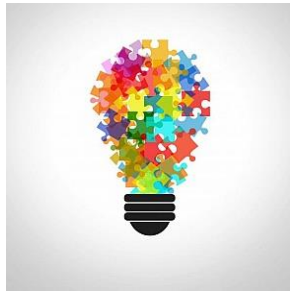


Developing and Improving Data Literacy among Online Faculty through Professional Learning Communities: An Action Research Study



ALARA- BALT Conference

Yedida Bessemer, EdD

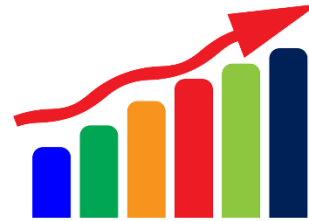
Monday, November 9th 14:00 EAT (Sunday, November 8th 19:00 PST)

Agenda

- ▶ Action Research study overview
- ▶ Data Literacy
- ▶ Professional Learning Community
- ▶ Breakout Rooms Activity
- ▶ Debrief
- ▶ Significance, Impact, Findings, Recommendations, and Conclusions
- ▶ Questions / Comments
- ▶ Thank You and Feedback

Introduction - First Facet

- ▶ Online schools



- ▶ Lack in research

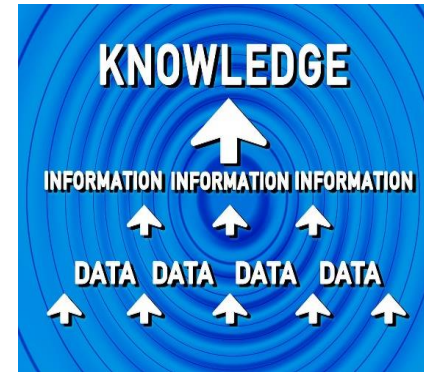
- ▶ Lack in adequate professional development



(LaFrance & Beck, 2014; Richardson, Beck, LaFrance, & McLeod, 2016)

Introduction - Second Facet

▶ A great deal of data



▶ Teachers feel overwhelmed

▶ Lack the knowledge and skills



(Jimerson, 2014; Lai & Hsiao, 2014; Wayman & Jimerson, 2014)

Problem Statement

- ▶ Need for **ongoing Professional Development (PD)** for online educators
- ▶ **Low data literacy** among educators working in an online school



Action Research Paradigm Protocol

Action Research Inquiry

Select each icon below to review the ten steps.



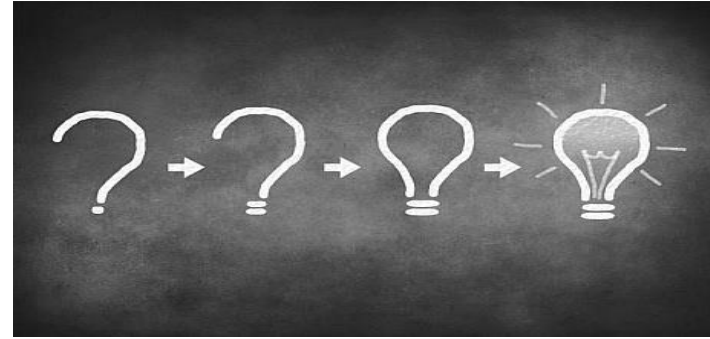
(Figure is taken from LeBlanc, Wilcox, Anderson & Greunke, 2015)

The Action Research Study

- ▶ Implementation of **Professional Learning Community (PLC)** meetings
- ▶ The purpose was to **develop and improve data literacy** knowledge and skills among online educators



Research Questions



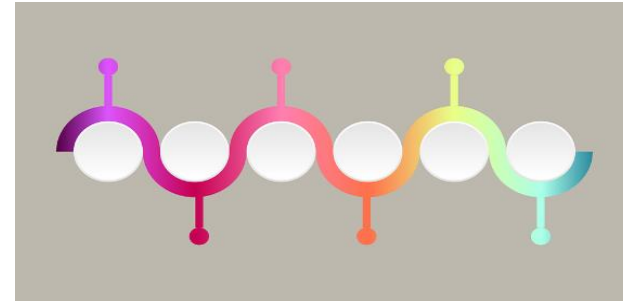
How will participating in a PLC impact the development and improvement of data literacy knowledge and skills among online faculty members?



What are the effects of initiating and implementing a PLC on the educators in an online school?

Data Instruments

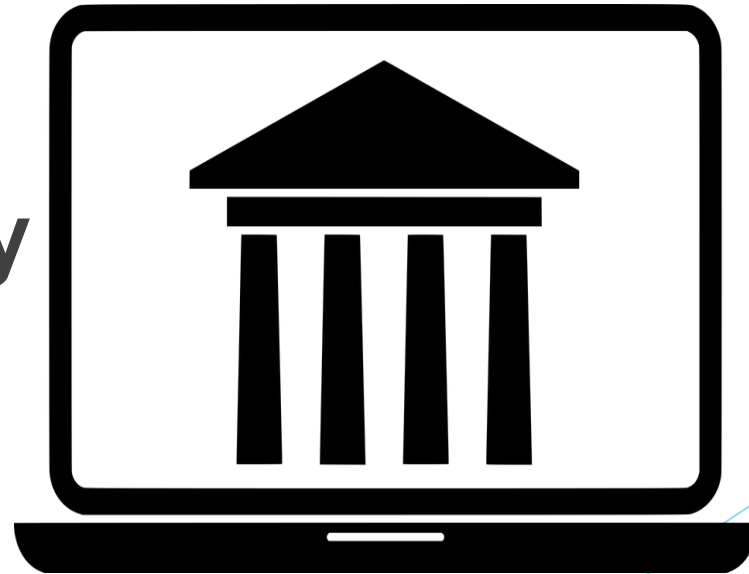
- ▶ Online questionnaires
- ▶ Individual interviews
- ▶ Observation protocol
- ▶ Field notes
- ▶ Researcher's journal



Theoretical Foundation

The theoretical framework was grounded in four interconnected theories.

- ▶ **Action science**
- ▶ **Adult learning theory**
- ▶ **Change theory**
- ▶ **Systems theory**



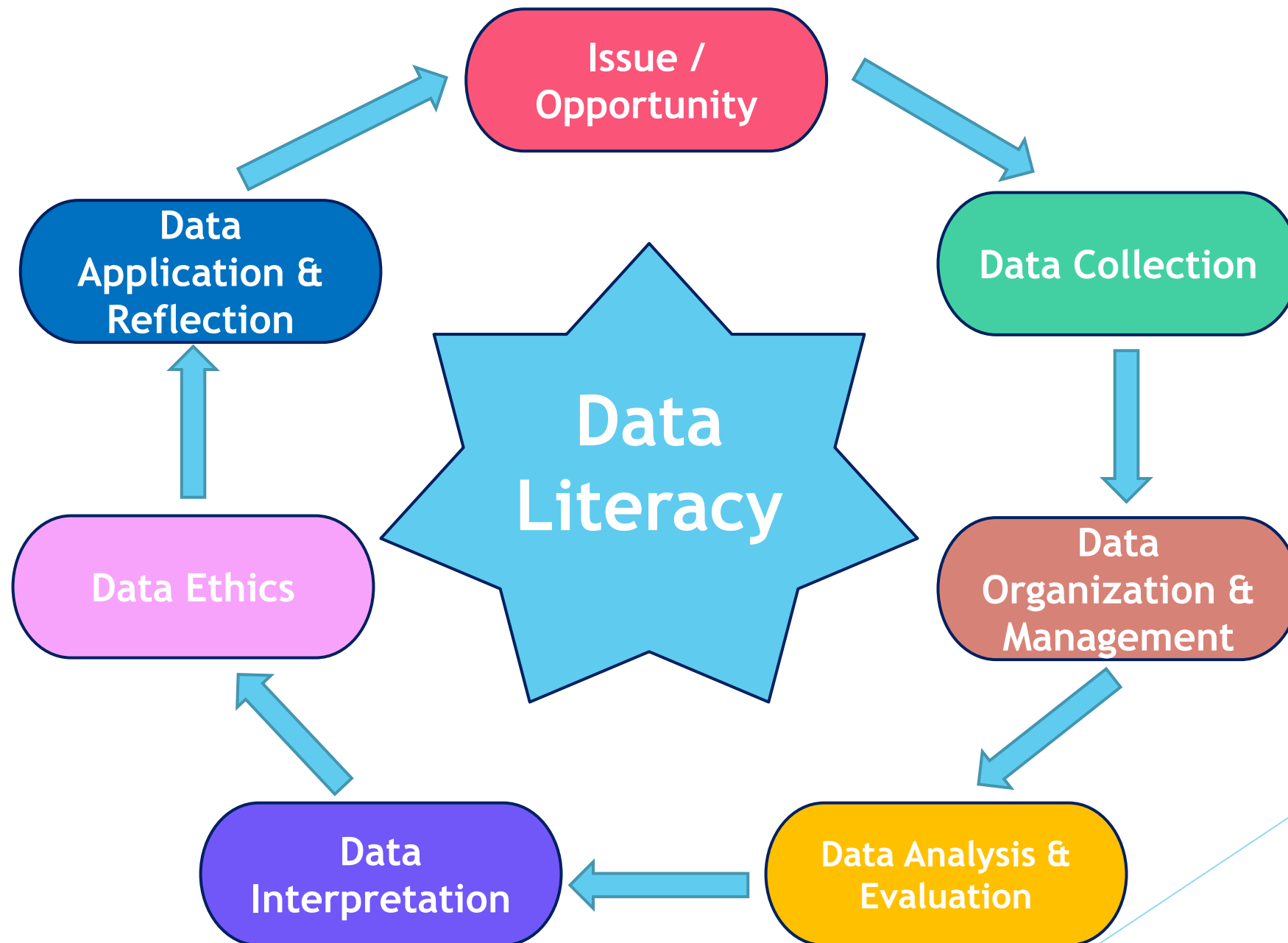
Scholarly Literature

- ✓ Offers additional and important information
 - ✓ Further explains and provides a context for this study
-
- ▶ Professional Development (PD)
 - ▶ Professional Learning Community (PLC)
 - ▶ Data Literacy

Data Literacy



(Evans, B., 2018)



Beliefs and Dispositions towards Data

- ▶ All students can learn
- ▶ Employing data to inform instructional practice
- ▶ Thinking critically and reflecting about teaching
- ▶ Continuous inquiry cycle for improvement
- ▶ Collaboration
- ▶ Use data ethically
- ▶ Communication
 - ▶ How to talk about data?
 - ▶ How to communicate with data?
 - ▶ Different stakeholders → require different strategies

(Mandinach & Gummer, 2016, pp. 57-64)

Professional Learning Community (PLC)

An **ongoing process** in which educators work **collaboratively** in recurring cycles of collective inquiry and **action research** to achieve better **results** for the students they serve.

PLCs operate under the assumption that the key to improved **learning** for students is continuous, job embedded **learning** for educators.

(DuFour, DuFour, Eaker, Many, & Mattos, 2016, p. 10)

Work with SMART Goals

S

M

A

R

T



Specific



Measurable



Attainable



Relevant



Time Based

Breakout Rooms Activity

- ✓ **Three different activities**
- ✓ **Estimated four minutes per activity**
- ✓ **Enjoy them**

Significance and Intended Impact

- ▶ Improve PD by introducing a **PLC process**

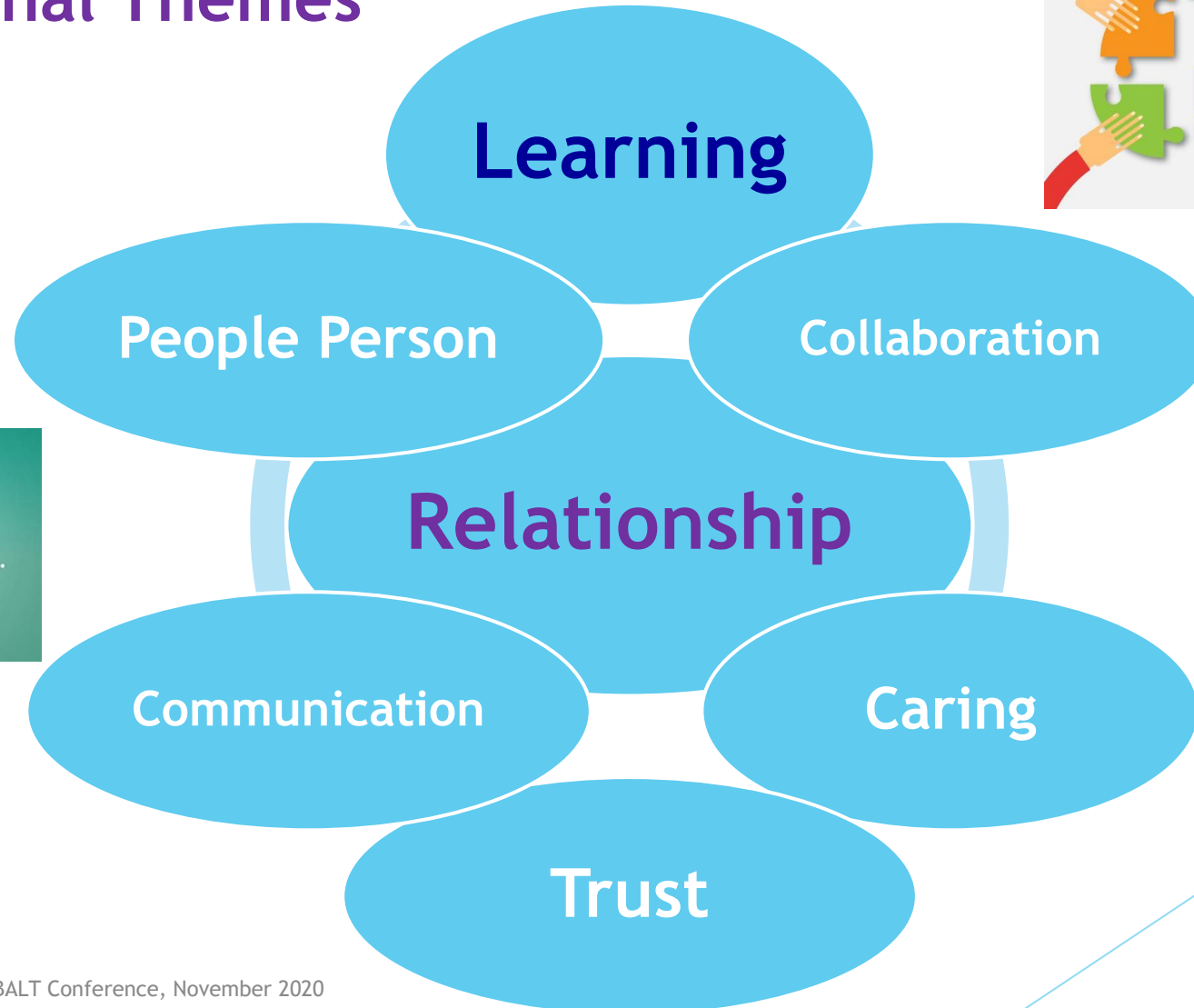


- ▶ Develop and improve **data literacy**

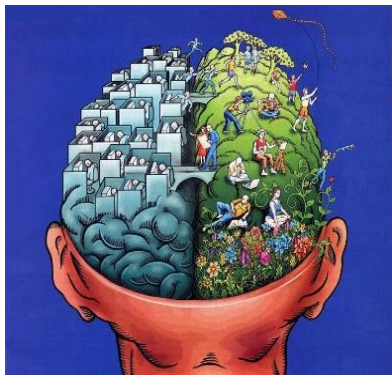


Outcomes and Findings:

Interpersonal Themes



Outcomes and Findings: Intrapersonal Themes





to the Organization

- ▶ Create a comprehensive handbook for online educators
- ▶ Replicate this action research study:
 - Longer time
 - Larger sample
 - With educators from a brick and mortar school
 - Compare between two schools in the district
- ▶ Initiate a PLC process among district administrators

Recommendations - Field of Education

- ▶ Define the core **characteristics of an online educator.**
- ▶ Rethink how to offer **PD for online educators.**
- ▶ Further study the topic of **data literacy** and explore **learning** opportunities.
- ▶ Explore and develop **opportunities for online educators to collaborate.**

Conclusions

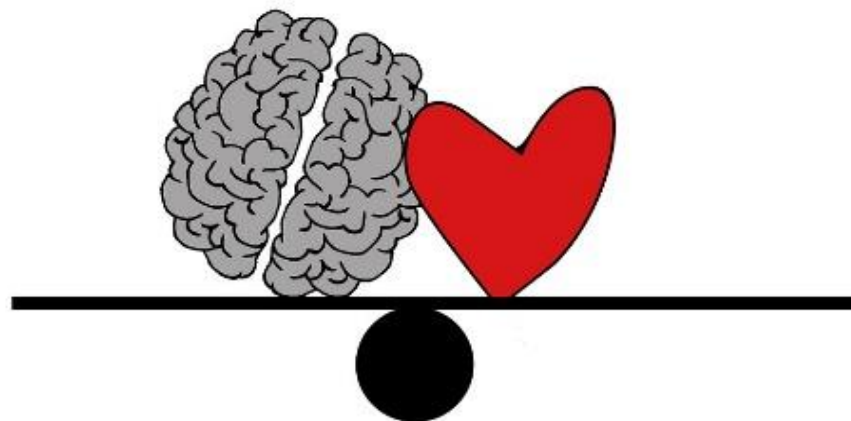
- ▶ Data literacy knowledge and skills acquired helped to improve their practice
- ▶ PLC meetings provided:
 - ✓ A safe space to share experiences
 - ✓ A new PD structure
 - ✓ Cultivate trust
 - ✓ Develop effective communication
 - ✓ Encourage collaboration
 - ✓ Fostering positive relationships with (students, families , and colleagues)



EmergEd Theory

Holistic Relational Approach

The PLC meetings helped the participants to put human relationships in the center of their practice.



Textpeople...

“What we need more than anything else is not textbooks but *textpeople*. It is the personality of the teacher which is the text that the pupils read; the text that they will never forget.”

(Rabbi Abraham Joshua Heschel)

Questions and Comments



References

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- ▶ Wayman, J. C., & Jimerson, J. B. (2014). Teacher needs for data-related professional learning. *Studies in Educational Evaluation*, 42, 25. doi:10.1016/j.stueduc.2013.11.001

Providing Feedback

I will greatly appreciate if you can complete a very short feedback form about this presentation.

<https://forms.gle/fCgRrEYdkUjQYYvM7>

