TREATMENT OF NON-GONOCOCCAL URETHRITIS WITH SPIRAMYCIN* †

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That Spiramycin, a relatively new antibiotic prepared from the *Streptomyces ambofaciens*, is effective in the treatment of gonorrhoea has already been indicated (Willcox, 1956). This report concerns 41 cases of previously untreated non-gonococcal urethritis treated with the drug.

Material

The average age of the 41 patients was 30.3 years (extremes 21–56); 32 were white and nine were Negroes (six from the West Indies and three from West Africa). Eleven were married, one was a widower, and 29 were single. Fourteen patients admitted no previous venereal disease and the remaining 27 had had between them no less than nineteen previous attacks of gonorrhoea and 25 attacks of non-gonococcal urethritis. The average number of previous venereal incidents for the nine Negroes, only two of whom had had no previous trouble, was 1.8 (nine of gonorrhoea and seven of non-gonococcal urethritis) compared with an average of 0.9 attacks for the 32 white-skinned persons.

The urethral discharge had been present for 1 to 3 days before treatment in 21, for 4 to 7 days in fifteen, and for more than 7 days in five. Dysuria was noted by 23 patients and not noted by eighteen. The infection was apparently acquired from a stranger in nineteen (one of whom was an acknowledged prostitute), from a friend or acquaintance in fifteen, from a marital exposure in five; exposure was denied in two cases. The apparent incubation period was from 1 to 3 days in fourteen, from 4 to 7 days in nine, from 8 to 14 days in three, from 15 to 28 days in two, over 28 days in five, and unknown in eight.

The Wassermann and VDRL tests were both negative in 37 patients, while the Wassermann test was negative and the Harris test positive in four. The gonococcal complement-fixation test was performed in forty patients and was positive in only one. Trichomonads were

found in only one of eighteen cases tested. In this case they were apparently absent at the commencement of treatment but were recovered a week later.

Results

Dosage.—The dose of Spiramycin used was 1 g. orally four times a day for 5 days (total 20 g.), except in three cases in which half of this amount was given over the same time. One of these three cases was a failure (*Trichomonas*-positive at 7 days).

Side-Effects.—No serious toxic reactions were noted and in no case was treatment interrupted. Some mild side-effects were reported by eight patients. All of these had some looseness of the bowels or diarrhoea, one was light-headed, one had nausea and a rash, and in addition three had rectal soreness or pruritus.

Follow-up.—The follow-up and results are shown in Table I. Of the 36 followed there were eight failures within 2 to 3 months (22.2 per cent.). Two of these, however, were considered as possible re-infections. Two of the failures had complications; one epididymitis and one acute cystitis.

TABLE I
RESULTS OF TREATMENT OF 41 CASES OF NON-GONOCOCCAL URETHRITIS WITH SPIRAMYCIN

Duration of Follow-up	Cases Followed	Failures
0	41	—
1–3 days ..	36	1 (acute cystitis)
4–7 days ..	34	1 (<i>Trichomonas</i> -positive)
8–14 days ..	28	1 (epididymitis)
15–21 days ..	26	1
22–28 days ..	23	—
1–2 months ..	21	4 (two of which were possible re-infections)
2–3 months ..	13	—
Over 3 months	8	2 (both re-infections)

Comparison with other Antibiotics

A comparison has been made with the results previously obtained with seven other antibiotics, sulphonamides, and a placebo (Table II, overleaf).

* Received for publication March 14, 1956.

† This material was presented to the M.S.S.V.D., on February 24, 1956, and at the International Symposium on Venereal Diseases and Treponematoses, Washington, D.C., May, 1956.

It is noted that the tetracycline antibiotics, oxytetracycline, tetracycline hydrochloride, and chlortetracycline, give the best results. Good results were also obtained with Spiramycin and erythromycin. By comparison, indifferent results were obtained with streptomycin, sulphonamides, penicillin, and chloramphenicol.

Summary and Conclusions

(1) 41 previously untreated cases of non-gonococcal urethritis were treated with Spiramycin.

(2) A dosage of 20 g. was employed over 5 days in all but three cases in which half this amount was given over the same time.

(3) Of the 36 cases followed, there were eight failures (22.2 per cent.) noted within 2 to 3 months of post-treatment observation.

(4) When compared with other antibiotics the results were comparable with those obtained with the tetracycline antibiotics and erythromycin, and markedly superior to those observed with streptomycin, sulphonamides, penicillin, and chloramphenicol.

(5) No serious toxic reactions were noted. Some mild side-effects were reported by eight patients

TABLE II
RESULTS OF TREATMENT BY DIFFERENT MEANS OF
746 PREVIOUSLY UNTREATED CASES OF NON-GONOCOCCAL URETHRITIS

Drug	Usual Dose	Cases Treated	Cases Followed	Failures	Per cent. Failing of those Followed
Oxytetracycline	5-6 g.	85	82	13	15.9
Tetracycline ..	6 g.	149	127	21	16.5
Chlortetracycline	5-6 g.	115	108	20	18.5
Spiramycin ..	10-20 g.	41	36	8	22.2
Erythromycin ..	6 g.	101	85	23	27.1
Streptomycin ..	2-4 g.*	62	58	22	37.9
Sulphonamides..	20-28 g.	55	53	21	39.6
Penicillin ..	1-3.6 mega units*	70	65	26	40.0
Chloramphenicol	5-6 g.	39	37	15	40.5
Placebo ..	—	29	22	15	68.2
Total ..		746	673	184	27.3

* Given by injection : remainder given orally

which followed the general pattern usually encountered with other orally administered antibiotics.

(6) It is concluded that Spiramycin is useful in the treatment of non-gonococcal urethritis.

Grateful acknowledgments are expressed to Messrs. May and Baker, Ltd., of Dagenham, Essex, for kindly providing the Spiramycin used in this study.

REFERENCE

Willcox, R. R. (1956), *British Journal of Venereal Diseases*, 32, 117.