

AN INITIATIVE OF THE FLORIDA COLLEGE SYSTEM

### Mathematics Pathways for Student Success: Supporting K-20 Transitions through Cross-Sector Collaboration

July 14-15, 2022



## Welcome

### Thank you to the planning committee!

- Bonnie Smith, Chipola College
- Leslie Sterrett, Indian River State College
- Lynne O'Dell, Indian River State College
- Olivia Shand, Miami Dade College
- Bridget Rogers, Palm Beach State College
- Joi B. Davies, St. Petersburg College

### Day 1: Updates on Major Statewide Policies and Initiatives

9:00 – 9:05 a.m.	Welcome
	Abbey Ivey, Florida Student Success Center
9:05 – 10:05 a.m.	Panel Presentation: Statewide Mathematics Pathways
	Tommy Minton, Seminole State College of Florida
	Julie Phelps, Valencia College
	Abbey Ivey, Florida Student Success Center (moderator)
10:15 – 11:15 a.m.	Florida's New B.E.S.T. Standards and High School Mathematics
	Courses
	Patricia Duncan, Florida Department of Education
	Courtney Starling, Florida Department of Education
11:25 a.m. – 12:00 p.m.	Focused Breakout Session

- What ideas/suggestions do you have to continue strengthening the alignment between the postsecondary math pathways and the B.E.S.T. high school math courses?
- What supports would you need to implement math pathways and/or B.E.S.T. standards?
- What concerns do you have about implementing math pathways and/or B.E.S.T. standards?
- What excites you about math pathways and/or B.E.S.T. standards?



# Mathematics Pathways Panel

Dr. Tommy Minton, Seminole State College of Florida Dr. Julie Phelps, Valencia College Abbey Ivey, Florida Student Success Center (moderator)

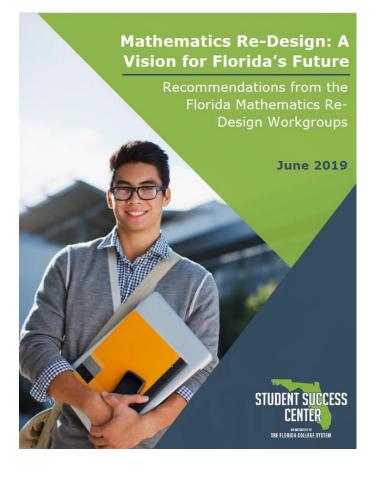
# What is the Florida Student Success Center?

- Supports Florida's 28 state colleges' efforts to develop student-centered pathways and increase student completion rates
- The 15<sup>th</sup> state to join the national Student Success Network
- Launched in 2018 in partnership with
  - Jobs For the Future
  - Helios Education Foundation
  - Florida College System Foundation



## Florida Mathematics Re-Design Recommendations

- Culmination of the year-long Florida Mathematics Re-Design Initiative
- Includes 11 recommendations for state policy, institutional policy and evidence-based practices designed for scale
- One of the recommendations was to "create common mathematics pathways by aligning mathematics courses to programs, meta-majors and careers in Florida"



## Mathematics Pathways Legislation

- The pathways recommendation is reflected in SB 366 from the 2021 legislative session
- The bill states:

To facilitate seamless transfer of credits, reduce excess credit hours, and ensure students take the courses needed for their future career, the articulation agreement must establish three mathematics pathways for students by aligning mathematics courses to programs, meta-majors, and careers. A representative committee consisting of State University System faculty, faculty of career centers established under s. 1001.44, and Florida College System institution faculty shall collaborate to identify the three mathematics pathways and the mathematics course sequence within each pathway which align to the mathematics skills needed for success in the corresponding academic programs and careers.

# **Committee Details**

- Members of the committee began collaborating in fall 2021 to identify the three mathematics pathways and corresponding course sequences.
- The committee is composed of:
  - 8 members representing the State University System (SUS)
  - 8 members representing the Florida College System (FCS)
  - 2 members representing the school district career centers
  - 1 non-voting member who serves on the Articulation Coordinating Committee - Dr. Kathleen Ciez-Volz

## Going into the work...

- Florida has identified general education core mathematics courses.
  - MAC X105 College Algebra; MAC X311 Calculus I; MGF X106 Liberal Arts Mathematics I; MGF X107 Liberal Arts Mathematics II; STA X023 Statistical Methods.
- In total, there are currently 765 courses in the mathematics discipline in the Statewide Course Numbering System.
- Additionally, there is no statewide commonality for course-level prerequisites.

### Scope of Statewide Pathways

### Associate in Science/Applied Science

General Education (Gen Ed) Core Course in Pathway

(1 course from pre-defined course numbers in Gen Ed Core rule) Associate in Arts

Gen Ed Core Course in Pathway

(1 course from pre-defined course numbers in Gen Ed rule)

#### **Institutional Course**

(Meets common learning outcomes and is aligned with CPM; Course numbers are recommended, but institutions have flexibility in deviating if SLOs are met)

### Bachelor's

Gen Ed Core Course in Pathway

(1 course from pre-defined course numbers in Gen Ed rule)

#### **Institutional Course**

(Meets common learning outcomes and is aligned with CPM; Course numbers are recommended, but institutions have flexibility in deviating if SLOs are met)

**Proposed Pathways** 

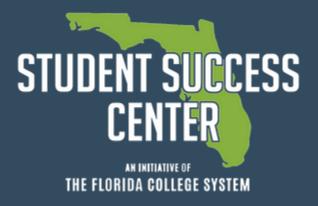
# Algebra through Calculus

# **Statistical Reasoning**

Mathematical Thinking in Context

# Timeline

Activity	Expected Timeline
Committee finalizes mathematics pathways and course sequences	April 2022
Discipline assignments/survey	May—June 2022
ACC considers proposed mathematics pathways and course sequences	July 21, 2022
Florida Department of Education (FDOE) initiates rule development process/Office of the Board of Governors (BOG) initiates regulation development process to incorporate math pathways	July 2022
State Board of Education/Florida Board of Governors considers mathematics pathways rule/regulation revisions	October 2022
FDOE/BOG notify institutions and provide technical assistance	October 2022 (T.A. ongoing)
State and institutional curriculum processes (curriculum committees, curriculum frameworks, catalog updates, staff training, etc.)	2023-24 academic year
Mathematics pathways effective for entering students in associate and baccalaureate degree programs	2024-25 academic year



### Florida's New B.E.S.T. Standards and High School Mathematics Courses

Patricia Duncan, Florida Department of Education Courtney Starling, Florida Department of Education



### **Breakout Session**



AN INITIATIVE OF THE FLORIDA COLLEGE SYSTEM

### Mathematics Pathways for Student Success: Supporting K-20 Transitions through Cross-Sector Collaboration

July 14-15, 2022



### Welcome

### Day 2: K-20 Transitions: Cross-Sector Approaches

9:00 – 9:05	Welcome
	Abbey Ivey, Florida Student Success Center
9:05 – 9:50 a.m.	From Random Acts to Dual Enrollment Equity Pathways
	John Fink, Community College Research Center
	Maggie Fay, Community College Research Center
10:00 – 10:45 a.m.	Cross-Sector Curricular Alignment: DirectConnect to UCF and the
	Curriculum Alignment Consortium Initiative
	Teresa Dorman, University of Central Florida
10:55 – 11:40 p.m.	Supporting Student Progression through Co-Requisite Intensive
	Mathematics Courses
	Julie Phelps, Valencia College
11:40 – 12:00 p.m.	Focused Breakout Session

### Day 2 Discussion Prompts

- What are your main takeaways from the presentation?
- Given the presentation takeaways,
  - Identify one key priority for your institution.
  - Identify what actions your institution can take in the next six months to achieve that priority.
- Who else within your institution should be aware of these ideas / practices? What is the best way to share this information?



### From Random Acts to Dual Enrollment Equity Pathways

John Fink and Maggie Fay Community College Research Center



Cross-Sector Curricular Alignment: DirectConnect to UCF and the Curriculum Alignment Consortium Initiative

Teresa Dorman, University of Central Florida



### Supporting Student Progression through Co-Requisite Intensive Mathematics Courses

Julie Phelps, Valencia College



### **Breakout Session**