Academic Administration in engineering programs is increasingly a highly complex and difficult task. As front-line administrators, department chairs are responsible for transforming institutional goals and mission into practice. In today’s dynamic and financially restrained atmosphere of most colleges, the chair is also responsible for increasing enrollment, securing external resources and ensuring the overall economic health of an academic department. Since these are disparate, if not conflicting roles, the question is how can a typical administrator accomplish all the various functions required of him or her. Within this context, issues such as powers, mission and goals, faculty selection and evaluation, resource security and typical challenges are explored. By no means does the author intend to provide conclusive information, the intent is to stimulate further discussion on the role of a highly critical position in engineering administration and hopefully further the professional development of such critical members of our community.

Within academic administration, there are two kinds of power: power associated with a given position and power that comes from personal resources such as intellect, charm and wit. Engineering education has given significant independence to its primary resource, mainly faculty. Due to this fact, an administrator's personally derived power is much more critical than that afforded by institutional governance. A chairperson works with faculty rather than having some authority over faculty. Hence, leadership style is extremely important if success is to be achieved. In working with faculty, four conditions for leadership have been identified as following: 1) to serve as a facilitative leader, 2) to facilitate/encourage teamwork, 3) collective decisions and actions, and 4) reward collectively where possible. A
A department chair serves as a primary link between how we interpret our policies and regulations and how we put them in daily practice. In making this connection, it is critical that an administrator focus on group decision-making, so that daily practices are widely accepted and followed. Engineering faculty (or at least most) are trained as individual experts typically in isolation from others. In today’s constrained environment, we have to work in teams, share resources and promote the collective good. A chair that can effectively develop such an environment will represent a highly effective department. Very similarly, collective actions and decisions are critical, but can only develop from truly collective dialog. In doing so, a chair should not attempt to ‘homogenize’ the members, but rather assemble an effective mix of skills and expertise, which can contribute to the collective dialog in major ways. Rewarding faculty collectively may seem inappropriate or at times counter to our individual senses; however, it simply displays collective ‘attention’.

In a typical engineering department, faculty members are most concerned with their own courses and projects. Therefore, the chair must be able to provide an atmosphere where faculty sees their individual goals reached through meeting departmental goals. As there is a knowledge explosion in most engineering disciplines and there is a continuous change in student body; a department should be realigned to meet these new challenges.

Another increasingly critical objective of an administrator is financial security of the department. Because of increasing financial strains, it is critical to develop entrepreneurial skills. Increasing enrollment, external support and overall economic health of a department have become essential goals. While the application of business models is increasingly popular, there are still distinct features of a college making it quite different than a business enterprise. For example, while common business ideas of finding revenue other than tuition and state subsidy or hiring freezes may have a desirable impact; other methods such as industry-based work measurement schemes are quite inappropriate to a college faculty’s job responsibilities.

The major goal of a chairperson is being the creative custodian of standards. This outlook includes departmental governance, curriculum development, faculty activities, student
concerns, physical plant management, data management and communication with and support from all constituencies outside the department.

The selection and evaluation of faculty by an administrator is one of the most critical tasks. The selection of faculty is most accomplished through search committees; which in turn reduces the strain on the chair. However, the evaluation of department members is a major responsibility of a chair. Professional development and performance counseling should be the cornerstones of an effective faculty evaluation system. For example, in professional development of faculty, a chair’s objective should be collective as well as individual development by involving faculty in planning activities, by taking calculated risks and by securing maximum institutional support. As for performance counseling, this should be a continuous process rather than an annual activity, should include clear goals that are attainable, should include the individual faculty member in goal setting (& self-evaluation) and should include constructive steps for improvement. In other words, faculty evaluation must be a continuous development and improvement process, not a snapshot of one’s performance at a given point in time. Therefore, the issues of evaluation are complex. Further, from one institution to another, expectations differ. All of these factors indicate there is no single effective method of evaluation for all departments; rather each has to evaluate based on its own standards, yet based on generally accepted principles.

Recently, an effective rule of administration was outlined as to always tell the truth, tell more of the truth than you have to and tell the truth before anyone asks you to. This is perhaps the single largest challenge facing every engineering chair (and for that matter all college administrators). Being caught between the institutional requirements and protocol and the sentiments of your long-term colleagues (department faculty) can lead to an intellectual, yet real conflict. As a chair, one must work to try and satisfy everyone, while fully knowing that you can’t make everyone happy. Any chair that can work to overcome this challenge will be a highly effective leader. Other real issues facing a chair include increasing financial problems, declining number of students and increased accountability of institutions to their constituents.

“Proceedings of the 2002 American Society for Engineering Education Annual Conference and Exposition
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The sensitive position of a chairperson, between an educational system constantly under pressure and an environment reaching for greater freedom and flexibility is quite real. This position only increases the great need for more support and commitment towards the department chair. Satisfaction in this position, while not widely acknowledged, includes the opportunity to exercise influence over mission and curriculum, correction of problems, instituting new programs and a higher challenge beyond teaching and research. Partially as a result of this, chairperson's position often serves as part of the administrative ladder of an institution. Department chairs are more likely to become deans and vice presidents after leaving their current position.

In the brief overview of academic administration presented here, the author attempted to highlight significant areas of concern. The ambiguity continues, an academic leader or a manager? These are in fact some of the challenges that motivate faculty to become chairs. However, institutions must not forget the importance of providing support before, during and after the tenure of a chairperson. It is fortunate to see that although there are significant problems facing a chair, there still are satisfactions. Without these satisfactions, there would be little or no motivation for a faculty member to become chairperson.

Bibliographic Information


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