

Helping students reach their full potential through different learning approaches builds social and emotional learning skills, college and career-ready skills, and enhances problem-solving. This emphasizes the student's role in the learning process, giving them the autonomy to explore, ask questions and share ideas.

**Inquiry-based learning** uses different approaches, cultivating skills through guided learning and small-group discussions to apply reasoning to reach conclusions.

## **The four types of inquiry learning**

**Confirmation Inquiry:** Students are given a question, the answer, and method for reaching the answer. The students use their critical-thinking and investigation skills in learning how this method works.

**Open Inquiry:** Students pose original questions they investigate through their own methods, presenting their results to expand their knowledge base through discussion.

**Structured Inquiry:** Students are given an open question and investigation method. They use this method to create an evidence-based conclusion.

**Guided Inquiry:** Students gather in groups to design investigation methods and reinforce problem solving skills to reach a conclusion to an open question.

From a student's perspective, **inquiry-based learning helps focus on open questions or problems to use evidence-based reasoning**, creative thinking and problem solving to form a conclusion they can defend.

From an instructor's perspective, this learning approach focuses on **helping students get from the curiosity stage into critical thinking and deeper levels of understanding**. They guide students through the investigation process, encouraging them to ask questions through structured inquiry activities. This is usually done by utilizing group projects, case studies, research projects, and unique exercises created for specific groups of students.

## **9 Advantages of inquiry-based learning**

There are quite a few advantages to this method, which is widely used in the STEM learning space. Here are the most important ones for you to consider.

### 1. "Preps" the brain for learning

Starting class with a short activity helps students absorb information throughout the day. Peaking their curiosity through an activity that makes them inquire about something at the beginning of class prepares their brain for learning through intellectual stimulation.

### 2. Cultivates skills for all areas of learning

Through inquiry-based learning, students build their comprehension, critical thinking and communication skills. Continuous use of their cognitive skills helps not only in class, but in day-to-day life.

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### 3. Deepens understanding

Inquiry-based learning helps students make their own **connections about what they learn. Their curiosity helps them engage and gain a deeper understanding of topics and content**, instead of primarily memorizing and recalling rules, ideas or formulas. During this process, most students understand why the rule or formula works, how the idea was developed, and when they can apply the rule, formula or idea.

### 4. Creates ownership

Students explore topics of interest to them, in addition to others, reinforcing autonomy in learning. They engage and learn in the style that works best for them. The use of open questions promotes students to utilize their own methods and thinking styles to solve problems, putting themselves at the center of the experience.

### 5. Promotes engagement

This active learning method encourages students to immerse themselves into the learning process. Through the exploration of different topics, they make connections, ask questions and learn more effectively as they reach their conclusions.

### 6. Enhances learning

**Inquiry-based learning infuses fun and engagement by letting students explore topics on their own**, creating their own learning process.

Students learn transferable skills which reinforce initiative and self-direction. They learn **how to ask questions**, discuss topics, collaborate on assignments, cooperate with each other and reach their own conclusions. This development is synthesized through self-guided inquiry and analysis based on activities they complete.

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#### 7. Creates a love of learning

When students are able to exercise autonomy over their learning process, they become more engaged, which helps develop a passion for exploration and learning on a higher level.

#### 8. Works across multiple classroom settings

This learning style is **adaptable to almost any classroom setting**, regardless of individual skill and grade level. When we employ inquiry-based learning:

- Teachers are able to adapt the content for their students.
- It appeals to students who have trouble comprehending through traditional lessons.
- Exercises are engaging and different, using distinct content and investigation methods.
- Inquiry exercises are used in different ways, such as reviews, “thinking” activities, full lessons or standalone projects.
- The lessons reinforce and expand on any relevant concept the students are interested in.

#### 9. Provides differentiated instruction

Instructors are able to utilize inquiry-based learning to reach the entire class through differentiated instruction strategies.

This method allows students to work alone or as part of a small group. Content can be presented in different forms, including text, video, audio, virtually or physically, helping meet students in their space while adapting to individual needs and preferences. This is an effective way to engage students in the learning process, helping them learn from first-hand experiences.

With so many benefits, you can start incorporating inquiry-based learning in your classroom today and **engage learners in a research-based approach** that will challenge them and create truly meaningful learning, using skills they'll carry for life.

Source: 2021, Future focussed learning, by Lee Crockett

