Assessment Craft

Rebecca Feind
Kathy Clarke
Basic Information Literacy @JMU

Madison Research Essentials Tutorial

- Discovering the JMU Libraries Unit
- Tutorial: Discovering the JMU Libraries
- Tutorial: Discovering the JMU Libraries Part 1
- Tutorial: Discovering the JMU Libraries Part 2
- Complementan Resources
- Assessment: Discovering the JMU Libraries

Madison Research Essential Skills Test (MREST)

- All new students (~4300) complete before the end of the first year
- Proctored test, secure lab
- Competency-based
- Objective-driven
- Graduation requirement, holds apply for non-completion

4/26/13
Full Disclosure

MISSION

The mission of the Center for Assessment and Research Studies (CARS) at James Madison University is to provide quality assessment service to the university, to provide applied graduate training in both assessment and measurement, to increase the use of innovative technology in assessment practice, to increase the rigor of measurement and statistical techniques used in assessment practice, and to produce quality scholarship in assessment and measurement.

VISION

To be nationally recognized as a standard of excellence for practice, programs, and scholarship in assessment and measurement.

VALUES

Quality: We value quality in all of our endeavors.

Innovation: We value the use of innovative technology and the use of more rigorous measurement and statistical techniques in assessment and measurement.

Appropriateness: We value a match between the technology or measurement/statistical technique being used and the assessment-related questions being asked.

Research: We value rigorous study of the instruments, technologies and
Assessment Paradigm

- Establish Objectives
- Select Design Instrument
- Collect Information
- Analyze & Maintain Information
- Use & report out Information
After completing *Cluster One: Skills for the 21st Century*, students should be able to:

1. Recognize that information is available in a variety of forms including, but not limited to, text, images, and visual media.
2. Determine when information is needed and find it efficiently using a variety of reference sources.
3. Evaluate the quality of the information.
4. Use information effectively for a purpose.
5. Employ appropriate technologies to create an information-based product.
6. Use information ethically and legally.
Use Existing Objectives

- Evaluate claims in terms of clarity, credibility, reliability, and accuracy (C1-Critical Thinking)
- Effectively incorporate and document appropriate sources to support an argumentative thesis or point of view (C1-Writing)
- Demonstrate an understanding of broader cultural, historical, or conceptual contexts of particular issues, ideas, objects, or events - past and present. (C2 – Human Questions)
- Identify key primary sources relating to American history, political institutions and society (C4-American Experience)
- ...Be able to distinguish science from pseudoscience. (C3-Natural World)
- Identify key primary sources relating to American history, political institutions and society (C4-American Experience)
- Discern the extent to which sources of information about the socio-cultural dimension are reputable and unbiased (C5-Individuals in the Human Community)
- Evaluate the extent to which the approach to, and uses of, psychosocial research are ethical and appropriate (C5-Individuals in the Human Community)
Assessment Paradigm

Establish Objectives

Use & report out Information

Select Design Instrument

Analyze & Maintain Information

Collect Information
## Test Blueprint

<table>
<thead>
<tr>
<th>C1 Information Literacy Objective</th>
<th>Items</th>
<th># of Items</th>
<th>% of Test</th>
</tr>
</thead>
<tbody>
<tr>
<td>1: Recognize that information is available in a variety of forms including but not limited to text, images and visual media</td>
<td>1048, 172, 173, 209, 1005, 104 2, 1056</td>
<td>7</td>
<td>18%</td>
</tr>
<tr>
<td>2: Determine when information is needed and find it effectively using a variety of reference sources</td>
<td>1, 6, 8, 109, 110, 111, 205, 1003, 211, 120, 156, 159, 160, 162, 1009, 1016, 1017</td>
<td>17</td>
<td>46%</td>
</tr>
<tr>
<td>3: Evaluate the quality of information</td>
<td>40, 43, 131, 221, 1037</td>
<td>5</td>
<td>14%</td>
</tr>
<tr>
<td>4: Use information effectively for a purpose</td>
<td>229, 1050, 1053, 53</td>
<td>4</td>
<td>11%</td>
</tr>
<tr>
<td>5: Employ appropriate technologies to create an information-based product</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>6: Use information ethically and legally</td>
<td>129, 157, 228, 1001</td>
<td>4</td>
<td>11%</td>
</tr>
</tbody>
</table>
Assessment Paradigm

Establish Objectives

Use & report out Information

Select Design Instrument

Analyze & Maintain Information

Collect Information
Psycho-Metrics  aka why to be nice to assessment professionals...

Items that Did NOT Function Well

(8) ITEM # 229  Objective: 1  AnswerKey: A

A reference list or bibliography provided in a source can
(a) provide a researcher with additional sources of information
(b) make a paper seem longer than it really is
(c) lead to more current references on a subject
(d) provide the author's educational credentials

How well does this item conceptually match the intended objective?

<table>
<thead>
<tr>
<th>Not at all</th>
<th>Minimally</th>
<th>Moderately</th>
<th>Substantially</th>
<th>Exceptionally</th>
</tr>
</thead>
</table>

Do you think this item matches another objective equally well or better? __________ If so, which objective? ________________

And, what degree does this item conceptually match to this other objective you mentioned. (Leave blank if you did not name an other objective.)

<table>
<thead>
<tr>
<th>Not at all</th>
<th>Minimally</th>
<th>Moderately</th>
<th>Substantially</th>
<th>Exceptionally</th>
</tr>
</thead>
</table>

Please write down some talking points as to why this item might not separate masters of objective 1 from non-masters.
# Distractor Analysis, srsly, be nice to assessment ppl...

<table>
<thead>
<tr>
<th>OPTIONS</th>
<th>A</th>
<th>B</th>
<th>C</th>
<th>D*</th>
<th>E</th>
<th>OMIT</th>
<th>TOTAL</th>
</tr>
</thead>
<tbody>
<tr>
<td>FREQ</td>
<td>1</td>
<td>2</td>
<td>1</td>
<td>10</td>
<td>0</td>
<td>0</td>
<td>14</td>
</tr>
<tr>
<td>%</td>
<td>7.1%</td>
<td>14.3%</td>
<td>7.1%</td>
<td>71.4%</td>
<td>0.0%</td>
<td>0.0%</td>
<td>100.0%</td>
</tr>
<tr>
<td>10-10</td>
<td>0</td>
<td>0</td>
<td>0</td>
<td>100</td>
<td>0</td>
<td>0</td>
<td>2</td>
</tr>
<tr>
<td>9-9</td>
<td>33</td>
<td>0</td>
<td>0</td>
<td>67</td>
<td>0</td>
<td>0</td>
<td>3</td>
</tr>
<tr>
<td>8-8</td>
<td>0</td>
<td>0</td>
<td>0</td>
<td>100</td>
<td>0</td>
<td>0</td>
<td>1</td>
</tr>
<tr>
<td>7-7</td>
<td>0</td>
<td>0</td>
<td>33</td>
<td>67</td>
<td>0</td>
<td>0</td>
<td>3</td>
</tr>
<tr>
<td>0-6</td>
<td>0</td>
<td>40</td>
<td>0</td>
<td>60</td>
<td>0</td>
<td>0</td>
<td>5</td>
</tr>
<tr>
<td>MEAN</td>
<td>9.0</td>
<td>6.0</td>
<td>7.0</td>
<td>7.7</td>
<td>7.7</td>
<td>7.5</td>
<td>7.5</td>
</tr>
<tr>
<td>Rpbis</td>
<td>0.25</td>
<td>-0.37</td>
<td>-0.08</td>
<td>0.19</td>
<td>0.19</td>
<td>0.19</td>
<td>0.19</td>
</tr>
</tbody>
</table>

**Correlation between item score & total for person’s who picked D, want this to be high for right answer, low for incorrect answers**

**Average total score for persons who chose this option**

**% of people in total score category on left**
Revisit your questions ...

Old Question

Item #157 Objective 6 Answer Key 3
Plagiarism is:
a: citing a source using correct citation formats
b: citing someone else’s ideas
c: presenting someone’s ideas as your own
d: defaming someone’s character
e: telling a lie about someone

Revision

ITEM ID# 12603 objective: 6 answer 4
Oksana is working on a big research paper for her GHUM class. She consults Wikipedia to get some background on her subject and finds some useful quotes. She copies and pastes them into her paper, but forgets to cite them in her bibliography. Oksana is:
a: Guilty of plagiarism
b: In violation of the JMU Honor Code
c: Simply careless
d: Both A & B

Disposition | Objective | Rationale | Tutorial? | Bloom’s Scale
--- | --- | --- | --- | ---
Toss/too easy | 6 | information ethics | yes | Information/define
Assessment Paradigm

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4/26/13
ARLIS/NA Rebecca Feind & Kathy Clarke
<table>
<thead>
<tr>
<th>Objective</th>
<th>items</th>
<th>% correct</th>
</tr>
</thead>
<tbody>
<tr>
<td>Determine when information is needed and find it efficiently using a variety of reference sources.</td>
<td>21</td>
<td>70%</td>
</tr>
<tr>
<td>Evaluate the quality of the information.</td>
<td>22</td>
<td>82%</td>
</tr>
<tr>
<td>Use the information effectively for an appropriate purpose.</td>
<td>20</td>
<td>81%</td>
</tr>
<tr>
<td>Employ appropriate technologies to create an information-based product.</td>
<td>25</td>
<td>67%</td>
</tr>
<tr>
<td>Use information ethically and legally.</td>
<td>6</td>
<td>80%</td>
</tr>
</tbody>
</table>

*General Education Report to SCHEV, August 2012*
Revised, Objective 6 Outcomes

What do we need students to know or do?

<table>
<thead>
<tr>
<th>The learner identifies citations in a journal article</th>
<th>in order to</th>
<th>distinguish between attributed ideas and original ideas.</th>
</tr>
</thead>
<tbody>
<tr>
<td>The learner summarizes the basic elements required for attributing</td>
<td>in order to</td>
<td>Give credit for ideas and creations where it is due.</td>
</tr>
<tr>
<td>The learner identifies potential copyright violations from scenarios</td>
<td>in order to</td>
<td>comply with copyright law.</td>
</tr>
<tr>
<td>The learner explains the purpose of logging in with a password to some sites</td>
<td>in order to</td>
<td>Understand privacy concerns in the modern information universe.</td>
</tr>
<tr>
<td>The learner gives attribution to the creators of images</td>
<td>in order to</td>
<td>Use images according to fair use guidelines. (7.2.b)</td>
</tr>
</tbody>
</table>
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Writing/Borrowing Objectives

• What proficiencies are of interest on your campus/in your department?
• What standards for disciplines already exist
• Is there an accrediting body that is asking for specific types of assessment?
Modifying

From.....

• “The information literate student access needed information effectively and efficiently” ACRL Standard 2
  – The information literate student retrieves information online or in person using a variety of methods ACRL Standard 2/Performance Indicator 3

To....

• Find a specific article in print or electronically (ARLIS)

• Students choose and develop topics relevant to the course
Your Objectives

• Get a better idea of how to assess students' use of our libraries resources
• Improve on existing tools
• Learning to write objectives

• No wish to reinvent the wheel
• Guidelines and procedures I can implement locally.
• Get some objectives or learning outcomes. Learning to write objectives
Practice

Pick one objective from the ARLIS Basic Skills section that you want to create questions around and write the objective on one of the large index cards.