

Information Literacy for the Workplace

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AGENDA

- ❖ Introduction
 - ❖ Workplace Literacy
 - ❖ The Other Literacies
 - ❖ Workplace Information Literacy
 - ❖ Research possibilities
- 

Introduction

Paul Zurkowski - 1974

“People trained in the application of information resources to their work can be called *information literates*. They have learned techniques and skills for utilizing the wide range of information tools as well as primary sources in molding information solutions to their problems.”

US National Commission on Libraries and Information Science



What work?

Zurkowski was thinking of information intensive fields:

- Chemistry
- Engineering – especially aerospace
- Medicine

Now called STEM – Science, Technology, Engineering, Medicine – disciplines (or fields)

Consuming Information



Three colleagues in a laboratory.

Why those?

Early index and abstract databases were primarily in those fields. Examples:

- Chemical Abstracts
- Medline
- Inspec



University of Michigan. (2015, August 20). Apple Lisas at University of Michigan [1983

1989 – ALA Definition

Information literacy is a set of abilities requiring individuals to "recognize when information is needed and have the ability to locate, evaluate, and use effectively the needed information."

2000 – ACRL Competency Standards

Now the Framework

Note! – The community and technical colleges in the U.S. are not sold on the framework.

Workplace Literacy



Young woman at spinning machine in cotton mill. Mollahan Mills, Newberry, South Carolina, 1908

Industrial Concerns

- ❑ Basic literacy (the ability to read and write in the language used on the job)
- ❑ Basic numeracy (ability to do simple mathematics)

With these a worker could perform well in the workplace and move to others easily.



**Order Entry Department, Sears, Roebuck & Co., Chicago, IL, c. 1913. [Workers are using Oliver typewriters.].
(n.d.).**

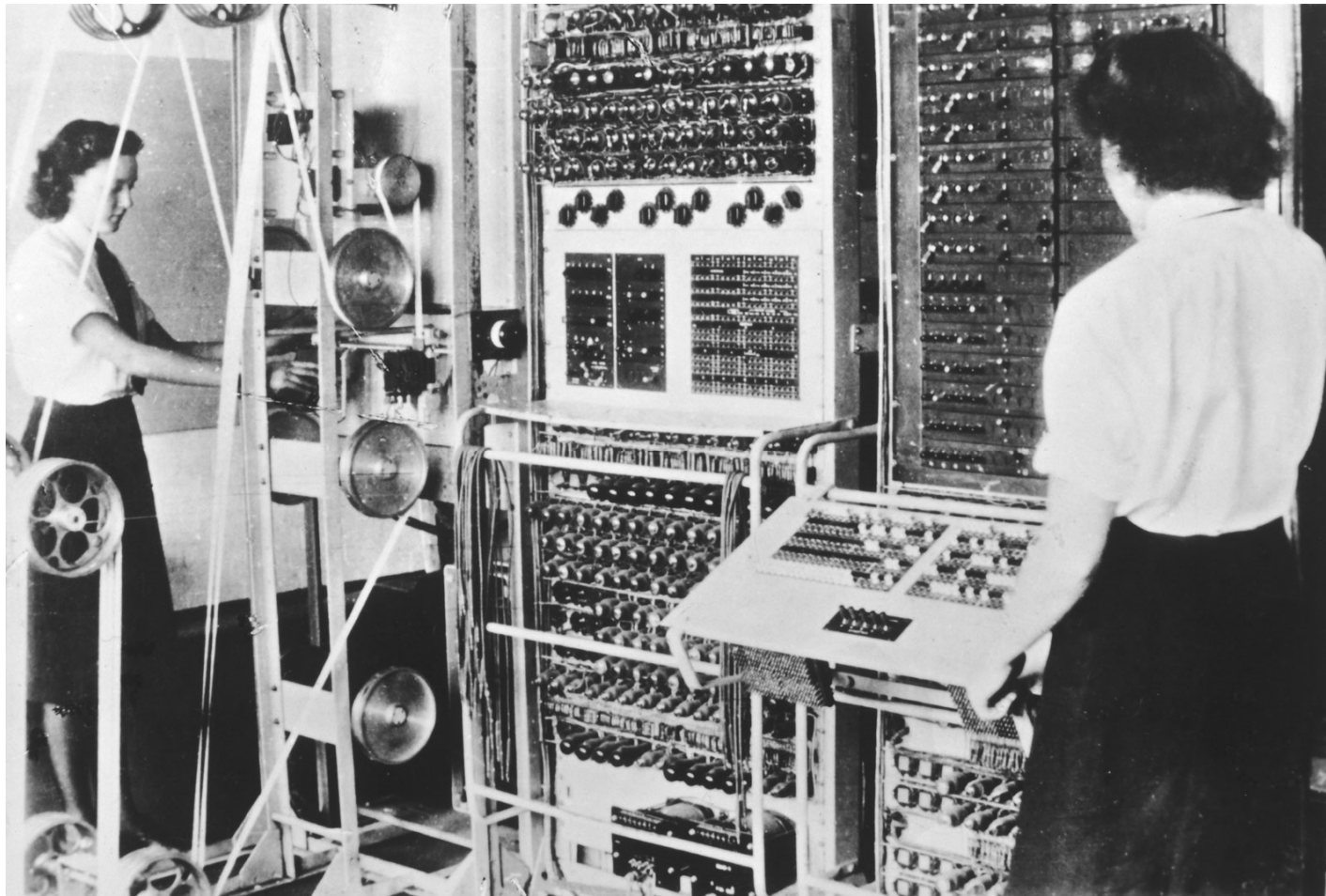


Ladd & Son. (n.d.). Office of Giant Clothes Store, Muskegon, MI [There is a Comptometer Model A calculating machine (sold 1904-06) in front of the woman on the left. The man behind her is working on a Burroughs Class 1 Adding Machine.]

Information Was Limited

Literacy and numeracy allowed workers to follow directions.

The creation of new knowledge was not a goal.



Codebreaking Machine Colussus at Bletchley Park [Digital image]. (2012, November 7). Retrieved August 25, 2016, from <http://www.thehistoryblog.com/archives/date/2012/11/07>

Information Availability Changed

More information in all fields.

Information in many formats including audio, visual, and large data sets.

Information is more easily available to more people.



The commercial computer UNIVAC I, designed by John Mauchly and J. Presper Eckert, the inventors of ENIAC [1951]. (2013, June 23).



Vintage Tech [Digital image]. (2010, November 1).

Work is Changing

- 1) College preparation is now required for formerly vocational careers such as nursing, fire science, policing, and aviation.
- 2) There is more participation in post-secondary education.
- 3) The nature of work is fundamentally changing into being more and more information based and distributed.**
- 4) Theories on general knowledge no longer fit.

Paul Stevenson





Factory Workers
[Digital image]. (2014, January 27).



Clinical Biochemistry Lab
[Digital image]. (n.d.).

Workplace Literacy =

INFORMATION LITERACY

OTHER LITERACIES



Peter Stordy - 2015

A taxonomy of the literacies is necessary and notes that researchers like to label their definition of a literacy as new when in reality it is a different label placed on an already known set of skills.

Related Literacy designations

Digital Literacy

Media-Information Literacy

Transliteracy

Metaliteracy

Digital Literacy

Originally - the use of electronic/digital information resources

In education – can students navigate the internet in order to obtain and then manipulate information resources found there?

Media-Information Literacy [MIL]


UNESCO has combined two distinct sets of competencies that were labeled media literacy and information literacy.

Emphasizes the *critical thinking skills* that are necessary to ascertain the authority of a particular communication, no matter how it is presented to the information seeker.

“(MIL) lies at the core of lifelong learning. It empowers people in all walks of life to see, evaluate, use and create information effectively.”

Transliteracies

Defined as the ability to understand and communicate across all of the possible Information Communication Technologies (ICTs). Incorporated into new standards from the American Association of School Librarians (AASL)



Information Literacy =

A (or the) METALITERACY


Workplace Information Literacy

Christine Bruce - 1999

Studied white collar workers in academic fields.

“Seven faces” where information literacy was used in the workplace.

Seven Faces

- 1. Using information technology for awareness and communication**
 2. Finding information from appropriate sources
 3. Executing a process
 - 4. Controlling information – keeping, preserving, and re-finding for another use**
 5. Building up a personal knowledge base in a new area of interest
 6. Working with knowledge and personal perspectives adopted in such a way that novel insights are gained
 7. Using information for the benefit of others
- 

1990s



ICTs have changed

Face 1 – Using technology for awareness and communication.

- Everyone does this, it is as close as the cell phone in your hand.

Face 4 - Controlling information – keeping, preserving, and re-finding for another use.

- Again, almost everyone is taking and preserving photos, videos, audiorecordings in a variety of formats for personal use.
- 

Annemaree Lloyd – Lessons, 2013

1. Information need is measured against the rules, hierarchies, and social dimensions found in the workplace
2. Work is a collective endeavor where intellectual property is shared.
3. Information landscapes and literacy within them are important for workplace learning..

Information landscapes

We must study these in various workplaces in order to communicate these to students.

Project Information Literacy

EMPLOYERS

- In-house unused
- Too quick to find “the answer”

RECENT GRADUATES

- No time to access alternative sources
- Pressure to come up with a solution

Resilient Workers

NEED INFORMATION

Abdi and Bruce -2015

Workplaces have changed

They are....



Team-based



Information and Communication Technologies Dependent



Hybrid Operating Room [Digital image]. (n.d.).

Gig-based or Sharing (short duration contracts)



Research Possibilities

One Company – Two Contexts

interviews that probe the meaning of information literacy in the two countries, the way that information is shared across language barriers, and how information is managed and preserved for the future. It would be especially interesting to study teams that might include professionals with more vocational workers.

“Vocational” Students in two countries

Nursing (a newly information dependent discipline)

Are the same changes in how these professions use information found in both China and in the United States?

What are the implications of similarities?

What are the implications of differences?

What is being done by librarians in the two countries to help students become resilient workers?

Conclusion

Work has changed...



Young woman at spinning machine in cotton mill. Mollahan Mills, Newberry, South Carolina, 1908




Still from the 1960 film 'The Apartment'. [Image of desks with a telephone, rolodex, typewriter and a large electro-mechanical calculating machine]. (2015, July 14).



Jaguar Land Rover. (2016, July 19). 260 new automated robots have been installed at Halewood to support production of the new Land Rover Discovery Sport [Digital image].

Stevenson says...

"In a knowledge economy core workers are expected to be active *lifelong learners* who understand and embrace technological developments and respond *creatively* to the needs of a rapidly changing economy."
[emphasis added]



Lifelong Learning



Are we doing enough
to make this happen?



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Photo Credits

Slide 6. Three colleagues in a laboratory,
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