

Gazette, on page 73. The question I asked in the June number of 1925 was:—Is there a puerperal fever in which the bladder and urinary passages alone are infected, the uterus being normal and sterile? I believe I have seen two such cases in India. If the answer is, yes, then it is clearly a contingency for which obstetricians should watch, as it is probably both preventable and curable.—Yours, etc.,

G. T. WRENCH, M.D., B.S. (Lond.).

VICTORIA ROAD,
KARACHI,
20th February 1926.

GLYCOSURIA IN LEPROSY.

To the Editor, THE INDIAN MEDICAL GAZETTE.

SIR,—I read with interest the statement of P. S. Srinivasan in regard to glycosuria in leprosy. In my last year's work among lepers of all types I have not found it more common than among an equal number of ordinary dispensary patients, and then in all probability it was due to a coexisting diabetes mellitus. However it would seem possible that there could be a leprosy diabetes due to infiltration of the pancreas.

The results obtained by Dr. Srinivasan were obtained with Fehling's solution which is remarkably unreliable as a test for sugar, but like many other unreliable things it takes a long while before they are no longer used. Fehling's solution is not stable and besides a reaction with glucose it also reacts with conjugate glycuronates, uric acid, nucleoprotein, homogentisic acid, phosphates of the alkaline earths and with creatinine. Thus when positive reactions are obtained it is difficult to know to what they are due. The strong alkalinity of Fehling's solution has a tendency to destroy some sugar which if present in small amount may thus escape detection entirely.

The solution which we use and which we have introduced into Chandkuri Asylum is Benedict's. It detects smaller amounts of glucose, as little as 0.015 to 0.02 per cent., and it does not deteriorate on long standing. There is no troublesome mixing of solutions prior to use, it is always ready.

The test is very simple and the solution is made up as follows:—

Copper Sulphate	..	17.3	gms.
Sodium citrate	..	173.	gms.
Sodium carbonate (anhydrous)	..	100	gms.
Distilled water	..	to 1000	mils.

The citrate and carbonate are dissolved by heat in 600 c.c. of water, filtered if necessary. The copper sulphate is dissolved in 100 c.c. water and made up to 150 c.c. The first solution is then placed in a jar or beaker and the copper solution slowly added while stirring constantly. The solution is now ready for use.

To apply the test:—

Five c.c. of Benedict's solution are placed in a test tube and to it are added exactly eight drops of the urine to be tested. Boil for one or two minutes and cool spontaneously. If glucose is present the solution will be filled with a red, yellow or green precipitate depending on the amount present. If none is present the solution remains clear with color unchanged. When one gets a positive test with this test he is sure that it is due to glucose.

It would be interesting if Dr. Srinivasan would check his findings by using Benedict's solution in place of Fehling's.—Yours, etc.,

MILTON C. LANG, M.D.,
Medical Superintendent,
Chandkuri Leper Asylum.

BAITALPUR, C. P.
VIA BHATAPARA, B. N. RY.
2nd March. 1926.

THE GENERAL PRACTITIONER AND MEDICAL RESEARCH.

To the Editor, THE INDIAN MEDICAL GAZETTE.

SIR,—Within recent years the idea is gaining ground amongst the general practitioners in India especially (with a few exceptions) that medical research is the special prerogative of a few isolated laboratory workers; and that the "g. p." has absolutely nothing to do with it. Some of them even go a step further and say that it would be presumptuous on the part of a general practitioner to talk of medical research. It is this idea, I think, that is mainly responsible for the present secession of general practitioners from medical research. It is a matter for regret that none of such medical men have ever considered the consequences of their actions. It is to correct this prevalent wrong notion that the following few lines are penned.

True it is that certain kinds of research call for the highly skilled specialist but the general practitioner can do a lot with his observant eyes. I think that he has to bear the lion's share of the burden. The specialist can work only through a particular line of action but multifarious are the lines of action for the general practitioner. He has greater opportunities for research than an isolated laboratory worker who depends for his clinical material upon his brothers, the "g. ps." It is only after they have by their accurate clinical observations separated a disease as a distinct entity from a host of other homologues that the laboratory worker begins to apply his weapons of refining and perfects the finding. Without the material how could the laboratory worker work? To put it in another way the general practitioner has to take the initiative, find out something new by his clinical observations and arrive at certain conclusions based upon all the observed facts; then his "specialist" brother comes to his assistance and with his delicate appliances investigates and either corroborates the findings of the clinician or proves that they require to be corrected or modified by further observations. Thus it is seen that the specialist and the general practitioner have to work in collaboration with each other, the one supplementing the other.

To give an instance of how a general practitioner can assist his brother "specialist":—he can observe the incidence of a particular disease in a particular region, or season or climate, its occurrence in relation to the environment—housing, food, water, air, or social conditions of life, its prevalence in a particular community or class, the different clinical manifestations of the same disease in different individuals at the same or different times or in different regions, or the constancy in the clinical manifestations of the disease whichever region or climate it occurs in, and can give suggestions as to the possibility of its being an infection, or an intoxication or an aberration of the metabolism, as may reasonably be inferred from the observed clinical data; and also suggestions as to the possibility of a particular channel of transmission, and the avenue which the specialist has to explore with his arms and ammunitions of laboratory apparatus and reagents.

The practitioner cannot even stop here. He has to follow his brother the "specialist" throughout his journey and cheer him up when he has to ascend the hills that may be on the way, or even suggest to him an alternative route, and finally when the formidable enemy has been caught to put the results of the hard labours of the specialist to the crucial test of clinical application and give his verdict.

He has to watch with patient eyes and try to assist his brother the specialist in the laboratory with fresher materials to work with. The general practitioner can no longer afford to shut his eyes and keep himself aloof from his brother the specialist. He has to come forward to bear his legitimate share of the burden.

Can the general practitioner himself take the initiative in research? Yes,—he can,—with wonderful results—

if properly carried out. As an instance of what the observant eyes of the general practitioner can accomplish, I may point out "the magnificent work on heart disease" of the late Sir James Mackenzie, to quote Colonel Megaw. The field of the laboratory worker is limited, whereas that of the general practitioner is very wide.

The great father of medicine, Hippocrates had no microscope nor electric centrifuge, but marvellously enough he has bequeathed to us a wonderfully accurate clinical description of the diseases that decimate mankind; and he was able to separate and identify distinctly very closely allied diseases; for example, the three types of malarial fevers were clearly identified by him and the group of malarial fevers separated from a host of other similar fevers at a time when he had not even the advantage of such common clinical appliances as we now possess. This bears eloquent testimony to what can be accomplished by the observant eyes of the general practitioner. Many more instances could be cited, but one is as good as many. Thus it is clearly seen that the "g. p." has played a very prominent part in the past history of medical research.

In countries other than India the "g. p.'s" continue to follow in the footsteps of their glorious predecessors. Will the "g. p." in India now at least try to shake off his present indifference and ignorant prejudice towards research and come forward to associate himself in increasing degrees with his brother "specialist" who has been manfully waging war single-handed with the formidable opponent disease?

Brother "g. p.'s", please consider well and come forward.—Yours, etc.,

G. R. RAO.

CALCUTTA,
Dated 19th January 1926.

Service Notes.

APPOINTMENTS AND TRANSFERS.

Colonel A. N. Fleming, D.S.O., M.B., F.R.C.S., I.M.S., to be Honorary Surgeon to the King, Indian Military Forces, *vice* Colonel P. Dee, M.B., I.M.S., (retired). 9th June 1925.

The services of Colonel R. A. Needham, C.I.E., D.S.O., I.M.S., Officer on special duty with the Railway Department (Railway Board) are replaced at the disposal of the Department of Education, Health and Lands, with effect from the afternoon of the 27th March 1926.

Major G. M. Millar, O.B.E., I.M.S., an Agency Surgeon, on return from leave, is posted as Residency Surgeon, Mewar, with effect from the 2nd March 1926.

The services of Major V. Mahadevan, F.R.C.S.E., I.M.S., are placed permanently at the disposal of the Government of Madras, with effect from the 4th September 1925.

Major H. W. Acton, I.M.S., Professor of Tropical Pathology and Bacteriology, School of Tropical Medicine and Hygiene, Calcutta, is appointed to act, in addition to his own duties, as Director of the said institution, *vice* Lieutenant-Colonel J. W. D. Megaw, C.I.E., M.B., I.M.S., V.H.S., granted leave.

Major W. O. Walker, F.R.C.S.E., I.M.S., Civil Surgeon of Serampore, is appointed to act, in addition to his own duties, as Civil Surgeon of Hooghly, during the absence, on leave, of Lieutenant-Colonel C. A. Godson, I.M.S.

On return from leave, Major C. R. O'Brien, M.B., I.M.S., Civil Surgeon, is posted to Dacca, *vice* Lieutenant-Colonel M. Mackelvie, C.I.E., M.B., F.R.C.S.E., I.M.S., granted leave.

Major J. D. Sandes, M.D., F.R.C.P.I., I.M.S., officiating Professor of Medicine, Medical College, Calcutta, and First Physician, College Hospital, is appointed to act as Principal of the said institution, with effect from the 16th April 1926, *vice* Lieutenant-Colonel F. A. F. Barnardo, C.I.E., C.B.E., M.D., F.R.C.S.E., I.M.S., granted leave.

The services of the undermentioned officers are placed permanently at the disposal of the Government of Burma, with effect from the dates shewn against their names:—

Captain H. Aung Khin, I.M.S., 2nd August 1922.

Major A. L. Sheppard, I.M.S., 22nd December 1922.

Captain L. S. Modi, I.M.S., Superintendent of the Buxar Central Jail, is appointed temporarily to be the Superintendent of the Bhagalpur Central Jail during the absence, on leave, of Captain U. J. Bourke, I.M.S., or until further orders.

LEAVE.

The Hon'ble Major-General Sir Charles MacWatt, Kt., C.I.E., K.H.S., I.M.S., Director-General, Indian Medical Service, is granted leave on average pay for six months with effect from the 1st April 1926.

Lieutenant-Colonel J. W. D. Megaw, C.I.E., M.B., I.M.S., V.H.S., Director, School of Tropical Medicine and Hygiene, Calcutta, is allowed leave on average pay for four months, under articles 81 (b) (i) and 82 (b) of the Fundamental Rules, with effect from the 15th July 1926.

Lieutenant-Colonel C. A. Godson, M.C., I.M.S., Civil Surgeon, Hooghly, is allowed leave on average pay for eight months, under article 81 (b) (i) of the Fundamental Rules, with effect from the 12th May 1926, or any subsequent date on which he may avail himself of the leave.

Lieutenant-Colonel M. Mackelvie, C.I.E., M.B., F.R.C.S.E., I.M.S., Civil Surgeon, Dacca, is allowed leave on average pay for eight months, under article 81 (b) (i) of the Fundamental Rules, with effect from the 15th May 1926, or from any subsequent date on which he may be relieved of his duties.

Major L. A. P. Anderson, I.M.S., Officiating Assistant Director, Central Research Institute, Kasauli, is granted leave on average pay for 8 months combined with leave on half average pay for 3 months and 10 days and study leave for 8 months and 20 days, with effect from the 5th April 1926, or such subsequent date as he may avail himself of the leave.

Captain G. Shanks, M.D., I.M.S., Professor of Pathology, Medical College, Calcutta, and Bacteriologist to the Government of Bengal, is allowed combined leave for one year, viz., leave on average pay for eight months under article 81 (b) (i) of the Fundamental Rules, and study leave for four months under rules 1, 2 and 6 of the Study Leave rules for the Indian Medical Service officers, with effect from the 22nd October 1926.

PROMOTIONS.

Majors to be Lieutenant-Colonels.

K. G. Gharpurey, D. C. V. FitzGerald, M.C., B. Higham, M.B., S. T. Crump, J. M. Skinner. —Dated 1st February 1926.

C. R. O'Brien, M.B. Dated 1st March 1926.

Captains to be Majors.

K. R. Rao, H. Chand, M.C., N. D. Puri, M.B., M. Das, M.C., M.B., J. B. Vaidya, J. M. R. Hennessy, C. H. N. Bakar, M.C. —Dated 31st January 1926.

M. L. Treston, F.R.C.S., A. Chand, M.B., R. Lee, M.B., C. de C. Martin. —Dated 1st February 1926.

RETIREMENTS.

The King has approved the retirement from service of Lieutenant-Colonel C. M. Mathew, I.M.S., from 2nd November 1920.