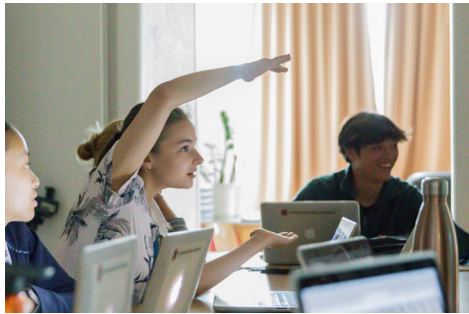


LAS summer



Academic
Program Courses
2020

Junior Courses (Ages 10-11)

The LAS *summer* Junior Academic Program caters to the academic interests and needs of students ages 10-11. Our team of educators will create classroom spaces that promote hands-on learning through experiments, projects, field trips, activities, and games. Students will work toward a final project which will be presented in our LAS *summer* Gallery Showcase. Courses align with themes and topics from our senior academic offerings so students will have opportunities to engage with older students in the form of mentorship, tutoring, and collaboration.

Students enrolling in our Junior Academic Program will select THREE courses from the list below. Each course meets for 50 minutes in the morning.

Please Note: The specific topics covered in each course will vary across sessions. Students who enroll in the Junior Academic Program for multiple sessions will not repeat content.

LEGENDARY ADVENTURES

Let's take an adventure by land, sea, and air! In this class, we will look at famous explorers in history, such as Captain Hook, Neil Armstrong, and Jacques Cousteau, and learn the stories behind their daring expeditions. Through a variety of games and activities, you'll learn the science and geography behind these adventures. Students will also learn important critical thinking skills by solving simulated challenges—from shark attacks to survival in Antarctica.

GALLERY SHOWCASE:

Collaborate with older students in the Legendary Expeditions class to create an expedition plan of your own!

SUPERSTARS IN HISTORY

One person, one invention, or one small event can change history. In this class, we'll study some of history's most famous people, days, and/or inventions that made the world a better place. You'll also have the opportunity to pick a person or event of your choice and create a project to showcase your superstar!

GALLERY SHOWCASE:

Along with students from the Inventions that Changed the World class, we will create a 'Superstar' podcast and publish online for our friends to hear!

THE MAGIC OF THE MOUNTAINS

Have you ever heard of Lhotse? Do you dream of climbing Mount Everest one day? Or seeing Mont Blanc for yourself? In this class, we'll explore the world's biggest and most famous mountains, learning the history, geography, and science behind these landmarks. You will also have the opportunity to look at climate change and discover what we can do to protect our mountains. A part of our class will involve getting out of the classroom to explore Leysin's environment and hearing from experts on our Mountain Leadership team.

GALLERY SHOWCASE:

Work with students from the Climate Changers class to create a campaign to promote a mountain of your choice.

THE STEAM MACHINE

What do you need to do in order to become a lean, mean, inventing machine? Play! Enter our space to become a maker who uses curiosity to experiment with robotics, design, and creativity. You'll tinker and work with your fellow classmates to create innovative projects which you will present at the end of the course.

GALLERY SHOWCASE:

Transform the classroom into a STEAM fair and show off your projects to your friends and teachers.

Senior Courses (Ages 12+)

The LAS *summer* Senior Academic Program provides academic enrichment for students ages 12 and up, while also creating interest and confidence in key areas of study. Our courses are designed to be interdisciplinary, project-based learning environments, wherein students actively construct knowledge and build toward a culminating project that is presented in our LAS *summer* Gallery Showcase.

Senior students will select TWO courses from the list below. Each course meets for 90 minutes in the morning, allowing students the necessary time to engage in a variety of activities, simulations, labs, and research.

Please Note: Due to the project-based nature of our courses, maximum capacity is typically 12-14 students.

CLIMATE CHANGERS

Do you want to find a way to reduce waste? Begin a recycling program in your community? Become the next Greta Thunberg? In this course, we'll look at the most challenging environmental problems in our world and how we can become part of the solution. You will choose a problem or opportunity of your choice and develop a plan to raise awareness and make a change.

GALLERY SHOWCASE:

Whether it's a video, a campus project, or a proposal, you will present your work as a climate changer at the end of this course.

CRAZY CONSTRUCTIONS

Why does the Leaning Tower of Pisa lean? How can the Burj Khalifa possibly be so tall? In this class, we will view some of the world's most creative, beautiful, and shocking buildings that make up our skylines. You will learn the history, science, and architecture behind these crazy constructions and also explore what architects and designers are imagining for future buildings.

GALLERY SHOWCASE:

You'll make a video presentation on why a building of your choice is so 'crazy' OR you'll create a design for a 'crazy construction' for a new skyline.

DRONE SCHOOL

Welcome to drone school where you'll learn about the mechanics of drone technology, including basic coding and mapping skills. We will also look at the exciting ways drones are being used in society, from farming to law enforcement to shopping, and consider some of the debates and challenges surrounding this technology. Throughout the course, we will complete drone simulations online and in the classroom workshop space.

GALLERY SHOWCASE:

Pick an area of interest from our drone class and develop your own project. Students can choose from mapping, math, coding, 3D printing, design, or social issues relating to drones.

GREAT ESCAPES

Learn how to be a great escape artist! In this class, we will look at daring escapes throughout history—from wars, to prisons, to natural disasters. We'll learn the critical thinking steps to be able to solve challenging brain teasers and riddles, inspect our environment, and develop creative solutions for tricky situations. At the end of the class, you'll work in teams to transform a classroom into an escape room using your new skills.

GALLERY SHOWCASE:

Student teams will develop escape room spaces for their friends and teachers to experience.

INVENTIONS THAT CHANGED THE WORLD

What do the wheel, the iPod, and eyeglasses all have in common? They changed the world! In this class, we will examine the inventions that have transformed the way we live. You will learn about objects throughout history, both big and small, that advanced technology, education, transportation, and medicine. Then, alone or in small groups, you'll select an invention of your choice to research.

GALLERY SHOWCASE:

Our class will tell the story of our inventions through the creation of a podcast, which will be published online for everyone to hear!

LEGENDARY EXPEDITIONS

Shark attacks. Avalanches. Plane crashes. Throughout history, adventurers have risked the unknown and overcome challenges by land, sea, and air. In this class, we will look at some of history's most daring and important expeditions, from Ferdinand Magellan's trip around the world to Edmund Hillary's Mt. Everest summit. Hands-on activities and games will also help us to learn the science behind these expeditions and their dangers. Topics may include gravity, climate, and survival skills.

GALLERY SHOWCASE:

Working in small teams, students will create their own legendary expedition plan. They will assemble a team of experts, choose a location to explore, determine the purpose for the expedition, and organize a plan for transportation, materials, etc.

SECRETS OF GREAT LEADERS

What makes a great leader so great? In this class, we will begin by looking at some of the world's most important leaders, past and present, to determine the characteristics we need to make a positive difference in the world. You'll also have the opportunity to develop your leadership skills through a variety of communication, team building, goal setting, and organizational activities and games. Students will practice their skills by helping with the organization and execution of an *LAS summer* special event.

GALLERY SHOWCASE:

Each student will present on a great leader of their choice and showcase their own leadership plan for the future. Presentations may be in the style of a Ted Talk, a creative video, collage, infographic, etc.

THE CRIME LAB

Solve crimes by using biology, anatomy, chemistry, and physics! In this class, we'll learn how science can help us to inspect a crime scene, trace evidence, and analyze blood splatter and DNA. Along with your classmates, you'll be asked to solve a crime using your new skills. Other activities might include dusting for fingerprints, analyzing handwriting, and examining hairs/fibers.

GALLERY SHOWCASE:

Create a crime scene and lead your friends and teachers through the investigation process. Presentations may be in the style of a Ted Talk, a creative video, collage, infographic, etc.

Enrollment Notes:

- All students ages 10-11 registering for the Academic Program will participate in Junior Program courses.
- Students 11 years of age with advanced academic proficiency who wish to participate in senior courses may submit a request.
- Students 12 years of age are welcome to enroll in the Junior Program.