Below is a list of 54 instructional strategies, or approaches, that have been adapted with the working groups of the Washoe County School District. What follows the list is some explanation of each strategy/approach, along with related strategies/approaches where applicable.

1. Academic Conversations
2. Academic vocabulary and language
3. Accountable talk
4. Adapting to learning styles/multiple intelligences
5. Analysis of student work
6. Authentic learning
7. Close read
8. Conferencing
9. Cooperative learning
10. Collaborative learning
11. Activating prior knowledge
12. Debate
13. Direct instruction
14. Discovery/Inquiry based learning
15. Discussion techniques
16. Document based questions
17. Effective questioning
18. Field experience, field trip or field study
19. Flexible/Strategic grouping
20. Formative assessment process
21. Generating and testing hypotheses
22. Graphic organizers
23. Guided reading
24. Hands-on learning
25. Guided practice
26. Identifying similarities and differences
27. Integration of content areas
28. Jigsaw
29. Kinesthetic learning/Total physical response
30. Learning centers
31. Mastery learning
32. Modeling
33. Music and songs
34. Nonlinguistic representations
35. Note booking/journaling
36. Numbers talks
37. Peer teaching/collaboration
38. Project-based learning
39. Read-aloud
40. Reading and writing across the curriculum
41. Realia
42. Reciprocal teaching
43. Reinforcing effort and providing recognition
44. Rich math tasks
45. Roleplay/simulations/drama
46. SIOP strategies
47. Small group instruction
48. Socratic seminar
49. Structured academic controversy
50. Student goal setting
51. Student self-assessment
52. Summarizing and note taking
53. Targeted feedback
54. Word wall
## Instructional Strategies List

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<th>Instructional Strategy/Approach</th>
<th>Related Strategy/Approach</th>
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<tr>
<td><strong>1. Academic Conversations</strong></td>
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| Academic conversations are purposeful language tasks in which students are required to do more than complete a sentence stem, conduct a quick pair-share, or even participate in some cooperative learning activities. They typically include five key discourse moves, or conversation skills: Elaborate and Clarify; Support Ideas with Examples; Build On and/or Challenge Others’ Ideas; Paraphrase; and/or Synthesize Conversation Points (Zwiers & Crawford, 2011). Academic conversations are essential to academic language acquisition at all grade levels, particularly in settings where such conversations may not be taking place in the home. | a. Discussion techniques  
 b. SIOP strategies  
 c. Cooperative learning  
 d. Word wall |
| **2. Academic vocabulary and language** |                           |
| Academic vocabulary and language are used in academic dialogue and text and may not necessarily be encountered in conversation, though they may relate to familiar words that students use, such as observe rather than watch. Understanding academic vocabulary and language helps students to understand oral directions and classroom instructional dialogue and to comprehend texts across different content areas, including math, science, and social studies/history. Important for all learners, academic vocabulary and language must be taught explicitly, particularly to second language learners. Generally, vocabulary is categorized into three tiers: (1) Basic vocabulary or words most children will know, including high-frequency words that usually are not multiple meaning words. (2) Less familiar, yet useful vocabulary found in written text and shared between the teacher and student in conversation and referred to in the Common Core as “general academic words.” Also called “rich vocabulary,” these words are more precise or subtle forms of familiar words and include descriptive and multiple meaning words. Instead of walk, for example, saunter might be more descriptive. (3) The third tier of words is called “domain specific” in the Common Core and refers to words that carry specific concepts of the subject matter or processes taught in schools. Generally, they have low frequency use and are limited to specific knowledge domains (e.g., isotope, peninsula, or mitosis), which are best learned with content lessons and are common in informational texts. | a. Close reading  
 b. SIOP strategies  
 c. Word wall |
| **3. Accountable talk** |                           |
| Talking with others about ideas is fundamental to classroom learning. Classroom talk that promotes and sustains learning should be accountable to other learners, use accurate and appropriate knowledge, and adhere to rigor in thinking. Accountable talk responds to and further develops what others have said through relevant observations, ideas, opinions, or more information. Accountable talk draws on evidence appropriate to the content area (e.g., a proof in math, data from investigations in science, textual details in literature, primary sources in social studies) and follows the rules of reasoning. | a. Cooperative learning  
 b. Discovery/Inquiry-based learning  
 c. Socratic seminar |
| **4. Adapting to learning styles/multiple intelligences** |                           |
| The cognitive theory of multiple intelligences posits that students learn, remember, perform, and understand in different ways, including various intelligences, such as musical–rhythmic, visual–spatial, verbal–linguistic, logical–mathematical, bodily–kinesthetic, interpersonal, intrapersonal, and naturalistic. As a cognitive theory, learning styles/multiple intelligences is controversial but has proved useful to classroom teachers in fostering different interests, providing variety and differentiation in instruction, and developing the whole child. | a. Field experience, field trip, or field study  
 b. Hands-on learning  
 c. Learning centers  
 d. Music and songs  
 e. Role play/simulations/drama |
| **5. Analysis of student work** |                           |
| Analysis of student work may be (1) a feature of a lesson conducted by a teacher or (2) individual feedback provided to students from a teacher; (3) a discussion among a small group of students who are providing feedback to one another; (4) a discussion among teachers of the aspects of student work; and/or (5) a mode of formally assessing a skill, such as writing. For any of the | a. Conferencing  
 b. Student self-assessment |
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foregoing purposes, some protocol describing the attributes and levels of quality for the particular learning task is required as the basis of an analysis. When used in formal assessment situations, anonymous student exemplars that illustrate various responses and levels of quality plus an analysis of inter-rater reliability are required to promote consistency and validity.

6. **Authentic learning**
   Authentic learning refers to a wide variety of educational and instructional techniques focused on connecting what students are taught in school to real-world issues, problems, and applications. The basic idea is that students are more likely to be interested in what they are learning, more motivated to learn new concepts and skills, and better prepared to succeed in college, careers, and adulthood if what they are learning mirrors real-life contexts, equips them with practical and useful skills, and addresses topics that are relevant and applicable to their lives outside of school.

   a. Cooperative learning
   b. Collaborative learning
   c. Project-based learning
   d. Current events analysis
   e. Science labs

7. **Close read**
   Close reading refers to approaching a variety of texts of sufficient complexity through a methodical examination (often used in poetry explication) in order to uncover layers of meaning that lead to deeper comprehension. How a text is written is as important as the content itself in understanding the author’s meaning. Deriving meaning from a close reading of a text requires attention to how the text makes meaning through imagery, word choices, and sentence structure as well as how the central idea, tone, and voice are revealed through the choices of detail and language. Emphases on close reading of complex texts reflect priorities of the Common Core.

   a. Document-based questions
   b. Academic language

8. **Conferencing**
   A one-to-one teacher conference with a student about his or her work in progress is prevalent in teaching writing and speaking, but it is also useful in other areas. The purpose of the conference--engaging in meaningful conversation about the student’s work in progress--will not be realized automatically. Preparation (on the part of both the teacher and the student) before the conference, careful listening during the conference, recordkeeping, and follow-up are essential components for a successful outcome. In student-to-student conferencing, participants require guidance, a focused protocol, and accountability.

   a. Analysis of student work
   b. Student goal setting
   c. Student self-assessment

9. **Cooperative learning**
   Students in small heterogeneous groups take roles and learn to share knowledge and tasks with one another through a variety of structures with this strategy. While different experts categorize these differently, common features of effective cooperative learning include team building, positive interdependence, group interaction, structured activity, and individual accountability. Cooperative learning is a collaborative approach with student groups that are more structured and managed by the teacher, usually within the classroom, for the purposes of promoting homogeneous groups and supporting diverse learners.

   a. Jigsaw
   b. Structured academic controversy
   c. Collaborative learning

10. **Collaborative learning**
    Collaborative learning is an umbrella term for a variety of educational approaches involving joint intellectual effort by students working together. Usually, students are working in groups of two or more, mutually searching for understanding, solutions, or meanings, or creating a product. Collaborative learning activities vary widely, but most center on students’ exploration or application of the course material, not simply the teacher’s presentation or explication of it. Collaborative learning is a collaborative approach with student groups that are more structured and managed by the teacher, usually within the classroom, for the purposes of promoting homogeneous groups and supporting diverse learners.

   a. Cooperative learning
   b. Science labs
   c. Authentic learning
   d. Project-based learning
| **11. Activating prior knowledge** | a. Effective questioning  
b. K-W-L chart  
c. Realia |
---|---|
With respect to Ausabel’s cognitive theory that learning new knowledge and skills relies on what is already known, teachers use many strategies to help students activate their prior knowledge and eliminate irrelevant and possibly erroneous knowledge. Cues and questions are among the most frequent ways that teachers prompt students to recall and use what they have already learned. Effective questions and cues focus on what is important and benefit from a judicious use of “wait time” and higher-level questions. |
| **12. Debate** | a. Current events  
b. Discovery/Inquiry-based learning |
Debate is a structured form of argumentations that requires participants to engage in research, develop listening and oratory skills, and think critically. Debating can be employed as an instructional strategy wherever the learning material and circumstances are open to opposing points of view. Debates may be viewed or read to contribute additional perspectives on a classroom topic. |
| **13. Direct instruction** | a. modeling |
General usage of the term “direct instruction” refers to instructional approaches that are structured, sequenced, and led by teachers and/or present academic content through teacher lecture or demonstration. Many components of direct instruction are basic to effective teaching, including identifying learning goals, organizing and sequencing lessons to strengthen understanding, modeling a process, providing descriptions and illustrations, checking for understanding, and providing feedback. |
| **14. Discovery/Inquiry-based learning** | a. Field experience, field trip, or field study  
b. Hands-on learning  
c. Notebooking/journaling |
Inquiry learning is based on constructivist theories of learning, where knowledge is “constructed” from experience and process. It covers a range of approaches, including: field work, case studies, investigations, individual and group projects, and research projects. It is the hallmark strategy of science, and often social science, learning. Specific learning processes that students engage in during inquiry include: developing questions, seeking evidence to answer questions, explaining evidence, and justifying or laying out an argument for the evidence. Progress and outcomes are assessed through observing students’ learning develop over time through conversations, notebook entries, student questions, procedural skills, use of evidence, and other techniques. |
| **15. Discussion techniques** | a. Discovery or inquiry-based learning  
b. Socratic seminar  
c. Structured academic controversy |
Discussion techniques are a variety of instructional methods for open-ended, collaborative exchange of ideas among a teacher and students or among students for the purpose of furthering students thinking, learning, problem solving, understanding, or literary appreciation of a specific topic or text. Participants present multiple points of view, respond to the ideas of others, and reflect on their own ideas in an effort to build their knowledge, understanding, or interpretation of the matter at hand. Discussions may occur among members of a small group, or whole class and be teacher-led or student-led. They frequently involve discussion of a written text or texts though discussion can also focus on a problem, issue, or topic that has its basis in a “text” in the larger sense of the term. Some methods used are Structured Academic Controversy (SAC), Debates, Role playing or simulations, Fish Bowl, and Socratic Seminar; while these are examples it is not an exhaustive list. |
b. Academic language |
A document-based question (DBQ) is an essay question or series of short-answer questions on an examination where students are asked to construct a response using one’s own knowledge together with an analysis of provided documents. The documents provided can be from text but can also include primary and secondary sources, pictures, political cartoons, maps, graphs, or charts. Often, the sources are selected to provide different perspectives or views. Document-based questions were developed for the Advanced Placement History test several decades past but since have migrated to other content areas and are explicitly taught in AP classes. DBQ as a general teaching and assessment strategy has been highlighted by Common Core recommendations that students read like detectives and use text in developing their responses. |
### Instructional Strategies List

| 17. Effective questioning | a. Cues, questions  
b. Activating prior knowledge  
c. Inquiry-based learning |
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<td>Teacher questioning and student response are common classroom learning activities. Research finds that teacher questions (and cues) are effective when they focus on what is important, require students to respond at higher levels, provide adequate wait time after a question is asked and establish an engaging introduction for the lesson. Effective questioning can also play a role in focusing students on unit learning goals or overarching themes throughout a longer period of study.</td>
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| 18. Field experience, field trip, or field study | a. Discovery/Inquiry-based learning  
b. Guest speakers  
c. Hands-on learning  
d. Non-linguistic representations |
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<td>Often thought of as enrichment or reward activity, experiences outside the classroom enable students to extend classroom learning into real world locales, such as when visiting a natural or historical site, exploring current trades and industries on-site, or working alongside an expert in a field of study. The experience is maximized for students when the purpose is clear, including how they will report on their observations, questions, and conclusions. When feasible, research shows this type of learning to be quite powerful compared to simulations or contrived experiences mirroring the real-world in the classroom.</td>
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| 19. Flexible/strategic grouping | a. Formative assessment process  
b. Cooperative Learning  
c. Guided reading |
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<td>Informally grouping and regrouping students for a variety of purposes throughout the school day or during an instructional unit supports the learning of all students. Flexible grouping strategies are used to meet curricular goals, engage students, and respond to individual needs. Flexible grouping helps teachers overcome the disadvantages of ability grouping while still attending to individual performance issues. Both teacher-led and student-led groups will contribute to learning, but grouping decisions should respond to the dynamics inherent in each type of group. Teacher-led groups are the most common configuration—whole-class, small group, and individual instruction—and provide an efficient way of introducing material, summing-up conclusions from individual groups, meeting the common learning needs of a large or small group, and providing individual attention or instruction. Student-led groups take many forms, but share a common feature—that students control the group dynamics and have a voice in setting the agenda. Student-led groups provide opportunities for divergent thinking and encourage students to take responsibility for their own learning.</td>
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| 20. Formative assessment process | a. Direct instruction  
b. Flexible/strategic grouping |
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<td>&quot;Formative assessment is a deliberate process used by teachers and students during instruction that provides actionable feedback that is used to adjust ongoing teaching and learning strategies to improve students' self-assessment, reflection, and attainment of curricular learning targets/goals&quot; (Smarter Balanced Assessment Consortium, 2013). Formative assessment process builds students' metacognition, increases students' motivation, resulting in self-regulated, life-long learners. Some common classroom formative assessments include: summaries, quick-writes, reflections, checklists, charts, graphic organizers, visual representations, and short quizzes. In recent years, many districts and schools have implemented common formative assessments based on content standards.</td>
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| 21. Generating and testing hypotheses | a. Notebooking/journaling  
b. Project-based learning  
c. Summarizing and note taking |
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<td>At an application level, generating and testing hypotheses requires students to use knowledge to extend their understanding or generate new knowledge. It is a fundamental of science learning, problem solving, and historical investigations. The process can be deductive (starting from a general rule or law) or inductive (drawing a conclusion or generalizing from a set of data or information). Asking students to explain their hypotheses, process, and conclusions, ideally in writing, strengthens student learning and accountability.</td>
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<tr>
<th>22. Graphic organizers</th>
<th>a. Direct instruction</th>
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<td>A graphic organizer is a visual and graphic display that depicts the relationships between facts, terms, and/or ideas within a learning task. Graphic organizers are also referred to as knowledge maps, concept maps, story maps, cognitive organizers, and may be introduced as advance organizers before the learning task or at other points in the learning process. Research indicates</td>
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that they improve learning when there is explicit instruction, incorporating teacher modeling and independent practice with feedback.

### 23. Guided reading
Guided Reading is a strategy that supports students to discover the meaning of a text for themselves. The amount of guidance given by the teacher varies according to the ability and confidence of the students. In Guided Reading, students with similar reading abilities or students who need to acquire similar skills to be successful readers are grouped together. Groups can also consist of students with common interests or experiences. The groups are flexible and are kept small to encourage interaction among the students and to allow the educator to observe individual reading behavior.

- a. Small group instruction
- b. Effective questioning
- c. Graphic organizers

### 24. Hands-on learning
Hands-on learning is an educational strategy that directly involves learners by encouraging them to do something in order to learn about it. It is learning by doing. Some subject matter like music and art are inherently hands-on; others like higher levels of mathematics are more abstract. Nonetheless, all learning can benefit from activity that stimulates different regions of the brain. For younger learners, those learning English or another language, or those with learning disabilities, thoughtful hands-on teaching strategies are their keys to learning.

- a. Field experience, field trip, or field study
- b. Learning centers
- c. Music and songs
- d. Role play/simulations/drama

### 25. Guided practice
Two staples of education, homework and practice are ways of extending learning time for mastering a skill. Designing activity for classroom practice and homework should aim to help students refine and extend their learning. Research shows that the purpose of the work should be clear and when completed should be commented on. The concept of the “flipped classroom” is changing the landscape of independent practice in the classroom.

- a. Direct instruction
- b. Effective questioning

### 26. Identifying similarities and differences
Comparing or contrasting two or more items (e.g., poems, characters, processes, animals, artists, historical figures or events) requires students to think at the analysis level of Bloom’s Taxonomy. Applicable to all content areas, teachers facilitate critical thinking by providing strategic comparisons, requiring students to justify their comparisons, and allowing for a full range of comparisons—including beyond what the teacher may have expected from students. Research points to this as a high-leverage strategy.

- a. Discovery/Inquiry-based learning
- b. Graphic organizers
- c. Note booking/journaling

### 27. Integration of content areas
There is a strong case to be made for integrating curriculum. It strengthens skills that students encounter in one content area, but also practice in another, such as reading and writing, and it can lead to the mastery of those skills. It provides meaningful instruction for students in multiple areas of standards in a single class or learning experience. It is also a more authentic way of learning because it reflects what we experience, both professionally and personally, in the world. It can be a way to engage students when introducing them to a challenging subject. STEM education is a current example of effective content integration. Research supports the integration of content areas.

- a. Project-based learning
- b. Reading and writing across the curriculum
- c. STEM learning
- d. Personalized learning

### 28. Jigsaw
Jigsaw is a cooperative learning strategy that enables each student of a group to specialize in one aspect of a topic or one part of a reading or other task. Students meet with members from other groups who are assigned the same aspect, and after mastering the material, return to the “home” group and teach the material to their group members. With this strategy, each student in the “home” group holds a piece of the topic's puzzle and work together to create the whole jigsaw. The strategy is often used in other instructional situations for the purpose of team building or quickly managing a large task in a short time.

- a. Cooperative learning
- b. Peer teaching/collaboration
- c. Close read
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| 29. | **Kinesthetic learning/Total Physical Response**  
Total physical response (TPR) is a language teaching method; it is based on the coordination of language and physical movement. In TPR, instructors give commands to students in the target language, and students respond with whole-body actions. The method is an example of the comprehension approach to language teaching. The listening and responding (with actions) serves two purposes: It is a means of quickly recognizing meaning in the language being learned, and a means of passively learning the structure of the language itself. Grammar is not taught explicitly, but can be learned from the language input. TPR is a valuable way to learn vocabulary, especially idiomatic terms, e.g., phrasal verbs. |
|   | a. Adapting to learning styles/multiple intelligences |
| 30. | **Learning centers**  
Learning centers are areas created within the classroom where students learn through a designated activity and/or play. Play is an active form of learning that involves the whole child. Even cognitive development is also enhanced by child-initiated exploration and discovery. In learning centers, students learn to make decisions, cooperate and share with others, and problem-solve. The role of the teacher is to (1) observe, listen, and ask questions; (2) demonstrate, participate, or help as needed; and (3) discuss and make connections. |
|   | a. Hands-on learning  
b. Role play/simulations/drama |
| 31. | **Mastery learning**  
As developed by Benjamin Bloom, mastery learning applies the principles of individualized instruction and tutoring to whole class learning. In this model, rather than waiting to the end of a unit to check on progress, teachers design ongoing checks to use during the process to provide individual feedback, diagnose learning needs/difficulties, prescribe specific remediation or enrichment strategies, and re-assess with a parallel assessment. Mastery learning is basic to many textbook programs and has engendered formative assessments as a routine of classrooms. Mastery learning honors the idea that students learn at different levels or paces. A significant body of research shows that compared to traditional classrooms, students in well-implemented mastery classrooms reach higher levels of achievement. |
|   | a. Direct instruction  
b. Formative assessment process |
| 32. | **Modeling**  
Modeling is an instructional strategy wherein the teacher or another student demonstrates a new concept or skill and students learn by observing and emulating. Modeling is an effective instructional strategy when it allows students to observe thought processes and imitate particular behaviors or steps in a process. Types and purposes of modeling can include approaches such as task and performance modeling (demonstrating a task), metacognitive modeling (thinking aloud), and disposition modeling (conveying one’s own enthusiasm, interest, or commitment). Modeling can be used across disciplines and in all grades and ability levels. |
|   | a. Direct instruction  
b. Graphic organizers |
| 33. | **Music and songs**  
Music is a powerful teaching tool that can be integrated into most learning situations. It has a direct physical, emotional, and psychological effect on students. Music and songs can create a heightened awareness, motivate students to engage more rapidly, and provide a sense of safety. Each of these factors adds considerably to the development of a powerful learning environment. In addition, music can serve as a vehicle to teach curriculum content, such as songs and music from historical eras or a song about a current event promoting a point of view. In this context, music provides a multi-sensory approach to enhance the learning and retention of academic skills. Research supports the use of music as a mnemonic device for learning and recalling information. |
|   | b. Adapting to learning styles/multiple intelligences  
c. Hands-on learning |
| 34. | **Nonlinguistic representations**  
Information is stored in the memory in many forms, including imagery (nonlinguistic representations). Since language-based learning dominates so much classroom instruction, instructional strategies that help students create images are intended to stimulate the brain in new ways, increase understanding, and develop memory. Engaging in drawing, kinesthetic activity, physical modeling, and graphically organizing are among activities used by teachers to help students form their own mental pictures. Asking students to explain and share their images encourages meta-cognitive thinking. |
|   | a. Graphic organizers  
b. Hands-on learning  
c. Role-play/simulations/drama  
d. SIOP strategies |
### Instructional Strategies List

| 35. **Notebooking/journaling**  
Notebooks and journals are a staple of writers, artists, and scientists for whom regular observations, data collection, and documentation are essential. Since learning any subject is enhanced through the discipline of writing, teachers use notebook and journal assignments in many content areas. Students who keep journals are actively engaged in their own learning and have the opportunity to clarify and reflect upon their thinking.  
| a. Discovery/Inquiry-based learning  
b. Project-based learning  
c. Summarizing/note taking |
| 36. **Number talks**  
Number talks are usually short, ongoing daily routines that engage students in “mental math” by grappling with interesting math problems and provide students with meaningful ongoing practice. A number talk is a powerful tool for helping students develop computational fluency because the expectation is that they will use number relationships and the structures of numbers to add, subtract, multiply and divide. Number talks should be structured as short sessions alongside (but not necessarily directly related to) the ongoing math curriculum. It is important to keep number talks short, as they are not intended to replace current curriculum or take up the majority of the time spent on mathematics.  
| a. Homework and practice  
b. Reinforcing effort and providing recognition |
| 37. **Peer teaching/collaboration**  
Collaborative learning is based on the theory that knowledge is a social construct. Collaborative activities are most often based on four principles: (1) the learner or student is the primary focus of instruction; (2) interaction and “doing” are of primary importance; (3) working in groups is an important mode of learning; (4) structured approaches to developing solutions to real-world problems should be incorporated into learning. Collaborative learning can occur peer-to-peer or in larger groups. Peer teaching/learning is a type of collaborative learning that involves students working in pairs or small groups to discuss concepts, or find solutions to problems. It enables learners to take responsibility for reviewing, organizing, and consolidating existing knowledge and material; understanding its basic structure; filling in the gaps; finding additional meanings; and reformulating knowledge into new conceptual frameworks. Learning from peers increases learning both for the students being helped as well as for those giving the help.  
| a. Cooperative learning  
b. Collaborative learning  
c. Reciprocal teaching  
d. Flexible/strategic grouping  
e. Project-based learning |
| 38. **Project-based learning**  
In K-12 education, project-based learning has evolved as a method of instruction that addresses core content through rigorous, relevant, hands-on learning. Projects tend to be more open-ended than problem-based learning, giving students more choice when it comes to demonstrating what they know. Different from projects that are the culmination of a learning unit, PBL projects are the learning unit, meaning that fundamental concepts and skills are learned throughout the project. Projects are typically framed with open-ended questions (How do we reduce our school’s carbon footprint?) that drive students to investigate, do research, and/or construct their own solutions. Students use technology tools much as professionals do—to communicate, collaborate, research, analyze, create, and publish their own work for authentic audiences. Instead of writing book reports, for instance, students in a literature project might produce audio reviews of books, post them on a blog, and invite responses from a partner class in another city or country.  
| a. Discovery/Inquiry-based learning  
b. Hands-on learning  
c. Integration of content areas  
d. Structured academic controversy |
| 39. **Read-aloud**  
Read-aloud is an instructional format, included formally in elementary reading programs and as an instructional activity in all areas and levels of the curriculum. A primary purpose of a read-aloud is to create a community of readers in the classroom and establish a known text as a basis for related literacy activities. Reading aloud allows teachers to model important components of literacy, such as fluency, expression, and interacting with texts while exposing students to vocabulary that is just beyond their instructional level and demonstrating how reading is a source of information and enjoyment.  
| a. Close read  
b. Modeling  
c. Realia  
d. Word wall |
| 40. **Reading and writing across the curriculum**  
RAWAC is not uncommon in self-contained classrooms where literacy is often well integrated into all subject matter and activity. In secondary schools, it may rely on interdepartmental agreements and a professional development program. Nonetheless, research firmly links reading and writing to  
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<td><strong>41. Realia</strong></td>
<td>Realia refers to real life objects used in classroom instruction in order to improve students' understanding of other cultures and real life situations. Teachers of English language learners and foreign languages employ realia to strengthen associations between words and the objects themselves. Realia are also used to connect learners with the point of a lesson by providing tactile and multidimensional connections between learned material and the object of the lesson. Primary objectives of this strategy include increasing comprehensible input, using language in context, and promoting verbal interaction and active involvement.</td>
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<tr>
<td>a. Hands-on learning</td>
<td>b. Learning centers</td>
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<td><strong>42. Reciprocal teaching</strong></td>
<td>This is an instructional approach in which students become the teachers in small group reading (or other content) sessions. Teachers model, then help students learn to guide group discussions using strategies such as summarizing, question generating, clarifying, and predicting. Once students have learned the strategies, they take turns assuming the role of teacher in a dialogue about what has been read. In another version, students take the roles of predictor, summarizer, questioner, and clarifier.</td>
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<tr>
<td>a. Cooperative learning</td>
<td>b. Jigsaw</td>
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<tr>
<td><strong>43. Reinforcing effort and providing recognition</strong></td>
<td>Students may attribute success at a task to ability, effort, other people, or luck, but three of these four attributions may be self-defeating. Teachers can influence student beliefs about the relationship between their efforts and accomplishment by helping them track and evaluate their efforts and accomplishments. Providing recognition in the form of praise and reward is fundamental to behavioral learning theory and may be undervalued in relation to intrinsic rewards, but research indicates praise is effective when it is expressly connected to a performance standard and that it is more motivating than tangible rewards.</td>
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<td>a. Direct instruction</td>
<td>b. Student self-assessment</td>
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<td><strong>44. Rich math tasks</strong></td>
<td>Effective mathematics teaching uses rich math tasks as one way to motivate student learning and help students build new mathematical knowledge through problem solving. Students will persevere in exploring and reasoning through tasks that allow students to access mathematical concepts through multiple entry points. Students take responsibility for sense making by drawing on and making connections to previous understanding and the understanding of others. Students select tools and different representations to show their learning and provide justifications that support this learning.</td>
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<td>a. Activating prior knowledge</td>
<td>b. Collaborative learning</td>
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<td><strong>45. Role play/simulations/drama</strong></td>
<td>Research about the impact on learning provided by simulations and games is encouraging: (1) Games, simulations, and role-playing help students invent, experiment, and practice interpersonal skills in a relatively low-risk environment. (2) The more students use different ways of representing knowledge, the better they think about and recall learning. (3) Simulations provide opportunities to visualize, model, and role-play within a dynamic situation, thereby promoting curiosity, exploration, problem solving, and understanding. Simulations in science and math provide learners the opportunity to engage in experimental situations that would otherwise be too hazardous or cost prohibitive to conduct in the classroom (i.e., simulation of an atom smasher uses gum balls to help students envision what happens in a linear accelerator; a rollercoaster design simulator allows students to experiment with slope, angle, and speed). Students already know that technology can help them conduct operations and manipulate variables to explore reactions. In the technology field, “serious games” is a term for games that are applied to the goals of education, bringing gaming technology to fields such as education, policy development, and leadership.</td>
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| 46. | **SIOP strategies**  
Sheltered instruction (SI) provides access for English learners to grade-level content while they continue to improve in English language proficiency. The Sheltered Instruction Observation Protocol (SIOP®) articulates a practical model of sheltered instruction with 30 features organized into eight components. Its effectiveness as an assessment and observation protocol has been validated by research. | a. Realia |
| 47. | **Small group instruction**  
Small group instruction typically refers to a teacher working with a small group of students on a specific learning objective. These groups consist of 2-4 students and provide these students with a smaller student-teacher ratio. Small group instruction usually follows whole group instruction. It allows teachers to work more closely with each student, reinforce skills learned in the whole group instruction, and check for student understanding. It allows students more of the teacher’s attention and gives them a chance to ask specific questions they may have about what they learned. Teachers can use small group instruction to provide struggling students with intervention as well. Small group instruction gives teachers a natural opportunity to provide targeted, differentiated instruction for small groups of students. It gives the teacher an opportunity to evaluate and assess what each student can do more closely and to build strategic plans for each student around those assessments. | a. Flexible/strategic grouping  
b. Guided reading  
c. Effective questioning  
d. Graphic organizers |
| 48. | **Socratic seminar**  
Based on Plato’s Dialogues, the Socratic method challenges students to think analytically and critically with the questioning and careful guidance of a teacher. The Socratic seminar is fundamental to the Great Books and Paideia programs. Students sit in a circle to discuss ideas—often moral dilemmas—posed by a reading or work of art. Ideally, teacher questions are open-ended and students are encouraged to use the text as evidence in their responses. Students do not raise hands to speak but signal through eye contact. A variation known as Socratic circles places one circle of discussants within another. The inner circle carries out a discussion while the outer circle listens in order to critique, then the circles shift roles. | |
| 49. | **Structured academic controversy**  
Structured academic controversy is a cooperative learning strategy developed by David and Roger Johnson in order to structure and focus to classroom discussions. Working in pairs and then coming together in four-person teams, students explore a question by reading about (or viewing) content and then presenting contrasting positions. Afterwards, they engage in discussion to reach consensus. A SAC discussion moves students beyond “either/or” thinking to more nuanced historical syntheses. The strategy typically has five basic steps: (1) students form four-person teams comprised of two dyads; (2) each dyad reviews materials that represent different positions on an issue; (3) dyads reconvene as a four-person team and present their views, one dyad acting as presenters, the other as listeners; (4) the listening dyad repeats back to the presenters what they understood and the sides switch; and (5) the dyads abandon their original assignments and work toward reaching consensus. If consensus proves unattainable, the team clarifies where their differences lie. | a. Cooperative learning  
b. Debate  
c. Jigsaw  
d. Socratic seminar |
| 50. | **Student goal setting**  
Teachers who set, define, and communicate learning objectives effectively with students employ research-based findings that say goal setting with students should: (1) be flexible and general because when a goal is too narrowly focused, it may limit learning (e.g., If the goal is to learn how a piston works, students may not learn its relationship to other parts of an engine), although too general goals may be unattainable; (2) encourage student ownership (e.g., creating own goals, personalizing teacher goals, committing to contracts, and providing feedback on their progress in journals, videos, etc.); (3) focus on understanding over accomplishing tasks; and (4) allow students enough time to adapt goals to their own interests, learning styles, and prior knowledge. Setting goals benefits from explicit instruction. | a. Conferencing  
b. Reinforcing effort and providing recognition |
| 51. **Student self-assessment** | a. Conferencing  
b. Reinforcing effort and providing recognition |
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Student self-assessment may refer to inventories/surveys that students respond to, such as interests, learning preferences, or college and career diagnostics. It may also refer to academic assessment tools, often a rubric, that describes a learning task or skill by its attributes and level of quality, which students use to assess their own progress and performance. These tools may also be used individually or in teacher or peer conferences and tutorials. |
| 52. **Summarizing and note taking** | a. Close read  
b. Direct instruction |
Summarizing and note taking  
Effective summarizing leads to an increase in student learning. Students who can effectively summarize learn to synthesize information, a higher-order thinking skill, which includes analyzing information, identifying key concepts, and defining extraneous information. Helping students recognize how information is structured will help them summarize what they read or hear (e.g., summarizing a reading assignment is more effective when done within summary frames that include questions to direct student attention to specific content). Note taking is a related strategy that supports student learning. Without explicit instruction in note taking, students may write down words or phrases word for word, without analysis. Successful note-takers summarize to arrive at a nugget of meaning, which they are much more likely to retain and benefit from using notes as a document of their learning. Teachers can prompt students to review and refine their notes, particularly when it is time to prepare for an exam, write a research paper, or other summative assessment of learning. These are college-ready skills that increase opportunity for all students to succeed in higher education. |
| 53. **Targeted feedback** | a. Reinforcing effort and providing recognition |
Targeted feedback  
Research and effective practice points to the following keys to using targeted feedback to improve student achievement and avoid negative effects: (1) link feedback to objectives; (2) use a formative evaluation approach over a summative approach; (3) make guidance specific (e.g., proofing remarks or codes may not communicate well); (4) provide feedback in a timely manner (not long after assignment is forgotten); and (5) identify how students should use feedback to make improvements. |
| 54. **Word wall** | a. Academic vocabulary and language  
b. Hands-on learning  
c. Identifying similarities and differences  
d. Read-aloud |
Word wall  
A word wall is an organized collection of words prominently displayed in a classroom and frequently used as an interactive literacy tool for teaching vocabulary and spelling to children. There are many different types of word walls, such as high frequency words, word families, and story- or unit-related names. Due to the flexible nature of word walls and their potential to "grow" alongside the students, they are used in classrooms ranging from pre-school through high school. Word walls are considered to be interactive and collaborative tools, since they are student-created and student-centered artifacts. Many variations of the word wall are currently in use, including those featuring illustrations of the words and color-coded lists. They teach children to recognize and spell high frequency words, see patterns and relationships, apply phonics rules, and provide reference support during reading and writing activities. Students gain independence by using a word wall in daily activities.