AI Detective

Ages 10-12 | Digital Explorers

Test an AI answer and learn how to check its claims.

How to use this guide

Read each section, complete its four lab steps, then answer the questions in the online course. The online progress bar advances only after four correct answers.

Section 1: AI literacy

LEARNING GOAL: AI literacy. Your finished work should demonstrate: An AI answer with checkable claims marked.

EXPLAIN THE CONCEPT: AI tools can generate useful text, but a confident answer may still be wrong. Treat it as a starting point, not proof. Think about where you might use this skill in a real or imaginary project. Describe the problem it helps you solve and how you would recognize a successful result.

ORIGINAL PROJECT LAB: 1. Ask an approved AI tool a simple factual question with an adult. 2. Copy its answer into a notes page. 3. Highlight two claims that can be checked. 4. Write down what you still need to verify. Finished result: An AI answer with checkable claims marked.

SEPARATE OUTPUT FROM EVIDENCE: An AI tool can produce text, images, or predictions from patterns learned during its development and from the input it receives. A fluent answer can still be wrong. Treat an answer as something to examine, not proof that the tool checked reliable sources or understands your situation.

WORKED CLAIM: Imagine a fictional chatbot says: Every animal with wings can fly. A penguin is a counterexample: it has wings but does not fly through the air. The word every makes a broad claim. Finding one reliable counterexample is enough to show that this particular claim is false. You do not need to test every animal.

ASK A CHECKABLE QUESTION: Instead of asking whether an answer sounds clever, identify a claim you can check. Write the claim, the evidence you need, and an adult-approved source to consult. Do not enter your school, address, passwords, or another person’s private work into an AI prompt.

CHECK YOUR REASONING: If two AI tools repeat the same claim, is it verified? No. Repetition is not independent evidence; check a suitable source outside those answers.

GO DEEPER: Identify an assumption, test a safe alternative, and explain the trade-off. Keep a short before-and-after record that someone else could follow.
SAFETY CHECK: Use unique passphrases, recognize scams, protect privacy, behave respectfully, and pause before sharing. Use pretend data, never real passwords or private information. Stop and ask a trusted adult if anything seems unsafe.
REVIEW QUESTIONS: What is the main idea? Why does the first step matter? How would you detect a mistake? What evidence proves the result? What would you improve? Answer in your own words before taking the quiz.
PORTFOLIO REFLECTION: Save a drawing, sanitized screenshot, or short note describing the goal, your approach, your evidence, and one lesson learned. Expected result: An AI answer with checkable claims marked.

Investigate with pictures and choices

An AI answer sounds confident but gives no source.
What can you conclude?
1. The claim still needs checking
2. Confidence proves correctness
3. Long answers cannot be wrong

Worked reasoning

Answer: The claim still needs checking. Fluency is not evidence that a claim is true. Identify one specific statement, then compare it with a source or an observation that can actually support it.

Try a changed example

Write one precise claim you could test independently.

Picture and meaning matches

AI answer: Needs checking
Evidence: Supports a particular claim
Responsible use: Protects people and data

Ways to respond

Choose, point, draw, demonstrate, type, speak or use your usual communication tool.
A helper can operate the controls while you choose.

Counting support if useful

Use zero to ten counters or dots. Touch each once. The last count names the quantity. Rearrange the same set and check whether anything was added or removed. Choose this foundation practice only when it fits the learner goal.

My notes: _____

Hands-on lab

1. Ask an approved AI tool a simple factual question with an adult.
2. Copy its answer into a notes page.
3. Highlight two claims that can be checked.
4. Write down what you still need to verify.

Finished result: An AI answer with checkable claims marked.

Check your understanding

1. Which idea best describes AI literacy?

A. It has no purpose in this project.

B. To check a claim, find a reliable source and compare the exact statement.

C. AI tools can generate useful text, but a confident answer may still be wrong.

D. Responsible AI use includes protecting private details, acknowledging help, and thinking about who may be affected by a mistake.

2. What is the first step in this lab?

A. Write down what you still need to verify.

B. Copy its answer into a notes page.

C. Highlight two claims that can be checked.

D. Ask an approved AI tool a simple factual question with an adult.

3. What should you do after step two?

A. Highlight two claims that can be checked.

B. Copy its answer into a notes page.

C. Write down what you still need to verify.

D. Ask an approved AI tool a simple factual question with an adult.

4. Which result shows that your lab is finished?

A. A blank page with no work

B. An AI answer with checkable claims marked.

C. A copied answer without checking it

D. A skipped lab

Answer review

1. C. AI tools can generate useful text, but a confident answer may still be wrong.
2. D. Start with: Ask an approved AI tool a simple factual question with an adult.

3. A. Step three is: Highlight two claims that can be checked.

4. B. The goal is: An AI answer with checkable claims marked.

Section 2: Fact-checking

LEARNING GOAL: Fact-checking. Your finished work should demonstrate: One claim checked against a source.

EXPLAIN THE CONCEPT: To check a claim, find a reliable source and compare the exact statement. A source should match the claim, not merely mention the topic. Think about where you might use this skill in a real or imaginary project. Describe the problem it helps you solve and how you would recognize a successful result.

ORIGINAL PROJECT LAB: 1. Choose one claim from your notes. 2. Find an age-appropriate source with an adult. 3. Record the source title and the evidence it gives. 4. Label the claim supported, contradicted, or still uncertain. Finished result: One claim checked against a source.

CHECK ONE CLAIM AT A TIME: Fact-checking starts by isolating a precise statement. A paragraph can contain a correct sentence beside an incorrect one. Record the source's title, who is responsible for it, the evidence it provides, and the date you checked it. A search-result snippet is a clue to investigate, not the whole source.

WORKED MOON CLAIM: A fictional answer says: The Moon makes the light that lets us see it. An adult-approved NASA Moon resource explains that moonlight is reflected sunlight. Record the original claim, the source explanation, and your correction: we see sunlight reflected from the Moon. The correction should match the evidence rather than adding new unsupported details.

COMPARE SOURCE QUALITY: A copied social post and the page it copied are not two independent confirmations. Prefer a source responsible for the subject, then read whether it supports the exact claim. If the source is unclear or you cannot access it, mark the claim not yet verified and ask for help.

CHECK YOUR REASONING: Does finding one error mean every statement in the answer is false? No. Check the other claims separately and keep a record of which are supported, contradicted, or unresolved.

GO DEEPER: Identify an assumption, test a safe alternative, and explain the trade-off. Keep a short before-and-after record that someone else could follow.

SAFETY CHECK: Use unique passphrases, recognize scams, protect privacy, behave

respectfully, and pause before sharing. Use pretend data, never real passwords or private information. Stop and ask a trusted adult if anything seems unsafe.

REVIEW QUESTIONS: What is the main idea? Why does the first step matter? How would you detect a mistake? What evidence proves the result? What would you improve? Answer in your own words before taking the quiz.

PORTFOLIO REFLECTION: Save a drawing, sanitized screenshot, or short note describing the goal, your approach, your evidence, and one lesson learned. Expected result: One claim checked against a source.

Investigate with pictures and choices

A citation exists but discusses another subject.

Does it support the answer?

1. Yes, any link is enough
2. Only the URL length matters
3. No, relevance to the claim must be checked

Worked reasoning

Answer: No, relevance to the claim must be checked. A real source must actually support the specific statement.

Try a changed example

Compare the claim with the relevant paragraph.

Picture and meaning matches

AI answer: Needs checking

Evidence: Supports a particular claim

Responsible use: Protects people and data

Ways to respond

Choose, point, draw, demonstrate, type, speak or use your usual communication tool. A helper can operate the controls while you choose.

Counting support if useful

Use zero to ten counters or dots. Touch each once. The last count names the quantity. Rearrange the same set and check whether anything was added or removed. Choose this foundation practice only when it fits the learner goal.

My notes: _____

Hands-on lab

1. Choose one claim from your notes.
2. Find an age-appropriate source with an adult.
3. Record the source title and the evidence it gives.
4. Label the claim supported, contradicted, or still uncertain.

Finished result: One claim checked against a source.

Check your understanding

1. Which idea best describes Fact-checking?

A. To check a claim, find a reliable source and compare the exact statement.

B. Responsible AI use includes protecting private details, acknowledging help, and thinking about who may be affected by a mistake.

C. It has no purpose in this project.

D. AI tools can generate useful text, but a confident answer may still be wrong.

2. What is the first step in this lab?

A. Record the source title and the evidence it gives.

B. Choose one claim from your notes.

C. Label the claim supported, contradicted, or still uncertain.

D. Find an age-appropriate source with an adult.

3. What should you do after step two?

A. Label the claim supported, contradicted, or still uncertain.

B. Choose one claim from your notes.

C. Record the source title and the evidence it gives.

D. Find an age-appropriate source with an adult.

4. Which result shows that your lab is finished?

A. A copied answer without checking it

B. A skipped lab

C. A blank page with no work

D. One claim checked against a source.

Answer review

1. A. To check a claim, find a reliable source and compare the exact statement.
2. B. Start with: Choose one claim from your notes.
3. C. Step three is: Record the source title and the evidence it gives.
4. D. The goal is: One claim checked against a source.

Section 3: Ethics

LEARNING GOAL: Ethics. Your finished work should demonstrate: A safer, clearly

attributed answer.
EXPLAIN THE CONCEPT: Responsible AI use includes protecting private details, acknowledging help, and thinking about who may be affected by a mistake. Think about where you might use this skill in a real or imaginary project. Describe the problem it helps you solve and how you would recognize a successful result.
ORIGINAL PROJECT LAB: 1. Review a pretend AI answer about another person. 2. Remove any private identifying details. 3. Add a note saying where AI helped. 4. Explain one possible harm if the answer were shared without checking. Finished result: A safer, clearly attributed answer.
RESPONSIBILITY STAYS WITH PEOPLE: Responsible AI use includes protecting privacy, checking important claims, being honest about assistance, and considering who could be affected by mistakes. A tool's output does not remove your responsibility for what you choose to share. Use fictional examples rather than classmates' personal information.
WORKED CREDIT CHOICE: Suppose an AI tool suggests a story outline and you write the final story. Follow your teacher's rules and describe the help honestly: I used an AI suggestion to plan the order, then wrote and checked the story myself. Do not claim that no help was used, and do not claim the tool verified facts you never checked.
NOTICE WHO IS MISSING: An image tool repeatedly draws only one kind of person as a scientist. That pattern is a reason to question the representation, not evidence that other people cannot be scientists. Discuss the missing perspectives with a trusted adult and choose examples that do not reinforce the unsupported message.
CHECK YOUR REASONING: Would removing a classmate's name always make their private story safe to upload? No. Other details can identify them. Use an invented case instead.
GO DEEPER: Identify an assumption, test a safe alternative, and explain the trade-off. Keep a short before-and-after record that someone else could follow.
SAFETY CHECK: Use unique passphrases, recognize scams, protect privacy, behave respectfully, and pause before sharing. Use pretend data, never real passwords or private information. Stop and ask a trusted adult if anything seems unsafe.
REVIEW QUESTIONS: What is the main idea? Why does the first step matter? How would you detect a mistake? What evidence proves the result? What would you improve?

Answer in your own words before taking the quiz.

PORTFOLIO REFLECTION: Save a drawing, sanitized screenshot, or short note describing the goal, your approach, your evidence, and one lesson learned. Expected result: A safer, clearly attributed answer.

Investigate with pictures and choices

A tool asks for a classmate medical detail to make a joke.

What is a responsible response?

1. Post it in the project
2. Do not share the private detail
3. Share if the tool promises secrecy

Worked reasoning

Answer: Do not share the private detail. Respect privacy and avoid using personal information to target someone.

Try a changed example

Use a fictional, non-identifying example instead.

Picture and meaning matches

AI answer: Needs checking

Evidence: Supports a particular claim

Responsible use: Protects people and data

Ways to respond

Choose, point, draw, demonstrate, type, speak or use your usual communication tool.

A helper can operate the controls while you choose.

Counting support if useful

Use zero to ten counters or dots. Touch each once. The last count names the quantity. Rearrange the same set and check whether anything was added or removed.

Choose this foundation practice only when it fits the learner goal.

My notes: _____

Hands-on lab

1. Review a pretend AI answer about another person.
2. Remove any private identifying details.

3. Add a note saying where AI helped.

4. Explain one possible harm if the answer were shared without checking.

Finished result: A safer, clearly attributed answer.

Check your understanding

1. Which idea best describes Ethics?

A. To check a claim, find a reliable source and compare the exact statement.

B. It has no purpose in this project.

C. AI tools can generate useful text, but a confident answer may still be wrong.

D. Responsible AI use includes protecting private details, acknowledging help, and thinking about who may be affected by a mistake.

2. What is the first step in this lab?

A. Review a pretend AI answer about another person.

B. Explain one possible harm if the answer were shared without checking.

C. Remove any private identifying details.

D. Add a note saying where AI helped.

3. What should you do after step two?

A. Review a pretend AI answer about another person.

B. Add a note saying where AI helped.

C. Remove any private identifying details.

D. Explain one possible harm if the answer were shared without checking.

4. Which result shows that your lab is finished?

A. A skipped lab

B. A blank page with no work

C. A safer, clearly attributed answer.

D. A copied answer without checking it

Answer review

1. D. Responsible AI use includes protecting private details, acknowledging help, and thinking about who may be affected by a mistake.

2. A. Start with: Review a pretend AI answer about another person.

3. B. Step three is: Add a note saying where AI helped.

4. C. The goal is: A safer, clearly attributed answer.

Section 4: Guided Project & Worked Examples

COURSE INVESTIGATION: A citation can look real and still fail

YOUR PRACTICE INPUT: A fictional assistant claims a school garden has 80 plants and cites an imaginary page. A teacher’s supplied list contains 12 bean, 8 herb, and 10 flower plants.

WHY IT WORKS: The list totals 30 plants. A confident sentence and a formatted citation cannot override inspected evidence.
PLAN BEFORE YOU ACT: Draw or write the starting state, the question you need to answer, and the evidence you expect to see. A paper trace is acceptable; label it as a prediction unless you actually run a test.
WORK THE CASE: Write a claim/evidence/verdict table. Separate the arithmetic correction from the unresolved definition of the counted population.
COMPARE WITH THE EXPECTED RESULT: The first defined list totals 30. Including the five trees produces 35, and the chosen scope must be stated.
EXPLAIN YOUR REASONING: Show the connection between the supplied input, each decision, and your result. If a number, label, or observation differs, return to the first differing step rather than changing several things together.
KEEP YOUR EVIDENCE: Save the initial plan, a drawing or sanitized output, and one explanation of what the result does and does not prove. Use pointing, speech, drawing, typing, or your usual communication method.
LEARNING GOAL: Guided Project & Worked Examples. Your finished work should demonstrate: A completed guided project with documented evidence: Original AI claim set, Verification table, Corrected answer with sources, Responsible-AI checklist.
EXPLAIN THE CONCEPT: Review the course concepts through two applied examples. Break an AI answer into individual claims and label which claims need verification. Compare a real source with a fabricated-looking citation and inspect author, publisher, date, and evidence. Guided project: Run a supervised fact-check: ask an approved AI tool, identify three claims, verify them with reliable sources, and document corrections. Work with synthetic or fictional information and ask an adult for help when appropriate. Think about where you might use this skill in a real or imaginary project. Describe the problem it helps you solve and how you would recognize a successful result.
ORIGINAL PROJECT LAB: 1. Read both worked examples and explain the reasoning. 2. Run a supervised fact-check: ask an approved AI tool, identify three claims, verify them with reliable sources, and document corrections. 3. Record the steps you completed and the result you observed. 4. Compare your result to the goal and correct one issue. Finished result: A completed guided project with documented evidence: Original AI claim set, Verification table, Corrected answer with sources,

Responsible-AI checklist.
BUILD A FICTIONAL CLAIMS FILE: Write three pretend AI claims: every winged animal flies; the Moon produces its own visible light; a confident tone proves accuracy.
Label the whole exercise Fictional practice. Make a table with claim, evidence needed, source checked, and conclusion. No live AI account is required.
WORKED CORRECTIONS: Use a penguin as a counterexample to the first claim and an adult-approved NASA resource about reflected sunlight for the second. The third confuses presentation with evidence: confidence alone does not verify a statement. Explain why each conclusion follows rather than marking every row wrong without a reason.
TEST A CHANGED CASE: Change every winged animal flies to some winged animals fly. The penguin no longer disproves the new statement. Notice that changing one word changes the claim being checked. Record the revised wording before deciding which evidence is relevant.
PRESENT THE FILE: Share only your fictional table, source notes, and corrections. State which claims remain uncertain and describe any AI assistance used in preparing the work.
GO DEEPER: Identify an assumption, test a safe alternative, and explain the trade-off. Keep a short before-and-after record that someone else could follow.
SAFETY CHECK: Use unique passphrases, recognize scams, protect privacy, behave respectfully, and pause before sharing. Use pretend data, never real passwords or private information. Stop and ask a trusted adult if anything seems unsafe.
REVIEW QUESTIONS: What is the main idea? Why does the first step matter? How would you detect a mistake? What evidence proves the result? What would you improve? Answer in your own words before taking the quiz.
PORTFOLIO REFLECTION: Save a drawing, sanitized screenshot, or short note describing the goal, your approach, your evidence, and one lesson learned. Expected result: A completed guided project with documented evidence: Original AI claim set, Verification table, Corrected answer with sources, Responsible-AI checklist.

Investigate with pictures and choices

Your pretend classifier calls every round fruit an apple.
Which example tests its weakness?
1. A round orange

2. Another round apple only

3. No new examples

Worked reasoning

Answer: A round orange. A counterexample can reveal a limit that confirming examples miss.

Try a changed example

Propose another observable feature and test new examples.

Picture and meaning matches

AI answer: Needs checking

Evidence: Supports a particular claim

Responsible use: Protects people and data

Ways to respond

Choose, point, draw, demonstrate, type, speak or use your usual communication tool. A helper can operate the controls while you choose.

Counting support if useful

Use zero to ten counters or dots. Touch each once. The last count names the quantity. Rearrange the same set and check whether anything was added or removed. Choose this foundation practice only when it fits the learner goal.

My notes: _____

Hands-on lab

1. Read both worked examples and explain the reasoning.

2. Run a supervised fact-check: ask an approved AI tool, identify three claims, verify them with reliable sources, and document corrections.

3. Record the steps you completed and the result you observed.

4. Compare your result to the goal and correct one issue.

Finished result: A completed guided project with documented evidence: Original AI claim set, Verification table, Corrected answer with sources, Responsible-AI checklist.

Check your understanding

1. Which idea best describes Guided Project & Worked Examples?

A. AI tools can generate useful text, but a confident answer may still be wrong.

B. Review the course concepts through two applied examples.

C. To check a claim, find a reliable source and compare the exact statement.

D. It has no purpose in this project.

2. What is the first step in this lab?

A. Run a supervised fact-check: ask an approved AI tool, identify three claims, verify them with reliable sources, and document corrections.

B. Record the steps you completed and the result you observed.

C. Read both worked examples and explain the reasoning.

D. Compare your result to the goal and correct one issue.

3. What should you do after step two?

A. Run a supervised fact-check: ask an approved AI tool, identify three claims, verify them with reliable sources, and document corrections.

B. Compare your result to the goal and correct one issue.

C. Read both worked examples and explain the reasoning.

D. Record the steps you completed and the result you observed.

4. Which result shows that your lab is finished?

A. A completed guided project with documented evidence: Original AI claim set, Verification table, Corrected answer with sources, Responsible-AI checklist.

B. A copied answer without checking it

C. A skipped lab

D. A blank page with no work

Answer review

1. B. Review the course concepts through two applied examples.

2. C. Start with: Read both worked examples and explain the reasoning.

3. D. Step three is: Record the steps you completed and the result you observed.

4. A. The goal is: A completed guided project with documented evidence: Original AI claim set, Verification table, Corrected answer with sources, Responsible-AI checklist.

Section 5: Independent Challenge & Mastery

INDEPENDENT TRANSFER CASE: A citation can look real and still fail

KEEP THE ORIGINAL BASELINE: A fictional assistant claims a school garden has 80 plants and cites an imaginary page. A teacher’s supplied list contains 12 bean, 8 herb, and 10 flower plants.

CHANGE ONE CONDITION: A second list adds five trees. The original total changes only if the question includes trees in its definition of plants.

YOUR TASK: Write a claim/evidence/verdict table. Separate the arithmetic correction from the unresolved definition of the counted population.
PREDICT, THEN CHECK: State which part of your original reasoning should remain true and which part must be recalculated or retested. Keep the original and changed results side by side.
REVIEW CRITERIA: The first defined list totals 30. Including the five trees produces 35, and the chosen scope must be stated.
MENTOR DISCUSSION: Explain why the changed condition matters. Identify a tempting wrong conclusion, show the observation that would challenge it, and choose one next test. A statement of uncertainty is better than inventing a result.
PORTFOLIO NOTE: Keep your baseline, changed input, prediction, observed or paper-traced result, explanation, and one improvement. These practice prompts do not replace the course's existing quiz or final assessment.
LEARNING GOAL: Independent Challenge & Mastery. Your finished work should demonstrate: An independent demonstration with evidence: Original AI claim set, Verification table, Corrected answer with sources, Responsible-AI checklist.
EXPLAIN THE CONCEPT: Apply what you learned without copying the guided solution. Independent challenge: Given text/image scenarios, identify signals of hallucination, synthetic media, bias, or missing evidence without assuming detection is perfect. Safety and responsibility: Never provide private data to AI; do not treat AI as a person, authority, secret-keeper, or replacement for a trusted adult. Reflect on your work: What did you build or discover? What did you test or change after feedback? What safe or responsible choice did you make? Think about where you might use this skill in a real or imaginary project. Describe the problem it helps you solve and how you would recognize a successful result.
ORIGINAL PROJECT LAB: 1. Explain the challenge and make a short plan. 2. Given text/image scenarios, identify signals of hallucination, synthetic media, bias, or missing evidence without assuming detection is perfect. 3. Test the result and record evidence of your work. 4. Review the safety scenario and describe one improvement. Finished result: An independent demonstration with evidence: Original AI claim set, Verification table, Corrected answer with sources, Responsible-AI checklist.
INVESTIGATE A NEW STATEMENT: Choose a small science claim from an adult-approved

resource or ask an adult to invent a practice claim. Write its exact wording before investigating. Identify whether it describes a fact, a prediction, or an opinion; the kind of statement affects what would count as evidence.
FOLLOW THE EVIDENCE: Find a relevant source with adult help, read the explanation, and record a conclusion: supported by the source, contradicted by the source, or not enough evidence yet. Do not force a yes-or-no answer when the source does not address the claim.
EXPLAIN A LIMITATION: Show where the source supports your conclusion and one limit of the investigation, such as checking only one resource. Keep a privacy-safe record and disclose assistance. A strong investigator can say I do not know yet and explain the next useful check.
CHECK YOUR REASONING: If a source explains a different animal or a different date, does it automatically settle your claim? No. Match the evidence to the exact subject and conditions before drawing a conclusion.
GO DEEPER: Identify an assumption, test a safe alternative, and explain the trade-off. Keep a short before-and-after record that someone else could follow.
SAFETY CHECK: Use unique passphrases, recognize scams, protect privacy, behave respectfully, and pause before sharing. Use pretend data, never real passwords or private information. Stop and ask a trusted adult if anything seems unsafe.
REVIEW QUESTIONS: What is the main idea? Why does the first step matter? How would you detect a mistake? What evidence proves the result? What would you improve? Answer in your own words before taking the quiz.
PORTFOLIO REFLECTION: Save a drawing, sanitized screenshot, or short note describing the goal, your approach, your evidence, and one lesson learned. Expected result: An independent demonstration with evidence: Original AI claim set, Verification table, Corrected answer with sources, Responsible-AI checklist.

Investigate with pictures and choices

Nine of ten examples pass, but the only new setting fails.
What should you investigate?
1. Only the average score
2. Whether to delete the failed example
3. Whether the system generalizes to that setting

Worked reasoning

Answer: Whether the system generalizes to that setting. Inspect errors by case and context rather than hiding them in an average.

Try a changed example

Keep a separate test set that you do not tune against.

Picture and meaning matches

AI answer: Needs checking

Evidence: Supports a particular claim

Responsible use: Protects people and data

Ways to respond

Choose, point, draw, demonstrate, type, speak or use your usual communication tool. A helper can operate the controls while you choose.

Counting support if useful

Use zero to ten counters or dots. Touch each once. The last count names the quantity. Rearrange the same set and check whether anything was added or removed. Choose this foundation practice only when it fits the learner goal.

My notes: _____

Hands-on lab

1. Explain the challenge and make a short plan.
2. Given text/image scenarios, identify signals of hallucination, synthetic media, bias, or missing evidence without assuming detection is perfect.
3. Test the result and record evidence of your work.
4. Review the safety scenario and describe one improvement.

Finished result: An independent demonstration with evidence: Original AI claim set, Verification table, Corrected answer with sources, Responsible-AI checklist.

Check your understanding

1. Which idea best describes Independent Challenge & Mastery?

A. It has no purpose in this project.

B. AI tools can generate useful text, but a confident answer may still be wrong.

C. Apply what you learned without copying the guided solution.

D. To check a claim, find a reliable source and compare the exact statement.

2. What is the first step in this lab?

A. Review the safety scenario and describe one improvement.

B. Given text/image scenarios, identify signals of hallucination, synthetic media, bias, or missing evidence without assuming detection is perfect.

C. Test the result and record evidence of your work.

D. Explain the challenge and make a short plan.

3. What should you do after step two?

A. Test the result and record evidence of your work.

B. Given text/image scenarios, identify signals of hallucination, synthetic media, bias, or missing evidence without assuming detection is perfect.

C. Review the safety scenario and describe one improvement.

D. Explain the challenge and make a short plan.

4. Which result shows that your lab is finished?

A. A blank page with no work

B. An independent demonstration with evidence: Original AI claim set, Verification table, Corrected answer with sources, Responsible-AI checklist.

C. A copied answer without checking it

D. A skipped lab

Answer review

1. C. Apply what you learned without copying the guided solution.
2. D. Start with: Explain the challenge and make a short plan.
3. A. Step three is: Test the result and record evidence of your work.
4. B. The goal is: An independent demonstration with evidence: Original AI claim set, Verification table, Corrected answer with sources, Responsible-AI checklist.

Mastery & safe-use plan

Ages 10-12

Digital safety: Use unique passphrases, recognize scams, protect privacy, behave respectfully, and pause before sharing.

AI literacy: Check AI claims with reliable sources, recognize synthetic content, protect private data, and disclose AI help.

Challenge: Solve a guided scenario without using real credentials or private information.

Portfolio: Finish an original game, website, safety plan, media story, or fact-check artifact.

Mastery check: Demonstrate the project, explain a decision, and correct one issue found during review.

Project worksheet

My project: Test what AI gets right and wrong

Who will use or review it? _____

My plan: _____

Checkpoint 1: An AI answer with checkable claims marked.

Checkpoint 2: One claim checked against a source.

Checkpoint 3: A safer, clearly attributed answer.

Checkpoint 4: A completed guided project with documented evidence: Original AI claim set, Verification table, Corrected answer with sources, Responsible-AI checklist.

Checkpoint 5: An independent demonstration with evidence: Original AI claim set, Verification table, Corrected answer with sources, Responsible-AI checklist.

One thing I tested: _____

One thing I changed after testing: _____

What I learned: _____

Trusted adult or mentor feedback: _____

Family review

Show your finished work to a trusted adult. Explain one thing you learned and one thing you would improve.

Beat IT Kids | For learning at home. Do not put real passwords or private details in practice projects.