

Institutional & Societal Issues – Educating for Responsible Research

Philip J. Langlais

Vice Provost for Graduate Studies & Research
Old Dominion Univ.

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What Are the Roles & Responsibilities of Educational Institutions?

Provide our citizens with the knowledge and decision making skills in ethics, moral responsibility, professional standards and responsible conduct

Prepare our citizens to deal with the complex issues in our global 21st century society

Establish a social contract and culture within the institution that supports these educational outcomes

Ethics for the Next Generation

- Business Leaders
- Academic Leaders
- Government Officials
- Policy Makers
- Professionals – Healthcare, Social, Environmental, Legal
- Educators – Elementary, College, University

Major Challenges & Opportunities

- Culture & Attitudes
- Faculty Workloads
- Program Capacities
- Curriculum
- Institutional Priorities & Reputation
- Promotion & Tenure criteria
- Diversity and International Students

Cultural Shifts

- Moving from adherence to regulations & policies to rewarding ethical and responsible conduct – value-based decision making
- Accepting that ethics, moral responsibility and research integrity applies to all disciplines-not just biomedical and life sciences
- Alter tenure and promotion criteria to place more emphasis on mentoring and quality of the teaching and research enterprise rather than quantity of students, funding and publication

“Ethical Problems in Academic Research” Swazey JC, Anderson M, Lewis S, *American Scientist*, 31:543-553, 1993.



Survey of 2,000 doctoral candidates and 2,000 of their faculty in chemistry, microbiology, civil engineering and sociology

- Approx. 50% of faculty and 44% of students had “exposure” to misconduct or misbehaviors
- Nearly 43% of the faculty knew of peers making inappropriate assignment of authors
- Almost 50% of students and faculty either observed or had direct knowledge of faculty exploiting others
- Marked disciplinary differences were observed among the misbehaviors and misconduct as well as the ways in which these problems were dealt with.

Faculty vs Student Perceptions



Comments regarding whether RCR training is necessary

“Needs more attention/recommend training. Seems like a good idea/important.”

“Should be mandatory for all disciplines.”

“Do not want or need additional training.”

“Not all graduate degrees are research oriented, and some students may not need additional training.”

“There should be no mandatory training.”

“Could be a waste of time/not needed.”

“Great for sciences, not necessarily applicable to social sciences.”

“I’m a graduate student in education. I don’t see a need for RCR training in my field.”

Comments regarding whether RCR training is necessary

“This is very significant. If the quality of Ph.D. students is important to ODU this must be done. If it is not done (which presently is not happening) individuals will have to take additional courses to ensure they present themselves as quality individuals...I hope this program is implemented. The process in place is not a benefit to students.”

“My strong opinion is that there is absolutely no need for special RCR training for our graduate students. They receive proper education on RCR in their contacts with their advisors.”

Transparency & Openness

Frank discussions of choices, responsibility & consequences

What are the “Stakes?” –

- Personal integrity vs loss of promotion, position, funding, degree completion
- Dept/Univ integrity vs funding & national ranking
- Societal trust vs professional, research & economic gain
- Whistle-blowing – motives and consequences

Innovate & Motivate

- Two-tiered approach
 - Graduate School-Academic Affairs – Office of Research - Presidents
 - College/Department
- Multidisciplinary Teams & Programs – curriculum & research funds
- Mentor Awards & Training Programs
- Incorporate ethics & research integrity into courses, comprehensive exams, theses, dissertations
- New Faculty & Grad Student Orientation
- Preparing Future Faculty/Professoriate Program