

Florida Mathematics Re-Design: A Vision for Florida's Future

Overview

In 2018, the Florida Student Success Center established three inter-connected workgroups to identify current challenges in mathematics pathways and develop policy and practice recommendations to improve student achievement across Florida's education systems.

The charge of the Florida Mathematics Re-Design workgroups was to explore complex issues surrounding mathematics pathways to prepare high school students for transition into Florida College System institutions and Florida College System students for transition into four-year universities.

More than 90 mathematics faculty, administrators and key stakeholders from Florida's K-12 system, the Florida College System and the State University System served as members of the workgroups in 2018-19. The recommendations presented here reflect a synthesis of the policy and practice recommendations that emerged.

The Recommendations

Types of Recommendations

The recommendations can be broken down either as policies (rules and regulations that shape the environment) or practices (the actions and activities of individuals or groups designed to execute or implement a plan).

Given the education ecosystem in Florida, the recommendation scope could be at multiple levels—individual, institutional or state.



Statewide Policy. Far reaching results at scale, across educational delivery systems.

Institutional Policy. Larger changes within an institution (intra) and between institutions (inter).

Practice. Instruction, actions or activities that produce results (institutional or individual).

Policy Recommendations

Recommendation 1

Create common mathematics pathways by aligning mathematics courses to programs, meta-majors and careers in Florida.

Recommendation 2

Use a “multiple measures” model to help improve placement, especially in mathematics.

Recommendation 3

Ensure mathematics prerequisites align with mathematics pathways.

Recommendation 4

Revise the statewide learning outcomes for developmental and gateway mathematics courses and identify essential mathematical processes.

Recommendation 5

Encourage colleges and universities to implement instructional models (such as the co-requisite model) that place students, when appropriate, directly into college-level mathematics courses carrying general education credit.

Practice Recommendations

Recommendation 6

Create recurring opportunities for K-20 stakeholders to promote collaboration to strengthen mathematics pathways for students via standing advisory groups/working groups and “big meetings.”

Recommendation 7

Determine the K-12 standards that align with the postsecondary courses identified for each major or meta-major to inform student course selection in high school.

Recommendation 8

Offer professional development opportunities for instructors.

Recommendation 9

Establish on-demand foundational mathematical skills modules for students to access in high school and postsecondary.

Recommendation 10

Increase the availability of advising resources and enlist the help of mathematics faculty, where appropriate.

Recommendation 11

Ensure parents/guardians are informed of how to support and advise high school students into mathematics sequences aligned with the student’s college and career pathway.