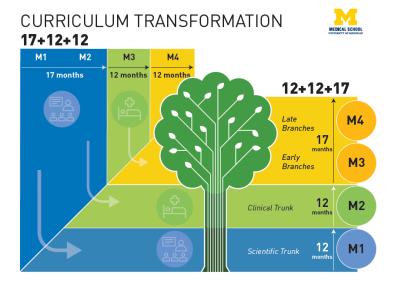


SCIENCE INSTRUCTION

in the Medical Student Curriculum

Science is defined broadly and is taught and experienced everywhere throughout the medical student curriculum.

In 2016, Michigan launched an architectural transition from a 17 (M1-M2) + 12 (M3) +12 (M4)-month medical student curriculum to a three-phase 12 (M1-Scientific Trunk) + 12 (M2-Clinical Trunk) +17 (M3-M4 Branches)-month curriculum.



In their M1-Scientific Trunk year, students complete six foundational and system-based blocks, where normal and abnormal (physiology and pathophysiology) are presented side-by-side.

Also in the Scientific Trunk, students complete longitudinal courses designed to foster the development of their clinical skills, clinical reasoning, interprofessional education, leadership, and health systems science. It is not just about knowing the principles, mechanisms and systems, it is about making this connection between the science to the application in clinical care. The courses include Doctoring, Leadership and Health Systems Science, Interprofessional Education and Chief Concern.

When they enter their Clinical Trunk (clerkship) phase after 12 months, they do not leave science behind. In fact, science is now more deliberately taught during the clinical phases of education. By teaching students science during their Clinical Trunk, they can tie their clinical experience directly to the science they are learning.

In the past, students would learn in the classroom for the first 17 months, then take Step 1, demonstrating their knowledge of science before entering the clinical phase. Now, students take Step 1 after the Clerkships in the Clinical Trunk – the result is improved science knowledge because they relate principles deliberately to the clinical work they do. Students say they now feel more prepared for Step 1, more connected and confident about their scientific knowledge, and their performance has been better.

Under the old model, students completed 17 months in the classroom before seeing a patient. Now students encounter the health system and patients from the beginning.