

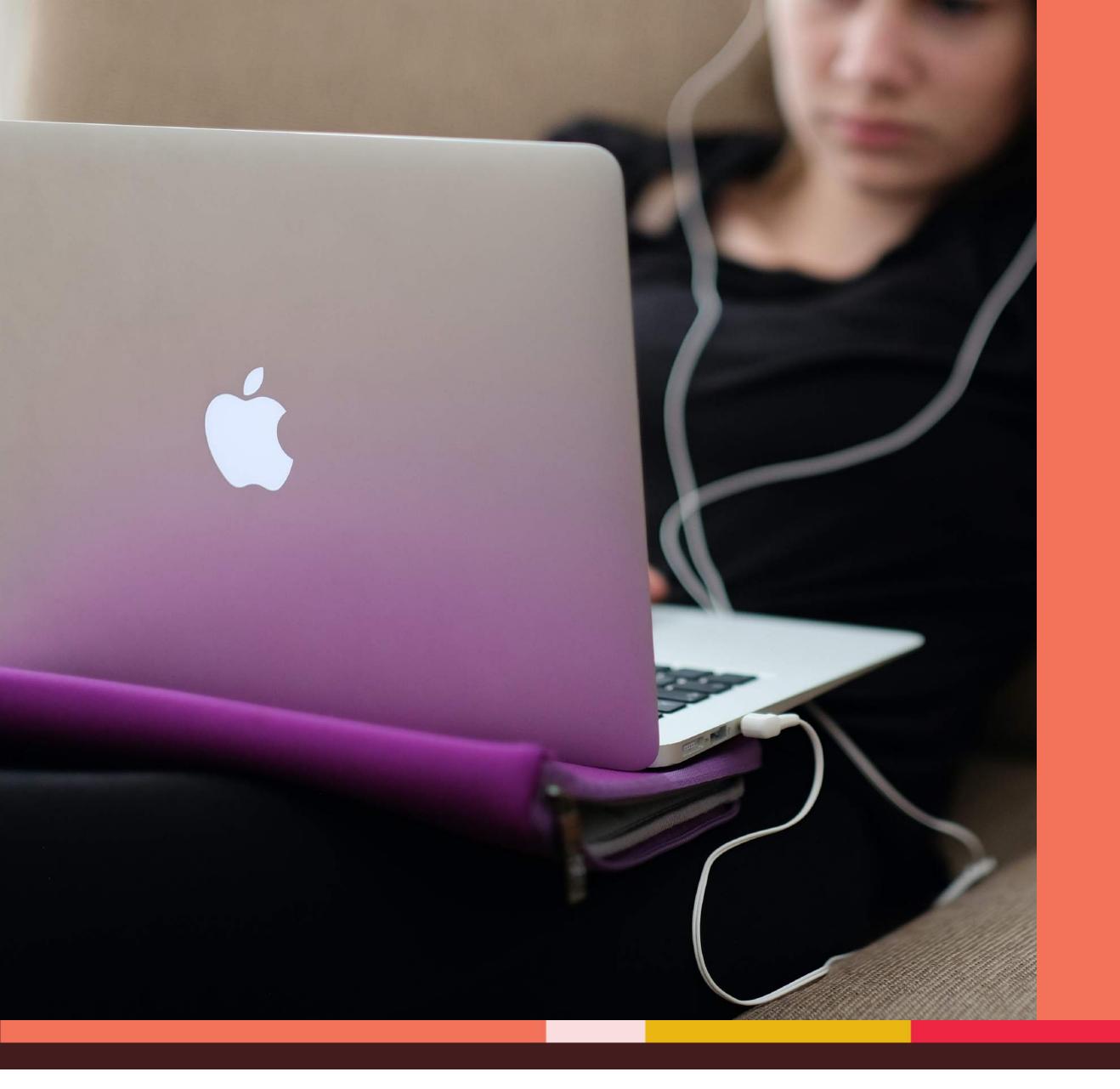
CREATING LEARNING
ENVIRONMENTS TO SUPPORT
STUDENT MOTIVATION
POST-PANDEMIC

Carlton J. Fong, PhD
College of Education
@carlton\_fong





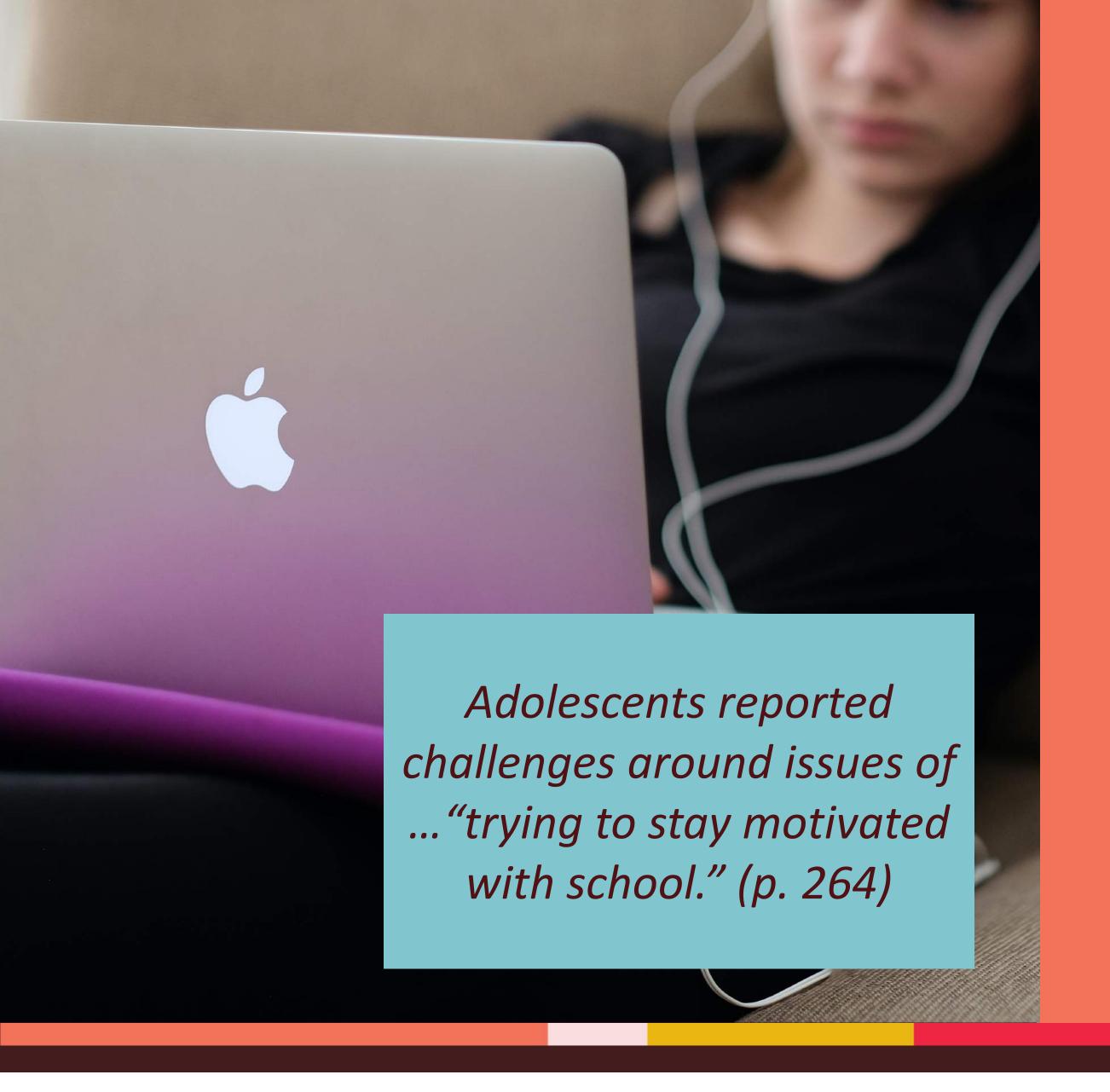
MEMBER THE TEXAS STATE UNIVERSITY SYSTEM



#### CHALLENGES DURING THE PANDEMIC

- Mental and Physical Health
- Social Connection and Community
- Missing Important Events / Routines
- Socioeconomic Issues
- COVID Rules/Contraction
- Technology
- Future Plans
- Academics





#### CHALLENGES DURING THE PANDEMIC

- Mental and Physical Health
- Social Connection and Community
- Missing Important Events / Routines
- Socioeconomic Issues
- COVID Rules/Contraction
- Technology
- Future Plans
- Academics



#### WHY MOTIVATION?

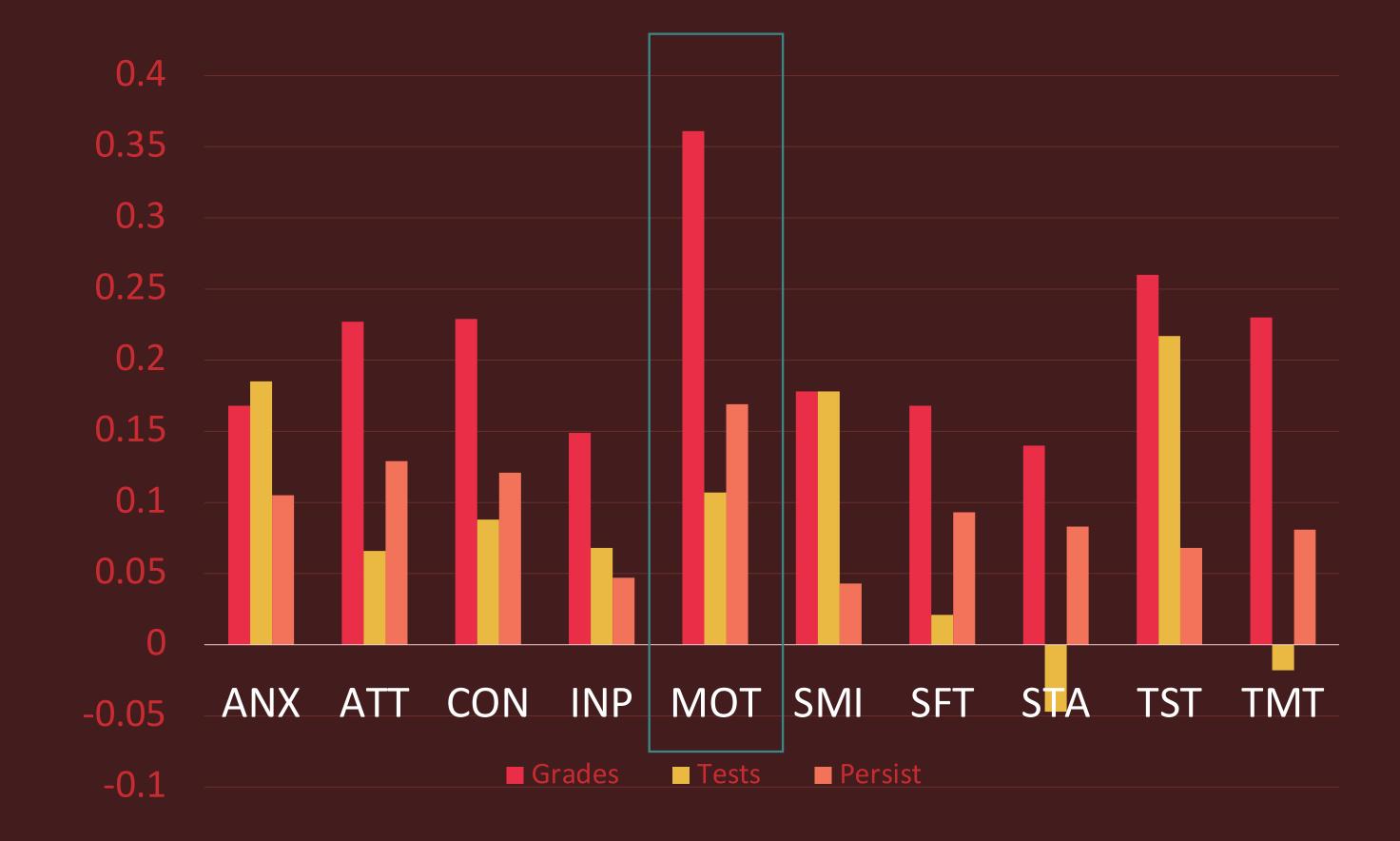
- "the process whereby goaldirected activity is instigated and sustained"
- Powerful determinant for achievement





#### MOTIVATIONAL STRATEGIES

- Meta-analyzing over 150 studies on learning/study strategies
- Motivation strategies had the highest correlations with GPA/grades and persistence





#### WHY MOTIVATION?

- "the process whereby goaldirected activity is instigated and sustained"
- Powerful determinant for achievement
- Not a unitary construct

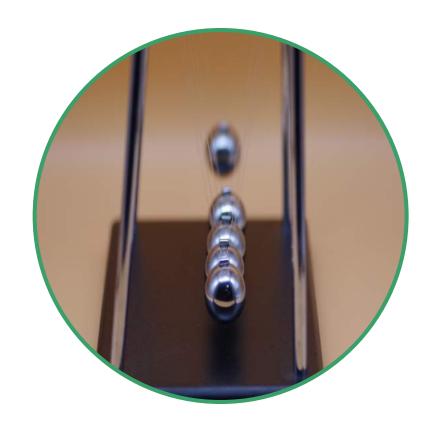




#### OVERVIEW OF MOTIVATION THEORIES



SELF-DETERMINATION THEORY



ATTRIBUTION THEORY



SOCIAL COGNITIVE THEORY



SITUATED EXPECTANCY-VALUE THEORY



GOAL ORIENTATION THEORY

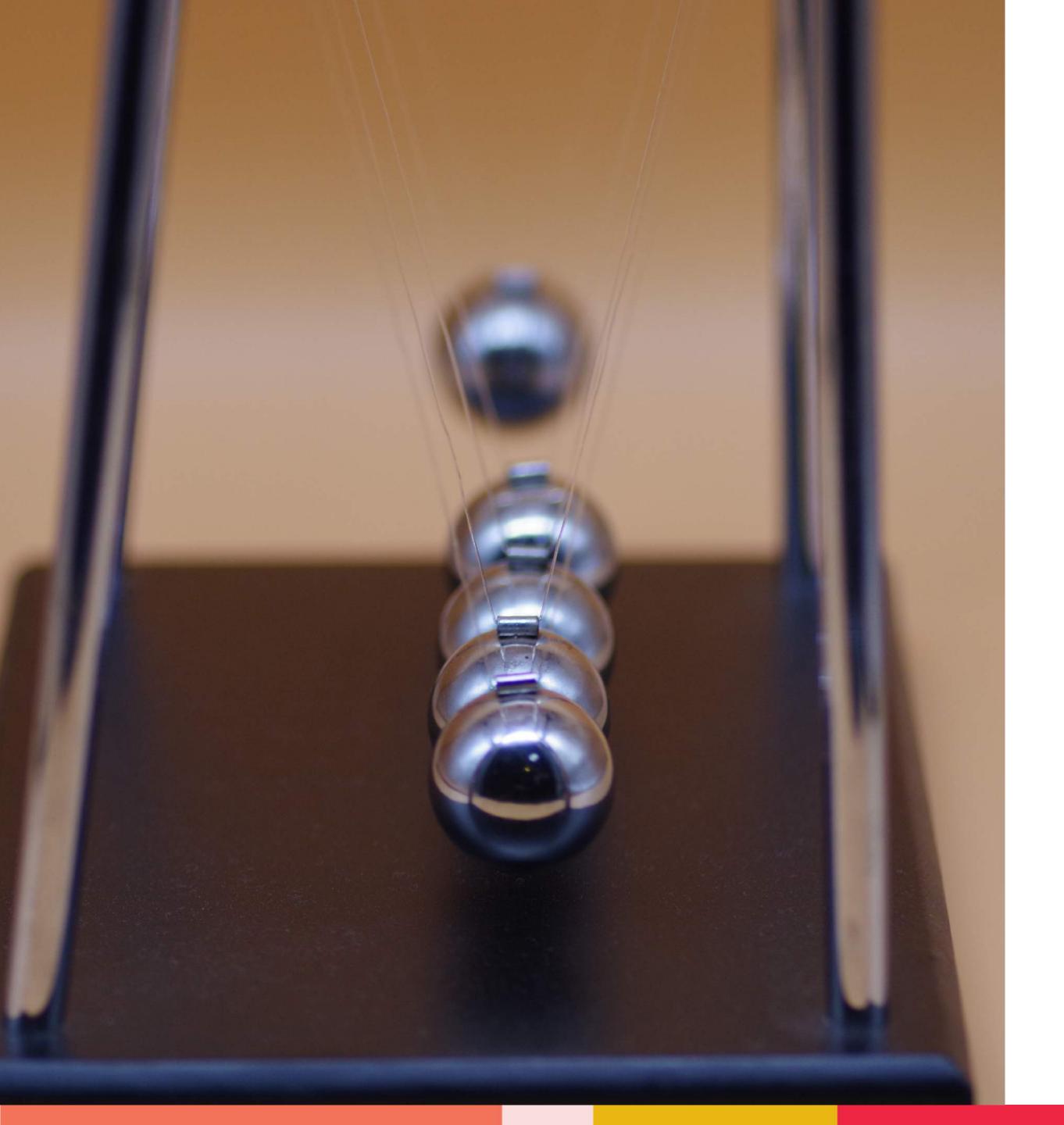




#### SELF-DETERMINATION THEORY

Satisfying or thwarting 3 basic needs

- Competence
- Autonomy
- Relatedness



#### ATTRIBUTION THEORY

#### Identifying causes of success/failure

- Internal vs. external
- Controllable vs. uncontrollable
- Stable vs. unstable



#### SOCIAL-COGNITIVE THEORY

#### Triadic reciprocity among 3 factors

- Environment
- Perceptions -> SELF-EFFICACY
- Behavior

#### Sources of Self-Efficacy

- Mastery Experiences
- Vicarious Experiences
- Social Persuasions
- Affective Experiences



#### SITUATED EXPECTANCY-VALUE THEORY

Achievement choices informed by

- Expectancies
- Task Value: Intrinsic, Attainment, Utility
- Costs



#### GOAL ORIENTATION THEORY

#### Meaning derived from attaining

- Mastery goals
- Performance goals

#### OVERVIEW OF MOTIVATION THEORIES



SELF-DETERMINATION THEORY



ATTRIBUTION THEORY



SOCIAL COGNITIVE THEORY



SITUATED EXPECTANCY-VALUE THEORY



GOAL ORIENTATION THEORY



## COVID-19 SHIFTS IN STUDENTS' WORLDS







SOCIAL



**FUTURE-ORIENTED** 



RACIAL/SOCIOCULTURAL

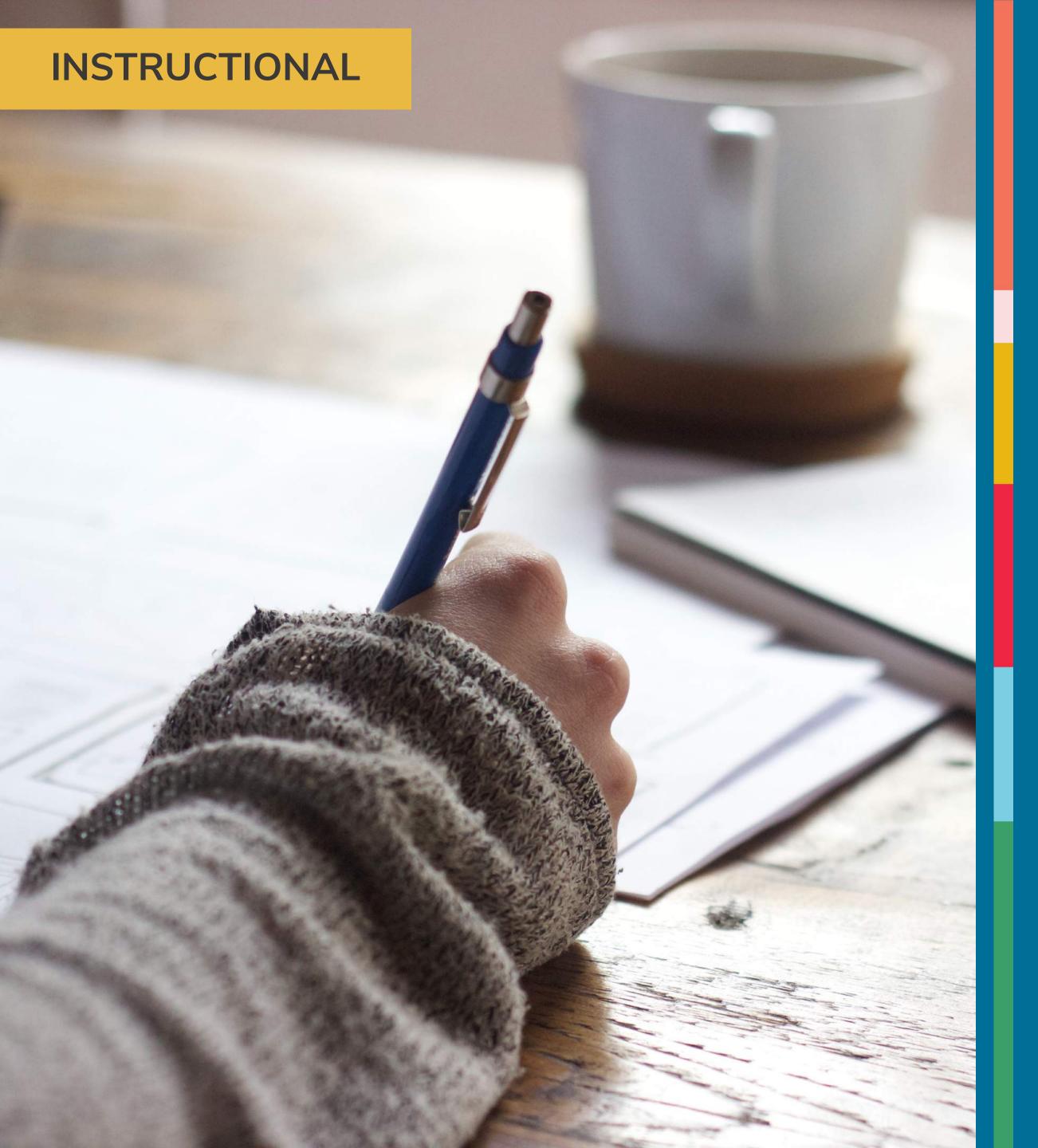




#### INSTRUCTIONAL SHIFTS

- Remote instruction
  - New forms of technology
  - Different modalities of learning
  - Modified forms of assessment
  - Suspension of "hands-on learning"





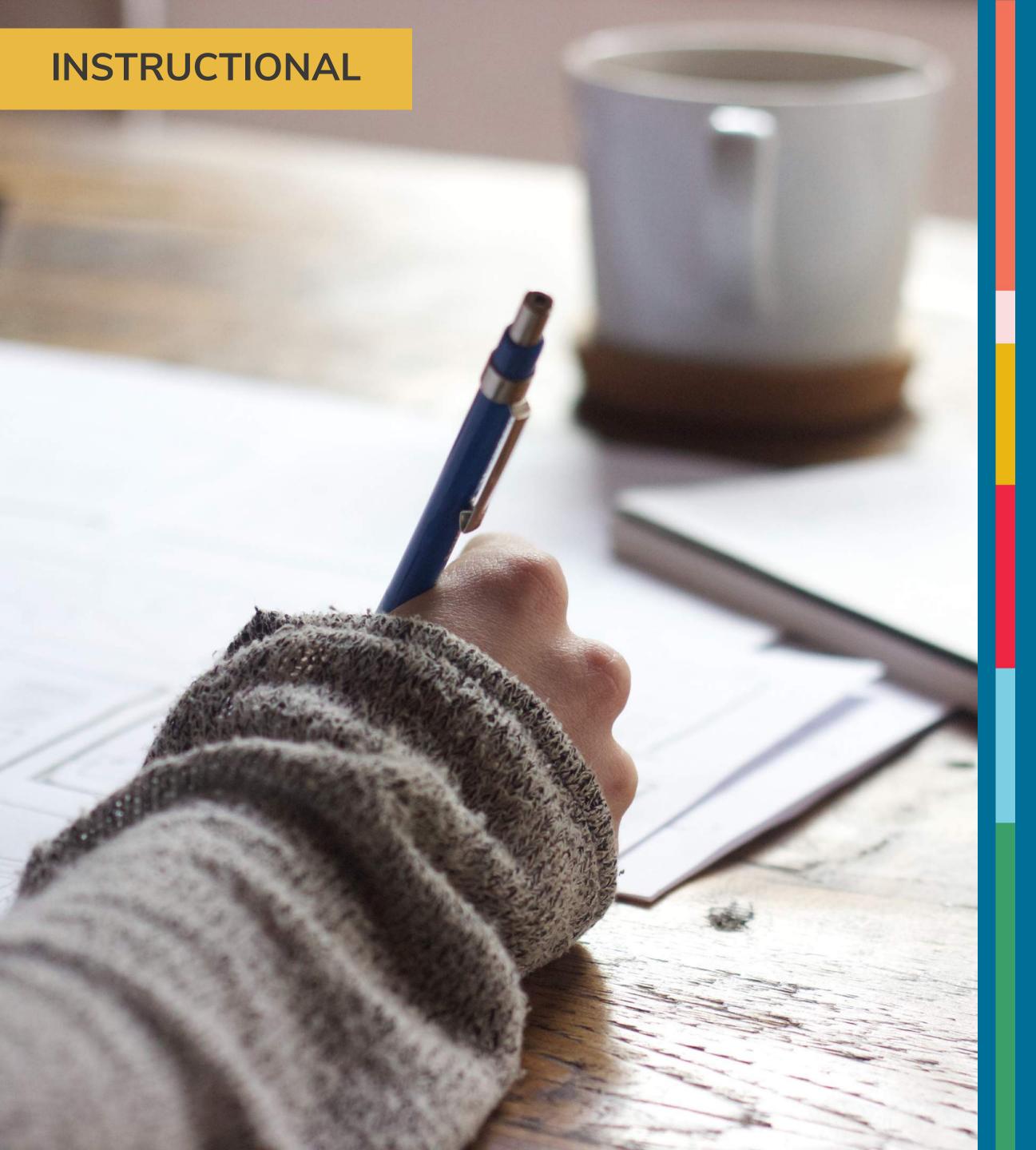
- Lowered Academic Self-Efficacy
  - Fewer Mastery Experiences Online
  - Limited Vicarious Experiences and Verbal Encouragements
  - Increased Anxiety



# INSTRUCTIONAL **DECLINE IN ACADEMIC SELF-EFFICACY** Time 3 Time 1 Time 2 Hilpert et al. (2021) 226 undergraduates in 4 biology sections

- Lowered Academic Self-Efficacy
  - Fewer Mastery Experiences Online
  - Limited Vicarious Experiences and Verbal Encouragements
  - Increased Anxiety





- Mixed Findings on Student Autonomy
  - Autonomy Thwarted when Forced Online



#### **INSTRUCTIONAL**

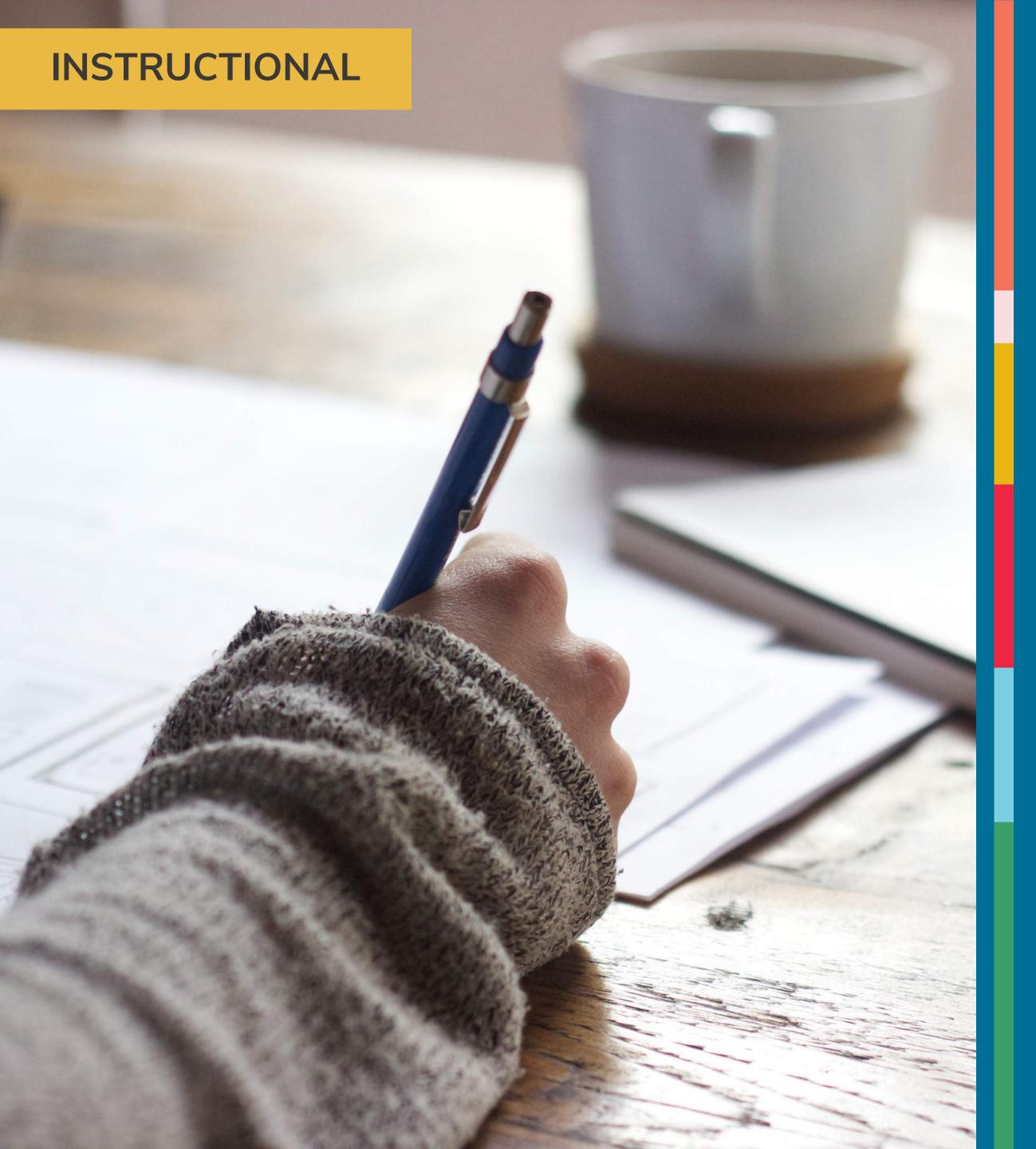
"I have zero motivation for online classes, that's why I don't sign up for them. I don't have the self-accountability to do my coursework."

"the whole reason I went to college in person was to be motivated. Virtual learning is not beneficial to me."

Hensley et al. (2021) 328 undergraduates

- Mixed Findings on Student Autonomy
  - Autonomy Thwarted when Forced Online





- Mixed Findings on Student Autonomy
  - Autonomy Thwarted when Forced Online
  - Instructors More Controlling when Experiencing Burnout
  - Potential Opportunities for Students to make Instructional Choices





#### SOCIAL SHIFTS

- Loss of in-person relatedness
  - Reduced influence of socializing agents (instructors, peers)
  - Declines in mental health



#### INSTRUCTIONAL

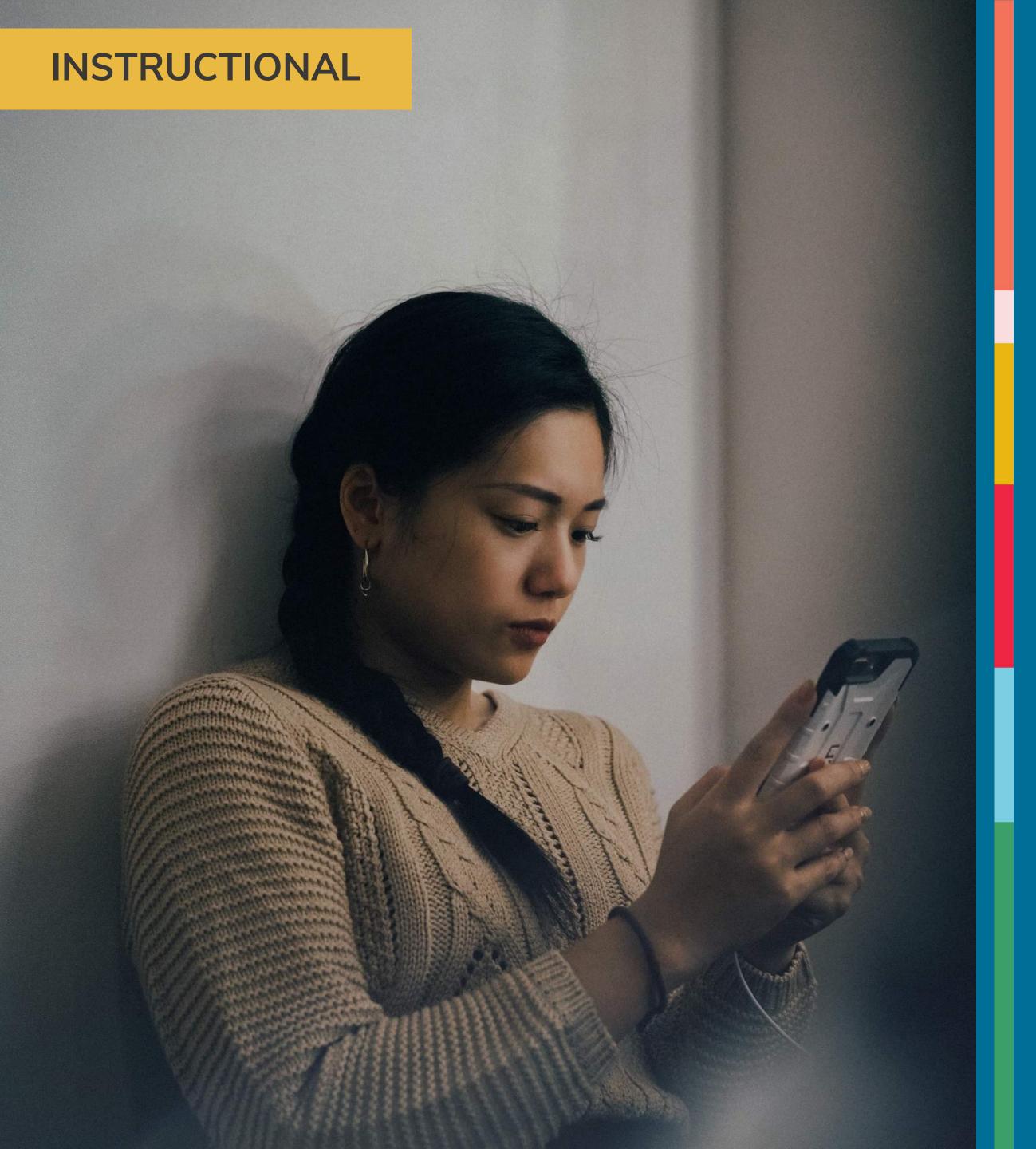
Decreased belonging associated with lower academic motivation (controlling for positive beliefs for online learning).

Marler et al. (2021) 238 undergraduates



- Mixed Findings
  - Lower Autonomous Motivation





- Mixed Findings
  - Lower Autonomous Motivation
  - Declines in Mental Health linked with Lower Motivation
  - Relatedness-Supportive Virtual
     Interactions associated with Pleasant
     Emotions

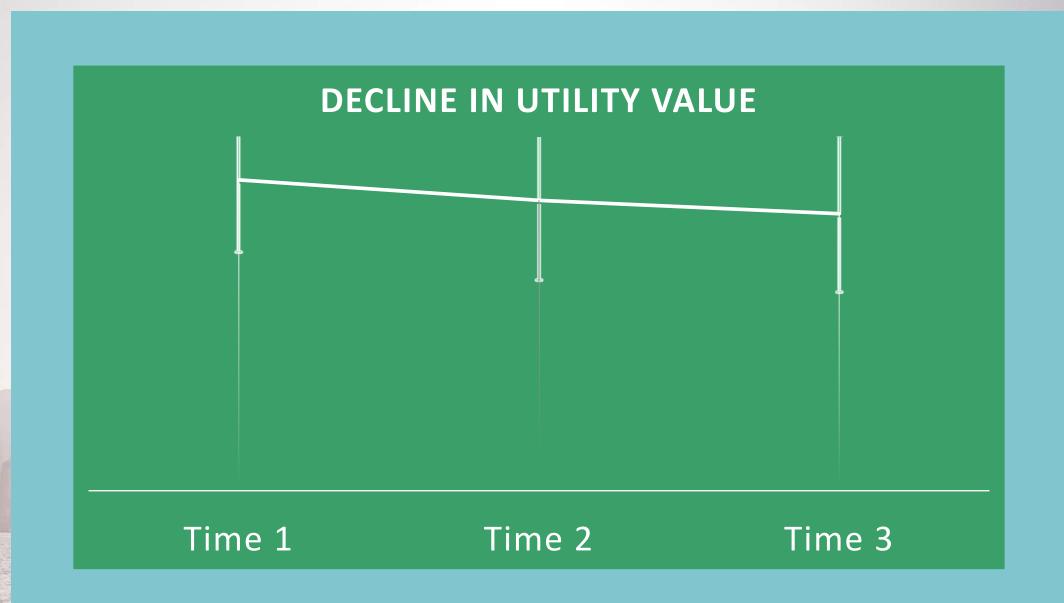




#### FUTURE-ORIENTED SHIFTS

- Bleak economic outlook
- Heroism in healthcare/medical fields
- Academic boredom and disengagement





Hilpert et al. (2021)
226 undergraduates in 4 biology sections



- Decline in Task Values (Utility Value) and Mastery Goals
- Increased Perceptions of Cost



"I think [COVID] has positively impacted my decision to continue with my STEM degree so that one day I can become a medical professional. It has motivated me and pushed me into being a stronger person"



- Decline in Task Values (Utility Value) and Mastery Goals
- Increased Perceptions of Cost
- Renewed Interest in STEM-Medicine

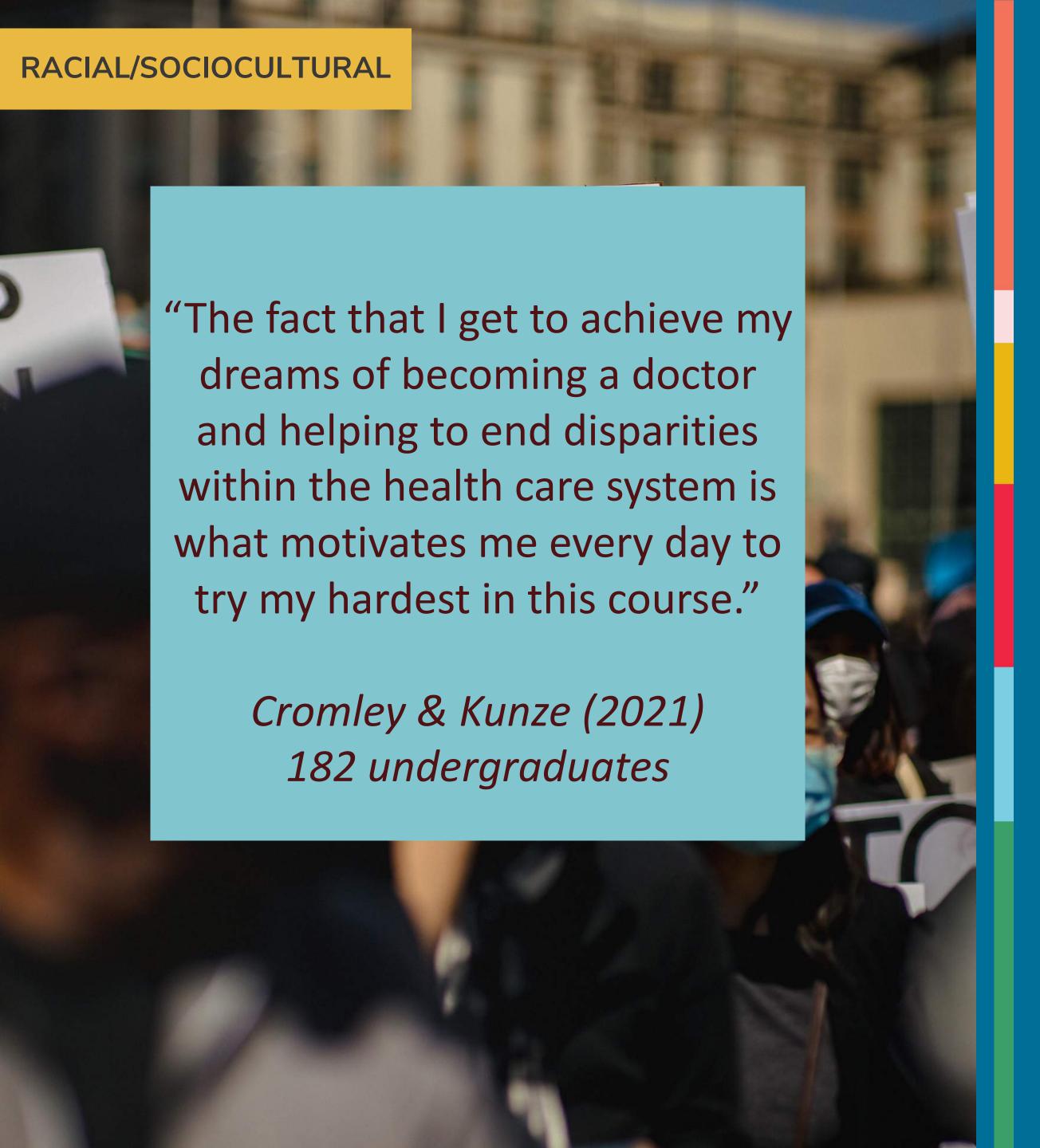




#### RACIAL/ SOCIOCULTURAL SHIFTS

- Growing racial disparities in healthcare
- Highly visible tragedies linked with police brutality and racial violence
- Heightened prejudice/violence against
   APIDA individuals





### EFFECTS ON MOTIVATION

 Increased Prosocial Motivation Aligned with Community-Oriented Values





- Increased Prosocial Motivation Aligned with Community-Oriented Values
- Experiencing Oppression / Structural
   Disadvantaging Decreases Motivation
- Opportunities for Motivational Resilience



#### WHAT NOW?

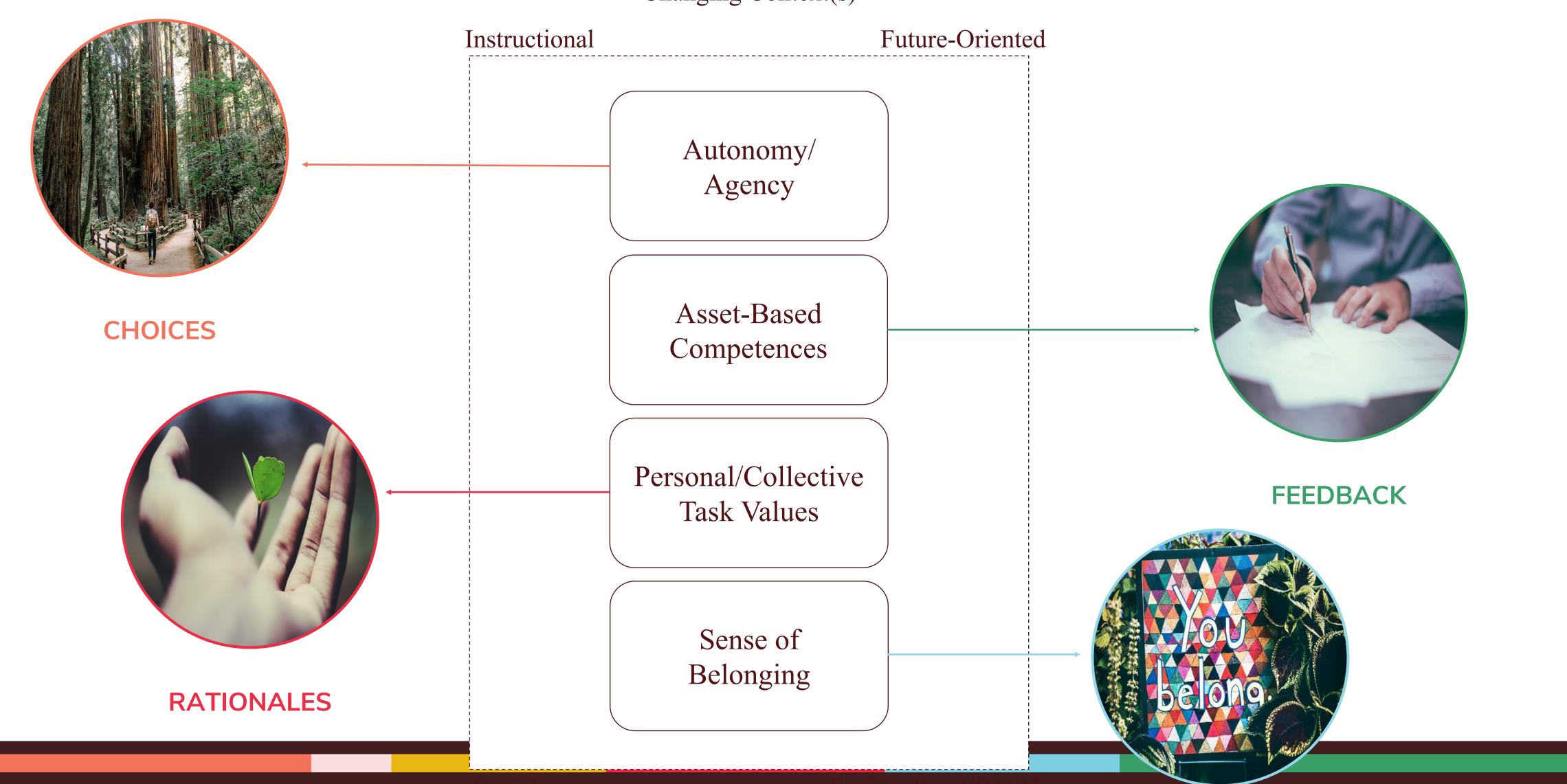


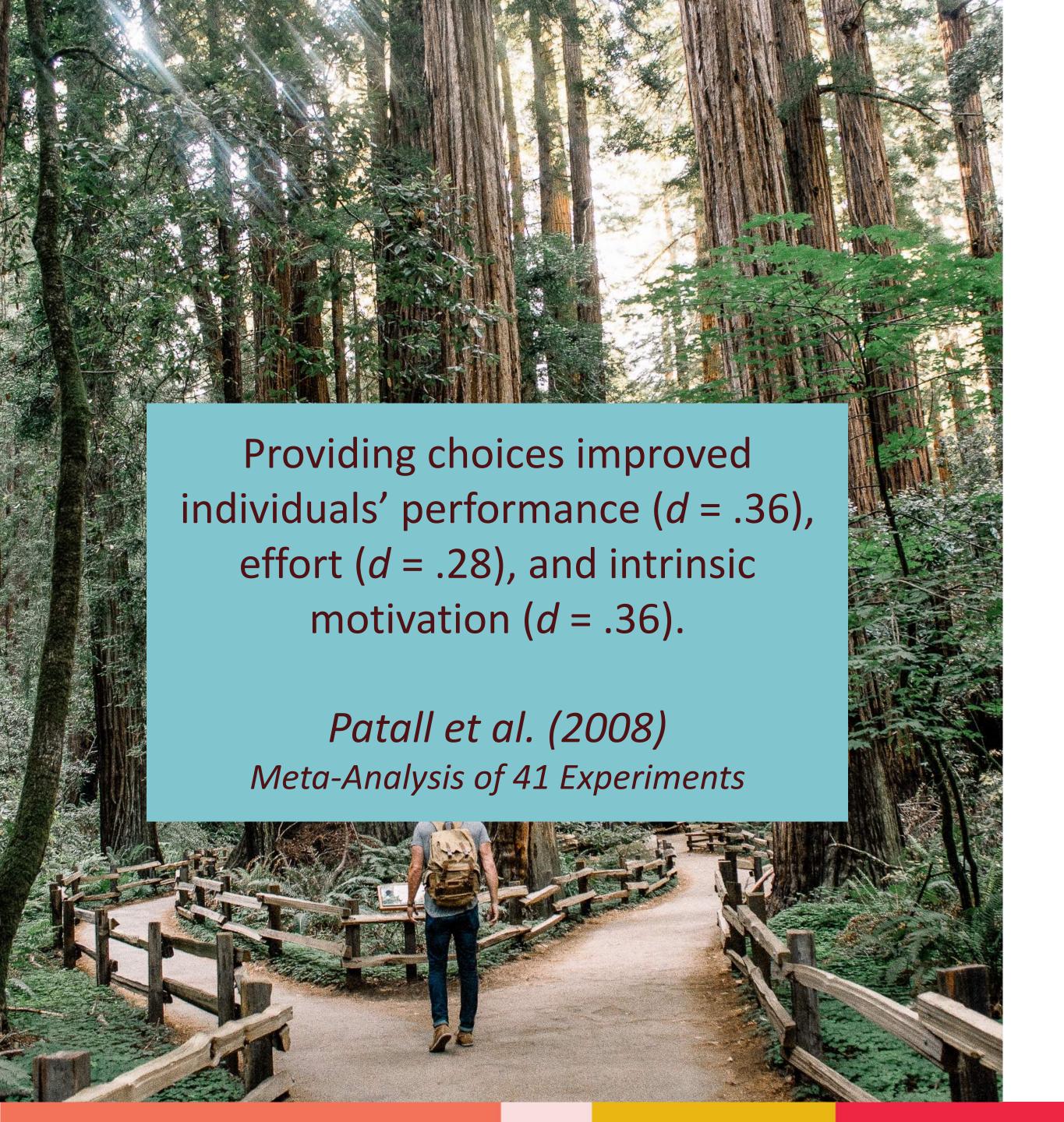






#### Present: Changing Context(s)





#### MEANINGFUL CHOICES

#### Granting students' autonomy

- Provide meaningful educational choices for students
- Promote student ownership and agency to engage actively in the learning process
- Encourage self-directed exploration



Meta-Analysis of 78 Experiments

#### CONSTRUCTIVE FEEDBACK

Highlighting strengths and directions to improve

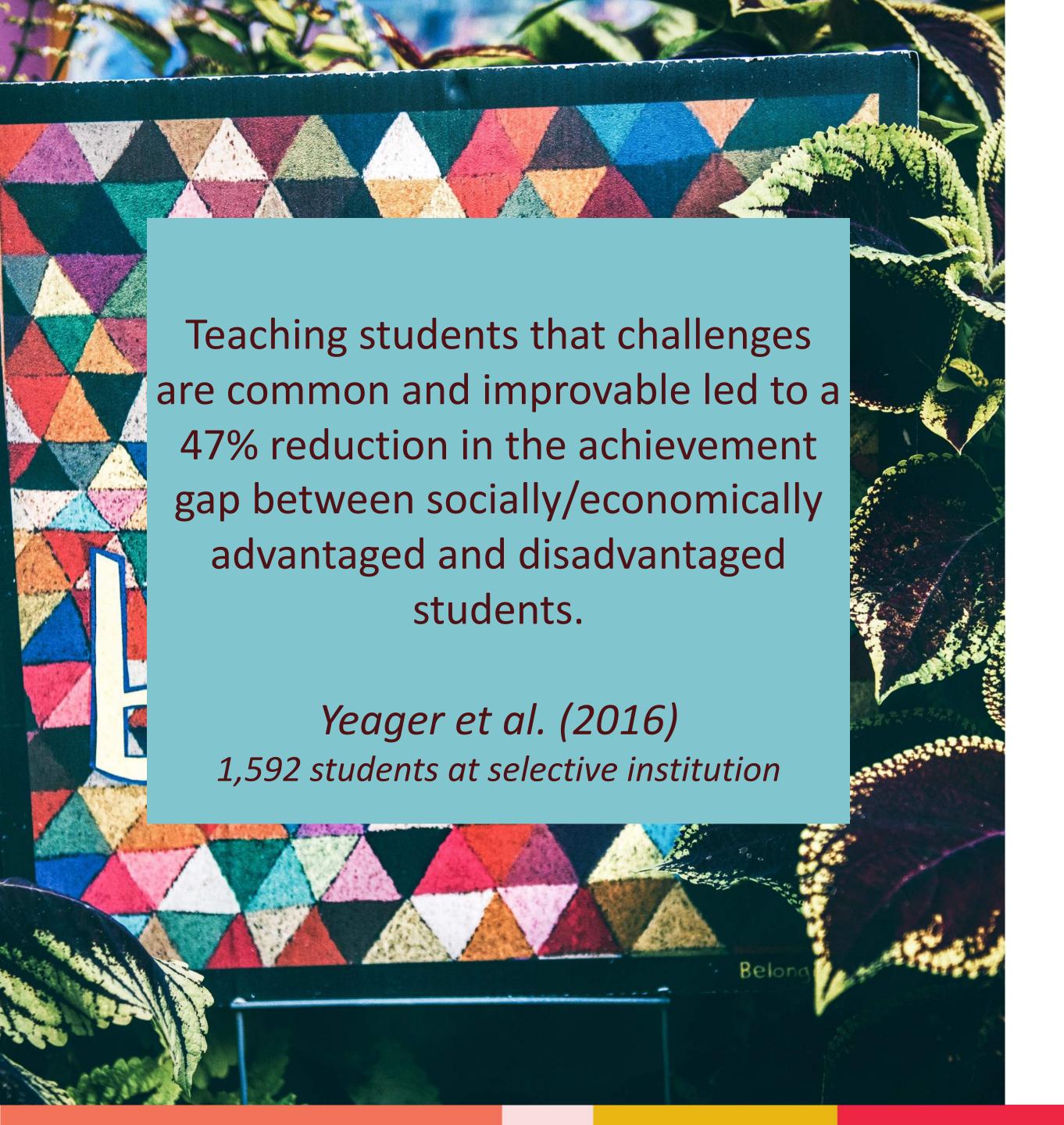
- Provide informational praise
- Give concrete and specific directions to improve
- Emphasize high standards and belief that students are capable to meet those standards



#### RATIONALE PROVISION

Giving compelling reasons for learning

- Explain why material is useful for students' future goals
- Discuss the value of engaging in a task
- Integrate prosocial/communal goals



#### SOCIAL BELONGING

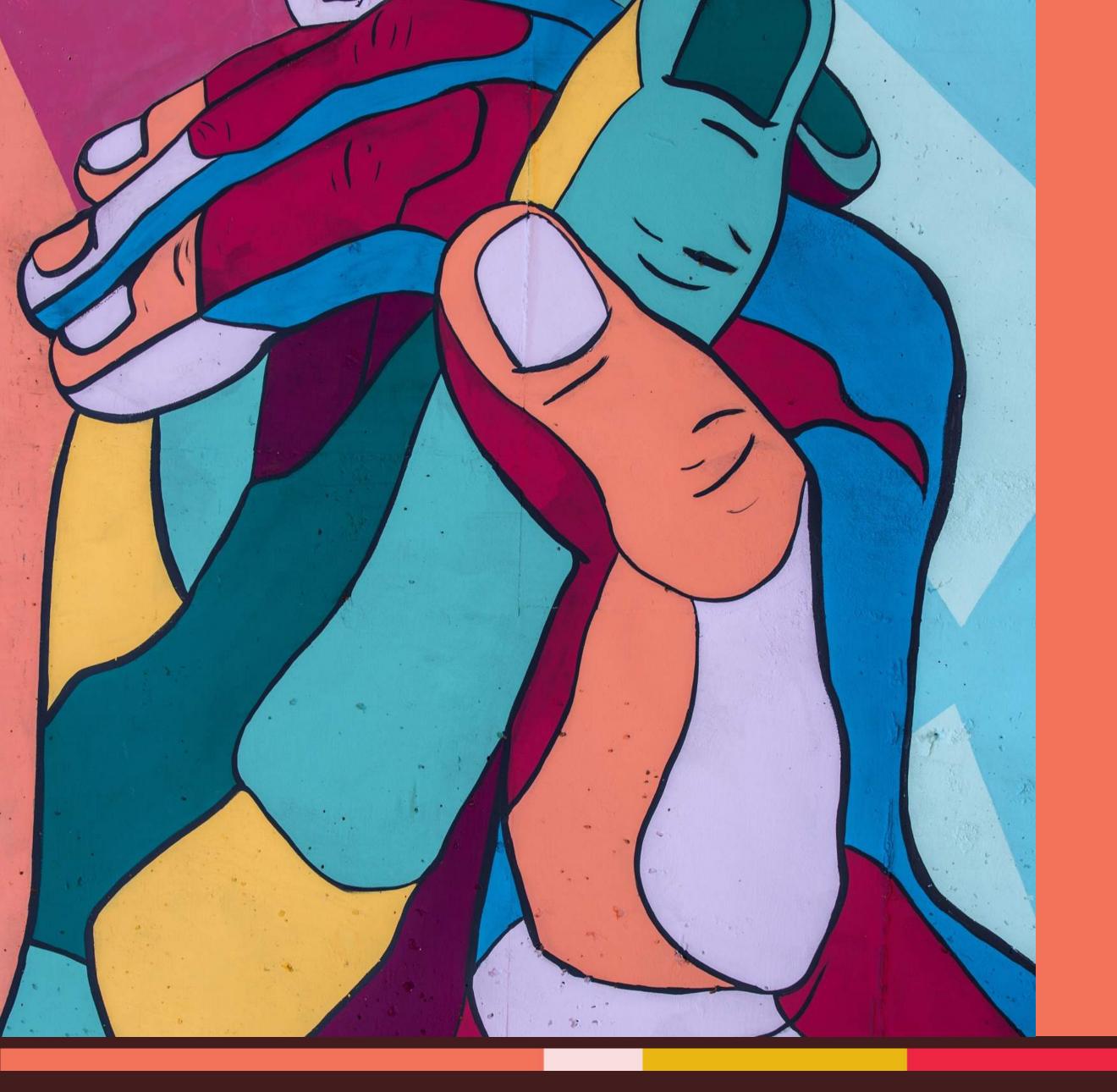
Mitigating feelings of belonging uncertainty

- Emphasize that challenges are common and improvable
- Discuss how struggles do not portend a lack of belonging
- Share how belonging is hard but improves over time



#### HELP-SEKING

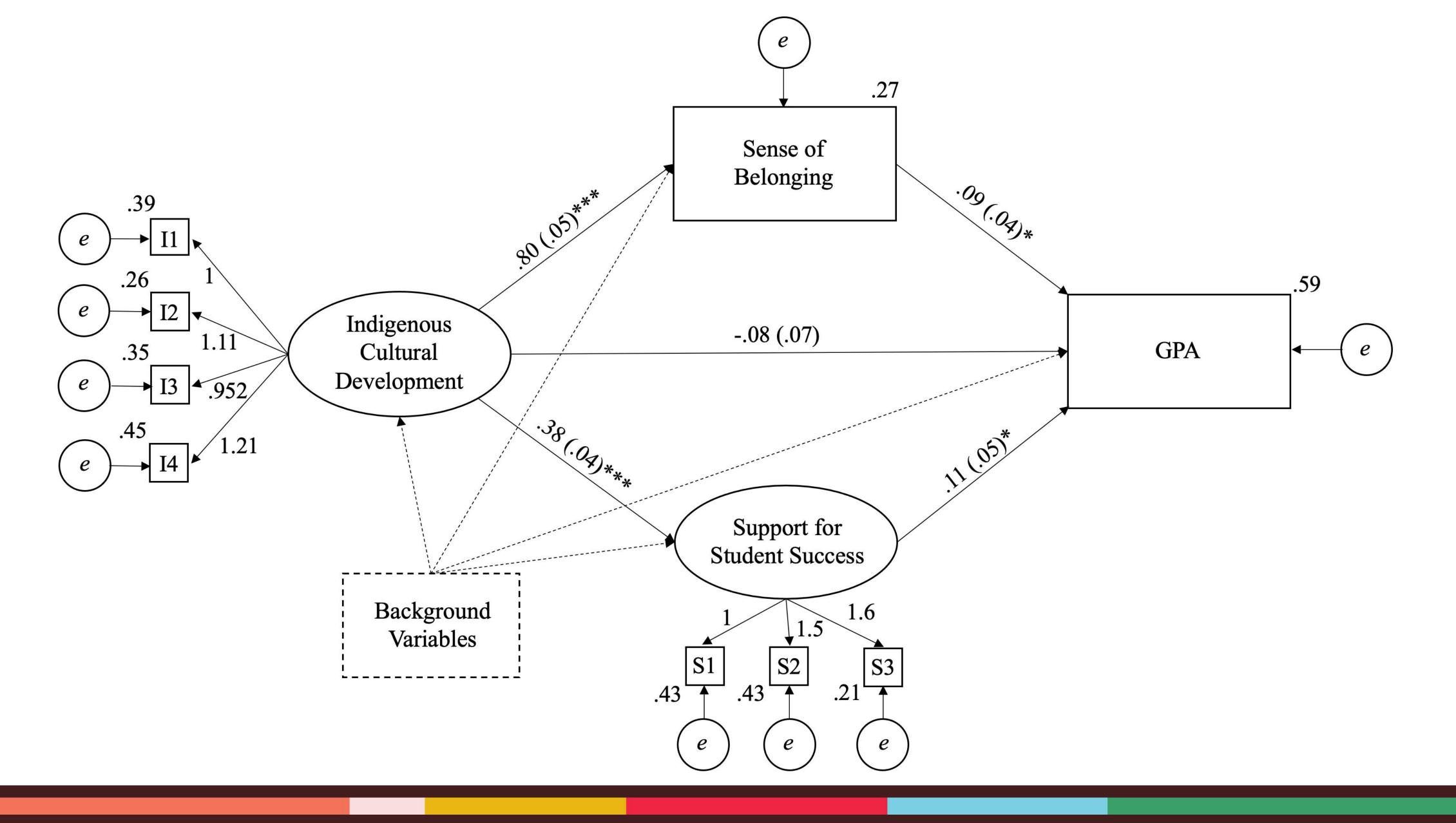
- Environments characterized by belonging and motivational support foster helpseeking
- All help-seeking is not created equal
- Meta-analysis of over 100 studies on collegiate academic help-seeking distinguishes among 3 types:
  - Avoidant (*r* = -.18)
  - Expedient (*r* = -.10)
  - Instrumental (r = .11)



#### CULTURAL VALIDATION

- Looking to Minority-Serving Institutions as exemplars
- A study on 1,393 self-identifying
   Indigenous students across 22 Tribal
   community college students
- The institutional role of Indigenous cultural development





#### QUESTIONS & CONTACT ME



@carlton\_fong



carltonfong@txstate.edu



Curriculum & Instruction
601 University Drive, ASBN 401B
San Marcos, Texas 78666



