College Student Writers' Use and Modification of Planning and Evaluation Strategies After a Semester of Instruction

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Abstract

The purpose of this study was to investigate how students who were enrolled in a developmental writing course at a community college used and adapted cognitive writing strategies learned in the course. The students participated in a funded research project for the development and evaluation of a writing curriculum based on self-regulated strategy instruction. The current study investigated students' application of the planning and revising strategies using think-aloud protocols. The results showed that students remembered the strategies but did not use them consistently. Also, they tended to use an outline but not always effectively. Finally, reading comprehension seemed to impact their use of revision strategies. Limitations and implications for future research are discussed.

Keywords: Strategy instruction, basic writers, evaluation, revision, think aloud, goal setting, self-regulation

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American students' underperformance in writing is a disappointing educational reality that is discussed in public forums, research findings, and reports (e.g., National Commission on Writing for America's Families, Schools, and Colleges, 2004; NCES, 2013). A large number of United States high school graduates are required to attend developmental classes when they enter college (Grubb, Worthen, Byrd, et al., 1999; NCES, 2013; 2011; Perin, 2013). Attewell, Lavin, Domina, & Levey, (2006) reported that 40% of all 2-year and 4-year students took remedial classes, including 28% in writing.

In response to this issue, we initiated a systematic program of research to develop and evaluate innovative methods for writing instruction in developmental writing courses. Design research (e.g., MacArthur & Philippakos, 2013) was used to develop and refine an instructional approach based on strategy instruction with self-regulation. Subsequently, an experimental study (MacArthur, Philippakos, & Ianetta, 2015) with 13 instructors and 252 students in two colleges found large effects on the overall quality of writing for the instructional approach compared to a control condition; positive effects were also found on mastery motivation and self-efficacy. The current study was conducted as part of that larger program of research and focuses on questions about how students used the strategies that were taught, what adjustments they made, and whether their modifications were more or less effective. It is necessary for instructors to acknowledge that taught strategies are modified by their students, but modification are not always effective. This investigation can support theoretical understanding about independent, self-regulated writing strategies and how students modify them. In addition, the study can support instructional efforts. Further, insight on students' independent use of strategies can inform teachers' professional development (PD) related to writing strategy instruction.

Writing Challenges

Writing is challenging. As a cognitive task, it requires the application and coordination of multiple processes and skills (MacArthur & Graham, 2016; Hayes, 2006). Research on expert writers shows that writing requires the coordination of both cognitive and metacognitive skills and processes (Harris, Graham, Brindle, & Sandmel, 2009). When asked to write, proficient writers analyze a writing task, identify the writing purpose or purposes, plan and develop a draft, evaluate their draft, and finally edit for grammar, spelling, and errors in conventions and mechanics. In addition, they engage metacognitive processes to set clear goals and select strategies to reach those goals, sustain their motivation and engagement, monitor their progress, evaluate the effectiveness of the strategies they use, and revise them as needed.

In contrast, less skilled writers have limited knowledge about specific writing strategies to help them plan and evaluate and revise (Hayes, 2004; 2006; MacArthur & Graham, 2016). When asked to write, less skilled writers devote less time to planning or even skip it (MacArthur & Graham, 2016). When revising, they generally make minor sentence changes instead of global changes that require the reorganization of information (for reviews, see MacArthur, 2011; 2016). Even when they recognize the need to make

revisions, they may not have the strategies needed to revise (MacArthur, 2011; Philippakos & MacArthur, 2016a, b). Furthermore, they may develop negative feelings of self-efficacy and gradually lose their motivation to write and develop a belief that they cannot improve in their writing ability (Hidi & Boscolo, 2006).

Strategy Instruction in Developmental Writing

Strategy instruction addresses the cognitive and motivational challenges of writing by teaching students writing strategies based on the cognitive strategies used by more proficient writers (Harris & Graham, 2009; MacArthur, 2011). Strategy instruction provides explicit instruction on processes for rhetorical analysis, planning, evaluating and revising while promoting their self-regulated use. Through think-aloud modeling, application, and practice with teacher and peer feedback, students learn how to navigate the writing process and how to regulate their time, effort, and use of strategies. Numerous research studies have demonstrated the positive effects of strategy instruction on writing performance in elementary and secondary school (Graham, Harris, & McKeown, 2013). Some research has found positive effects of strategy instruction with adults preparing for the GED (Berry & Mason, 2012) and college students with learning disabilities (Butler, 2003). This current study adds to the research conducted on strategy instruction by increasing understanding of how students modify strategies and how they move toward their flexible use.

Current Investigation and Research Questions

Since the goal of strategy instruction is the conscious, independent, self-regulated use of multiple strategies, it is expected that students will gradually make modifications to taught strategies. However, few studies have examined the strategy modifications that students make. The current study uses think-aloud protocols with a sample of participants to investigate how students used the taught strategies. Think-aloud protocol methods have been used frequently to provide access to the invisible cognitive processes of individuals engaged in complex cognitive tasks (Ericson & Simon, 1993; Pressley & Afflerbach, 1995). The questions that guided this investigation were:

1. Do students use the strategies they were taught to plan and evaluate?

2. If they do use the strategies, are they used as they were designed? What modifications students make?

3. Were students' changes effective in assisting them to complete the writing and the evaluation tasks?

Methods

Participants and Setting

Participants in this study were ten students who attended a basic writing course in a community college on the East Coast. All student participants were male; five were African American, four Caucasian and one Asian. Two of them spoke a language other than English at home and three were born in a country other than US. Seven of the students had graduated high school within three years and three students within 20 years.

Instructional Approach: A Strategic Approach to Writing

The researchers developed a writing curriculum called Supporting Strategic Writers, which was based on strategy instruction and self-regulation (Graham, 2006; Harris & Graham, 2009). The curriculum included a writing strategy for planning, drafting, and evaluating to revise, as well as a set of self-regulation strategies, called the Strategy for Academic Success (MacArthur, Philippakos, & Ianetta, 2015). In the following section, information is provided on the approach and the rationale for its components and methods.

Writing process. Students were taught strategies to plan, draft, revise, and edit their work based on knowledge about strategies used by competent writers and prior work on writing strategy instruction (Englert, Raphael, Anderson, Anthony, & Stevens, 1991; MacArthur, 2011). Thus, students were taught to perform a rhetorical task analysis, prior to any writing, by considering the Topic (T), Audience (A), Purpose (P), Form (F) and organizational elements (O), and Requirements (R) of the assignment (Philippakos, in press). This process would help them identify the demands of the writing assignment, activate their prior knowledge, and orient their attention. The term organizational elements referred to the structural elements of the type of writing. For instance, when learning the elements of argumentation, students would learn that the paper needed to have 1) an introduction to the Issue, 2) a statement of Position, and 3) Reasons, 4) Evidence, 5) Opposing position, 6) Reasons for the opposing position, 7) Rebuttal, 8) Restatement of position, and 9) a Closing statement addressing the reader. This rhetorical analysis was completed prior to the planning stage and guided students' attention and the development of questions about the assignment. For instance, here is a typical topic:

"Many community colleges have a policy that requires college students to attend all classes. Some students find this a reasonable requirement. Others think it is unnecessary. Do you think that community colleges should have mandatory attendance policies? Write a paper stating your position and support it with evidence."

Students were taught to analyze the task by carefully locating information that would answer the TAPFoR requirements. For information that was not present (in this case length), students were encouraged to ask their professors for clarification.

The planning stage consisted of generation and organization of ideas using a Graphic Organizer (GO). Depending on the writing purpose, students were taught to produce different GOs that would reflect the organization of that genre. For instance, when working on argumentative writing, students used a GO that included an introduction with a topic, reasons and evidence, opposition with reasons and rebuttal, and a conclusion with a restatement of the main position. (See Figure 1).

[Insert Figure 1 with GO Approximately here]

At the drafting stage, students developed sentences using ideas from the GO in order to compose their essays. In some instances, sentence frames were provided (e.g., Some people argue that _____). At the revision stage, students were taught to evaluate their work using evaluation criteria that represented the structural elements of that genre. For example, the elements of argumentation would turn into evaluation questions (e.g., Did the writer provide a clear position?). The writer or peer reviewer would first score

each element (e.g., 0 if the element was absent, 1 if it was underdeveloped, or 2 if it was well developed), and then write suggestions (Philippakos, MacArthur & Coker, 2015). The inclusion of genre-specific criteria versus general evaluation criteria can better guide the writer's critical evaluation for revisions (Hoogeveen & van Gelderen, 2015; Philippakos, 2017; Philippakos & MacArthur, 2016a).

Strategies for Academic Success (SAS). Self-regulation can support students' independence (Berry & Mason, 2012; Harris & Graham, 2009). Therefore, students were taught how to set goals and manage the writing task and their overall writing performance. Specifically, they were taught to consider long-term goals (e.g., passing this course) and identify their immediate goal/s (e.g., writing a clear essay). Then students would select strategies that would assist in the completion of an immediate goal. Further, they were taught to monitor whether they used the strategies and they assisted them in achieving their goal. Finally, after the completion of the task, they would reflect on their use of strategies and examine those that could be transferred to a different task. Instructors engaged students in whole-group discussions and encouraged them to share what strategies were effective for them and what they had learned about themselves as learners. Instructors also gave personal examples about how they achieved their own goals (e.g., winning at a bike race) and stressed the importance of time management.

Research Procedures

Two weeks after the end of the semester and completion of final exams, all students who were part of the Supporting Strategic Writers' curriculum were invited to participate in a follow-up task on planning and revising. These were not mandatory meetings; thus, this was a convenience sample. The meetings took place on the students' campus at a time each student was available. A planning and an evaluation task were selected (approximately an hour each) because the project provided clear guidelines to students on how to plan for different writing purposes and how to evaluate to revise. All planning and revising sessions were video recorded and lasted for approximately two hours per student.

Training for thinking out loud. The first author met with each student and explained the tasks. She then modeled the process of thinking out loud by first using a cartoon from a National Geographic site that depicted two characters. She practiced the task with each student using another comic strip and then modeled again the process by completing a tangram puzzle. She then presented a different puzzle-design and asked a student to think out loud. She explained that she would not be able to help but would remind the student to think out loud. Once practice tasks were completed, the researcher presented first the planning task and then the revision task. Across all tasks, the only direction the researcher gave when a student was silent was, "*Remember to tell me what you think. Remember to think out loud*!"

Measures

Think aloud (TA) measure. Video data was collected during the think-aloud sessions. Video captured students' writing (e.g., notes, graphic organizers, drafts) and voice for the completion of the planning and revision tasks. The transcriptions included the comments that students made and a description of the writing (e.g., notes) they did.

Planning. During the planning section of the think-aloud session, each student was presented with a choice of two persuasive topics and asked to think out loud during planning and drafting. Students were told that they were not expected to complete the drafting of the paper, but they could try to complete as much as possible. It was not deemed essential to complete the essay as the goal was not to examine the quality of their work but the application of the strategies to complete the writing task. Further, a writing sample had been collected at posttest that was used to examine their writing performance.

Revising. After approximately an hour, each participant was presented with a completed paper on a different topic and was asked to evaluate it by thinking out loud. The paper contained organizational problems and also spelling errors to determine whether students would focus on surface-level changes or on the application of evaluation criteria that reflected their instruction. This evaluation task was designed to capture students' revision strategies without taking the time to complete and evaluate their own paper.

Persuasive essays. As part of the overall research, at pretest and posttest (beginning and end of the semester), students responded to persuasive prompts on controversial topics (MacArthur & Philippakos, 2013).

Analysis

Think-aloud protocols were analyzed for strategy use and modifications. Student pretest and posttest essays were analyzed for quality, elements, and grammar to provide background on their academic performance and progress during the semester.

Coding of think aloud (TA) protocols. Codes were inductively developed based on the taught strategies, the modifications the students mentioned in the TA, and other comments during the task (Strauss & Corbin, 1998). Blair's guidelines on a priori and emergent coding were applied (Blair, 2016). Codes were developed by the primary researcher and applied to all cases (See Table 1). Later, a research assistant independently applied them to 30% of the cases (Interrater agreement 94%).

[Insert Table 1 approximately here]

Quality of essays. Quality was scored on a 7-point scale that asked raters to provide a score for overall quality. Common criteria for writing were considered that included ideas or content, organization, word choice, sentence fluency, and conventions (MacArthur & Philippakos, 2013; Philippakos & MacArthur, in press). Two raters independently scored essays with adequate interrater reliability (r = .78; Brown, Glasswell, & Harland, 2004).

Grammar. Students' papers were also scored for grammar, usage, and mechanics (spelling, punctuation, capitalization) on a 7-point scale. Papers were scored by two independent raters with adequate interrater reliability (r = .75).

Elements. Elements of argumentation were counted (Philippakos & MacArthur, 2016a). Papers were divided into t-units (Hunt, 1964) and each t-unit was coded as an element or as non-functional. Two raters, who were not aware of the purposes of the study, independently scored the papers. Interrater reliabilities were 100% for position, 90% for reasons, 82% for evidence, 90% for rebuttals, 100% for restatement of position and 100% for statement of closure.

Results

We report the analysis of the think alouds followed by the analysis of essays for quality, grammar and elements (See Table 2). Paired samples t-tests were also conducted to examine whether there were differences from pretest to posttest on quality and grammar (Field, 2009). For elements, the nonparametric equivalent of a parametric test was used due to violations of normality.

Think Aloud Findings

Planning. Students spent on average 15-20 minutes on planning. In general, all students applied the taught strategies even though no reminder was provided on their use or application. Eight of the students analyzed the writing task by using the task-analysis approach they had been taught, which asked them to identify the **T**opic, **A**udience, **P**urpose, **Fo**rm and **R**equirements (TAPFoR). However, only six of them completed the entire task and commented on all its components. The rest skipped the **F**orm and three skipped the **P**urpose while one stated that the purpose was to inform (instead of persuade/argue). All students identified the topic and recorded it as a question, "*should young children be allowed to watch TV for many hours*?" A student, who had initially resisted the application of the approach and had the tendency to avoid planning, faithfully used the task-analysis acronym to analyze the task. As demonstrated in the excerpt below, he wrote the acronym and then he completed it by referring to the topic and by reading and rereading it. When he reached the section that referred to the **F**orm, he referred to the mnemonic IRC that represented **I**ntroduction, **R**easons, **C**onclusion.

(The student writes the task-analysis acronym T-, A-, P-, Fo-, R-)

"Should students be [...] should young children be allowed to watch TV for many hours? So I'm thinking how I'm gonna start this, how I'm gonna do the TAPFoR, I guess brainstorm and then do the GO, graphic organizer.

So I did TAPFoR, so topic would be, topic should young children, should children be allowed to watch TV for many hours? That's my topic."

(The student writes should children be allowed to watch TV)

"I did the topic so now I'm about to do the audience."

(writes class, moms & dads)

"and that would be like my class, like my moms, and dads. All right the purpose would be to inform parents or inform mom and dads about children watching TV for too many hours."

(writes to inform moms and dads about children watching TV).

"I put for the purpose I put to inform moms and dads about children watching TV for many hours. So, then I got there you know for the requirements 300 words they got to do, at least 300" (writes 300, Times New Roman, scratches out Roman)

"and do Times New Roman and double spaced and then for the format I got to do, I would say the kind of writing we do is like IRC [Introduction, Reasons, Conclusion]"

Students also made modification on the planning process to replace the GO. Specifically, five students used the taught graphic organizer to draft, but the other four after the completion of the brainstorm, they referred to the elements of persuasion to begin their essay. They looked at the brainstorm to identify reasons and then transferred those to an outline that became a guide for their draft.

Also, they tended to self-regulate throughout the process. They used the writing strategy, explained why they used specific components, often referred to the audience and the audience's needs as they developed their ideas, and tended to reread when drafting.

However, they encountered some challenges, too. The comments by two students suggested that even though they knew the strategy steps and elements of persuasion, they had difficulty recalling their order or they had challenges with the discourse and its requirements (pro vs. against). One of them recognized his struggle with this and asked for support from the researcher while working. When he was directed to think out loud and reminded that the researcher could not help him, he returned to the task. As he was thinking out loud, he acknowledged that the posters used in class had been helpful (no posters were present during these tasks). Also challenging for one of the students was the generation of convincing ideas. The student had ideas but he tended to question how convincing those would be to the audience. Thus, his difficulty stemmed from his understanding of the need to convince an audience and not simply to provide his opinion and viewpoint on the topic.

Revising. Analysis of the revision data suggests that students followed different approaches for reviewing. One student skimmed through the paper instead of reading it out loud (as they were taught). The rest of the students either read the paper out loud or silently.

Even though they were all taught how to develop a rubric and were taught to identify the elements, comment, and give a score, only two students completed the rubric, looked for the elements, and assigned scores. Most students read the paper once, read and commented at the same time, or commented and provided written feedback at the end. Three students stopped while reading to note lack of punctuation and spelling errors. Seven students reread the paper after completing the initial reading and then provided comments (as they were instructed).

Students were also critical of the organization of the paper and three of them especially commented on its structure. One of the students shared,

"Over the past year schools have been having a problem with their students and their (underlines first sentences, underlines behaviors multiple times). I think that schools should have a policy and require all students to wear uniforms and be dressed with similar clothes. This should (underlines last sentence of first paragraph). This is like this is position right here (underlines second sentence of first paragraph, writes position), this is the issue (writes issue). This one's the introduction, but it's not enough (writes intro), need to see more about school uniforms."

Further, the analysis suggests that students were not always able to identify breaks in meaning. From the 10 students, only one, who was a second-language learner, was able to determine that a reason did not connect with the support/evidence. This was purposely designed in the task in order to examine whether students would tend to meaning or only complete the evaluation process looking for the elements without considering the global argument. Table 3 presents the modifications that students made. The table also includes an evaluation of whether a modification was according to the taught curriculum or not. Overall, students' modifications for planning indicated an effort to eliminate components or abbreviate them. The abbreviation of the process by using the elements as a guide instead of a GO was an appropriate modification. The approach is based on learning and applying the planning, drafting, and revising. Therefore, "skipping" the GO was not an inappropriate modification. However, omission of the rhetorical-analysis components or misinterpretation of those was ineffective. For the evaluation to revise process, skimming through the paper without reading it out loud or reading it at least once was not effective. Also, it was not an effective change not to use the guidelines of the evaluation criteria.

[Insert Table 2 Approximately here]

Further, while reading, students tended to pay most attention to the surface-level errors in the text. For example, they all identified spelling errors and punctuation omissions. Even though they knew the elements of the genre, their reading and in some instances rereading did not support them in identifying breaks in meaning or even in identifying all elements.

Quality and Grammar

Statistically significant differences were found between pretest and posttest for both quality (t(9) = 7.041, p< .001, d= 2.88) and grammar (t(9) = 3.115, p= .012, d = 1.89) with higher scores at posttest.

Elements

Wilcoxon signed-rank tests found statistically significant differences between pretest and posttest for total elements (Z = 2.8, p =.005). Follow-up analysis examined specific elements. The results showed that introduction (Z= 2.132, p =.033), reasons (Z= 2.046, p =.04), elaborations of the reasons (Z= 2.296, p =.022), and closing statement (Z= 2.254, p =.024) were statistically significant with higher scores at posttest.

[Insert Table 3 Approximately here]

Discussion

The purpose of this case study was to examine the use and modifications of strategies by community-college students after a semester of instruction with a curriculum based on strategy instruction with self-regulation. Results showed that students were indeed able to recall most of the information they were taught; however, not all were able to accurately recall it. Also, the results show that students do use the strategies after formal instruction has concluded and do modify them. The modifications

10

made during planning suggest that the use of alternative procedures may be more useful after the brainstorm stage for students who have internalized the discourse requirements. Specifically, students who had understood that the elements of the type of writing are the basis of the GO and of the main outline of the paper did not develop a GO but proceeded with an outline. Some students, though, made poor modifications, which indicated the need for further practice.

The revision results suggest that critical reading was challenging for students. This confirms the role of comprehension in critical reading for revision (Hayes, 2006) and also the value of using genre-specific evaluation criteria (Philippakos & MacArthur, 2016 a, b; Philippakos, 2017). The use of evaluation criteria supported students in giving feedback, but perhaps instruction on reviewing could also address comprehension. Reading to evaluate is demanding for writers, and requires cognitive attention and effort (Hayes, 2006). When writers read to revise a text, they still try to comprehend, but they also have the goal of detecting text problems and finding solutions. Evaluation and revision require more cognitive effort for the readers than reading comprehension (Roussey & Piolat, 2008). Reading comprehension can take place even when there are problems with the text, as the reader can apply inferential skills and overlook challenges with text-construction problems. When reading to evaluate and reading for revision, readers need to apply critical-thinking processes (Hayes, 2004). In this study, surfacelevel errors seemed to distract students from the evaluation process. Perhaps students who are developing writers need additional practice on evaluation and revision.

Finally, the analysis of students' writing showed that the quality of their essays had improved as a result of instruction. Their work showed the inclusion of elements of persuasion such as reasons, elaborations, and restatement of opinion. In the current study, via the think-aloud protocol, we were able to examine what they had understood about the planning and revising strategies, how they applied them, and what modifications they made. It is important to examine both the product and the process in order to develop a better understanding about learners' needs and internalization of strategies.

Limitations

This is a study with a convenience sample, who volunteered for this task. Perhaps the results would have been different if such an analysis was completed with a wider range of students. Further, due to time constraints, we did not ask students to complete the draft of their own essay and evaluate it; instead they evaluated a given essay. Finally, student behavior in the think-aloud setting may not fully reflect how they would use the strategies in a more authentic context.

Implications for Research

The goal of instructional approaches and interventions is sustainability and transfer. In this case study, the goal was to examine what students remembered after the course of a semester and how they applied it. Future research could ask students to complete their essays, self-evaluate them, and even participate in peer review. Students could independently explain their reasoning for their scores and then after the feedback by a partner or after observing another student evaluate their paper. It would be interesting to examine how students apply the evaluation criteria when working with their

own paper, when working with a paper written by an unknown peer, and how they consider revisions after their paper is evaluated by a reader.

Also, future research could examine what modifications teachers make in subsequent semesters after participation in an instruction study. This information could be used to inform researchers and instructional designers on instructional and PD modifications.

Think-aloud studies can support educators and researchers in understanding the challenges that basic writers face even though they manage to perform well on writing tasks. Future research could examine the ways that reading and writing are viewed by basic writers to better understand the challenges they face while making meaning even when they have a clear understanding of the writing purpose.

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Table 1

Codes and definitions

Planning Code	Explanation-Definition
Task Analysis	Completion using TAPFoR (which parts)
Brainstorm	Development of ideas, ideas in favor and/or against, or no ideas
Self-regulation - Rereading topic	Clarifying meanings
GO	Use of a GO to organize ideas.
Self-regulation- Reviewing completed tasks	Stops to review tasks and develop new goal
Outline	Development of a drafting scheme using elements of type of writing
Drafting	With/without ideas from the plan
Revising Code	Explanation-Definition
Reads	Skims through paper
Reads to Evaluate	Rereads to evaluate
Evaluates	Underlines, labels, scores
Uses Rubric/Criteria	Records a rubric with criteria

Table 2

Quality, Grammar, and Elements

	Pretest (M, SD)	Posttest (M, SD)	Gain
Quality	1.60 (.52)	3.95 *(1.01)	2.35
Grammar	1.80 (.89)	2.85** (1.41)	1.05
Element of Introduction	1.30 (1.94)	3.10** (2.07)	1.80
Element of Reasons	1.90 (1.52)	3.40** (.51)	1.50
Element of Elaborations	3.90 (3.31)	12.20**(6.70)	8.30
Element of Closure	.90 (1.66)	2.90** (2.84)	2.00

Note: M = mean; SD = standard deviation.

* p < .001 ** p <.05

Table 3

Expected practices, modifications and their effectiveness (+/-) with explanations

Planning	Expected Practice	Modification (number of students in parenthesis)	(+/-)	Explanation
	Rhetorical Task Analysis	Not full completion (3)	-	Difficulty in determining Purpose
TAPFoR				Lack of understanding Form
	Brainstorm	No modification (10)	N/A	No comment
	Organization	Use of an Outline with elements (4)	+	An outline results to a well-organized essay
		Use of a GO (5)	+	The GO reflects the organization of the essay
		No use of GO (1)	-	Lack of organization
Self- Regulation	Evaluation of progress and goals	Stop and ask questions after the TAPFoR or Brainstorm or GO (9)	+	Progress monitoring
	evaluate by using the	Skim through (1)	-	Not understanding of the paper and its organization
	criteria, locate, label and score	Read (out loud or silently) (9)	+	Understanding of the overall argument
	them	Read (out loud or silently) with evaluation	+	Focus on structure and quality of elements
		Comment as you read-no markings (3)	-	General comments- nothing related to the strategy

Comment as you read-emphasis on editing (3)	-	Evaluation is on substance and not on mechanics
Record elements or make evaluation rubric (3)	+	Use of elements as evaluation criteria
Record elements, locate them and score (2)	+	Taught strategy