Academic Career Development for a Nuclear Engineering Junior Faculty at North Carolina State University

Executive Summary:

Over the past four years the Department of Nuclear Engineering at North Carolina State University has undergone aggressive growth, almost doubling the number of active faculty from eight in Summer 2007 to fifteen this semester, with one open junior position still in search. Among the new faculty added within this span of time three are senior faculty (including the Department Head) and five are junior faculty. With these additions the Department holds an excellent strategic position within the nuclear engineering education community due to its rejuvenated ranks and the ongoing smooth generational transition of its faculty with senior members mentoring the careers of junior members. However, the ongoing economic crisis and the decline of funding from the State of North Carolina are raising concerns that recruiting a highly qualified candidate to the open position currently in search and nurturing their academic career once hired will not be affordable. The goal of the academic development program proposed here is to assemble an attractive package to help the Department recruit a top-notch candidate in the area of nuclear power and to provide them a reliable resource to supplement the standard startup package in growing their career. The hired faculty member will be mentored by senior faculty in the Department, and will be afforded advice on means to best utilize this combination of standard and supplementary resources to propel their academic career towards success. The benefit to the faculty member will be realized when they eventually receive tenure thus consolidating their academic career path and embarking on the next stage by preparing for promotion to a higher rank. The benefit to the Department is the ability to attract top talent to apply for the open position, and to retain them in an academic career once hired. The benefit to the fields of nuclear science and engineering is to replenish and rejuvenate the cadre of academicians who will shape the future of nuclear energy in the US and globally through their research and by educating a new generation of nuclear professionals essential to implementing the nation's nuclear agenda.

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