



Interession 2022
Course Catalog



Intersession is on January 10-14, 2022. All sessions will be facilitated remotely. Review this catalog prior to making requests, and note all of the details of the sessions you plan to request, including prerequisites and any necessary resources.

Student Requirements: All IMSA students are required to participate in Intersession. For 2022, all students must enroll in a minimum of three (3) sessions. In the session request form, students may request up to five (5) sessions.

Session Times/Dates: All sessions are on 1, 2, or 3 days during the week of Intersession. The catalog lists only the synchronous contact time for sessions; for example, a session listed as 120 minutes / three days will meet on Zoom for a total of 360 minutes across three days. Sessions may also include some work outside of the synchronous time. The catalog does not list the specific days/times each session will run, as that will be determined after student requests.

Intersession Request Form Link: <https://forms.gle/fG1ysY9tTwXwa6GV8>

Request Timeline: Requests will open at 8:30am on Monday, November 29 and close at 1:50pm on Tuesday, November 30. Note that **requests are NOT first come, first serve**; see the next section for details.

Schedule Notification: No later than Wednesday of Finals Week, students will receive an email with their individualized schedule, which will include the sessions the student is enrolled in and the specific days/times those sessions will take place during the week of Intersession.

Request Form Directions: The request form first asks students to input their name, Student ID#, and IMSA email address. Please double-check all of this information to ensure it is correct before submitting the form. Next, the form asks students to submit their "Primary Requests"; these are the 3-5 sessions that would make up the student's ideal schedule, should we be able to grant these requests. Students are required to include at least three (3) primary requests. Next, students must provide at least five (5) backup options of sessions different from the Primary Requests. These backup options will only be added to a student's schedule if we are unable to provide the student with at least three of their Primary Requests. Please note that selections on this form are FINAL! Once students submit the form, selections cannot be changed.

Request Fulfilment Process: To provide equitable opportunities for request fulfilment, requests will NOT be granted on a first come, first serve basis. Rather, all students will have the opportunity to submit the request form during the request timeline. A request fulfilment order will be generated randomly, and students will be granted one request at a time to provide opportunities for all students to get some or all of their Primary Requests. Students who do not submit the request form prior to the deadline will be provided a schedule based on what sessions have seats available.

Financial Assistance: Many sessions offered will not require students/families to purchase any materials or resources. For the handful of sessions that do require additional materials, students enrolled in those sessions will receive information after placement about how to request any needed assistance.



SESSION #: 1

TITLE: JHMC Problem Writing Workshop

LENGTH: 120 minutes / Three Days

DESCRIPTION

Each year IMSA's Mu Alpha Theta math honor society produces a math contest for middle schools. The contest is student-written, organized, and coordinated (with a little faculty help and supervision, of course). Each year we need dozens of good math problems. Participants in this session will work with each other and the faculty mentor to produce and refine problems and get the contests ready! The session will run continuously during intersession week so that you can participate any time you are not part of another intersession! Not required to be a Mu Alpha Theta member or have any previous experience writing math contest problems. Just bring your creativity!

NOTE: Session time is flexible. If students are in another session they can attend this session part-time instead of full-time to make up their required intersession commitment.

SESSION CATEGORIES

Service Learning - Session provides an opportunity for students to support a community or organization.

PREREQUISITES

N/A

FACILITATOR(S)

Micah Fogel, Current IMSA Faculty or Staff

STUDENT RESOURCES

N/A



SESSION #: 2

TITLE: Fantastic Adventures and How to Run Them (Virtually)

LENGTH: 120 minutes / Three Days

DESCRIPTION

Welcome Adventurers! Grab a seat, boot up your laptop, and roll for initiative as we embark on an epic quest to save the world and have fun while we play Dungeons and Dragons! Experience is not required but a good attitude is. Open to all players of all skill levels.

SESSION CATEGORIES

Diversity, Equity, and Inclusion - Session promotes DEI values and perspectives, Socioemotional - Session supports student social and emotional well-being.

PREREQUISITES

N/A

FACILITATOR(S)

Alec Mangan, Alumni IMSA Student

Eric Hawker, Current IMSA Faculty or Staff

Micheal Hrcek, Alumni IMSA Student

Steve Dutcher, Current IMSA Faculty or Staff

STUDENT RESOURCES

N/A



SESSION #: 3

TITLE: Join us for YoGo (Yoga on the go)

LENGTH: 60 minutes / Three Days

DESCRIPTION

This session is meant to enhance student social/emotional skills and give them a way to destress for their mental health. At the end of this session, students will be able to do yoga for stress relief and increase their mindfulness.

SESSION CATEGORIES

Socioemotional - Session supports student social and emotional well-being.

PREREQUISITES

N/A

FACILITATOR(S)

Sowmya Anjur, Current IMSA Faculty or Staff

Mary Myers, Current IMSA Faculty or Staff

STUDENT RESOURCES

N/A

**SESSION #: 4****TITLE:** Crochet for a Cause**LENGTH:** 60 minutes / Three Days**DESCRIPTION**

Students will learn how to crochet some simple but meaningful projects. The Knit-a-square organization accepts donations of crocheted (or knitted) blanket squares that become assembled by their team of gogos (grandmothers) in South Africa. It takes 35 squares to make a blanket. Since 2008, Knit-a-square has “distributed over 90,000 blankets to warm and comfort the cold, orphaned or vulnerable children of South Africa”. In this session, students will be learning how to crochet by creating as many squares as possible as a group; we will package and send the squares to this organization. By the end of the session, students will be able to perform some basic and intermediate crochet stitches, explain the purpose of differently sized crochet hooks, and identify the right kind of yarn for different types of projects. Students will also leave this session having basic skills necessary to create additional projects, if desired.

SESSION CATEGORIES

Service Learning - Session provides an opportunity for students to support a community or organization,
Socioemotional - Session supports student social and emotional well-being.

PREREQUISITES

N/A

FACILITATOR(S)

Christine Moskalik, Current IMSA Faculty or Staff

STUDENT RESOURCES

Crochet hook, sizes G, H, I (1 pack per student):

<https://www.joann.com/boye-starter-aluminum-crochet-hook-set-size-g--h--i/5136593.html>

Yarn: Lion brand, baby soft, medium worsted weight 4 - any color (1-2 skeins per student):

<https://www.lionbrand.com/collections/yarn-category-baby/products/a-star-is-born-naptime-yarn?variant=32643996450909>

Stitch markers (3-6/ stitch markers student):

<https://www.joann.com/susan-bates-crystalites-24-pk-0.38x0.88-stitchpins/15824204.html>

yarn needle (1-2 per student):

<https://www.joann.com/susan-bates-luxite-plastic-yarn-needles-2-3-4in/2381606.html>

scissors



SESSION #: 5

TITLE: Flying Drones Safely: An Introduction to the IMSA Drones Program

LENGTH: 60 minutes / One Day

DESCRIPTION

In this intercession, participants will learn the safety behind flying drones and how to become a certified FAA Remote Pilot as part of the new IMSA Drones Program beginning in January 2022. Participants will learn about new Federal laws recently enacted for flying drones. Additionally, participants will learn about the applications for using drones in the workforce. They will be introduced how to create and edit drone (aerial) videos and use the data to create 3D models and spatial maps using a geographic information system (GIS). The emphasis in this learning experience will be on how to fly drones safely and how to use spatial software to solve problems from a unique perspective. If you have ever wanted to learn about drones, their applications, and how to become an FAA Certified Remote Pilot, this is the learning experience for you.

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines, Academic Support - Session provides academic support toward IMSA curriculum, Diversity, Equity, and Inclusion - Session promotes DEI values and perspectives, Professional Development - Session provides explicit career-focused insights and applications, Service Learning - Session provides an opportunity for students to support a community or organization.

PREREQUISITES

N/A

FACILITATOR(S)

Rich Schultz, Current IMSA Faculty or Staff

Christine Zhang, Current IMSA Faculty or Staff

STUDENT RESOURCES

N/A



SESSION #: 6

TITLE: Disease Detectives: A Brief Introduction to Epidemiology

LENGTH: 60 minutes / Three Days

DESCRIPTION

Due to the COVID-19 pandemic, epidemiology has gone from a niche field to a dinner conversation topic in less than a year. But there is so much more to epidemiology than COVID-19. How can we control the spread of antimicrobial resistance? Where did an outbreak of foodborne illness originate? How will changing climate influence the spread of vector-borne disease? All these questions and more are investigated by epidemiologists (AKA disease detectives). Epidemiology is the study of incidence, distribution, causes, and control of diseases. A highly interdisciplinary field, it combines biology, public health, medicine, statistics, and more. In this intersession, you will take a deep dive into epidemiology: explore the history of infectious diseases, discover what epidemiologists do, learn how to apply key concepts, and more!

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines.

PREREQUISITES

N/A

FACILITATOR(S)

Nikki Mastrud, Alumni IMSA Student

STUDENT RESOURCES

N/A

**SESSION #: 7****TITLE:** Mental Health Podcast: Anxiety Slayers**LENGTH:** 120 minutes / Three Days**DESCRIPTION**

Podcasts come in all shapes and sizes. Some podcasts tell stories, some are funny and some are educational. As of November 2020, there are just over 1 million podcasts, but over 600 million blogs! Podcasting is a much less crowded and competitive space than blogging, making now the perfect time to get started. This session will introduce the students to the basic structure of creating a podcast, including the recording and the editing process, and uploading and promoting the podcast. Students will create a podcast about Mental Health and share it with their classmates on the last day of the session. The goal of this podcast is to include all the students who would like to share their personal stories to make the IMSA community aware of their struggles. They are also encouraged to submit their podcast to NPR's student podcast challenge.

SESSION CATEGORIES

Diversity, Equity, and Inclusion - Session promotes DEI values and perspectives, Professional Development - Session provides explicit career-focused insights and applications, Service Learning - Session provides an opportunity for students to support a community or organization, Socioemotional - Session supports student social and emotional well-being, UN Sustainable Development Goals - Session relates to the UN SDGs and/or IMSA's commitment to the UN SDGs.

PREREQUISITES

N/A

FACILITATOR(S)

Namrata Pandya, Current IMSA Faculty or Staff

STUDENT RESOURCES

N/A



SESSION #: 8

TITLE: Archaeology: History and Practice

LENGTH: 60 minutes / Three Days

DESCRIPTION

What are the modern practices of archaeology and how were they developed? What are the major archaeological discoveries of the past and of recent years? What can they tell us about world history and our present? This session will address these questions from three different angles. The first day will explore the history of archaeology as a science, from the Indiana Jones treasure hunters of the nineteenth century to the systematic excavator-researchers of today. The second day will examine the common practices of modern excavations and how to interpret the evidence. The final day will be a presentation by a professional archaeologist with time for the audience to ask questions.

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines.

PREREQUISITES

N/A

FACILITATOR(S)

Nicholas Cross, Current IMSA Faculty or Staff

Sheila Wille, Current IMSA Faculty or Staff

STUDENT RESOURCES

N/A



SESSION #: 9

TITLE: LaTeX Your Life!

LENGTH: 60 minutes / Three Days

DESCRIPTION

LaTeX is a typesetting system that is designed for the production of technical documents. In contrast to word processors (like MS Word or Google Docs), users write in a plain text markup language before "compiling" their code into an end product - similar to how one might build HTML code. Since being developed, it has become ubiquitous in many STEM-oriented fields; and many LaTeX codes are built into the equation editors of typical word processors. Best of all, it's cross-platform (Windows, MacOS, Linux, and online) and free! In this session, we will learn the basics of LaTeX; and by the end of the week, participants will be able to typeset their own simple document.

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines.

PREREQUISITES

N/A

FACILITATOR(S)

Patrick Davis, Current IMSA Faculty or Staff

Brian Trainor, Current IMSA Faculty or Staff

STUDENT RESOURCES

N/A



SESSION #: 10

TITLE: Independent Reading

LENGTH: 60 minutes / Two Days

DESCRIPTION

In the Zoom version of this popular intersession, your class will become a culture of readers. Led by Dr. Kotlarczyk, you will discuss the research on independent reading and compare it to your own experience. Mostly, you'll read.

Studies show that "independent, self-selected reading" enhances your reading comprehension, vocabulary, knowledge, and empathy. In one study, American students who frequently engaged in reading for pleasure scored higher in reading than peers who did not. A British study also found that independent reading can significantly reduce stress.

You must provide your own reading material for this session – fiction, nonfiction, poetry, graphic novels, anything. The only requirements are (1) it cannot be reading for a class or test, and (2) no screen reading unless you arrange it in advance with me, so please arrange to get your reading from a local public library or bookstore, Amazon, etc.

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines, Diversity, Equity, and Inclusion - Session promotes DEI values and perspectives, Socioemotional - Session supports student social and emotional well-being.

PREREQUISITES

N/A

FACILITATOR(S)

Adam Kotlarczyk, Current IMSA Faculty or Staff

STUDENT RESOURCES

Students must provide own reading material (see course description).



SESSION #: 11

TITLE: IMSA Cinema Challenge

LENGTH: 120 minutes / Three Days

DESCRIPTION

Come learn the various technique of media production with IMSA legends, Kevin Broy and William McGrail. Join a team, get creative and compete to win fun prizes and learn a lot in a fast paced week.

SESSION CATEGORIES

Professional Development - Session provides explicit career-focused insights and applications.

PREREQUISITES

N/A

FACILITATOR(S)

William McGrail, Current IMSA Faculty or Staff

Kevin Broy, Current IMSA Faculty or Staff

STUDENT RESOURCES

Access to Adobe Creative Suite



SESSION #: 12

TITLE: Never Have I Ever Rocked This Intersession

LENGTH: 60 minutes / Three Days

DESCRIPTION

The recent Netflix series "Never Have I Ever" received mixed reception from both critics and viewers. While on one hand, seeing an Indian-American teenager navigate normal life as the show's protagonist was a nod to better representation of frequently marginalized people, on the other hand, many viewers rejected the premise that this show in any way mirrored their experiences accurately. This session seeks a deeper look at this debate, examining episodes carefully and reading scholarly articles about the show, anticipating lively discussion from IMSA student fans and critics alike. Students taking this session are expected to have a good working knowledge of the show, and to have watched or re-watched both seasons as recently as possible to the Intersession.

SESSION CATEGORIES

Diversity, Equity, and Inclusion - Session promotes DEI values and perspectives.

PREREQUISITES

Students must have viewed both seasons of the show prior to the Intersession.

FACILITATOR(S)

Leah Kind, Current IMSA Faculty or Staff

STUDENT RESOURCES

Access to Netflix



SESSION #: 13

TITLE: Let's Get Fit

LENGTH: 60 minutes / Three Days

DESCRIPTION

Participant will come to each session with athletic wear, water bottle, and a willingness to give their best effort. You will spend the time engaging in body weight exercises to help improve your flexibility, strength, and overall cardiorespiratory fitness.

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines, Academic Support - Session provides academic support toward IMSA curriculum, Diversity, Equity, and Inclusion - Session promotes DEI values and perspectives, Professional Development - Session provides explicit career-focused insights and applications, Socioemotional - Session supports student social and emotional well-being, UN Sustainable Development Goals - Session relates to the UN SDGs and/or IMSA's commitment to the UN SDGs.

PREREQUISITES

N/A

FACILITATOR(S)

David Lundgren, Current IMSA Faculty or Staff

STUDENT RESOURCES

Activity clothes, space to perform movements, water bottle (not required), and perhaps a padded mat for ground work.



SESSION #: 14

TITLE: Project Management Skills for Life

LENGTH: 120 minutes / Three Days

DESCRIPTION

This intersession would be an introduction to Project Management skills for secondary education students. Curriculum has been developed by the Project Management Institute education foundation (PMIef) and will be adapted for a 3 day, 2 hr/day course. We will cover the basics of Project Management and learn how to apply these skills to school and everyday life. Students will participate in exercises as well as coming up with their own examples of how to apply these skills in their daily life.

SESSION CATEGORIES

Professional Development - Session provides explicit career-focused insights and applications.

PREREQUISITES

N/A

FACILITATOR(S)

Mangaiah Chowdary Garikapati, Project Management Institute, conducted same session on 2019.

Andrea Franks, Alumni IMSA Parent

STUDENT RESOURCES

N/A



SESSION #: 15

TITLE: Utopia/Dystopia: (Im)Perfect Worlds, Their Origins, and Their Meaning

LENGTH: 60 minutes / Three Days

DESCRIPTION

From Thomas More's original Utopia and Thomas Bacon's New Atlantis to the dystopias of Evgeny Zemyatin's We and George Orwell's 1984, stories of humanity's potential perfections and looming failures pervade literature, history, and philosophy. Today, the tension between utopia and dystopia is evident across media, from anime and Afrofuturism to The Good Place and Black Mirror. What makes a story by definition utopian or dystopian? How do such tales fit into this larger history and into their own broader context? In this intersession, students will explore these questions and work up their own utopian and dystopian scenarios to discuss with the class.

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines, Diversity, Equity, and Inclusion - Session promotes DEI values and perspectives.

PREREQUISITES

N/A

FACILITATOR(S)

Eric Smith, Current IMSA Faculty or Staff

Tracy Townsend, Current IMSA Faculty or Staff

STUDENT RESOURCES

N/A



SESSION #: 16

TITLE: 1984 in 2022

LENGTH: 60 minutes / Three Days

DESCRIPTION

Voices on the left and right have proclaimed we're living in an Orwellian era. "Trump is playing an Orwellian numbers game," one critic of Trump wrote just before the January 6th insurrection, referring to 1984's famous equation of totalitarianism: $2 + 2 = 5$. Days after, when Twitter suspended his father's account permanently, Donald Trump, Jr. tweeted, "We are living in Orwell's 1984." After the New York Times declared that "Orwellian" has become "an All-Purpose Insult," Vox.com complained that "The word 'Orwellian' has lost all meaning." In this course, students will gather to discuss Orwell's novel and his essay "Politics and the English Language." Then, we'll explore debates about how and why 1984 resonates today and try to understand what people talk about when they talk about Orwell. If they haven't already, students should plan to read the novel over winter break—copies can be borrowed from the English department.

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic discipline.

PREREQUISITES

N/A

FACILITATOR(S)

Eric Rettberg, Current IMSA Faculty or Staff

STUDENT RESOURCES

A copy of 1984. Students can borrow a copy from the English Department prior to winter break.



SESSION #: 17

TITLE: Three Ethical Schools in Three Sessions: Utility, Kant and Rawls

LENGTH: 60 minutes / Three Days

DESCRIPTION

This intersession will give the participants a brief introduction to the three most influential schools of ethical thought in the modern world. As the title states: that is Kant's Categorical Imperative, the several notions of Utility, and Rawls "Justice as Fairness." This will be done with a brief reading for each (given) and a class session that combines lecture and discussion.

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines.

PREREQUISITES

N/A

FACILITATOR(S)

Lee W. Eysturlid, Current IMSA Faculty or Staff

STUDENT RESOURCES

N/A



SESSION #: 18

TITLE: A + M +F2 Art Plus Music Equals Fun Squared

LENGTH: 60 minutes / Three Days

DESCRIPTION

Students will have the opportunity to create a Fine Arts (Visual Arts or Music) Portfolio or Journal. They will learn to construct the physical binder of the materials as well as will develop a personal plan for the contents. On-going stress relief and fun is found within the creative process of drawing, painting, playing, performing and composing music, as well as through stream of consciousness thoughts, exploration and experimentation. The Journal will be representative of individual thoughts and culture as well as of personal Fine Arts' work. In addition, if fully developed, the Visual Arts or Music portfolios can be used to demonstrate arts proficiency, during the College Admissions process.

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines.

PREREQUISITES

N/A

FACILITATOR(S)

Joyce Symoniak, Current IMSA Faculty or Staff

Mary Beth McCarthy, Current IMSA Faculty or Staff

STUDENT RESOURCES

N/A



SESSION #: 19

TITLE: Breaking the Gender Barrier at 1000 Miles per Hour

LENGTH: 120 minutes / One Day

DESCRIPTION

Female Navy fighter pilot Alex Dietrich, an IMSA alumnus (class of '97) and Lieutenant Commander in the United States Navy, joins Dr. Dave DeVol (IMSA chemistry faculty) in leading a discussion on changing the stereotypical perception of female roles in society. Alex was featured in the PBS documentary "Carrier", and has been a Military Instructor at the United States Naval Academy, teaching Leadership & Ethics. Alex and Dave hope to engage students in a discussion on the changing roles of females in society. We plan to watch clips of the documentary "Carrier", and also discuss the ideas behind "Lean In", providing students with practical tools to take with them. Students will hopefully gain a new perspective on this important topic.

SESSION CATEGORIES

Diversity, Equity, and Inclusion - Session promotes DEI values and perspectives, Socioemotional - Session supports student social and emotional well-being.

PREREQUISITES

N/A

FACILITATOR(S)

Dave DeVol, Current IMSA Faculty or Staff

Alex Dietrich, Alumni IMSA Student

STUDENT RESOURCES

N/A



SESSION #: 20

TITLE: Help Two Joes Build a Space Colony

LENGTH: 120 minutes / Three Days

DESCRIPTION

You and your team are heading to space! You and your classmates will work in groups to establish a human settlement on the Moon. You will grapple with the issues that make space colonization so hostile to human life. You will imagine what your settlement and the daily life of its inhabitants would look like given the environmental conditions imposed by your specific location. Along the way, you will invent new technologies, ensure the mental and social well-being of your colonists, and propose solutions to the physical dangers for human life such as radiation exposure and extreme temperature. You will also determine how to provide the material needs required to support a human civilization at your distant locale. Don't let Elon Musk be the only one to settle space! Join two Joes as we head for the stars!

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines, UN Sustainable Development Goals - Session relates to the UN SDGs and/or IMSA's commitment to the UN SDGs.

PREREQUISITES

N/A

FACILITATOR(S)

Joseph T Golab, Current IMSA Faculty or Staff

Joseph Marshall, Current IMSA Faculty or Staff

STUDENT RESOURCES

N/A



SESSION #: 21

TITLE: The Spectrum: Examining the Complexities of Sex, Gender, and Orientation through the Lens of Biology

LENGTH: 120 minutes / Three Days

DESCRIPTION

As human beings, we like to organize things into categories. Colors, shapes, subject areas in school, clothing in our dresser drawers, and the list goes on. But when it comes to biology, sometimes categories are not as clear cut as we think. Life doesn't like to be put in boxes! This is especially true when we talk about things like sexual development, and some of the biological and environmental connections to gender identity, gender expression, and sexual orientation, which tend to exist in more of a spectrum. In this intersession, we'll talk about the basics of sexual development and the evolution of sexual dimorphism, and then move on to look at current research related to understanding how this all connects to concepts like gender identity, gender expression, and sexual orientation in humans and other examples from the animal kingdom.

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines, Diversity, Equity, and Inclusion - Session promotes DEI values and perspectives.

PREREQUISITES

N/A

FACILITATOR(S)

Sarah O'Leary-Driscoll, Current IMSA Faculty or Staff

STUDENT RESOURCES

N/A



SESSION #: 22

TITLE: Introduction to Quantum Computing

LENGTH: 120 minutes / Three Days

DESCRIPTION

Participants will get an introduction to the concepts behind quantum computing. They will learn what a qubit is, how it differs from a classical bit, and what the quantum gate model is. Students will dive into creating their own quantum circuits using the cirq framework within a python notebook. We will survey the most well-known quantum algorithms and explore several ways people have attempted to build a quantum device.

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines.

PREREQUISITES

CSI or basic Python knowledge, MI-2, understanding matrix multiplication.

FACILITATOR(S)

Doug Strain, Alumni IMSA Student

Patankar Phadmankar, Current IMSA Faculty or Staff

Anastasia Perry, Current IMSA Faculty or Staff

STUDENT RESOURCES

N/A



SESSION #: 23

TITLE: The Lost Art of Listening

LENGTH: 120 minutes / Three Days

DESCRIPTION

Modern technology has made an incredible array of music available to everyone, with the result that most of our lives have a constant soundtrack – leading us to think of music as a background or support for something more important. But for millennia past, listening to music has been an activity in itself, not to help students study or create ambience in a restaurant. Working remotely limits what we can do with music, but we can definitely listen! In this class, we will learn to appreciate music for its own sake, with nothing else going on, and how to talk about it. Mostly, though, we will listen to it, building up stamina for simply listening in a music-saturated world.

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines, Socioemotional - Session supports student social and emotional well-being.

PREREQUISITES

N/A

FACILITATOR(S)

Peter Dong, Current IMSA Faculty or Staff

STUDENT RESOURCES

N/A



SESSION #: 24

TITLE: Rubisco Activase Student Inquiry and Research

LENGTH: 60 minutes / Three Days

DESCRIPTION

This intersession is for students currently working with either Dr. Stainbrook and/or Dr. Ahrendt in SIR. Students will 1) read scientific papers and present them to the group, and 2) spend time planning their experiments for the spring semester.

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines, UN Sustainable Development Goals - Session relates to the UN SDGs and/or IMSA's commitment to the UN SDGs.

PREREQUISITES

Yes. They must currently be enrolled in SIR with either Dr. Ahrendt or Dr. Stainbrook as their research mentor.

FACILITATOR(S)

Angie Ahrendt, Current IMSA Faculty or Staff

STUDENT RESOURCES

N/A



SESSION #: 25

TITLE: Activism Is for Everyone: Fighting for Issues that Matter

LENGTH: 60 minutes / Three Days

DESCRIPTION

Democracy is not a spectator sport! Most Americans have never called their Congressional Representative, and many don't even know who their Senator or Congressperson is. This non-partisan intersession will help you figure out which issues matter most to you, how to find reliable and truthful information on these issues, and how to use your voice to create change! It is the responsibility of each of us to be civically engaged, and this intersession will give you the tools you need to become politically active. All materials will be provided: short readings, videos, and a guest speaker (a recent IMSA alum) who can share her experiences as an activist at IMSA and in college. Our concluding activity will be to reach out to a leader in your home community, or the county, state or national level to advocate for issues that you care deeply about.

SESSION CATEGORIES

Diversity, Equity, and Inclusion - Session promotes DEI values and perspectives, Service Learning - Session provides an opportunity for students to support a community or organization, Socioemotional - Session supports student social and emotional well-being.

PREREQUISITES

N/A

FACILITATOR(S)

Erin Micklo, Current IMSA Faculty or Staff

Connie James-Jenkin, Current IMSA Faculty or Staff

STUDENT RESOURCES

N/A



SESSION #: 26

TITLE: Art Meets Activism

LENGTH: 60 minutes / Three Days

DESCRIPTION

In this session, students will explore the ways in which art and performance in Central and South America have been used as part of activists' pursuits of social justice. By the end of the session, students will be able to describe, analyze and interpret artwork and evaluate the content of works of art while comparing it to art / activism they may be more familiar with in the US.

SESSION CATEGORIES

Diversity, Equity, and Inclusion - Session promotes DEI values and perspectives.

PREREQUISITES

N/A

FACILITATOR(S)

Mary Zuidema, Current IMSA Faculty or Staff

Marta Kaluza, Current IMSA Faculty or Staff

STUDENT RESOURCES

N/A



SESSION #: 27

TITLE: Build-A-Business TALENT Intersession

LENGTH: 120 minutes / Three Days

DESCRIPTION

The TALENT Intersession program is a full-time (120 min /3 day) intersession that teaches the fundamentals of entrepreneurship. Participants will engage in a series of modules that cover topics, such as ideation, the BML cycle and product development. The course is structured around lecture-based facilitation and group activities. This experience will equip you with the skills and entrepreneurial theories necessary to develop your own startup.

Students who have completed TALENT's INC program are NOT eligible to participate in Intersession. Participants who complete the TALENT Intersession will be eligible to apply for TALENT's THINK program second semester.

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines, Professional Development - Session provides explicit career-focused insights and applications.

PREREQUISITES

N/A

FACILITATOR(S)

Steve Goldblatt, Current IMSA Faculty or Staff

Eunice Kim, Current IMSA Student

Christo Ekimov, Current IMSA Student

STUDENT RESOURCES

N/A



SESSION #: 28

TITLE: The Tao of Success: College, Career, and Beyond

LENGTH: 60 minutes / Three Days

DESCRIPTION

In this interactive workshop, you will learn how to discover your strengths and passions, nurture creativity, and create a mission statement for a happy, successful life.

Sophomores and juniors will learn how to develop leadership skills, explore careers, and choose extracurricular activities that are impressive to college admissions officers.

Seniors will learn how they can make the most of their time in college, explore careers, and find meaningful internships and jobs.

Students will participate in self-reflection exercises, watch videos, and collaborate with other students during breakout sessions.

There will also be time to for general questions on college admissions: essay writing, resume preparation, interviews, finding scholarships, negotiating financial aid, and more.

We will draw upon the work of popular undergraduate classes at top universities:

- UC-Berkeley: “The Science of Happiness”
- Stanford University: “Designing Your Life: How to Build a Well-Lived, Joyful Life”

SESSION CATEGORIES

Professional Development - Session provides explicit career-focused insights and applications,
Socioemotional - Session supports student social and emotional well-being.

PREREQUISITES

N/A

FACILITATOR(S)

Sonia Lal, Alumni IMSA Student

STUDENT RESOURCES

N/A



SESSION #: 29

TITLE: Teaching Your Computer to Play Games

LENGTH: 120 minutes / Three Days

DESCRIPTION

One of the most natural applications of artificial intelligence is playing games, since their clear rules and simple win conditions are much more straightforward than more complicated tasks like facial recognition or natural language processing. In short, computers are really good at games. In this class, students will learn some basic AI techniques for simple games and will develop algorithms to compete against each other - because both computers and humans like to win. Based on last year's Intersession by Albert Lu.

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines.

PREREQUISITES

Familiarity with Python at the level of CSI.

FACILITATOR(S)

Peter Dong, Current IMSA Faculty or Staff

STUDENT RESOURCES

N/A



SESSION #: 30

TITLE: A Mathematically Supported Launch

LENGTH: 60 minutes / Two Days

DESCRIPTION

Was your first semester returning to in-person math a little rough? Did you leave topics on shaky ground that you will need to rely on in the next course? Let's plan for an even stronger second semester! This session will give you the opportunity to work with math faculty to celebrate your wins and formulate specific adjustments to your study patterns to generate even more successes during the spring semester. We will also have some fun with math and review content areas as demand warrants. This might include specific topics or problems that were left in question from the fall semester or other areas of interest to participants as they relate to the upcoming semester's topics.

SESSION CATEGORIES

Academic Support - Session provides academic support toward IMSA curriculum.

PREREQUISITES

N/A

FACILITATOR(S)

Janice Krouse, Current IMSA Faculty or Staff

Tina Loos, Current IMSA Faculty or Staff

STUDENT RESOURCES

N/A



SESSION #: 31

TITLE: Problem Solving Through Puzzles

LENGTH: 120 minutes / Three Days

DESCRIPTION

Do you like trying to make sense of apparent complete gibberish: "read per sat range sails bet hone"? If so, this intersession is for you! We will spend our time solving puzzles. A puzzle can be anything from incomprehensible-looking text to a crossword to a logic puzzle such as a sudoku to a crossword that is also a logic puzzle. Along the way, we will learn some problem solving techniques and see what puzzles can teach us about effective communication.

The puzzles will be different from last year's, so students who attended last year's session are welcome to attend again.

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines, Socioemotional - Session supports student social and emotional well-being.

PREREQUISITES

N/A

FACILITATOR(S)

Daniel Gulotta, Alumni IMSA Student

STUDENT RESOURCES

N/A



SESSION #: 32

TITLE: Zombology 101

LENGTH: 60 minutes / Three Days

DESCRIPTION

Have you ever wondered if you could survive the zombie apocalypse? How fast do they move? How does a zombie spread its infection? Learn the answers to these questions and more in Zombology 101. This intersession will explore the cultural and scientific realities surrounding the creature known as “the zombie.”

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines, Academic Support - Session provides academic support toward IMSA curriculum.

PREREQUISITES

No academic prerequisites. The intersession will involve images and descriptions of gruesome circumstances due to the nature of the topic. Students sensitive to simulated violence and death should avoid this intersession.

FACILITATOR(S)

Michael Dean, Current IMSA Faculty or Staff

Crystal Randall, Current IMSA Faculty or Staff

STUDENT RESOURCES

N/A



SESSION #: 33

TITLE: Minecraft Science

LENGTH: 120 minutes / Two Days

DESCRIPTION

In this Intersession, we will learn to build Redstone structures in the game of Minecraft. Minecraft is a very popular video game. Players can focus on different things such as surviving, farming by hand, landscaping, etc. We in this Intersession will be exploring the game from a science perspective. We will be working with the Redstone components, building structures such as automatic farms. You will find many similarities between the Redstone in Minecraft, and the electric circuits in physics. Join us to learn about the science in Minecraft, and become an in-game engineer! Students who register for this Intersession should be willing to work with each other, think logically and critically to really understand the working mechanisms behind any Redstone structures that they build. Students may need to spend time outside to the Intersession meet time to research, work with each other, and complete their projects.

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines, Professional Development - Session provides explicit career-focused insights and applications.

PREREQUISITES

N/A

FACILITATOR(S)

Lingyi Meng, Current IMSA Faculty or Staff

STUDENT RESOURCES

Each student needs to own the game Minecraft

**SESSION #: 34****TITLE:** Introduction to Critical Race Theory in Education Research**LENGTH:** 60 minutes / Three Days**DESCRIPTION**

The three-day session will cover an introduction to Critical Race Theory concepts, the utilization of CRT in the field of education, and research applications of CRT in K12 classrooms and districts. The first 60-minute session is mainly lecture with a brief discussion focused on the tenets of CRT and the field of education. The second 60-minute session has a brief lecture on CRT in education and research, followed by small and large group discussions connecting students' experiences with the CRT concepts and how they apply to the CRT framework. The final session will be students working in groups to design research questions and choose research methods using CRT as a theoretical framework. Students will create power points and share their 'research designs' with the group in the final 60-minute session. Students will be required to read journal articles and book chapters before the start of the session and during the 3-days of the course. Students will also have a small assignment outside the designated class time of the session to prepare for the group presentations.

SESSION GOALS

- To familiarize students with Critical Race Theory concepts.
- To familiarize students with CRT research applications in education.

STUDENT OUTCOMES

1. Students will be able to identify specific tenets of Critical Race Theory.
2. Students will be able to articulate different ways education researchers have used CRT to address education inequity in K12 classrooms and districts.

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines, Diversity, Equity, and Inclusion - Session promotes DEI values and perspectives.

PREREQUISITES

N/A

FACILITATOR(S)

Thandeka K. Chapman, Alumni IMSA Student

STUDENT RESOURCES

N/A



SESSION #: 35

TITLE: 'The Tragedy of Macbeth', Film Screening and Discussion

LENGTH: 120 minutes / Two Days

DESCRIPTION

On Friday, Jan 14, Joel Coen's production of Shakespeare's 'The Tragedy of Macbeth' will be released for streaming. The film stars Denzel Washington as Macbeth and Frances McDormand as Lady Macbeth. You can see the preview here: <https://www.youtube.com/watch?v=FkbPOwaETmY>.

In our first meeting, we will discuss the Shakespeare's play, analyzing the themes and characters, developing our own interpretations of scenes, and contextualizing the text within a historical framework. On Friday, we will watch the film together.

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines.

PREREQUISITES

N/A

FACILITATOR(S)

Devon Madon, Current IMSA Faculty or Staff

STUDENT RESOURCES

N/A



SESSION #: 36

TITLE: Neurosurgery for Makers: Emerging Technologies in Brain Surgery

LENGTH: 60 minutes / One Day

DESCRIPTION

No biology here - we'll explore the technological frontiers of brain surgery. After a whirlwind review of the state of the art in neurosurgery tech, we'll discuss how the hacker ethic can be applied to medical innovations - CAD design & 3D printing for making surgical tools & trainers, 3D modeling & virtual reality (with Unity) for surgery planning, Arduino microcontroller sensors for brain surgery, and more.

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines, Professional Development - Session provides explicit career-focused insights and applications.

PREREQUISITES

N/A

FACILITATOR(S)

Steven Wakeman, Alumni IMSA Faculty or Staff

STUDENT RESOURCES

N/A



SESSION #: 37

TITLE: Game Theory: A Fun Introduction

LENGTH: 120 minutes / Two Days

DESCRIPTION

Game Theory is an approach to the study of strategic interaction that relies on the language of mathematics to help us be more precise in our discussions about the inherently chaotic social world around us. From international politics to economics, college applications to "what's for dinner", we all are game theorists. This will be a fun introduction to the topic.

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines, UN Sustainable Development Goals - Session relates to the UN SDGs and/or IMSA's commitment to the UN SDGs.

PREREQUISITES

N/A

FACILITATOR(S)

Patrick Kearney, Current IMSA Faculty or Staff

STUDENT RESOURCES

N/A



SESSION #: 38

TITLE: Study Smarter, Not Harder: Research-Based Tips for Powerful Learning

LENGTH: 60 minutes / One Day

DESCRIPTION

Are you ready to study smarter, not harder? Drawing on more than 100 years of research, Dr. Pooja K. Agarwal (IMSA Class of 2001, @RetrieveLearn), a cognitive scientist and college professor, shares evidence-based study strategies that you can implement in less than a minute, increasing your long-term learning. Take your learning to the next level: remember more, and study less!

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines, Academic Support - Session provides academic support toward IMSA curriculum, Professional Development - Session provides explicit career-focused insights and applications, Socioemotional - Session supports student social and emotional well-being.

PREREQUISITES

N/A

FACILITATOR(S)

Pooja Agarwal, Alumni IMSA Student

STUDENT RESOURCES

N/A



SESSION #: 39

TITLE: Polski in Three Days!

LENGTH: 120 minutes / Three Days

DESCRIPTION

This intersession will introduce students to language and culture of Poland. Participants will learn basics of Polish with an emphasis on speaking and communication. They will explore different aspects of Polish culture and Polish contributions to science, literature, modern society and entrepreneurship while learning "the hardest language to learn in the world." Learn to love the consonants, diacritics and over-dots! "From zero to hero" in just three days!

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines, Diversity, Equity, and Inclusion - Session promotes DEI values and perspectives.

PREREQUISITES

N/A

FACILITATOR(S)

Agnieszka Michalak, Current IMSA Faculty or Staff

STUDENT RESOURCES

N/A



SESSION #: 40

TITLE: Introduction to American Sign Language and Deaf Culture

LENGTH: 60 minutes / Three Days

DESCRIPTION

Though used by half a million individuals across the nation, American Sign Language (ASL) is rarely taught in traditional high schools, leaving students struggling to participate in conversations with their deaf peers.

In this intersession, students will be given a unique opportunity to learn from an experienced instructor on the fundamentals of ASL, including basic grammar, vocabulary, syntax, and structure. Students will also learn about deaf culture and its history, from key moments to notable figures.

By the end of the session, students will be able to hold a conversation with their peers, sign a favorite topic, and/or even jam out to a favorite song with ASL!

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines, Diversity, Equity, and Inclusion - Session promotes DEI values and perspectives.

PREREQUISITES

N/A

FACILITATOR(S)

Camille Ouellette, Alumni IMSA Student

Dhruv Patel, Current IMSA Student

Jai Sutaria, Current IMSA Student

STUDENT RESOURCES

N/A



SESSION #: 41

TITLE: Morris Jig Workshop

LENGTH: 120 minutes / One Day

DESCRIPTION

The Morris was danced by Shakespeare, English suffragettes, and Terry Pratchett’s Ninja Morris Men of New Ankh. It’s also a living tradition, enjoyed by teams around the world today. While usually danced in sets of 4 to 8 people, this English folk dance tradition also includes a number of solo dances, called “jigs,” which dancers use to show off their individual skills. In this workshop, Ms. Pierrehumbert – a member of Pullman Morris & Sword for the past 5 years – will teach you the fundamental steps of this dance form and one or two traditional jigs. Come leap high, flap hankies, and welcome the new year with music and movement! The joy of Morris dancing can’t be described, only experienced.

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines, Socioemotional - Session supports student social and emotional well-being.

PREREQUISITES

N/A

FACILITATOR(S)

Nadia Pierrehumbert, Current IMSA Faculty or Staff

STUDENT RESOURCES

2 square pieces of cloth, such as dinner napkins or bandanas (optional, but recommended).



SESSION #: 42

TITLE: Bread Baking: Science and Craft

LENGTH: 120 minutes / Two Days

DESCRIPTION

In this intersession, we will bake bread. We will start with an enriched bread such as challah or cinnamon buns, learning the fundamentals of mixing, kneading, rising, and shaping dough. On the second day you will work on a bread of your choice, including options such as crusty artisan-style bread, pizza dough, rye bread, or even bagels (if you're feeling ambitious!). Along the way, we'll observe and discuss the chemistry and biology of what happens as the bread evolves from raw ingredients to its final loaf form. By the end of the intersession, you will have produced two loaves of bread from scratch and gained the skills to bake more of it on your own.

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines, UN Sustainable Development Goals - Session relates to the UN SDGs and/or IMSA's commitment to the UN SDGs.

PREREQUISITES

N/A

FACILITATOR(S)

Nadia Pierrehumbert, Current IMSA Faculty or Staff

STUDENT RESOURCES

Required: Flour, salt, yeast, and a baking pan or baking sheet. Recommended: Variety of ingredients such as butter/oil, sugar, and/or eggs. Bread recipes are flexible and can be adapted based on dietary requirements and what ingredients are available.



SESSION #: 43

TITLE: Drug Discovery SIR

LENGTH: 60 minutes / One Day

DESCRIPTION

Our Drug Discovery research group's goal is to design unique compounds that have the capacity to combat diseases for a wide range of disorders. Drug discovery is the process through which potential new medicines are identified. It involves a wide range of scientific disciplines, including biology, chemistry and pharmacology. Our group has collaborations with the pharmaceutical industry and academics institutions.

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines, UN Sustainable Development Goals - Session relates to the UN SDGs and/or IMSA's commitment to the UN SDGs.

PREREQUISITES

Must be enrolled in the Drug Discovery SIR group for the 2021-2022 school year.

FACILITATOR(S)

John Thurmond, Current IMSA Faculty or Staff

STUDENT RESOURCES

N/A



SESSION #: 44

TITLE: Eight Current Mysteries of Modern Astronomy

LENGTH: 60 minutes / One Day

DESCRIPTION

A brief discussion of 8 mysteries of Astronomy, offering ideas for future research, philosophical debates, historical and cultural research, or hours of coffee shop discussion presented in a down-to-earth manner with a slight touch of humor. Each mystery will be explained with possibilities for avenues of research.

Topics covered:

The Pleiades: Many cultures conceived similar origin myths, coincidence?

Olber's Paradox: Why is the night sky dark if it is filled with infinite number of stars?

Fermi's Paradox: Where are the Aliens?

Arp galaxies: Evidence of a steady-state universe?

Binary Star System: Why is the small one always eating the big one? How can we know?

Globular clusters: What are they? Where did they come from and how are all the stars all the same?

Gravity: The final(?) unknown force? Will interferometry be the key to unlock the last mystery?

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines, Professional

Development - Session provides explicit career-focused insights and applications.

PREREQUISITES

N/A

FACILITATOR(S)

Sean Cunneen, Current IMSA Parent

Evelyn Cunneen, Current IMSA Student

STUDENT RESOURCES

N/A



SESSION #: 45

TITLE: How Does Sauce Make Food Delicious?

LENGTH: 120 minutes / Two Days

DESCRIPTION

Sauce is a liquid, cream, or semi-solid food, served on other foods to add flavor and visual appeal. Sauce (called dressings when used for salad) enriches the insipid vegetables, magics the flavor of meat, and inspires you with exotic tastes. This session introduces the history of sauce in different cuisines, chemistry and function of key ingredients, formula and processing, and sensory evaluation. Food hygiene and safety, ingredient list and nutrition facts label are briefed as well. Students can try to make sauces in this session.

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines, Diversity, Equity, and Inclusion - Session promotes DEI values and perspectives, Professional Development - Session provides explicit career-focused insights and applications, Socioemotional - Session supports student social and emotional well-being.

PREREQUISITES

N/A

FACILITATOR(S)

Weichang Liu, Current IMSA Parent

STUDENT RESOURCES

Access to a blender and ingredients.



SESSION #: 46

TITLE: Mathematics in Card Play

LENGTH: 120 minutes / Two Days

DESCRIPTION

We will play Euchre, Spades and maybe Whist. All games are trick taking which include counting cards and calculating probabilities. They will require strategical and logical thinking. Students will be active in learning and playing games. We will discuss and employ strategies specific to these games but are common to any trick taking game. Students will learn about trump, finessing, leading, signaling to your partner, card counting, cross roughing and other ideas.

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines, Socioemotional - Session supports student social and emotional well-being.

PREREQUISITES

N/A

FACILITATOR(S)

Evan Brummet, Current IMSA Faculty or Staff

Marti Shirley, Current IMSA Faculty or Staff

STUDENT RESOURCES

N/A



SESSION #: 47

TITLE: Identify a Passion, Take a Leap

LENGTH: 120 minutes / One Day

DESCRIPTION

This is a highly interactive workshop that will help you identify something you want to learn or do and steps you can take to bring that project to life. We'll use a tool called the Leap Map, which has helped everyone from professionals in Fortune 500 companies to high school students to students at Stanford, identify and carry out fun projects (like learning to play the ukulele, starting a chocolate business, taking a 50-mile bike trip from Chicago to Wisconsin, etc.). What will you do? You decide - come to the workshop and craft a plan for your next adventure.

SESSION CATEGORIES

Professional Development - Session provides explicit career-focused insights and applications.

PREREQUISITES

N/A

FACILITATOR(S)

Aaron Wilson-Ahlstrom, Current IMSA Parent

STUDENT RESOURCES

N/A



SESSION #: 48

TITLE: To Secrete or Not Secrete – When Bugs Meet Colonic Cells

LENGTH: 60 minutes / One Day

DESCRIPTION

Dr. Jayashree Sarathy, Associate Professor, Department Head of Biology, and Director of Graduate Studies at Benedictine University will teach a class on the cellular and molecular regulation of ion transport. Ion regulation and transport are important in defining the fundamental physiological processes of fluid absorption and secretion, which can pertain to a wide variety of epithelial cell functions ranging from mammary to colonic cells. She will also share her current research findings. She and her students are using model systems including a human colon carcinoma cell-line (T84 cells) and mouse mammary epithelial cells (HC11) to elucidate these processes in the lab. Her current work also explores the intestinal microbiome and the effects of probiotics on these processes. Aberrations in fluid regulation can result in some of the most devastating forms of diarrhea in a variety of species and understanding these processes will aid in the design of new therapeutic strategies.

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines, UN Sustainable Development Goals - Session relates to the UN SDGs and/or IMSA's commitment to the UN SDGs.

PREREQUISITES

N/A

FACILITATOR(S)

Dr. Tanya Crum, Current IMSA Faculty or Staff

Jayashree Sarathy, IMSA Partner

STUDENT RESOURCES

N/A



SESSION #: 49

TITLE: Sportswriting

LENGTH: 120 minutes / Three Days

DESCRIPTION

Do you love sports but you're not sure how to start writing about it? Whether you want to write for a newspaper or start your own sports blog, we'll talk about how you can build your brand as a sportswriter. The topics we will cover include the different types of sportswriters and how to get into the industry, common journalistic vocabulary, how to network with teams and interview athletes, guidance on researching and journalism ethics. You'll get the chance to write an article and will be provided feedback. We'll also have a guest speaker available for a Q&A. Want to work the beat for a team? Do you love stats and want to know how to write a data-heavy analysis piece? Maybe you desire to be a snarky columnist? This course may just be the pitch to help you hit it out of the park!

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines, Professional Development - Session provides explicit career-focused insights and applications.

PREREQUISITES

N/A

FACILITATOR(S)

Richard Bergstrom, Alumni IMSA Student

STUDENT RESOURCES

N/A

SESSION #: 50

TITLE: Drawing from Japanese Literature: Illustration Bootcamp

LENGTH: 120 minutes / Three Days

DESCRIPTION

How do Japanese literary texts work and how might we reverse-engineer them to design stories of our own? This Illustration Bootcamp blends critical analysis with creative work, prioritizing hands-on exploration to teach students about Japanese literature, visual culture, and the mechanics of dynamic storytelling. In this intensive workshop we will study Japanese art forms to glean techniques for illustrating literary texts. Specifically, we will dissect Tanizaki Jun'ichirō's short story "The Tattooer" (1910) and then attempt to illustrate it. Through a range of individual and group exercises, students will learn how to read non-Western literature closely and then translate their insights into components like plotting, layout, storyboarding, and inking. This intensive workshop will train you to become better critical readers of Japanese literature through practice-based creative work. By the end of the course your skills of analysis and communication—oral, written, and visual—will have improved substantially. You'll also be better artists!

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines, Academic Support - Session provides academic support toward IMSA curriculum, Diversity, Equity, and Inclusion - Session promotes DEI values and perspectives, Socioemotional - Session supports student social and emotional well-being.

PREREQUISITES

Prior to the first class, students will read the short Tanizaki story "The Tattooer" (1910). Students should be aware that the text engages in some sensitive topics of violence and sexuality, and should not select this session if with such topics.

FACILITATOR(S)

Reginald Jackson, Alumni IMSA Student

STUDENT RESOURCES

Students will need some drawing medium (digital is fine, though not ideal) and tools. I would recommend a sketchbook (at least 7"x 9", with good paper weight, i.e. at least 80lb., for inking), or loose leaf unlined paper, and drawing utensils of your choosing (e.g. a pencil and pens/fineliners/markers for inking).



SESSION #: 51

TITLE: FTC Robotics Intersession

LENGTH: 120 minutes / Three Days

DESCRIPTION

This intersession is meant for students on the IMSA FTC robotics team. During this time, students will design, build, and program an 18x18x18 in robot to complete tasks on a 12x12ft playing field. Students will also work on having proper documentation of everything they do in a 15-page engineering portfolio, and start preparation for the judging interview at our regional competition.

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines, Professional Development - Session provides explicit career-focused insights and applications.

PREREQUISITES

Must be a member of the IMSA FTC robotics team.

FACILITATOR(S)

Shane Cowsert, Current IMSA Faculty or Staff

Advait Patel, Current IMSA Student

Grant Bell, Current IMSA Faculty or Staff

STUDENT RESOURCES

N/A



SESSION #: 52

TITLE: Building Discord Bots

LENGTH: 120 minutes / Three Days

DESCRIPTION

Learn how to program a bot that you can use with your friends on Discord! Discord bots can do all sorts of things on a server, like managing channels, kicking members, reading and writing messages, sending emoji reactions, attaching files, or even speaking in a voice chat. These technologies can be misused, so we will also learn about creating safe bots that your community can trust. You can brainstorm ideas for your Discord bot or use one of our ideas. Our team of three alumni programmers will help you as you implement your bot so you can improve as a programmer and make something cool to share with others! We recommend that students have some experience with Python before taking this intersession, whether self-taught or through a course.

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines, Professional Development - Session provides explicit career-focused insights and applications, Socioemotional - Session supports student social and emotional well-being.

PREREQUISITES

We recommend that students have some experience with Python before taking this intersession, whether self-taught or through a course.

FACILITATOR(S)

Vinesh Kannan, Alumni IMSA Student

Rakesh Chatrath, Alumni IMSA Student

Ryan Eberhardt, Alumni IMSA Student

STUDENT RESOURCES

N/A



SESSION #: 53

TITLE: Data for Black Lives: Applying Anti-Racism to Technology and Medicine

LENGTH: 60 minutes / Three Days

DESCRIPTION

Machine learning, data science, and artificial intelligence are taking over in the tech space. But at what cost? Who is left out of the tech conversation, both as consumers and creators? How do biased technologies affect healthcare and the outcomes of Black and Brown patients? How do these biases add together with implicit biases from healthcare providers? In this intersession, you will learn about the intersections of race, technology, and medicine, from predictive policing models that target Black people to standard medical devices that work worse for dark skin and coarse, curly hair. We will discuss the very real societal implications of these technologies on Black and Brown lives, all women, disabled folks, LGBTQIA+ communities, and the poor.

Come with an open mind, a critical eye, and a willingness to think both as a technologist and a humanitarian.

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines, Diversity, Equity, and Inclusion - Session promotes DEI values and perspectives, Professional Development - Session provides explicit career-focused insights and applications, UN Sustainable Development Goals - Session relates to the UN SDGs and/or IMSA's commitment to the UN SDGs.

PREREQUISITES

N/A

FACILITATOR(S)

Jasmine kwasa, Alumni IMSA Student

STUDENT RESOURCES

Optional: Copy of the book Algorithms of Oppression by Safiya Noble.



SESSION #: 54

TITLE: Protecting Innovation and Creative Works: An Intro to Intellectual Property Law

LENGTH: 120 minutes / Three Days

DESCRIPTION

This session will provide an introduction to intellectual property (IP) law including the areas of patent, trademark, and copyright. Students will learn basic principles of using the law to protect innovation and creative works, including inventions, innovations, research, or marketing. Students who might be interested in the legal profession will learn how their IMSA STEM education can help them in a future career in IP law. We will also have diverse guest speakers who are IP lawyers for innovative companies. Throughout the course, we will discuss how issues of implicit bias and diversity, inclusion, and equity come up in this legal area and ways to address or incorporate them.

SESSION CATEGORIES

Diversity, Equity, and Inclusion - Session promotes DEI values and perspectives, Professional Development - Session provides explicit career-focused insights and applications.

PREREQUISITES

N/A

FACILITATOR(S)

Ann Chen, Alumni IMSA Student

STUDENT RESOURCES

N/A



SESSION #: 55

TITLE: Introduction to Astronomy Research

LENGTH: 60 minutes / Two Days

DESCRIPTION

Have you ever wondered how one does research in astronomy? Is it possible for high school students to engage in astronomical research? This intersession will introduce students to various astronomical topics, including exo-planets, pulsars, and other aspects of stellar evolution. We also will explore a few methods of how research is conducted in these fields. No previous knowledge is required and students do not need to pursue research in this realm. Yet, if one is interested in doing so, this intersession might be a useful introduction to the field.

SESSION CATEGORIES

Academic - Session provides additional insight and inquiry into academic disciplines, Professional

Development - Session provides explicit career-focused insights and applications.

PREREQUISITES

N/A

FACILITATOR(S)

Matthew McCutcheon, Current IMSA Faculty or Staff

STUDENT RESOURCES

N/A



SESSION #: 56

TITLE: Meditation and Mindfulness for Building Stress Relief Strategies

LENGTH: 60 minutes / Three Days

DESCRIPTION

Life at IMSA can get Stressful. Having a variety of positive coping strategies can be extremely helpful. In this intersession, we will explore meditation as a tool for relieving stress, decreasing anxiety, improving focus, and more. We will practice a variety of guided meditations and breathing exercises, assess the potential benefits, and discuss how you might use these strategies in your everyday life. Additionally, we will share tips on easy ways to regularly incorporate mindfulness into the course of your day. This will include sharing best practices in ergonomics: taking microbreaks, reducing eye strain, and arranging your work station to minimize strain on your neck and back while studying.

SESSION CATEGORIES

Socioemotional - Session supports student social and emotional well-being.

PREREQUISITES

N/A

FACILITATOR(S)

Jessica Amacher, Current IMSA Faculty or Staff

STUDENT RESOURCES

A yoga mat, towel or blanket would be helpful but not required.