

# CHFM SCIENCE SEQUENCE

Middle school & High school science at CHFM is an excellent opportunity to study God's creation together. CHFM *suggests* 2 possible science tracks\* depending on the needs and interests of your student. These tracks are great planning tools for CHFM families. CHFM strives to meet the ever-changing needs of homeschool families, and **occasionally our schedule may reflect additional class offerings beyond the track outlines** as we flex to meet the changing needs and demands of our members.

**General Science** (Apologia 3<sup>rd</sup> edition) is a middle school science class tailored to a **6<sup>th</sup>-8<sup>th</sup> grade student**. General Science is not a prerequisite for high school sciences, but it is a wonderful preparatory course. CHFM offers General Science every Even Fall year. **Math requirement: None\***

**Earth Science** (BJU Press 4<sup>th</sup> edition) is an option for **7<sup>th</sup>-9<sup>th</sup> grade students** who desire more science in their studies. Moving from the ground up, students will learn the history of the earth; the soil, rocks, and fossils; oceans, seas, lakes, and rivers; the atmosphere; and space. CHFM offers Earth Science every Odd Fall year. **Math requirement: None\***

**Physical Science** (Apologia 3<sup>rd</sup> edition) is another optional science geared to the **8<sup>th</sup>-10<sup>th</sup> grade student** who may want or need more mathematical practice in science before Chemistry. Physical Science covers atomic structure, periodic table, chemical bonds, reactions and energy, motion, forces, energy, waves and sound, light, electricity and magnetism. CHFM offers Physical Science every year. **Math requirement: Pre-Algebra (concurrent enrollment or previously completed)**

**Biology** (Apologia 3<sup>rd</sup> edition) is appropriate for **9<sup>th</sup>-12<sup>th</sup> grade student**. Biology is a college-prep biology course that provides a detailed introduction to the methods and concepts of general biology. This class has no specific science prerequisites. Biology has a strong emphasis on vocabulary, dissection, and experiments. CHFM offers Biology every year. **Math requirement: None\***

**Chemistry** (Dr. Jay Wile Discovering Design with Chemistry 2015) provides **10<sup>th</sup>-12<sup>th</sup> grade students** a rigorous foundation in chemistry in order to prepare your student for college-level studies. Physical Science or similar math-based science course is recommended but not required. This Chemistry class contains many mathematical intensive lessons. CHFM offers Chemistry every Even Fall year. **Math requirement: completion of Algebra 1 and concurrent enrollment in or completion of Algebra 2.**

**Physics** (Apologia Exploring Creation with Physics 2<sup>nd</sup> edition) is designed for **10<sup>th</sup>-12<sup>th</sup> grade students**. It is a college-prep physics course which provides a detailed introduction to the methods and concepts of general physics, heavily emphasizing vector analysis. Physical Science or similar math-based science course is highly recommended, but not required. CHFM offers Physics every Even Fall year. **Math requirement: completion of Algebra 2 and concurrent enrollment in Pre-Calculus or Trigonometry.**

\* When enrolled in a class with no math requirements, this is a good time to ensure your student is mathematically preparing for his/her next science class.

## **Class Offerings (Subject to change based on membership needs):**

**Classes Offered in Alternating Years** (Even numbered Fall Semesters): General Science, Physical Science, Chemistry

**Classes Offered in Alternating Years** (Odd numbered Fall Semesters): Earth Science, Biology, Physics

## CHFM SCIENCE TRACKS

### CHFM OFFERS THESE CLASSES BEGINNING IN:

#### EVEN YEARS

General Science – 6<sup>th</sup>, 7<sup>th</sup> or 8<sup>th</sup>

Physical Science – 8<sup>th</sup>, 9<sup>th</sup> or 10<sup>th</sup>

Chemistry – 10<sup>th</sup>, 11<sup>th</sup> or 12<sup>th</sup>

#### ODD YEARS

Earth Science – 7<sup>th</sup>, 8<sup>th</sup> or 9<sup>th</sup>

Biology – 9<sup>th</sup>, 10<sup>th</sup>, 11<sup>th</sup> or 12<sup>th</sup>

Physics – 10<sup>th</sup>, 11<sup>th</sup> or 12<sup>th</sup>

### POSSIBLE MS/HS TRACKS FOR HIGH SCHOOL GRADUATION

**Kansas Graduation Requirements:** *Three units of science, which shall include physical, biological, and earth and space science concepts*

#### Beginning with EVEN YEAR

General Science - 7th

Earth Science -8th

Physical Science - 9th

Biology - 10th

Chemistry - 11th

#### Beginning with ODD YEAR

Earth Science -8th or 9th

Physical Science - 9th or 10th

Biology - 10th or 11th

Chemistry - 11th or 12th

### POSSIBLE MS/HS TRACKS FOR COLLEGE BOUND STUDENTS

**Kansas State Board of Regents Qualified Admissions:** *One unit of each: Biology\*, Chemistry\* & Physics \**

#### Beginning with EVEN YEAR

General Science - 7th

Earth Science -8th

Physical Science - 9th

Biology\* - 10th

Chemistry\* - 11th

Physics\* - 12th

#### Beginning with ODD YEAR

Earth Science -7th or 8th

Physical Science - 8th or 9th

Biology\* - 9th or 10th

Chemistry\* - 10th or 11th

Physics\* - 11th or 12th

*Be sure to check math requirements for each class.*

*Revised 2024*