BRITISH PAEDIATRIC ASSOCIATION

PROCEEDINGS OF THE NINETEENTH GENERAL MEETING

The Nineteenth Annual Meeting of the British Paediatric Association was held at Windermere on April 16 and 17, 1948.

Business proceedings: The President, Dr. Donald Paterson, was in the Chair, and the following members were present:


There were also fifty-seven guests including Dr. B. Landman of Helsinki.

The Minutes of the last Annual General Meeting were approved.

Election of Officers: The following were unanimously elected by ballot for the year 1948-49:

President: Dr. H. T. Ashby, Manchester.
Treasurer: Dr. R. C. Lightwood, London.
Secretary: Prof. Alan Moncrieff, London.
Executive Committee (to replace those retiring):
Representative for Provinces: Dr. G. Davison, Northumberland.
Representative for Scotland: Dr. J. H. Hutchison, Glasgow.

Election of New Members: The following were elected by ballot to membership of the Association:

(a) Honorary Members:
Dr. H. H. Chodak Gregory, Huntingdon.

Dr. E. W. N. Hobhouse, London.
Prof. R. A. McCance, F.R.S., Cambridge.
Dr. D. Paterson, Canada.
(b) Corresponding Members:
Prof. G. Fanconi (Zurich).
Prof. A. Lichtenstein (Stockholm).
(c) Ordinary Members:
Dr. E. C. Allibone, Leeds.
Dr. H. S. Baar, Birmingham.
Dr. R. E. Bonham Carter, London.
Dr. I. A. B. Cathie, London.
Dr. Mary Crosse, Birmingham.
Dr. D. Gairdner, Cambridge.
Dr. E. W. Hart, London.

The Treasurer's Report was received and approved. It was agreed to give financial support to the proposed International Pediatric Association on the suggested basis of 75 cents per member per annum.

The Secretary's Report was received and approved and is printed below.

Next Place of Meeting: This was left to the Executive Committee.

Alteration of Rules: Rule 3: It was agreed that for 'six ordinary members' this should now read 'eight ordinary members' (members of Executive Committee).

Rule 12: It was agreed that for 'one month' this should now read 'two months' (notice for the proposal of new members). The consequential alterations in rules 4 and 18 were also approved.

Secretary's Report on Activities of Executive Committee

(1947-48)

Mr. President, Ladies and Gentlemen,

Since the last Annual General Meeting held in Windermere in April, 1947, the Executive Committee has met on four occasions. The following is a brief summary of the main activities during the year.

1. Appointments and Distinctions: The Association will wish to join with the Executive Committee in congratulating Sir Leonard Parsons on his election as F.R.S., a distinction for paediatrics and a fitting tribute to his life-long work and interest. Congratulations were also sent during the year to the following members elected to new University chairs: W. F. Gaisford (Manchester), A. V. Neale (Bristol), and J. Craig (Aberdeen).

2. Obituaries: The Association has suffered considerable loss during the year in the deaths of
the following: Corresponding Members—H. B. Cushing (Montreal), C. Louis Leipoldt (Capetown); Honorary Members—Leonard Findlay, Noah Morris, Sir John Fraser; Ordinary Member—C. Paget Lapage.

3. MEMBERSHIP AND FUTURE POLICY: The Executive Committee, after discussing this matter in some detail, circulated a questionnaire to all members. As already stated in a circular letter, no clear mandate was received for any radical change in constitution. It was therefore decided not to prepare any new rules for the 1948 annual meeting but to foster the development of regional paediatric groups and after a suitable interval to review such organizations in the light of their implications for changes in the constitution of the central body.

4. INTERNATIONAL MEETINGS: At the Fifth International Pediatric Congress in New York in July there were fifteen members of the Association present as well as fourteen others from the British Isles. It has been decided to frame a constitution for an International Pediatric Association, and your secretary has been asked to serve on a committee for this purpose. Ratification of any proposals will take place at the next International Congress in Zurich in August, 1950, and meanwhile the Association has been asked its views on financial support for the international organization. The section on paediatrics of the International Conference of Physicians held in London in September, 1947, was well attended.

5. HOSPITALS AND PLANNING: Formed at the instigation of the Association, a paediatric planning committee for the North-west Metropolitan Region has continued its activities during the year and a final report is being prepared. The Association has been asked for help in regard to various hospital and local authority appointments and the secretary has corresponded with most of the bodies whose advertisements have appeared during the year, sending copies of the circular on the appointment of a consulting paediatrician. Sub-committees have visited Cheltenham and Blackburn and reports to the authorities in these areas have been approved by the Executive Committee.

6. CHILD GUIDANCE: During the year the Executive Committee and its child psychology sub-committee has devoted considerable time to this subject. It has agreed to press for the development of psychiatric departments in all children’s hospitals, to seek closer liaison with the child guidance group of the National Association for Mental Health and to impress upon the Ministry of Education and local Education Authorities the importance of securing that a psychiatrist trained in children’s work and a paediatrician take part in all child guidance activities.

7. SUB-COMMITTEES AND REPRESENTATIVES ON OTHER BODIES: In addition to the work mentioned in the last paragraph, sub-committees which have been active during the year include the following:

Nursing Committee (jointly with the Association of Sick Children’s Hospital Nurses): a memorandum has been circulated concerning the Working Party’s Report on Nursing.

Hospital Architecture and Cross Infection: statistical analysis of the returns on cross infection is now proceeding, the Ministry of Health having made a grant for this purpose.

Post-war Convalescent Homes (jointly with the I.C.A.A. and Institute of Almoners): policy with regard to provision of machinery for convalescence has been elaborated.

The report of the sub-committee on Neonatal Mortality (jointly with the Royal College of Obstetricians and Gynaecologists) is to be published by the Ministry of Health. It has been decided to dissolve this committee now that the report is finished and also the rheumatism committee and the committee on hospital undergraduate teaching.

Dr. C. F. Harris has been co-opted to the Public Health Committee of the British Medical Association. The secretary has been appointed to a committee of the Royal College of Obstetricians and Gynaecologists on maternity hospital reports and Mr. Denis Browne to a committee of the British Standards Institute on Surgical Instruments.

8. WINDERMERE LECTURESHIP: The Executive Committee has accepted from Messrs. Cow and Gate Ltd. a generous gift to provide funds for a biennial lecturership by a distinguished paediatrician from abroad and the Association is fortunate in being able to welcome Dr. Henry Helmholtz, who was the President of the International Congress in New York, as the first lecturer.

9. VISIT TO SWEDEN: At the kind invitation of the Section on Pediatrics and School Hygiene of the Swedish Medical Society a party of members numbering about thirty will visit Sweden at the end of May.

10. MILK: The Executive Committee has discussed the supply of evaporated milk to hospitals and there has been correspondence with the Ministry of Food on this subject. The secretary will supply details to any member who requires information. The Committee was also asked by the Ministry of Health for views on the addition of iron to dried milk and there was a large majority against this as a routine measure.

11. CARE OF THE MENTALLY DEFECTIVE CHILD. At the suggestion of Professor Vining a resolution has been sent to the Ministry of Health for circulation to the regional hospital boards stressing the urgent need for greater provision of institutional care for children who are mentally defective.

12. ACTING-CHAIRMAN OF EXECUTIVE COMMITTEE: It was decided to record the deep gratitude felt by the Committee to Professor Vining for acting as Chairman during the year 1947-48, an additional year after his official term of office had ended.

ALAN MONCREIFF.
Communications

1. DR. A. P. NORMAN (London) (introduced by Dr. C. F. Harris): ‘Spina Bifida Cystica.’ Survey of the literature on meningocele gives little information on the advisability of, and the indications for, operation; nor on the development of hydrocephalus. Analysis of 161 cases of spina bifida cystica seen at the Hospital for Sick Children, Great Ormond Street, London, showed that more than a third were alive, more than a third dead, and the majority of the remainder probably dead. The operative mortality was twice as great in the first month of life as afterwards, and it is known that the operative mortality is very small after the age of two. Early operation would therefore be indicated only if rupture of the sac were a common cause of early death, and this it was not possible to show.

Eleven children out of sixty who had no paralysis before operation developed a neurological lesion other than hydrocephalus after operation; this does not include fatal cases.

Established hydrocephalus did not seem to be made worse by operation, but the likelihood of death after operation was much greater than in the uncomplicated case. Seven children appeared to develop hydrocephalus after operation, but it is not certain that their heads had regularly been measured beforehand. Hydrocephalus was first noted mostly in the first months of life but the incidence throughout the first year was similar in pre- and post-operative cases.

It is suggested that there is no evidence to show that operation is beneficial; if performed, it should be on uncomplicated cases after the age of one year. More basic facts would be obtained if each paediatric centre could adopt a standard scheme of investigation and treatment.

2. DR. C. BALF (Edinburgh) (introduced by Dr. H. L. Wallace): ‘Neonatal Behaviour of Infants Born (a) by Spontaneous and (b) by Forceps Delivery.’ A preliminary investigation has been made of the behaviour of babies born by spontaneous and forceps delivery to determine what neonatal abnormalities may be related to subsequent mental or physical defect. Clinical examination was restricted to those weighing between 5½ and 10 lb. at birth.

The Moro response was found to vary with other clinical measures of cerebral changes, but, in addition, numerous minor variations in the response were found more frequently after abnormal delivery. Systematic clinical examination in the first two days showed minimal evidence of cerebral disorders in 5·9 per cent. of spontaneous deliveries (mostly primiparous mothers), and in 23 per cent. of forceps deliveries. These figures corresponded well with the difficulty of labour judged from the obstetric reports and the evidence of foetal distress. Persistent vomiting was noted in 20 per cent. of the abnormal deliveries, but only in 1 per cent. of the normal. There was often no other evidence of cerebral irritation, though such babies fed slowly and were late in fixing to the breast.

Day-to-day variations in body temperatures were greater after instrumental delivery, and a characteristic saw-toothed temperature chart was often seen. Fever on the second to third day associated with clinical dehydration occurred far more frequently after forceps delivery despite the special attention given to the fluid intake for such babies. There was no direct correlation between irregularities of temperature and persistent vomiting, but they are judged symptomatic of some cerebral dysfunction.

3. DR. G. MONTGOMERY (Glasgow) (introduced by Professor S. Graham): ‘The Pathological Findings in Eight Fatal Cases of Tuberculous Meningitis Treated with Streptomycin.’ The findings were described in eight fatal cases of tuberculous meningitis treated by streptomycin in the Royal Hospital for Sick Children, Glasgow, demonstrating progressive meningeal tubercles associated with regressive lesions in other organs.

Meningeal lesions. All the cases had soft gelatinous exudate and groups of fresh tubercle follicles similar to those usually found in untreated cases of tuberculous meningitis. Tubercle bacilli were cultured from the cerebrospinal fluid after death and showed no increased sensitivity to streptomycin. In three cases there were cortical tuberculomata, and in all the cases the cerebral sulci contained tubercle follicles which had clearly been proliferating at the time of death.

Lung lesions. Five of the eight cases had caseous primary foci which showed degrees of encapsulation no greater than in untreated cases; in one no primary focus was found but there was a small calcified hilum gland; and in two cases the focus was represented by scar tissue with hyalinized follicles.

Miliary tubercles. These showed varying degrees of hyaline degeneration, the epithelioid cells had disappeared, and tubercle bacilli could not be demonstrated. Hyaline degeneration occurs in tuberculous lesions which heal spontaneously by fibrosis, but the feature of the streptomycin cases is the complete hyalinization of follicles which show no evidence of antecedent fibrosis and thus offer morphological evidence of the chemotherapeutic effect.

4. DR. C. ASHER (London): ‘The Relation of Birth Weight to Mental Development.’ The literature is conflicting. There are two main methods of approach to the problem: (1) the follow-up method (this has the disadvantage that a large number of children remain untraced); (2) the indirect method of ascertaining what proportion of individuals of known intellectual levels were immaturesly born. This was the method used in the study here reported, in which 5,177 school-children were investigated. It was found that there was a significantly higher proportion of immaturely born children in the special schools for educationally
subnormal than in all the other schools (grammar, modern, and primary). Also the mean birth weights of the educationally subnormal pupils were significantly lower than the mean birth weights of the pupils in all the other schools. The fact was therefore established that there was some connexion between low birth weight and mental development. It was difficult, however, to decide whether the immaturity was the cause or the effect of the educational subnormality. Birth trauma or anoxaemia in an immaturesly born infant might be responsible for failure in mental development, or the child might be born immaturesly because of some innate mental or physical defect. Moreover the genetic factor had to be considered.

It was thought that a nutritional factor was probably not involved, as all the children were drawn from the same area. The work was carried out on Finchley (Middlesex) schoolchildren.

5. Dr. T. Wright (Sheffield) (introduced by Professor R. S. Illingworth): 'The Incidence and Possible Significance of the Choroidal Tubercle.' There have been twenty papers on the subject in the Index Medicus during the past nineteen years. The literature is confused as regards the incidence of the tubercles, an average of 14·6 per cent. in tuberculous meningitis and 50 per cent. in miliary tuberculosis with meningitis being reported.

In a series of fifty consecutive cases our figures are as shown:

<table>
<thead>
<tr>
<th></th>
<th>Number of cases</th>
<th>Number of cases with choroidal tubercles</th>
<th>Per cent.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Meningitis</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Miliary</td>
<td>26</td>
<td>16</td>
<td>61·5</td>
</tr>
<tr>
<td>Meningitis</td>
<td>15</td>
<td>1</td>
<td>6·6</td>
</tr>
<tr>
<td>Miliary</td>
<td>9</td>
<td>3</td>
<td>33·3</td>
</tr>
<tr>
<td>Total</td>
<td>50</td>
<td>20</td>
<td></td>
</tr>
</tbody>
</table>

The choroidal tubercle is not a terminal phenomenon. The natural history of the choroidal tubercle is one of enlargement and hardening of outline, a gradual change in colour from yellow to parchment white, and the formation of a surrounding zone of black pigment. These changes are not attributable to streptomycin therapy.

Although by no means a complete guide, the changes in the choroidal tubercle may be of help in assessing the prognosis of the case. Choroidal tubercles have not been observed to disappear when the underlying tuberculous process is healing or has healed. Choroidal tubercles have been observed only very rarely in tuberculous meningitis, and this is suggestive that there is an associated miliary tuberculosis. Choroidal tubercules have been observed in two cases without obvious miliary tuberculosis. No streptomycin therapy was given. The patients are well and the choroidal tubercles are in the late stage, which we suggest implies that they are healed.

6. Professor J. C. Spence (Newcastle): 'The Initial Illness of Poliomyelitis.' Newcastle had a brisk experience of poliomyelitis in the recent epidemic, when 184 cases were studied in the Children's Department and associated hospitals. The epidemic followed the normal modern course, with rising age incidence and a correlated increased mortality in the older patients. Particular attention was directed to the initial illness and its relationship to the neck stiffness or paralytic illness which may follow it. The speaker stressed the importance of studying the initial illness by saying that it is doubtful if we shall make any real advance in understanding the epidemiology of poliomyelitis until we find means of diagnosing the initial illness, and that mere elaboration of the diagnostic signs of paralysis will teach us little. The initial illness is best studied when there is a distinct interval of recovery before the onset of neck stiffness or paralysis. It usually lasts about thirty-six hours but may be as brief as six. It was present in seventy-six of the 184 cases studied. Although the illness is difficult to diagnose in our present stage of knowledge some clinical features were very suggestive, particularly the combination of a peculiar physical lethargy with mental clarity in a febrile child, the illness starting abruptly and often ending abruptly. The interval between the initial illness and paralytic illness was variable, anything from one to nineteen days in the speaker's experience. There was evidence that heavy muscular exercise with exhaustion in the interval following the initial illness might precipitate a paralytic illness, and cases were quoted in support of this view.

A plea was made for a clarification of our terms in this disease, avoiding such phrases as 'abortive poliomyelitis' and 'pre-paralytic poliomyelitis.' Professor Spence suggested that the stages of disease should be clearly designated: (1) the initial illness; (2) the interval period of apparent recovery; (3) the main illness involving invasion of the child's nervous system; and (4) the stage of permanent paralysis.

7. Dr. B. Schlesinger (London): 'The Treatment of Liver Failure in Gastro-enteritis with Casein Hydrolysate.' The clinical picture of this fatal complication of gastro-enteritis is characterized by sudden rapid deterioration of the infant, increased dehydration despite the usual measures, a haemorrhagic diathesis manifested by purpura or melena and haematamesis, and rapid enlargement of the liver. Sometimes the true nature of the condition remains unsuspected until the advent of jaundice. Urgent treatment is necessary, and every effort should be made to recognize the condition at an early stage.

As a result of animal experiments and reports on children in the tropics or in occupied countries in
Europe who had had diets grossly deficient in protein, the lesion suspected was disorganization of the liver cells, often with fatty infiltration progressing eventually to fibrosis. This was brought about by the continued deprivation of protein together with other dietetic components through long-standing gastro-enteritis.

To combat this, and to supply the necessary lipotropic agent, casein hydrolysate was administered. It had the advantage of being easily assimilable and of providing readily available methionine and an adequate calorie intake to tide the infant over its most critical period. The oral route was preferable as it was difficult to obtain a sufficient amount quickly if given intravenously in a strength and at a rate suitable for the size of the infant. Moreover, it was notoriously difficult to keep solutions of amino acids sterile when using this method. Nevertheless with intractable vomiting the intravenous route was successfully employed. The speaker found that 70 g. of casein hydrolysate containing 50 per cent. of protein and 50 per cent. of lactose was usually well tolerated by infants weighing 12 to 13 lb. Ten grammes were dissolved in 5 or 6 oz. of water and given repeatedly in seven feeds. In addition choline was administered orally (0·1 to 0·2 g. daily) as a supplement to spare the methionine present in the casein hydrolysate. The treatment was continued in face of diarrhoea, which eventually subsided spontaneously, until the signs of liver failure abated. Breast milk was gradually added to the diet as the digestion became more tolerant.

Ancillary treatment was used, such as the maintenance of hydration, the correction of an upset acid-base balance, and the provision of the necessary vitamins. When purpura was present, vitamin K was added. Sulphadiazine was employed in the presence of some parenteral infection.

None of these routine measures was successful in overcoming the complication of liver failure in the past. With the use of casein hydrolysate in seven cases, the last four by the oral route alone, all had recovered from a condition which was rapidly advancing in the same fatal direction.

8. Dr. F. R. M. Elgood (Cardiff) (introduced by Dr. A. G. Watkins): 'Intestinal Distension in Infants.' There is a type of intestinal distension that occurs at the end of prolonged illness in infancy, associated with hepatic enlargement, cachectic purpura, and haematemesis. It is found in gastro-enteritis resistant to treatment, after prolonged partial starvation and intravenous therapy. At necropsy an enlarged fatty liver and distended intestines with superficial erosions are found.

Rutin, vitamin K, adrenal cortical extract, and fresh blood proved valueless in this condition. Choline chloride is effective in preventing fatty degeneration of the liver in doses of 0·25 to 0·5 g. three times a day by mouth. Carbohydrate and protein also protect the liver, and were given intravenously as 600 to 1,000 ml. per day of equal parts of 5 per cent. glucose and plasma. Improved results were obtained if full-strength half cream one-ounce milk feeds were given four-hourly.

Vitamin B1 deficiency occurs rapidly in starvation. Vitamin B12 has also a stimulant effect on the bowel. Six-hourly injection of 2 mg. of vitamin B12 causes a rapid subsidence of the distension. Before this treatment all our cases developing this condition died. Since we decided to institute it at the first sign of liver enlargement, two cases have died, of other causes after having been apparently cured, one died soon after treatment was begun, and three have recovered. The numbers are small, as the condition is rare, but I have been impressed with the results so far obtained.

9. Dr. White Franklin (London) 'The Place of the Residential School in the Treatment of Bronchiectatic Children.' The Invalid Children's Aid Association, inspired by Dr. Elaine Field, two and a half years ago opened the Meath Hospital School at Ottershaw, Surrey, with twenty-four beds for boys aged two to seven and girls aged two to ten years. The daily routine includes two periods of an hour's physiotherapy and two periods of two hours' schooling. Postural drainage on tip beds is used in suitable cases. Seventy-three children have been treated, the longest for two years, the shortest for three weeks, the records of sixty-five forming the basis for the report. Of these, twenty-seven were severe cases, nine moderately severe, and twenty-nine mild with little clinical evidence of disease. There were sixteen surgical cases, mainly severe.

The mild cases have made the greatest improvement, when judged by general betterment and amount of cough, sputum, and nasal discharge. Poor posture and chest expansion responded well to physiotherapy. Changes in weight were difficult to assess, as low weight and failure to gain are not found except in the most severe or in complicated cases. Penicillin inhalations (sixteen cases) did not help the severe but did benefit the mild cases. Surgical treatment did not seem to have accomplished much in this particular series. A follow-up study of twenty-nine children brought out the importance of bad home conditions in relapses. On the other hand long separation from home in the early years of life had occurred in the four boys most difficult to control. Thirty-one cases, including the most severe, had started coughing under the age of one year and forty-seven under two, so that prevention demands special care in infancy. While no dramatic improvement was noted in the series, the home was able to provide continuous schooling and physiotherapy under good conditions for the severe cases, with a chance of drying up for the mild ones.

10. Dr. C. J. Hodson and Dr. C. A. Neill (London) (introduced by Dr. H. M. Mackay):
Post-pneumonic Pneumatocele. The air-containing lesions associated with pulmonary consolidation in children have been well described in America. Views over there, however, differ as to their late results. Some authors (Caffey, 1940) state that they clear up completely leaving no trace even after having persisted for months, others (Pierce and Dirkse) that they may be the cause of 'congenital' cystic disease and bronchiectasis.

In the present communication six cases were described and illustrated. The oldest was fifteen months. They showed air-containing spaces occurring with a variety of pulmonary lesions including staphylococcal pneumonia, lobar pneumonia, a possible original fluid-containing congenital cyst, localized pneumonic consolidation, and one case showing consolidation-collapse without pyrexia. Two cases were complicated by pneumothorax. One, a doubtful case, recurved seven years later and was excised, another showed a neonatal bilateral pneumothorax. Most of the cysts and their complications cleared rapidly leaving no apparent trace. One still remained after five months, but was getting smaller. A mixed bacteriology including staphylococci, haemolytic streptococci and pneumococci was obtained, and all febrile cases had received chemotherapy.

It was suggested that there was a scarcity of post-mortem and other evidence as to whether all 'pneumatoceles' were of a similar etiology or whether they arose from a variety of conditions. Doubt was expressed as to whether they did all in fact resolve completely, and a plea was made for (1) early radiography of every case of pulmonary infection in the very young to ascertain their etiology; (2) a prolonged follow-up of cases with bronchography to assess their late effects.


11. Dr. M. E. MacGregor (London) (introduced by Dr. R. C. Lightwood): 'Some Observations concerning Renal Calcification in Infancy.' The clinical histories were analysed of twenty-five children, all less than two years old, who showed calcification in the medulla of the kidneys at necropsy. Any feature shared by them all which might cast light upon the pathogenesis of their lesion, or assist in their diagnosis during life, was sought for. Further, the numbers that fulfilled the conditions of a syndrome described by Lightwood in May, 1935, were determined. No factor other than loss of weight was found to be applicable to the entire group, but eighteen cases were able to be classified as belonging to the group described by Lightwood. All but one of the remaining seven cases showed gross associated pathology, sufficient by itself to cause death.

A series of 230 kidneys derived from routine post-mortem material from children under two years of age was then examined histologically. Cases that had died of primary renal disease were excluded. In twenty-four instances (11 per cent.) renal calcification was present, in seventeen of which it was present in the medulla. The clinical records of these seventeen cases revealed that six conformed to Lightwood's description; eleven did not. Among the latter group, who died from very diverse conditions, no common link could be established. It was concluded that, although twenty-four out of forty-four examples of medullary calcification belonged clinically to the group described by Lightwood in 1935, precisely similar calcification was to be encountered in this age group in many other conditions which were apparently quite unrelated to each other.

12. Dr. W. W. Payne (London): 'Persistent Acidosis in Infancy.' A case of nephrocalcinosis of the Albright type was found in a child and an attempt was made to see if the type of nephrocalcinosis described by Lightwood could be a forerunner of that condition. The history of the case of Albright syndrome was that the child was normal for the first eighteen months of life and was then admitted to another hospital with 'kidney trouble.' Owing to evacuation, no further history is available until she was seen at the Hospital for Sick Children, London, where the provisional diagnosis of renal rickets was made. There was profound calcification of the bones, muscular weakness, thirst (but normal appetite), and albumin, blood, and pus in the urine.

The cases of the Lightwood syndrome were all under one year and had illness of over four weeks, consisting of anorexia (which was often very marked), constipation, loss of weight, vomiting, hypotonia, and dehydration. The urine contained leucocytes, epithelial cells, and often a trace of albumin, and was constantly sterile and often alkaline. An additional symptom present in about half the cases was thirst.

There was thus no great resemblance between the two syndromes clinically. Chemically, however, there were certain points of resemblance. The Albright type showed acidosis with persistently raised blood chlorides as well as the changes in the calcium and phosphorus to be expected from the bony condition. Seven cases of the Lightwood syndrome all showed persistent acidosis and similarly raised chlorides with no alteration of the calcium and phosphorus. The raised chlorides were greater than would be caused by the degree of acidosis. The presence of an alkaline urine with persistent acidosis is a point of diagnostic value. All the cases were treated with the citric acid-sodium citrate mixture of Albright and showed very considerable clinical improvement. Some cases required very large doses, amounting to between 9 and 15 g. of sodium citrate daily, before the acidosis was corrected.

Taking into consideration the results of MacGregor, it was concluded that there was no conclusive evidence that the nephrocalcinosis of the post-mortem room and the nephrocalcinosis of the
Albright type were identical with the Lightwood syndrome. It was suggested that the group of cases described by Lightwood should be called Lightwood's syndrome, as 'persistent acidosis' is too general a term.


13. Dr. J. D. Pickup (Leeds) (introduced by Professor W.S. Craig): 'Some Clinical Aspects of Oesophageal Obstruction in Children.' In two years eight cases of oesophageal stenosis were seen, seven of which were boys and two of which were premature. Five cases had a history of vomiting from birth, and all became worse when thickened feeds were introduced into the diet. The typical clinical features are that the child is extremely hungry and often grossly underweight. The older child takes the food deliberately, pausing until the food has passed through the stricture, and during the pause he may make characteristic forced swallowing movements, craning the neck forward, opening the mouth, and contracting and relaxing the pharyngeal and buccal muscles. In five cases blood was found in the vomit.

A tendency to severe exacerbations in which both solids and liquids were returned, was seen in five cases; these became so obstructed that dilatation by bougies had to be resorted to, and two required gastrostomy. The milder cases do reasonably well on a semi-solid diet, but all remain greatly underweight and often stunted in height.

A case showing a 'corkscrew' deformity of the lower third of the oesophagus was described. Another boy with a short oesophagus and large hiatus hernia had no symptoms referable to the gastrointestinal tract but had a red cell count of 730,000 per c.mm. and a haemoglobin of 14 per cent., this was thought to be due to a constriction of the cardiac end of the stomach with continual oozing of blood, a condition previously described by Murphy as ' hiatus hernia anaemia.'

14. Dr. K. H. Tallerman (London): ‘Some Comments on the Present Incidence of the Rheumatic Infection in Childhood.’ The memorandum produced by the British Paediatric Association on this subject a few years ago indicated that the incidence of this disease had decreased between 1937 and 1942. On returning to civil practice after an absence from paediatrics of three and a half years the speaker was forcibly struck by the frequency with which cases suffering from acute and sub-acute rheumatism, chorea, and rheumatic carditis were appearing in the children's department of the London Hospital, which confirmed his views that this disease was less prevalent than of old, and he thought it worth while analysing the two-year period from June, 1945, to May, 1947, and comparing it with a similar two-year period, 1937 to 1939.

From his figures it was apparent that the percentage of rheumatic cases to total admissions or out patient attendances had fallen by half in the latter as compared with the earlier period (see table).

A decrease had also been observed in the number of children coming as out patients on account of mild chorea, which had dropped from twenty-three in the earlier period to one in the later.

All the evidence appeared to indicate that the rheumatic infection was less prevalent now than of old, and the decrease in incidence reported as occurring until 1942 was still noticeable up to the spring of 1947. An increase in incidence occurred during the winter of 1947 to 1948, but the speaker regarded that as probably only a temporary phenomenon in view of the consistent fall over a period of years.

RHEUMATIC FEVER IN CHILDHOOD (DR. K. H. TALLERMAN)

<table>
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<th>Period</th>
<th>Number of children under 14 years dealt with at the London Hospital</th>
<th>Number of rheumatic children under 14 years dealt with at the London Hospital</th>
<th>Per cent. of rheumatic to total admissions</th>
<th>Per cent. of rheumatic to total new out patient cases</th>
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</thead>
<tbody>
<tr>
<td>Admitted to hospital</td>
<td>New cases attending as out patients</td>
<td>Admitted to hospital</td>
<td>New cases attending as out patients</td>
<td></td>
</tr>
<tr>
<td>June, 1937, to May, 1939</td>
<td>1,431</td>
<td>2,836</td>
<td>129</td>
<td>66</td>
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<tr>
<td>June, 1945, to May, 1947</td>
<td>743</td>
<td>1,886</td>
<td>30</td>
<td>14</td>
</tr>
</tbody>
</table>

* The actual number of children on the school attendance roll of the London County Council in the area served by the hospital in July, 1939, was 104,932; in July, 1946, it was 52,513, a decrease of 52,399.