experiments, he conducted his inquiry by doing "a lot of talking to people and thinking..." (1989 hearings, page 290).

Now Dr Eisen cites the fact that it took Walter Stewart "weeks" to make sense of my evidence as a defence for the failure of his investigation. First of all, let me point out that Walter Stewart had to start by learning the meaning of "idiotype" and other basic concepts in immunology. It still took him only weeks to conclude that the published table was wrong.

Second, Dr Eisen is a renowned world expert in the relevant speciality, and he had special familiarity with this particular study. He disputes my assertion that a brief examination of the evidence reveals obvious evidence of serious problems. That the evidence establishes that there are obvious problems is documented by the OSI draft report, which refers to it as "prima facie evidence" of serious problems (OSI draft report, page 114). Dr Eisen took six months before filing his report and he said in sworn testimony that his investigation "took time" and was "not cursory" (House Oversight Subcommittee hearing report, 12 April 1988, pages 290 and 285). If, during the course of this investigation, he gave only a "brief" examination to the evidence, this was certainly his decision

I repeatedly asked Dr Eisen to correct his report and his representations concerning me, but he attacked my character and refused to reconsider (House Oversight Subcommittee hearing report, 12 April 1988, page 99). I wrote a letter to him requesting that he correct the report and help me clear my name. When Dr Eisen's files were surrendered under subpoena, the letter was among them. He had not replied to me. He had merely written sarcastic comments in the margin and filed it. Dr Eisen's statement that I "never asked for [his] help" is thus falsified by documents he himself surrendered under subpoena.

Dr Eisen states that he fears I confuse disagreements with slander and libel. I do not. I maintain that the mere reiteration of the documented facts proves that I do not. Dr Eisen filed a written report stating that I had brought unsubstantiated allegations of misconduct and misrepresentaiton. For five years, Dr Eisen has vouched for the study in *Cell*, and assured the scientific community that my scientific concerns were trivial.

His description of those concerns was completely inaccurate and as a result I have been subjected to professional ridicule. And his failure to act on my request that he correct his investigative report is still without explanation.

Accuracy

Everything I have said above is part of the record and cannot be denied. The only part of my account not directly shown correct by documentation is my account of the meetings in 1986. My knowledge that certain experiments were not done and that others

were misrepresented came in large part from the 23 May meeting of the "Wortis committee" and the 16 June meeting with Dr Eisen present. Now that the draft OSI report has supported my position, it should be growing clear that the description of how I obtained this detailed and accurate information must also be correct.

Dr Eisen disputes my account of the 16 June meeting, saying he did not hear the admission I heard at the meeting. This denial must be viewed in light of his statement that my memo did not inform him of experiments that were not done; the assertion that he had no reason to consider fraud when his own report stated there was a "serious question about deliberate misrepresentation of data"; and his claim that I never asked for his help and his five years of vouching for the conduct of the authors and the soundness of the study.

Dr Eisen attempts to discredit my account

of the 16 June 1986 meeting by implying that my story has changed over the years. This is not the case. It is easy to verify that the account I give now is the same as that which I gave on the evening of 16 June 1986, during the rest of the summer of 1986, during my interviews with congressional aides and NIH officials in March, May and June 1988 before any of the evidence had been subpoenaed, in my testimony to Congress and throughout the current OSI investigation which began in 1899. (Indeed, a set of documents that appeared to contradict my account later proved to be fabricated.) In fact, as each piece of evidence is uncovered, someone usually has had to change his or her account to make it fit the evidence, but I have never had to do so. That my account has proved consistent with all the evidence that has come to light is no accident. I have been telling the truth all along.

Margot O'Toole

An open letter on OSI's methods

As scientists, we are deeply disturbed by the way in which the charges against Dr Thereza Imanishi-Kari in the well-publicized Cell case (leading article in Nature 350; 259, 1991) have been handled by the Office of Scientific Integrity of the National Institutes of Health. The need for formal, thorough and fair investigations of possible scientific fraud is clear. However, it is apparent that the procedures followed by the OSI have serious shortcomings, and have not permitted Imanishi-Kari the opportunity to defend herself by a public examination of the evidence against her. Whether or not she is guilty as charged, the precedents which have been set in this case are dangerous. The investigation occurred in a politically charged atmosphere under intense pressure from Congress, which provided the NIH with the Secret Service forensic analysis of Imanishi-Kari's notebooks upon which the serious charges of fabrication are based (News and Comment, Science 251; 1552). The confidential draft report of the OSI was broadly leaked to the news media with

SIGNATORIES

Mahmoud Abu-hadid, Jim Allison, Chester Alper, Fred Alt, Ashok R. Amin, Andrei Augustin, Richard B. Bankert, Donald Bellgrau, Michael J. Bevan, Willi K. Margaret Bradley, Patricia Busto, John Cambier, Priscilla A. Campbell, Michael Cancro. Harvey Cantor, Paolo Casali, Jan Cerny, J. Latham Claffin, Edward A. Clark, Nicholas Cohen, Max Cooper. Ronald Corley, Carol Cowing, B. Anne Croy, Chella David, Bernard D. Davis, Dean Dawson, Raymond A. Daynes, Vittorio Defendi, Robert DeMars, Margaret E. Diamond, Martin Dorf, Wesley A. Dunnick, Bo Dupont, Jeannine Durdik, Michael Edidin, Douglas Faller, Ann Feeney, James Ferrara, John H. Freed, Glen Gaulton, Patricia Gearhart, Victor Ghetie, Laurie Glimcher. Edmond Goidl, Daniel Gold, Leonard Herzenberg, Leonore Herzenberg, John A. Hirst, Georg Hallander, Maureen Howard, Leaf Huang, Judith A. Kapp, John Kappler, John Kearney, Raymond Kelleher Jr, Garnett Kelsoe, Norman Klinman, Brian L. Kotzin, Ralph T. Kubo, Pamela J. Lein, Donald Y. M. Leung, Dan Littman, Michael Margolies, Philippa Marrack.

devastating impact before Imanishi-Kari could even comment on it, much less cross-examine the witnesses who brought charges against her, or examine and challenge the physical evidence against her. Funding was withdrawn prior to a finding.

The OSI needs to enjoy the confidence of the scientific community, as well as Congress and the public, in order to fulfill its function. The informal and private procedures of the OSI do not provide adequate safeguards for the accused once criminal activity is alleged. The government should not be able to use the OSI procedures to proclaim fraud from behind closed doors, nor should an expert panel of distinguished scientists be made to appear to have acted as a jury under circumstances that did not permit the defence to make a case.

Under the circumstances, we reserve judgement about the facts of this case until Imanishi-Kari has had an adequate opportunity to defend herself. It is not clear to us that the current procedures will allow this to occur.

Marshak-Rothstein, Bernard Mathey-Prevot, George L. Mayers, Daniel Meruelo, Richard Miller, John G. Monroe, Claire Moore, Robert Moreland, Donald E. Mosier, Christa Müller-Sieburg, Rebecca O'Brien, Zoltan Ovary, Drew Pardoll, Mary Lou Pardue, David Parker, Jane Parnes, Julia M. Phillips-Quagliata, Carl W. Pierce, Joan Press, Michael Quinones, Klaus Rajewsky, David H. Raulet, Carol Reiss, Elizabeth A. Reparsky, Phillips Robbins, Derry Roopenian, Fred Rosen, Yvonne Rosenstein, Thomas Rothstein, Barry Rouse, David Sacks, Dwayne Savage, Mosello Schnechter, Jonathan Schneck, Dan Schulze, Joel Schwartz, David Scott, Erik Selsing, Jyoti Sen, Ranjan Sen, Eva Severinson, Alan Sher, Hyun Shin, Charles Sidman, Colin Sieff, Philip Siekevitz, Sandra Silberman, Alfred Singer, Kendall A. Smith, Abraham L. Sonenshein, Jonathan Sprent, Uwe D. Stnerz, Janet Stavnezer, Lisa Steiner, J. Wayne Streilein, John L. Sullivan, Judy Teale, Jeanette Thorbecke, Annamaria Torriani, Phil Tucker, David Ucker, Martin Weigert, Irving Weissman, Darcy Wilson, Andrew Wright, Sandra J. Yokota, Maurice Zauderer, lan Zitron, Marjorie B. Zucker