

Predictors for Students' Understanding of Writing: Instructor Actions and Student Mindset

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2018 Annual Meeting

Demonstrate Understanding

- Exams
- Summarize concepts
- Connect ideas

Personal Growth

- Write to learn
- Improve communication skills
- Genre-specific practice (business reports, lab reports, academic discourse)

Audience-Driven Purpose

- Argue / Persuade
- Inform of research findings
- Inform decisions

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The Instructor

- Ugh.. I'm not doing this for me.
- Appropriate for *demonstrating understanding*

Experts in Field or Similar

- Experts: Academic discourse
- Fellow students: Inform of research findings
- People with similar interests

Authentic Audience

- Tied to purpose: Eg - persuade referendum voters
- Fictional & authentic tied to topic:
Eg - board of directors, K-12 teachers, mental health care providers

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Purposes (Previous Slide)

- 1 Demonstrate Understanding
- 2 Personal Growth
- 3 Audience-Driven

Audiences (Previous Slide)

- 1 Instructor
- 2 Experts in Field
- 3 Authentic

Our Purpose #1: Measure College Student Experiences

- Place and purpose for all the above
- Measure students' perceptions
- Measure coverage of all the above

Our Purpose #2: Explore Determinants for Purposeful Writing

- Student mindset
- Instructor actions
- Student background & demographics
- Academic differences: field-of-study, year-in-school

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Open-Ended Survey Question

Think about the last 3+ page writing assignment you completed.
In one sentence **describe the purpose** for the writing

Categorized Responses Into Ordered Levels

- 1 None / unclear
- 2 Topic or assignment description, instructor-centered
- 3 Writer-centered (personal growth, practice)
- 4 Reader-centered

Student Confidence in Answer

- | | |
|----------------------|--------------------------|
| 4 Highly Confident | 2 Somewhat Not Confident |
| 3 Somewhat Confident | 1 Not at all Confident |

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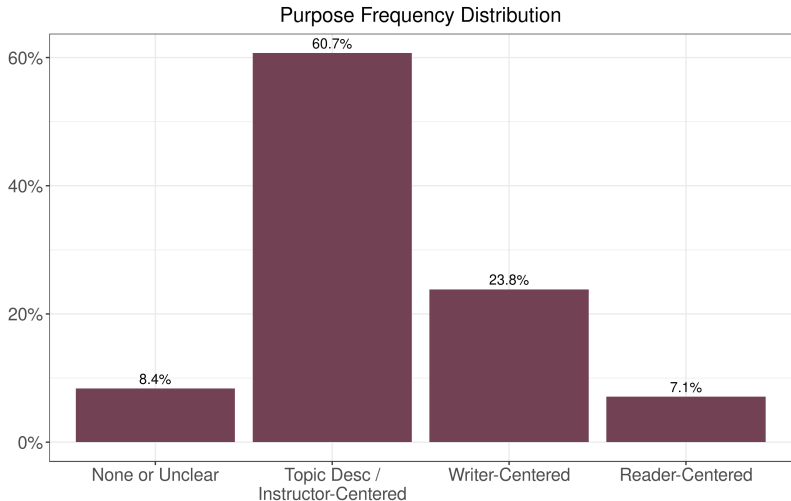
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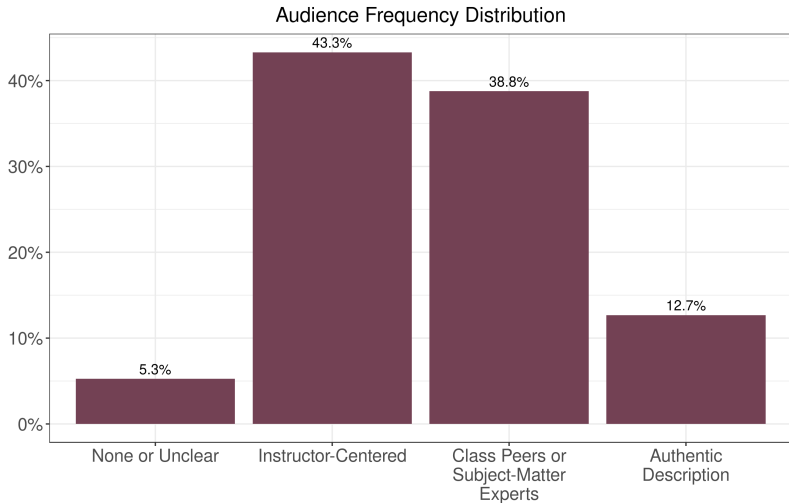
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What is *Mindset*?

An individual's beliefs on learning and intelligence.

Fixed Mindset

- Abilities come naturally to some, not to others
- Prevalent in both low performing and high performing students
- *Simply not true.*
- *Sets people up for failure.*

Growth Mindset

- Intelligence and ability are not predetermined
- Growth in intelligence and ability take work and dedication
- *Conducive to learning and success.*

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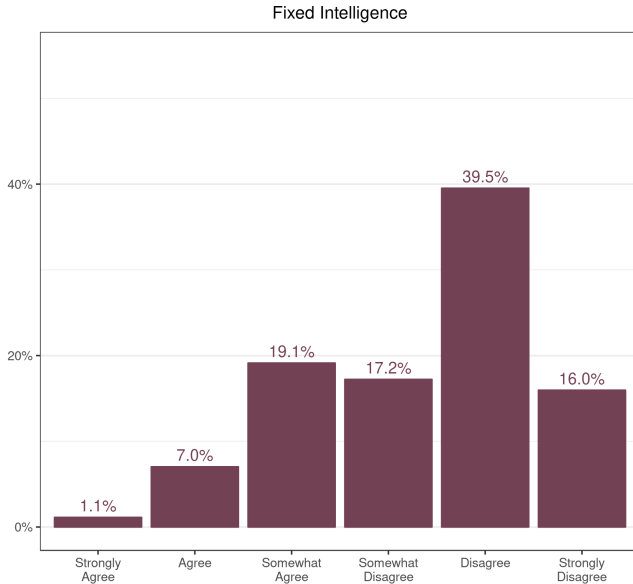
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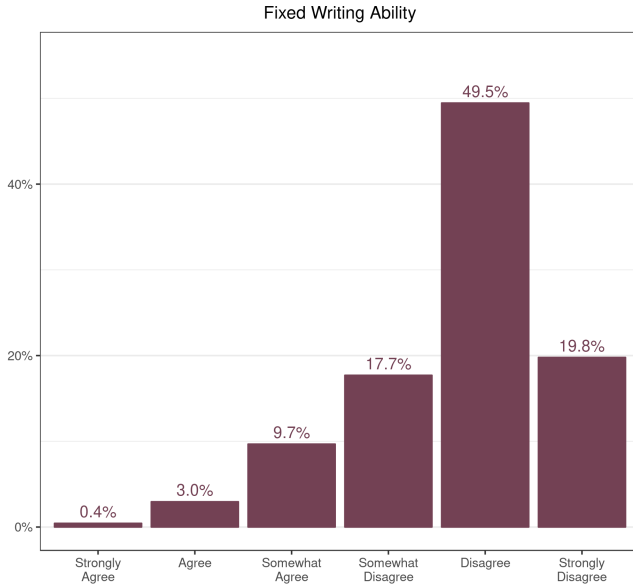
Based on Carolyn Dweck (2006)

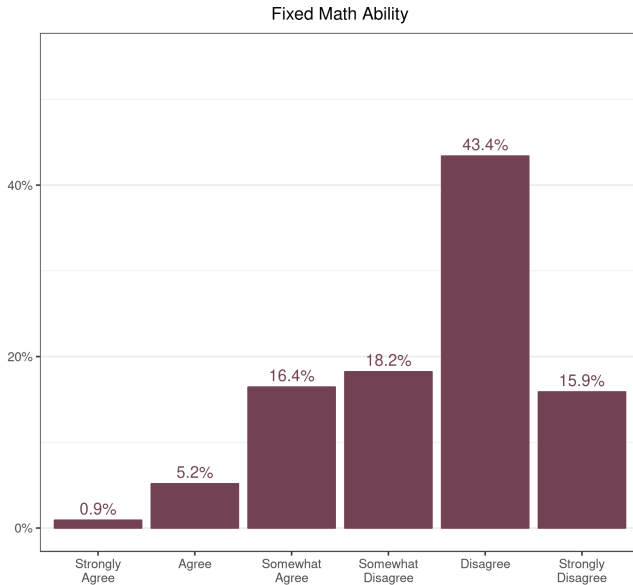
<https://mindsetonline.com/testyourmindset>

Please rate your level of agreement or disagreement with each of the following statements.

	Strongly Disagree	Disagree	Somewhat Disagree	Somewhat Agree	Agree	Strongly Agree
You can learn new things, but you can't really change how smart you are.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
You have a certain amount of math ability and can't do much to change it.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
You have a certain amount of writing ability, and you can't really do much to change it.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

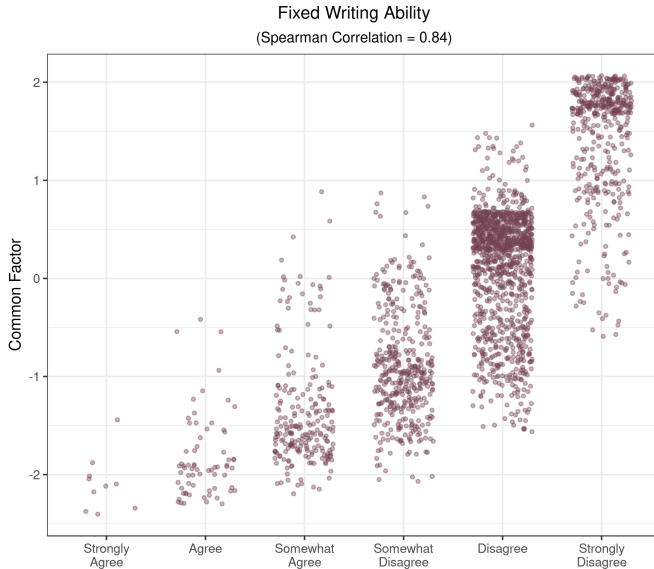






- Three ordinal measures of mindset
- Factor analysis
- Spearman correlation matrix (ranks)







Student Mindset

- **Fixed:** Belief that intelligence is a fixed trait
- **Growth:** Intelligence is developed with work and dedication

Instructor Actions

- Encourage students to use writing center
- Give feedback prior to final draft

Student Demographics / Background

- Gender
- Parents' Education
- Race
- High school performance: ACT Score

Academic Characteristics

- Credits accumulated
- University identifier
- Field of study

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Mindset and Instructor Influences

Variable	Coefficient	P-value
Mindset Common Factor	0.093	0.039**
Instructor Feedback	0.345	0.001***
Writing Center Encouragement	0.215	0.098*

Demographics

Variable	Coefficient	P-value
Female	0.121	0.279
Race: Non-white	-0.420	0.030**
Parent w/ no college education	-0.160	0.302
ACT Score	0.076	0.123

Academics

Variable	Coefficient	P-value
Credits Accumulated	-0.200	0.000***
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Field: Liberal Studies	-0.045	0.757
Field: Science/Health	0.130	0.314
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- Does not progress with progression toward degree
- Business and science fields - Higher order for *audience*

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Ideas from Stanford researchers:
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