

## CORRESPONDENCE

*This department is for the publication of informal communications that are of interest because they are informative and stimulating, and for the discussion of controversial matters.*

Fate of *Mycobacterium leprae* in Macrophages

TO THE EDITOR:

Godal and Rees (IJL 38 (1970) 439-442) found no differences in the *in vitro* behavior of blood derived macrophages from five lepromatous as compared to five tuberculoïd leprosy patients with respect to their lysing ability of killed *M. leprae*. Since their results are in opposition to ours (Bull. Wld. Hlth. Org. 37 (1967) 461-476; A. Ge. Me. Ge (Roma), 17 (1968) 584-594), they have suggested that the discrepancy might be attributed to racial differences because our observations were made in Southern Brazil.

First, it should be stressed that some quotations presented by Godal and Rees may generate misunderstanding since they make it possible to attribute to Beiguelman statements that have been, in fact, presented by Barbieri and Correa (IJL 35 (1967) 377-381). Thus, we have neither published data on the *in vitro* macrophage behavior of healthy subjects, nor have we stated that mycobacterial lysis was complete in 10 to 16 days in Mitsuda positive patients. Our published observations were restricted to lepromatous and tuberculoïd cases and, of course, our statements should not be confounded with those of Barbieri and Correa.

The racial variance suggested by Godal

and Rees hypothesis can not be readily accepted, since Southern Brazilian leprosy patients include individuals belonging to a wide variation of racial stocks. Nevertheless, in our experience, the major differences in the macrophage lysing ability with respect to heat killed leprosy bacilli, either *in vivo* or *in vitro*, depend upon the leprosy form and not upon the ethnic group of the patient. Therefore, it seems more likely that technical variations (including the incubation interval), rather than racial differences, may be responsible for the conflicting results.

In any case, the variant findings require the adoption of a uniform technic in the different laboratories for the evaluation of this phenomenon.

As a matter of fact, Dr. Regina de C. B. Pisani and I have introduced some improvements in the technic formerly used in our laboratory. These make the assessment of the lysing ability of the macrophages against *M. leprae* easier. The details of this technic, as well as its application to 54 leprosy cases and to 40 healthy subjects will be published elsewhere.

—BERNADO BEIGUELMAN

Department of Medical Genetics  
State University of Campinas  
C. P. 1170  
Campinas, SP, Brazil