

CLOSEOUT FOR M91100041

On October 28, 1991, Dr. [REDACTED] informed OIG of allegations of misconduct in science she had received from Dr. [REDACTED] the complainant. The complainant, a faculty member at [REDACTED] served as an *ad hoc* reviewer for proposal [REDACTED] entitled "[REDACTED]". The proposal was submitted by Dr. [REDACTED] the subject. The subject is a faculty member at [REDACTED] University. The complainant alleged that a table appearing in the proposal's appendix had been plagiarized from a paper¹ by another scientist, and that a paper² by the subject contained text plagiarized from that scientist's paper.

OIG compared the other scientist's paper with the subject's paper and the proposal table. OIG found 4 short sections of proposal text describing the table and 19 sections of text of varying length in the subject's paper that appeared to have been copied or closely paraphrased from the other scientist's paper. OIG found that the numbers in the proposal table were remarkably similar to those in the other scientist's table. The complainant said that the values in the table published in the scientist's paper represented those collected from individual experiments in which the values varied greatly. Thus it was highly unlikely that the subject's experiments would have resulted in values so similar to those. OIG also found that the values and trends for data within the copied or paraphrased sections of the subject's paper were different than those in the other scientist's paper but, again, were remarkably similar. OIG concluded that, because the numbers in the copied material in the subject's proposal and paper were similar, but not identical, to those in the source document, it was unlikely that the subject had plagiarized these numbers, but it was possible that he had fabricated them. OIG concluded that there was sufficient substance to the allegations of plagiarism and fabrication to conduct an investigation.

OIG informed the subject's institution of the allegations and, at its request, OIG deferred its own investigation until the institution's investigation was completed. The committee collected laboratory notebooks and other relevant records and formed its conclusions after reviewing these records and interviewing the subject and the technician.

¹ The paper was entitled, "[REDACTED]". The authors were [REDACTED] and [REDACTED]. It was published in [REDACTED].

² This paper was entitled, "[REDACTED]". The authors were the subject and [REDACTED]. It was published in [REDACTED].

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Fabrication of Data

The investigating committee found that no research or purchase-order records supported the subject's assertion that he had conducted the experiments that produced the data found in the proposal table. He said he had performed the experiments several years before the NSF proposal was submitted and he had recorded the data on loose-leaf paper. He had discarded these papers along with other materials during a recent general laboratory cleaning. Although the committee could find "no positive evidence" that the experiments were performed it also was unable to reach the "positive conclusion" that the data were fabricated. The committee concluded that there was "solid quantitative evidence" that the experiments described in the subject's paper were performed. Although the committee concluded that records of the data presented in the subject's paper were "incomplete and sloppy," it also concluded that these records supported the subject's and technician's statements that they had conducted the experiments in question.

Plagiarism

Of the 23 sections identified by OIG, the committee concluded that the text in 8 of them (found in the paper) was constrained by "rhetorical limitations." It however found "it difficult to escape the conclusion that" the paper and, "albeit to a negligible extent" the subject's proposal "contain[ed] numerous instances of rank copying" not explained by rhetorical limitations. It noted, however, that both the proposal and paper contained citations to the other scientist's paper. It characterized the subject's actions as "truly lamentable, but without deliberate attempt to deceive, [he] liberally borrowed large portions or wording from the [paper] as a kind of short-cut, conscious or not" It said, "while there is a preponderance of the evidence for rank copying, a conclusion of rank plagiarism does not seem reasonable. Rather, what we have here is copying of other authors' work without sufficient attribution to it."

The Institution's Actions

The institution accepted the committee's report and conclusions that the "charge of fabrication of laboratory data is unsupportable due to insufficient evidence" and that "there is support of the allegation of misconduct in the form of numerous instances of rank copying." The subject received a letter of reprimand which was to remain in his personnel file for at least three years. He was directed to provide a written statement describing how he was correcting the "deficiencies found in [his] laboratory practices and in [his] written work," and instructed to have the chairman of the investigating committee review his handling of research data quarterly for a period of one year.

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OIG requested clarification on several points in the investigation report including: the subject's discarded research records, his practice of keeping laboratory records on loose-leaf paper; its characterization of the subject's actions as "rank copying" and the intent with which he acted as "lamentable carelessness." Because OIG was concerned about the practice of discarding research records, OIG requested clarification on the institution's policy on the retention of such records. NSF's *Grant General Conditions* specify that the institution, as grantee, must retain access to research records generated in the course of NSF-supported work for a period of three years from the submission of a final report.

The Institution's Response

The committee said that both the subject and his technician testified that the subject's normal practice was to record his research findings on loose-leaf paper. These papers, among others, were discarded in a general laboratory cleaning. They were not preferentially discarded. It said that the experiments yielding the data in the proposal table were conducted prior to the funding of the subject's only NSF award. Since the investigation, the subject has submitted, as required, a plan to correct his "deficiencies." The committee stated that the institution did not have a policy on the retention of research records but was currently developing one as part of its comprehensive revision of university policies and practices.

The committee said it considered "rank" plagiarism to be "the use of others' words and ideas without attribution and with the intent to deceive readers by portraying the ideas and works thus appropriated as one's own." Rank copying was defined as "outright copying from another's written or other work, but without the intent to deceive or claim the ideas as one's own." The committee concluded that the subject had not "intended to pass off the [other scientist's] work totally as his own" because the paper contained several references to the other scientist's paper, although they were not associated with the copied text. It concluded the presence of these citations "undermine[d] a finding of rank plagiarism." It found that "rank copying" had occurred that "constitute[d] bad scholarship." However, "absent a clear indication of intent to deceive" it concluded that a finding of misconduct in science was "problematic." It said the subject's actions were "lamentab[ly] careless" which was, in the committee's eyes equivalent to negligence.

OIG's Conclusion

Once OIG receives an institution's investigation report, it reviews the report to see if it considers it accurate and complete, whether usual and reasonable procedures were followed, and whether the report can be adopted in lieu of OIG's own investigation. OIG disagreed with the committee's findings and conclusions, but accepted the institution's investigation report. OIG believes that, in this case, the citations to the source document in the subject's paper do not reduce his actions to "rank copying" and that the committee failed to provide an

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adequate explanation for the subject's failure to provide attribution for the copied sections when, by his citation to the source document in other places in his paper, he showed he was clearly aware of the source document. OIG further believes that "intent to deceive" can often be inferred from a subject's actions, and may well have been present in this case. OIG found no circumstances in this case that could explain the subject's actions as "lamentable carelessness."

However, OIG also concluded that the allegations in this case could not be pursued further. Regarding the allegation of fabrication, there was no positive evidence that the subject had not performed the experiments to produce the data in the NSF proposal table. The committee stated that the subject's notes had not been preferentially discarded and, given the length of time that had passed since the experiments were conducted (approximately 9 years ago), it is believable that they might have been discarded. Regarding the allegation of plagiarism, the amount of paraphrased text in the NSF proposal, seven lines, is not considered sufficiently serious, on its own, to pursue the investigation. The copying found in the subject's paper is, however, extensive. Despite this, OIG can not pursue this allegation because the work was supported by another agency. Therefore, OIG closed this case without a finding of misconduct. It recommended to the institution that it forward its investigation report to the other funding agency, as required by its regulations.

cc: Staff Scientist, Deputy AIG-Oversight, AIG-Oversight, IG