into investigating the allegations after the scientists had claimed they were baseless.

The appeal court in no way set aside the findings of the lower court that the accusations were defamatory. Indeed, it used the words "completely foundationless accusation of venality" to desecribe the charges. What it did rule, however, was that Devlin was insufficiently warned of the falsity of the charges by the scientists' responses, and so could not be accused of malice: "Mere denials, however vehement, are so commonplace . . . that they hardly alert the conscientious reporter to the likelihood of error". Nor, the court ruled, did the "largely irrelevant" mass of materials supplied provide a basis for warning of the falsity of the charges. There was not a "shred of evidence" that Devlin entertained serious doubts concerning the charges.

Further, the court held that even if Devlin had had such doubts, "We do not believe the press may be required under the First Amendment to suppress newsworthy statements merely because it has serious doubts regarding their truth". The public interest in full information required freedom to report charges; accordingly Devlin's article was held to be an "exemplar of fair and dispassionate reporting". Clement was also cleared because it was held that he had not known the *Times* would portray the five as paid liars when he supplied the list to Arbib.

The ways of the law sometimes puzzle scientists and perhaps the most puzzling aspect of this case is how a scientist, told he is to be called a paid liar, can adequately rebut the charge. The court ruled that simply calling the charges "emotional", "hysterical" and unfounded wouldn't even alert a reporter to falsity. Nor would sending him the scientist's stock-in-trade reprints, apparently do. It isn't clear that the appeals court looked at what was sent to the reporter, but they dubbed it "completely irrelevant to the libellous accusations".

It is also noteworthy that the one scientific issue got completely lost in the case—whether the bird statistics establish anything at all. Arbib's foreword claimed that bigger counts per birder arose from better techniques, but then implied that paid liars would simply fail to divide by the number of birders. Devlin did not even mention the question of improved techniques, implying much more strongly that certain scientists don't divide. But the scientists claim that they do and that the figures are still up. The question of better reporting *versus* bigger populations to explain these rises—the nub of the difference between the sides—was hardly advanced at all by this bloody court battle. □

ASBESTOS

Amplified evidence

Britain's Advisory Committee on Asbestos held hearings in London last week. Judy Redfearn reports

THAT there is a risk to health from asbestos cannot be denied; but among the general public and in the asbestos industry itself, there are conflicting views on how acceptable that risk is. In March 1976, the UK Health and Safety Commission set up the Advisory Committee on Asbestos to review the risk to different sectors of the public and to come up with recommendations on how asbestos should be used, if indeed it should continue to be used at all. Last week, the committee held three days of public hearings in London when it questioned some of those who had submitted evidence for its consideration.

At the heart of the debate was the acceptability of the asbestos dust levels which were recommended by the committee in an interim statement published in January. Occupational exposure to asbestos dust, that statement said, should be as low as possible, but should not exceed 0.2 fibres per cc when measured over a ten-minute period for crocidolite (blue asbestos, thought to be the most dangerous sort), and 2 fibres per cc averaged over a four-hour period for all other types of asbestos. But the safety of these levels depends on how accurately the incidence of asbestos-related disease can be predicted. As with other diseases caused by long term exposure to certain factors, such as the incidence of lung cancer in smokers, this is very difficult to assess.

The committee's recommended exposure levels were based on the results of a study carried out in 1966 by the British Occupational Hygiene Society (BOHS) on workers in an asbestos factory in Rochdale. The study concluded that an asbestos worker would have a 1% chance of developing an asbestos-related symptom if exposed to 2 fibres per cc for 50 years. A subsequent follow up study at the same factory, however, has come up with some different results.

Dr Julian Peto, of the Department of Health and Social Security's Cancer Epidemiology Unit at Oxford, was responsible for the later study. He told the committee that by the end of 1974 deaths from asbestos-related disease in those exposed for 25 years or more exceeded the total number of expected deaths by 30%. In 1966, the BOHS found nothing unexpected in the death rate. Peto's study also suggested that 5–10% of workers exposed for 50 years to concentrations of 1–2 fibres per cc of asbestos would be likely to die of asbestos-related disease. The discrepancy between the end result in the two studies, Peto suggested, could be due to the cumulative effect of asbestos exposure between 1966 and 1974 and the different way of sampling asbestos workers: Peto's study included all men who had been exposed to asbestos for 10 years or more between 1933 and 1972, whereas the BOHS study only included those still in employment there in 1966.

Furthermore, Peto told of evidence that chrysotile (white asbestos) could be as potent as crocidolite in causing asbestosis and pleural mesothelioma, an inoperable cancer of the membrane surrounding the lung. All in all he felt there was strong evidence that the present 2 fibres per cc level is inadequate but that there should be more research, especially into factors such as the effectiveness of pulmonary clearance below 2 fibres per cc.

But concern does not only centre on workers in asbestos factories. Asbestos is so widely used that most people at some time will have been exposed to it. Pressure is increasing to ban certain applications of asbestos such as asbestos paints and sprays and domestic use in general. The British Society for Social Responsibility in Science (BSSRS), using its evidence that cases of asbestosis and mesolthelioma have resulted from very short exposures to asbestos, is calling for a total ban on its use; it suggests that in the meantime personal protection for asbestos workers should be improved and safe substitutes should be introduced as soon as they are developed. But even a far more stringent standard poses problems. The recommendation from the Trades Union Congress of a 0.2 fibres per cc standard was thought technically impossible to achieve for most manufacturing processes, especially the dry processes which create a lot of dust and which are found in the asbestos textile industry.

The committee's task now is to digest the evidence gathered at the hearings and to call others forward to explain their case. No one yet knows when it will produce its report laying down recommendations for the future use of asbestos. There are provisions, however, for another interim report to be published if the evidence suggests that speedy changes are needed to the present ways of dealing with asbestos. □