Here is a startling result: Even when feedback interventions improve performance on average, they actually reduce performance in more than one third of the cases (Kluger and DeNisi Effects of Feedback 258). In their meta-analysis of feedback interventions, Kluger and DeNisi showed that two out of five comments had a negative effect on performance. While this meta-analysis did not focus specifically on feedback on writing, the results are still illuminating. Kluger and DeNisi reviewed 131 reports on experimental studies involving 12,652 participants. They concentrated on feedback interventions for task performance, using selection criteria designed to focus on the effects a teacher, manager, boarding school counselor, or others can have on a learner. The experiments described in these reports were controlled in such a way that the feedback interventions were not confounded with other effects. At least 10 participants were involved in each study, performance was measured rather than only discussed, and sufficient details were given to estimate effect sizes.

How does this relate to feedback on writing? To answer this question, we surveyed the literature for research that included some elements of experimental design and focused on how writing feedback is received by writers. We frame the results in terms of recommendations for giving feedback.
Review of Research Studies on Response to Writing

The research studies reviewed in this article focus on the types of feedback that can be given when there is asynchronous interaction between student and some external teacher, tutor, or coach. Different terms are used for “feedback” in the papers reviewed: commentary, response, feedback, and comments. We use these terms interchangeably.

The articles reviewed (see Appendix I) describe case studies, surveys, or reviews of research carried out in either elementary, middle school, high school, or college classrooms. Case studies are typically experiments carried out in one or a few classes. Surveys are typically evaluations of questionnaires that students fill out in which they respond to questions about what they do with the feedback their teachers give them on their writing. Reviews are typically reviews of feedback research that sometimes go beyond the domain of writing feedback. The table in Appendix I also categorizes each article by content area. Note that we sometimes cite research that is not in this list, to describe theories that either motivate or support the findings in the listed research studies. The recommendations made as a result of this review are based on effectiveness of tutor response and improvement in student writing performance.

This article describes research focused on effective feedback in writing, including giving overall grades, levels and functions of feedback, and practices in effective feedback. We found that many reviews focus only on the theory of giving feedback without using any formal methods of measurement. Given that this type of traditional teacher-to-student feedback is often used in classrooms at all levels of education, we found this to be a shortcoming in the literature, and did not review the papers that only presented theory. This review does not cover rubrics or external assessments explicitly, nor does it summarize theories of feedback. It is also not a meta-analysis, in that it does not use quantitative methods to summarize the results of a set of studies.
Software is being developed today that gives students automated personalized feedback on their writing. Writing workshop spaces on the Internet offer suggestions a priori about how to successfully and clearly write an essay but do not offer personalized feedback. These literatures will not be reviewed here because our focus is not on new technologies. However, the designers of computer software and online environments may be particularly interested in the suggestions we offer because we are addressing best practices for responding to student writing in what can be considered an asynchronous environment.

We learned that in order for students to benefit from feedback, they have to (1) notice it, (2) accept it, and (3) understand what to do with it. After reviewing the research, we end this article with recommendations that support these notions.

Overall Grading and Feedback

It is common to think that giving feedback to students about their writing in any form will foster improvement and that detailed feedback is an improvement to an overall grade because it gives students something to work with to improve their writing. However, studies show that feedback should not be given at the same time as overall grades. One problem with including both grades and feedback is that students view the main function of comments to be “grade justification” (McGee 84). Students also tend to ignore specific diagnostic comments when a grade is also included (Storms and Sheingold).

In a follow-up to their meta-analysis of feedback interventions, Kluger and DeNisi found that students usually perceive grades or overall scores to be a measure of their standing relative to peers. In contrast, feedback to the individual that highlights weaknesses and strengths appears to be more effective in improving performance (Feedback Interventions 70). In an early study, Thorndike found that school grades can actually impede learning and that their normative nature (comparison with others) and low level of specificity attenuate their effectiveness as feedback interventions (cited in Feedback Interventions 67). In a review of the
literature on formative assessment, Black and Wiliam found that the use of overall grades in conjunction with feedback can be detrimental (23). Even if task-oriented feedback comments could be helpful for a student’s work, their effect could be undermined by providing grades, which can result in a negative motivational effect.

In summary, these studies suggest that when the goal is to help students develop their writing abilities, feedback should not be presented along with an overall grade. The effectiveness of feedback depends on features of its quality, as is examined in the remainder of this article.

Level of Feedback: Content vs. Surface

In analyzing feedback many researchers look at comments in terms of the implied level of revision they call for, for example, those that call for changes to the overall meaning or purpose of the composition and those that call for changes at a micro-level such as spelling and grammar (i.e., those aspects of writing that do not result in alterations to the piece as a whole). Ferris, for example, coded teacher comments according to whether they spoke to the organization, content, mechanics, grammar, or vocabulary of the paper. Similarly, Beason’s study asked evaluators to code comments in accordance with the criteria (focus, development/support, organization, mechanics, expression, validity, other) they reflected (403). Often, these classification systems are referred to and studied in terms of the bifurcation between global (content, organization, etc.) and local (grammar, mechanics, etc.) feedback, otherwise called content-level and surface-level feedback.

What teachers do

Much attention has been paid to student preferences, teacher practices, and composition quality in terms of this content-level and surface-level dichotomy, and a discrepancy has been found among what teachers do in practice, what students prefer, and what results in better quality writing. Some teachers concern
themselves primarily with surface issues when they respond to student papers (Clare, Valdes, and Patthey-Chavez, 7; Matsumara, et al., 12; Zamel, 86). Matsumara, Patthey-Chavez, Valdes, and Garnier’s research in urban third-grade classrooms revealed that across both low- and high-achieving schools most of the comments on student papers were surface-level, but that the quality of the content and organization of students’ final drafts were significantly predicted by the amount of content-level feedback received on earlier drafts (12, 16). Beason’s work, on the other hand, revealed that most comments teachers and peers made in giving feedback were more global or content-related (406). One study solicited teacher self-reports on feedback practices from instructors of an English as a Foreign Language (EFL) institute course, an EFL university course, and a native-speaker English course. They, too, found quite disparate views on how and what type of feedback should be given and what is best suited for students – one instructor reported that she emphasized mechanics and grammar (purposefully not concerning herself with content) in giving feedback and another teacher reported focusing on content (Cohen and Cavalcanti 160). Teachers in Searle and Dillon’s study reported an interest in global issues, but noted that responses were often at a local level (cited in Fuller 311). One possible explanation for this disconnect may be that teachers have a difficult time focusing on and reacting to both global and local matters at the same time in reviewing student papers (Fuller 311), a finding of Vivian Zamel’s study of university-level ESL writing classes. She concluded that teachers can become “so distracted by language-related local problems that they often correct these without realizing that a much larger meaning-related problem has totally escaped their notice” (86).

**What students prefer**

Similar to the lack of cohesion among teachers in feedback practices, there is no common ground in what students prefer in writing feedback. Just as teachers give feedback as they deem appropriate and as they prefer, the case is the same with college
students. In his study *Students' Reactions to Teacher Comments*, Straub asked students to look at various comments given on a student essay and complete a survey on their preferences for each type of comment. He found that students seemed to prefer equally comments on both local and global matters of writing. However, preferences were found for certain *types* of local and global comments. For example, feedback on sentence structure, grammar, organization, and development was looked upon favorably by students, whereas feedback that pertains to word choice or that contrasts with ideas expressed by students was not received as well (98-99). Ferris, too, found that although most comments were at the local level, students attended to and appreciated both global and local comments equally (40-41).

While some students find either type of feedback useful in improving their papers, others express distinct preferences for global (Cohen and Cavalcanti 161; McGee 90) or local (Leki 62) commenting styles. Students in McGee's study, for example, reported that feedback on "trivial" matters such as formatting, missing words, and mechanical issues was of little use to them in improving their papers (91), while Leki's research found that students exhibited a lack of interest in having teachers comment on essay content. They felt that such feedback did not help to improve their writing; instead they benefited much more from teacher response that clearly pointed out errors (62). We find it interesting that these studies cross college level ESL and writing courses. Since these results all came from studies that focused on college courses, we cannot explicitly extend these findings to students in other grade levels, though we can take them as considerations.

**Effect on revision/writing**

It is useful to look at the effects of content-level and surface-level feedback on the processes of writing and revising. The results of Beason's study showed that the majority of feedback teachers gave was of a global nature, but the majority of the revisions students actually made were at the surface level or
affected only the microstructure of the paper (406-409). In a study of 10th and 11th graders’ academic and affective responses to content-level versus surface-level feedback, Covill found that students receiving primarily content-level feedback spent significantly more time revising than the group that received primarily surface-level feedback. Furthermore, the types of revisions made varied with type of feedback: those in the content-level feedback condition made more micro- and macrostructure changes while those in the surface-level condition made more formal (e.g., mechanics) and meaning preserving (e.g., paraphrasing) changes. It is important to note, however, that there was no significant improvement from the first to the second draft between those in the content-level versus those in the surface-level feedback condition (26). It appears, then, that no one-to-one correlation exists between the type of feedback given and the resulting revisions or quality of compositions. Although some evidence points to the benefits of content-level feedback (i.e., that it results in better organization and quality of content, and perhaps results in more time spent revising), the results seem to vary greatly from study to study. More research is needed in order to determine more conclusively the relationship between level of feedback and writing quality and revision practices.

Timing

Also important is the stage of writing at which content-level and surface-level feedback are introduced. As Zamel puts it, “we need to establish priorities in our responses to drafts and subsequent revisions and encourage students to address certain concerns before others” (96).

Research suggests that students pay close attention to feedback given on early drafts, thus underlining the importance of the type of feedback teachers give at this stage of writing (Ferris 47). While Sommers sees the value in all types of comments, she stresses that “in responding to our students’ writing, we should be guided by the recognition that it is not spelling or usage problems that we as writers first worry about when drafting and revising our texts”
Responding to surface-level issues in the drafting phase of writing gives the impression, she says, that these are the most critical aspects of writing; it results in the confusion of process and product. Instead we should be helping the student to refine or clarify his/her purpose or meaning, the organization of the piece, and the logic of the argument. Contrary to her opinion, ESL and foreign language (FL) learners in Hedgcock and Lefkowitz’s study seemed to indicate a slightly stronger preference for surface-level feedback on first drafts and reported learning more when teachers did so (150-151). This, however, could be a by-product of the nature of ESL and FL learning in that students of language are striving more to learn the intricacies and idiosyncrasies of the language itself than to have their ideas and organization corrected. Interestingly, the teacher in Cohen and Cavalcanti’s study who reported emphasizing surface issues and deliberately disregarding content issues in providing feedback said the reason behind doing so was that English proficiency examinations did not assess content (160). Despite the conflicting evidence and opinions in regard to this matter, it does seem important to consider the “scale of concern” we assign to comments (Sommers 151). That is, it is important for the teacher to point out to the student the most critical aspects of the paper that need to be revised.

In summary, the research on the effects of content-level and surface-level feedback on student writing is inconclusive. That is, neither level of feedback is the main determining factor for improvement in writing, though both seem to offer some improvement to some students at different times for different purposes.

Function of Feedback: Directive vs. Facilitative

Feedback, when used appropriately for formative improvement, puts the locus of control in the student’s hands. There are complex connections between the way in which feedback is received, the way that perception motivates the selection of a course of action, and the learning activity that may or may not follow (Black and Wiliam 21).
Writing many directive comments (e.g., corrections of wording or conventions, proofreading) gives students the idea that the teacher wants to control the essay and that the teacher is picky (McGee 93). The data indicate that subjects found most unhelpful those comments that lacked a sound explanation, that were unclear, that attempted to wrest control of the paper from the student, or that dealt with “trivial” matters such as missing work or formatting (McGee 92).

One way to look at feedback is in terms of the function or tone inherent in it. In other words, a comment can be suggestive, perhaps pointing to an idea or phrase that could use more clarification or focus, or it can be instructional, pointing students to a grammar rule or theory that could help to improve the writing. Similar to level of feedback, the function of feedback is also discussed in terms of a dichotomy, between directive (comments that tell students directly what needs to be revised, e.g., criticisms) and facilitative (comments designed to help guide students to rework their text on their own, perhaps in the form of questions or reflections).

It would seem that facilitative comments would have a better effect on student learning than comments that are more directive. However, several studies have found evidence to the contrary. For example, Ziv found that very explicit, directive comments were more helpful than suggestive comments in improving writing in college freshmen, but she also found that implicit feedback prompted revisions. She suggests that teachers gradually shift their feedback styles from more directive to more facilitative as students become comfortable with the expectations placed on their writing (cited in Knoblauch and Brannon 2). In a study of first-year composition students at Arizona State University, Ransdell found that students almost equally preferred directive comments and facilitative comments, with a smaller number of students believing both types of comments to be equally useful and another small number of students believing a combination of these types would be best (270). Students who preferred directive commentary reported that it helped them figure out what needs to
be fixed and that it did not leave them feeling confused. That is, there is no guesswork with directive commentary (272). Students who preferred facilitative commentary argue that it allows some room for writers to expand in different ways as opposed to being constrained to making revisions that they believe the teacher wants to see (270). Ransdell, a teacher-researcher, said he tried to use facilitative commentary. He found, however, in reviewing end-of-semester portfolios, in which students included up to two revised essays, that students made few revisions and often overlooked facilitative comments (275). First-year students in McGee's study were put off by directive comments, feeling that by commenting in this manner the teacher was being too particular or was attempting to control the essay (93). Balancing comments so that directives and less controlling types of comments are distributed more equally throughout essays makes the teacher seem like an interested reader rather than a critic (McGee 91).

Who Controls the Writing?

It may be, then, that it is the level of control over student writing that really impacts how comments are received and heeded in the revision process. Feedback as it controls student writing (i.e., certain modes of feedback are more or less controlling over student texts and ideas) is a prominent issue among researchers who study feedback practices. Brannon and Knoblauch speak of the teacher's tendency to comment on student writing in terms of the discrepancy between what the student has written and the teacher's idea of what constitutes good writing, or what they call the "Ideal Text." Instead, they contend, the teacher should be looking at the discrepancy between what the student has achieved and what the student intended to achieve. By doing so, the teacher exerts less control over students' writing, allowing them to reflect on their own purposes and choices (158-159). This, of course, would require a discussion or survey, as Reesor suggests, to actually determine students' intentions (245-252). Reesor was thinking along the lines of Brannon and Knoblauch as
to how teachers should negotiate a feedback strategy with the students, so that the teacher’s feedback will meet each student’s needs, and keep the control of the text in the student’s hands. As Sommers explains, “Teachers’ comments can take students’ attention away from their own purposes in writing a particular text and focus that attention on the teachers’ purpose in commenting” (149). Because of this, the student may then feel compelled to make changes to meet the teacher’s perceived needs instead of what the student deems necessary to improve the quality of the essay. Straub lays out a hierarchy of control based on the function of comments, ranging from corrections (most controlling), to criticisms and commands, to qualified evaluations and advice (least controlling). Praise is somewhat nebulous and does not fit nicely into this hierarchy; it is “less controlling than criticisms or commands [yet] underscores the teacher’s values and agendas” (Concept 234). Students, Straub found, seem to most favor those comments that offer direction but do not control the writing (Students’ 1).

**Student Perceptions**

Inherent in this connection between the function of a comment and the degree of control it exerts over student writing is the way that teachers are perceived when they give feedback using different modes of expression. If the teacher comes across as demanding, students may not be as receptive to the feedback as when the comments are posed in a more favorable light (i.e., as guidance, advice, or suggestions). O’Neill and Fife maintain that teacher comments cannot simply be labeled “directive” or “facilitative” without taking into account the entire classroom context, including the teacher’s perceived ethos and the entirety of the feedback system (i.e., student-teacher conferences and other feedback opportunities). Like the students in McGee’s study, whose preference and receptivity for types of feedback were dictated by how it made the teacher look as a person (86), students in O’Neill and Fife’s research indicated that the overall character of the teacher determined how students approached
teacher comments. Subjects in Straub's study were asked to explain preferences for certain modes of commenting, and indicated that some comments made the teacher come across as harsh and judgmental, while others were supportive and encouraging. They also indicated that some comments tried to impose the teacher's view on the students, while others encouraged the students to develop their own ideas (Students' 100-106). In other words, the role that the teacher plays socially and politically is very important. A teacher with an interruptive voice can silence students' voices, compelling the students to change their papers even without agreeing with the suggested revisions (Williams 5-9). Just as teachers stress to students the importance of using the appropriate voice, so, too must teachers in responding to students (Fuller 314).

Other Practices in Effective Feedback

As this section will show, two common themes emerge as a result of this review: 1) students prefer positive feedback from teachers, and 2) students prefer that feedback be specific. We discuss each of these separately and then look at other issues that inform effective feedback.

Positive vs. Negative Feedback

Students prefer positive feedback, which comes in two flavors: praise and constructive criticism. Feedback is considered positive when comments include what the student needs to improve. After interviewing several students about their attitudes toward their teacher's response style, Bardine, Bardine, and Deegan found that most students believe that the purpose of teacher feedback is to inform students about what they are doing wrong (96). A teacher of one of the classrooms involved in this study reflected on the results:

I also learned that the tone of my comments was just as important as the outcome I wanted for the response. In other words, students wanted to be praised and know that
they were doing something right. If they don’t receive this message, or if it sounds like I am ordering them to do something differently, then I might not get a motivated response. (100)

These findings are echoed in several other studies as well. In a study of college freshmen McGee notes that students respond more easily and more happily to praise (64), and Beason writes that positive response “plays a vital role in helping student writers recognize their strengths and gain confidence” (411). In contrast, negative response styles have been shown to be a major demotivator in writing, having strong effects on students’ attitudes toward writing (Hillocks cited in Connors and Lunsford 210; Storms and Sheingold). Some students in Ferris’ study felt depressed and experienced lower levels of motivation and self-esteem because they felt that all of their teacher’s comments were negative (46). A review of the research by Winter, Neal, and Waner finds that students may not even attend to feedback or suggestions stated in a negative manner (58).

Although these studies do point to the positive effects of praise on characteristics of the writer such as confidence and self-esteem, they are also careful to say that praise does not necessarily help students to produce better papers (Taylor and Hoedt and Seidman, cited in Knoblauch and Brannon 1). For instance, while Beason confirms that praise does benefit writers, he also finds that compared to problem-oriented feedback, praise does not automatically result in better writing (411). Winter et al. report that “students who receive praise are likely to write longer essays and to exhibit more positive attitudes about writing, but such positive comments do not seem to produce better writing” (60). Praise, like other cues that draw attention toward self-esteem and away from the task, generally has a negative effect on attitudes and performance (Black and Wiliam 23). For example, students who received “ego-involving feedback” sought help less than students who received “task-involving feedback.” However, verbal praise and supportive feedback can increase students’ interest in and
attitude towards a task, even if the feedback itself has little effect on performance. Furthermore, students themselves report that praise does not motivate them to improve, nor does it help them to improve (Burkland and Grimm cited in Leki 62).

Looking at positive feedback in the second, more substantive sense, in a meta-analysis of the instructional effect of feedback from classroom tests (not specifically for writing tasks, but still useful for our discussion), Bangert-Drowns, Kulik, Kulik, and Morgan (cited in Black and Wiliam 51) found that feedback was more effective when it gave details of how to improve the answer, rather than indicating whether the student’s work was correct or incorrect. In addition, phrasing feedback in a constructive rather than negative way is more palatable to students (Storms and Sheingold). Interestingly, some students categorized as “positive” those statements that were specific and directed them towards improving their writing, whether it was phrased negatively or positively. That is, they did not find “honest criticism” to be negative (e.g., “Get to the point of your argument instead of beating around the bush”) (McGee 71). Some students specifically noted that all of their teachers’ comments were positive because all comments helped them to improve their writing. We would normally view these comments as constructive rather than positive.

Kluger and DeNisi recommend using feedback in combination with goal-setting interventions, thereby focusing on students’ progress toward the goals. By doing this, attention is directed to the task at hand, and not toward self-esteem. Feedback that draws attention away from the task and towards self-esteem can have a negative effect on attitudes and performance (Effects of Feedback 278).

Specific vs. General

Studies found that when teachers gave very general comments, without being clear about the changes they wanted to see made in the paper, students did not know what to do with the feedback, resulting in either incorrect interpretations or frustration with
When feedback is not specific, students find that it is not very helpful or just useless. When students in Ferris’ study, for example, were asked if their teacher’s responses were helpful, some said they were not specific enough to be helpful (46-47). Another study showed that students also prefer specific feedback to be personalized (e.g., something that shows that the teacher is familiar with the student as a person) (Storms and Sheingold, McGee 73). Results of a survey administered to students by Lillios and Iding showed that all of the useful comments teachers made were also very specific in nature (223). In both of the classrooms Bardine et al. studied, they found that students want specifics and clarity in the comments they receive on their writing (101). A teacher in Bardine et al.’s study said of the results, “I realized that many of my comments were too vague. Terms such as ‘explain further,’ ‘more details needed,’ ‘too vague,’ or ‘develop idea’ were foreign to many students” (99). Zamel, too, found that teachers “often provide vague and abstract responses that do not enable students to revise their texts” (89). It is an interesting irony that the teacher expects the student to develop and clarify ideas and details, while doing so using vague feedback. As Sommers put it, “the teacher holds a license for vagueness while the student is commanded to be specific” (153).

Specific and Positive

The literature suggests that the best feedback is both positive and specific. McGee’s subjects found positive comments that specifically detail what is good about a paper to be helpful (71), and students in Ferris’ research remembered the details of positive comments better than other items they were asked to remember (46). In addition, Lynch and Klemans (cited in Bardine et al. 95) found that, “telling students that a part of their essay is effective isn’t enough; students want to know why it’s effective,” and Straub learned that students preferred praise only when an explanation followed as to why the writing was worthy of praise (Concept 95).
Amount of Feedback

Even when feedback is positive and specific, it can still fall short of being helpful if it is either cryptic or too long (Speck 2). Cryptic responses often contain one word (e.g., “Awkward”) or are abrupt (e.g., “Rewrite this”). In both of these cases, there is not enough information for students to understand what is intended by the comment. Speck advises teachers not to give more feedback than the student wrote (which can be an indication of the student’s literacy level), as it can be overwhelming. Long comments can also tend to be diffuse and unfocused, not giving the student good enough direction as to where to begin making revisions (Reesor 253). Linking this discussion back to control, Straub (Concept 233) noted that, “Generally speaking, the more comments a teacher makes on a piece of writing, the more controlling he or she will likely be.”

As Fuller said:

My extensive commentary, I must have thought, would solve most of the problems in one full-sweep. But it is clear to me now that traditional product-centered commentary is not such a sweeping remedy. The diverse and random responses in the ‘all-inclusive’ commentary do not usually address a student in a consistent, focused, and effective manner. ... Unfortunately, without a clear focus, the responder usually barrages the student with a lot of conflicting messages. (308)

Kulhavy and Stock address the amount of feedback to present to a student from a different perspective. They present an information-processing model of feedback and response, drawing on the results of experiments in which different kinds of written responses are given to students as feedback on different types of tasks. This work is more general than feedback on writing, but the results clearly have application to this domain. These authors use students’ “response certitude” (the level of confidence the student has in the answer he has written or selected) in determining the
amount of time he or she will spend processing feedback. They argue that certitude judgments involve some assessment of the learners’ affective and motivational states, as well as whether they know an answer. This is in contrast to most instructional design strategies, where feedback decisions typically depend entirely on task characteristics.

When students have high certitude that an answer is correct, the amount of time they will spend attending to feedback will be small, and elaboration of any type will probably have a small effect on the students’ learning. Kulhavy and Stock’s recommendation in these cases is to simply verify an answer. At the other extreme, high certitude that an answer is incorrect increases the amount of time that students will attend to feedback. They suggest that under this condition, elaborating on areas that need improvement makes sense since these students are most likely to improve their work.

Modeling Good Writing

An alternative, or supplemental, method to giving direct feedback is to provide “expert” essays that show students what is considered good writing by addressing individual criteria, instead of addressing the full set of criteria for which an essay is normally evaluated. It has been shown in a different domain that providing expert models can help high school students improve their work product (Ma). This approach places the control of feedback in the hands of the students, since the students have to decide how to compare the expert model to their own work. Of course, it helps even more to know how to compare the expert model with your own work in order to learn from it (Ma). That is, students may not know how to go about comparing their work with the experts’, and can benefit from instruction in this area, where successful instruction can include things like introducing unfamiliar vocabulary and providing definitions of the components of the expert model.
Conclusion

Feedback is most effective when used for formative improvement, as in the case of multiple drafts of writing. It is also most useful to the student when the locus of control is with the student. Constructivist learning theory supports the idea that students need to be in control of their own learning. Students should be able to relate feedback to their writing products, choose which pieces of feedback are important and relevant, and understand what needs to be done in order to improve their writing. There are complex connections between the way in which feedback is received, the way that perception motivates the selection of a course of action, and the learning activity that may or may not follow (Black and Wiliam 21). The result from the Kluger and DeNisi meta-analysis shows that even when research touts positive results (e.g., “improved performance on average”), there is often more than one way to read those results. We summarize the results of this survey in the form of recommendations.

Recommendations

- **When providing detailed feedback, do not include an overall grade.** It has been shown that when overall grades are presented, students focus on comparing their scores to their peers’ scores, and do not focus on feedback that is included for purposes of improvement. That is, when a grade is given, the impetus to revise is gone. Teachers should consider not presenting an overall grade along with feedback.

- **Provide both content-level and surface-level feedback.** The jury is out on which is more effective on improving writing: results show that both or either can be effective. Effectiveness can depend on what the student is ready for. More specifically, feedback on sentence structure, grammar, organization, and development was looked
upon favorably by students, whereas feedback pertaining to word choice or that contrasted with ideas expressed by students was not received as well. The timing of this level of feedback is also important. Some studies say that content-level feedback should be given early in the drafting process and that surface-level feedback be given later when the purpose, organization, and logic of the argument have been clarified. An exception to this is for EFL and FL students, who are always interested in getting feedback on grammar and spelling.

- **Align directive and facilitative feedback with student goals.** Facilitative feedback will help a student understand the reasons for a suggested change; directive feedback simply tells the student what to change. Here again, student preferences for this type of direction can be different at different times, and is related to the student’s goals.

**Balance control of the feedback.** If the feedback comes across as demanding (as can happen when a whole essay is marked with “red pen” errors), students may not be receptive to it. Students may be more receptive when the comments are posed in a more open, suggestive way. For example, instead of marking all the places words are used more than once, a teacher can mark a few places where words are repeated, noting, “I’ve marked a few places where you have used the same word more than once. You might try to find synonyms to express those words, though in some cases it is perfectly acceptable to repeat the use of a word.”

- **Present feedback in specific rather than general ways.** The more specific the feedback, the more likely it will be clear what students need to do in order to improve their writing. For example,
pointing out how the writing can be improved is more helpful than just saying that it needs improvement. This feedback is considered constructive and is perceived as positive by many students. Teachers should consider telling students specifically what they need to work on.

- **Tell students both what they did right and where they need help.** Students find it more palatable to read detailed feedback on their work when something good is said as well. However, if praise is not linked to the task, it can focus the student on self-esteem and not on the task, thereby ending with no improvement in writing. Teachers should include praise in terms of something specific the student did well and point out the student’s strengths as well as areas that are in need of improvement.

- **Generate text appropriate to the ability level of the student.** Students who perform at low levels of writing are probably not capable of understanding long or complicated texts of detailed feedback. One way to address this is to give a lesser amount of feedback than the student wrote. It may be more appropriate, in some cases, to provide audio or audiovisual feedback (Anson; Speck and Jones). Teachers should consider limiting the amount of text generated for each feedback area or including audio to read the feedback to students.

- **Generate an appropriate amount of text based on student certitude.** Students who believe they did well are not usually open to spending a lot of time improving their writing. On the other hand, students who believe they need help are often more open to reading more information about how to improve their work. Teachers should
survey students on their level of confidence that they did a good job writing the essays. This will allow them to focus attention on either the overall score (if the student did well), or to detailed feedback (e.g., organization rather than mechanics), as appropriate.

- **Provide alternative feedback methods for specific characteristics of writing.** It could be beneficial to use models of writing that exemplify what the teacher is looking for at each grade level (e.g., what constitutes a grade of A, B, or C), in addition to providing writing exemplars for specific characteristics of writing. Examples include a well-organized paragraph and an outlined text for different purposes, such as compare/contrast or persuasive. This method allows students to focus on specific characteristics without being distracted by other features presented in an overall writing sample.

- **Conduct a survey to find out what types of feedback the student would like.** Reesor suggests having a feedback system that begins with a survey of the student writer to determine the writer’s intentions and needs, so that the feedback can be focused on those needs (248). For example, if a student wants to focus on organization, on different types of mechanics, or on content-level feedback, this can be specified in a survey. If the survey is administered at the time the essay is submitted, this would be a good time to ask how confident the student is that he or she has addressed all the goals of the assignment. This latter question can inform the amount of feedback that should be presented.


“Students’ Reactions to Teacher Comments: An Exploratory Study.”


Appendix I

Reviewed Articles, listed by Grade Level and Type of Research

<table>
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<tr>
<th>Article</th>
<th>Content Area</th>
<th>Grade Level</th>
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*Writing Across the Curriculum