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Workshop Series on the  
Development, Design and Use of Rubrics

FACILITATORS:  
ALAN URMSTON (ELC) AND PAKEY CHIK (EDC)

Session 2:  
Rubric Design for Common Assessment Tasks at PolyU



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## Outline:

1. The PolyU Rubric Policy
2. What is a rubric?
3. Group Activity – Reconstructing a rubric
4. Collection and Review of Sample Rubrics in Use at PolyU
5. Group Activity – Assessing the qualities of sample rubrics
6. Roundup, Q&A

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## The Rubric Policy in 2016

**Policy on the use of rubrics** [See notes]

Rubrics must be specified for all ‘major’ assessment items at the subject level, made available to students before the assessment, and used for grading the assessment. Departments have the flexibility to determine what is ‘major’. As a rule of thumb:

- For subjects without examinations, rubrics should be required for single assessment items with a weighting of 30% or above of the subject’s overall assessment.
- For subjects with examinations, rubrics should be required for single assessment items with a weighting of 20% or above of the subject’s overall assessment.

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## What is a Rubric?

1. Task description aligning with the intended learning outcomes

3. Levels of Performance

- Numerical (e.g. 1-4 or actual points value)
- Qualitative (e.g. fail-pass-satisfactory-good-excellent)

	1	2	3	4
Criterion 1	•	•	•	•
Criterion 2	•	•	•	•
Criterion 3	•	•	•	•
Criterion 4	•	•	•	•

2. Criteria/ Dimensions  
Elements that characterize performance of tasks

4. Grade descriptors  
Specify the meaning of each criterion  
Describe levels of performance

Source: Working Group on Subject Quality Assurance (<https://www.polyu.edu.hk/wgsqa/>)

## What is a Rubric?

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Criteria	Excellent (90-100%)	Good (80-89%)	Satisfactory (70-79%)	Marginal Pass (60-69%)	Fail (0-59%)
<b>Knowledge and professional skills - Learning outcome 1</b>	Accurately describes the problem. Clearly describes how the thinking will contribute to the understanding of the problem.	Describes the problem well & reasonably consistent in describing the thinking and providing information about the problem.	Describes the problem satisfactorily. Shows little more consistent in describing their thinking and providing more information about the problem.	Is inconsistent in describing the problem. Needs to explain how their thinking will contribute to the understanding of the problem.	Has difficulty in describing the problem. Unable to show how their thinking will contribute to the understanding of the problem.
<b>Analysis - Learning outcome 2</b>	Refers to a variety of sources in reflection to support argument, applies concepts from reading to analyse experiences.	Refers to several sources to support argument in reflection. Shows an attempt to analyse experience.	Refers to sources to support argument in reflection. Uses reading to analyse experience.	Refers to few sources to support argument in reflection. Makes little use of reading to analyse experience.	Does not refer to sources to support argument in reflection. Makes no use of reading to analyse experience.
<b>Evaluation - Learning outcome 3</b>	Can suggest creative, logical and workable solutions to achieve goal. The solutions relate directly to the specific problem. Explains strategies to support solutions.	Can suggest several good solutions to achieve goal. The solutions are directly related to the specific problem. Attempts to explain strategies to support solutions.	Can suggest several solutions that mostly achieve an aim to solve the problem.	Has difficulty suggesting solutions that mostly achieve an aim to solve the problem.	Is unable to suggest any solutions or relate solutions to the problem.
<b>Application - Learning outcome 4</b>	Decides which will be the best solution. Can implement plan and use solution by demonstrating application of techniques and strategies.	Selects what seems to be the best solution. Can apply techniques and strategies.	Selects what seems to be the best solution. Needs to explain plan to get desired solution.	Needs to be consistent in selecting what seems to be the best solution. Needs to explain how their choice is made.	Unable to select what seems to be the best solution.

Analytic Rubric

Grade	Performance Description
<b>Excellent (A+, A, A-)</b>	<ul style="list-style-type: none"> <li>The contents have covered the training received comprehensively. The writer's level of achievement on all subject learning outcomes are clearly evidenced.</li> <li>Contains critical reflections that connect the training experiences, academic knowledge, and professional aspirations.</li> <li>Focuses on grammar and use of engineering terms and is rare and effective.</li> <li>Diagrams, figures, and tables are used only where necessary.</li> </ul>
<b>Good (B+, B, B-)</b>	<ul style="list-style-type: none"> <li>The contents have covered all major aspects of the training received.</li> <li>The writer's level of achievement on all learning outcomes can be determined.</li> <li>Contains critical reflections on the training experiences, theoretical knowledge, or professional aspirations.</li> <li>Though there may be a few minor errors in grammar and use of engineering terms, meaning is clear throughout. Diagrams, figures, and tables are used where appropriate.</li> </ul>
<b>Satisfactory (C+, C, C-)</b>	<ul style="list-style-type: none"> <li>The contents have covered most major aspects of the training received. Some of the contents may be repetitive, and there may be a few minor errors in grammar and use of engineering terms.</li> <li>Contains fragmented reflections on the training experiences, theoretical knowledge, or professional aspirations.</li> <li>A few distracting errors in grammar and use of engineering terms but meaning is clear. Communication is marginally enhanced by diagrams, figures, and tables.</li> </ul>
<b>Marginal Pass (D+, D, D-)</b>	<ul style="list-style-type: none"> <li>The contents have covered some basic aspects of the training received. The structure has limited coherence, clarity, and cohesion, making the writer's achievement of learning outcomes somewhat unclear.</li> <li>Contains only single reflections of the training experiences.</li> <li>Multiple distracting errors in grammar and usage that sometimes impede understanding. Diagrams, figures, and tables were either not used or ineffective.</li> <li>Block quotations were used occasionally to assist communication.</li> </ul>
<b>Fail (F)</b>	<ul style="list-style-type: none"> <li>The contents are an assemblage of reflections that lack cohesion, clarity and coherence, or the contents are unrelated to the training received.</li> <li>Contains no or irrelevant reflection on the training experiences.</li> </ul>

Holistic Rubric

## Activity 1



Work together in groups (of 3 or 4) to reconstruct the rubric from its constituent cells and identify the criteria. Report back on the thinking processes that the group went through while completing the task.

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## Collection and Review of Sample Rubrics in Use at PolyU

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- ▶ Rubrics collected from 29 departments / centres / schools in May 2018 and August 2020.
- ▶ 133 rubrics analysed for:
  - ▶ Alignment to Institutional Level Subject Grading Descriptors
  - ▶ Quality as assessment instruments
  - ▶ Quality as academic documents
- ▶ Recommendations made for further staff development.

## Institutional Level Subject Grading Descriptors

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Subject grade	Short description	Elaboration on subject grading description
A+	Excellent	Demonstrates excellent achievement of intended subject learning outcomes by being able to skillfully use concepts and solve complex problems. Shows evidence of innovative and critical thinking in unfamiliar situations, and is able to express the synthesis or application of ideas in a logical and comprehensive manner.
A		
A-		
B+	Good	Demonstrates good achievement of intended subject learning outcomes by being able to use appropriate concepts and solve problems. Shows the ability to analyse issues critically and make well-grounded judgements in familiar or standard situations, and is able to express the synthesis or application of ideas in a logical and comprehensive manner.
B		
B-		
C+	Satisfactory	Demonstrates satisfactory achievement of intended subject learning outcomes by being able to solve relatively simple problems. Shows some capacity for analysis and making judgements in a variety of familiar and standard situations, and is able to express the synthesis or application of ideas in a manner that is generally logical but fragmented.
C		
C-		
D+	Pass	Demonstrates marginal achievement of intended subject learning outcomes by being able to solve relatively simple problems. Can make basic comparisons, connections and judgments and express the ideas learnt in the subject, though there are frequent breakdowns in logic and clarity.
D		
F	Fail	Demonstrates inadequate achievement of intended subject learning outcomes through a lack of knowledge and/or understanding of the subject matter. Evidence of analysis is often irrelevant or incomplete.

Source: Handbook on Academic Regulations (April 2021)

### Alignment of Sample Rubrics to Institutional Level Subject Grading Descriptors

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Element of ILSGDs	Direct reference	Indirect reference	No reference
Achievement of intended subject learning outcomes	26 (20%)	61 (46%)	46 (34%)
Use of appropriate concepts for problem solving	22 (16%)	62 (47%)	49 (37%)
Critical analysis and judgement	36 (27%)	75 (56%)	22 (16%)
Synthesis and application of ideas	26 (20%)	73 (55%)	34 (25%)
Logic and comprehensiveness	22 (16%)	81 (61%)	30 (23%)

- When surveyed, out of 66 respondents (academic staff at PolyU), 44 (67%) said that they drew on the ILSGDs when designing rubrics.
- This would seem to be an area that needs to be strengthened.

Source: Review of sample rubrics provided by PolyU departments/centres/schools

### Qualities of Sample Rubrics as Assessment Instruments

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*Positiveness* – It is common for assessment descriptors aimed at lower levels of achievement or ability to be negatively worded, as it is more difficult to formulate descriptions of what learners are able to do at these levels. But for rubrics to help provide feedback to learners on what they have shown that they can do and what they should aspire to improve, positive wording is desirable wherever possible.

*Definiteness* – Descriptors should describe concrete tasks and concrete degrees of skill in performing them. Vague descriptions should be avoided, as should the replacement of qualifiers such as “some” with “many” or “fairly broad” with “very broad” and so on.

*Clarity* – Descriptors should be clearly written and free from jargon so that both teachers and students understand them.

### Qualities of Sample Rubrics as Assessment Instruments (cont.)

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*Brevity* – To achieve definiteness of description of a learner or a performance, it is sometimes considered that detailed (and therefore lengthy) descriptors are needed. However, research has shown that teachers and students prefer short, concise descriptors as they are more practical when used for assessment. A balance must be found between the two.

*Independence* – Descriptors should clearly describe performance or ability at particular levels and on particular criteria. In this respect they should be independent of each other within the rubric. Short and concrete descriptors can be used as independent criteria

### Qualities of Sample Rubrics as Assessment Instruments

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Quality	Satisfactory	Needs Improvement	Missing / not addressed
Positiveness	14 (10%)	119 (90%)	0
Definiteness	18 (14%)	84 (63%)	31 (23%)
Clarity	22 (16%)	84 (63%)	27 (21%)
Brevity	21 (15%)	91 (70%)	21 (15%)
Independence	17 (13%)	81 (61%)	35 (26%)

Each Quality is considered in terms of use by all stakeholders – teachers, students and administrators.

Only a minority of sample rubrics proved to be satisfactory in terms of their quality as assessment instruments.

Source: Review of sample rubrics provided by PolyU departments/centres/schools

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## Activity 2



In your groups, look at the sample rubrics provided and rate them on their qualities as assessment instruments. Report back on the ratings that the group gave for each rubric and why.

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## Qualities of Sample Rubrics as Academic Documents

Quality	Satisfactory	Needs Improvement	Needs total revision
Language	37 (28%)	93 (70%)	3 (2%)
Coherence	24 (18%)	99 (74%)	10 (8%)
Format	12 (9%)	81 (61%)	40 (30%)

Most sample rubrics in need of improvement.

Rubrics are written in English – not the first language for most stakeholders.

Source: Review of sample rubrics provided by PolyU departments/centres/schools

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## Roundup

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Thank You For  
Your Time Today

ANY QUESTIONS?

Please provide us with your feedback!



<https://forms.gle/rkaSNgfHXZjnmIUeA>