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Editorial

What is a problem statement?

In reviewing numerous manuscripts for possible publication in this peer-reviewed journal, as well as reading numerous studies published in other journals, we repeatedly find that problem statements are absent or incomplete, and there seems to be continuing confusion as to what comprises a problem statement. Are purpose and problem statement synonymous? Does a study objective, hypothesis, or summary of the content of the report comprise a problem statement? To add to the confusion, research methods textbooks in the social sciences do not clarify the matter, although they may note that research examines problems or that it engages in problem solving.

More than a decade ago, Hernon and Metoyer (Hernon & Metoyer-Duran, 1993; Metoyer-Duran & Hernon, 1994) supplied sample problem statements to researchers in library and information science and other social science disciplines in an attempt to investigate different attitudes toward the composition of a problem statement. They discovered nine attributes that respondents associated with problem statements (Hernon & Metoyer-Duran, 1993, pp. 82–83):

1. clarity and precision (a well-written statement does not make sweeping generalizations and irresponsible statements);
2. identification of what would be studied, while avoiding the use of value-laden words and terms;
3. identification of an overarching question and key factors or variables;
4. identification of key concepts and terms;
5. articulation of the study's boundaries or parameters;
6. some generalizability;
7. conveyance of the study's importance, benefits, and justification (regardless of the type of research, it is important to address the "so what" question and to demonstrate that the research is not trivial);
8. no use of unnecessary jargon; and
9. conveyance of more than the mere gathering of descriptive data providing a snapshot.

Reinforcing the seventh point, Moffatt (1980, p. B2) noted that "a great deal of published academic writing in any field is mediocre and pedestrian," even if it appears in peer-reviewed journals. Consequently, manuscripts submitted for publications should be able to withstand a

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reviewer raising the "so what" question. Furthermore, a problem statement should be specific, manageable, and written to stimulate reader interest. If the purpose is publication in a peer-reviewed journal, the proposed research should contribute to the literature of the profession and perhaps beyond.

1. The components of a problem statement

More than 30 years ago, one of us while a doctoral student took a course on reflective inquiry taught by one of the foremost researchers in higher education at Indiana University. His conceptualization of a problem statement actually guides the expectations we have for all papers submitted for review in *Library & Information Science Research*. Furthermore, over the years, that conceptualization has gained resounding support from other researchers.

Dr. David Clark stressed that any problem statement in the social sciences should contain four components:

1. lead-in;
2. declaration of originality (e.g., mentioning a knowledge void, which would be supported by the literature review);
3. indication of the central focus of the study; and
4. explanation of study significance or the benefits to be derived from an investigation of the problem.

Study significance must survive the "so what" question as well as the "how so" question, and the lead-in helps set up the third component and attract a readership.

Dr. Clark viewed a purpose statement as part of the third component, adding that a statement of purpose indicates what the study will accomplish but does not place that goal or task in the context of a problem. Some researchers, he noted, prefer to substitute an overarching question or two for a purpose statement. A mere question, however, does not identify a problem, that is, a conflict or something unsettled, perplexing, vexing, distressful, and in the need of investigation. For illustrative purposes, suppose that two people do not get along. There is definitely a conflict or problem. Does the resolution of the problem, however, require, the conduct of research, or might there be other ways to resolve the conflict? The problem statement must clearly indicate the former, if the intention is to support a research study.

Dr. Clark also reminded his students that a subsequent section of reflective inquiry covers "objectives, research questions, and hypotheses," and therefore these components are out of scope for the problem statement.

In teaching students to write good problem statements, he required them to develop three, interlocking short sentences: (1) the lead-in, (2) a statement about originality, with an identification of what the study would do, and (3) a justification. For example,

1. Gatekeepers act as agents of acculturation when they disseminate information within their ethnolinguistic communities.

2. Yet, no study has probed the information-seeking behavior and the information dissemination practices of those gatekeepers in the complex, digital environment of today. (The word "yet" could be dropped in the final write up of the problem statement.)
3. Insight gained from such a study would be useful for public libraries seeking to serve the residents of ethnolinguistic communities.

Several questions arise logically from these initial steps, and as the hypothetical author develops the actual problem statement and background sections, these questions will have to be addressed. First, are the three sentences interlocking and do they suggest an unsettled or perplexing state? Second, who are gatekeepers and what comprises ethnolinguistic communities? A background section could address such matters. Third, does information-seeking behavior encompass information dissemination practices? Does the second sentence narrow and sufficiently clarify the intent of the proposed study? And, finally, the third sentence will have to result in a paragraph or two that addresses how the data to be gathered will useful for public library service improvement and planning. Once the problem statement is written, the remaining parts of the research study should flow from it.

In a sense, research is like dealing with a set of propositions in a debate or an argument adhering to the principles of logic. The purpose is to persuade or gain acceptance of the conclusion. To do so, it is essential for others to accept the first and all subsequent propositions. The problem statement is the first proposition, and we need to accept it before considering the next proposition.

References

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