Mandeville, he would find it very difficult for a reason he had not mentioned before that in many of these recent post-mortems he had performed on acute paraplegics there had been a high incidence of what was called stress ulcers of the gastro-intestinal tract; in fact, there was one mortality purely due to this complication and there had been two other cases in which there had been very severe bleeding and in many of them he had found small gastric erosions, acute necrotic erosions which had no specific pathology; they were very intriguing lesions but he thought this must be a common lesion in any acute trauma, not only paraplegics, and this should well be borne in mind.

TEN YEARS' REHABILITATING PARAPLEGICS

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THIS paper presents the results and conclusions obtained with the treatment of a series of patients treated in the Institutions mentioned above.

Our series comprises 224 cases, 186 of which were treated in the Clínica Nacional del Trabajo and the other 38 in the Instituto de Medicina y Seguridad del Trabajo. The 186 patients cared for at the Clínica Nacional del Trabajo, correspond to the 25 beds available at this Centre for paraplegics who were treated from October 1955 to May 1965. The 38 patients treated at the Instituto Nacional de Medicina y Seguridad del Trabajo comprise a period from October 1963 to May 1965 and who occupied the beds available at this Centre for this type of disabled.

Slides are shown which present the clinical types, complications, ulcers, contractures, average time of treatment and results obtained.

With the exception of eight cases due to various causes, all the patients were injured during accidents at work throughout the national territory. The patients' age was between 13 and 63 years, the higher percentage (41.98 per cent.) being between 30 and 40 years of age.

It is to be noted that there has hardly ever been a coincidence between the level of the bone injury and the level of cord injury. The most affected segment has been L1 with 39 cases (54.16 per cent.).

Within the forms of paraplegia, the flaccid type was the most predominant, reaching 54.01 per cent. with 121 cases. There has also been an important number of paraparesis.

Almost 100 per cent. of the patients who came to us one month after injury showed ulcers in various parts of the body and in various number. The same applied to contractures and deformities. In the last three years, however, a definite reduction in the number of these complications has been noticed; this is probably due to the publicity campaigns by the Clínica Nacional del Trabajo, as well as by other Centres, on the correct way of treating these patients immediately after their accidents.

We would like to point out the good results obtained by us with the intra-

thecal alcoholisation to solve the problem of spasticity and pain, in those cases where this procedure was indicated.

We have found only 11.6 per cent. osteoma among our patients, a figure which is fairly low as compared with that of other authors, though we have to state that a systematic radiologic investigation of osteomas was made when we suspected it clinically. The regions most frequently affected were hips and knees, though we have also seen some at the level of the medial and lower third of the thigh.

The urological problem, one of the most insidious in the treatment of these patients, was dealt with in the following way:

During the first 10 or 15 days we carry out intermittent catheterisation, every eight hours, under the utmost aseptic conditions. Then a permanent catheter is applied, generally of the Foley type, till the 50th or 60th day, when the vesical automatism begins to develop.

The most important figure of our experience was the good medical result obtained, as 90 per cent. of the patients survived and the functional result was good in almost a 70 per cent. of the cases. We have to say that this good result is influenced by several important factors:

1. **Technique Used.** We have followed generally the directions and policy of Dr. L. Guttmann. Our system of treatment can be seen in the film shown in this meeting. The efficiency of this treatment for paraplegics, without using complicated techniques or costly apparatus, but simple directions and great dedication, is demonstrated by the good results obtained.

2. **Personnel Available.** The qualified personnel devoted to the paraplegics, both in the Clínica Nacional de Accidentes de Trabajo and in the Instituto Nacional de Medicina y Seguridad en el Trabajo, is very numerous, and we may say that, generally speaking, there is a qualified person for each bed if we include doctors, physiotherapists, social assistants, etc. The exquisite and precise care which the paraplegics require makes this great number of specialised personnel necessary. Therefore, the number of beds dedicated to the treatment of these patients is still small in our rehabilitation centres.

3. **Co-ordination of Work.** The Rehabilitation Service maintains a close collaboration with other services (orthopaedics, plastic surgery, urology, internal medicine, etc.) in such a way that the problems of these patients are always treated in common.

We have to point out that our patients generally come to our Centres in bad conditions, with ulcers, contractures and cachexy, depressed and desperate, which makes the treatment longer and more difficult. However, with increasing medical knowledge on these problems, we have noticed that this type of patients receive now better care immediately after their accidents and are sent to us early and with less complications.

Our opinion, as a result of 10 years of work devoted to the proper treatment of paraplegics, is that, in spite of the great difficulties we have to overcome to treat these patients as the medical ideals require, we have gone a great way ahead which should serve as a stimulus to fight against the defeatist attitudes which prevailed not long ago towards these patients.