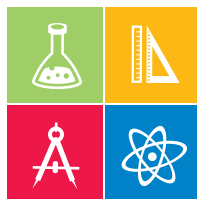


destination  
exploration



# THE TRAVELING LAB COATS

bringing science & technology workshops to you

MAY & JUNE

## CLASSROOM



## WORKSHOPS

2020 WORKSHOPS FOR GRADES K-8

# CLASS FIELD TRIPS

bring your class to the Science Commons at the U of L

SEPTEMBER TO JUNE

University of  
Lethbridge



[uLeth.ca/Destination-Exploration/TLC](https://uLeth.ca/Destination-Exploration/TLC)

403.382.7121 | [destination.explor@uleth.ca](mailto:destination.explor@uleth.ca) | [@uLethbridgeDE](https://twitter.com/uLethbridgeDE)

# ALL YEAR TOPICS

Available for TLC in-class (May-June)  
& Available for field trips on-campus

**K**

## Science Sampler

This workshop is designed to introduce students to the wonderful world of science and to introduce them to some of the concepts that they will be learning in grade 1.

**1**

## Reasons for the Seasons

Through hands-on activities and technology, students will explore larger patterns in weather and how the changing seasons directly affect the world around us.

**2**

## Water - The Weightlifting Champion!

Through planning, building and testing students will create a boat to discover what sinks and floats. Learning about buoyancy is easy in a hands-on environment.

**3**

## Do You Hear What I Hear?

Students will explore the human ear and how we hear. Exploring how we can create sound with devices as well as in a digital environment.

**4**

## Reinventing the Wheel

Designing and creating a device that moves is only step one. Students are then challenged with creating a circuit using littleBits in order to add an electric motor to their creations.

**5**

## A Current Event - Exploring Electricity and Magnetism

Using littleBits, students will explore parts of a circuit and will create an electrical device with purpose as they test conductors, insulators, switches and electromagnets.

**6**

## Galactic Explorers

Students will investigate and learn about objects in the day and night sky. Learning about moon phases in a unique way and map constellations with Ozobots!

**7**

## Heat and Temperature

What is the difference between heat and temperature? Students will put Particle Theory to the test with hands-on experiments and coding a thermometer gauge.

**8**

## Light and Optical Systems

Students will explore how light moves and how we can manipulate the path to reach a desired destination. Then they will use light to control their own coded musical device.

Thank you to our  
generous sponsors!



# SEPT. - APRIL TOPICS

\*Only available for field trips on-campus

**K**

## The 5 Senses

Experience science activities that require students to make observations with their eyes, ears, nose, tongue and skin.

**1**

## Building Bonanza

Using everyday materials students will construct various structures. Discover what makes a successful structure - from fasteners, shapes and materials.

**2**

## Magical World of Magnetism

Students will explore the interactions of materials found all around them. They will discover polarity and strength of magnets.

**3**

## Master Builders

Students will experiment and explore how different materials can affect a stationary and moving design. Then see if their design can stand up to different strength tests.

**4**

## Lights so Bright

Students will experiment with various light sources to explore how light travels. Discover various tools to reflect and refract light.

**5**

## Classroom Chemistry

Put on a lab coat and safety glasses and step into a real working lab! Mix materials, create chemical reactions and explore the properties of chemistry.

**6**

## Fantastic Flight School

Explore air and its physical and chemical properties. Students will discover how birds, airplanes and spaceships fly and learn what makes flight possible.

**7**

## Structures and Forces

Students will work to build a system of structures that will be able to withstand both uniform and varying loads and explore how engineering fits into our everyday lives.

**8**

## Mechanical Systems

In a society headed towards automation, students will design a machine that uses energy transfer to their advantage and explore principals of mechanical engineering.

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# TECHNOLOGY TOPICS

Available for TLC in-class (May-June)  
& Available for field trips on-campus

## Engaging Engineering | Grades 1 - 3

Scratch is a great first step into coding and students will build their own musical words then connect everything to a Makey Makey to take coding into the physical world!

## Speeding Spheros | Grades 4 - 6

Spheros allow us to explore how speed and momentum can play a big part in movement. Students will use coding to manoeuvre this robot efficiently through a track.

## micro:bit Makers | Grades 7 - 8

Using micro:bits students will learn how to code a simple input/output game that will put their creativity and hand-eye coordination skills to the test.

*Worried about skill level? We bring everything back to the basics to make sure every student is engaged in our technology workshops. There is also technology used in our science workshops!*

**3 WAYS TO BOOK**  
**ONLINE | EMAIL | CALL**

**uLeth.ca/Destination-Exploration/TLC**  
403.382.7121 | destination.explor@uleth.ca | @uLethbridgeDE

## GENERAL INFORMATION

Destination Exploration at the University of Lethbridge provides science and technology workshops to classrooms throughout Southern Alberta. Our Traveling Lab Coats (TLC) will bring all the supplies and excitement towards science to your class and deliver a hands-on curriculum tied workshop. Destination Exploration runs out of the Science Commons at the U of L and is a great space to bring your class (or school) for a science field trip to participate in one of our many science or technology workshops.

### Traveling Lab Coats (TLC)

*\*only offered in May & June\**

**\$120** | 20 students (\$6/additional student up to 30)

*Note: if school is located beyond a 30km radius of the University of Lethbridge, you must book a minimum of 2 workshops and an additional travel fee of \$50 is applied.*

### Booking Options

We know that every school is different so all our workshop times (on campus or in class) can be set to fit your bell schedule.

**Morning:** (typically 9:00am-11:00am)

or

**Afternoon** (typically 1:00pm-3:00pm)

### Class Field Trips

*\*offered from September to June\**

1-hour workshop

**\$80** | 20 students (\$4/additional student up to 30)

2-hour workshop

**\$120** | 20 students (\$6/additional student up to 30)

## YEAR END SCHOOL TRIPS

Visit the U of L for your school's year end trip!  
Bundle DE's Science workshops with activities from Fine Arts and/or Sport & Rec!