the word excruciating. Along with these conditions were great weakness and quickness of pulse (120), faintness, paleness of the face, pinched features, but with the eyelids somewhat red and puffy, and cold clammy perspirations of an intermittent nature. The tongue was raw-looking, with portions of its upper surface denuded of epithelium, sore to the touch, and somewhat enlarged in size. There was no lead-line along the gums.

For a few weeks previously, he had been ailing from an attack of enteric fever, attended towards its termination with congestion of the lungs, and he was now, during convalescence, amusing himself by making large Christmas cards, etc., which he painted with colours chiefly of a bright green; and not being aware of the subtle nature of the paints, and not being much accustomed to their use, he exercised none of the usual precautions adopted by the artisans of the trade to prevent the entrance of the materials into the system. On the contrary, his habits were such as to present the most favourable conditions for these poisonous substances to find their way into the economy; he neglected to wash his hands before meals. Beneath his finger-nails had accumulated large quantities of material, and he was in the habit of holding the brushes between his teeth; besides which, he worked long and energetically, without much intermission, in a room small and heated, which would be greatly improved if it could be ventilated. The green paint shown me was marked "*Poison, Scheele's Green*".

By way of treatment, the patient had a sinapism applied to the seat of pain, followed by linseed poultices as hot as could be borne. Internally, an astringent, containing tincture of opium, was given every hour so long as the diarrhoea and pain lasted, with half an ounce of brandy; the latter to be given more frequently if the faintness continued. His food was now to be chiefly milk, ground-rice, beef-tea with bread-crumbs, etc., administered in small quantities, frequently repeated.

The patient's condition at once improved. The vomiting and purging ceased, and, by next day, the astringent was stopped. Pain in the abdomen was still, however, complained of for six or seven days, its presence being intermittent, and the paroxysm often very severe, to allay which it was necessary to administer anodynes. After the second day, a mixture of iodide of potassium was given, with the view of eliminating any portions of lead which might also have been present in the system, from the handling of the other paints, etc. The patient is now recovered from the more immediate effects of the poison; his bowels, tongue, appetite, etc., normal, though weakness is still complained of, and slight feelings of uneasiness in the abdomen.

REMARKS.—The above is another in the long list of cases arising out of the use of arsenical colouring matters, and it suggests the question whether the manufacturers, or the vendors of such dangerous substances, should not issue with each portion sold, printed instructions regarding the subtle character of the poisonous material, and the great care necessary to be exercised during its manipulation. It is not sufficient to print the word "*poison*" on the containing vessel, as is evidenced by this case. As a rule, the green colours most pleasing to the eye, whether in paints, wall-papers, or other articles, are those containing arsenic as their colouring ingredient; a body which, though the very best as regards effectiveness, etc., is yet the very worst as regards its danger to those who happen to be within its influence.

CASE OF INTRATHORACIC TUMOUR (LYMPHO-SARCOMA) WITH SECONDARY DEPOSIT IN THE SUPRARENAL CAPSULE.

By BYROM BRAMWELL, M.B.,

Physician and Pathologist to the Newcastle-upon-Tyne Infirmary; Joint-Lecturer on Pathology in the University of Durham College of Medicine.

WILLIAM JONES, aged 30, labourer, was admitted into the Tynemouth Union Workhouse on October 28th, 1872, complaining of shortness of breath on exertion, cough, great emaciation, and debility.

Previous History.—Seven years ago, he had three or four small chancres, which were not followed by secondary symptoms. With this exception, he did not know what a day's illness was until January of the year in which he was admitted. He at that time caught cold while blasting rock in a cold damp tunnel, which was often full of gunpowder-smoke. He began to cough and spit; the expectoration at times was streaked with blood; he rapidly lost flesh, and, in the middle of April, was obliged to give up this work. He thought his cough was brought on by the inhalation of the gunpowder-smoke. He had been working off and on as a labourer until five weeks before admission. For the last five weeks, he had been confined to bed.

Condition on Admission.—His general appearance at first sight would lead one to suppose that he was suffering from renal dropsy. The face was puffed and swollen, especially about the eyelids. On more careful examination, it was seen that, instead of the characteristic pallor of Bright's disease, the face had somewhat of a dusky hue; the neck, too, was swollen, chiefly on the right side, above the clavicle. The slightest exertion made him, he said, "*wonderful short of breath*". He had a frequent short hard cough; the expectoration was scanty, consisting chiefly of saliva; his voice was husky; he spoke in a whisper. He complained of a dull boring sort of pain, much worse when he lay on his right side, between the superior internal angle of the right scapula and the spine. He was extremely emaciated; he said he used to be very stout and muscular. The right pupil was considerably larger than the left.

Respiratory System.—On inspection, the upper part of the thorax, anteriorly, was seen to be swollen; the clavicles did not stand out; there was pitting on pressure over the swollen part. Several large veins were seen coursing over this part of the chest; the right brachiocephalic vein was distended and stood prominently out. The left side of the chest did not expand even on full inspiration; the movement of the right side was normal. The left side, at the level of the nipple, measured during expiration an inch more than the right. Vocal fremitus was absent over the lower half of the left chest. On percussion, there was dullness anteriorly over the whole of the left chest; the dullness was absolute from an inch below the left clavicle. Transversely, the absolute dullness extended on the one side as far as the right border of the sternum; on the other, over the lateral region of the chest. Posteriorly, there was absolute dullness over the lower two-thirds of the left lung; over the upper third, the percussion-note was much impaired, the resonance being greatest in the suprascapular region and close to the spine. Together with the dullness, there was a feeling of great resistance. On the right side, anteriorly, there was absolute dullness over an area of the size of a hen's egg, about the second right costal cartilage. There was impaired percussion from the right border of the sternum to within two inches of the right nipple. Over the rest of the right chest, the percussion-note was, if anything, hyper-resonant. On auscultation, there were tubular breathing and increased vocal resonance over the upper third of the left lung, back and front. Over the lower two-thirds, the respiratory murmur and vocal resonance were absent. In the right infraclavicular region, the breathing was tubular; over the rest of the right lung, puerile respiration was heard. The respirations, when at rest, numbered eighteen per minute. The slightest movement made the patient feel very short of breath and brought on the cough.

Circulatory System.—There was marked pulsation both to sight and touch in the pit of the epigastrium. Dull heaving pulsation could be felt over the middle and lower sternal and left mammary regions. At the second right costal cartilage, there was well marked pulsation; it was more distinct and apparently not so deep-seated as the pulsation over the sternal region. On auscultation, the heart-sounds were loudly heard all over the front of the chest, most distinctly at the second right costal cartilage and over the lower half of the sternum. The sounds were normal in character. Posteriorly, over the whole of the left side and over the upper third of the right side, the heart-sounds were distinctly heard. Radial pulse 108, soft and weak; the right being very much weaker than the left.

Digestive System.—Hepatic dulness measured five inches, extending as high up as the sixth rib. He had great difficulty in swallowing: solids seemed to stick half way down, choked him, and caused him to make a grimace. He could not swallow liquids freely, as they made him cough. His appetite was poor; the tongue was moist, slightly coated. The bowels were constipated. His urine was normal. He slept badly, often dreamed, and woke in a fright. The skin was cool to the touch, smooth and moist. Temperature in the axilla, 99.3 deg. Fahr. His family history was very good. So far as he knew, none of his near relatives had died of consumption.

The Treatment consisted in the administration of—1. Plenty of good nourishing food, milk, beef-tea, and eggs; 2. Two ounces of wine and a pint of ale daily; 3. Seven grains of iodide of potassium in an ounce of infusion of gentian three times a day; 4. An opiate when required.

October 31st. He complained of tenderness, on pressure, over the sixth, seventh, and eighth left ribs in the line of the nipple. On auscultation, over the tender spot a pleural friction-sound was heard. The pupils were to-day equal.

November 2nd. Friction was now heard, chiefly with inspiration, over the whole of the lower half of the left chest. Below the right clavicle, a soft systolic murmur was faintly heard; no second sound could be perceived here. At the second right costal cartilage, both heart-sounds were heard free from murmur. Radial pulse, 114; respirations, 22.

November 5th. He spat a little blood to-day. He complained of great pain between the right scapula and the spine. He said his swallowing was worse. The right pupil was one-third larger than the left. The systolic murmur under the right clavicle was much louder, and was heard in the great vessels of the neck, in the left infraclavicular region, at the painful spot between the right scapula and spine (it was here very distinct), and for a considerable distance down each side of the spinal column.

November 8th. The œdema of the face was less; at the root of the neck on each side, small nodules about the size of peas could be distinctly felt.

November 18th. The absolute dulness on percussion now extended over the whole of the left chest and over the right side anteriorly to within two inches of the right nipple. The percussion-note was impaired as far as the nipple. (See Fig. 1.) The liver-dulness measured

Fig. 1.—Front of Thorax and Abdomen. The shaded portion shows the extent of dulness at an advanced stage of the case. The area of hepatic dulness is also shown. The larger asterisk (*) points to the position of the systolic murmur first heard; the smaller one (*) to that last heard. This murmur was very limited in area.

six inches and a half. The right radial pulse was imperceptible. The urine was normal.

November 25th. Superficial œdema of the front of the chest was greater. The glandular enlargement at the root of the neck was more distinct. The hollow between the left scapula and the spine was effaced; the scapula looked as if it were pushed backwards by the

swelling. Breathing and swallowing were very much worse. He was most anxious to have something done. My friend Dr. Page saw the case with me and agreed in thinking it advisable to puncture the left chest. This was done between the seventh and eighth ribs. More than a pint of thick matter was withdrawn. (The matter would not flow through the aspirator; a full-sized trocar was, therefore, introduced.) A probe passed through the wound was felt to come into contact with a solid body. On microscopic examination, the matter drawn off was found to consist of pus, blood, and much granular debris. He was ordered to be stimulated freely, and to have a mixture containing iron and quinine.

November 26th. He was sunken and collapsed. Radial pulse, 120; respirations, 36. Over the upper part of the left chest, there was a high tympanitic note, but no vesicular murmur.

December 4th. He spat up a quantity of thick white creamy-looking matter, which, under the microscope, was seen to consist of squamous epithelium-cells and small corpuscular bodies, round in form, granular, about the size of human red blood-corpuscles, on the addition of acetic acid, not resembling pus. In addition to the systolic murmur below the left clavicle, another murmur was now heard at a point two inches to the lower and inner side of the right nipple. This murmur was only heard over a very limited area; was systolic and very harsh in character.

December 14th. He was dying. The nurse saw he had been stuffing his fingers into his mouth and pulling at his throat, as if he wished to tear something away.

The *post mortem* examination was made twenty-six hours after death. The body was much emaciated; the face was slightly swollen; glandular enlargement was most distinct at the root of the neck. On opening the thorax, a solid mass of the size of a child's head (apparently, from its colour, the consolidated left lung) stood prominently out in the left mammary region; above and to the right of this, and situated immediately over the ascending portion of the aortic arch, was another solid

Fig. 2.—Semi-Diagrammatic View of the Thoracic Viscera from the front. A. Right Lung; B. Left Lung; C. Portion of Tumour situated over the Aortic Arch; T. Trachea; E. Right Internal Jugular Vein, which was distended by dense coagulum; F. Left Internal Jugular Vein.

mass, of the size of a large orange, of a pinkish-white colour. The upper lobe of the right lung was in contact with, and overlapped somewhat, the smaller nodule. The heart was pushed to the right side of the middle line, and was partly covered by the right lung. The left lung, adjacent portion of the parietal pleura, and the pericardium, were coated

with recent lymph. At the apex and base, the lymph was in layers fully half an inch thick. There was some foetid pus in the lower part of the left pleural cavity. The right lung was attached by old adhesions of some length to the anterior wall of the chest. The thoracic viscera were removed *en masse*. (See Figs. 2 and 3.) The tumour was

Fig. 3.—Semi-Diagrammatic View of the Thoracic Viscera from behind. The letters are the same as in Fig. 2. The aorta is seen.

made up of two great masses. The smaller, situated in the upper part of the chest, chiefly to the right side of the middle line, completely surrounded the aortic arch and origin of the great vessels, and was adherent to these structures. This portion of the tumour was in contact in front with the upper lobe of the left lung and a portion of the anterior wall of the chest; below, it was bounded by the reflected edge of the pericardium; above, it had made its way along the course of the great vessels into the neck. The superior vena cava and the veins forming it were embedded in the substance of the tumour. The right internal jugular vein was blocked up by a dense old coagulum. The lower portion of the tumour, situated chiefly to the left of the middle line, was, throughout the greater part of its extent, surrounded by the upper lobe of the left lung, which was, as it were, expanded over it. Anteriorly, it was also in contact with the heart and pericardium; posteriorly, with the aorta, oesophagus, spinal column, and a small portion of the posterior wall of the right chest. The portion of tumour in contact with the heart was made up of many small nodules closely packed together.

The lower lobe of the left lung was solidified, infiltrated with corpuscles of the same form and size as those forming the tumour. The bronchial tubes were enlarged and filled with thick yellow matter. The right lung was congested, especially at the base, but otherwise healthy. On opening the pericardium, the heart was seen to be small and kidney-shaped. The right border of the heart formed the convexity, the function of the left auricle and ventricle the concavity of the kidney. The under portion of the heart was pressed upon by the nodular portion of tumour already described. One nodule had inserted itself between the root of the aorta and the superior vena cava at its junction with the right auricle. The left ventricle was much atrophied.

Several large glands were found in the neck. The liver was much enlarged, congested, and rather fatty. The spleen was slightly enlarged. The left suprarenal capsule was the size of a large orange, of a pinkish-white colour, nodular on the surface, and of a brain-like consistence. The suprarenal vein was distended with the same matter

which formed the tumour. It was at least of the size of the renal vein and joined that vessel. On microscopic examination, the structure of this mass was found to be the same as that of the thoracic tumour. The right suprarenal capsule was considerably enlarged, but natural in structure. Both kidneys were enlarged, pale, and somewhat fatty; the right contained a large cyst. A gland of the size of a walnut was found attached to the pyloric end of the stomach. The brain and spinal cord were not examined.

On section, the thoracic tumour was of a delicate pink colour; in some parts of a brain-like consistency; in others, firmer. A white milky juice exuded from the cut surface. On microscopic examination, it was seen to consist of a corpuscular and a fibrous element. (Fig. 4.) The cor-

Fig. 4.—Microscopic appearance of the Tumour.

puscles, in size rather less than a human red blood-corpuscle ($\frac{1}{3000}$ th to $\frac{1}{4000}$ th of an inch), were of a granular appearance. Some of them contained bright refractive points. Their form was for the most part round. Some, when isolated, were seen to be surrounded with fine granular matter, which was prolonged into two delicate fibres, making the corpuscle resemble a delicate fibre-cell. The fibrous element consisted of blood-vessels, delicate fibres, and connective tissue. The fibres were for the most part arranged in bundles. The corpuscles adhered thickly to the surface of the fibres; the delicate process of a corpuscle was in several instances seen to be continuous with the delicate fibre of a bundle. Masses of corpuscles were also seen lying between the bundles of fibres. Bundles of fibres often diverged, as it were, from a common base. In places, the corpuscles were grouped together in strings, with fibrous tissue intervening.

REMARKS.—The diagnostic points of this case were most interesting. When first seen, the patient's general appearance was that of renal dropsy; but the state of the urine, the venous engorgement, and the physical signs derived from the examination of the chest, showed that obstruction to the venous circulation at the root of the neck was the cause of the oedema. What, then, was the nature of this obstruction? Was it due to a solid tumour or an aneurism, complicated with copious effusion into the left pleural cavity, the left lung being compressed upwards and adherent to the upper part of the anterior wall of the chest? Either would explain the physical signs and symptoms. The points in favour of a solid growth were:—

1. The early history of the case; viz., the hæmoptysis, cough, and progressive emaciation.
2. The absolute character and great extent of the dullness, the presence of tubular breathing and increased vocal resonance, and the absence of all moist sounds in the left infraclavicular region.
3. The extensive area over which the heart-sounds could be heard.
4. The extreme state of emaciation, which was anterior to the dysphagia.
5. The great venous engorgement and superficial oedema, though sometimes seen in aneurism, were much in favour of a solid growth. Stokes, in his work on *Diseases of the Heart and Aorta*, lays great stress upon the so-called "tippet-like" swelling at the base of the neck as a diagnostic of intrathoracic tumour. He states that this form of swelling is more characteristic of cancer than of aneurism.
6. The absence of erosion of the thoracic walls.

The physical signs in favour of aneurism complicated with copious effusion into the left pleural cavity were:—

1. The dullness on percussion and well marked pulsation over the

aortic area (the second right costal cartilage), and the superficial character of the heart-sounds over this dull area.

2. The dullness on percussion, absence of respiration, vocal resonance and fremitus over the lower two-thirds of the left chest.

3. The great displacement of the heart.

4. The much greater frequency of aneurism than of solid growth.

5. The constant pain of a boring character at one localised spot.

The pressure-signs, viz., the difference in the strength of the radials, the difference in the size of the pupils, the character of the cough and of the voice, and the dysphagia, were equally in favour of aneurism or of tumour. The absence of murmur (I am now speaking of the case as first seen) was rather in favour of aneurism than of tumour, many of the best authorities stating that, in aneurisms of the thoracic aorta, uncomplicated by cardiac valvular lesion, murmur is more frequently absent than present. Stokes, speaking of the differential diagnosis of intrathoracic cancer and of aneurism, says: "If we suppose a case in which the evidence on both sides were equally balanced, the existence of a soft single systolic bellows murmur should incline our opinion towards cancer. Bellows murmur in aneurisms of the arch is a more rare circumstance than has been supposed." The character of the murmur, when it did appear, was in favour of a solid growth. The murmur was single, systolic, of long duration, and *not followed by the second sound*.

Taking all the physical signs into consideration, the balance of evidence, when first seen, was to my mind in favour of solid tumour complicated with copious effusion into the left pleural cavity. The subsequent progress of the case, the increased oedema at the root of the neck, the gradual progressive displacement of the heart, the appearance of the infraclavicular systolic murmur, the obliteration of the right radial pulse, the appearance of a friction-sound over the lower half of the chest, the glandular enlargement at the root of the neck, and the feeling of a solid body by the probe when the thorax was punctured, showed conclusively the presence of a solid tumour within the thorax.

The Nature of the Tumour.—To the naked eye, it exactly resembled encephaloid cancer. On microscopic examination, it was found to be a lympho-sarcoma. The greater part of the tumour evidently consisted of enlarged bronchial glands. The nodule over the aorta corresponded in position to the remains of the thymus gland, an organ which is frequently the seat of these growths. The large size of the tumour is noteworthy. Its position in the thorax and its relation to the various structures fully explain the symptoms and physical signs seen during life. It is somewhat remarkable that, when at rest, there was little or no increase in the frequency of the respirations. The slightest exertion, however, made the patient very short of breath. The condition of the suprarenal capsule was a remarkable feature of the case, and tends to show the close physiological relation which these organs have to the lymphatic glandular system. The absence of pigmentation of the skin proves that all forms of disease of the capsules are not necessarily attended by bronzing. The case mentioned by Sir William Jenner at a meeting of the Pathological Society of London, in which there was pigmentation, the capsules being healthy, but the solar plexus injured by a mass of enlarged glands, confirms the opinion of Quekett, that the discoloration of the skin depends upon modifications in the solar plexus, and that the frequent occurrence of disease of the capsules with bronzing is accounted for by modifications induced in the solar plexus through the numerous filaments which supply these organs.

The early history of the case favours the idea that the disease originated in the thorax, and suggests the supposition that the enlargement of the bronchial glands was due to irritation, the result of inhalation of gunpowder-smoke.

A CASE OF LITHOTRITY WHERE NITRIC ACID INJECTIONS WERE EMPLOYED.*

By REGINALD HARRISON, F.R.C.S.,
Surgeon to the Liverpool Royal Infirmary.

THE solvent action of nitric acid upon the *débris* of a phosphatic calculus was well illustrated in the following case, which in many respects is similar to one recorded by the late Mr. Southam of Manchester, and alluded to by Dr. W. Roberts in his *Observations on the Solvent Treatment of Phosphatic Calculi*. (*On Urinary and Renal Diseases*, second edition.)

William C., a police officer, aged 45, was admitted into the Liverpool Royal Infirmary, under my care, on March 9th, 1875. The

patient had recently been under the observation of my friend Dr. J. S. Clarke, who, having diagnosed the existence of a stone in the bladder, advised his admission into the Infirmary.

Upon examination, I found a single stone, rounded and having a diameter of two inches and a quarter. The urine was alkaline, and contained pus. Though the stone was large, I deemed the case not unfavourable for lithotripsy. The patient required some preparatory treatment, and I was not able to commence lithotripsy till April 5th. I repeated the crushings during April and May twelve times.

The patient never experienced any unfavourable symptom, and a very considerable quantity of broken-up stone was passed. As in Mr. Southam's case, to which I have alluded, it appeared to me that fresh phosphatic depositions were taking place almost as fast as the others were removed. I resolved, therefore, to use nitric acid injections.

On May 27th (two days after a crushing), I had the urine of twenty-four hours' collection. This was analysed by Dr. J. Campbell Brown, who gave me the following report. The quantity of urine submitted to analysis was sixty ounces; this was found to contain 74.029 grains of phosphoric acid as alkaline earthy phosphates; 250.516 grains of phosphoric acid as alkaline phosphates; in all, 324.545 grains of phosphoric acid passed in twenty-four hours. On the termination of this twenty-four hours, I injected into the bladder half a pint of tepid water with two drachms of diluted nitric acid.

All the urine passed during the subsequent twenty-four hours was kept and analysed by Dr. Brown, with the following result. The quantity of urine submitted to analysis was seventy-eight ounces; this was found to contain 96.237 grains of phosphoric acid as alkaline earthy phosphates; 461.94 grains of phosphoric acid as alkaline phosphates; total, 558.177 grains of phosphoric acid passed in twenty-four hours.

Thus it appears that not only was a larger quantity of phosphate of lime and magnesia dissolved in the urine after treatment with nitric acid, but there was a still greater increase in the quantity of phosphoric acid passed in the form of alkaline phosphates. It is to be noticed that the quantity of urine on the day after treatment was greater than on the day before; and that, if, instead of estimating the total phosphates, we estimate the percentage of phosphates in the urine, we find that the percentage of alkaline earthy phosphates was very nearly the same after as before treatment, namely, increased from 0.272 to 0.282, and that the percentage of alkaline phosphates was increased from 0.95 to 1.35. But the absolute increase of phosphates is much more marked.

On nine subsequent occasions, the lithotrite was employed, and, on every second or third day afterwards, the bladder was injected as before with nitric acid in tepid water. Further observations, though made in a rougher manner, showed the increase of the alkaline phosphates after each injection; it was also noticed that the fragments passed were much more finely triturated than previously.

Under this treatment, the patient made a good recovery and left the infirmary quite well on June 21st. The total quantity of broken-up stone collected weighed four drachms. The use of the acid appeared to me at once to stop any further deposition of phosphates, and to facilitate the removal of the pieces as they were broken up by the lithotrite.

Dr. Roberts concluded his observations on Mr. Southam's case with the remark (*op. cit.*, p. 313): "This method is evidently capable of wider application than is now made of it by surgeons."

CASE OF SUICIDE BY HYDROCYANIC ACID.

By JOHN W. TRIPE, M.D.,
Medical Officer of Health and Analyst for the Hackney District.

THE following case of suicide by hydrocyanic acid having been under observation almost from the moment of the poison being taken until death occurred, and some minutes having elapsed before any symptoms were observed, as well as some acts of volition having been performed during that period, I consider it to be of sufficient importance to justify me in bringing it under notice.

In the early part of July, I was called at about 9.15 P.M. to see D. A., who was said to be dying from poison. On my arrival at his house, which was nearly opposite to mine, I found him sitting in a chair supported by two persons, gasping for breath, with his mouth wide open, eyes prominent and glistening, and his pupils slightly dilated and insensible to light. The skin was clammy, the fingers contracted, the muscles of the arms relaxed, the pulse scarcely perceptible, and the lips as well as the tongue purplish. There was a strong smell of prussic acid in his immediate vicinity, and his breath

* Read at Southport before the Lancashire and Cheshire Branch.