

Complete 5E Lesson Bundle

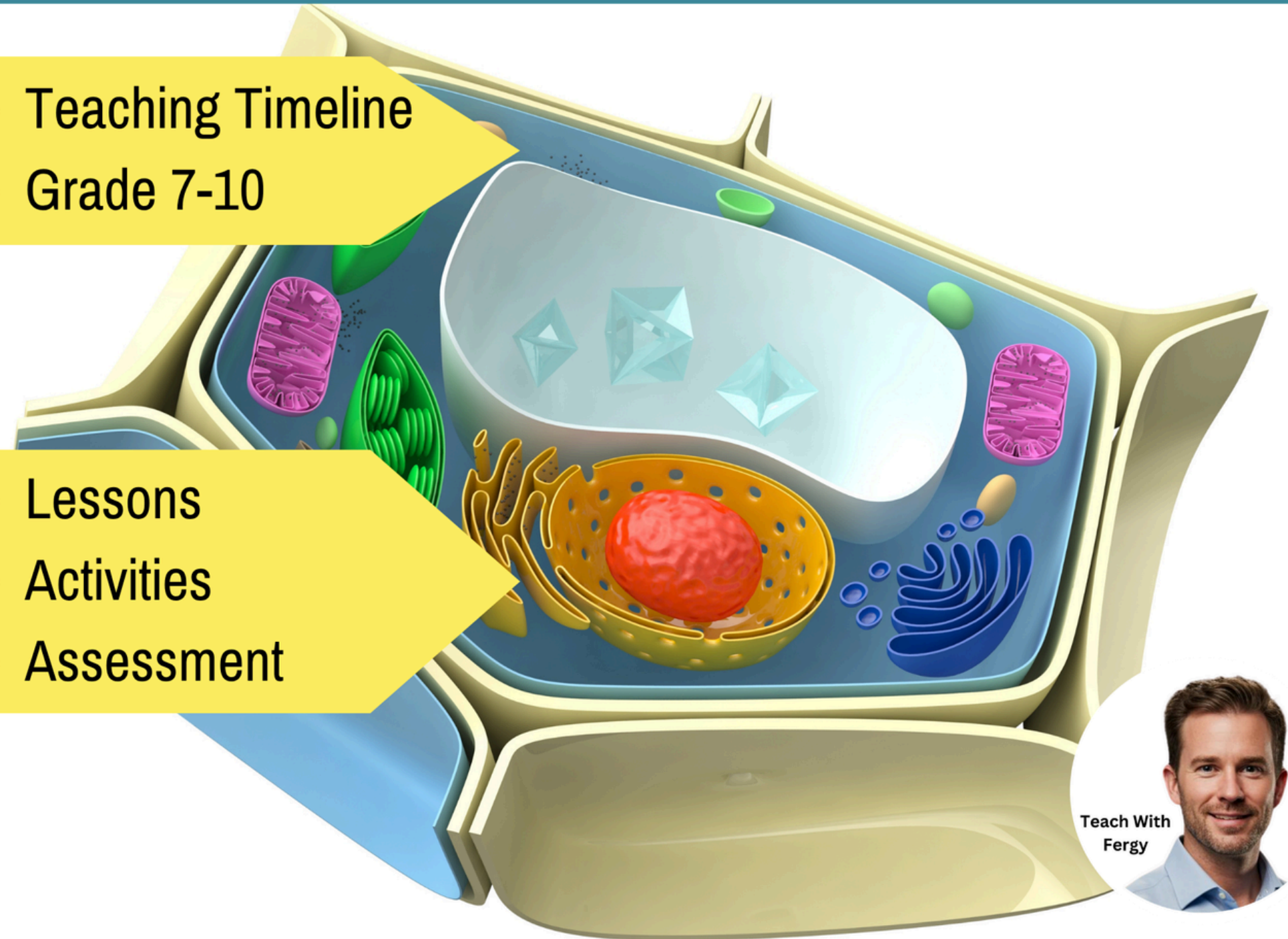
- **Lessons**
- **Activities**
- **Assessment**

SCROLL
to take a look inside!

CELLS AND THE CELL THEORY 5E LESSON BUNDLE

- Teaching Timeline
- Grade 7-10

- Lessons
- Activities
- Assessment



The 5 E's



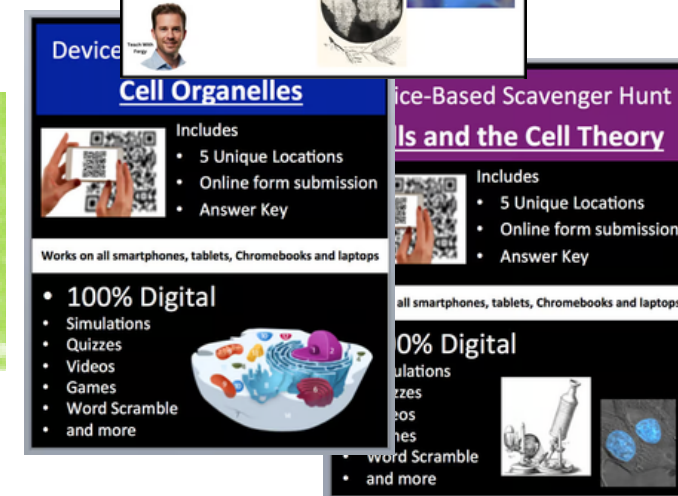
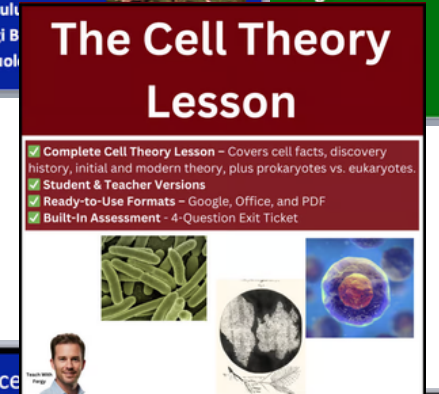
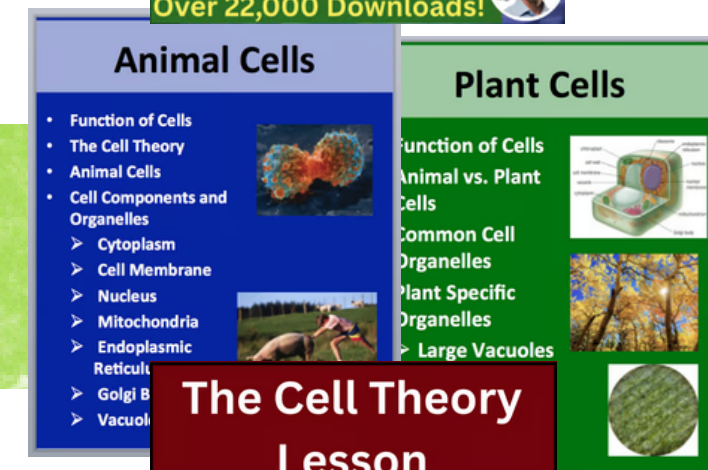
✓ **Engagement Phase** - Creates interest and excitement for your students by asking questions and probing their initial conceptions.

✓ **Exploration Phase** - Students use and develop creative thinking skills, make observations, record results, and make connections through an investigation → Lab Station Activity

✓ **Explanation Phase** - This is the instructional phase where concepts are presented to the students in a clear and applicable way → Lesson.

✓ **Elaborate Phase** - This phase involves the students completing an activity or assignment that forces them to expand their thinking and knowledge of the topic. They will propose solutions and extend their learning to new situations → Scavenger Hunt Activity

✓ **Evaluate Phase** - Your students will demonstrate their understanding and evaluate their own progress through an assessment → activity, assignment, or quiz.



MY 5E LESSON BUNDLES

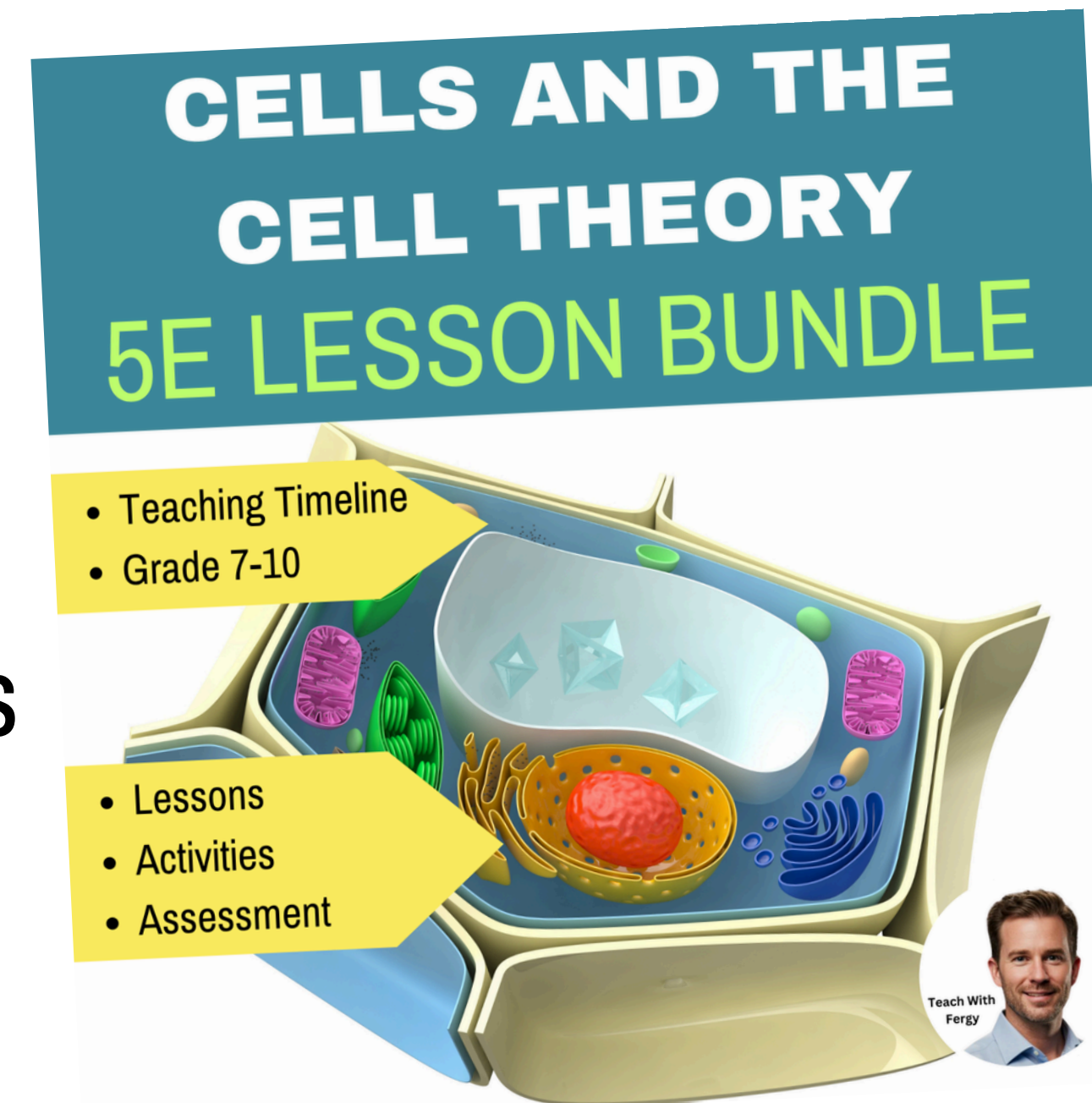
SOLVE...

- ★ **Prep-time crunch** — ready-to-use slides, stations, hunts, and quiz cut planning to near zero.
- ★ **Engagement** — hands-on stations + device-based hunts keep students active and curious.
- ★ **Unit flow** — 5E structure (Engage→Evaluate) gives a coherent, day-by-day sequence.
- ★ **Assessment** — activities, assignments, and auto-graded quizzes, provide evidence of learning that is quick to mark.
- ★ **Differentiation** — multiple modalities + scaffolded activities and lessons support mixed abilities.

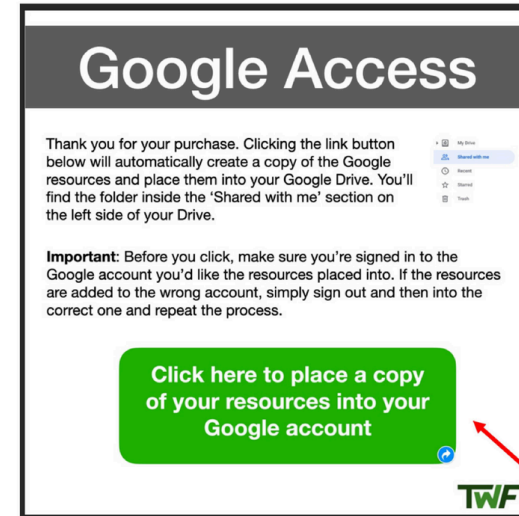


5E LESSONS PROVIDE DIFFERENTIATED INSTRUCTION IN THEIR VERY NATURE. BY THE END OF THIS LESSON, STUDENTS WILL:

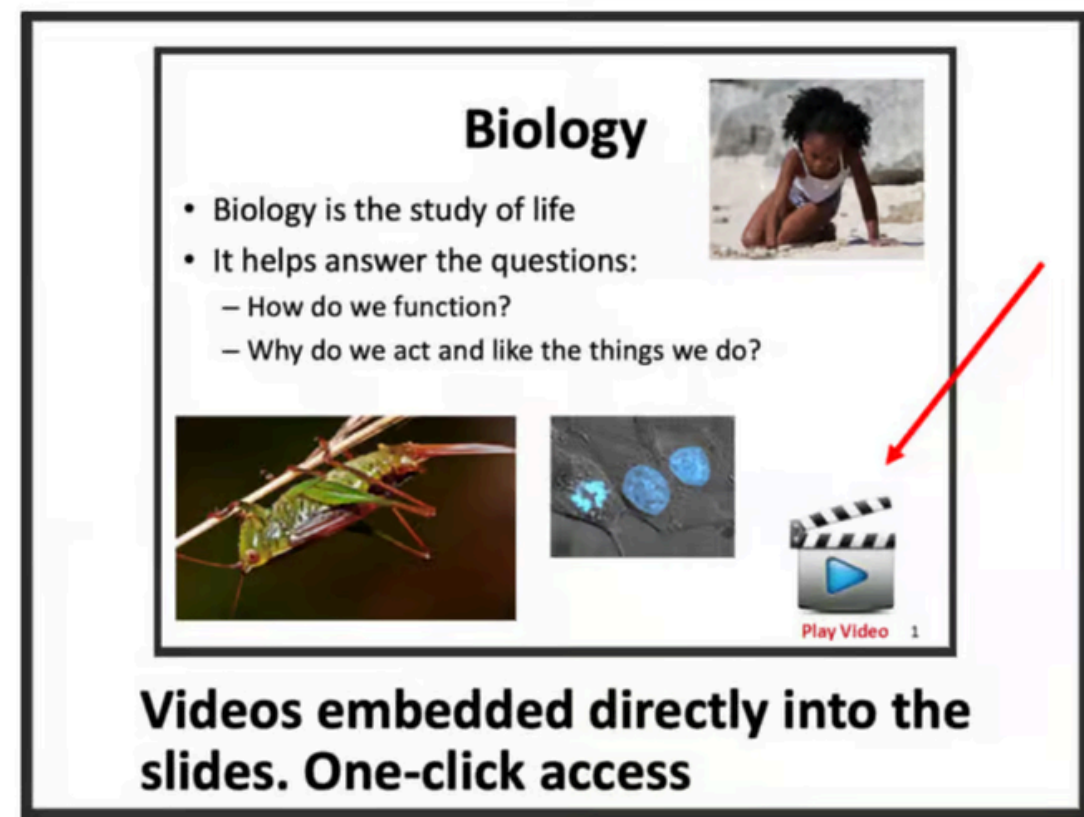
- ✓ Be introduced to the cell theory.
- ✓ Discover how the cell theory was developed.
- ✓ Learn about the scientists responsible for creating the cell theory.
- ✓ Learn about the structure and function of cells including their organelles.
- ✓ Discover the differences between animal and plant cells.



3 Engaging Lessons



Google Classroom Ready
One-Click Google Slides Access



Videos embedded directly into the slides. One-click access

Videos embedded in
directly into your lesson.

The Cell Theory Lesson

- ✓ **Complete Cell Theory Lesson** – Covers cell facts, discovery history, initial and modern theory, plus prokaryotes vs. eukaryotes.
- ✓ **Student & Teacher Versions**
- ✓ **Ready-to-Use Formats** – Google, Office, and PDF
- ✓ **Built-In Assessment** - 4-Question Exit Ticket

Plant Cells

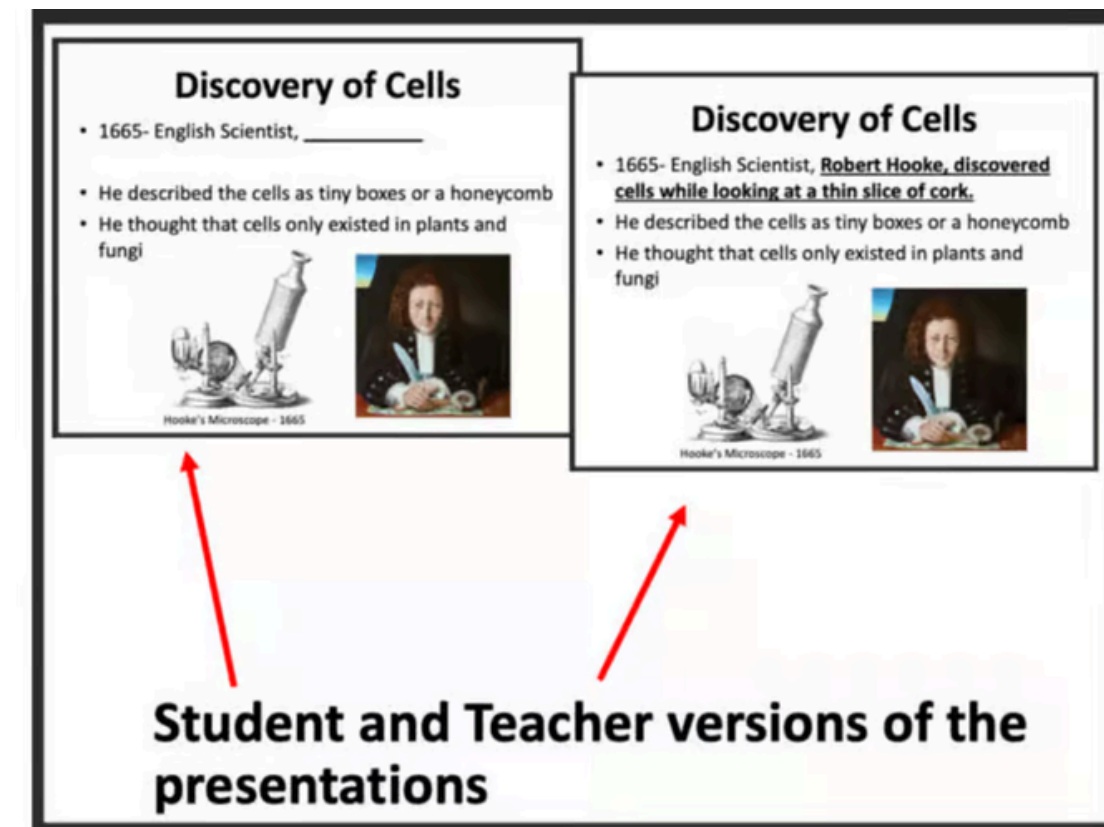
- Function of Cells
- Animal vs. Plant Cells
- Common Cell Organelles
- Plant Specific Organelles
 - Large Vacuoles
 - Cell Wall
 - Chloroplasts
- Photosynthesis

Animal Cells

- Function of Cells
- The Cell Theory
- Animal Cells
- Cell Components and Organelles
 - Cytoplasm
 - Cell Membrane
 - Nucleus
 - Mitochondria
 - Endoplasmic Reticulum
 - Golgi Bodies
 - Vacuoles

★★★★★ Extremely satisfied - Great coverage of an otherwise "boring" (to kids) topic!

★★★★★ Extremely satisfied - Well done. Students enjoyed.



Student and Teacher versions of the presentations

3 Engaging Activities



1 Lab Station Activity with
7 Engaging Station Tasks

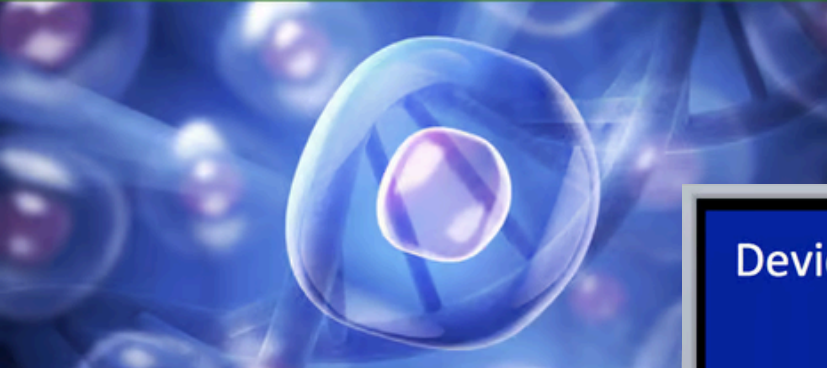


2 Digital Scavenger Hunt
Activities

1. Cells and the Cell Theory
2. Cell Organelles

**CELLS AND THE
CELL THEORY**
LAB STATION ACTIVITY

7 Print-Ready Stations | JUST PRINT & GO



Over 22,000 Downloads!

Device-Based Scavenger Hunt
Cells and the Cell Theory



Includes

- 5 Unique Locations
- Online form submission
- Answer Key

Works on all smartphones, tablets, Chromebooks and laptops

- 100% Digital

Device-Based Scavenger Hunt
Cell Organelles



Includes

- 5 Unique Locations
- Online form submission
- Answer Key

Works on all smartphones, tablets, Chromebooks and laptops

- 100% Digital
- Simulations
- Quizzes
- Videos
- Games
- Word Scramble
- and more



Daily Teaching Schedule

Day-by-day teaching schedule so you'll know what to teach and when each day.

★★★★★ Extremely satisfied - Absolutely love the set up for these lessons! The slides are interactive and engaging for the students and the activities that come with the lesson allow for students to gain deeper understanding of the topic being discussed.

Cells and the Cell Theory - 5E Unit			
Grades 7-10	Cells and the Cell Theory	Ongoing Learning	
Essential Questions:			
Lesson Objective: Students will:			
- Be introduced to the cell theory - Discover how the cell theory was developed - Learn about the scientists responsible for creating the cell theory - Learn about the structure and function of cells including their organelles - Discover the differences between animal and plant cells			
Possible Student Misconceptions:			
- All cells are the same size and shape - Some parts of living things aren't made of cells - Plants aren't made of cells - Plants get their energy from the Sun			
Materials:			
1 device (smartphone, chromebook, laptop, tablet, or computer) per 3 students - A means of projecting a PowerPoint presentation - Internet access - Drawing paper for the evaluate activity. Size is at your discretion - Pencil crayons, markers, crayons			
Teacher Notes:			
- All videos can be accessed directly from the PowerPoint. To retrieve the icon while in slideshow mode and it will automatically open for you. If it doesn't, right-click on the image and click Edit Hyperlink or something similar. - I've created a video walkthrough if needed. It can be accessed here - https://youtu.be/oCkIP3SaDQ - I don't believe in long lessons. If you feel your students are losing their focus, stop the PowerPoint and give them a 5-minute break. If you'd like to show more, I have a video collection here - http://www.teachwithafairy.com/so are tons of brain-break videos to choose from.			
Engagement Phase Introduction to Cells video			
- Watch the video introduction to cells which can be accessed here - http://www.teachwithafairy.com/introduction-to-cells/ - While they are watching the video, have them write down one thing they learned and a different thing they found interesting - Discuss these points as a class		Duration: 10-30 min. Teacher Role: Facilitate learning and guide student understanding Goals: - Connect student's experiences - Create interest - Ask questions - Understand the objectives of the lesson	
Teacher Note: - The video is about three minutes long - If for some reason the video doesn't play, go to www.youtube.com and type in "Introduction to Cells Frank Gregorio" to locate it.		Duration: 55-60 min. Teacher Role: Facilitate learning and guide student understanding Goals: - Students receive real experience with the topic - Students use and develop creative thinking skills - Students make observations, record	
Explanation Phase Cells and the Cell Theory Lab Station Activity			
In groups of 2-3, have your students complete <u>Exploration - Lab Station Activity</u>. Once they're done, they will submit their passport to you.			
Teacher Notes: The complete instructions for my Lab Station activity can be found in the <u>START HERE - Instructions</u> file.			
Explanation Phase Cell Lessons			
- There are three lessons approximately 40 min each - Each lesson contains needed for your class - Over the course of lessons located in 1 There are many opportunities on how the content is presented			
Lesson 1 - The Cell Theory Topics: - Biology - Cell facts - Discovery of cell - The scientists who discovered the cell			
Evaluate Phase Evaluate - Animal Cell Diagram Assignment			
- Have your students complete - <u>Evaluate - Animal Cell Diagram Assignment</u> - This task can be started in class then finished for homework or completely done in one setting		Duration: At least 1 hour in class plus time at home Teacher Role: Distribute and collect evaluation Goal: Students are given the opportunity to demonstrate their understanding and evaluate their own progress	
Teacher Notes: - It's sometimes best to have the students peer evaluate - Placing students in small groups and having them check each others work will accomplish two things: - Provide immediate feedback on the activity they just completed - Significantly reduce your marking time **Peer evaluation is not needed, only suggested when appropriate			
Goals - Students develop understanding of the content - Observations and experiences are discussed and critiqued - Students develop vocabulary - Students are able to connect the content presented to previous experiences			
Lesson 2 - Animal Cells This lesson covers the following topics: - Function of cells - The cell theory - Animal cells - Cell components and their organelles - Cytoplasm - Cell Membrane - Nucleus - Mitochondria - Endoplasmic Reticulum - Golgi Bodies - Vacuoles Lesson 3 - Plant Cells This lesson covers the following topics: - Function of cells - Animal vs. plant cells - Common cell organelles - Large vacuoles - Cell wall - Chloroplasts - Photosynthesis			
Teacher Notes: - No prior knowledge of cells is necessary - All videos can be accessed directly from the PowerPoint. To retrieve them, click on the video icon while in slideshow mode for you. If they don't open, right-click hyperlink or something similar. rough if needed. It can be accessed https://youtu.be/oCkIP3SaDQ if version of both the teacher and student.			
activities included in your unit, Both (for both) - Scavenger Hunt Activities or Hunt Activity - Scavenger Hunt Activity If require your students to move around in the lessons and allow them to cells can be applied to the real world.			
Duration: 1 hour per scavenger hunt Teacher Role: Facilitate learning and keep students focused			



Each phase is clearly described

Editable and Interactive

Office, Google,
and PDF Versions
Fully Editable



Animal Cell Diagram Assignment

Your task is to draw and colour your own animal cell on a sheet of paper measuring 8.5" x 14". The drawing must be coloured and include the following cell structures:

- Nucleus
- Nuclear membrane
- Vacuole
- Mitochondria
- Cell membrane
- Golgi body
- Cytoplasm
- Ribosome
- Endoplasmic Reticulum

You will also include a chart outlining the name of each organelle and briefly describe its function in the cell.

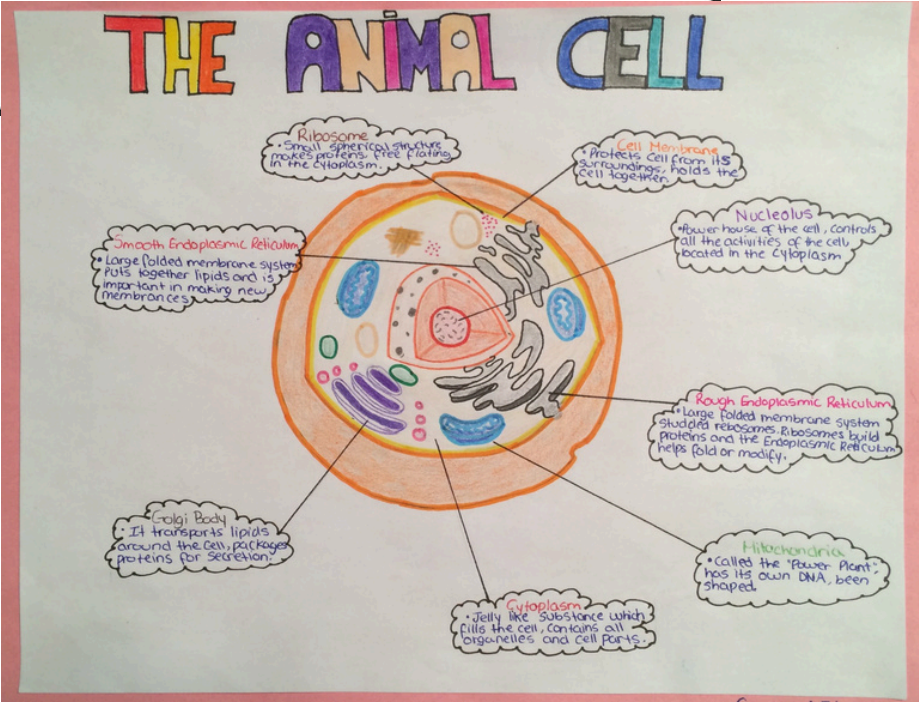
	Level 4	Level 3	Level 2	Level 1	R
Cell Drawing	Drawing is complete with all required cell parts	Drawing is complete with most required cell part included	Drawing is complete with some required cell parts included	Drawing is complete with minimal cell parts	Drawing is incomplete
Appearance and Effort	Exceptional effort, drawing is accurate, coloured and very well done	Good effort, drawing is mostly accurate with some colour and is well done	Some effort, drawing is somewhat accurate with some colour	Minimal effort, drawing is inaccurate and not coloured	Unacceptable effort, drawing is inaccurate and not coloured
Function of Organelles	Functions detailed correctly and in depth	Functions briefly detailed and mostly correct	Functions detailed somewhat correctly, lacking depth	Functions minimally detailed	Functions not included

Interactive and engaging

Station 1

Get Hands-On – Draw a well labelled diagram of either a plant or an animal cell, listing 5 organelles found in the cell drawn. Remember your diagram must be neatly drawn and labelled using a properly sharpened pencil and eraser.

From the Lab Station
Activity



WHAT TEACHERS SAY

★★★★★ Extremely satisfied -This was a HUGE help. All the notes are done and the videos help the students connect to the material. Having all the resources at my fingertips made my life easy and I could focus on teaching the material. A+++ material!



★★★★★ Extremely satisfied - Absolutely love the set up for these lessons! The slides are interactive and engaging for the students and the activities that come with the lesson allow for students to gain deeper understanding of the topic being discussed.



★★★★★ Extremely satisfied - My kids loved this activity! They enjoy anything that is different and outside-the-box.



★★★★★ Extremely satisfied - The perfect amount of information for my students.



★★★★★ Extremely satisfied - It's one of my favorite shops and creators. Great resource and students stay engaged.