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There's More (to Research Methods) Than Meets the Eye

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Background:

"Research shows that by doing *this*, you'll look and feel more beautiful, improve your health and happiness, and live longer." Such fallacious conclusions are becoming pervasive. As technology increases our capacity for connectivity and access to information – such as through social media – an abundance of false science claims has arisen. The messages target an unprecedented number of information consumers. Psychological research findings can play a positive role in human flourishing, and provide the knowledge, skills, and abilities to navigate our mental, social, and physical worlds. Unchecked and not vetted, the same results can have disastrous consequences. The purpose of this presentation was to present an argument for the strategic positioning of the introduction to psychology research methods (PRM) course within the liberal arts curriculum.

Caulfield (2012) recommends that training students in critical thinking is paramount to their intellectual development to discern fact from fiction. Suter (2012) stresses that students should be encouraged to ask questions around research findings about cultural competencies for participants, instruments, procedures, etc.; and it is the instructor's task to raise consciousness about the conclusions students reach when they encounter scientific claims. Stark (2012) also advises instructors to move students away from conclusions unsupported by data and/or strong theoretical arguments. Such critical thinking skills ought to be embedded in PRM teaching and learning if it is to properly serve the purpose of debunking misleading psychological science.

One obstacle is the positioning of PRM within the curriculum. First, PRM is not typically required outside the psychology curriculum. This likely eliminates a large student-proportion from accessing the course. Second, even if a large proportion of those students pursued a major that had its own research methods (RM) course – such as sociology or political science – RM is not typically required until the latter undergraduate years. This likely limits the opportunity that some students might get to be critical and analytical about the material they eventually encounter in general or subject-specific non-RM courses. It could also hurt students who for a variety of reasons drop out of school at earlier stages. One might argue an appealing approach is to put the RM course as close as possible to the senior capstone project. However, producing a proper senior capstone project necessitates a solid grasp of the literature. This could be gained from the more substantive courses in the psychology students' curriculum path. But a solid grasp is insufficient if students cannot

begin to critique the theories and conclusions they encounter in the literature in the first place. Furthermore, positioning closer to the capstone prioritizes "production" of scientific knowledge over consumption; many students will not go on to be avid producers of scientific knowledge; while arguably all of them will need to become astute consumers.

Two other reasonable objections to a first-year PRM exist. The first is political in so far as the institution's politics are concerned. Specifically, those who control the General Education (GenEd) curriculum might be unwilling to move the course. There could be good reasons for such stubbornness. For example, funding a GenEd PRM will be a pragmatic budgetary concern if shifting around intellectual and physical capital incurs additional costs. The second objection might be deemed personal in so far as a particular institution might have current or recent success in their GenEd or Psychology programmatic learning outcomes, institutional retention and graduation rates, etc. This author cautions against such personal bias and availability heuristics in making curriculum decisions. That is, just because it works now or has worked in the past, does not imply that it will continue to do so, or that it cannot be improved.

Method:

Since access and opportunity are central components in the argument for PRM curriculum positioning, this study sought some empirical evidence on the timing of PRM; that is, who takes PRM and when it is offered. An exploratory descriptive study was conducted using a convenience sample of twenty (20) higher education institutions within a state. Data was collected from the institutions' 2015-16 Integrated Postsecondary Education Data System (IPEDS) logs to examine institutional graduation rates. These figures were cross-referenced with College Scorecard figures for accuracy. Where discrepancy existed, the higher value was chosen for analysis. Graduation rate was defined as the percentage of a school's first-time, first year undergraduate students who completed their programs within 150% of the published time for their program (NCES, 2017). This accounted for students enrolled in a four-year degree program who transferred across institutions within a six-year period from when they first matriculated. The institutions' sophomore retention rates were also analyzed. Sophomore retention rate was defined as the returning proportion of students from freshman to sophomore year, not counting incoming sophomore transfers. Additionally, the number of psychology courses preceding the PRM course was investigated, as well as the following categorical variables: class-year PRM was offered (Freshman, Sophomore, Junior, Senior); whether a general psychology course was required in GenEd (Yes, No).

Results:

The average median graduation rate was 57% (range = 25% - 81%). The average median sophomore retention rate was 72% (range = 59% - 92%). On average, three (3) psychology courses were required prior to being eligible for PRM, with one institution only requiring one (1) psychology course prior to PRM. Fifteen (75%) of the institutions offered PRM in the junior year; five (25%) offered it in the sophomore year. Nineteen (95%) institutions required at least one general psychology course in the GenEd curriculum.

Discussion:

Limitations exist for the generalizability of these results given the convenience sampling method. Institutional website and IPEDS data is often questionable and unreliable given reporting errors at the institutional level. Some programs have BA and/or BS degrees with conflicting course requirements. It could very well be that intro to psychology instructors are diligent in covering basic PRM content. These limitations aside, the data suggests access and opportunity to gain PRM-specific knowledge and skills might be hampered by the positioning of PRM later on in the curriculum.

References

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