The need for academic research in public administration is widely recognized, but several recent assessments have concluded that relatively few of the core problems of public administration have been studied adequately or intensively. In the most recent assessment of public administration research, Stallings and Ferris concluded that the field has produced a long list of questions to study and that it possesses the methodologies with which to study them. However, the field has yet to find a strategy for linking important research questions with the techniques for answering them.

Although explanations for this state of affairs vary, the fundamental explanation lies in the multiple missions of public administration programs. Public administration faculty have professional service missions in addition to academic ones. And their professional teaching mission requires them to emphasize the transmission and application of knowledge over the generation of new knowledge. Both of these aspects of the mission of public administration programs reduce the time and resources available for faculty research. In addition, public administration and the social sciences generally come out poorly in comparison with other disciplines/professional schools in the competition for university research resources.

For many reasons, however, research should become more prominent in public administration programs. The first is the basic responsibility of public administration faculties and students to advance knowledge in the field. In less positive terms, it is to defend the position that public administration warrants recognition as a separate field, with semi-autonomous or independent organizational and degree status from political science or business administration. If public administration is to maintain its claim to independence from other fields, it must not only import theory and knowledge from them, but it must also export theory and knowledge. A related, but perhaps more compelling, consideration is implied in the title of an article published in the Public Administration Review in 1963: "Can we teach what we don't know?" Public administration educators and scholars have an obligation to extend the frontiers of knowledge given their central roles in the educational process.

A second reason for heightening research as a priority is that the preparation of doctoral students requires a rich research environment involving active faculty researchers, assistantships, and opportunities to work on real research projects. Recent assessments of doctoral programs in public administration by McCurdy and Cleary, White, and Stallings indicate that doctoral programs in public administration often fail to prepare students to undertake significant research. This state of affairs could have serious consequences for the future capacity of public administration and public affairs programs even to undertake research, let alone to be at the forefront. Therefore, it could threaten the viability of the field.

A third reason why research should be given greater priority is quite pragmatic. Research effectiveness can provide tremendous leverage for space, equipment, and financial resources from a university administration. University administrators regard research as important to the university's reputation, view externally-funded research as a mark of accomplishment as well as an expansion of total university resources, and consider research entrepreneurship and productivity as signs of vigorous, first-rate academic departments.
In view of this powerful leverage from research, a strong case exists for giving research greater priority within public administration schools and programs. Giving higher priority to public administration research requires institutional supports for its development and clear assignment of responsibility for managing those supports. This conclusion stems from the observation that the reputation of leading research institutions is related to the kind and level of institutional supports provided for research. Suggestions here for improving research in public administration, therefore, draw from existing research and experience.

**Institutional Supports, Reputation, and Research Productivity**

The suggestions offered later in this article for improving academic research have two important limitations. First, they presume the conduct of empirical research or the development of grounded theory, both of which involve intensive fieldwork and data collection whether the research is quantitative or qualitative. Consequently, the suggestions might not apply as well to critical theory or to other nonempirical research.

Second, data are not available that directly support all the suggestions for improving research. Hence some suggestions may have lower yield than others. However, it is encouraging that strong support exists for the argument that institutional supports affect research productivity. This support exists in three different streams of research: the correlates of university reputations, the correlates of reputation and productivity in public administration programs, and the study of different organizational models for research production.

Research reported in 1988 on the correlates of the reputation of universities shows that inputs such as the level of extramural funding, faculty salaries, and resource allocation strategies (e.g., "peaks of excellence" versus uniform investment among many programs) are correlated with the reputational ranking of research universities. This research also indicates that the rankings of universities are stable over time and, therefore, that it takes substantial investments over long periods of time to change the relative status of a particular university, department, or program.

The analysis of reputation and productivity in public administration and public affairs has thus far focused on ranking schools and programs rather than examining the correlates of productivity. Morgan et al.'s 1981 productivity rankings were used as the basis for an analysis here of 1988 institutional supports provided by the upper- and lower-ranked public administration programs in the United States. This analysis clearly indicates that the top-ranked schools provide more of the types of institutional supports discussed in this article than do the lower-ranked schools. Table 1 is a summary comparison of the two groups on each of ten different supports.

The table shows that the top-ranked schools are four times as large as the lower-ranked schools, but each group has similar teaching loads. The top-ranked schools tend to recruit new nontenured faculty from top-ranked schools, whereas the lower-ranked schools do not. The top-ranked schools are much more likely to provide research supports for new nontenured recruits in the form of reduced teaching loads and committee assignments, summer salary, computing support, and other resources such as research assistants, travel money for research conferences, and seed money for research. The top-ranked schools also are much more likely to have a research-oriented PhD program, to have seed money for research proposals, to have organized research units, and to generate extramural funding for research. The top-ranked schools generate more than ten times the extramural funding of the lower-ranked schools. Both groups of schools permit buy out of teaching, mainly at full cost. However, the lower-ranked schools seldom use the buy out provision.

The study of different organizational models for research production has compared organized research units (ORUs) and department-based research. Friedman and Friedman found that department-based research efforts tend to have fewer, and lower levels of, institutional supports than ORUs. The latter tend to be created precisely to overcome the limitations of department-based research and, consequently, tend to have more institutional supports and higher levels of such support. The Friedman's found that ORUs tended to:

1. Stimulate new research, facilitate research, and support collaboration better than department-based efforts.
2. Attract more research-oriented faculty, graduate students, and postdoctoral students than department-based efforts.
3. Garner more specialized staffs, better instrumentation, and other resources with which to do research; and had twice the external funding of department-based efforts.
4. Signal long term commitment to an area and, consequently, receive repeated funding and more large-scale funding from sponsors.

Taken together, these three streams of research on university reputations, the reputation of public affairs/administration programs, and organizational models for research productivity provide strong support for the argument that institutional supports affect reputation and productivity at the level of the university, the program, and the research unit. Moreover, they provide general corroboration for the suggestions for improving public administration research that follow.

**Institutional Supports and Research Improvement**

Based on the research and professional experience, four types of supports are important for research improvement: (1) institutional values supportive of research, (2) faculty capable of doing research, (3) research resources, and (4)
**Table 1**

Comparison of 1988 Institutional Supports in Upper- and Lower-Ranked Schools of Public Affairs and Administration

<table>
<thead>
<tr>
<th>Dimensions for Comparison</th>
<th>Top-Ranked Schools&lt;sup&gt;a&lt;/sup&gt;</th>
<th>Lower-Ranked Schools&lt;sup&gt;b&lt;/sup&gt;</th>
</tr>
</thead>
<tbody>
<tr>
<td>Demographic:</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Average Faculty FTE</td>
<td>25</td>
<td>7</td>
</tr>
<tr>
<td>Average Nontenured Faculty</td>
<td>2.4</td>
<td>1.1</td>
</tr>
<tr>
<td>in Last Few Years</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Institutional Values Supportive of Research</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Teaching Load (in teaching hours per year)</td>
<td>233</td>
<td>236</td>
</tr>
<tr>
<td>Teaching Buy Out Permitted</td>
<td>9 Yes</td>
<td>7 Yes/1 No</td>
</tr>
<tr>
<td>Buy Out Policy:</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Replacement cost</td>
<td>3</td>
<td>1</td>
</tr>
<tr>
<td>Full cost</td>
<td>6</td>
<td></td>
</tr>
<tr>
<td>Annual Teaching Award</td>
<td>6 Yes/3 No</td>
<td>1 Yes/7 No</td>
</tr>
<tr>
<td>Annual Research Award</td>
<td>2 Yes/7 No</td>
<td>0 Yes/8 No</td>
</tr>
<tr>
<td>Faculty Capable of Doing Research:</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Non-tenured recruit's school</td>
<td>Primarily top-ranked schools&lt;sup&gt;c&lt;/sup&gt;</td>
<td>Primarily other than top-ranked schools&lt;sup&gt;d&lt;/sup&gt;</td>
</tr>
<tr>
<td>PhD Program</td>
<td>9 Yes</td>
<td>1 Yes/7 No</td>
</tr>
<tr>
<td>Research Resources:</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Extramural funding (average annual)</td>
<td>$322,000</td>
<td>$21,000</td>
</tr>
<tr>
<td>University seed funding for research proposals</td>
<td>8 Yes/1 No</td>
<td>3 Yes/5 No</td>
</tr>
<tr>
<td>Non-tenured recruit supports:</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Reduced teaching load</td>
<td>9 Yes</td>
<td>3 Yes/5 No</td>
</tr>
<tr>
<td>Summer salary</td>
<td>7 Yes/2 No</td>
<td>3 Yes/5 No</td>
</tr>
<tr>
<td>Computing equipment/time</td>
<td>9 Yes</td>
<td>6 Yes/2 No</td>
</tr>
<tr>
<td>Other nontenured recruit supports&lt;sup&gt;e&lt;/sup&gt;:</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Research seed money</td>
<td>None</td>
<td></td>
</tr>
<tr>
<td>Light committee load</td>
<td>Some</td>
<td>None</td>
</tr>
<tr>
<td>Conference travel</td>
<td>Some</td>
<td>Some</td>
</tr>
<tr>
<td>Research assistant</td>
<td>Some</td>
<td>None</td>
</tr>
<tr>
<td>Institutionalized Effort:</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Organized Research Unit</td>
<td>5 Yes/4 No</td>
<td>1 Yes/7 No</td>
</tr>
</tbody>
</table>

<sup>a</sup> The schools in this group include American University, Harvard University, Indiana University, Ohio State University, SUNY Albany, Syracuse University, the University of California, Berkeley, the University of Georgia, and the University of Southern California.

<sup>b</sup> The schools in this group include California State University at Long Beach, George Washington University, Georgia State University, Temple University, and the Universities of Connecticut, Minnesota, Missouri-Kansas City and West Virginia.

<sup>c</sup> The schools in this set included Carnegie-Mellon, Ohio State, Miami University, MIT, SUNY-Albany, University of Illinois, Harvard University, Syracuse, University of Georgia, University of Sussex, Northwestern, Oxford University, University of Texas, University of Michigan, and Yale.

<sup>d</sup> The schools in this set included Fordham University, University of Virginia, Kansas State University, George Mason University, Indiana University, North Carolina State, and University of South Carolina. One of the schools hired only tenured faculty.

<sup>e</sup> These supports were offered in response to an "other" category in the survey; "none" means that no more than one school in the group mentioned the particular support; "some" means that two or more mentioned the particular support.

Institutionalized effort. It is unlikely that following these suggestions will change a program's reputation in the short run, but there is considerable likelihood that it will change a program's research productivity and therefore its reputation in the long run. The following sections elaborate these suggestions.

**Institutional Values Supportive of Research**

Institutional values supportive of research can help to develop research and to sustain it once it is established. Although there might be others, four institutional values seem particularly important. These are research performance, teaching loads, released time, and research awards.
The first institutional value is research performance as a serious requirement for merit and promotion. Although many public administration programs espouse research as a basis for merit and promotion, in practice their multiple missions can easily result in equal or greater weight being given to teaching and service. In research universities, research is an essential criterion for merit and promotion. Teaching and service must be satisfactory, but they are almost never, by themselves, an adequate basis for merit or promotion. Research and scholarship are the key.

The second institutional value is teaching loads commensurate with those required to produce research. Faculty must have time to do research. Research universities recognize this need and set teaching requirements accordingly. Research universities typically have a four to five course load annually, whereas teaching universities typically have a six to eight course load annually. It is unrealistic to expect that research can occur if time is not provided for it by the institution.

Even in cases where the teaching load is relatively heavy, administrators can mitigate the effects of teaching demands on research productivity by attempting to minimize separate preparations, assigning faculty to seminars that might help to get them up to speed on research, and allocating teaching assistants to relieve heavy course loads or student demand. These steps help to develop greater synergy between teaching and research and make faculty more productive in research.

The third institutional value is released time from teaching for research. In addition to reduced teaching loads overall, research universities provide released time from teaching for faculty. Faculty are also permitted to "buy out" teaching time with research grants. This is especially the case when faculty are at a critical stage in their research or when faculty are at critical points in their careers (e.g., typically in the two years before consideration for promotion to tenure, if not before). Research universities often provide summer salary and reduced teaching or committee responsibilities for the first several years for new assistant professors. The objective is to give the assistant professor time to get material from the dissertation published in journals and to start a program of research before being heavily burdened with teaching and service responsibilities.

The fourth institutional value is awards, honors, and recognition for research performance. Teaching and public service are activities that often carry immediate rewards—the lecture circuit, heady government service, the lucrative textbook. In contrast, research often involves large investments of time and effort and long lead times. A research project may require several years to conduct, another two to three years to publish, and many years of highly focused research before the rewards of national and international recognition are realized. Research has its own rewards, of course, such as the excitement of discovery. However, research activity is persistent, time-consuming work that includes designing the research, collecting data, conducting analysis, and writing and rewriting the results for publication. Thus, research is rarely easy to do, and it involves opportunity costs. For example, research books rarely produce the royalties that textbooks do. Time spent doing research is unavailable for overload teaching, the lecture circuit, or consulting. Although research may lead to consulting opportunities, it is frequently the case that the serious researcher must limit consulting engagements or risk serious deterioration of his or her research program. For these and other reasons, the productive faculty researcher warrants special recognition and reward for engaging in research. Such recognition is seldom provided unless the merit and promotion process truly discriminates on the basis of research performance. Even when it does, the reward may be inadequate by itself.

Faculty Capable of Doing Research

McCurdy and Cleary's study of doctoral dissertations in public administration and White's follow-up analysis make it clear that the PhD per se is not a mark of research capability.10 Nor is it a mark of the capability to do quality research. The PhD is intended to be a research degree, but it is seldom a sufficient indicator of research capability because some PhDs are primarily teaching degrees and others provide weak preparation for research. One cannot expect research from PhDs who are not well-trained in administrative theory and research methodology. Thus, faculty capable of doing research is a basic requirement. There are several ways to get such faculty:

1. Recruit faculty from programs that emphasize research among their faculty. Although it is not guaranteed, the likelihood that new PhDs will have research values and skills increases if the faculty with whom they have studied are active in their own research programs and are known for involving students in their research.

2. Recruit faculty from programs that provide research methods and practice in their doctoral training. PhD programs differ in the degree to which they emphasize research methods and in the degree to which they actually engage students in the practice of research. It might be necessary to go outside public administration to other social science disciplines (e.g., political science, sociology, and economics) if quality researchers are not produced by public administration schools or are not produced in sufficient quantity to meet the need.

3. Recruit faculty who have a demonstrated research record, not merely research training or promise.
Presentation of papers at scholarly conferences, published research from the dissertation, and published research outside of the dissertation are illustrations of a demonstrated research record for new PhDs.

4. **Promote further development of faculty research knowledge and skills by facilitating faculty participation in summer programs and institutes.** Institutes, such as those offered by the Inter-University Consortium for Political and Social Research, are useful for refreshing latent knowledge and skills as well as for developing them further. Moreover, a faculty member who is highly dedicated to the task probably could develop research skills de novo through persistent attendance at such institutes and application of what is learned.

### Research Resources

In addition to institutional values and capable faculty, research resources are important for the actual conduct of research. In fact, capable faculty provided with the right resources probably will develop research programs regardless of institutional values, institutionalized effort, or management responsibility for research. Three categories of research resources seem critical.

The first consists of the general resources within the university. Most, though not all, public administration research is social science oriented and has some support requirements common with the social sciences. These include survey research facilities, laboratories for experiments, sites for fieldwork, databases, computing resources, and seminars and colloquia where national and regional scholars can discuss their work. While these resources usually exist somewhere in the university, their proximity, familiarity, and ease of access to these resources facilitates the research process; their absence inhibits research.

The second category of research resources is **support for proposal development.** The foregoing resources, which are required as part of an ongoing research environment, take a long time to develop, and usually they cannot be developed without the existence of specific research projects which utilize them and help to support them. Thus, the most important resource is support of proposal preparation and research development. Such support is basic to developing research programs and projects in the first instance.

Research usually requires some type of funding to carry it out, and the way one obtains that support is through the development of proposals for university or extramural funding. Moreover, proposal preparation itself requires specific funding. This need is seldom recognized. Some administrators and faculty even assert that research is a faculty member’s responsibility and that nothing special needs to be done to facilitate research. However, research universities provide extensive support to faculty for preparing proposals and otherwise “seeding” research. Proposal development requires the following support resources:

1. **Research into funding sources.** Although faculty must get involved themselves, they also need professional help in identifying potential sources of funding for their research interests. Foundation directories, research funding newsletters (e.g., *Science and Government Report*, Consortium of Social Science Associations—COSSA Newsletter), and similar tools are needed in addition to staff who know how to use these tools and explore foundation or agency protocols for proposals. For example, the first step is to look at the sources of support for research in one’s field. Such sources usually are indicated on articles in journals or in research publications. Sources of support also can be gleaned from directories which list foundations or government agencies and their interests. Since funders’ interests can change, one must obtain current statements of interest by writing or calling. It is critical to read fundor statements carefully for their fit with one’s research ideas. A letter outlining these ideas can solicit the fundor’s view of the potential fit with its program interests without requiring a commitment to funding. Such letters often must be followed up closely by face-to-face discussion.

2. **Travel to discuss ideas with potential funders.** Faculty cannot develop full research proposals without a clear idea of potential funders’ interests and reactions. Face-to-face meetings with potential funders is often essential to establish communication that identifies a joint interest, leads to a well-targeted proposal, and increases the prospects for extramural funding.

3. **Faculty time for proposal development.** Faculty time can be provided through partial summer salary for proposal writing and through released time from teaching. The former is attractive because it provides a period for uninterrupted work. The latter is attractive because the cost of replacing a faculty member’s teaching duties with a part-time lecturer is about one-fourth to one-third of the faculty member's salary.

4. **Secretarial and clerical help** is required to produce the proposal, prepare graphics, check bibliographies, reproduce copies, and insure that submission deadlines are met.

5. **Financial and administrative assistance** is required to develop project budgets, investigate foundation or agency requirements and allowances, get university approvals and signatures, and check the final proposal for completeness, accuracy, and professional appearance.

6. **Support for pilot research projects.** Faculty without a research track record, especially new PhDs, may require financial support to conduct small-scale research projects where they can develop methods, show promising results, and get them published in quality journals. Pilot projects also help to refine research ideas, methods, and instruments and, therefore, to present a more complete and convincing proposal. Looked at as investments, the resources required to help faculty develop proposals are small in proportion to the prospects for research funding payoffs. However, they must be explicitly allocated, and program administrators who would do so often face opposition.

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from faculty who would rather have such funds directly allocated to their research. Because of this legitimate alternative use of the funds and in order to insure an investment's payoff, it is critical that administrators hold faculty accountable for producing proposals when given support, that they do so in a timely manner (e.g., by agency deadlines), and that they follow through with the proposal until funding is secured.

It is critical that faculty who do not produce proposals from released time or summer support do not receive new awards. It is also critical that faculty who do produce proposals continue to receive support towards securing outside funding so long as their efforts are competent, serious, and show promise. Several proposals may need to be developed before one is successful, and it is important to recognize this fact. The difficulty is in determining which faculty warrant the repeated investments, especially when school politics conflict with merit allocations.

Faculty pressures are usually strong to distribute research and development resources equally, even though some faculty will not actually use the resources for research because they are not research faculty. Administrators need to direct resources to the best opportunities and best performers rather than simply allocate the funds evenly. Some research areas have differential ability to attract outside funding; therefore, proposal development resources should be initially spent in areas that have potential. The needs of other areas can be met once research programs are established in fundable areas. This is a controversial strategy with many faculty because it means some must forego support now in the larger interest. The key to making the strategy work, however, is to insure that the faculty who are successful in securing outside funding contribute to the larger research enterprise of the school. They can do so by helping other faculty to secure funding, by creating capabilities (e.g., databases, equipment) that other faculty can use, and by otherwise returning the original investment to the school.

The third category of research supports consists of resources for project implementation. These include such support as space, cost accounting, and specialized secretarial services. Generally, it is best that these resources be set up as a separate unit within the school because, otherwise, the immediate demands of teaching and service activities will drive out attention to research priorities. Space is a critical and obvious resource for research. Research requires dedicated space which is removed from the hustle and bustle of students, visitors, and normal departmental activity. The dedicated space is needed for faculty and research assistants, for group meetings and tasks (e.g., questionnaire mailouts and returns), and for project materials, library, and computing or laboratory equipment.

While universities maintain specialized contract and grant offices and accounting units, these units usually exist to insure compliance with university overhead rates, to prevent faculty from improperly committing the university, and to prevent misappropriation of funds. In short, they are not helpful for project implementation. Moreover, research projects often require cost accounting rather than general accounting in order to develop knowledge about project costs, to control costs, and to prevent loss of unspent funds.

Research projects also require secretarial staff who are versatile and highly skilled. For example, research secretaries require skills in computerized word processing, bibliographic notation and format, mathematical notation, sophisticated graphics, and in-house publishing.

Institutionalized Effort

Research needs to be institutionalized as a way of indicating seriousness to faculty, administrators, and funders, and as a way of further developing and maintaining capability. There are three aspects to institutionalization: (1) organizational, (2) managerial, and (3) doctoral education.

The first, organizational support for research, can occur through the school or department directly or through an independent research unit. Department-based efforts frequently involve no special arrangements for research. The staff and other support mechanisms already extant for teaching and service are simply extended to research. This is the weakest form of institutionalization because research needs must compete with teaching needs and services cannot become sufficiently specialized to meet the needs of research adequately. The rhythms of teaching and research are different. For example, students at the door and in the halls make teaching needs more important and urgent than research; research can always be put off to another time, but the students cannot be put off. It is difficult to meet both sets of needs with the same support arrangements.

Organized research units (ORUs) involve setting up a distinct administrative entity with a focus on research, independent budgetary status, temporary or permanently assigned space, and an administrator drawn from the faculty ranks. ORUs may be set up within the departmental structure or independently. The ORU arrangement avoids the conflict of teaching and research activities, allows the development of the staff expertise needed for research, and allows greater attention to research rhythms. The ORU is easier to manage because it places responsibility in a specific individual and allocates specific resources for research. Because responsibility and resources are located in an identifiable unit, performance can be better monitored and assessed. At the same time,
the ORU does not preclude sharing of resources with the teaching program or other arrangements of mutual benefit.\textsuperscript{12}

The chief problem with the ORU arrangement, especially when independent, is that the ORU pursues its own agenda and/or becomes captive of the funder.\textsuperscript{13} In either case, it may fail to serve the research interests of departmental faculty. Although exceptions exist, the traditional bureaus of governmental research are examples of ORUs that have not been noted for producing generalizable research. Because they are funded by state agencies, they can become the captive of those agencies and get drawn into applied research and service roles. This is not to say that the bureaus fail to perform useful functions--only that they seldom advance knowledge in the field.

The second dimension of institutionalized effort is assignment of management responsibility. It is not enough to say that research development is everybody's responsibility or that it is the responsibility of senior faculty. Someone must be charged with responsibility for developing research within the school or department.

As suggested earlier, research requires development effort just as the curriculum does. It requires the same status and importance as the teaching program. Research must be someone's responsibility just as administration of the teaching program is someone's responsibility. Responsibility could be retained by the dean or director or delegated to an associate dean or research unit director. This administrator might have responsibility for related support resources such as travel funds, space, equipment, and support staff. Although it seems self evident, the person responsible for research development must be capable of securing extramural funding, doing research, and helping others to do so.

The third dimension of institutionalized effort is a doctoral program. Although commonly considered central to stimulating faculty research, doctoral programs cannot serve this function. They are a necessary adjunct to research, but doctoral programs depend upon established research among the faculty for their success.

It is unrealistic to expect that faculty who do not do research can create the researchers of the future. Research involves methods and craft as well as theory.\textsuperscript{14} It requires skill in doing research as well as theoretical knowledge about how to do it. Faculty cannot pass on this critical knowledge and these skills unless they are researchers themselves. Moreover, they cannot be role models and instill students with the sense of what actually characterizes the scholar and researcher. In short, students need to work within the framework of strong research programs, to apprentice on faculty research projects, and to have faculty serve as mentors. Doctoral education reinforces the perception that research is a valued activity, provides a mutual support structure for faculty and students, and offers intrinsic rewards for collaboration and mentoring.

Conclusion

Given the foregoing list of institutional requirements for research, it is clear that many public administration schools and departments cannot do everything. Nor do they need to do everything, because different schools are at different stages in their own research development. The top-ranked schools have many of the suggested institutional supports in place, and they have mainly to husband them and to generate the slack funding that keeps them going. The lower-ranked schools lack many of the research supports and therefore need to develop them. However, they cannot develop them all at once and they need not. As suggested by the research, two requirements are essential and make the greatest difference in the short term for schools trying to improve their research productivity.

The first requirement is for high quality faculty who are motivated to do research. Such faculty believe in the value of research, know how to do it, and strongly desire to do it. Given the resources, they will conduct research regardless of institutional values or institutionalized effort. The second most important factor is support for proposal development, which, hopefully, will help faculty members to obtain the resources they need to carry out research. If these resources cannot be generated externally, they might be generated internally by a controversial strategy--striking a bargain between teaching faculty and research faculty for differential teaching loads which will permit some faculty to distinguish the school by research while also recognizing the other faculty's contribution.

Although this analysis has been mainly addressed to what universities can do to improve the quality of research, it has implications for sponsors and for scholarly and professional associations. Public administration research needs both project funding and longer-term "centers" funding. Sponsors need to insist that their investments be leveraged with matching\textsuperscript{15} investments by the university in funds, graduate student support, and research infrastructure. Sponsors need to continue their support of research in functional areas such as health, housing, transportation, and environment; they also need to support cross-cutting research related to general issues of public policy and management such as strategic management, administrative reform, procurement, and personnel policy. Scholarly and professional associations can provide simple but powerful assistance to researchers by supporting doctoral consortia, stimulating faculty training in research methods, getting research sponsors to speak at all major meetings, endorsing faculty/school research proposals in areas of mutual interest, and advocating support for public administration research to various sponsors.

As indicated at the outset, greater institutionalization of research should produce several benefits that are vital to public administration as a field. One benefit is the enhanced knowledge base which contributes both to the solution of public problems and the preparation of future public administrators. An improved research climate in public administration programs will also benefit the quality of doctoral education. Finally, greater priority on research will improve the status of public administration programs within universities which, in turn, will have pos-
itive consequences for program resources. The pursuit of these benefits is vital to the future of public administration.

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Notes


2. Idem.

3. For example, the social sciences generally have lagged all the other academic disciplines and the professional schools (law, medicine, and engineering) in terms of university investments of research resources. Robert S. Friedman and Renee C. Friedman, The Role of University Organized Research Units in Academic Science (University Park, PA: Center for the Study of Higher Education, The Pennsylvania State University, 1982), Table 3.1.


6. For example, McGuire and his colleagues characterize the motivations of university administrators as follows: it is institutional reputation that top administrators at research universities strive to enhance by increasing and/or shifting research resources, by trying to attract faculty "stars," and by similar strategies. These types of institutional managers care deeply about the number of Nobel Prize winners on the faculty, about the university's ability to attract a super-computer, about the relative size of NSF awards among the top schools, and the like (p. 368). Joseph W. McGuire, Marie L. Richman, Robert F. Daly, and Soheila Jorjani, "The Efficient Production of Reputation by Prestige Research Universities in the United States," Journal of Higher Education, vol. 59 (July/August 1988), pp. 365-389.


8. Nine programs were chosen from the top-ten ranked schools and eight were chosen from among lower-ranked schools as rated by David R. Morgan, Kenneth J. Meier, Richard C. Kearney, Steven W. Hays, and Harold B. Birch, "Reputation and Productivity Among U.S. Public Administration and Public Affairs Programs," Public Administration Review, vol. 41 (November/December 1981), pp. 666-673, Table 3. Data on institutional supports were gathered by the authors through a phone survey in August/September 1988. Although the ratings are from 1981, use of the ratings with data on institutional support from 1988 is valid because, as noted by McGuire et al., such ratings tend to be highly stable over time. McGuire et al., supra.


10. McCurdy and Cleary, "Why Can't We Resolve the Research Issue in Public Administration," and White, "Dissertations and Publications in Public Administration."

11. Independent research units involve setting up a distinct administrative unit outside the department and capable of working with more than one department or discipline. The advantages of this arrangement stem from advantages of scale. The independent research unit can support a broader group of faculty, build a broader funding base with those faculty, weather ups and downs in funding support because of the broader base, achieve economies of scale in operations, and accumulate specialized expertise, equipment, or other resources required to support more than one faculty member's project (e.g., computer databases, survey research, computing, in-house publishing).

12. Research indicates that ORUs whether departmental or independent, are superior to department-based efforts in stimulating new research, facilitating research, encouraging research, and attracting financial support. ORUs generate approximately twice the funding support and attract large-scale funding that the departments often cannot attract. See Friedman and Friedman, The Role of University Organized Research Units in Academic Science.


15. The university match seldom needs to be equal in size or kind to the sponsor's investment. The sponsor simply is interested in knowing that the university and the program are committed to the research area for the long run and will continue to make investments along with outside sponsors.