Medical Chronicle, v. 5. # 2, July 1857.



LONDON AND PARISIAN HOSPITALS.—"From an interesting report of the Committee of Beneficent Institutions, it appears that London and Paris present a striking contrast in the methods which they adopt for affording relief to the sick poor. In London, a great part of our medical relief is dispensed at the houses of the poor themselves by the physicians and surgeons attached to our dispensaries. In Paris, on the contrary, comparatively little relief is afforded otherwise than in the hospitals themselves. Thus, in the year 1853, the number of in-patients in hospitals in Paris amounted to no less than 91,754, against only 45,808 in hospitals in London—this calculation, in the case of London, being exclusive of patients treated in workhouse infirmaries. But, on the other hand, under the system of out-door medical relief recently set on foot in Paris, 102, 472 persons received gratuitous attendance, against upwards of 600,000 patients similarly relieved in London. The nearest approach to a fair comparison between London and Paris which it seems possible to make is that afforded by a statement of the sums contributed by the medical charities and poor-rate taken together as follows: In London, income of medical charities and poor relief, £1,150,900,; in Paris, expenses of l'Administration Générale, £560,853."

## CORRESPONDENCE.

### A STUDENT'S LETTERS.

### No. I.

In penning these few lines I may commence by stating what is a student's best plan, when he intends leaving Montreal to spend a short time in the Metropolis of England. He will find no trouble in travelling between the two places, as every thing will be found quite comfortable, particularly on board the ocean steamers. When arrived at his destination he must decide upon what branches he is to follow, and as he has already fully studied the four primary branches, Anatomy, Physiology, Chemistry and Materia Medica, and also, most probably, the final branches likewise,—I think the best plan (which I have myself followed) is to attend those lectures that are not given as a separate course in Montreal, viz:—Botany, Pathological Anatomy, the use of the Microscope, &c., as taught in the lectures on Practical Physiology and Histology, Practical Chemistry, and if he thinks fit Comparative Anatomy, and the lectures on the Eye. There will still be plenty of time to attend the Hospitals, which is the great aim, even when attending a requisite number of the preceding lectures, which I may state "en passant" are only delivered in London during the months of May, June and July.



The best way to accomplish thi
of the *Lancet* which will give th
delivery, and price of each, in th
Metropolis. He can board in two w
is very expensive, or by taking a
from 14s. to 20s. a week, well f
then get meals at an eating hous
the part of the city he may be
many live here, and they find it

A word as regards Hospitals.
the different hospitals every day
greater number he will have a cl
of four. It will be found difficult
at any of the hospitals for less th
pay 10 guineas, and the same
separately, or 15 guineas for both
dents come here to see Practice
more than two or three months,
hospital in particular, as in that
confined to that one alone; but
there appears to be no restriction
termed.) If you mention that y
with every respect; you by this
purpose you come here. I, for
five hospitals in the week, and y
the one at 1, the other at 2 o'clo
two cases, and very often three, f
attended.

I shall make a few remarks o
blished at Montreal, viz:—Prac
shall describe it as taught by Dr.
subjects treated of are—The str
of the body. The changes whi
states most commonly met wi
fluids, viz:—blood, bile, urine,
mental physiology, such, for ins
of the ovum by artificial incub
with a microscope and apparat
his command when he wishes it,
which is always open. Each
of an inch, and two eye glasses,

The best way to accomplish this object is to get the student's number of the *Lancet* which will give the names of lectures, days and hours of delivery, and price of each, in the 13 different Medical Schools of the Metropolis. He can board in two ways, either by staying at an hotel, which is very expensive, or by taking a suit of apartments which he will get for from 14s. to 20s. a week, well furnished in every thing requisite, and then get meals at an eating house, where he finds it handy according to the part of the city he may be in. This is the manner in which very many live here, and they find it most convenient.

A word as regards Hospitals. There are operations here at some of the different hospitals every day in the week, except Sunday, and in the greater number he will have a choice of two or three, and on Saturday of four. It will be found difficult to get a ticket for the surgical practice at any of the hospitals for less than six months, and for which he will pay 10 guineas, and the same sum for the medical practice, if taken separately, or 15 guineas for both. My view of the case is that as Students come here to see Practical Surgery, not generally stopping for more than two or three months, it is the better plan not to attend any hospital in particular, as in that case the operations you see would be confined to that one alone; but to see operations chiefly every day, as there appears to be no restriction about attending the theatre (as it is termed.) If you mention that you are from Canada you are received with every respect; you by this means see practice, and it is for this purpose you come here. I, for the most part, attend the operations of five hospitals in the week, and you may frequently attend two in one day, the one at 1, the other at 2 o'clock, P. M. You seldom see less than two cases, and very often three, four and five, at each hospital, generally attended.

I shall make a few remarks on a class which I think should be established at Montreal, viz:—Practical Physiology and Histology, and I shall describe it as taught by Dr. G. Harley, University College. The subjects treated of are—The structure of the healthy tissues and organs of the body. The changes which the textures undergo in the diseased states most commonly met with. The chemical examination of the fluids, viz:—blood, bile, urine, milk, &c. And demonstrations in experimental physiology, such, for instance, as an illustration of the development of the ovum by artificial incubation, &c. Each student is furnished with a microscope and apparatus for which he is responsible, and it is at his command when he wishes it, but he must remain in the lecture room which is always open. Each microscope has two powers, 1 inch and $\frac{1}{4}$ of an inch, and two eye glasses, giving powers of 40 and 220, or 80 and

350 diameters. Each student is required to draw what he sees before him in the field of the instrument, and the sketch is corrected, if wrong, when the Professor comes round. I may state here "en passant" the best way to examine crystals with the microscope. Take crystals not too large for the field of the glass, place them on the glass plate, and a drop or two of a liquid, water will not do as it dissolves them generally. The best fluid by far is the saturated mother water from which they have been formed, or a liquid in which they are insoluble, then put the small thin glass cover over it, and use the lowest power to commence with, and then gradually pass to the highest. By this means you find which power answers, best for your particular specimen.

I shall conclude this communication with a few words on the following simple experiment, which I saw at our practical physiological lectures and can be performed by even the most unskilful hand without difficulty, and will serve to print on his memory several facts in physiology, (which are in general thought only to be proved by those men who devote all their time to such pursuits,) more firmly than weeks of reading. It shows, 1st. That the liver, as proved by Bernard, has the power of forming sugar, when only animal food is taken. 2nd. That what we see in certain diseases, viz., venous regurgitation, is only an exaggeration of a natural phenomenon, existing both in arteries and veins. 3rd. That the pause in the contraction of the heart is between the two contractions of the auricle and ventricles, and the next two following. 4. How sudden the action of the auricles is compared to the ventricles; their very sudden contraction and dilatation, and continued dilatation, and also for what a long time they keep up their action after cessation of either ventricle. 5. How irritation of the phrenic nerves causes contraction of the diaphragm, and when they are cut in two, that irritation of the distal extremity causes contraction, and when the central is touched no effect is produced. 6th. The lacteals conveying the chyle towards the receptaculum and passing through the glands. 7. How the vermicular motion of the intestines is carried on during life, and after this has been observed if you irritate one part, it will cause action through nearly the whole length of the canal; also how the action of the distinct sets of muscular fibres proceeds separately, one contracting the circular dimensions more than half, and then the tube appearing to grow shorter when the longitudinal fibres act. The intestine itself becoming quite rigid. 8th. The particular action of these sets of fibres in the large intestine. 9th. The natural movements of the stomach, and that irritation does not produce so sudden effects as in the intestines, but very slow first, one set of fasciculi and then another, shortening until every irritated fibre is contracted, and



then again slowly relaxing, if t
the duodenum or commenceme
the excitement and the fibres of
I may also state that you ca
other circumstances may be not
mentioning.

Take a puppy of about o
experiment mentioned, be sur
diet. It must be sacrificed by p
mon flat pointed awl, if no bett
cipital protuberance, care must
brain, and when it has passed t
laterally across the canal, so tha
instantly, but all the extremities
tion, and to stop this if you th
canal, and destroy the chord wh
assistant take hold of the fore, a
the animal by a longitudinal inci
must be taken not to wound the
their natural motions so well; th
expose the heart, and in doing so
muscle, when you cut the pectoral
the heart still acting naturally, and
described under sections two, thre
traction the impulse is communi
which being done you may perfor
nerves if the diaphragm be not t
be with care in manipulating. I
see the lacteals, as little white ves
I may state, however, to do thi
shortly after taking a full meal.
watch the intestines closely to s
and their several movements. T
the stomach, by proceeding in th
action. Now as to the first ex
vein to test the portal blood for
organ into very small pieces, or
hand full of boiling water, then
this means you get a colorless s
when it was added, and then bo
dissolved out, with the blood pr
apply the tests.

then again slowly relaxing, if this be performed near the pyloric orifice; the duodenum or commencement of the intestine will quickly act from the excitement and the fibres of the stomach not for some time afterwards. I may also state that you can find sugar in the urine likewise, that other circumstances may be noticed, but they are not worth the while mentioning.

Take a puppy of about one month old, and to prove the first experiment mentioned, be sure that it has always fed on an animal diet. It must be sacrificed by pithing, namely, put the edge of the common flat pointed awl, if no better instrument be at hand, behind the occipital protuberance, care must be taken not to direct it towards the brain, and when it has passed through the medulla oblongata, work it laterally across the canal, so that the medulla is divided, the animal dies instantly, but all the extremities are moved convulsively from the irritation, and to stop this if you think fit direct the instrument down the canal, and destroy the chord when they cease. This being done, let an assistant take hold of the fore, and another the hind legs, and open up the animal by a longitudinal incision from the neck to the pubis. Care must be taken not to wound the intestines, because if so you cannot see their natural motions so well; then open the chest as is usually done, and expose the heart, and in doing so you will see the natural contractility of muscle, when you cut the pectoral muscles. Having done so, you will find the heart still acting naturally, and by examination will perceive what I have described under sections two, three and four, namely, that during the contraction the impulse is communicated to the arteries and veins. &c., &c., which being done you may perform experiment 5 by irritating the phrenic nerves if the diaphragm be not too much injured, as it is not likely to be with care in manipulating. By looking closely you will be able to see the lacteals, as little white vessels resembling nerves and quite distinct. I may state, however, to do this the animal should have been killed shortly after taking a full meal. Next do as stated in 7 and 8, but first watch the intestines closely to see their natural actions of contraction and their several movements. Then part 9 can be performed as regards the stomach, by proceeding in the same way, first watching the natural action. Now as to the first experiment with the liver, tie the portal vein to test the portal blood for sugar, likewise if you choose cut the organ into very small pieces, or bruise it in a mortar, have a dish at hand full of boiling water, then add the liver when thus prepared, by this means you get a colorless solution, whereas if the water were cold when it was added, and then boiled, all the coloring matter would be dissolved out, with the blood proceed in a similar way. Then filter and apply the tests.

I will just say a few words about their application. Have the test tube about one-third or one-fourth full, and boil the top of the fluid, first by applying the heat at the surface, by this means you can see the change produced by heat as compared to it primitively, which at the bottom of the tube will not yet be in the least acted on. This is the better way undoubtedly, because when the colors may not be very marked you will not be able to detect slight changes, so readily when the whole contents are boiled at once. You may then boil the whole if you choose. Treat the urine in the same way by the liq. potass. or liq. potass. and sulphate of copper, but only add a few drops of each in either case. It does not require any previous preparation, except taking care that no blood gets mixed with it, when removing the bladder. I forgot to state that a few drops of acetic acid should be added to the boiling water, before the liver is added to neutralize any alkali which it may contain, but take care not to add too much, or it will dissolve out coloring matter.

A. R.

London, England, 29th May, 1857.

---

## HOSPITAL RETURNS.

**Monthly Return of Sick in the Marine and Emigrant Hospital, Quebec, from the 30th April to the 3rd June, 1857.**

| | Men. | Women. | Children. | Total. |
|---|---|---|---|---|
| Remained | 11 | 15 | 2 | 28 |
| Since admitted | 95 | 8 | 3 | 106 |
| | 106 | 23 | 5 | 134 |
| Discharged | 34 | 15 | 2 | 51 |
| Remaining | 72 | 8 | 3 | 83 |

DISEASES.

| | | | |
|---|---|---|---|
| Fever | 2 | Ulcers | 1 |
| Inflammation of lungs | 4 | Wounds | 1 |
| Inflammation of liver | 2 | Contusions | 9 |
| Dyspepsia | 1 | Ophthalmia | 2 |
| Rheumatism | 10 | Pregnancy | 3 |
| Dysentery | 3 | Feb. Intermit | 3 |
| Small Pox | 1 | Subluxatio | 1 |
| Cynanche | 2 | Hypochondriasis | 1 |
| Diseases of skin | 3 | Hypertrophy heart | 1 |
| Inflammation of testicle | 1 | Scarlatina | 6 |
| Syphilis | 23 | Catarrhus | 6 |
| Fractures | 2 | Periostitis | 1 |
| Abscess | 10 | Phthisis | 1 |

C. E. LEMIEUX,
*House Surgeon.*