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By Phillis Miste, Cynthia Howell, and Leone Snyder, Capella University

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Introduction to 2019 Proceedings  
By Kathleen Gorski, Editor-In-Chief

I am pleased to share with you the St. Paul Edition of AALHE Conference Proceedings. AALHE members, assessment professionals and educators from around the world met in St. Paul, MN, for our Ninth Annual Assessment Conference. The attendance was our largest to date.

Our Proceedings publication provides best practices shared by professionals at our Annual Conference. Our mission is to provide resources and a forum to support assessment practitioners’ professional development and the open discussion of issues, strategies, policies, and processes associated with higher education’s use of assessment as a tool to improve student learning.

Proceedings is also a rich resource for all who are interested in higher education that may not have been able to attend a session or the conference. This 2019 AALHE Annual Conference Proceedings was created to support the work that you do at your institution or organization. Please read through this document and feel free to contact those presenters whose ideas have sparked interest for you. It is with this networking and collegial communication that our field can continue to grow to support learning in higher education.

Thank you to the authors of this edition for their time and commitment to share beyond the annual conference. Their work continues to inform and inspire.

I also would like to extend a thank you to our editors for volunteering their time and talent:

2019 Conference Proceedings Editors:  
Sara Cushing, Georgia State University  
Chris Coleman, University of Alabama  
Fiorella Penaloza, University of Hawaii-System  
Jessica Taylor, Bellarmine University

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Disclaimer: The views and opinions expressed in the articles in this publication reflect those of the authors and not necessarily those of the Association for the Assessment of Learning in Higher Education.
Aligning Assessment Outcomes from the Course to the Program to the University Level

By Phyllis Misite, Cynthia Howell and Leone Snyder, Capella University

Abstract: While colleges and universities have made great strides in effectively planning and carrying out the assessment of student learning outcomes, aligning those outcomes from the course level to the program level to the institution level is still a major challenge. The process of aligning learning outcomes at all levels (course, program, institution) is challenging, but it is also necessary as higher education professionals strive to meet goals for effective, cohesive educational practice and ensure that graduates are achieving degree requirements. In addition, aligning outcomes enables us to evaluate existing student learning outcomes for their relevance and value and determine where changes are warranted. A process for aligning outcomes recently implemented for a selected program within the Higher Education Programs of Capella University, an online institution, is presented as a possible model that other institutions might consider.

Keywords: Alignment, Program Outcomes, Course Competencies, Student Learning Outcomes (SLOs), Degree Requirements, Curriculum Mapping, Intentional Design

Introduction

The need to align student learning outcomes (SLOs) from one level to another—from the course to the program to the institution’s degree requirements—is evident at our colleges and universities as we strive to offer a cohesive education that prepares graduates to acquire the knowledge, skills, and abilities needed for them to be successful members of society (Lumina Foundation, 2019; Suskie, 2018). Students expect an educational experience that has been intentionally designed for such preparation. The practice of curriculum mapping is valuable within programs (Jankowski & Griffin, 2016); but another complementary process to improving academic quality is a targeted, specific approach to aligning learning outcomes at all levels (course, program, institution). A recently implemented approach to SLO alignment focused on a collaborative process that enabled teams of faculty, administrators, and course designers to work directly together to align learning outcomes from the course level to the program level. While the approach initially seemed awkward and time-consuming, the steps ultimately led logically from one to another, enabling the team to gain not only momentum but also clarity and insight into an effective process. The collaborative effort resulted in alignment of student learning outcomes at all levels and also allowed for an updating of the outcomes for relevance and value to the students’ educational preparation within a selected program of Higher Education Programs.

Capella University, an online university, utilizes a competency-based model of education. Students are to demonstrate—often through authentic assessment—the knowledge, skills, and abilities defined in the stated competencies, or learning outcomes, of each course. The course competencies (CCs) support the learning outcomes that students are to achieve in their programs of study, and those in turn support the more broadly stated degree learning outcomes at the university level. The task of the team was to determine the appropriateness of the learning outcomes of a selected graduate program in the School of Education (Program Outcomes, or POs), examine the degree of alignment of the learning outcomes to the course competencies (CCs), modify them as needed, and examine the means of assessing achievement of the learning outcomes. Each of these goals required additional steps, however. And what may have been anticipated to be a straightforward process, turned out to be unexpectedly muddy and complex at times, at least as it was unfolding. It was not in our scope to adjust the institutional degree outcomes. Also notable is that POs were already aligned to the institutional degree outcomes.

The Faculty Chair of the Higher Education Programs (Chair) led the process from concept to completion including the process of selecting members of each team. The vetting process began with an outreach to all faculty teaching
and/or chairing doctoral committees in the program. Those expressing interest in the project were given further detail by the Chair including stipends and reimbursable expenses. The actual team placements were determined by the Chair who had knowledge of the abilities and experience of each individual. In some cases, faculty were interviewed by the Chair to further clarify their experience with course design and assessment practices.

Intentional design went into the process from the beginning, starting with defining the roles of each team. One team, the *External Scan Team*, took on external validation of the knowledge, skills, and abilities that the graduate students in the Higher Education Programs were to acquire (Figure 1). This team was comprised of three seasoned part-time faculty each having vast experience in the program subject matter, also known as Subject Matter Experts (SMEs). Another team worked on curriculum mapping. The *Curriculum Mapping Team* was led by the Chair and included the Academic Coordinator, who is responsible for overseeing curriculum in the Higher Education Programs, and a part-time faculty member, which was also a SME (Figure 1). The team of *Instructional Designers (IDs) Trainees* were individuals who were knowledgeable about the online learning platform (Figure 1). Three (two part-time faculty and one full-time faculty) of the four were SMEs. The fourth was the Academic Coordinator. They were trained by four university instructional designers who were members of a larger division who oversaw course development and revisions across all programs in the university. Another team, designated as the *Critical Analysis Team*, consisted of the lead members of each of the noted three teams and an *Instructional Architect*, an additional member who was part of the larger university division overseeing course development and revisions (Figure 1).

![Figure 1: Team Organization](attachment:image.png)

Our purpose was to forge an efficient and fiscally conservative way to align the course SLOs to the Program Outcomes (POs) without having to conduct a full “re-stage” of the program which required many more resources and a larger budget. Several questions needed to be considered during the process:

- What are the fundamental steps needed?
- Who should be part of the team? Who should be trained as Instructional Designers (IDs)?
- How do we take an “aerial” view of the already existing POs?
- How do we look at the courses granularly while keeping POs in the forefront?
- How do we avoid unneeded repetition of learning outcomes?
- How do we balance learning outcomes across courses?

These and other questions were addressed during the steps of the alignment process, described below.
**Step 1: External Scan Team**
The External Scan Team began the work of validating the knowledge, skills, and abilities identified in the POs in the spring of 2018. Selected on the basis of their qualifications, the members worked remotely rather than convening as a group at Capella University. They examined professional organizations to determine external standards and searched current literature for trends and issues pertaining to what graduates of the selected program “should know and be able to do” (Lumina Foundation, 2019) with their acquired knowledge, skills, and abilities. The result was that the current POs were modified to reflect acquired themes, becoming what we termed “enriched outcomes.” These were then utilized to guide course content. The only costs associated with Step 1 were stipends for the team members’ work.

**Step 2: Curriculum Mapping Team**
The Curriculum Mapping Team also began its task in the spring of 2018. Working remotely as well, the team consisted of a coordinator, the Faculty Chair, and two team members trained to analyze articulation and assessment forms. They looked for alignment of program outcomes (POs) to course competencies (CCs) and CCs to course assignments used to assess the student learning outcomes (SLOs). Again, the only costs associated with Step 2 were stipends for the team members’ work.

The tables below illustrate simplified examples of an examination of alignment of SLOs. The Curriculum Mapping Team first looked for alignment of the current POs of the selected graduate program to the existing university’s degree requirements. Second, the team examined the alignment between program outcomes and course competencies. Table 1 displays a simplified example of identifying alignment between an institution’s degree outcomes to a set of program outcomes. Table 2 displays a simplified example of identifying alignment between program outcomes and course competencies. Note that it was not in the scope of this work to re-write or re-align the institutional degree outcomes, or the POs, but rather align the SLOs to the existing POs. The existing POs were already aligned to the institutional degree outcomes.

**Table 1: Degree Outcomes to Program Outcomes Map**

<table>
<thead>
<tr>
<th>Program Outcomes</th>
<th>Degree Outcomes</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Content Knowledge</td>
</tr>
<tr>
<td>Communicate effectively</td>
<td>x</td>
</tr>
<tr>
<td>Make data-driven decisions</td>
<td></td>
</tr>
<tr>
<td>Value and promote diversity and equity</td>
<td></td>
</tr>
<tr>
<td>Conduct research</td>
<td>x</td>
</tr>
</tbody>
</table>

**Table 2: Program Outcomes to Course Competencies Map**

<table>
<thead>
<tr>
<th>Course Competency</th>
<th>Program Outcomes</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Communicate effectively</td>
</tr>
<tr>
<td>Analyze theories of leadership as they apply to diverse environments</td>
<td>x</td>
</tr>
<tr>
<td>Evaluate the nature and function of xyz</td>
<td>x</td>
</tr>
</tbody>
</table>
Step 3: Instructional Design (ID) Trainees
The next step involved training current Subject Matter Experts (SMEs), faculty who contributed to the development of the content of courses, to serve as Instructional Designers (IDs). By doing so, they would be able to work independently as SMEs on course revisions without the assistance of university Instructional Designers. For this effort, team members convened on site at Capella for one week in the spring of 2018. This onsite team consisted of selected faculty of the program, including part-time faculty members, to be trained in the job functions of an Instructional Designer by experienced IDs who later served as mentors for the trainees. Costs for this step included not only stipends for their work but also travel and accommodations expenses.

Step 4: Critical Analysis Team
The fourth step in the alignment process took place on site at Capella during the summer of 2018. The group designated as the Critical Analysis Team, consisting of the coordinator, who was the Chair, the designated lead of each team, and a member of Capella’s course design team, the Instructional Architect, convened on site at Capella. Costs for Step 4 included stipends for the team members’ work and travel and accommodations expenses.

The critical analysis was often complex, involving intricate decision-making pertaining to the enriched POs and their alignment to the course competencies. In the time that we had together, just two and a half days, we focused on how to analyze all of the data that had been collected over the spring term in order to make solid decisions for revisions.

The work of the External Review Team informed all work that followed in that they provided a detailed set of program outcomes formed from their analysis of the external data. These “enriched POs” clearly aligned with the existing or “current POs” yet they provided much more detail than the broader existing POs by which to exam CCs and course assignments in a very targeted manner. The team analyzed the effectiveness of course assignments used to assess the SLOs, with the result that we identified needed revisions not only for aligning outcomes but also for assessing those outcomes in course assignments. There was much “learning as we went” and work left to be done off-site following the on-site meetings.

Table 3 presents a simplified example of a matrix developed by the team as a result of their analysis of outcomes and assignments in hypothetical courses of the selected program.

Table 3: Final Analysis of Program Outcomes

<table>
<thead>
<tr>
<th>Current POs</th>
<th>Enriched POs</th>
<th>Relevant Courses</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>Communicate effectively</td>
<td>Establish a brand; create a brochure</td>
<td>ED 5234, ED 5678</td>
<td>Some courses “heavy” on incremental papers, making it difficult to assess competencies</td>
</tr>
<tr>
<td>Make data-driven decisions</td>
<td>Leverage technology to improve access and drive efficiencies</td>
<td>ED 5234, ED 5890</td>
<td>Many opportunities to include case studies and real-world products (authentic assessment)</td>
</tr>
</tbody>
</table>
Value and promote diversity and equity | Respond to change based on demographics and evolving needs | ED 5234  ED 5890  ED 5678 | Which courses can include diversity? Globalization?
---|---|---|---
Conduct research | Assess and evaluate based on relevant research | ED 5234  ED 5678  ED 5890 | Keep use of authentic assessment in mind when reviewing all courses

**Final Steps**

The final steps in the process included designing a schedule for those courses designated for revision. Fifty-seven percent or 13 of the total 23 courses germane to this program were revised either in part or in full. Those on the Critical Analysis team were also charged with doing an in-depth review of the courses sited for revision providing specific “drivers” for the SME/IDs to assist them in the determined revisions needed to create the intended outcome and competency alignments.

**Summary and Results**

The four-step process for aligning course competencies (CCs) to program outcomes (POs), met the goal for an efficient and fiscally conservative process when compared to an official “restage” of the program. A “restage” involved at a minimum, cross-functional partnering across the university, formal market research, changes to POs, curriculum committee approvals, university catalog revisions, full course revisions, student advisor training, the use of university IDs, and eliciting the oversight of project managers. This process was completed almost entirely at the program level making it both efficient and fiscally conservative.

However, there is more to be done. To ensure complete alignment, the faculty members teaching the courses each term are asked to look closely at the competencies, the content, and the assignments to determine whether they see a need for major revisions, partial revisions, or minor changes. Capella offers an efficient way for faculty to submit requests for minor changes, as well as a process for implementing major changes to courses. In all such cases, the learning outcomes are at the center.

The need to align learning outcomes is driven by a commitment to excellence. A primary benefit of intentionally and successfully designing this alignment is improved academic quality, resulting in graduates leaving our institutions with the demonstrated knowledge, skills, and abilities needed for them to be successful in their careers. What are the consequences of not aligning outcomes?

**References**


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Assessment Is Global: Developing a Program Effectiveness Model for South Africa

By Adriana Botha, Ruth Newberry and Carina de Villiers, University of Pretoria and Blackboard International

Abstract: Student learning assessment is a global endeavor. Tasked with being more accountable for student learning performance, South African Higher Education institutions like the University of Pretoria (UP) needed to develop a Program Assessment Framework to address high-capacity courses, decentralized organization, and a culture of “check the box” assessment for compliance. This paper will describe UP’s move from course grades to a program review framework that blended United States (US) assessment approaches and strategies, efficiencies with the Learning Management System (LMS) for operational sustainability, and UP and South African requirements utilized to create a cycle of review, process for analysis, and improvements to the student learning experience at UP. The merger of these two perspectives - South African / UP high-capacity classrooms and decentralized organization with US best practices for assessment - helped elevate UP’s initial assessment framework from course review and development to its current model of evaluating programme effectiveness through student learning outcomes (SLO) assessment to make improvements to enhance student learning and an emerging community of practice within South Africa.

The purpose and specific focus of this paper are to address Institutional Level Assessment Challenges. Individuals involved utilizing technology to support programme assessment practices in higher education can benefit from this paper. The paper includes additional reflections and new thoughts generated from attending presentations at the AALHE conference (2019) and discussions with attendees related to shared experiences, practices, strategies, and challenges.

Keywords: Programme and Institutional Effectiveness, Technology, Collaboration, Global Assessment Practices

Introduction
This paper supports the themes of the conference, especially the notion of it ‘takes a campus,’ in its focus on how the University of Pretoria’s Bachelor of Commerce in Informatics (Information System) programme developed an assessment framework that could be applied institutionally. The authors will describe the various departments that needed to be involved in the development and execution of the framework. We believe readers will see the direct application of this model to their institutions and key stakeholders, and if not, will become informed about the importance of these key players in developing sustainable processes. Additionally, we believe the discussion around UP’s initial and adjusted assessment framework, in which UP selectively applied US assessment methodologies and practices, will also invite thoughtful comments about the various ways assessment of student performance on SLOs can be conducted and the influence of institutional context, teaching and learning models, and organizational pressures. Finally, the impact of technology (mainly the LMS) on SLO assessment can affect processes in positive and sometimes negative ways but is increasingly a critical piece of the puzzle today. In fact, the LMS contains a majority of the direct evidence to be assessed and should be able to bring efficiencies to institutional / program assessment processes. However, too often, the LMS and/or other assessment technologies are misunderstood and misapplied, causing frustration to faculty and assessment professionals. We believe our paper will help the reader identify the “potholes” to effectively utilize technology to facilitate and support assessment processes. While UP uses Blackboard as its LMS, this session is not about a specific LMS but rather how the technology can be used to manage the assessment process.

In this paper, we would like to share with the reader key global challenges with programme and institutional assessment (Section 2); some unique challenges to South Africa Higher Education (HE) (Section 3); a few critical misconceptions about the application of technology to assessment of student performance and take away strategies for how to leverage LMS and assessment technology to further assessment (Section 4); strategies for
maximizing relationships with consultants (Section 5); and lastly to describe the UP Assessment Framework so it can be compared with the reader’s own assessment model and the use of the components and strategies applicable to their context and situation (Section 6).

Section 2: Key Challenges in the Programme and Institutional Assessment That go Beyond Cultural and National Boundaries.

From the experiences and observations of the co-author and the US outcomes assessment consultant comes two perspectives: Assessment Pure (only the process) and Assessment Plus Technology. When assisting higher education institutions in the US and abroad with implementing assessment processes, Newberry conveys the three S’s from Barbara Walvoord’s book Assessment Clear & Simple (2010): Simplify + Standardize + Systematize and adds a third S – Sustainable to the equation, because when institutions develop standardized systemic processes for assessment, they develop sustainable practices that can be readily supported and facilitated by assessment technologies. In this regard, we want to indicate that assessment challenges at Programme & Institutional level are not unique to a specific institution or country but go beyond cultural and national boundaries. Having worked with more than sixty institutions of various sizes and types in the US and now more than fifteen in Asian, Middle Eastern, and Latin American countries, the consultant identified the following key challenges:

Faculty too often think in terms of ‘my course’ and thus remain at the course level and in a grading mindset. The course is where they have ownership and familiarity. Comments from attendees at the AALHE 2019 conference furthered this view that many institutions struggle with this perception by faculty that they are responsible for their courses only and often see “assessment” as yet another intrusion by administration into their teaching and learning. However, for programme level assessment, faculty need to see not just their course, but their course within the context of a programme (where does their course fit in the programme?) and the how the content and objectives they teach fit into a broader curriculum the student must complete and become competent in. When faculty stay within the “my courses” view, improvements tend to be course-centric, not programme-centric. However, when faculty begin to view their course as one of many in a programme, it is much easier to demonstrate how assessment can be collaborative and measurements standardized without infringing upon the perspectives and expertise they bring to the subject. The challenge is a lack of ownership for assessment at the programme level. Improvements may happen, but they remain siloed and disconnected from programme outcomes. Without a broader perspective (my course to my programme) collaborative and systemic change to the design and delivery of teaching and learning do not occur. Programme assessment is a department affair.

Institutional Leadership sets the tone for assessment and should affirm the importance of assessment beyond compliance requirements. Much too often, programme and institutional assessment (especially in programmes without external accreditors) are done as a data gathering activity rather than a reflective activity. When Administrations see programme and institutional assessment as essential practices for teaching and learning, student success, and institutional success, they provide financial and resource support and promote activities for sharing practices. Unfortunately, conversations with AALHE 2019 conference attendees only confirmed that for many, institutional leadership did not, in general, promote assessment as valuable to teaching and learning -- only necessary for regional accreditation. Moreover, too many Assessment Directors or Coordinators are ‘offices of one’ with very few signs from Administration of increasing resources. Assessment should be institutional (not just academic) and strategic with a clear message across the institution of expectations and importance. This commitment is usually demonstrated, for example in Assessment positions in programmes, in the Dean’s office, and at the institutional level to indicate assessment is a priority. Moreover, when Assessment moves beyond committee appointments to actual positions across the institution, identifying ways to standardize practices becomes easier and more likely to be sustainable because they are less siloed.

The authors suggest that success for assessment frameworks needs academic- and faculty leaders to help set and/or communicate a vision and commitment to an institutional assessment initiative (Hundley & Kahn, 2019). In other words, it is a multiple-year start-up and on-going process that needs governance, strategy, and planning. To help with this initiative is the establishment of an institutional Assessment Committee charged with 1) creating
Policy, Expectations, Responsibilities, and Data Governance and 2) acting as Support representatives (Assessment Ambassadors) to the academic Divisions. This Committee should also have as members, representatives from Faculty Governance and Educational Technology units, as both are important to teaching and learning today. Additionally, inviting representatives from Student Affairs for co-curricular assessment and student government could be considered to further the idea of assessment practices across the student’s experience.

When the purpose of assessment (identifying trends in student learning) and its actions (using results to make improvements) are connected to teaching and learning, then faculty perceive the relevance of assessment to student learning. Too often the activity of assessment (evaluating whether students are meeting expected targets on learning outcomes) and its results (where they meet them and where they are not) seem to carry little to no meaning for the individual instructor. Completing a stand-alone assessment rubric in their courses or participating in a juried review is to faculty just another task placed on them by administration and disconnected from their daily teaching. The challenge is to demonstrate that assessment can be relevant to faculty and their teaching. In this regard, Chairs need to be prepared to take on the responsibility of bringing faculty onboard. This is no easy task. Together, Chairs and faculty should own learning outcomes by engaging in discussions that examine their teaching practices, their curriculum, the learning of their students across their programme, and the interventions they and others in the institution can provide students. When the institution’s leadership supports and encourages, and values these kinds of activities and internal self-reflective reviews and the changes (recommended improvements) that come from programme and institutional assessment, then chairs and faculty can be more successful at implementing and sustaining them.

If you are already starting to think about your institution and where you are in the assessment process, we would like to share with you a model the consultant and a colleague (Newberry & Datte, 2017) developed for several workshops they have conducted on assessment. Using the analogy of a train leaving its station, they identified three levels of institutional assessment maturity using some key characteristics for assessment practices. Which of the levels best describes your institution? How far is your institution from achieving sustainable practices?

![Figure 1. Levels of Institutional Assessment Maturity](image)

For the first author, it was enlightening to realize that the BCom (Informatics) programme and UP were “at the station” preparing for “departure”! The value of finalizing her PhD thesis in the field of programme assessment and incorporating the use of technology to facilitate assessment practices made her realize the large gap to be filled in
this field in South Africa (SA). She also experienced the advantage of attending the 2019 AALHE Conference where a culture of networking and sharing of knowledge was in abundance, where she found support for finding her “voice of confidence” for what she already knew, and where she gathered more practical strategies and plans to take back to UP, and more specifically the School of Information Technology (SIT). Furthermore, subscribing to the ‘ASSESS List serve’ on the AALHE website will empower her with even more practical and implementable assessment practices that lay the track for her to assist SIT and the more significant UP community to go “full steam ahead”!

Section 3: Challenges Unique to the South African Higher Education (HE) Situation – Suggestions and Insights for Consideration

The Council on Higher Education in South Africa (CHESA) recently tasked its institutions with being more accountable for student learning performance. For UP, which is fairly representative of the SA higher education institutions, this request was challenging as some programmes do not have an annual process for programme review and SLO assessment, especially programmes that are not linked to an accreditation body. Therefore, asking programmes to be more accountable for student learning performance meant many had to develop Programme-level SLOs. Moreover, the South African educational model, much like UPs has been built on high-capacity, lecture-based courses; a decentralized academic organizational model that prevents sharing and promotes siloed practices; and an inherent culture of “checking boxes” for compliance. While decentralized organizational structures and compliance checking assessment may ring true for many US and international institutions, SA’s reliance on high-capacity, lecture-based courses for the majority of the coursework presented to student does not. Currently, UP’s programmes rely on a significant amount of group work and exams for coursework and assignment of grades. This difference in educational models contributed to the challenges facing UP for assessment. Along with its historically de-centralized organization and check-box compliance approach to assessment, these factors have made developing a workable institutional model for UP and other SA institutions particularly challenging.

An extensive research project was undertaken at the University of Pretoria (UP) (Botha & De Villiers, 2017) for its Bachelors of Commerce (BCom) in Informatics (Information Systems) programme to implement a Programme Assessment Framework to help it address CHESA’s request and to improve its assessment practices for its ABET accreditor. A framework was developed to facilitate student learning assessment practices for UP’s BCom Informatics (Information Systems) programme and was the first to incorporate the initial institutional and programme review. The developed framework was called Programme Alignment, Implementation and Reporting (PAIR); a framework for programme review and a partnership towards student success (Figure 2). The framework was developed by this UP author from an internal study focused on three departments—Informatics, Mining Engineering and Construction Economics - as case studies to design an assessment framework for quality programme review at UP. The study used Design Science Research (Vaishnavi & Keuchler, 2005) and the theory of Diffusion of Innovations by Everett Rogers (Rogers, 2003) to conduct its examination and to design a structured programme assessment framework that could leverage UP’s LMS (i.e. Blackboard) to add needed efficiencies for faculty and administrators to the process. The Informatics Department wanted to move from using course grades to more formalized assessment process using course rubrics and exam questions aligned to SLOs and periodic juried assessments of direct evidence aligned to SLOs.

We are sharing UP’s initial framework PAIR with the readers for comparative purposes as we assume that the readers will find several key similarities to their own experiences and some unique to UP / South Africa.

Before having the consultant come to UP to deliver a workshop on using LMS technology (its goals / learning outcomes alignment functionality) to facilitate SLO data capture, the approach to assessment that PAIR facilitated had the benefit of building a very strong and vital synergy between the:
Faculty or academic owners of the module (courses are called ‘modules’ at UP) who have identified the module’s learning objectives, activities, and content; 

Educational Consultants who assist faculty with aligning pedagogical approaches to module outcomes for delivering the module to students; and 

Instructional Designers who assist faculty with developing the skills to transfer the content, activities, and evaluations to the click UP platform.

Figure 2. PAIR (Programme Alignment, Implementation, and Reporting) - A Framework for Programme

A summary of the four components of PAIR and the description of the quality assurance deliverables can be viewed from Slide 23-28 of the presentation PowerPoint at AALHE 2019 Conference, which is available on the website.

Section 4: Critical Misconceptions About the Application of Technology to Assessment of Student Performance

Too often, technology is seen as the silver bullet that is going to make assessment easier! Although there is this perception of an easy promise for “efficiency,” technology often exposes the “blemishes” and gaps in the process of assessment for a programme or an institution. When considering the adoption of technology to support assessment practices, it is important that the institution/programme consider the 80% / 20% rule: 80% of any assessment and technology project is about the process and practices of assessment and the academic decisions made to implement that process and 20% is used to implement the technology to support these processes and practices. That is before the technology can be effective facilitating, supporting, and managing the assessment process, the assessment process and its requirements should be clearly identified, understood, and even better already established. Technology should support and facilitate, not drive or create the assessment process. Thus 80% of the focus when implementing and using technology should be on understanding and outlining the assessment process in order to determine which technology can best support it, and 20% spent on implementing the technology.
Section 5: Maximizing Relationships with Consultants
The authors wish to share with the reader strategies for maximizing institutional- and global relationships with consultants and professionals in the field of assessment. Firstly, from the perspective of the role of the consultant and the experience of the US consultant with the UP consultant, the following aspects are shared for consideration:

Get to know the people you will be working with. For South Africa and UP, they wanted the US consultant to bring something from the outside (internationally) to support and confirm their process. Especially in this case, an outside “voice of authority” was needed to validate what was being said on campus. In the case with the UP author, she was too close to the process, working from the bottom up with none to little sponsorship at the institutional level. The PAIR framework was insular. She desired guidance on where to start. Outside consultancy was a solution. She wanted to engage the campus with other perspectives that could then with existing internal process provide a roadmap for assessment practices without the political and internal organizational baggage. While external consultants are used by institutions frequently to offer another perspective or validate internal perspectives, other powerful sources of validation and insight can come from attending conferences like AALHE 2019. Conferences are where we have the opportunity to share our effective practices, as well as what is not working in “safe places.” Conferences allow us to engage in dialogue with peers and experts to learn and to share suggestions and solutions.

To maximize the relationship with external consultants, their needs to be trust and a relationship before a consultant arrives on campus to confirm/not confirm what work should be done. Sometimes remote sessions are necessary with the core team to get to know one another. It is important for the external consultant to understand the “lay of the land” - understand the needs and problems within their context - and for the institution to understand what the consultant can offer. Preparation meetings are extremely helpful to establish this mutual understanding and relationship of mutual trust.

Section 6: University of Pretoria Assessment Framework
Why and how was the global assessment collaboration initiated between SA and US? Despite the presence of a Quality Assurance and Institutional Planning office at UP, there is currently not an institutional drive towards a formal programme assessment cycle for all qualifications offered. There are however, internal quality initiatives present that is in alignment with accreditation bodies criteria, in faculties, schools, and departments where professional qualifications and programmes are presented. With the rapid uptake in the use of UP’s LMS, the utilization of learner analytics became paramount to inform actions for improvement in student learning, especially in accredited programmes, which sparked discussions around the quality of data being mined. To assist UP with applying its initial assessment framework for programme assessment, UP collaborated with a US consultant from Blackboard’s Educational Consulting unit who had experiences with international and US clients on institutional and programme assessment and the use of technology to support assessment processes. As indicated in section 3, a workshop was arranged with the US consultant as part of the School of Information Technology (SIT) improvement plan for 2018/19. During the workshop, she introduced US assessment approaches (in particular those of Walvoord, Maki, and Suskie) and strategies and identified how UP’s LMS could support its assessment practices by bringing some efficiencies to data collection and help streamline some internal operational processes and promote inter-departmental synergies for wider adoption of the framework. More importantly, she helped UP realize it was focusing too much on the technology rather than its assessment practices and intended outcomes for its framework. From this workshop and consultant observations, UP’s initial framework was adjusted as UP aligned or adapted some US practices and approaches to its framework for SLO assessment and improvement process. In this regard, Walvoord’s (2010) notion of standardizing and simplifying of what was being collected was incorporated. The adjusted framework (Figure 3) indicates where US practices helped address specific UP challenges and where UP retained original components to meet specific needs. Specifically, UP retained its PAIR framework, which focused on its module development and specific assessment activities in the module that were now aligned to programme SLOs rather than module objectives.
What changed were the steps added prior to the PAIR framework that now placed the “module” in the context of the Programme and the SLOs of the programme, which better addressed the Council on Higher Education (South Africa) request for programmatic review. The addition of these pre-PAIR steps aided the programme coordinators, Chair, and Faculty with understanding how the module related to and needed to support certain programme SLOs. This adjustment helped the programme bring more granularity to their curriculum maps, which aided in identifying key assignments for assessment and understanding their placement across the curriculum. This improved curricular mapping helped the programmes see how assessment data could demonstrate trends or patterns of student performance on SLOs beyond the single module. UP was finally moving beyond the siloed course to a more comprehensive view of the programme and its delivery of the curriculum and students’ performance at key points. The result of this addition has been an annual programme review process that is more focused than it was on student learning on SLOs and programme effectiveness at the curricular and instructional delivery levels. UP’s more informed course development procedures are helping to ensure UP is identifying and making improvements to address the broader and programmatic student learning experience at UP.

Findings and Conclusions
More specifically, this collaboration between UP and its particular educational model and past compliance approach to assessment and the assessment approaches and practices of the US through the consultant has led to:

- The merging of two models: SA’s need to be more accountable at the programme level with US best practices for programme and institutional assessment has elevated the SA perspective from a module review level (micro) to the design of a programme assessment model (macro) that is resonating with other programmes for undertaking a more systematic and programme effectiveness review for UP and its SA context.
- Guidelines for an improved teaching model in SA that will attempt to be less reliant on group work and better leverage (fit for purpose) existing technology to meet SA higher education requirements and the immediate needs of the UP.
- **The realization by programme coordinators, HOD’s and Education Innovation staff at UP** on the implication of using its current LMS technologies effectively involves understanding its own academic processes/decisions that need to be in place (the 80%) rather than focusing on the technology (the 20%). The technology will fall into place after the processes are worked out.

- **Through this collaborative relationship, UP realized that challenges it was facing in institutional and programme assessment are global.** We were not so unique after all, except perhaps in our educational model and we can learn from each other on how to solve some of the issues we face. This collaboration has led other SA universities to offer similar workshops and to consider developing a SA Assessment community of practice, similar to the listserv and activities of AALHE.

- **To be able to move a campus, you need committed departments and programmes willing to take risks, embrace innovative thinking, and tear down barriers.** These champions grow through the process, share with colleagues, and do require institutional support, which UP is beginning to acknowledge through planned changes to come.

With this collaborative process, a community of practice (COP) has developed within SA and across the oceans, as we come to see that assessment is a global endeavor in its challenges with and its opportunities to affect organizational and cultural changes to improve the learning of our students. Additionally, we believe with more opportunities to share and learn from each other, UP can be a leader in change and help develop a fused programme effectiveness model for SA universities that leverages the technology, in particular, the LMS, to bring much-needed efficiencies in assessment to faculty, support staff, and to institutional leaders.

**Acknowledgements**

Our sincere appreciation and gratitude towards the donors of the AALHE community for making it possible for Adriana Botha (PhD Candidate) to attend and present at the conference. Please find her testimonial below:

*Throughout my PhD studies, my US mentor introduced me to the field of Programme Assessment and motivated me to become an AALHE member in 2018. A new world unfolded for me and I started to engage in a global ‘assessment of student learning in higher education’ journey. My sincere gratitude to AALHE and its donors for allowing me to attend the conference in 2019. Through your generosity, I was not only able to present at 2 sessions, but I had the honor of meeting and engaging with board members and colleagues across borders, all sharing the same interest in assessment practices, with the aim to improve student learning.*

What struck me most at the conference was the wealth of knowledge and experiences everyone was willing to share with me— it was invigorating! The thought of one association working on a unified approach to defining ‘assessment of student learning in higher education’ and establishing a core skill set and scope of practice for an assessment professional is a 1st world experience for me, and am glad to be part thereof. From my attendance at the conference, I have already started building a new network with AALHE members. Having access to an amazing number of resources available on the website has allowed me to return to my home country, South Africa (SA), empowered with knowledge and a deeper understanding of the “nuts and bolts” of assessment of student learning. This new knowledge, both adding to and affirming some of what I had known and experienced, has given me a confident voice in this field and positioned me as a valued resource and critical participant in the design and development of future initiatives within my University and the larger higher ed community in South Africa.

*“As we look ahead into the next century, leaders will be those who empower others” - Bill Gates*

Thank you AALHE and the donors for being the leaders and mentors for me and fellow student grant recipients through your student travel grant award.
References

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A Collaborative Approach: Collaborating with Students to Use Institutional Data for Campus Improvement
By Kristin Bruns, Hillary Fuhrman and Alison Kaufman, Youngstown State University

Abstract: In 2016, a collaborative continuous improvement partnership was initiated between an Office of Assessment and a graduate Student Affairs Counseling Program's faculty members and students. Grounded in critical pedagogy, this paper will present a summary of the partnership and will focus on strategies to leverage existing data collection processes (NSSE and Noel Levitz SSI), expand the analytic capacity of a small office, build students' skills, and increase the legitimacy of survey results through student-to-student data collection methods. Course project design, benefits, modifications over the past three years, and implications will be shared. Partnership resources can be accessed at: https://sites.google.com/view/assessment-collaboration.

Keywords: Graduate education, NSSE, Collaboration, Assessment Office, Noel Levitz, Survey

Rationale & Theoretical Framework
A 2015 ACPA survey report suggests a difference in how new student affairs professionals rate the importance of engaging in program assessment relative to their perceived proficiency in conducting assessment. While most new student affairs professionals felt their master's program was useful as a “delivery method” for assessment knowledge, approximately 20% of respondents rated themselves as “not at all proficient” in reporting assessment results, identifying contextual factors that shape the need for assessment, and in overcoming barriers to assessment. The ACPA report recommended that graduate programs give increasing attention and opportunities to provide hands-on assessment experiences (Hoffman, 2015). In its third year, the COUN 7046: Assessment in Student Affairs Practice culminating course project, referred to as the project, is a mechanism to provide students in the Student Affairs and College Counseling track with the skills needed to use assessment for continuous improvement and program enhancement as they enter professional higher education contexts.

Critical Pedagogy
At a foundational level, the project is rooted in Paulo Freire's critical pedagogy (1970), with its primary goal to engage students in critical thought and interrogation of the institution. This work challenges the hierarchical structure of the classroom setting and functions of an institutional assessment office. Rather than knowledge being transmitted to students in a transactional manner, students explore existing student-level data to drive assessment questions and thus create new knowledge aimed to improve institutional practice and policy. Through the course, students become the expert knowledge holders and investigators of an institutional problem. The intent of the project extends far beyond providing hands-on assessment experience and is connected to the goal of challenging the nature of higher education to privilege some students and disadvantage others. Counseling graduate students take on the role of advocating for themselves and other students, rather than advancing the agendas of those in positions of power (Freire, 1970).

Student-Centered Pedagogy
Student-centered pedagogy situates students in a position to identify what they want to learn and direct their own experience, as well as be responsible for their own learning (Tillapaugh & Haber-Curran, 2013). Research supports the use of faculty implementing student-centered pedagogy to move from “doing instruction” to implementing “a learning paradigm with an emphasis on supporting learning,” a shift which supports student learning and thus student success (Jankowski, 2017, p.12). This shift reshapes the traditional role of the professor as the key knowledge holder to a facilitator or guide through the learning process (Jankowski, 2017; Tillapaugh & Haber-Curran, 2013). Implementing student-centered pedagogy takes a great deal of time and can lead to frustration for students who are adept at learning through mostly didactic methods (Tillapaugh & Haber-Curran, 2013). To reduce
student resistance, both the assessment office staff and counseling faculty worked alongside the student groups during the project to provide hands on support and empower students to direct their learning.

Inquiry Based Learning
Aditomo et al. (2013) use “inquiry-based learning” (IBL) as an umbrella term to include pedagogical methods such as problem-based learning, project-based learning and case-based teaching. Inquiry-based learning is centered around a question and involves students investigating answers to the question. In accord with critical pedagogy and student-centered pedagogy, inquiry-based learning situates students as the directors of their own learning. Aditomo et al. (2013) identify eight types of inquiry-based learning: scholarly research, simplified research, literature-based inquiry, discussion-based inquiry, simulated applied research, role playing, and enactment of practice. The enactment of practice type is most closely aligned with the course project. In this IBL project-type, learning tasks are use-oriented and practice focused. Students are given experiences with a practical application of knowledge that is applicable to their performance as professionals.

Critical Experiential Framework for Teaching Assessment and Evaluation
Adding an additional layer to inquiry-based learning is the integration of the Critical Experiential Framework for Teaching Assessment and Evaluation developed by Ballysingh, Hernandez, and Zerquera (2018). This framework roots the project in social justice using four key principles. First, students form “reciprocal partnerships that honor all participants and serve students, particularly those most marginalized by standard higher education practice.” Second, the project design “incorporates critical and anti-oppressive research practices.” Third, students develop a “report and presentation centered upon action for the betterment of the experiences of all students, particularly those from marginalized backgrounds.” And finally, students work “together as a group in ways that honor each other’s experiences and fosters respect.” By placing graduate students in student-driven, real-life university contexts and conducting assessment through the lens of social justice, students develop “an advanced skill set to conduct assessment that is accurate, thorough, or comprehensive in nature” (Ballysingh, Hernandez, & Zerquera, 2018, p. 99).

Project Design and Implementation
In order to better understand the academic side of this collaboration, a detailed outline of the project design is provided. This course project is designed for master’s level students enrolled in a student affairs program in their last semester of the program. The students enrolled in the course are assigned into teams that are responsible for the design and implementation of an assessment project in collaboration with the campus Office of Assessment. Each team is expected to accomplish the following within an academic semester:
- Identify a specific area within the NSSE/Noel Levitz study to further investigate
- Request and receive permission to collaborate with a functional area/program from course instructor
- Create a brief outline for proposed expansion of the assessment topic in the project
- Contact the supervisor of the functional area/program to seek collaboration
- Develop an appropriate instrument that will be used as an assessment tool and/or draft questions used for individual interviews or a focus group as part of this assessment plan
- Collect and analyze the data
- Assemble the data into a final report to be presented to campus partners

1 Students are not required to submit IRB approval for their class project, as they are utilizing the data for campus continuous improvement purposes, however, students have the option to submit IRB approval if they would like to present their findings at an outside conference or submit a manuscript.
Respective Roles
As this is a collaborative partnership between the instructor of the course and the Office of Assessment, respective roles are discussed to provide insight into the level of time and effort put in by both parties.

Figure 1. Overview of Project for Students

Figure 2. Project Timeline

The assessment staff complete the following tasks each year as part of the partnership:
• Analyze and prepare survey data (Noel Levitz or NSSE) by identifying focal areas and preparing webinar for students to watch prior to classroom presentation
• Present data in a digestible way to the graduate students the semester prior to their enrollment in the Assessment Course
• Present project overview in the Assessment Course the 1st night of class
• Provide feedback on assessment tools, data collection process, and presentations
• Arrange logistics and recruit campus partners for culminating student presentations
• Attend practice presentations in class and final presentations on campus
- Gather attendee feedback and provide this information to the course faculty

The course instructor completes the following tasks each year as part of the partnership:

- Provides knowledge on basic assessment topics
  - Defining “the need” and designing an assessment project
  - Quantitative/qualitative approaches
  - Social justice framework for assessment
  - Ethics of data collection and management
  - Reporting of assessment results
- Reviews and provides feedback for the project components
  - Informed consent and information sheet (typically 2-3 times)
  - Survey interview questions (typically 3 times)
  - Drafts of paper, which is described in depth below (minimum of 4 times)
  - Presentation and supporting materials (minimum of 2 times)

As can be seen from the descriptions provided, there is a considerable amount of time and effort from both the course instructor and the assessment staff to assist in the student projects.

**Project Paper**

In addition to completing the project itself and the culminating presentation, students are required to write up their assessment project in three different sections. Each section is reviewed by the professor, and students must respond to feedback/make changes as they move forward with their project. The paper is broken down into three sections.

**Project Proposal**

The first section is due in the fourth week of the 16-week semester. In this section of the paper, students provide a description of topic/program/area being studied, discuss the need for their project, identify goals/objectives of the project, tie their project to the institutional mission and program mission (if applicable), identify critical stakeholders, and create a tentative timeline for their project.

**Data Collection Plan**

The second section is due in the seventh week of the 16-week semester. For this section of the paper, students discuss their intended population (including rationale for selection of this population), method of data collection (identifying quantitative, qualitative, or a combined approach), procedures of the project (who will collect, how it will be collected), data analysis plan, copy of the informed consent/information sheet, and an application of the social justice framework to their team’s project. Students are required to turn in edits/respond to feedback from the project proposal when submitting the data collection plan.

**Results**

The third section is due in the twelfth week of the 16-week semester. For the final part of their paper, students write up their results, summary and conclusion, implications for practice, project limitations, and recommendations to campus based on their findings. This section of their paper also includes the appendices (interview questions, surveys, charts, timeline, etc.), references, and an executive summary. Students are required to turn in edits and respond to feedback from the project proposal and data collection sections when submitting the third portion of their project. Students then turn in one final copy of their paper after responding to all suggestions and edits for the final time.
Reflection: Successes and Challenges
Throughout the life of the partnership project, key partners have taken the time each summer to assess and reflect on the successes and challenges of the project. There have been numerous benefits that span from the graduate students to the institution as a whole. Students have found value in the new skill set, as well as a component that led to success in their first position beyond graduate school. The Student Affairs program has benefited by utilizing this assignment to collect examples of both direct and indirect measures of student learning. The assessment office has been able to collect more assessment data and gain access to student populations that may not have been as willing to share perspectives with professional staff. Finally, the institution has benefited not only from the learning about additional assessment findings, but also by making changes that reflected the importance/impact of the project.

Benefits to Students
Pertaining directly to student learning, this project allows students to engage in higher level learning (e.g., design, develop, investigate) and students have self-reported increased learning and skills upon finishing this course. Further, students have demonstrated a level of thoughtfulness and reflection by integrating a social justice framework to their assessment projects. Feedback is gathered from participating graduate students in various ways (e.g., through teaching evaluations, informal discussions, and formal requests for experiences in the course). Based on the student feedback and critical reflection by the partnership team, some of the primary project benefits include: a “real life” hands-on experience with continuous improvement data, an opportunity to connect directly to campus stakeholders, and an opportunity to deeply explore a topic of interest for potential use in future research. For students looking onward to their career and job search, it is an opportunity to gain a multitude of transferable skills practiced in a real-life environment, as well as a great example to share in job interviews as a significant assessment/evaluation project that had an opportunity to impact their home campus. Finally, it is a chance for students to see how institutions process data and make recommendations for change. One student reflects on their experience,

I think that though we all found challenges, we were able to gain new skills of how to find a need, assess data, connect with students, professionals, and departments. This project was very beneficial to my experience in the program. The connection with the assessment office was amazing because their feedback and help were timely and genuine.

And another student,
Overall, the course is necessary for the professional growth, as the graduate students will see in their near futures (once they land a job in Higher Education). Having that foundation and ability to assess/evaluate/analyze has been a huge key to my success within Student Affairs.

Benefits to Graduate Program
The project gives the students a relevant skill set to take with them into their first position out of graduate school and fills a skill set deficit within new professionals, as noted in the ACPA (2015) study. Further, students have reported that talking about their assessment experience from the project has assisted them in securing a job upon graduation; a plus since many student affairs programs look to job placement rates as an indicator of success. Finally, it has benefitted the graduate program by creating stronger, more integrated collaborations/connections with a variety of functional areas across campus, which has increased communication about campus opportunities (e.g., graduate assistantships across campus) and participation in program needs (e.g., Community Advisory Board).

Benefits to Assessment Office
One of the primary benefits to the Office of Assessment is the additional value of the graduate student perspective on student survey data. Being able to gain the additional perspectives of the participating graduate students is extremely useful to the interpretation of data. Further, graduate students have been able to successfully enter
spaces on campus that office staff have not accessed in the same way (e.g., hearing vulnerable student stories about their experiences on campus). The partnership also expands the capacity of a two-person office to collect more data, specifically with a qualitative approach. As students collaborate with organizations on campus, those connections help support relationships the Office of Assessment has with other offices on campus. Finally, the ability of the Office of Assessment to use data for institutional improvement is increased because institutional leadership listens to what students say.

Benefits to Institution
Ultimately, it is the hope that this partnership drives improvements on campus that benefit all students. There have been examples of this already happening on campus (e.g., the creation of inclusion training for student peer leaders). These projects provide insight into the ways the institution can improve the student experience and improve student success. Through the students’ work, leadership is given access to an authentic student perspective, which serves as evidence for making data-informed decisions. Finally, the project increases the skill set of the graduates, which increases the reputation of the university.

Challenges of the Project
It is essential to note not only the benefits, but also the challenges that have been encountered in this partnership over the past three years. First and foremost, the partnership is a significant time commitment for all of those involved, the students, the faculty member, and the staff of the Office of Assessment. Modifications have been made to help with the limitation of time and will be shared in the next section. The student projects are limited by the need for the project to be completed within one semester from start to finish. For some students, the scope of this project being completed in one semester is quite challenging. Additionally, given the one semester timeline, multiple groups have struggled with recruitment of student participation in their project (e.g., focus groups and survey participants). Having limited access to campus data or offices that could strengthen the student project is an ongoing challenge. Students also have varying levels of skill and commitment to the project, which has impacted the success of some student groups. Professionalism of the students has been a significant challenge, specifically regarding the presentation to campus stakeholders. This includes the accuracy of information being presented, or even student attire. Additionally, as a mandatory group project, some students struggle with intergroup dynamics and the collaboration necessary to meet deadlines and produce quality work.

For the faculty and the Office of Assessment staff involved in the partnership, the primary challenge has been in giving up some control of the data and outcome, to allow students an authentic experience working with the data, collecting information, drawing conclusion, and sharing data to campus stakeholders. There are times where students have created final products that are not accurate or do not meet course standards, and faculty and assessment staff have had to come alongside the students to work towards a solution and accuracy before presentations to the campus community. It is key for the Office of Assessment and graduate program to maintain strong relationships with these campus partners and offices. Due to some past challenges (e.g., misinformation presented by students, inappropriate use of social media), we have found it critical to set expectations for those attending the presentations that this is a developmental opportunity for students. We have addressed this by sending an email to pre-registered attendees detailing the student project to begin the conversation. Further, we start each end of semester presentation to campus professionals with a brief overview of the student project. In this, we also request that professionals ask questions and provide feedback to students. While these challenges at times can be concerning and time consuming, we have found the student learning far outweighs the challenges.

Iterations of the Project
Throughout this partnership, we have continued to assess the successes and challenges (as discussed prior). Part of our success has come through consistent communication between the instructor and the assessment staff. Modifications to address challenges are listed below.
Year One
After completing the first year of this partnership, two major changes were made. The first was to make the project a mandatory group project. In year one, students could choose to work individually or within a group. This change was made to provide real-life experience of collaboration for students, increase the quality of feedback, and be respectful of time for both the faculty member and the assessment staff. The other primary change from year one was to create a mechanism for gathering stakeholder feedback. This feedback has the potential to not only benefit the students but also the conceptualization/implementation of the project in future iterations.

Year Two
In the second year of the partnership, the assessment staff attended the two class periods designated to practice presentations. After reflecting on the first year’s presentations, it was decided that students could benefit from more feedback prior to their campus presentation. Other additions planned after year two were adding the Social Justice Framework to the project, utilizing a “checking bias” worksheet to help students address their own assumptions/biases about data they would be collecting, and a recommendation for students to follow up with a thank you note to the campus stakeholders who assisted in their project development/implementation.

Year Three
After conducting year three of this partnership, three additional changes are suggested for the project going forward. The first change will be to require a thank you note being sent to campus professionals who assisted with the projects. This was previously suggested to students, but few students sent them. As the project continues, it is critical to make sure the professionals who assisted with the projects know their time and effort is valued. Further, based on other professionalism issues when presenting/communicating with campus stakeholders, the student affairs program has used this feedback in combination with feedback received from their community advisory board to integrate a higher emphasis on professionalism throughout the program. Going forward, students are required to partner with a campus organization for their project. It was strongly suggested in the past, but there was not 100% follow-through from students on this recommendation. Finally, a checklist will be distributed for each section of the paper to provide an extra level of assurance that students understand and are following through with each component of the project (e.g., seeking out and integrating campus professional feedback on survey or interview questions).

Key Accomplishments
As mentioned earlier, over the past three years the partnership has benefitted the institution in several ways. The partnership acts as a countering force to the tendency in higher education to create silos. The project has facilitated collaboration between student, staff, and faculty; collaboration between academic and co-curricular units on campus; and has critical conversations between stakeholders who have attended the end of semester presentations. As a recent example, after a presentation focused on improving the international student experience, staff from the International Programs Office, Title IX, Career Advising, and First Year Student Services discussed how they could modify orientation services to better introduce international students to key campus resources.

The institution has been identified by The Education Trust as one of the bottom-performing institutions for Black student success (Nichols & Evans-Bell, 2017). Institutional survey data supports the claims made in this report. Three student projects (one each year) have focused on the experience of Black students at the institution and have amplified the voice of Black students. Student comments from one of these presentations were shared with the institution’s Board of Trustees. This data collected by students has contributed to the growing ground-up movement to promote equity on our campus, including the recent creation of an Assistant Provost for Diversity and Inclusion.

This partnership has highlighted the critical role of qualitative methods, indirect assessment methods, and data from small populations on our institutional surveys in adding incredible value to campus decisions. Whether it is looking closer at the experience of international students, student athletes, juniors in the College of Education, or
student employees, these projects have been able to focus in on specific populations and collect rich stories that have begun to challenge some assumed narratives and push for better campus support for all.

References


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Abstract: Intentional collaboration between assessment professionals and faculty is essential for successful development of common assessments. Presenters shared strategies for effective collaboration for common assessment development and solicited input from participants for continual improvement of the collaborative process.

Keywords: assessment development, collaboration, quality assessment, common assessments

Introduction
It takes a village to create common assessments in higher education. The topic of this session was collaboration between faculty and assessment professionals on common assessments, the challenges that can accompany this collaboration, and strategies for overcoming those challenges.

Our goals in this session were 1) to explain the purpose of and our roles in collaborative common assessment development, 2) to share collaboration strategies that worked for us in our experience with common assessment development, and 3) to collect input from our audience and suggestions for successful faculty-assessment professional collaboration.

We began the session with a discussion of reasons why higher learning institutions engage in collaborative assessment development between faculty members and professionals who specialize in assessment. Among the reasons are:

1. Ensuring the validity and reliability of assessment results so that they can be used to accurately measure and improve student learning. While faculty members are experts in the subjects that they teach, they cannot be expected to be experts in psychometric principles and the factors that can affect the validity, reliability, and fairness of assessments. Combining faculty’s subject area expertise with assessment professionals’ knowledge of assessment design and evaluation allows faculty members to focus on students and instruction, not assessment construction or data collection.

2. Meeting requirements for accreditation. The Higher Learning Commission (HLC), for example, has among its criteria for accreditation, “The institution’s processes and methodologies to assess student learning reflect good practice, including the substantial participation of faculty and other instructional staff members” (HLC, 4.B.4). The HLC accreditation criteria, there is not only an expectation that faculty have “substantial participation” in assessment processes and methodologies, but also that the institution’s assessment of student learning “reflect good practice.” Collaboration among faculty and professionals who specialize in assessment helps to ensure that assessment for institutional improvement reflects good assessment practice.

However, collaborative assessment efforts in higher education have had challenges, and assessment professionals might struggle to gain the trust and cooperation of resistant faculty. In a 2018 whitepaper published by AALHE and Watermark, the authors analyzed data from two national surveys of assessment professionals. One of the greatest challenges identified by assessment professionals in this analysis was collaboration with faculty in assessment efforts, which is also one of the major job duties identified, so it is a high priority for professional development (Ariovich, Bral, Gregg, Gulliford, & Morrow, 2018).
This finding is reinforced by a 2018 survey from National Institute for Learning Outcomes Assessment (NILOA), which found a need for assessment professionals to have professional development in organizational behavior and theory to take on the more political aspects of assessment work, such as gaining faculty buy-in, because it “may help assessment professionals develop effective strategies while navigating the fluctuations of the field and differing views of assessment within and outside institutions” (Nicholas, & Slotnick, 2018, p.20).

Next, we addressed some of the reasons for resistance from faculty regarding collaboration with assessment professionals on learning outcomes assessment. Reasons for faculty resistance included too much focus on accreditation and accreditors when the focus should be on the student and using assessment to improve instruction (Lederman, 2019), a lack of evidence that centralized assessment efforts actually improve teaching and student learning (Lederman, 2019), a perceived threat to academic freedom, and a lack of understanding of assessment roles and terminology.

To address the lack of understanding of assessment roles, we explained the roles of individuals on our assessment development teams.

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<tr>
<th>Assessment Collaboration Roles</th>
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<tr>
<td>Roles of Faculty Members</td>
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<tr>
<td>• Subject-matter expert (SME)</td>
</tr>
<tr>
<td>• Expert on the student experience</td>
</tr>
<tr>
<td>• Peer reviewer/validator</td>
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We then explained our parts in the process of collaboratively creating high-quality objective assessments. See Figure 1.

1. Faculty collaborate with assessment developers to draft and review assessment items for content validity and alignment with objectives.
2. The psychometrician oversees beta testing of the assessment with faculty and student test takers. The psychometrician uses the data from beta testing to identify poorly performing items.
3. Using the data from the psychometrician, the assessment developers collaborate with faculty to target specific items or issues and improve the assessment.

![Figure 1. The cycle of collaborative objective assessment development](image)
After explaining the roles and processes we used in collaborative assessment development, we shared the collaboration strategies that worked for us during assessment development.

Collaboration Strategy #1: Make the Students the Focus
- The students’ experience and the impact on their quality of life are the driving forces behind assessment.
- When talking about accreditors and accreditation, focus on how accreditor standards tie to student outcomes and success in the field.
- Share successes (e.g., data showing student improvement) and student testimony with all parties.

Collaboration Strategy #2: Establish Rapport and Trust
- Create a culture of openness to giving and receiving feedback.
- Emphasize the importance of multiple perspectives so that there is an expectation of listening and considering other viewpoints as well as contributing.
- Explain the roles of team members and essential assessment terminology.

Collaboration Strategy #3: Have a Shared Space
Provide open access to one another’s contributions (through technology platforms such as SharePoint or Google).
- Open access allows for peer review and knowledge sharing.
- Open access helps SMEs overcome writer’s block as it stimulates thinking and the writing process.

Collaboration Strategy #4: Facilitate Constructive Dialogue
- The camaraderie generates an environment for sharing and creating that is absent in a document.
- Conversation stimulates thinking and enables an adaptive approach that incorporates multiple perspectives.
- Revisit strategy #1 (focus on student and quality of learning experience) if interaction becomes negative and counterproductive.

After sharing collaboration strategies that were successful in our assessment development experiences, we sought the insights of participants using scenarios that involved a resistant faculty member, a committed but overworked faculty subject-matter expert, and an assessment administrator who lacks awareness of faculty autonomy.

Presentation attendees, whose roles ranged from faculty to administrators, discussed scenarios in groups and provided these three highlights:
1. For the best results, assessment professionals must work hard to establish rapport with faculty participants prior to engaging in assessment development tasks. Show interest, ask questions, and learn more about the faculty members’ interests and areas of expertise. Take the faculty member to lunch if needed!
2. Assessment professionals should not assume that faculty understand their roles in assessment development initiatives. Spend time introducing yourselves and explaining what you do, why it matters, and how it benefits students. This understanding is essential to a cohesive and fruitful working relationship.
3. Institutions that truly value assessment as a means for improving student learning will provide faculty with time to contribute to assessment efforts. Faculty participants need relief from other responsibilities during periods of collaborative assessment development.
4. Ensure that accreditation feedback is communicated and accessible to all faculty. Draft faculty members to interpret and explain accreditation feedback.

We hope that the session was informative and useful for the attendees, but we can say that the experience was enlightening for the presenters. The input from attendees is valuable for helping us to improve our processes for collaborative assessment development.
References


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Who are we, and where did we come from? Exploring our Professional Identities as Assessment Practitioners in Higher Education

By Gina Polychronopoulos, Christopher Newport University and Emilie Clucas, Santa Clara University

Abstract: The following paper offers a descriptive account of the proceedings from a roundtable session at the Association for the Assessment of Learning in Higher Education 2019 conference, including some participant examples from the session and additional reflections from the authors. The path to becoming an assessment practitioner in higher education has been notably diverse, with practitioners representing various disciplines and levels of training. Assessment practitioners navigate several roles at their institutions, and their strengths or areas for growth may be as unique as the individuals themselves. The facilitator recently co-developed a model for assessment practice based on her and her co-author’s backgrounds as counseling professionals called the RARE Model, which includes four components: R-Relate, A- Acknowledge, R- Reflect, E- Empower (Clucas Leaderman & Polychronopoulos, 2019). The development of this model was prompted by a discussion among colleagues on the AALHE Assess listserv about how specific aspects of our experiences have supported our practice in higher education assessment, including promoting a positive assessment culture on campus. The purpose of this roundtable session was to continue the conversation, offering fellow assessment practitioners an opportunity to reflect on their professional identities and explore what unique (and shared) skills we employ to support intentional and effective practice. Participants completed interactive exercises and reflective activities (see Appendices A, B, and C for copies), and they engaged in facilitated discussion about their unique and shared responses.

Keywords: Professional identity; diverse backgrounds; higher education assessment; strengths-based practice, reflective practice

Introduction
Recent studies have noted the diversity of experiences and perspectives among assessment professionals in higher education. Nicholas and Slotnick (2018) discussed the varying disciplines, levels of training, and educational backgrounds, of higher education assessment practitioners, setting the stage for further exploration. Jankowski and Slotnick (2015) established a five-role framework for assessment professionals to reflect upon as they work toward enhancing a meaningful assessment culture at their institutions, which warrants dialogue within this group of practitioners. Ariovich and colleagues further supported and refined these roles, while also highlighting the need for flexible professional development to address distinct aspects of the professional identity of higher education assessment practitioners (Ariovich, Bral, Gregg, Gulliford, & Morrow, 2018). These studies, among others that were discussed during the roundtable session, support the development and definition of our collective professional identity as assessment practitioners in higher education settings.

Beyond the diversity of our professional backgrounds, it is worth exploring the individual strengths we (assessment practitioners) bring to our current roles and how we deliberately infuse them into assessment practice. About 75% of practitioners have come into the field within the past seven to ten years, a sign that the assessment profession is evolving (Nicholas & Slotnick, 2018). The facilitator of this roundtable and her co-author developed the RARE Model (R-Relate, A- Acknowledge, R- Reflect, E- Empower) that speaks to this: reflecting on the particular strengths and skills that were fostered in their backgrounds as counseling professionals while employing these to support their assessment practices (Clucas Leaderman & Polychronopoulos, 2019). Through collaborative reflection, these authors demonstrated one advantage of examining the processes and mental models that have guided their work. Building on the RARE Model as an example, understanding the implications of our diversity can benefit the ways we use our professional strengths in assessment (Polychronopoulos & Clucas Leaderman, 2019). The facilitator
discussed how the RARE Model has informed her own professional identity as an assessment practitioner, serving as an example of strengths-based, reflective practice.

The intended outcomes of the session were as follows: 1) Participants discussed recent/current publications and listserv topics related to the professional identity of assessment practitioners; 2) Participants reflected on their professional background, discipline area, and/or training that preceded their current roles as assessment practitioners in higher education; and 3) Participants identified and described specific aspects of their professional background (e.g., knowledge, skills) that align with or inform their current practices in assessment. The overarching goal of the roundtable discussion was to elicit thoughtful discourse and personal reflection about our unique professional identities as assessment practitioners.

Interactive Exercises and Discussion
Participants engaged in three interactive exercises during the session. First, participants individually completed an activity titled, “My Assessment Journey,” in which they created a visual representation of their individual journeys to becoming assessment practitioners (Appendix A). Then, the facilitator shared her own assessment journey, offering personal examples and explaining how engaging in reflective practice prompted the development of the RARE Model, and participants shared theirs with the larger group. Next, participants completed an interactive exercise called “My Professional Background,” working in pairs to discuss their individual disciplines, skills, how they were alike, and how they differed (Appendix B). For the final activity, titled “Professional Identity in Assessment”, participants completed a worksheet about their conceptual understanding of professional identity as, as well as their defining characteristics of assessment practitioners in higher education (Appendix C). The following narrative outlines each activity in depth, including highlights of participant discourse and additional reflections from the facilitator and co-author.

Activity 1: “My Assessment Journey.” For this interactive exercise, the facilitator distributed a worksheet for participants to complete individually. The worksheet displayed a timeline from college graduation to the present day. Participants were prompted to list important milestones in their educational and/or professional background which led them toward their current position in higher education assessment. Some examples of milestones included degree programs, jobs/internships, assistantships, specific research projects, and grant programs.

After participants completed the worksheet, the presenter facilitated discussion about the participants’ visual representations, exploring similarities and differences between participants’ responses. The purpose of the exercise was to prompt participants to think about what led them to their current positions in higher education assessment by considering important milestones along the way from college to the present day. To begin the discussion, the facilitator offered her own assessment journey as an example for the participants. Some examples of the facilitator’s milestones included extensive research methods courses in graduate school, work experience in clinical research, and performing grant program evaluations for K-12 school districts. After considering her own milestones, she shared that the common thread was helping others to explore how to improve an intervention or program. The real-time approach and making ongoing changes were what she found meaningful, and her mentor encouraged her to consider a career in higher education assessment.

Several participants shared examples from their own assessment journeys. One participant described that it “fell into place,” stating that the opportunities presented themselves, and he was put into an assessment position as an emergency hire at first and then moved on to a similar position at another institution. Another participant shared that she was an English/poetry teacher and was asked to be on her college assessment committee because she was the only person available at the time. She found the process to be interesting and acted as a liaison, inviting assessment personnel to speak to her department colleagues. When the institution’s assessment practitioner retired, she was encouraged to apply for the job. Although it had not previously occurred to her as a profession to choose, she reflected that the transition to assessment practice felt “natural to her.”

After a few participants shared their experiences, the presenter noted that most assessment practitioners have a unique story about how they came into the profession. In the session, only two participants indicated that they
completed a graduate program that was specific to educational assessment. As the identities of assessment practitioners continue to evolve, it is important that we embrace our disciplinary diversity because we each have individual strengths to contribute to our practices.

Discussion of relevant literature. During the session, the facilitator highlighted recent scholarly works related to the topic of professional backgrounds and roles of assessment practitioners (e.g., Ariovich et al., 2018; Jankowski & Slotnick, 2015; Nichols & Slotnick, 2018), as well as the RARE Model (Clucas Leaderman & Polychronopoulos, 2019). The presenter shared how she and her co-author connected on the AALHE listserv following a discussion about the criticisms of assessment. Next, she discussed how the RARE Model was developed to articulate the perspectives and approaches inherent in their work, including their “philosophy of assessment” (Jankowski, 2017) based on their shared backgrounds in counseling. During this part of the session, the facilitator emphasized that each person’s journey may look a little different, which adds to the multiplicity of viewpoints within our profession. The following overarching questions guided the discussion: (1) What are some of the skills that are shared in your professional backgrounds? (2) Which of these skills are unique? (3) Of those unique skills, which do you employ specifically in your role as assessment practitioners? (4) How do your skills support effective assessment practice?

Activity 2: “My Professional Background.” For the next interactive exercise, participants were prompted to list aspects of their knowledge, skills, and/or training from their specific professional backgrounds, such as data analysis, research methods, attention to detail, disseminating information, and teaching. Next, participants were asked to work with a partner and compare their list with their partner’s list to complete a Venn diagram, indicating unique and shared aspects of their professional backgrounds.

After participants completed the Venn diagram with their partners, the presenter prompted participants to consider what aspects were shared and what were unique. Several pairs noted similarities in their professional skills, such as facilitation, teaching, research, leadership, communication, data analysis, and disseminating information. One participant commented that it seems we have many of the same types of skills, although we may call them different things from one discipline to the next. The facilitator then asked about some of the unique skills that participants did not share with their partners. A participant offered that her partner was a lawyer and listed “preparing an argument” as one of her skills, which was something she did not have experience with doing. Another participant said one of the unique skills his partner noticed was “advocacy,” in that she had the ability to narrow down and focus on where change could be made with limited resources.

The purpose of this exercise was to encourage participants to reflect on the unique aspects of their backgrounds, considering those aspects to be potential strengths that they could employ intentionally in their assessment practices. Sayegh (2013) noted the importance of reflectivity for faculty members to leverage their strengths to support more intentional practices (Sayegh, 2013). As leaders within higher education institutions, assessment practitioners should model reflective practice by recognizing what unique strengths they bring to the table and intentionally employing them in practice (Polychronopoulos & Clucas Leaderman, 2019). It is important for assessment practitioners to pause periodically and explore the different factors that influence our individual practices to better understand how to build upon our strengths as a profession.

Activity 3: “Professional Identity in Assessment.” For the final interactive exercise, participants worked to construct their own definition of professional identity in assessment. First, they completed an association task by articulating what comes to mind when they think of assessment practitioners in higher education. Then, participants individually responded to the following three questions: (1) How do I define what an assessment practitioner does (professional identity), (2) How are my skills (noted in Activity 2) most helpful in the day-to-day work that I do?, and (3) How do I view my unique strengths or skills fitting into the identity of assessment practitioners?

The facilitator encouraged participants to share their reactions to completing the exercise and not necessarily their responses to the questions. This particular activity was intended to prompt in-depth reflection; however, time may
have been insufficient for participants to fully explore their individual answers. One of the participants reflected that defining professional identity implies shared values or purpose. Another believed that serving as advocates of the assessment profession is a crucial part of our collective professional identity. One participant shared that she also had a professional background in counseling and recognized how meaningful it was to help others see the valuable skills they have to offer.

**Adapting the Interactive Exercises**

There are several ways to adapt the interactive exercises outlined above to better suit the audience, time and space considerations, and material resources. For example, in Activity 1, the facilitator can use poster boards to create large visual representations of their assessment journey timelines. Participants can write and attach their milestones to the timeline using sticky notes, or they can create a combined timeline in small groups and use different markers to represent each individual, among other possibilities. Similarly, for Activity 2, the facilitator can choose to use poster boards instead of worksheets and sticky notes to list each aspect of their knowledge, skills, and training. This adaptation can help the facilitator and participants to recognize themes across pairs when bringing the discussion back to the larger group. Activity 3 may be facilitated so that participants co-construct their professional identities in pairs or small groups. The facilitator may also choose to use alternate materials or technology to support this type of collaboration.

**Final Thoughts**

Current researchers are setting the stage for assessment practitioners to define our professional identity. Counseling and faculty development have experienced a similar evolution, starting with practitioners who came to the field from various professional backgrounds and have worked to develop competencies that unite the profession. As we move toward constructing our collective professional identity in assessment, let us not forget about our disciplinary diversity and the unique strengths we each have to offer in assessment. As one participant summarized, our job is to keep assessment “purpose-driven” versus prescriptive, consistently seeking to make meaning in the process. We encourage assessment professionals to continue this conversation with their colleagues, explore their professional identities, and model reflective assessment practice.

**References**


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Moving Toward Equitable Assessment Practices in Higher Education
By Constance Tucker, Oregon Health and Science University, Rowanna Carpenter and Vicki L. Reitenaur, Portland State University

Abstract
Educators and environments committed to equity can drive culturally responsive behaviors in the learning environment. By definition, holistic assessment of student learning is a systematic process of curricular design which includes aligned learning goals, objectives, activities, data collection, data analysis, and results that inform practice. In order to go further in addressing equity in assessment holistically, practical solutions must address the systematic process of curricular design and identify ways to improve our current practices. Inspired by Montenegro and Jankowski’s 2017 Occasional Paper for the National Institute for Learning Outcomes Assessment, the session “Moving toward Equitable Assessment Practices in Higher Education” explored the qualities of equity in assessment methods that drive equity in higher education. The session explored the five approaches toward equitable assessment identified by Montenegro and Jankowski at two unique institutions: a four-year public research university and an academic health center. Through the examination of a case study and the application of a TRIZ exercise, participants engaged with each other around varying approaches to furthering equity in assessment in their own institutional contexts.

Keywords: Culturally Responsive Assessment, Diversity, Equity, Inclusion, Rubrics, TRIZ exercise

Introduction
Educators and environments committed to equity can drive culturally responsive behaviors in the learning environment. By definition, holistic assessment of student learning is a systematic process of curricular design which includes aligned learning goals, objectives, activities, data collection, data analysis, and results that inform practice. In order to go further in addressing equity in assessment holistically, practical solutions must address the systematic process of curricular design and identify ways to improve our current practices. The session “Moving toward Equitable Assessment Practices in Higher Education” explored the qualities of equity in assessment methods that drive equity in higher education.

Erick Montenegro and Natasha Jankowski from the National Institute for Learning Outcomes Assessment (NILOA) wrote its 29th Occasional Paper, “Equity and Assessment: Moving Toward Culturally Responsive Assessment.” The authors propose five methods to engage in equitable assessment practices: 1) awareness of the student audience; 2) use of appropriate language for all learners; 3) use of diverse assessment approaches that allow for individual difference (i.e., culturally responsive rubrics, portfolios, and projects); 4) allowing for individual differences in assessing for competence; and 5) the intentional use of institutional, program- and course-level assessment data to inform decision-making (Montenegro & Jankowski, 2017).

Our pre-conference session explored these five approaches at two unique institutions: a four-year public research university and an academic health center. In alignment with Montenegro and Jankowski (2017), each institution seeks to “empower students and faculty for success through intentional efforts to address inequality within our structures, create clear transparent pathways, and ensure that credits and credentials are awarded by demonstration of learning, in whatever form that may take” (p. 16).

Equity in Assessment: Case Study of Rubric Development at Portland State University
Portland State University (PSU) is an urban research university serving just under 30,000 students, approximately 22,000 of whom are undergraduates. PSU is Oregon’s most diverse institution: approximately half of undergraduates are first-generation, almost half are students of color, and a large number experience challenges related to low-income status, including housing and food insecurity. University Studies is the general education program, serving 95% of undergraduate students through a four-year interdisciplinary curriculum. Given the
diverse nature of the institution and the deeply compelling call for intentional approaches to equitable and inclusive assessment of learning, the PSU case offers a glimpse into one institution’s attempts to engage in assessment of learning in ways that reflect and advance a commitment to equity and social justice.

In 2017, the PSU Faculty Senate approved a revised learning goal for the University Studies (UNST) general education program: Diversity, Equity, and Social Justice. In the following academic year, the Director of Assessment convened a group of faculty to develop a rubric for use across multiple levels of the interdisciplinary four-year general education program. Seven full-time faculty (tenured and non-tenured), representing disciplines from computer engineering to women, gender, and sexuality studies, participated in developing the rubric. The group included two persons of color and was diverse in terms of gender identity and sexual orientation.

The group started by reviewing resources, including relevant AAC&U VALUE rubrics (Rhodes, 2010) and a chapter from *Teaching for Diversity and Social Justice*, then set about defining our rubric criteria. As we did so, a number of tensions emerged:

- The group had hard discussions about balancing the intellectual and the emotional/attitudinal aspects of this goal. One faculty member felt ‘empathy’ must be a requirement; i.e., students could not demonstrate they understood multiple perspectives without exhibiting empathy. Others disagreed, arguing that this was inappropriate for an academic rubric. Another faculty member insisted that the group must include criteria about how well students are able to work with theoretical frameworks associated with social justice. Others argued such theories were not part of the curriculum in their courses (e.g., natural sciences).
- After tentative agreement on draft criteria, the group worked to articulate how they expected students to demonstrate their learning, focusing on what they thought was reasonable for all students to achieve. Group members would articulate a description and almost immediately get caught up in identifying the challenges or resistance (from faculty and students) they anticipated in implementing the goal and/or reaching that level of learning. Faculty admitted to experiencing anxiety around imagining what was possible or appropriate to ask of themselves and other faculty.
- As the group worked, members toggled between focusing on students in faculty members’ particular disciplines or classrooms and identifying what could be envisioned for students navigating the whole of the general education program, comprised of many classes and experiences. Could they trust that, if faculty and staff did their parts, the pieces would add up to a coherent whole for students?
- In all of it, because part of the learning goal focuses on identity, the group had to consider their own identities and how they, as well as the identities of faculty colleagues and the multiple (and intersectional) identities of students, played into the conversation.

When a draft rubric was complete, the UNST assessment director shared it with PSU’s Office of Global Diversity and Inclusion, the University Studies Diversity and Equity Coordinator, and participants at the fall faculty gathering, which included adjuncts and full-time faculty. The group learned that one of the criteria seemed to encourage students to develop their own vision and action steps toward social justice without collaboration or input from others. The group did not want to inadvertently promote the practice of well-meaning, privileged students pursuing solutions in isolation, so they revised that section of the rubric in a continuing effort to find language that will promote learning and growth for all students without tokenizing marginalized students.

After sharing the above case study, the presenters invited participants to discuss a number of factors: the key players and stakeholders; the explicit and implicit tensions, the applicability of those tensions to their own situations, and the productive and destructive impacts of those tensions; the places where the NILOA Equity and Assessment framework was utilized, and the next steps that would continue to develop equity in practice at PSU and at their home institutions; and the role that students might play in ongoing assessment activities. The participants noted that, in the case, representatives of the co-curriculum were missing from the conversation and
not part of the process of developing the rubric. One participant provided an example to the group of the intersection of curricular and co-curricular goals and assessment of those goals, with students detailing their learning through e-portfolios, essays, and reflection on community impact projects.

Participants also noted that, in the case study, the groups and individuals doing explicit diversity and equity work were brought to the table to review the draft rubric; participants wondered if those persons should have been involved earlier in the process. The full group discussed in more depth the importance of timing and sequencing of assessment activities, and the context surrounding the development of the rubric and how the rubric was rolled out to the larger community. This discussion reinforced the vital nature of any particular institutional context, the quality of the collegial relationships involved in equity work, and the commitment to continue engaging in the work because of the challenges before us, not despite those challenges.

**Equity in Assessment: TRIZ Exercise at Oregon Health and Science University**

The TRIZ exercise was developed by Genrich Altshuller (1999) based on a Russian theory of inventive or creative problem solving. The original version of the TRIZ (translated as Theory of Inventive Problem Solving) was developed to address technical problems but has since been expanded to include educational problem solving. While TRIZ is a complex theory whose central concepts focus on generalizing problems and solutions and eliminating contradictions, educators have adapted and reduced the TRIZ approach to three intellectually stimulating questions. For the purpose of our pre-conference workshop, the questions were adapted as follows:

1. How do we/I reliably create inequitable assessments?
2. What are we currently doing or planning to do that resembles the previous list of inequitable assessment practices?
3. What can we do to stop reinforcing inequity in assessment?

**Method**

The second half of the pre-conference session focused on a TRIZ exercise guided by the above questions. Before engaging in the TRIZ exercise, participants discussed the challenges and barriers of having to incorporate equitable assessment into their work. After identifying barriers, participants engaged in the TRIZ exercise by vigorously discussing how to reliably create an inequitable assessment process, identifying ways in which their institutions may engage in inequitable practices, and brainstorming practical ways in which anyone can stop inequitable assessment practices.

**Results**

The results of the TRIZ exercise discussions are summarized in Table 1 below. Participants’ comments are organized in two hierarchies. The first, under the far-left column header, are five phases of holistic assessment: 1) Goals and Objectives, 2) Activities, 3) Data Collection, 4) Data Analysis, and 5) Results that Inform Practice. The second organizational header, along the top row, includes the three TRIZ guiding questions: 1) How do we/I reliably create inequitable assessments? 2) What are we currently doing or planning to do that resembles the list of inequities in assessment? and 3) What can we do to stop reinforcing inequity in assessment?

**Table 1. TRIZ Exercise Summary**

<table>
<thead>
<tr>
<th>Reliably Inequitable Practices in Assessment</th>
<th>Institutional Practices that Reinforce Inequity in Assessment</th>
<th>Support Equity by Stopping the Following:</th>
</tr>
</thead>
<tbody>
<tr>
<td>Goals &amp; Objectives</td>
<td></td>
<td></td>
</tr>
<tr>
<td>1. Goals focused on institutional needs with intentional efforts to ignore marginalized student needs.</td>
<td>1. No institutional procedures that request disaggregated data; 2. When developing content, focus on the majority of students; 3. Do not complete a curriculum map or align goals with the assessment process.</td>
<td>1. Ambiguous policies and procedures that do not reinforce equity as important in curricular activities; 2. Unprioritized goals and objectives.</td>
</tr>
<tr>
<td>Activities</td>
<td>Data Collection</td>
<td>Data Analysis</td>
</tr>
<tr>
<td>------------</td>
<td>----------------</td>
<td>--------------</td>
</tr>
<tr>
<td>1. Teacher centered rather than student centered curriculum.</td>
<td>1. Schedule of assessment is not flexible to student needs; 2. Course delivered using face-to-face lecture only; 3. When developing curriculum, do not partner with any offices or individuals outside of your department.</td>
<td>1. Minimize professional development for educators about multiple teaching and learning methods.</td>
</tr>
<tr>
<td>1. 1-2 high-stakes assessments per course to determine grades; 2. Utilize expensive standardized exams to determine student progress. Ensure students incur the cost of all standardized exams.</td>
<td>1. Data collection is focused on the end of the program rather than throughout; 2. Technology systems that collect assessment data do not talk to each other.</td>
<td>1. Minimize professional development for educators about multiple methods of assessment; 2. Collect data that does not inform decision making; 3. Neglect to explain to students why the data you are requesting is important each time you collect it.</td>
</tr>
<tr>
<td>1. Use academic thresholds on one high-stakes assessment to determine final grades; 2. Focus on aggregated data only. Do not disaggregate; 3. Examine educational data infrequently and inconsistently.</td>
<td>1. Collect IPEDS data to inform curricular decisions; 2. Institutional data and/or report cards focus on data that is easy to report and does not expose institutional weaknesses; 3. Assessment is conducted when reporting requires it; 4. No institutional procedures that request disaggregated data; 5. Avoid having conversations about program effectiveness in the name of academic freedom.</td>
<td>1. Avoid the use of disaggregated data to identify a problem that the institution can rally around over the next year; 2. Omit central services committed to diversity and equity work from process of interpreting data.</td>
</tr>
</tbody>
</table>

### Reflections on Discussion

The use of the TRIZ exercise as a creative problem-solving technique to address inequity in assessment promoted energetic discussion that led to practical solutions. As participants exaggerated the problem of developing reliably inequitable processes in assessment, they identified the importance of equitable goals and objectives, multiple methods of assessment, disaggregation of data, and collaborative committees in high-stakes decision-making. As participants addressed the question of how their institutions engaged in inequitable assessment practices, specific and personalized examples emerged. These examples reinforced the list of exaggerated inequitable practices while describing everyday behavior that contributes to inequitable assessment. The final TRIZ question highlighted actions that participants could stop doing upon return to their campuses. These actions to stop inequity emphasized addressing ambiguous language in institutional visions, policies, and procedures supporting equity; challenging the collection of meaningless data; enhancing professional development opportunities; and engaging stakeholders from multiple audiences and perspectives.
Throughout this pre-conference session, participants began to address inequities in assessment by engaging in difficult conversations—much as we must do to advance these efforts on our campuses. The authors wish to thank the participants of the 2019 AAHLE pre-conference workshop, “Moving toward Equitable Assessment Practices in Higher Education,” for their willingness to engage as problem solvers related to equity, cultural responsiveness, and inclusion in assessment.

References

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A South African Construction Economics Department Evolved into a Blueprint for Quality Programme Assessment Through its Leadership and Collaboration

By Adriana Both and Benita Zulch, University of Pretoria

Abstract: The Department of Construction Economics at the University of Pretoria (UP), South Africa, embarked on a journey to improve the practice of programme assessment for three undergraduate and four coursework honours programmes. Under the leadership of the departmental head and in collaboration with the educational consultant for the faculty, the process of re-curriculation and programme assessment evolved over a year. Together with lecturers, this process did not only focus on compliance with accreditation standards but rather to establish a blueprint that can provide accountable evidence to improve students’ learning. The assumption is that institutions of higher education across the globe experience the same type of challenges concerning accreditation and reporting on student learning. This paper will share and present the South African journey.

Keywords: Quality Programme Review and Assessment, Accreditation, Collaboration, Global Assessment Practices, Total Quality Management (TQM)

Introduction
The purpose of this paper is to share the journey of finding a blueprint for programme assessment through the implementation of a total quality management (TQM) cycle in a Construction Economics (CE) Department at the University of Pretoria, South Africa. We trust that the readers who are involved with curriculum matters, programme assessment, and accreditation in higher education could benefit from our journey through reflecting on their current programme assessment practices and in turn consider our blueprint for implementation in their institutions.

In alignment with the conference theme, the presenters indicated the different internal and external stakeholders that have been involved and contributed collaboratively to the success of the process. We regarded the topic of accreditation and the challenges associated with these evaluations as of international interest. The paper sparked some discussions around strategies, good practices, and innovative solutions for the implementation of the proposed blueprint.

The newly appointed departmental head realized during the middle of 2017 that there were no coordinated approaches to annual programme review and programme assessment in her department, as appose to her previous institution where she was responsible for these processes. On further investigation, curriculum documentation that should indicate the uniqueness of the three programmes in the department, in alignment with accreditation criteria and industry requirements, was found to be insufficient. Other problems identified were low module pass rates and insufficient graduate employability. International, as well as national accreditation visits, confirmed the above-identified problems.

These problems were addressed with the first round of improvement plans that were submitted to accreditation councils, following the development and implementation of a blueprint. This blueprint is based on a four-step quality improvement cycle (QIC) by Edwards Deming (Perla, 2013) leading to a total quality management (TQM) process of programme assessment and effectiveness and improved student learning. Deming’s (2013) QIC consists of an iterative management method of “Plan – Do – Check – Act” or “Plan – Do – Check – Adjust” that we found
easy with the academic staff to implement for improvement of quality processes. Examples of templates of how the department executed these steps as part of the journey in its totality are attached in Appendix A.

Establishing a Total Quality Management Cycle (TQM) – Background to the Curriculum Project
The establishment of the blueprint for TQM did not start over-night and was preceded by the CE curriculum project that was designed for two phases. Phase 1 started in 2017 with many discussions and planning sessions to ensure that every action that was taken, and workshops facilitated, were based on sound pedagogical principles, guided by official policies and documentation, and supported and informed by accrediting bodies and industry. Phase 2 commence in August 2019 and will be discussed below.

Phase 1: 2018 – 2019
Before the start of the project, the relevant university offices were consulted. The process commenced with a visit to the Institutional Planning office to ensure that the process is according to the regulations of the University and to start with the current documents available at the university. The Quality assurance- and Academic Planning office was consulted by the head of the department for CE, and the education consultant for the EBIT faculty (Engineering, Built Environment and Information Technology), to get access to official documentation of the South African Council on Higher Education (CHE) and South African Quality Authority (SAQA) for all three programmes in the department, namely: Real Estate (RE), Quantity Surveying (QS), and Construction Management (CM). It was an extremely challenging exercise, and in the absence of correct documentation, the departmental head and education consultant retrieved the qualification documentation from South African Quality Authority (SAQA) and Council on Higher Education (CHE) websites. In addition, each programme leader requested the necessary documentation from their accreditation councils and/or bodies as well as of all leading universities that offer standalone programmes nationally and internationally. The programme leaders further consulted industry, which was supported in the formation of working sub-committees to assist in the re-curriculation process. The consultant facilitated the process in collaboration with the departmental head, who managed and steered the project, together with every academic staff member in the department. The timeline that informed the process of curriculum review and re-curriculation are illustrated in Figure 1.

Figure 1. Timeline for the curriculum review and re-curriculation process for Construction Economics (CE) since 2017

As part of the quality improvement cycle, 2018 was characterized by a year-long journey of programme review and restructure of programme learning outcomes, module outcomes, and assessment criteria across three programmes. Module and programme credits had to be reviewed and adjusted according to the South Africa
Quality Authority (SAQA) requirements. The alignment of content and assessment to module and programme outcomes were addressed in workshops throughout 2018. The cyclical process provided an opportunity for discussion and re-negotiation with service departments with regards to content and credit overload of their modules.

Module silos were broken down as part of a collaborative effort from within the department and leadership of the head of the department. The table below gives a summary of the official workshops and meetings that were conducted and facilitated by the consultant. Many additional meetings were also held with individual staff, module coordinators, programme leaders/coordinators, and the HED, in addition to the scheduled meetings.

Table 1. Phase 1 - Official workshops and meetings that were conducted and facilitated by the EBIT Education Consultant

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<td>End 2017</td>
<td>Meetings: HOD of DCE</td>
<td>Various meetings were held with the HOD to discuss the curriculum project that was going to take place in 2 phases: 2018-2019 and 2019</td>
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<td>14,16 Feb 2018</td>
<td>Meeting: HOD and Programme Coordinators</td>
<td>• Planning and mapping timeline for project up to August  • Plan and develop workshop themes</td>
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<td>2,16 March 2018</td>
<td>Workshop and additional meetings as needed</td>
<td>• Navigating through your curriculum and first ‘Big Picture Unique Map’ for all three undergraduate programmes  • Aligning programme ELO and LO with NQF and BLOOM  • 10 min presentation of each module - (Module name, code &amp; statement, 1 Highest Learning Outcome according to Bloom and 1 Lowest LO. Indicate how it will be facilitated and assessed)  • Map and align all programmes (ELO/LO/Themes/Credits)</td>
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<tr>
<td>6, 13, 20 Apr 2018</td>
<td>Workshop and additional meetings as needed</td>
<td>• Introduction to UP study guide template  • Improve and complete study guide by educational guidelines and principles.  • Short &quot;show and tell&quot; of LMS Goals Tool &amp; iPeer tool for group participation evaluation for possible inclusion as part of assessment, utilizing clickUP (Blackboard LMS) and reporting to Accreditation Bodies</td>
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<td>11, 25, 28 May 2018</td>
<td>Individual Programme meetings</td>
<td>Workshops to review module outcomes, assessment criteria, and content and credits. Revisit credit allocation to notional hours for (lectures, practical, assessment, etc.)</td>
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<td>July, August 2018</td>
<td>Regrouping of programmes</td>
<td>All staff programmes worked together on a Google Drive to document their processes and create PQM documents</td>
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according to the requirements of the office Academic Planning in alignment with the CHE online template.

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<td>7,12,13,14 Sept 2018</td>
<td>Department &amp; Industry workshop – Mapping and discussion</td>
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<td>15, 24, 31 Oct 2018</td>
<td>Meetings with industry and workshops (Continue)</td>
<td>QS - CM - RE Mapping and Documentation Completion QS ** HOD Accounting - Financial Management</td>
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<td>Submission of Form B of 3 undergraduate and three honours learning programmes to EBIT Teaching and Learning Committee</td>
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The following ‘snap-shots’ are examples to illustrate the outputs of Phase 1. In principle, all curriculum and assessment documents had to be re-designed and developed as part of the process to establish a blueprint for assessment. Figure 2 is a Google Sheet where all three undergraduate programmes automatically updated as academic staff worked on their modules. This exercise was an excellent practice for breaking down the ‘module silos’ which lead everyone to take not only ownership for his/her module but responsibility and being held accountable for the module within the programme. This was true, especially for a consistent overview, because the Construction Management programme formed the base programme for the Real Estate and Quantity Surveying programmes.
In Figure 3, an example is illustrated of the CE programme’s Google-Drive where all academic and administrative staff can access all the curriculum documentation.

---

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**Figure 2.** Programme Curriculum Map for Construction Management (CM), Real Estate (RE) and Quantity Surveying (QS)

In Figure 3, an example is illustrated of the CE programme’s Google-Drive where all academic and administrative staff can access all the curriculum documentation.

---

**Figure 3.** Example of Google-Drive for Construction Economics Programme
In Figure 4 an example of the alignment of the programme learning outcomes (PLO) with the module learning outcomes (MLO) of the CE Programme is documented in a Google-Sheet format (See Figure 4).

Figure 4. Example of the Construction Management Programme- and Module map in Google-Drive

Figures 5 forms part of the Programme Qualification Mix (PQM) as documented in a Google-Book where each module individually was documented according to the Council on Higher Education and PQM criteria template. The area in red indicates what needs to change from the ‘status quo’ on the left. All the modules are transparent and accessible to all lecturers. Any changes made on the individual module sheets are automatically updated and available in a final Google-Drive document ready for submission for approval.

Figure 5. Module Information According to Council on Higher Education and South African Quality Authority Criteria
During the workshops of 2018, all academic staff had the opportunity to present their modules. The PowerPoint (Figure 6) had to indicate the module statement; one learning outcome (highest level of Bloom) indicating how it is going to be taught and assessed; one learning outcome (lowest level of Bloom) also indicating how it will be taught and assessed. We called these sessions: “Breaking down the silos and starting a curriculum dialogue across all programmes.”

Figure 6. Example of a Module PowerPoint Presentation, by the Lecturer, to all Academic Staff – Where the Aim was to Break Down the Silos and Starting a Curriculum Dialogue Across all Three Programmes

**Phase 2: Goals for 2019**

The departmental head and academic staff will continue refining the curriculum and assessment map in alignment with feedback from the EBIT Faculty Board, accreditation outcomes, programme outcomes, module outcomes, SAQA NQF level descriptors, and University of Pretoria Graduate Attributes.

The department will deliver at the end of 2019:

- Three unique overarching and visualized curriculum & assessment maps for the programmes - CM/QS/RE
- Visualized curriculum and assessment maps for each module within the programmes (CM/QS/RE)
- Departmental study guide
- Quality assured study guide for each module in the three programmes

- clickUP (Blackboard LMS) Goals Tool training: Academic staff will be trained to view and add alignments of module assessments and content to the programme/module/accreditation body/SAQA/Graduate Attributes learning outcomes utilizing the clickUP (Blackboard) Goals Area tool. Also, they will be trained to create reports within their modules that can be used to inform actions for improvement to their modules and the programme as a whole, working towards student success in the CE. Once this process is finalized reports will be generated through the use of Analytics for Learn (Blackboard) towards the end of 2019 to afford annually accountable reporting for accreditation purposes as well as actions to be taken for the next year towards improved student learning.
Summary
In summary, an introduction and background were provided to the initiation of the curriculum project in CE in 2018 as part of the journey to establish and implement a blueprint for assessment through executing a total quality management cycle. The execution of the project process is indicated in section 2. Some examples of ‘screenshots’ are provided as evidence of the work that was done during the past year and a half. The academic staff reported that they have developed a knowledge of understanding and implementation on all aspects of their programmes’ curriculum and feel empowered to contribute to the QPIC of the department. Figure 7 illustrates how the process started with the end in mind: Leadership and planning; followed by staff development and the process of curriculum review and re-alignment and re-curriculation (Phase 1) for improvement. For available reporting with actionable data, the process evolved over a year from merely complying to accreditation standards, to establish a blueprint that can provide accountable evidence to improve students’ learning. A sense of ownership on module and programme level was established through “Attain” - Succeed in achieving.
The academic staff (Faculty) of the CE believes that the outcome(s) were achieved for phase 1 of the curriculum project. All measures were taken from the academic staff in the department to work together with the administrative staff of UP to ensure that the documents submitted for approval were in good order. Minor changes were suggested by UP administrative staff during the process.

Figure 7. Blueprint for Assessment

The academic staff has consensus that the curriculum process was done correctly and that the departmental head took the necessary leadership and allowed the education consultant to work with the staff who are the technical and subject matter experts. The departmental head was in continuous discussion with the consultant and attended workshops and meetings where final decisions had to be made. When the departmental head was not at the workshops, she worked continuously on the improvement of the documentation in the background on all three programmes.

Accreditation bodies and industry confirmed the problem and challenges faced by the department. Collectively, academic staff realized that change is needed to improve the quality management cycle and that created room for innovation. This process further allowed the opportunity to leverage technology in the future to provide evidence of change that took place to assure actions for total quality improvement.
The learning curve for the academic staff was exponential - the staff is empowered with knowledge and understanding of curriculum and accreditation matters. The staff are confident in what they are doing, and the process had moved on to phase 2.
Next Steps
AALHE conference attendance affirms that the departmental head and consultant (Authors of this paper) were indeed going in the right direction, but learned from the presentation session and discussion around the table that the departmental head initially should have started with the re-curriculation process before aiming to create a TQM for formative and summative assessment. Fortunately, she partnered early on in the process with the consultant and was able to allow all stakeholders in the process to grow and move together towards establishing a blueprint for programme assessment through TQM.

The department volunteered to be a pilot for implementing an LMS-based framework for quality programme assessment to investigate how they can leverage the use of technology to systematically collect information about programme effectiveness and student learning during 2019 and 2020.

Conclusions
In conclusion, the goals achieved for 2018 formed the point of departure and a baseline for the emergence of the blueprint for assessment and TQM cycle. Three undergraduate and three honours programmes curriculum documents were submitted to the Faculty Teaching and Learning Committee and served at Faculty Board in July 2019. The department’s annual Quality Programme Improvement Cycle (QPIC) blueprint was introduced to the department and already being implemented in 2019/20.

Acknowledgements
All the academic staff of the Department for Construction Economics are greatly appreciated for their continuous commitment and dedication to improving the learning programmes during 2018-2019. Thank you for taking the leap of faith to move away from “ticking the box for compliance” to an accountable process and total quality management and improvement cycle for your students’ learning.

References

Adriana Botha is Faculty of Engineering, Build Environment and Information Technology at the University of Pretoria in South Africa. She can be reached at adriana.botha@up.ac.za.

Benita Zulch is Faculty of Engineering, Build Environment and Information Technology at the University of Pretoria in South Africa. She can be reached at benita.zulch@up.ac.za.
## Appendix A:

### Document 1: Working Document

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Future implementation: Technology to be implemented to manage blueprint with Google Drive
Module: .................................................................  Examination Period: ..................................................

Panel of Examiners:

Internal Examiner: ..................................................  External Examiner: ..................................................
(Lecturer) (Moderator)

Please deliver the completed form to:

Head of Department

Department of Construction Economics
Faculty of Engineering, Built Environment and Information Technology
University of Pretoria

Pretoria

0002

1. Examination Paper / Oral

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Date: .......................................................... Date: ..........................................................

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## CONTROL FORM

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Faculty of Engineering, Built Environment and Information Technology

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- Number in each category
- Number of dropouts

Forms included:
- Assessment doc 1
- Results doc 2
- Results doc 3

Name of Head of Department: ____________________________
Signature: ____________________________
Date: ____________________________

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