



**A Faculty Member, an Instructional Designer,
and a Librarian Walk into a Bar**

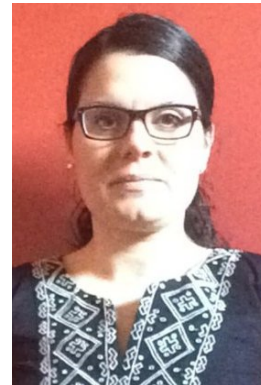
Conversation over the Best Practices for Designing and Delivering Distance Learning Curricula



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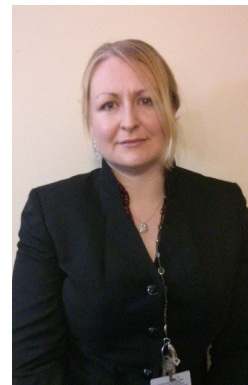
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Outline

- ▶ Paradigm shift in curriculum design and delivery
- ▶ Shared perspectives
 - ▶ Lessons learned and best practices from two graduate courses
 - ▶ Instructor
 - ▶ Instructional designer
 - ▶ Librarian
- ▶ Future plans and directions
 - ▶ Course content
 - ▶ Textbook
 - ▶ Learning assessment

Paradigm shift

- ▶ New generation of adult learners
 - ▶ Military
 - ▶ Working professionals
 - ▶ Continuing education
- ▶ Competition for this pool of applicants within academic institutions
 - ▶ Top to lower tier universities
 - ▶ Community and technical colleges
 - ▶ Private 'online' universities
- ▶ Distance learning platform and student options
 - ▶ Scheduling flexibility
 - ▶ Geographic convenience

Lessons from the classroom

- ▶ Two graduate courses in the MPH program
 - ▶ Healthcare financial management (MPHM 7104)
 - ▶ Quantitative methods in health (MPHM 8280) (a.k.a. research methods)
- ▶ Similar students
- ▶ Methodologically different approaches due to ...
 - ▶ ... complexity of topical content
 - ▶ ... learning dimensions
 - ▶ ... availability of resources
 - ▶ ... novel course-subject for public health discipline

Lessons from the classroom (cont.)

Healthcare Financial Mgmt

- ▶ (single) Textbook driven
- ▶ Streamlined content
- ▶ Self-directed learning
- ▶ Completely online
 - ▶ Desire2Learn
- ▶ Learning assessment
 - ▶ Problem sets (x13)
 - ▶ Exams (x3)
 - ▶ Case study (x1)

Research Methods

- ▶ Absence of (single) textbook
- ▶ Multi-dimensional content
- ▶ Major interaction with instructor
- ▶ Online + weekly live sessions
 - ▶ WebEx
- ▶ Learning assessment
 - ▶ Problem sets (x6)
 - ▶ Software coding
 - ▶ Research paper

MPHM 7104 – Module Screenshot

Search Topics

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Module 7 Activities

5

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2

Module 1 Activities

Print

Settings

Published

Add dates and restrictions...

Introduction to Health Care Accounting and Financial Management

Introduction to Electronic Spreadsheets

Reading:

Chapters 1 and 2 of your text.

Assignment:

will be released on Monday of each week.

New

Add Existing Activities

Bulk Edit

Chapter 1 PowerPoint Slides

Module 1 Assignment

Due Aug 25, 2014 11:59 PM

Starts Aug 18, 2014 1:00 PM

Ends Dec 13, 2015 1:00 PM

Read Chapters 1 and 2 of your text.

Answer questions 1 - 8, chapter 1.

Answer questions 1 - 5, chapter 2.

Compose your answers in a Word document. When you are finished, upload your document using the dropbox function.

For Chapter 2 questions 6 - 9, follow the instructions on page 23 of your textbook for each question. These small exercises are to familiarize you with Excel; you do not need to turn anything in to me. Just insure that you are comfortable using basic Excel spreadsheet functionality.

Module 1 Assignment Answer Key

6

MPHM 8280 – Module Screenshot

Search Topics

Q

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Course Information 7

Week 1: Aug 18-24

Week 2: Aug 15-31

Week 3: Sep 1-7

Week 4: Sep 8-14

Week 5: Sep 15-21

Week 6: Sep 22-28

Week 4: Sep 8-14

Print Settings

Published

Add dates and restrictions...

Learning Objective

- Descriptive Analysis (*continued*)
- Linear Regression (*continued*)
- Interaction and qualitative variables in linear regression

Reading

- Course Textbook
 - Chapter 2
 - Chapter 3
- Juul, Chapter 12, Categorical Predictors
- Hill, Chapter 7, Using Indicator Variables
- Stata Manual
 - [R] pp. 1845-1923 (*regress*)
 - [R] pp. 1645-1655 (*predict*)
estimation.
 - [U] pp. 141-145 (Functions and
 - [U] pp. 351-364 (Working with
 - [G] pp. 3-40 (intro to Stata gra
 - [G] pp. 173-179 (twoway graph
 - [G] pp. 330-350 (twoway scatt

Assignments (due this week)

- Research Project: Deliverable 1 (submit via Dropbox)


Lecture Materials


- Power Point (week 4, pdf)
- Week 4 WebEx Recording
- Stata data files to be used in class
 - rostab11.dta
 - framingham.dta
- Week4.do (Stata do file for Week 4)


Stata Resources


- Websites**
 - User-written resources (website with multiple links)
 - A Brief Introduction to Stata with 50+ Basic Commands (PDF). A 32-page introduction to Stata by Tobias Pfaff, Institute for Economic Education, University of Münster, Germany.
 - Introduction to Stata (PDF). A 67-page description of Stata, its key features and benefits, and other useful information by Christopher F. Baum, Boston College, USA.
 - An Introduction to Stata (PDF). An introduction to Stata and various commands by IT Support at the LSE Research Laboratory, UK.
- Videos**
 - Pearson's correlation coefficient in Stata (Stata YouTube, 4:16)
 - Simple linear regression in Stata (Stata YouTube, 5:15)
 - includes graphing regression line
 - One-way ANOVA in Stata (Stata YouTube, 6:08)
 - Two-way ANOVA in Stata (Stata YouTube, 6:16)


MPHM 8280 – Module Screenshot





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 Print  Settings

✓ *Published* ▾

Add dates and restrictions...

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 - Chapter 3
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- [Hill, Chapter 7, Using Indicator Variables](#)
- Stata Manual
 - [R] pp. 1845-1923 (`regress`) - **this is our main syntax for the week**
 - [R] pp. 1645-1655 (`predict`) - **calculates predictions, residuals, influence statistics, and the like after estimation.**
 - [U] pp. 141-145 (Functions and logical expressions)
 - [U] pp. 351-364 (Working with categorical data and factor variables)
 - [G] pp. 3-40 (intro to Stata graphics with examples)
 - [G] pp. 173-179 (twoway graphs)
 - [G] pp. 330-350 (twoway scatter plots)

MPHM 8280 – Module Screenshot

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- [Research Project: Deliverable 1](#) (submit via Dropbox)

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Research Paper (research methods course)

- ▶ Modular approach to the final paper delivery
 - ▶ Deliverable 1 research topic
 - ▶ Deliverable 2 research question and hypothesis
 - ▶ Deliverable 3 research proposal
 - ▶ Deliverable 4 research paper
 - ▶ Deliverable 5 peer-review


- ▶ Outcome
 - ▶ Balanced student effort throughout the semester
 - ▶ Continuous instructor feedback
 - ▶ Higher quality work

Student opinion on final paper

► n=5 (out of 8)

In your opinion, which would be more beneficial for your learning ...

Developing the research paper component by component throughout the semester	80 %
Developing the research paper and submitting it as a single assignment at the end of the semester	20 %



Student perception about MPHM 8280 (research methods)

What are the strongest features of Dr. Vahe Heboyan's teaching?

- ▶ combination of classroom instruction and assignments.
- ▶ detailed Powerpoint
- ▶ Web-Ex ... made very effective on illustrating the content
- ▶ YouTube links
- ▶ help with different Stata commands and functions.
- ▶ handout slides were very helpful.

What could Dr. Vahe Heboyan do better in future courses?

- ▶ pace of the course
- ▶ different textbook
- ▶ readings on the website were overwhelming



Student perception about MPHM 7104 (healthcare financial management)

What are the strongest features of Dr. Vahe Heboyan's teaching?

- ▶ Assignments matched up with textbook and course resources.
- ▶ organization and response time
- ▶ He is very knowledgeable and takes the time to provide individual feedback
- ▶ His experience

What could Dr. Vahe Heboyan do better in future courses?

- ▶ Live sessions (I always prefer the option of classroom teaching)
- ▶ more examples to further assist students
- ▶ Video lectures or audio lectures over the slides
- ▶ In-classroom teaching option

Moving forward ...

▶ **Course content**

- ▶ Revised topical content

▶ **Textbook**

- ▶ Smaller number of reading sources
- ▶ More targeted learning
- ▶ Stand-alone course pack

▶ **Learning assessment**

- ▶ Problem sets : more frequent and shorter
- ▶ Quiz : weekly short quiz (10-15 questions)
- ▶ Research paper : manuscript grade product

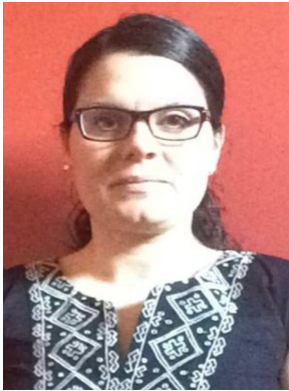
Instructional Design

Georgianna Laws, MEd



Instructional designers collaborate with faculty members to produce effective, efficient, and engaging learning experiences while continuously improving the quality of course designs to meet or exceed nationally recognized standards.

What Instructional Designers Do	Why
Establish the <i>performance gap</i> (be it in skills, knowledge, etc.)	<ul style="list-style-type: none"> to determine exactly what the students need to learn (or unlearn) before being able to perform as needed in an academic and/or clinical setting to create instructional content, assignments, assessments, and interactions that provide no more and no less than what the students need.
Write measurable <i>learning outcomes</i>	<ul style="list-style-type: none"> to inform students what they will be able to do (and how well) by the end of each module and upon completion of assignments, assessments, and interactions.
Develop authentic and contextualized <i>assignments, assessments, interactions, and the grading criteria thereof</i>	<ul style="list-style-type: none"> to give students the opportunity to apply their skills and knowledge to increasingly more difficult, real-world problems encountered in specific contexts to meet the learning outcomes.
Create <i>instructional content and supporting multimedia elements</i> *with assistance from our talented developers	<ul style="list-style-type: none"> to help students learn (or unlearn) everything required for them to be able to successfully complete the assignments, assessments, and interactions to ensure the longest possible shelf life of the course.
Select <i>instructional technologies</i> *with assistance from our talented technologists	<ul style="list-style-type: none"> to meet instructional needs with the most appropriate technologies to reach a balance between the need to maximize the student's learning experience and the need to minimize the time required of the faculty member.
Make the course <i>accessible</i>	<ul style="list-style-type: none"> to ensure that any student can take the course.
Write the <i>course syllabus</i>	<ul style="list-style-type: none"> to inform students of course components to make the students aware of applicable faculty, college, and university policies, procedures, and services.
Create a <i>student orientation</i>	<ul style="list-style-type: none"> to introduce students to the course, how it functions, and what to expect.



What makes quality in DL courses?

Nationally recognized standards of quality in distance learning from the instructor/instructional designer point of view:

- **California State University's** Rubric for Online Instruction (ROI): http://www.csuchico.edu/roi/the_rubric.shtml
- **Quality Matters (QM)** Rubric: <https://www.qmprogram.org/myqm/>
- Etc.

Quality Matters

- **History:** In the spring of 2003, MarylandOnline submitted a proposal to the U.S. Department of Education's Fund for the Improvement of Postsecondary Education (FIPSE) for the creation of a rubric for the design of online courses and a faculty-centered, peer review process for certifying the quality of online courses and of online components.
- Looks at courses holistically, from an instructor's and ID's point of view, through 43 indicators categorized in 8 standards:
 1. course overview/introduction
 2. learning objectives
 3. assessment & measurement
 4. instructional materials
 5. course activities and learner interaction
 6. course technology
 7. learner support
 8. accessibility and usability

+ annotations

The Research Behind Quality Matters



NAVIGATION

- [QM Home](#)
- [MyQM Classroom](#)
- [MyQM Home](#)



The Quality Matters Program Research Library

Welcome to the Quality Matters Program Research Library!

A search of the research literature that bears a relationship to the QM standards can be done in one of two ways:

1. Search by standard by selecting the number of a standard and, if desired, focus the search further by entering a key word.
2. Search by keyword(s). This will result in a list of references from one or more standards.

1. Search Standard

Select Standard:

Standard Keyword(s):

2. Keyword Search:

Types of Interaction in a Course



Student ↔ Content
Interaction



Student ↔ Instructor
Interaction



Student ↔ Student
Interaction

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Active eLearning Student Engagement

MPHM 8280

Research Methods

Week 1: Aug 18-24

Learning Objective

- Course introduction, expectation, and policies
- Introduction to health services research
- Role of statistics and econometrics in health research
- Introduction to Stata

Reading

- Course Textbook, [Chapter 1](#) (*available only for this week until you purchase the text*)
- [Lewis et al, Chapter 1](#) [pdf]
- [Ozcan, Chapter 1](#) [pdf]
- [Broyles, Chapter 1](#) [pdf]

Assignments (due this week)

- Student Survey (MPHM8280)

Lecture Materials

- [Power Point](#) (pdf)
- [Weekly WebEx Session Recording](#)

Stata Resources

- Stata Manual (IG, GS, U) - You can access these after installing Stata.
- [Tour of the Stata 13 Interface](#) (Stata YouTube)
- [Quick Help in Stata](#) (Stata YouTube)
- [PDF documentation in Stata](#) (Stata YouTube)
- Stata Starter Kit

- ▶ **Student – content** (variety of media: readings, Stata manual, PPTs, WebEx live/recorded, Stata resources: how to video, PPTs, data file)
- ▶ **Student – instructor** (feedback, live lectures w/ chat, email communication)
- ▶ Very challenging to add **student – student**; we're still thinking how it can be done

Active eLearning Student Engagement

- ▶ Asynchronous discussions
- ▶ Synchronous discussions
- ▶ Social learning
- ▶ Blogs
- ▶ Wikis
- ▶ Journals
- ▶ Group work

WebEx | Research Methods (8280)

► n=5 (out of 8)

How satisfied were you with the WebEx lectures?	Strongly disagree	Disagree	Agree	Strongly agree	Did not view
The lectures helped me learn the course material	0 %	0 %	40 %	60 %	0 %
The live lectures were beneficial to me	0 %	0 %	20 %	60 %	20 %
The recorded lectures were beneficial to me	0 %	0 %	60 %	40 %	0 %
Having the option of viewing the lecture either live and/or recorded was helpful to me	0 %	0 %	40 %	60 %	0 %

WebEx | Health Financial Mgmt (7104)

▶ Do you think that weekly, live, web-based discussion sessions might be helpful?

- ▶ Yes 29 %
- ▶ Maybe 71 %
- ▶ No 0 %

▶ Please indicate the most desired content for these live, online sessions:

- ▶ Weekly topic overview/summary lecture 57%
- ▶ Assistance with assignments 29%
- ▶ Exam review 14%
- ▶ Other - please specify 0%



WebEx | Research Methods (8280)

- ▶ **How significantly did the WebEx sessions contribute to your learning?**
 - ▶ Very 100 %
 - ▶ Somewhat 0%
 - ▶ Not at all 0 %

- ▶ **Could you have succeeded if no WebEx sessions were offered?**
 - ▶ Yes 0 %
 - ▶ No 40 %
 - ▶ Maybe 60 %

- ▶ **Was one WebEx session a week enough?**
 - ▶ Too often 0 %
 - ▶ About right 100 %
 - ▶ Not often enough 0 %

WebEx | Research Methods (8280)

- ▶ **Approximately how many live sessions did you attend out of the 15 that were offered?**
 - ▶ None 40 %
 - ▶ 1-3 0 %
 - ▶ 4-6 0 %
 - ▶ 7-9 0 %
 - ▶ 10-12 40 %
 - ▶ 13-15 20 %

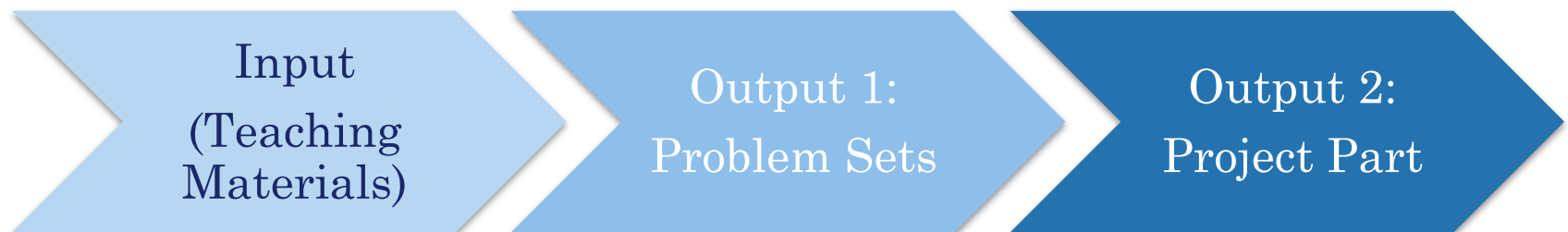
- ▶ **Approximately how many recorded sessions did you view out of the 15 that were offered?**
 - ▶ None 0 %
 - ▶ 1-3 0 %
 - ▶ 4-6 60 %
 - ▶ 7-9 20 %
 - ▶ 10-12 0 %
 - ▶ 13-15 20 %

eLearning Design Challenges & Solutions

Required, Sequential Completion of Learning Activities

Challenge

Dr. Heboyan consulted me on how to nudge online students to complete all course activities (e.g., student watched 3 in 16 WebEx presentations)



eLearning Design Challenges & Solutions

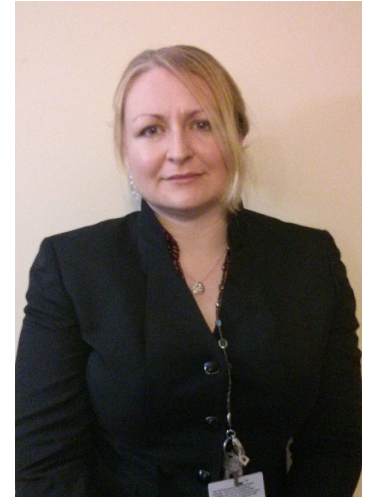
Required, Sequential Completion of Learning Activities

Solution

Create an assignment between the presentation and the assessment

- ▶ to give the students the opportunity to use/apply the info from the presentation and measure their learning gain
- ▶ If students do not complete the assignment, they cannot get to the assessment.





A Word from the Librarian...

Maryska Connolly-Brown, MLIS, MAT

The Access Entitlement Principle

Every student...is entitled to the library services and resources of that institution...regardless of where enrolled or where located in affiliation with the institution.

-Association of College and Research Libraries Guidelines for Distance Learning

The Problem

- ▶ Suitable all-inclusive textbooks were not available for the MPHM 8280 course
- ▶ The grey area of Fair Use
 - ▶ All four principals must apply ([see USG checklist](#))
 - ▶ Many of the items on the checklist are subjective
 - ▶ Additional complications for online resources
 - ▶ Material that was needed was often newer
 - ▶ Material might be needed in multiple classes



Exceptions

- ▶ Works created prior to 1923
- ▶ Library resources already covered by a site license
- ▶ Articles resulting from NIH grant funding
- ▶ Open access materials
- ▶ Materials distributed with caveats that allow for nonprofit educational use.



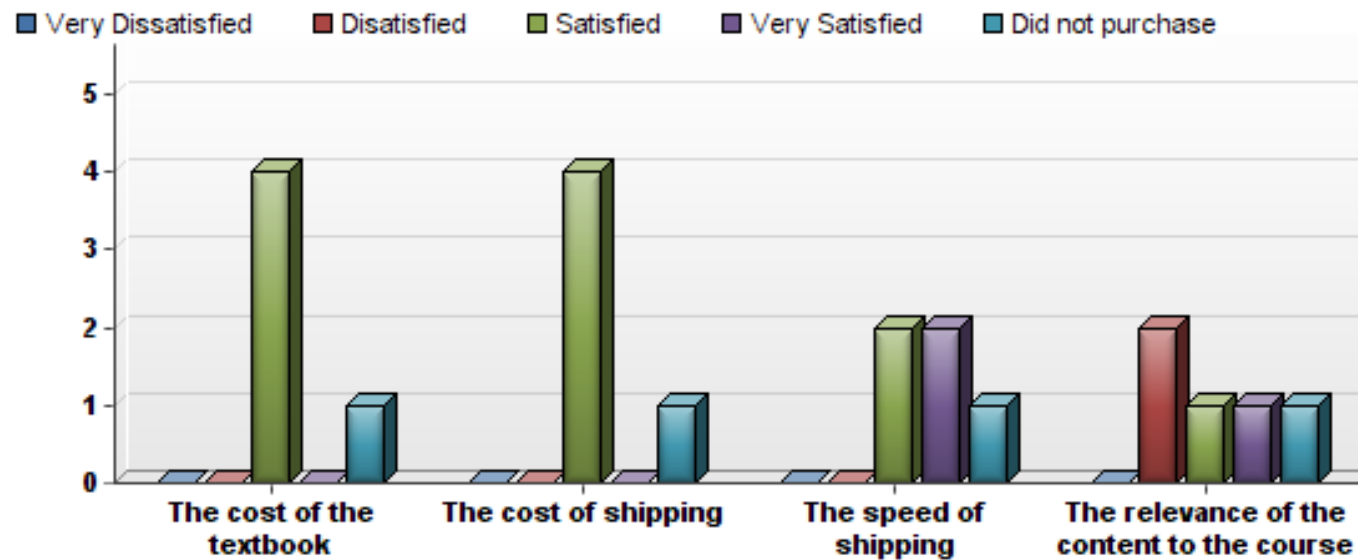
The Solution

- ▶ The librarian and the instructional designer completed online copyright course jointly offered through Duke and Emory Universities
- ▶ Instructor identified appropriate material
 - ▶ Journal articles
 - ▶ Online resources
 - ▶ Book chapters
- ▶ Material under consideration was carefully and individually examined for potential Fair Use
- ▶ A copyright clearing house company was identified and contacted
- ▶ A course pack was constructed
- ▶ Textbook Transformation grant applied for through Affordable Learning Georgia (not awarded this year)



Student Feedback

MPHM 8280: Research Methods



Future Directions and Best Practices

- ▶ Course pack
 - ▶ Convenient delivery (electronic or print)
 - ▶ Eliminates Fair Use “gray area”
 - ▶ Cost-effective
 - ▶ Content aligns with learning objectives
 - ▶ Start early!

- ▶ Open access (OA)/ Open Educational Resources (OER)
 - ▶ Freely available
 - ▶ Many peer reviewed/scholarly
 - ▶ OpenStaxCollege.org

- ▶ Collaborate with the library early and often
 - ▶ Find alternative resources
 - ▶ Identify materials in the library or through interlibrary loans
 - ▶ Assess copyright and fair use
 - ▶ Evaluate and accommodate the library instruction needs of the class



Questions? Comments? Suggestions?





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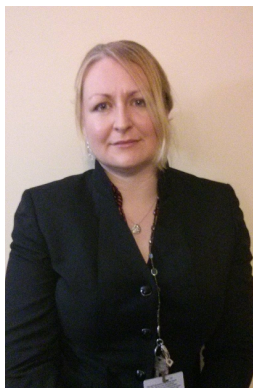


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www.gru.edu

Select References

- ▶ Association of College and Research Libraries. (2008, July 1). Standards for distance learning library services. Retrieved from <http://www.ala.org/acrl/standards/guidelinesdistancelearning>
- ▶ University System of Georgia. (2012, June 14). Fair use checklist. Retrieved from http://www.usg.edu/copyright/fair_use_checklist