TABLE I.
Effect of Various Concentrations of Alpha Dinitrophenol in Diet on Growth of White Rats.

Concentration of Dinitrophenol in Diet	No. Rats in Group	Aver. Wt., Gm. Start	50 days	100 days	150 days	250 days	350 days	450 days
Control	5	25	166	236	268	298	296	318
.0002 %	5	24	152	222	252	280	296	312
.001 %	5	24	140	224	260	290	290	335
.005 %	5	24	136	220	255	274	281	323
Control	6	35	185	258	296	354	368	375
.001 %	6	30	175	259	292	346	380	379
.005 %	6	34	169	254	294	347	376	396
.01 %	6	33	162	250	278	294	350	357
.02 %	6	34	150	242	275	305	364	372
Control	6	33	150	207	233	273	275	
.02 %	6	36	159	226	240	285	329	
.04 %	6	34	143	197	207	255	292	
.06 %	6	33	135	191	207	232	262	
.08 %	6	31	125	176	202	239	255	
.12 %	6	35	112	167	181	217	255	
.24 %	6	32	60	all dead				

The final weights of the surviving animals do not vary significantly from the weights of the controls.

The metabolic rates of these rats, their food and water intakes, duration of life, pathologic changes in tissues, etc., will be presented in detail at the conclusion of the study.

Conclusions. Alpha dinitrophenol, added to the diet of white rats in up to maximum non-fatal concentrations, slowed down the rate of growth not more than about 19%, and did not significantly modify the body weight reached at the end of from 350 to 450 days, or in about ⅓ to ½ the span of life.

7483 P

Cultivation of Facultative Acid-Fast Bacteria from Filtrates of Leprosy.

ERNEST LINWOOD WALKER AND MARION A. SWEENEY.

From the George Williams Hooper Foundation for Medical Research, University of California, San Francisco, California.

Bacteriologists and leprologists generally have regarded the facultative acid-fast organism cultivable from leprosy as a contaminant or a secondary invader of leprous lesions. Our filtration experi-

ments with leprosy have been undertaken to exclude such adventitious organisms. Of 50 filtrates from rat leprosy through tested Seitz, Berkefeld N and W, and Chamberland L_2 and L_3 filters 16 gave positive cultures, while of 2 filtrates of human leprosy through Berkefeld N and W candles, the one through N gave a positive culture. These cultures from filtrates were in every case a pleomorphic and facultative acid-fast organism identical with the one cultivable directly from leprous lesions of the rat and man.

While it has been demonstrated by direct microscopic examination of centrifugal precipitates of filtrates that an occasional acid-fast bacillus, among the myriads present in a suspension of the organism, may pass through the pores of tested bacterial filters,[1] the probability of a chance contaminant or a microscopically unrecognizable secondary invader passing the filter in such a large proportion of the filtrates seems remote. Therefore, the repeated cultivation of this facultative acid-fast organism from filtrates of leprous tissues of the rat and man appear to furnish some support of the etiologic and endemiologic theories of leprosy advanced by us.[2]

7484 C

Chronic Toxicity of Dinitrophenol: Renal Function.*

T. L. SCHULTE AND M. L. TAINTER.

From the Department of Pharmacology, Stanford University School of Medicine, San Francisco.

In connection with the clinical use of alpha dinitrophenol (2-4),[1] it is important to know whether administration over long periods of time will produce changes in the functions of vital organs. Previous papers[2] from this laboratory contain limited data on this problem. This paper deals with the results of experiments designed to deter-

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2 Tainter, M. L., Boyes, J. H., and DeEds, F., *Arch. Internat. de Pharm. et de Therap.*, 1933, **45**, 235; Tainter, M. L., and Cutting, W. C., *J. Pharm. Exp.*