

MatchMaking



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Improving the Alignment Between Assessment Methods and Stated Learning Outcomes (in the Sciences)

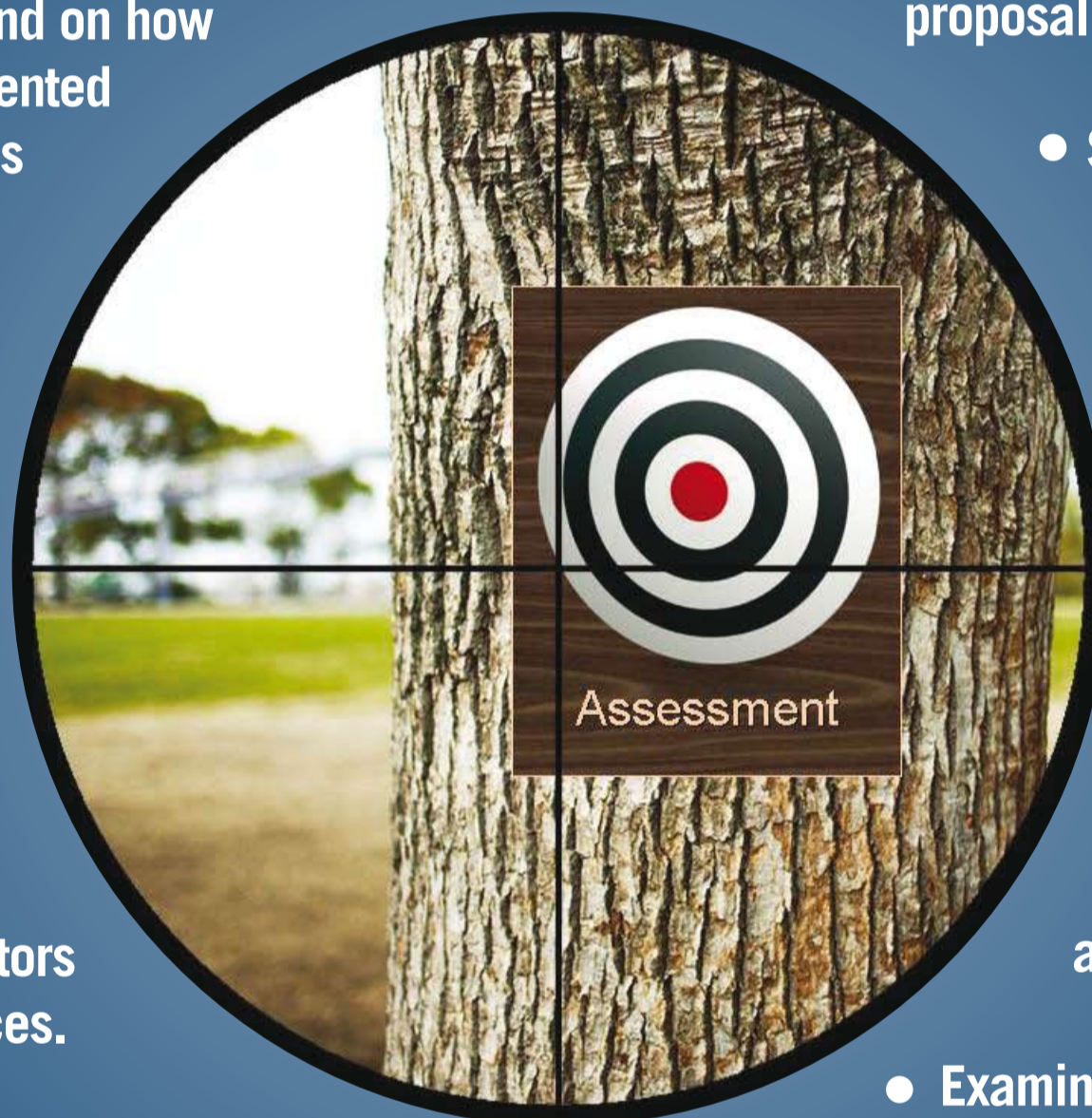
The work begins

Assessment is the vehicle that delivers outcomes from learning objectives.

- Successful learning experiences depend on how well the assessment practices implemented are aligned with the learning objectives and desired outcomes.
- All staff within the Faculty of Science and Engineering have been surveyed on their attitudes toward, current methods adopted and factors that influence choice of adopted assessment practice.
- Interviews have been undertaken with Nanotechnology and Physics teaching staff to further elucidate influential factors in making particular assessment choices.
- Topic Proposals, Statement of Assessment Methods and Web Topic Outline documents for Physics and Nanotechnology topics have been obtained and examined for assessment alignment.

The picture emerges

- General feeling - "all skills" are developed and assessed by "all assessment methods"
- Alignment not well considered beyond original proposal by topic designer
- Several interviewees felt that although effort should be made in developing better assessments, but somewhat powerless to be able to follow through
 - Factors such as time (workload), expectations of colleagues, pressure to follow 'traditional' approaches and own experiences as a student tend to limit the range of adopted assessment methods
 - Examinations (summative by nature, focus on memorising facts and rudimentary understanding, rather than critical thinking, evaluation and analysis) dominate assessment practice in the Sciences



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Questions for the next stage

A serious fundamental flaw in how sciences are taught seems evident.

How does one initiate a paradigm shift among colleagues to start shifting attitudes toward 'designing assessment for enhanced learning outcomes'?