The three evidence-based recommendations in this WWC practice guide support teachers in helping students develop effective writing skills.

**Recommendations in this practice guide:**

1. Explicitly teach appropriate writing strategies using a Model-Practice-Reflect instructional cycle.
2. Integrate writing and reading to emphasize key writing features.
3. Use assessments of student writing to inform instruction and feedback.

**Introduction**

Improving students’ writing skills helps them succeed inside and outside the classroom. To be effective writers, students must learn how to write in a way that achieves their writing goals, reflects their intended audience and context, clearly presents their ideas, and elicits the intended response from the reader. The *Teaching Secondary Students to Write Effectively* practice guide from the What Works Clearinghouse (WWC) presents three recommendations that educators across disciplines can use to help students in grades 6–12 develop strong writing skills.

This summary introduces the recommendations and supporting evidence described in the full practice guide. For a full description of the recommendations, more practical tips, and additional classroom examples, [download your free copy of the guide](#).
Teaching Secondary Students to Write Effectively  

**Recommendation 1.**  
Explicitly teach appropriate writing strategies using a Model-Practice-Reflect instructional cycle.

This recommendation includes two approaches to teaching writing strategies: (a) explicit or direct instruction and (b) using a Model-Practice-Reflect instructional cycle. Recommendation 1a is to explicitly teach students different strategies for components of the writing process, including how to select, execute, and tailor a strategy for different audiences and purposes. Recommendation 1b is to use a Model-Practice-Reflect instructional cycle to teach writing strategies, wherein students observe a strategy in use, practice the strategy on their own, and evaluate their writing and use of the strategy. Teachers should use both approaches when teaching students to use writing strategies.

**Writing strategies** are structured series of actions (mental, physical, or both) that writers undertake to achieve their goals. Writing strategies can be used to plan and set goals, draft, evaluate, revise, and edit.

**Recommendation 1a.**  
Explicitly teach appropriate writing strategies.

Effective writers use strategies during all components of the writing process (one iteration of the writing process is illustrated at right). Because writing is an iterative process, students may implement these components in a different order and may implement some of the components simultaneously (as illustrated by the clockwise and counter-clockwise arrows). Throughout this process, strategies can be used by students to help them organize ideas, conduct research, and use information that will inform their writing. During the drafting stage, strategies help students create strong sentences and well-structured paragraphs. Other strategies provide students with tools to evaluate, revise, and edit their plans and their writing.

Teaching students to use cognitive strategies is one way to develop their strategic thinking skills, ultimately helping them to write more effectively. Teachers need to explicitly instruct students on writing strategies and how to select the most appropriate strategy. Eventually, as students become experienced writers, they will use these strategies automatically to write effectively.

**How to carry out the recommendation**

1. Explicitly teach strategies for planning and goal setting, drafting, evaluating, revising, and editing. Strategies help students direct their thinking as writers as they implement each component of the writing process.
   - Introduce different strategies for each component of the writing process so students understand there is more than one way to approach each component.
   - Teach students the steps of a strategy and how to execute each step, modifying the instruction based on skill level.
### Sample writing strategies for the goal setting component of the writing process

<table>
<thead>
<tr>
<th>Writing strategy</th>
<th>How to execute the strategy</th>
</tr>
</thead>
<tbody>
<tr>
<td>Set goals</td>
<td>Provide students with a list of writing goals that represent the qualities of good writing and the criteria on which they will be evaluated. This might include goals for maintaining control of the topic, organization, voice, use of mature vocabulary, and use of varied and complex sentences to meet the writing purpose. Students should choose one or more goals to work on as they write.</td>
</tr>
<tr>
<td>Individualize goals</td>
<td>Provide students with a list of individualized writing goals and have them select one or more goals to focus on while writing. For a persuasive essay, for example, one student’s goal may be to write an essay that includes three reasons to support his or her point of view. Alternatively, the goal might be to reject three reasons that are not consistent with his or her point of view. The goals should be individualized so that they are more ambitious than the student’s performance on a previous essay, but not so high as to be outside the student’s capabilities.</td>
</tr>
</tbody>
</table>

- Demonstrate how the different components of the writing process work together so that students know how to flexibly move between components of the process, returning to earlier components as needed to improve their writing. See above and pp. 9–14 of the practice guide for several writing strategies for each component of the writing process.

2. **Instruct students on how to choose and apply strategies appropriate for the audience and purpose.** After students learn different strategies, teach them to evaluate the available strategies and choose the most appropriate one for each situation. To promote the critical selection of strategies instead of their rote use, identify opportunities for students to use writing strategies in new ways, in different contexts, and for other disciplines.

   After students have chosen a strategy, teach them how to implement it with the specific audience and purpose in mind. Have students identify the target audience and purpose for their writing during the planning component and engage them in brainstorming what they know about writing for that audience and purpose. Then, have students discuss how this knowledge will affect their writing and why. Teach students to adapt their strategies depending on the audience and purpose. For example, when students use a planning strategy to write a persuasive essay, they should keep in mind that their use of supporting evidence will depend in part upon the audience and thus, they should carry out the planning strategy differently based on the situation at hand. For a writing assignment in a social studies class, the strongest supporting evidence may be quotes from historical figures and events, while the strongest supporting evidence for an assignment in a science class may be results and statistics from a science experiment (rather than, for example, quotes from a scientist).

**Recommendation 1b.** Use a Model-Practice-Reflect instructional cycle to teach writing strategies.

A Model-Practice-Reflect instructional cycle allows students to observe the thinking and actions of a strong writer, attempt to emulate the features of effective writing, and then evaluate their writing according to those features, as illustrated on the next page. By learning from teachers, peer models, and their own written work, students can internalize the features of effective writing and thus develop effective writing strategies, skills, and knowledge. Writing practice without reflection does not provide students with opportunities to internalize important features of writing or think about how to apply learned skills and strategies effectively in new situations.
The Model-Practice-Reflect cycle

How to carry out the recommendation

1. **Model strategies for students.** Teachers and peers can demonstrate and verbally describe the use of effective writing strategies during different components of the writing process. This type of modeling illustrates to students the thought process behind selecting and applying each strategy, and it highlights why or how that strategy will help them write effectively. Below and on p. 20 of the practice guide are examples of statements that teachers can use when modeling to share their thinking. The focus of the modeling (such as defining the audience, purpose, or task; walking through the steps of a particular strategy; demonstrating an error and correction when implementing a strategy; or reflecting on their own writing) can vary based on what skills and knowledge students need to develop. Peers can also serve as models to other students during both whole-class instruction and small-group activities. As students master writing strategies and skills for the components of the writing process, teachers should gradually lessen their modeling to give students more opportunities to execute strategies on their own.

2. **Provide students with opportunities to apply and practice modeled strategies.** Incorporate regular opportunities to practice implementing writing strategies into classroom activities. These opportunities can occur across disciplines to allow students to practice their writing for different topics, audiences, purposes, and tasks. The examples on the next page and on pp. 22–23 of the practice guide illustrate how modeling and practicing writing strategies could span different disciplines. Each activity discussed can be easily adapted for use in different disciplines.

Sample modeling statements to evaluate writing and correct errors

“How many pieces of supporting evidence have I used?”

“Oh, my thesis statement isn’t very strong. I need to improve it.”

“I should revisit my goals from the planning phase.”

“I need to confirm I refuted that argument.”

“The evidence I identified to support my thesis isn’t factual; I need to replace it with real data.”
Teaching Secondary Students to Write Effectively Practice Guide Summary

Practicing modeled writing strategies

In each of the examples below, the teacher models the strategy for the whole class, and then students practice and reflect on the strategies individually or in small groups (see pp. 22–23 of the practice guide for examples).

<table>
<thead>
<tr>
<th>Discipline</th>
<th>Strategy</th>
<th>Writing activity</th>
</tr>
</thead>
<tbody>
<tr>
<td>Social studies</td>
<td>3-2-1 summary strategy</td>
<td>A social studies teacher models summarizing a recent political debate that the class watched together online. He identifies three main points or ideas presented during the debate, two disagreements between the candidates, and one question that he has for the candidates. Students then write a summary of the debate using this 3-2-1 strategy and work in small groups to discuss their summaries.</td>
</tr>
<tr>
<td>Science</td>
<td>Rank the evidence strategy</td>
<td>A science teacher models using evidence and statistics to support a position paper on deforestation. He discusses how he identified sources for his research and then ranks the supporting evidence he collected to support his claim, designating the strongest and most convincing evidence. Students spend the week conducting research and collecting supporting evidence for their own position papers. Students then work with a partner to rank each other’s evidence and discuss how to craft a strong argument for their position papers.</td>
</tr>
</tbody>
</table>

3. **Engage students in evaluating and reflecting upon their own and peers’ writing and use of modeled strategies.** Reflection activities enable students to carry out the evaluation component of the writing process, and deepen their understanding of their writing effectiveness and how well they accomplished their goals and executed their strategy. Reflection also helps students discover ways to improve their writing, and reinforce the use of effective strategies in future tasks. After students practice using a particular strategy, have them ask themselves a series of questions to reflect upon their use of the strategy, or challenge students to articulate how the strategy worked for them (e.g., “How did the strategy help you achieve your writing goals?” or “What did you find challenging about using that strategy?”). Provide opportunities for students to evaluate their own and others’ writing on a variety of features, such as whether the piece has sufficient detail, is well-organized, or presents credible evidence. Incorporate evaluation and reflection components into writing assignments of different types and in different disciplines (see pp. 24–25 of the practice guide for examples). Have students analyze how their strategy use, writing knowledge, writing skills, and written products have improved. Students’ use of portfolios and rubrics may facilitate the evaluation of their work. After students implement revisions between drafts of written work, have them explain the changes they made to reach their final draft and to articulate how those changes helped make their writing more effective.

**Recommendation 2. Integrate writing and reading to emphasize key writing features.**

Combining reading and writing together in an activity or assignment helps students develop knowledge and learn about important text features (as illustrated on the next page). For example, asking students to summarize well-written text they just read signals that it has a set of main points, that students should understand main points while they read, and that when students write certain types of compositions they should focus on main points. Reading exemplar texts, or those that illustrate specific features of effective writing, can help students become familiar with important features of writing, which they can then emulate. Similarly, writing with a reader in mind and reading with the writer in mind strengthens both reading and writing skills. This is important because writers are more effective when they tailor their writing to the reader and anticipate the impact on their audience as they write.
Shared knowledge for writing and reading

“The shared knowledge model conceptualizes reading and writing as two buckets drawing water from a common well or two buildings built on a common foundation.”

How to carry out the recommendation

1. Teach students to understand that both writers and readers use similar strategies, knowledge, and skills to create meaning.

Explicitly showing students the connection between reading and writing can help them transfer their reading skills to writing and vice versa. For example, to help students recognize a cause/effect structure when reading and use the structure when writing, ask them to read a science text with this structure. Support students as they identify key features of the cause/effect structure—for example, the use of signal words such as because, cause, effect, if, and then. Help students understand that just as readers use strategies to decipher text and meaning, writers use strategies to infuse their text with meaning. For example, when reading a narrative, encourage students to visualize the setting by creating mental pictures based on the author’s use of sensory details. In the same way, when creating their own narratives, students can describe sights, smells, sounds, tastes, touches, and movements to paint a picture in their own words. Use specific activities that integrate writing and reading to enhance student skills and knowledge in reading and writing across disciplines. See pp. 34–36

2. Use a variety of written exemplars to highlight the key features of texts. Exemplar texts, whether published or created by teachers or peers, can clearly illustrate specific features of effective writing, such as strong ideation; organization and structure; word choice, grammar, punctuation, and spelling; and voice, including tone, mood, and style. As students read an exemplar text, emphasize the features that align with the specific learning objective being taught (e.g., using supporting evidence to support a claim in argumentative writing). Include exemplars with diverse writing quality so that students can distinguish the features of good exemplars from average and poor exemplars across text types. Emphasize that key features of text types may vary or may be more or less prominent based on the purpose, audience, and form of the writing. Once students understand the key features of texts, ask them to practice emulating these features in their own writing. Use checklists and rubrics (like the example shown below) to highlight key features of effective writing, and have students use them to evaluate their success in emulating important text features.

A sample student-created rubric from strong and weak exemplar texts

An exemplary interpretive essay will include most or all of the following:

- An effective opening hook that draws the reader into the essay
- Enough context for the writer to present his or her interpretation
- A clear thesis presenting the writer’s interpretation of the author’s central message
- Clear essay structure, including an introduction, main body, and conclusion
- Plenty of evidence from the text to support the writer’s key ideas
- Commentary and/or analysis of the significance of the evidence
- Transitional words to establish coherence and link ideas together
- Academic vocabulary
- A formal tone and use of academic English
- Varied sentences to enhance the style and flow of the writing
- Few, if any, errors in the rules of written English
Recommendation 3. Use assessments of student writing to inform instruction and feedback.

Monitoring student progress throughout the writing process provides useful information for planning instruction and providing timely feedback to students. By regularly assessing student performance—not just students’ final written products—teachers learn about student progress on key learning objectives and can tailor their writing instruction accordingly. Struggling students and students with disabilities can benefit from additional and differentiated instruction on skills that have been taught, while students who have already mastered a skill can advance to a new one.

The formative assessment cycle illustrated on the right is an iterative process in which teachers assess students' skills and adapt instruction accordingly until the targeted learning goals are achieved. The process begins with the teacher identifying the focal learning objectives, goals, or standards. Next, instruction is targeted to achieve these goals. To measure student learning on the targeted goals, the teacher administers assessments and analyzes the data. Finally, the teacher responds to the data by targeting instruction and feedback to focus on areas in which students need additional practice and exposure. Then the cycle repeats. Because the first step is often based on state or district standards and the second step commonly follows a district or school approach, this recommendation focuses on the last three steps: assessment, data analysis, and responding to the data by targeting feedback.

How to carry out the recommendation

1. Assess students' strengths and areas for improvement before teaching a new strategy or skill. Regular assessments can be done to determine whether students have the appropriate foundation for subsequent lessons and highlight common areas of student need, allowing any such needs to be remedied more quickly. Assess students in both English language arts and other disciplines using regular classroom work, longer written assignments, or on-demand writing prompts (short writing assignments designed to assess student skills or understanding).

2. Analyze student writing to tailor instruction and target feedback. Use assessment data to tailor instruction to students' skills and needs. Analyzing data enables teachers to identify areas where students need instruction, without making assumptions about student needs. After identifying students' specific instructional needs, support their improvement by providing tailored feedback on their written products and their use of the writing process and strategies. Prioritize the review or feedback to focus on a particular area or learning objective—such as tailoring persuasive writing to a specific audience or using credible sources in argumentative writing, saving feedback on other areas if time allows. Provide both positive feedback and identify areas for improvement when reviewing student work. Also have students provide feedback to their peers, as students may be able to identify problems in peers' writing more easily than they can in their own. Additionally, when students provide written feedback and assessment to peers, their comments and observations may enhance their understanding of their own writing. Create lessons and choose learning objectives that challenge students to the limits of their ability, encouraging them to develop. Tailor instruction for individual students, small groups, classrooms, or the whole grades, as appropriate.
3. Regularly monitor students’ progress while teaching writing strategies and skills.
Monitor students’ progress at regular intervals to accurately track progress and adapt instruction as necessary. Collect multiple data points across different writing skills and forms of writing to build a complete picture of student progress. The frequency of monitoring will depend on students’ progress relative to the learning goals at hand, and requires balancing the need for information with the burden that monitoring places on teachers and students. For broader, comprehensive goals, such as improving students’ use of voice or the overall persuasiveness of their arguments, checking student progress at the beginning, middle, and end of the semester enables mid-semester adjustment and provides enough time for instruction to impact learning. For intermediate or simpler goals, such as promoting the richness of detail for a specific piece of text or clarifying an idea, administering brief assessments, sometimes daily, can enable teachers to efficiently verify that students adequately master a skill and adjust instruction before the next skill is introduced. Use tracking tools, such as the one depicted below and on p. 54 of the practice guide, to provide a visual representation of student growth and areas for improvement. Tracking student progress digitally enables teachers to easily manipulate the data and share it with students and parents. If the data collected reveal that students’ skills vary for a particular goal, create small groups of students who have the same needs and regularly monitor their progress.

A sample tracking sheet to monitor student progress over time

<table>
<thead>
<tr>
<th>Session</th>
<th>Score</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>Vocabulary score</td>
<td></td>
</tr>
<tr>
<td>Syntax score</td>
<td></td>
</tr>
</tbody>
</table>
Summary of Supporting Evidence

Recommendations and corresponding levels of evidence

<table>
<thead>
<tr>
<th>Recommendation</th>
<th>Levels of Evidence</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Explicitly teach appropriate writing strategies using a Model-Practice-</td>
<td></td>
</tr>
<tr>
<td>Reflect instructional cycle.</td>
<td>Strong Evidence</td>
</tr>
<tr>
<td>2. Integrate writing and reading to emphasize key writing features.</td>
<td></td>
</tr>
<tr>
<td>3. Use assessments of student writing to inform instruction and feedback.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Moderate Evidence</td>
</tr>
<tr>
<td></td>
<td>Minimal Evidence</td>
</tr>
</tbody>
</table>

Each practice guide recommendation is assigned a level of evidence that summarizes the rigorous research supporting it. To decide whether the level of evidence is minimal, moderate, or strong, the WWC assesses all of the research related to the practices in each recommendation.

The level of evidence conveys the WWC’s assessment about whether rigorous research studies that relate to a recommendation:

- Consistently demonstrate that the recommended practices improved outcomes;
- Reflect the contexts and students that the guide is meant to apply to.

Regardless of the level of evidence, each practice in the guide is recommended by the expert panel.

Summary of evidence for Recommendation 1

The first recommendation in the guide was assigned a strong level of evidence. This means there is consistent evidence that the recommended practices have positive effects on outcomes for the contexts and students to which the guide is meant to apply.

Outcomes: The WWC identified 11 studies that examined interventions related to teaching writing strategies to students and/or using a Model-Practice-Reflect instructional cycle when teaching writing strategies. All of the studies found positive effects on at least one writing outcome, including outcomes in the overall writing quality, genre elements, organization, word choice, writing output, and writing process domains.

Contexts and students: The studies included diverse students in grades 6–12, including general education students, English learners, and students with learning disabilities. The studies were conducted in Germany, Portugal, or the United States, though most of the studies were conducted in the United States.

Summary: Overall, the evidence consistently indicated that the practices outlined in Recommendation 1 had positive effects on a variety of writing outcomes. More than half of the studies supporting this recommendation examined the recommended practices without other intervention components, providing a direct test of the recommended practices. The remaining studies did not provide a direct test: They examined the effects of the recommended practices in combination with other intervention components. However, the recommended practices were critical components of all of the interventions tested. The evidence largely supports both parts of the recommendation, with eight studies examining both the explicit instruction of writing strategies (Recommendation 1a) and the use of a Model-Practice-Reflect instructional cycle for teaching writing strategies (Recommendation 1b). Therefore, the WWC assigned a strong level of evidence to support this recommendation. For more details, see the description of evidence for Recommendation 1 beginning on p. 68 of the practice guide.
Summary of evidence for Recommendation 2

The second recommendation in the guide was assigned a moderate level of evidence. Although several studies relevant to this recommendation met WWC group design standards and showed positive effects, more than half of these studies examined interventions that included other recommended practices and lacked a direct test of the recommended practices alone.

Outcomes: The WWC identified eight studies that examined interventions that integrated reading and writing instruction. Seven of the eight studies showed positive effects on at least one writing outcome, including outcomes in the overall writing quality, genre elements, and word choice domains. Of these seven studies, one study also found an indeterminate effect on another writing outcome. The final study related to this recommendation found an indeterminate effect for the only measure examined.

Contexts and students: The studies included diverse students in grades 6–12, including general education students and English learners. All of the studies were conducted in the United States except one, which was conducted in Germany.

Summary: While seven studies found positive effects on at least one outcome, one of these studies also found indeterminate effects on writing outcomes, and fewer than half of these studies provided a direct test of the recommendation. Two of the three studies with positive effects that provided a direct test of the recommendation had a very short duration (ranging from one session to eight sessions). Therefore, the WWC assigned a moderate level of evidence to support this recommendation. For more details, see the description of evidence for Recommendation 2 beginning on p. 73 of the practice guide.

Summary of evidence for Recommendation 3

The third recommendation in the guide was assigned a minimal level of evidence. A minimal level of evidence does not mean that there is no research evidence supporting the recommendation. In fact, all studies meeting WWC group design standards that included the practices in the third recommendation showed positive effects; however, these studies did not offer a direct test of the recommended practices.

Outcomes: The WWC identified four studies that examined teachers’ use of formative assessment to inform instruction and feedback. All studies found positive effects on at least one writing outcome, including outcomes in the overall writing quality, audience, organization, and use of evidence domains.

Contexts and students: The studies included primarily English learners in grades 6–12. All of the studies took place in the United States, with three of the studies conducted in southern California.

Summary: Overall, the evidence consistently indicated that the practices outlined in Recommendation 3 had positive effects on writing outcomes, but none of the studies provided a direct test of the recommendation. Three of the studies have limited generalizability because they examined the same intervention, were conducted in a single region of one state, and included primarily English learners. Therefore, the WWC assigned a minimal level of evidence to support this recommendation. For more information, see the description of evidence for Recommendation 3 beginning on p. 77 of the practice guide.

If you would like more information about the specific study features that the WWC examines to determine the level of evidence, you can find a detailed list in Appendix Table A1 on pp. 61–62 in the practice guide.
Endnotes

1 The Teaching Elementary Students to be Effective Writers practice guide (Graham et al. 2012) also describes the writing process.
2 De La Paz and Graham (2002).
3 Page Voth and Graham (1999).
4 Graham and Hebert (2010).
5 Shanahan (2016).
6 Fitzgerald and Shanahan (2000).
7 Adapted from Greenstein (2010).
8 For more information on data-driven decision making, see the Using Student Achievement Data to Support Instructional Decision Making practice guide (Hamilton et al. 2009).


The Institute for Education Sciences publishes practice guides in education to provide educators with the best available evidence and expertise on current challenges in education. The WWC develops practice guides in conjunction with an expert panel, combining the panel’s expertise with the findings of existing rigorous research to produce specific recommendations for addressing these challenges. The expert panel for this guide included Steve Graham, Jill Fitzgerald, Linda D. Friedrich, Katie Greene, James S. Kim, and Carol Booth Olson. See Appendix A on p. 59–62 for a full description of practice guides.

Visit the WWC at whatworks.ed.gov

Sign up to receive additional information from the WWC at https://ies.ed.gov/newsflash/

You can also find us on Facebook and Twitter.