






Collaboration:

Developing Skills for the Classroom and Beyond

OVERVIEW

This table top tool is designed to help students develop essential collaboration skills that can be applied both in the classroom and the workplace.

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<p>ESSENTIAL QUESTIONS</p> <ol style="list-style-type: none"> How can I effectively communicate and share ideas? What strategies can I use to solve problems and complete tasks? How do collaborative skills prepare me for success? 	<p>TIME NEEDED</p> <p>Most activities can be completed in 10-15 minutes over a period of several days.</p>	<p>STANDARDS</p> <p>The activities provided will help develop skills necessary for the 2023 adopted science standards:</p> <ul style="list-style-type: none"> Communicating results Develop listening skills during investigations Engage in higher-level thinking and problem solving

MAKING CONNECTIONS

By tapping into students' existing knowledge about teamwork, communication, problem-solving, and other collaborative skills, you can help them make relevant connections to science content. This not only engages them more actively in the learning process, but also allows you to address any misconceptions or knowledge gaps upfront. As students explore new collaborative techniques and scenarios, they can draw parallels to what they already know, solidifying the relevance and real-world applicability of the content. This approach helps students feel more confident and invested in developing their collaborative abilities, ultimately leading to more effective learning outcomes.

Background

The Collaboration Tabletop Tool is a comprehensive resource designed to cultivate the essential skills required for productive teamwork in both the classroom and the workplace. This interactive flip book provides a one-stop destination to explore and develop a range of collaborative abilities, as well as self-evaluate skills as they become more effective.

Trust, effective communication, positive relationships, management of roles, empathy, teamwork, problem solving, and critical thinking will be skills that students will work to develop.

Collaboration is necessary in educational settings and in businesses. It occurs when individuals work together for a common purpose to achieve learning or benefit a business. Collaboration involves being open-minded, inclusiveness, sharing of knowledge, critical thinking, self-management, focus, and accountability. Collaboration promotes teamwork, encourages innovation and leads to more efficient problem-solving.

Through a collaborative environment, classrooms and businesses enhance engagement, morale, and overall success of students and employees.

Materials

Activity # (Found in [Slide Deck](#))

- 1- Trust: No supplies are required
- 2- Communication: Paper and pencil, various pictures
- 3- Positive Relationship: Recording Device
- 4- Taking on Roles: [Role cards](#)
- 5- Empathy - No supplies are required
- 6- Teamwork: Long thin stick or rod (tent pole would work)
- 7- Problem Solving and Critical Thinking: Best played using a personal computer, but the experience is also compatible with a smartphone or tablet. Keep a pencil and paper close by to keep track of clues and answers as you go.

The Activities

Before each activity, review the corresponding [slide\(s\)/ "cards"](#) that cover the skill being practiced. This will help ensure students understand the key aspects of the skill.

Activity 1: Trust

- Overall, trust is the foundation for meaningful relationships, open communication, and successful outcomes in both educational and professional settings. When trust is present, it enables individuals to work together effectively, take calculated risks, and achieve their full potential.
- **Card 6:** This activity can be done in conversation or students can make a poster (paper or virtual) that shows or tells about life stories summarizing what their daily routine looks like (places they go, things they do, family and friends) Students will then share each of their stories, to the class or with each other.
- **Card 6** has a sample.

Activity 2: Communication

- Students should be able to describe different forms of communication and provide examples of how it can foster relationships and resolve conflict. Effective communication allows employees

to better understand their roles, receive and provide feedback, and work together toward shared goals. Strong communication skills are essential for career advancement and leadership. Review **Card 7**.

- **Card 8:** This activity involves 2 people. Gather together several images from magazines (enough for each student). Students must provide directions to their partner regarding how to draw the image. After the activity, discuss with students what worked well and what challenges they had.
- Switch pictures and partners and see how they improve with time.

Activity 3: Positive Relationships

- In both school and workplace settings, positive relationships contribute to increased job satisfaction, commitment, collaboration, and overall well-being. By prioritizing respect, trust, effective communication, transparency, authenticity, active listening, encouragement, and avoiding negative behaviors like gossiping, individuals can cultivate a supportive environment that enhances productivity and satisfaction. Discuss various aspects from **Card 9**.
- **Card 10:** Create a story - sentence to create a story. The story can take any direction and team members must actively listen and build upon each other's ideas. This activity fosters creativity, active participation, and the ability to work together towards a common goal. *Alternative:* Write the story and then act it out or make a video. Record the story and play it back. This activity can be done as a written collaboration as well, creating a written document where all members of the group contribute.

Set guidelines such as how long the contribution should be, how many times each person can contribute, and edit each other's work. Freedom to create twists and turns must make sense and logic with what is in the story.

Suggestions for stories:

1. Use a plot generator to inspire: <https://blog.reedsy.com/plot-generator/>
2. Develop a lab experiment that has gone terribly wrong or inspiring.

Activity 4: Taking on Roles

- Students that have roles in the classroom will take ownership and foster a sense of respect and community. It teaches independence, responsibility and accountability which helps them become more self-sufficient and leads to trust. It also gives students a voice and choice which can empower and build self-esteem. Discuss the various roles that are on **Card 11** and why they are important.
- There are a variety of Role Cards available to use in the classroom. Print a set for each group in the class. Review the responsibilities before you begin. These role cards can be reused

with other activities. Change roles with each activity. A QR Code is available on **Card 11** or visit the URL <https://pogil.org/educators/implementation-tools>

- **Card 12:** Life Characteristics ShowCase: each person in the group has a role. The goal as a group is to develop and share a presentation that represents a Characteristic of Life with an explanation and examples. The presentation must be delivered orally with a visual presentation (Google slide or poster/banner). Assign roles, select a characteristic of life, develop a presentation and share.

Teacher assigns one of the following Characteristics of Life to each group:

- Composed of one or more cells
 - Reproduces
 - Adapts
 - Grows and develop
 - Organized
 - Responds to environmental changes or maintains homeostasis (pH changes, temperature, water)
- *The topic that students write about can change, depending upon the subject being taught.*

Activity 5: Empathy

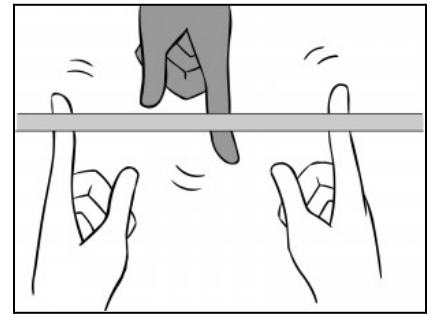
- Empathy is the ability to understand and share feelings (put yourself in the other person's shoes), perspectives and experiences of others. By understanding and relating to the feelings and perspectives of others, employees and students are able to communicate more effectively, resolve conflicts, and build stronger connections.
- Empathetic leaders and teachers are more effective. Managers and educators who demonstrate empathy are seen as higher-performing and are better able to motivate and support their teams or students. When discussing empathy with students, it's important to cover the key components that make up this essential skill.
 - Here are the main elements to cover: being empathetic such as active listening, eye contact, showing appreciation, understanding different perspectives, sharing feelings, and providing a supportive working environment.
- **Card 14:** "The Interview": In this exercise, students will interview another person and learn about their hopes, dreams, struggles, and experiences.
 - What is the best thing that ever happened to you?
 - What do you love about yourself?
 - What is something you regret in life?
- Students will then make representations of what they learned about each other. This could be a report, an artistic representation like a collage or a song, or each person telling the other person's story. Use your empathy skills by not only including the facts of what you learned, but what you think your interviewee felt during the various experiences they've had.

Activity 6: Teamwork

- Teamwork is the collaborative effort of a group to achieve a common goal or complete a task efficiently and effectively. Successful teamwork is characterized by clear communication, mutual respect, shared goals, division of tasks based on strengths, and effective problem-solving.
- Card 16:** “Helium Stick”: Use a very thin dowel rod (the thinner the better) and hold it horizontally about chest height and ask the participants to rest the stick on the top of their index fingers and lower it to the ground as a team.

Rules:

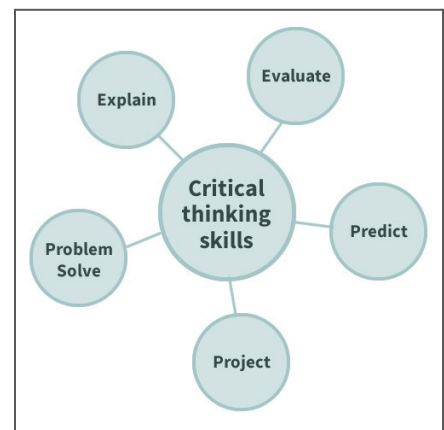
- Both fingers must remain on stick at all times. Start over if anyone loses contact.
- Must start standing with the rod chest high to the tallest person.
- Notice what happens as you lower the rod.



- After the activity, discuss what happened and how students worked together. Students should notice how they communicated both verbally and non-verbally, how they adjusted to the situation when the dowel rose instead of lowering, and then devise a new strategy to overcome the challenge. Patience and perseverance will develop and some students may take on a leadership role.

Activity 7 : Problem Solving and Critical Thinking

- Problem-solving skills are important because they help you deal with change, speak well, and think of new ideas for old problems. These skills let you listen carefully, think smartly and creatively, make strong choices based on facts, and work together as a team. When you're good at problem-solving, you use your time and things wisely (for businesses - money savings is important). It promotes teamwork, critical thinking, and strategic decision-making, leading to improved outcomes and organizational success. Ask students how these steps compare to the scientific method.
 - Identify and define the problem
 - Consider possible solutions
 - Evaluate options
 - Choose the best solution
 - Implement the solution
 - Evaluate the outcome



- Critical thinking is the ability to assess and analyze data, evaluate information to determine options, and come to logical conclusions. These skills are beneficial for all people to make their own opinions, learn how to act responsibly, understand consequences, and ultimately think for themselves.
- **Card 19:** “Escape Room”: Escape rooms in educational settings offer a practical application for students to practice collaboration and reflection on their decision-making processes. By engaging in escape room activities, individuals are encouraged to think critically, work as a team, and develop essential skills that are crucial for success in various aspects of life. Escape rooms can be timed to allow for time management skills to develop.

“Tuckaway Virtual Escape Room”: [Virtual Escape Rooms | Shelburne Museum](#)

Teachers Pay Teachers have Escape rooms already developed - search your desired topic.

WRAP UP AND ACTION

Self-Evaluation for Effective Collaboration

- Regularly have students complete a self-evaluation of their collaboration skills. This allows them to reflect on their progress and identify areas for improvement. Key areas to assess could include:
 - Interpersonal skills: How well do they communicate, listen, and work with others?
 - Professionalism: Do they exhibit behaviors like punctuality, preparedness, and a positive attitude?
 - Integrity: Do they demonstrate honesty, accountability, and ethical decision-making?
 - Lifelong learning: Are they open to feedback, willing to learn new skills, and eager to grow?

Interpersonal Skills
Speaks clearly, confidently, and with appropriate eye-contact with audience.
Applies active listening skills using reflection, restatement, questioning, and clarification.
Integrity
Treats others honestly, fairly, and courteously (words required).
Accepts responsibility for one's decisions and actions.
Professionalism
Accepts feedback and attempts to learn from mistakes or misunderstandings.
Demonstrates positive attitude toward work and others.
Manages conflict respectfully while maintaining progress toward a goal.
Lifelong Learning
Seeks feedback and asks questions to strengthen own understanding.
Uses newly learned knowledge and skills to complete specific tasks.

- **Card 21:** This evaluation can be completed by the student as a self-evaluation, peer evaluation, or teacher evaluation. Print one for each student, this can be completed each grading period. Discuss with students the ability to overcome challenges (on **Card 22**).

	0 POINTS	1 POINT	2 POINTS
ACADEMIC FOCUS	Little to no academic discussion was observed. The team was off-task and unfocused.	Some team members were unfocused or off-task. Some discussion was not about the assignment.	Academic discussion was overheard throughout the activity. All conversations were about the assignment.
	0 POINTS	1 POINT	2 POINTS
EXPLAIN AND UNDERSTAND	No explanations were overheard throughout the activity.	Some members were overheard giving explanations. Some team members were working to understand the lesson.	Every member was overheard giving explanations. Everyone was working to understand the lesson.
	0 POINTS	1 POINT	2 POINTS
HELP EACH OTHER	The team asked the teacher for help before asking each other.	Some members were asking each other for help before asking the teacher.	All members were asking questions and helping each other before asking the teacher.
	0 POINTS	1 POINT	2 POINTS
WORK TOGETHER	The team did not work together and/or copied each other's work.	Some team members worked together.	The entire team worked together and answered the same questions at the same time without copying.

Extensions

[Sources of Strength](#) is an international program that promotes and provides evidence-based programming to prevent suicide. The activities and campaigns encourage collaboration and empower youth to overcome adverse outcomes such as suicide, violence, bullying and substance misuse through promoting physical and mental health, family support systems, stress relief skills, developing positive relationships with mentors and much more.

Developing critical thinking and problem solving skills should be a component of the class most days. Setting up “A problem of the day” that can be completed in several minutes can help develop that skill. “We are Teachers” is a great resource: [180 Unique Question of the Day Ideas To Promote Critical Thinking \(weareteachers.com\)](#)

[Education.com](#) provides activities based on topic and grade level.

Resources

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About the Author and Fellowship



Janice West, a teacher at West Johnston High School, has had an impactful year as a Kenan Fellow. With a diverse teaching background spanning from preschool to adult education, Janice has brought a wealth of experience to the program.

As a Kenan Fellow, Janice has had the opportunity to collaborate with other teaching professionals throughout North Carolina and the surrounding region, including Wake and Durham counties. This collaborative environment has helped nurture Janice's gifts and lifted her spirits, especially during a time when teachers have often felt unappreciated.

Through the Kenan Fellows Program, Janice has developed a "brand" for herself as an educator, learning how to teach with fidelity and create a classroom environment where students "want to be". She has also been able to mentor other teachers who are struggling, fostering a sense of community and professional support.

One of the highlights of Janice's Kenan Fellowship was the opportunity to partner with Biogen, a leading biotechnology company. Janice spent three weeks interning at Biogen's Research Triangle Park facility, where she interviewed workers and learned about career pathways, skill sets, training, certifications, and the importance of soft skills like teamwork. This experience has helped Janice expand her growth mindset and see how teachers can collaborate with businesses to develop critical thinking and collaboration skills in students.

Additionally, Janice has gained valuable insights from the Kenan Fellows professional development sessions, which have provided her with resources for using AI, securing grants, and fostering diversity and equity in education. These sessions have helped Janice continue to grow and develop as an educator, ensuring that she can provide the best possible learning environment for her students.

Overall, Janice's experience as a Kenan Fellow has been transformative, allowing her to connect with a community of dedicated educators, expand her teaching toolkit, and ultimately better serve the diverse needs of her students at West Johnston High School.