

AP/IB Sciences In MCPS

IB Sports, Exercise, & Health Science (IB SEHS)

May 8th
Wootton High School



Introductions

- Laura Davis Vaughan
 - Watkins Mill High School
 - Laura_E_DavisVaughan@mcpsmd.net
 - Tweet @MsDVwmhs
- Jean-Paul Spencer
 - Einstein High School
 - Jean-paul_Spencer@mcpsmd.org

Questions?

Index Card:

please include your
contact info

Online form:

Type the link in your browser
or scan the QR code

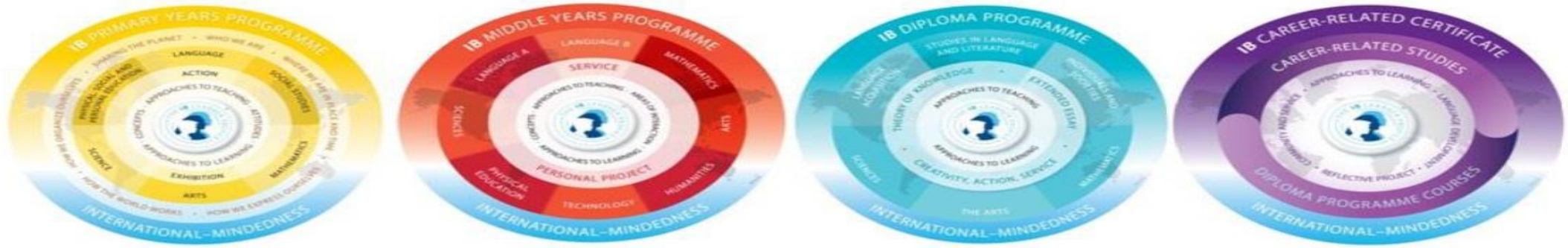
bit.ly/SciNight19



For more information on enrolling your student in this course, please contact the Counselor and/or the Science Department Resource Teacher at your high school.

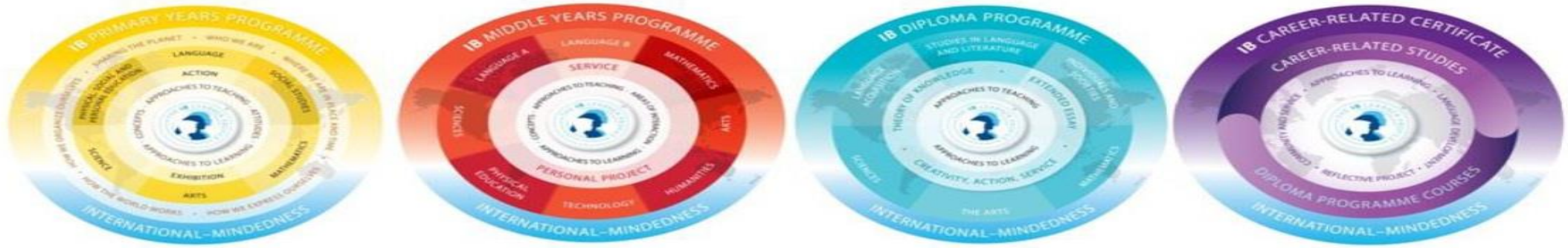
Learning Engagements:

- Overview of IB Program
- Standard vs Higher Level in IB
- Overview of the IB SEHS course
- Examine the pacing of the content in the course
- Performance Expectations in IB SEHS
- Internal Assessments (IB) and External Assessments



Diploma Program (DP) Grade 11-12

- The program aims to develop students who have excellent breadth and depth of knowledge.
- DP students are required to take 6 IB courses as well as complete an Extended Essay and Theory of Knowledge.
- At least 3 of those courses must be Higher Level (HL)



Career-Related Program 11-12 Grade

- The CP is a framework of international education addressing the needs of students engaged in career-related education or who want to specialize in one aspect of the DP program.
- Student must take at least 2 DP courses
- Designed for students who want to be in one of the county's other programs (Project Lead the Way, Medical Careers, Academy of Finance, etc).

Standard Level (SL) vs. Higher Level (HL)

SL and HL courses consist of the **same** educational aims, core syllabus and curriculum and assessment models

- HL courses typically include additional elements designed to allow students to explore areas of interest within the subject in more depth
 - SL courses are not watered down versions of their HL counterparts
 - The assessment criteria are equally demanding for both levels, and SL exams are marked and standardized with the same rigour as all IB coursework.

Standard Level (SL) vs. Higher Level (HL)

- SL courses ensure students are exposed to a range of disciplines that they might otherwise opt out of
- HL courses allow students to spend more time with subjects they are more interested in by exploring extensions to the SL core curriculum

Difference between Standard Level (SL) and Higher (HL) Level in IB

- Most subjects may be taken at either SL or HL
- To earn the full diploma a student must take at least three subjects at HL
 - In addition, three core elements—the extended essay, theory of knowledge and creativity, activity, service—are compulsory and central to the philosophy of the programme.

Difference between Standard Level (SL) and Higher (HL) Level in IB

The philosophy of the IB DP is that students should engage with a range of subjects while being able to explore specific areas of personal interest in greater depth.

- In this sense, all DP courses, regardless of whether they are SL or HL, are integral to the programme

Overview of the IB SEHS course

- Standard Level (SL) course across county
- Two or One year Model depending on school
- Anatomy & Physiology, Biomechanics/Physics, Psychology, Stats, and Nutrition
- Life skills and knowledge beneficial to all students
 - Particularly excellent preparation for college courses and careers in medicine, life sciences, health and fitness, etc.

Examine the pacing of the content in the course:

1 Year- Semester A

- **Measurement and Evaluation of Human Performance**

- Statistical Analysis
- Study Design
- Components of Fitness
- Principles of Training Program Design

- **Anatomy**

- Skeletal System
- Muscular System

- **Movement Analysis**

- Neuromuscular Function
- Joint and Movement Type
- Fundamentals of Biomechanics

Examine the pacing of the content in the course:

1 year- Semester B

- **Exercise Physiology**
 - Respiratory System
 - Cardiovascular System
- **Energy Systems**
 - Nutrition
 - Carbohydrate & Fat Metabolism
 - Nutrition & Energy Systems
- **Skill in Sport**
 - The characteristic and classification of Skill
 - Information Processing
 - Principles of Skill Learning
- **Two Optional Topics**
 - Option A: Optimizing Physical Performance
 - Option B: Psychology of Sports
 - Option C: Physical Activity and Health
 - Option D: Nutrition for sports, exercise and health

Examine the pacing of the content in the course:

2 Years

Year 1: Semester A

- **Measurement and Evaluation of Human Performance**
 - Statistical Analysis
 - Study Design
 - Components of Fitness
 - Principles of Training Program Design
- **Anatomy**
 - [Skeletal System](#)
 - Muscular System
- **Movement Analysis**
 - Fundamentals of Biomechanics

Examine the pacing of the content in the course:

2 Years

Year 1: Semester B

- **Exercise Physiology**
 - [Respiratory System](#)
 - Cardiovascular System
- **Energy Systems**
 - [Nutrition](#)
- **Skill in Sport**
 - The characteristics and classification of Skill
- **Two Optional Topics**
 - Option A: Optimizing Physical Performance
 - Option B: Psychology of Sports
 - Option C: Physical Activity and Health
 - Option D: Nutrition for sports, exercise and health

Examine the pacing of the content in the course:

2 Years

Year 2: Semester A

- **Measurement and Evaluation of Human Performance**
 - Statistical Analysis
 - Study Design
- **Movement Analysis**
 - Neuromuscular Function
 - Joint and Movement Type
- **Exercise Physiology**
 - Respiratory System
 - [Cardiovascular System](#)

Examine the pacing of the content in the course:

2 Years

Year 2: Semester B

- **Exercise Physiology**
 - Respiratory System
 - Cardiovascular System
- **Energy Systems**
 - Carbohydrate & Fat Metabolism
 - Nutrition & Energy Systems
- **Skill in Sport**
 - Information Processing
 - [Principles of Skill Learning](#)

Internal Assessments (IA)

- Students will individually conduct an investigation on a course-related topic of their choosing and write a detailed lab report
 - *Completed in year two for 2-year courses*
- Worth 20% of the overall IB SEHS assessment grade.

External Assessments

Three Part Exam

Part I - Multiple Choice (45 min.)

Part II - Short Answer (75 min.)

Part III - Short Answer on Options (60 min.)

Questions?

Index Card:

please include your contact info

Online form:

Type the link in your browser or scan the QR code

bit.ly/SciNight19



For more information on enrolling your student in this course, please contact the Counselor and/or the Science Department Resource Teacher at your high school.