Factors Affecting Faculty Perceptions of Academic Libraries

Data from a survey of the teaching faculty at three academic institutions show the effects of four variables upon their perceptions and use of their libraries. Of the four—institutional affiliation, subject area, academic rank, and length of time at the institution—length of time proved most often to be the statistically significant factor. This suggests that academic librarians might intensify their public service efforts for newer faculty.

A few others have extended their research to include an examination of the relationship between variables.

Allen, in studying attitudes and use among community college students and faculty, discovered that neither level of education nor field of specialization was a significant indicator of differences for the faculty. 5

In his examination of faculty awareness and attitudes toward reference service, Nelson found that level of awareness was directly related to rank and length of time at the institution. 6

The present study is an effort at further statistical exploration of the relationship among selected variables dealing with the perception of an academic library by its faculty.

Specifically, the questions posed were: How does institutional affiliation, subject area, academic rank, or length of time at an institution affect faculty members' attitudes toward their library? And, based upon those findings, what can academic librarians do to facilitate library use by the faculty?

The data analyzed for this study stem from a survey of faculty use of the libraries at three small private institutions of higher education in Worcester, Massachusetts: Clark University, the College of the Holy Cross, and Worcester Polytechnic Institute (WPI). 7 Because the original survey was aimed at determining the viability of merging the three separate libraries, many of the questions included were pertinent only to

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tricollage cooperation. This paper examines the items comprising the portion of relevance to faculty members' use of their own institution's library.

**METHODOLOGY**

In March 1977 a questionnaire was sent to selected faculty at the three institutions. Although the size of both the faculty and student body at each school is comparable, their academic orientation varies considerably: Clark is a liberal arts school with a historically strong graduate program; Holy Cross is basically an undergraduate liberal arts institution; WPI is predominantly an undergraduate science and engineering college.

The sampling frame was the faculty roster found in each college's catalog for the 1977-78 academic year. From these were excluded all nonteaching faculty (e.g., librarians, administrators, adjunct personnel), all non-full-time faculty (e.g., affiliate personnel), and all nonpermanent faculty (e.g., visiting professors). Thus the population consisted of all full-time teaching faculty at the three schools, a total of 474. Because of the relative homogeneity of the population, a 25 percent simple random sample of the full-time teaching faculty at each institution (a total of 121) was selected to receive a mail questionnaire.

The survey consisted of thirty multipart questions in the areas of personal background, library use, and library evaluation. The design used a five-point scale for response categories and a checklist response format to allow minimum effort on the part of the respondents.

Members of the sample were assured of questionnaire confidentiality, although form coding allowed a record to be kept of nonrespondents. Two weeks after the date of receipt of the original questionnaire by members of the sample, a follow-up letter and second copy of the questionnaire were sent to faculty who had not yet responded. One week later, the staff at each library made telephone calls to the remaining nonrespondents in their respective institutions, requesting form completion and return.

The response rates for the three schools varied: Clark returned 25 usable responses out of 38, or 66 percent; WPI, 30 out of 44 questionnaires, or 68 percent. The Holy Cross faculty returned 82 percent, or 32 out of 39, of the questionnaires. This resulted in a 72 percent (87 out of 121) overall return rate.

**VARIABLES**

For this study the responses were analyzed to ascertain the significance of four characteristics of the faculty members upon their use of, perceptions of, and attitudes toward their academic libraries.

The independent variables, or characteristics of faculty members, were: institutional affiliation, subject area, academic rank, and length of time at the institution.

The dependent variables cross-tabulated with these characteristics were faculty responses to twenty-three questions covering the following general areas: expectation of finding a specific item in their library; perceptions of whether student library needs are satisfied; attitudes toward the importance to their use of the library of items such as the helpfulness of the library staff, quality of the collection, library hours, convenience of access; and perceptions of the adequacy of library services for their teaching and research needs.

It was expected that three of the four independent variables, namely, subject area, academic rank, and length of time at the institution, would result in statistically significant differences in responses to these questions. Since previous research had shown that variation in library use and attitudes among faculty at all three schools was not substantial, institutional affiliation was not considered to be potentially significant.

The subject field of each faculty member was expected to yield significant differences because of the differing needs and uses of literature in the various disciplines. The significance of academic rank was posited because of the differing reasons for library use, different levels and types of courses taught, and different degrees of teaching and research experience associated with increasing rank.

Finally, the faculty member's length of stay at an institution was expected to be significant because a longer term suggested a correspondingly longer period of library
use and, hence, more familiarity with the institution's library. In addition, results for academic rank and length of stay were expected to be similar, since higher rank is usually related to length of time at an institution.

**RESULTS**

Because the data that were collected consisted of frequencies in discrete categories, the chi-square test was used to determine if there were any significant differences among faculty members in library use and attitudes, as related to subject field, academic rank, institutional affiliation, or length of time at the institution. Since this test may be used only if the expected frequencies in each cell of the contingency table are sufficiently large, it was sometimes necessary to combine adjacent categories in order to increase the expected frequencies in various cells. In addition, "no opinion" categories were dropped from the calculations, although those figures are reported in notes to the tables.

Items such as success in a specific item search, convenience of access, hours, circulation policies, quality of reference service, quality of the collection, acquisition procedures, and physical environment were expected to show significant differences when cross-tabulated with three of the independent variables. However, of the ninety-two cross-tabulations performed (for each of the four independent variables with the twenty-three dependent variables), only seven resulted in significant differences at the 0.05 level. As expected, institutional affiliation yielded no significant differences when crossed with any of the dependent variables. Findings related to the other independent variables were of greater interest.

Subject field and academic rank of the faculty members each resulted in only one significant area of difference, for the same question on expectation of finding specific items in the library (table 1). By subject field, the faculty members in the sciences were most positive in their evaluations, with thirty (85.7 percent) of those respondents always or frequently expecting success in a known-item search. On the other hand, only fifteen (68.2 percent) of the humanities faculty and twelve (52.1 percent) of the social sciences faculty always or frequently expected success.

In the cross-tabulations by rank, twenty-eight (90.3 percent) of the full professors always or frequently expected success for a specific item search; in contrast, only nineteen (70.4 percent) of the associate professors and fifteen (53.6 percent) of the assistant professors, lecturers, and instructors held such high expectations.

The characteristic that yielded the largest number of significant differences when cross-tabulated with the dependent variables was that of length of time at the institution. Table 1 illustrates the results concerning expectation rate: high expectations of finding specific items sought were expressed by forty-two (85.7 percent) of those who had been at an institution for seven or more years, but only by twenty (55.5 percent) of those whose length of stay was fewer than six years.

Table 2 shows the relationship of length of time to four other variables.

First, it was found that forty-three (89.6 percent) of the faculty members whose length of stay exceeded seven years believed that their students' library needs were being satisfied, while this belief was shared by only nineteen (55.9 percent) of the faculty with shorter lengths of tenure.

Also, more of those in the "7+ years"
TABLE 2
RELATION OF LENGTH OF TIME
AT AN INSTITUTION
TO FOUR VARIABLES

When your students go to your library
[because of your encouragement, for course-
related reasons], are their library needs satisfied?

<table>
<thead>
<tr>
<th>Length of Time</th>
<th>Number of Responses</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Yes</td>
</tr>
<tr>
<td>0–6 Years</td>
<td>19</td>
</tr>
<tr>
<td>7+ Years</td>
<td>43</td>
</tr>
</tbody>
</table>

\[ \chi^2 = 10.50 \quad 1 \text{ df} \quad \text{sig = .001} \]

Rank the importance of the helpfulness of the
library staff in your use of [the] library.

<table>
<thead>
<tr>
<th></th>
<th>Ranked First, Second, Third</th>
<th>Fourth, Fifth, Sixth</th>
</tr>
</thead>
<tbody>
<tr>
<td>0–6 Years</td>
<td>21</td>
<td>12</td>
</tr>
<tr>
<td>7+ Years</td>
<td>37</td>
<td>6</td>
</tr>
</tbody>
</table>

\[ \chi^2 = 4.02 \quad 1 \text{ df} \quad \text{sig = .04} \]

Rate the adequacy of the speed of cataloging
for your teaching and research needs. *

<table>
<thead>
<tr>
<th></th>
<th>Very Adequate/ Adequate</th>
<th>Inadequate/ Totally Inadequate</th>
</tr>
</thead>
<tbody>
<tr>
<td>0–6 Years</td>
<td>18</td>
<td>8</td>
</tr>
<tr>
<td>7+ Years</td>
<td>38</td>
<td>3</td>
</tr>
</tbody>
</table>

\[ \chi^2 = 4.78 \quad 1 \text{ df} \quad \text{sig = .03} \]

Rate the adequacy of the quality of the collection
in your field of interest for your teaching and
research needs. +

<table>
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<tr>
<th></th>
<th>Very Adequate/ Adequate</th>
<th>Inadequate/ Totally Inadequate</th>
</tr>
</thead>
<tbody>
<tr>
<td>0–6 Years</td>
<td>13</td>
<td>17</td>
</tr>
<tr>
<td>7+ Years</td>
<td>40</td>
<td>8</td>
</tr>
</tbody>
</table>

\[ \chi^2 = 11.79 \quad 1 \text{ df} \quad \text{sig = .0006} \]

* No opinion = 18.
+ No opinion = 1.

category ranked the helpfulness of the library staff high in terms of importance to
their use of the library (thirty-seven, or 86.0 percent, as opposed to twenty-one, or 63.6 percent, of the "0–6 years" category).

Finally, fewer of the newer faculty gave
high ratings to the adequacy of the speed of cataloging (eighteen, or 69.2 percent) and to
the adequacy of the quality of the collection
in their field (thirteen, or 43.3 percent).
This contrasts sharply with the positive responses indicated by those with longer lengths of stay: thirty-eight, or 92.7 percent, and forty, or 83.3 percent, respectively, felt that these two factors were adequate or very adequate.

DISCUSSION
Three conclusions stand out.
First, for most of the survey questions
dealing with satisfaction or adequacy of the collection, policies, and staff of the library, there are no significant differences in the responses by school, field, rank, or length of time at the institution of the responding faculty member. Many of these results were unexpected and indicate the need for further study.

For example, the results did not support the conjecture that subject field would yield significant differences when cross-tabulated with the dependent variables. Likewise, the expectation that responses broken down by rank and length of time at the institution would be more similar because the frequent correlation between the two was not confirmed — length of time yielded five items that were significantly different when cross-tabulated, contrasting with only one item for rank.

Second, significant differences by subject field, rank, and length of time at the institution were found in expected satisfaction rate for a known item search. Again, further investigation would help to clarify these findings.

The fact that faculty in the sciences exhibited the highest satisfaction of expectations may be a reflection of the more compact nature of scientific literature, as compared with those of the humanities and social sciences. Circulation policies may also have a bearing on the matter — material of greatest use for scientists tends to be current periodical literature, usually not circulated and therefore more readily available in the library.

The inverse relationship of high satisfaction rate and lower academic rank may be attributable to various reasons, including varying levels of research needs to be satisfied. Those at the assistant professor level may be under greatest pressure to conduct publishable research and, hence, may demand more of their libraries, while tenured professors might have less urgent research needs and require less.

Additional factors to consider are the possible relationships of increased power to affect library policy with higher academic rank and of declining expectations with age (assuming a correlation between greater age and higher rank).

This suggests several strategies for the
improvement of service to the faculty. For example, subject bibliographers and acquisitions librarians may need to review their selection policies to eliminate causes of dissatisfaction, for example, through the purchase of multiple copies where necessary. Closer contact with the faculty may also be desirable for librarians to keep abreast of the faculty's current research interests and provide concomitant bibliographical support. Changes in circulation policies may also increase satisfaction rate.

Third, and perhaps the most prominent finding, is that faculty members with less time at an institution are the most dissatisfied members. There are several possible reasons for this: newer faculty are less familiar with the library and its services, they may use the library more, they may come from institutions with stronger libraries, etc.

For librarians, a noteworthy observation is that these dissatisfied faculty members are also the group that ascribes lesser importance to the helpfulness of the library staff. This suggests that librarians should focus upon new faculty members as a target for concentrated public relations and public service efforts. This is underscored by further analysis of the data.

As mentioned earlier, Nelson's 1973 study of faculty awareness of reference services found that "level of awareness varied directly with length of service at the college." That is, using ten years as the dividing line, Nelson showed that faculty who had taught at the college longer had higher mean awareness scores than those with a lesser length of tenure. A cross-tabulation of the present data using ten years instead of seven as the dividing point produced significant differences at the 0.05 level for the same items as before, with a single exception: importance of helpfulness of library staff in faculty use of the library.

The most negative response from this group of newer faculty dealt with their perception of the adequacy of the collection in their areas. It is possible that the satisfaction of the older faculty stems from their own participation over the years in collection building.

To act upon these findings, librarians may draw upon techniques proposed in the library literature. Among these activities are: first, to direct faculty attention upon the resources of the library, Koppelman suggests the arrangement of faculty orientation tours. Workshops solely for faculty members have also been conducted with success, whether focusing upon general library resources or specific areas of library service. The structuring of formal channels of communication can be achieved by means of membership on library liaison committees and, where appropriate, by librarians' attendance at departmental meetings. Uses of printed communication include the dissemination by librarians of house organs and handbooks, as well as form letters and informal memoranda. Nelson reports that informal, personal notes have been found to be particularly productive.

The involvement of librarians in the teaching process is recommended through the delivery of lectures to individual classes and through membership on academic committees outside the library, for example, curriculum committees. A basic groundwork may be laid simply by studying course schedules and becoming familiar with the academic programs of the various departments. Greater support for the research and teaching activities of faculty members may be accomplished through SDI services; the Mechanized Information Center at the Ohio State University Libraries is a working example. Other services reported as successful devices include the availability of manual current awareness systems and of comprehensive research assistance, and the compilation of topical research guides, all initiated by library staff "in anticipation of the needs of . . . users."

The strengthening of personal relationships among individual librarians and faculty is likely to be a by-product of any of the techniques mentioned above. More active approaches include the assignment of a librarian as an official liaison with faculty in each department. Finally, the merits of informal contacts through coffee breaks and open houses have been advocated by several authors. By implementing selected programs of this sort, librarians can not only help to ensure the building of collections appropriate to the interests of these groups.
but also alert them at an early stage to services available in the library.

Several potential areas of research have already been mentioned. In addition, other questions raised but not dealt with in this study are: Do academic libraries have adequate collections and collection development policies to meet the needs of their newer faculty? Are senior faculty members as a whole less active in conducting research? Is their satisfaction with the library based on lowered expectations resulting from past failures? Do the interests of newer faculty tend to center on newly developing areas, in which existing library holdings are inadequate? Finally, investigating specific causes of dissatisfaction among new and lower-rank faculty would be beneficial in determining factors of which librarians may not even be aware.

**References**

7. Results of the original survey are available as ERIC document ED 143 346, *The Viability of Merging Three Academic Institutions in Worcester*, by David Kaser and Jinnie Y. Davis.
8. Ibid. See p.93-98 for the specific items asked in the questionnaire.
15. Lehman, "Library-Faculty Liaison," p.102.
17. Lehman, "Library-Faculty Liaison," p.103.
22. See, for example, the articles by Holley and Rader, cited above, or Lee Lebbin's "Communication Spelled C-O-F-F-E-E" in *Michigan Librarian* 38:8-9 (Autumn 1972).