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The Use of a Checklist and Qualitative Notebooks for an Interactive Process of Teaching and Learning Qualitative Research

Rebecca K. Frels^{1a}, Bipin Sharma^b, Anthony J. Onwuegbuzie^c,
Nancy L. Leech^d, Marcella D. Stark^c

^aLamar University, Beaumont, Texas 77710

^bSaint Xavier University, Chicago, IL 60655

^cSam Houston State University, Huntsville, Texas 77341

^dUniversity of Colorado Denver, Denver, Colorado 80217

Abstract

From the perspective of doctoral students and instructors, we explain a developmental, interactive process based upon the Checklist for Qualitative Data Collection, Data Analysis, and Data Interpretation (Onwuegbuzie, 2010) for students' writing assignments regarding: (a) the application of conceptual knowledge for collecting, analyzing, and interpreting qualitative data; (b) utilizing detailed instructor feedback of content and writing style as a positive catalyst for growth; and (c) integrating feedback in future assignments and reflecting on the process. We advocate the cyclical use of this framework for teaching and learning rigorous qualitative research.

Keywords: Writing, writing rubric, qualitative research, steps in qualitative research process.

Graduate students enrolled in qualitative research courses often undertake multiple daunting tasks in order to understand and to conduct rigorous qualitative research. These tasks include learning: (a) the history and current state of qualitative inquiry, (b) numerous qualitative research designs, and (c) methods of analyzing and interpreting qualitative data. A few common textbooks offer traditions (e.g., phenomenological research, grounded theory, ethnography) and methods for conducting rigorous qualitative studies (cf. Chenail, 2007; Denzin & Lincoln, 2005; Hurworth, 2008; Miles & Huberman, 1994). However, to learn how to conduct rigorous qualitative studies, more than textbook information is necessary. Moving from reading theory in the texts to applying the concepts through practice involves an application of concepts that is often reliant upon student writing and instructor feedback.

In order for any research study to be shared with others, with some exceptions (e.g., performance ethnography, visual anthropology), the study results are in written form. In-

¹ Corresponding author's email: rebecca.frels@gmail.com

deed, writing well is a mainstay for productive scholarship for students and academics alike, and the phrase publish or perish might be all too familiar to even prolific writers. According to Boote and Beile (2005), "acquiring the skills and knowledge required to be education scholars should be the focal, integrative activity of predissertation doctoral education. Preparing students to analyze and synthesize research in a field of specialization is crucial to understanding educational ideas" (p. 3). Thus, in this article, to assist researchers in their ability to write qualitative research, doctoral students and instructors describe the interactive process of Qualitative Notebooks (Onwuegbuzie et al., 2009) and the Checklist for Data Collection, Data Analysis, and Data Interpretation, developed by Onwuegbuzie (2010), hereafter called the Checklist. This instrument, which facilitates the development of becoming a prolific qualitative researcher, is used with a writing component in qualitative research coursework. Even though the Checklist was created for the development of students as qualitative researchers, we believe that the Checklist is a valuable tool to confirm the essential elements of a qualitative study for emergent scholars and beyond. To evidence the developmental, interactive process of the Checklist as an integral writing component for rigorous qualitative research and to evidence the interactive process of the instructor and student(s) through the Checklist and the Qualitative Notebook(s), we present following sections: (a) Theoretical Framework; (b) Methodological Framework; (c) Model for Teaching and Learning Qualitative Research, (d) The Qualitative Notebook; (e) Checklist for Data Collection, Data Analysis and Data Interpretation; (f) APA Style: Part II of the Checklist; (g) The Interactive Writing and Feedback Process; (h) The Reflexive Journal; (i) Reflections on the Process, and (j) Implications.

Theoretical Framework

According to Vygotsky (1978), learning encompasses a scaffolding effect through the apprenticeship process. Hence, Vygotsky's (1978) theory of social development underscores the developmental feedback cycle associated with the interaction between the professor(s) and student(s) and the use of the Checklist. As such, the process of learning qualitative inquiry is an interactive process whereby instructors interact with students in both verbal and written format, stressing each important stage of student development and students' belief systems regarding their qualitative research.

Methodological Framework

In addition to the theoretical research framework, Leech and Onwuegbuzie's (2010) interactive, iterative, recursive, emerging, and continuous 13-step process for qualitative research was used as the methodological framework for teaching and learning qualitative research: (a) Step 1: Determine the goal of the study, (b) Step 2: Formulate the research objective(s), (c) Step 3: Determine the rationale of study, (d) Step 4: Determine the research purpose, (e) Step 5: Determine the research question(s), (f) Step 6: Select the qualitative sampling framework, (g) Step 7: Select the qualitative research design, (h) Step 8: Collect data, (i) Step 9: Analyze data, (j) Step 10: Legitimate data, (k) Step 11: Interpret data, (l) Step 12: Write the qualitative research report, and (m) Step 13: Reformulate the research question(s). As such, students use the methodological framework as a structural component when designing and undertaking qualitative research studies.

Model for Teaching and Learning Qualitative Research

The model for teaching and learning qualitative research (Onwuegbuzie et al., 2009) allows students to progress through four major phases of learning and practice. The first phase, the conceptual/theoretical phase, is an introduction to the qualitative research process. In this phase, students explore the history of qualitative research, as they also recognize the first five steps (Leech & Onwuegbuzie, 2010), which are involved in research formulation, specifically: (a) Step 1 (determine the goal), (b) Step 2 (formulate the research objective), (c) Step 3 (determine the rationale), (d) Step 4 (determine the research purpose), and (e) Step 5 (determine the research question).

In the second phase of the course, the technical phase, instructors describe 18 qualitative analysis techniques (i.e., classical content analysis, constant comparison analysis, and discourse analysis) using qualitative data analysis software (NVivo 8; QSR International Pty Ltd., 2008). In addition, students compose a research plan (i.e., Step 6: select the sampling framework and Step 7: select the research design). Also, research implementation (i.e., Step 8: collect data, Step 9: analyze data, Step 10: legitimate data, and Step 11: interpret data) and disseminating results/suggesting future research (i.e., Step 12: write the research report and Step 13: reformulate research questions) frame the research process for students as they use the Checklist for writing research reports. The interactive process of teaching and learning culminates during the third phase of the course, the applied phase, whereby instructors work closely with students in collecting, analyzing, interpreting, and writing their respective qualitative research assignments through the interactive feedback process. Phase 4, the emergent scholar phase, is an extension of the third phase and occurs at the conclusion of the course. In this phase and beyond, instructors encourage students to present collaborative research and submit post-course manuscripts to journals for consideration for publication. Furthermore, as a framework for future qualitative studies, students are able to continue the use of the Checklist to guide them in data collection, data analysis, and data interpretation in conjunction with the 13-step process for qualitative research.

Thus, the course phases are distinct, overlapping, and iterative. Students progress in their qualitative research knowledge and writing proficiency in Phase 2: the *technical phase*. In addition to learning 18 qualitative analysis techniques (Phase 2), students apply their knowledge and write six qualitative analysis exemplar notebooks (i.e., assignments) toward becoming emergent scholars (Phase 4). With this in mind, the writing component of the course is structured so that students: (a) author qualitative notebooks using the Checklist, (b) receive detailed instructor feedback via the Checklist and accept feedback as helpful toward setting goals, and (c) integrate feedback in future qualitative notebook assignments and reflect upon the process. The following section, The Qualitative Notebook, explains how students build on the theoretical and conceptual knowledge of Phase 1 of the qualitative research course through the practical application of conducting research and writing research reports.

The Qualitative Notebook

With respect to the assignment aspect of a course, there is a distinct difference between authentic assessments and performance assessments of coursework, with the former involving the application of knowledge in an authentic setting (Linn & Gronlund, 1999). Furthermore, in authentic assessments, authenticity is required, as opposed to performance assessments whereby authenticity is only approximated (Linn & Gronlund, 1999). It is important to note that in order for students to engage in authentic assessments, they must undertake a practical application of concepts learned in coursework. Onwuegbuzie and Leech (2003) described the use of notebooks and detailed scoring checklists (e.g., scoring rubrics) to encourage strongly the development of students' practical skills. Thus, in Phase 3 of the course (the *applied phase*), students are asked to become researchers.

The qualitative notebook (e.g., authentic assessment) is one of the primary activities within the course for students to experience conducting qualitative research. The notebook assignment represents a series of assessments whereby students are asked to collect, to analyze, and to interpret data, and ultimately to write up formally the findings and interpretations in the same manner as would appear in a published journal article. In fact, the term *notebook* represents the idea of compiling each assignment that contains detailed feedback from instructors into a portfolio (i.e., notebook). Thus, students refer to their knowledge gained in Step 1 through Step 5 for formulating their research, and move into Step 6 (i.e., select sampling framework) and Step 7 (i.e., select research design) as they compose the method sections of their research studies to be presented through the notebook assignments. It is at this point that students use the Checklist to understand the necessary components regarding data collection, data analysis, and data interpretation to include when writing their notebooks. Figure 1 depicts the Checklist for use within the 13step methodological framework (Leech & Onwuegbuzie, 2010), used in the structure of the course with the four-phase model for teaching and learning qualitative research (Onwuegbuzie et al., 2009). As seen in Figure 1, the four-phase model allows students to bridge the conceptual and theoretical components (e.g., the 13-step methodological framework) of qualitative research into the writing process. In addition, depicted in Figure 1, students refer to specific steps of the 13-step qualitative research process at different times of the course. For example, students refer to Step 8 and Step 9 (research implementation) in the Results section, and Step 12 and Step 13 (disseminate results/suggest future research) in the Discussion section. As presented in this figure, the Checklist is introduced in Phase 2 (i.e., the technical phase).

In addition, students use software (NVivo 8; QSR International Pty Ltd., 2008) to analyze data extracted from interviews, member checking interviews, and debriefing interviews for a case study for six assigned notebooks: (a) word count/keywords-in-context; (b) classical content analysis; (c) method of constant comparison; (d) ethnographic analysis (i.e., domain analysis, taxonomic analysis, componential analysis); (e) discourse analysis; and (f) cross-case displays: exploring and describing/ordering and explaining. Specifically, students use the Checklist and detailed feedback from instructors to help guide their subsequent qualitative notebook write-ups and, as a result, the quality of the write-ups potentially improves for students with each subsequent qualitative notebook report, until each

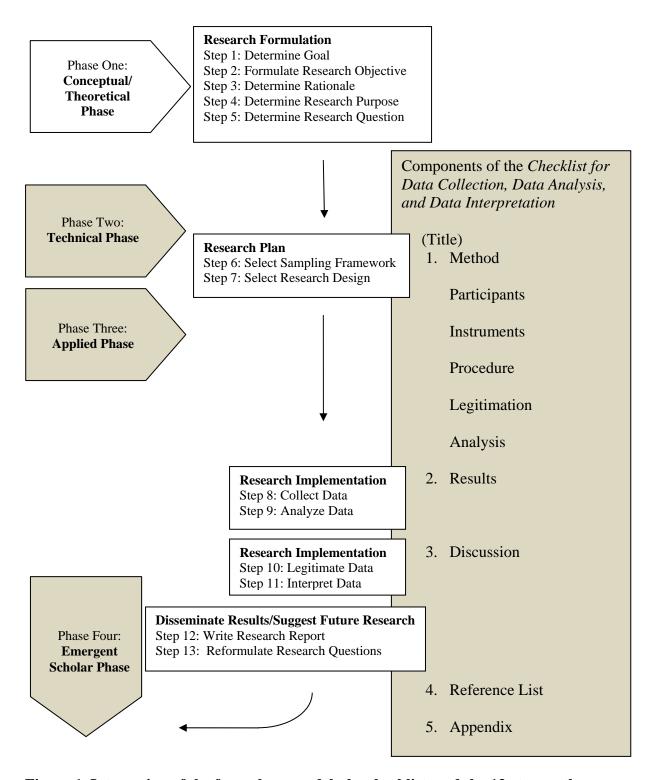


Figure 1. Integration of the four-phase model, the checklist, and the 13-step methodological framework with respect to writing a research report.

respective notebook reaches maximum quality. In the following section, we describe how the Checklist is used to facilitate the interactive process between instructors and students for composing notebook assignments.

Checklist for Data Collection, Data Analysis, and Data Integration

Students compose respective qualitative notebooks according to two sections of the Checklist: (a) content (Part I), the rubric for instructors for feedback pertaining to the essential components of qualitative research; and (b) style (Part II), the rubric for feedback pertaining to adherence to American Psychological Association (APA, 2010) guidelines. Specifically, Part I contains 158 items with a Likert-format scale format for each item ranging from 1 to 5 (1 representing strongly disagree to 5 representing strongly agree). Likewise, Part II (i.e., writing style) contains 70 items. For Part II, as a guide, students are given an evidence-based article wherein the 60 most common APA errors are identified (see Onwuegbuzie, Combs, Slate, & Frels, 2010). Both summative and formative feedback are given with the Checklist. Scores from both rubrics (i.e., content and style) are converted into percentages for a final score and summative feedback: 60% of the final score is for content (Part I) and 40% of the final score is for writing style (Part II). Thus, each qualitative notebook receives a score on a 100-point scale. Moreover, the tracking feature of the Word processing software program is used to provide *formative* feedback in conjunction with the Checklist. Formative feedback allows students to take remedial measures where necessary and for instructors to reinforce positive behavior, as waiting until the end of a course does not improve skills within the same course (Clarke, 1985). Hence, students are very aware of the expectations for a final assignment in the course and the various components and skills that are essential for rigorous research. When a student uses Part I as a guide for writing an exemplar notebook and discovers that he or she has neglected a critical element for presenting research, the student then seeks out through reference books ways to address essential components for reporting research findings. Part I of the Checklist pertains to 10 essential sections of a research report: (a) title, (b) method, (c) instruments, (d) procedure, (e) analysis, (f) legitimation, (g) results, (h) discussion, (i) reference list, and (j) appendix. Appendix A² presents the Checklist Part I that lists each of the 158 items included in the 10 essential sections. It should be noted that this Checklist is continually revised and updated as new qualitative concepts, theories, procedures, and language emerge. Each of the essential sections is described in detail.

Title

According to APA (2010) style guidelines, a title should be "fully explanatory when standing alone" (p. 23) and summarize the main idea of a manuscript. The title section of Part I includes five pertinent points for students to consider when composing a title. With this in mind, specific components of the title section include directives to: (a) make clear the population/context/case(s) of interest; (b) make clear the primary independent variable(s), if applicable; (c) make clear the dependent variable, if applicable; (d) indicate

²Appendix A is posted online at http://www.uncw.edu/cte/et/articles/Vol11 1/FrelsAppA.pdf.

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the specific relationship between the major variables; and (e) avoid vague, ambiguous, and emotional-laden terms. Thus, the title of a qualitative study, with regard to the five elements aforementioned, would depend on whether the qualitative inquiry is case-oriented, variable-oriented, or process/experience-oriented (Onwuegbuzie, Slate, Leech, & Collins, 2009).

Method

The method section of qualitative research involves Step 6 (select the sampling framework) and Step 7 (select the research design; Leech & Onwuegbuzie, 2010). As such, the method section should be detailed in explanation whereby researchers emphasize an experience that is transformed into words for understanding "naturally occurring, ordinary events in natural settings, so that we have a strong handle on what 'real life' is like" (Miles & Huberman, 1994, p. 10, emphasis in original). Critical elements of qualitative research regarding the method section of Part I include: (a) participants, (b) instruments, (c) procedure, (d) legitimation, and (e) analysis. Each of these is described in detail.

Participants. Sampling is an essential step of qualitative research, taking into account both: (a) the sampling scheme (i.e., the specific technique utilized to select participants); and (b) the sampling design (i.e., the framework within which the sampling occurs, comprising the number and types of sampling schemes and the sample size; Onwuegbuzie & Leech, 2007a). Further, Onwuegbuzie and Leech (2007b) described the use of qualitative power analysis to represent "the ability or capacity to perform or act effectively with respect to sample" (p. 117). With regard to participants, qualitative power analysis assesses the appropriateness of units in a sample (Onwuegbuzie & Leech, 2007b). Additionally, Onwuegbuzie and Leech (2005) affirmed that qualitative researchers should make sampling decisions regarding the number of interviews, observations, focus groups, and length of interviews based upon the goal of attaining prolonged engagements, persistent observations, and adequate reflection (i.e., reflexivity). The participants section of Part I includes the aforementioned components regarding sampling and 16 major points pertaining to participants and the role of the researcher. Hence, students who thoroughly address each component of the method section should be confident that a study is well described for an audience.

Instruments. Although researchers are the primary instrument in qualitative studies (Lincoln & Guba, 1985; Paisley & Reeves, 2001), most qualitative research studies involve the utilization of other instruments such as interview schedules, focus group schedules, and observational protocol. As recommended by Onwuegbuzie and Leech (2007a), a researcher should leave an audit trail by documenting every step of the research process, including activities, interviews, member-checks, and analysis of data. By employing the instrument section of Part I as a guide, students address 28 areas important for describing instruments in qualitative research. Further, students are requested to provide citations for all statements pertaining to the characteristics of the instruments. Therefore, students learn important qualitative concepts such as non-verbal nuances (Fontana & Frey, 2005) regarding qualitative interviews, specifically: (a) proxemics, the use of interpersonal space to communicate ideas; (b) chronemics, the way speech and silence is con-

veyed through conversation; (c) *kinesics*, body movements or postures; and (d) *paralinguistics*, the variations in volume, pitch, and quality of voice.

Procedure. The compilation of research records should entail a complete ethnographic record, as suggested by Spradley (1980), to include all field notes, artifacts, and any other documentation relevant for understanding a qualitative research study. Furthermore, this section assists students to understand the importance of providing evidence for rich data, and systematic collection of data. Included in the 27 items of the procedure section is the task for students to identify at least one verification procedure in detail (e.g., prolonged engagement, persistent observation, triangulation, contextualization of observations, method of constant comparison, and examining extreme cases).

Analysis. The analysis section (Step 9; Leech & Onwuegbuzie, 2010) of qualitative research involves the idea that using different qualitative data analysis techniques can increase triangulation; thus, researchers should systematically select multiple appropriate analysis techniques (Leech & Onwuegbuzie, 2008). Miles and Huberman (1994) contended that strengths of qualitative data depend upon their "richness and holism, with strong potential for revealing complexity; such data provide 'thick descriptions' that are vivid, nested in a real context, and have a ring of truth that has strong impact on the reader" (p. 10, emphasis in original). Hence, the analysis section of the Checklist comprises four general categories of analyses as noted by Leech and Onwuegbuzie (2010): (a) inductive coding (i.e., going to the text, coding inductively for meaning, developing categories from codes, producing theme statements); (b) deductive coding (i.e., coding deductively for meaning, going to the text, developing categories from codes, producing theme statements); (c) abductive coding (i.e., coming from an interactive process of deduction and induction; and (d) interpretive coding (i.e., developing a more abstract interpretation). As such, qualitative data analysis consists of three concurrent activities: data reduction, data display, and conclusion drawing/verification (Miles & Huberman, 1994).

Students are guided to make pre-analysis considerations important for addressing legitimation to include prolonged engagement, persistent observation, triangulation, leaving an audit trail, member checking, using extreme cases, replicating a finding, and referential adequacy (Leech & Onwuegbuzie, 2010). Importantly, and noted in the Checklist, students are asked to justify categories that emerge, and at which point (i.e., a priori, a posteriori, or iterative) these categories were specified (Onwuegbuzie, 2003). Furthermore, students seek to understand the difference between exploratory or confirmatory techniques, the importance of naming sources used to identify categories, and ways to justify the existence of a given set of categories (i.e., external, rational, referential, empirical, technical, or participative; Constas, 1992).

Legitimation. Denzin and Lincoln (2005) attributed three crises (representation, legitimation, and praxis) as confronting researchers regarding the evaluation of qualitative research and posed "a serious rethinking of such terms as *validity*, *generalization*, and *reliability*" (p. 19; emphasis in original). Threats to internal and external credibility occur at three major stages of the research process, namely the research design/data collection stage, the data analysis stage, and the data interpretation stage (Onwuegbuzie & Leech,

2007a). Based on Onwuegbuzie and Leech's (2007a) framework, the legitimation section of the Checklist assists students in addressing threats to internal credibility and external credibility in an iterative fashion. Using the Checklist, students detail, describe, and provide the citations for all important threats to legitimation and verification procedures. The legitimation section of Part I includes references to guide students through potential threats to credibility (e.g., Creswell, 2007; Guba & Lincoln, 2005; Lather, 1991; Lincoln & Guba, 1985; Miles & Huberman, 1994).

Authenticity criteria (Guba & Lincoln, 2005) embody constructivist assumptions for five elements that help to expand understanding and increase legitimation: (a) fairness: the researcher's ability to value and honor the evaluation process; (b) ontological authenticity: the criteria for assessing a high level of awareness among participants in research; (c) educative authenticity: the extent to which participants understand and appreciate diverse value systems of others; (d) catalytic authenticity: the appreciations and constructions that lead to actions or decisions by participants; and (e) tactical authenticity: the empowerment on participants and stakeholders to act on increased understanding that results from a study. As posited by Onwuegbuzie, Leech, and Collins (2008), the ability to discuss thoughts, perceptions, feelings, and experiences regarding authenticity and reflexivity helps researchers move deeper into the investigation and captures participants' voices and empowers them to a greater extent.

Results

The results section pertaining to Part I comprises Step 8 (collect data) and Step 9 (analyze data), and as noted by Leech and Onwuegbuzie (2010), the results section includes the ethical nature of data collection, research paradigm, and philosophical correlates of the research paradigm. Qualitative research has been described as rich in multiple meanings (Onwuegbuzie & Leech, 2007a), and also maintains a communitarian view of power, as described by Christians (2005), as being intimate and reciprocal. The results section of qualitative research involves interpretive validity, or the extent to which the interpretation of the analysis represented an understanding of the phenomenon (Maxwell, 1992), through thick and rich descriptions using original language from the participants for each theme and category. Writing the qualitative research report involves aspects such as the clear description of themes, appropriate displays of meanings of themes, and presenting thick, rich data (Onwuegbuzie & Leech, 2010). Threats to verification, trustworthiness, internal credibility, and authenticity are addressed through some of the relevant queries as outlined by Miles and Huberman (1994): (a) How context-rich, meaningful, and thick are descriptions from text? and (b) Are the presented data linked to the emerging theory? The concept of truth space (the sample of words portrays the experience, the feelings, the opinions, the sentiments; Onwuegbuzie, 2003) should be regarded in the results of a study whereby "qualitative researchers hope that the sample of words is representative" (Onwuegbuzie, 2003, p. 400). Hence, students address components throughout the results section, as they also strive to integrate data and avoid vague, ambiguous, and emotionalladen terms and represent the phenomenon studied.

Discussion

According to Leech and Onwuegbuzie (2010), steps of the Discussion section comprise the legitimation of data (Step 10) and the interpretation of data (Step 11), and conclude with a written report (Step 12), written in a manner acceptable to the intended audience (i.e., faculty, journal reviewers, policy makers, practicing educators in the field, conference paper reviewers, researchers). With respect to each tradition of inquiry (e.g., biography, phenomenological, grounded theory, ethnography, case study), two rhetorical structures are addressed: (a) the overall structure, or the overall organization of the study; and (b) the embedded structure, or the specific narrative devices and techniques used by a writer (Creswell, 2007). Furthermore, the discussion section allows students to interpret findings and reference these findings back to research questions. As a result, the discussion section of the Checklist also allows researchers to reevaluate research questions, and if necessary, to reformulate research questions (Step 13) as a result of data interpretations (Leech & Onwuegbuzie, 2010). The Checklist further presents safeguards for students to understand personal bias, generalizations, and implications.

Reference List and Appendix

The final two sections of Part I of the Checklist, namely, the reference list and appendix, direct students to attend to important features such as accuracy of citations (e.g., citations that are provided in the text are also contained in the reference list), and accuracy of APA (2010) style guidelines when referencing authors. Other items in this section include: (a) names of all authors are accurate and consistent, and (b) sources are written accurately. The appendix section of the Checklist refers to eight critical elements for an appendix, including appropriate qualitative software output, informed consent documentation, and samples of any instruments developed or adapted by the researcher.

APA Style: Part II of the Checklist

Chapter 1 of the Publication Manual of the APA (2010) pertains to writing for the behavioral and social sciences, and describes several considerations for authors, specifically regarding their own research and the scientific publishing tradition. According to Henson (2007), more than 60% of educational journals requested that authors adhered to APA (2010) style guidelines. Also, Onwuegbuzie and Combs (2009) contended that authors who write with discipline and strict adherence to style guidelines likely will increase publication chances, and also increase the likelihood to publish in a journal with high visibility for stakeholders and policymakers. Designed to address integrating writing style elements in coursework, Part II of the Checklist is presented in the same organizational format as Part I, and is the scoring rubric for writing quality and adherence to APA (2010) style guidelines. In addition, the final page of Part II of the Checklist allows the instructor to add additional points for a student who has provided detailed references with respect to one or more sections of a notebook. Thus, Part II of the Checklist facilitates the technical application of writing style for students through the exemplar qualitative notebooks. Appendix A presents Part II of the Checklist (i.e., adherence to APA [2010] style guidelines), directly after Part I of the Checklist.

The Interactive Writing and Feedback Process

According to Richardson and St. Pierre (2005), writing represents a method of inquiry and is more than a reactive process. In the interactive writing and feedback process of the qualitative course model for teaching and learning qualitative research (Onwuegbuzie et al., 2009), writing is developmental, interactive, and a meaning-making endeavor. The Checklist Part I and Part II, with the Notebook assignments, facilitate dialogue between students and instructors toward the exchange of ideas and collaboration for writing reports. Moreover, students are led to recognize that the Checklist is a foundational guide for qualitative research, and that becoming a life-long qualitative researcher is indeed possible. However, both instructors and students must maintain particular roles and responsibilities during the interactive writing and feedback process so that data collection, data analysis, and data interpretation might be integrated and internalized for autonomous learning.

Instructor Role and Responsibilities

Feedback is considered a strong element for effective learning (Bangert-Drowns, Kulik, Kulik, & Morgan, 1991). Detailed feedback is at the crux of an instructor's responsibility as a professional educator, researcher, and motivator. As such, formative feedback helps students reflect on their levels of performance and take greater responsibility for their actions (Butler, 2004). Appendix B³ presents an excerpt from one qualitative notebook and the detailed feedback given by an instructor using the comment feature of a Word document.

Student Role and Responsibilities

Students who are active participants in learning are more likely to understand course material than if they are passive receptors in a classroom presentation (Ramsden, 1992). Furthermore, Le Brun and Johnstone (1994) suggested that student attitudes and values are affected by class participation, and that participation also increases motivation and emphasizes a student's responsibility for learning. Students' responsibilities include addressing feedback presented by instructors in a reflective and meaning-making endeavor to include *attending* (spending time with the event) and *affirming* (accepting and valuing the event, even if the first response may be to disregard it) (Kolb, 1984). Thus, it is important to note that students should regard feedback as a positive, developmental component of writing qualitative reports.

The Reflexive Journal

Systematic reflexivity is an integral consideration in qualitative research, and "collecting and critically reflecting on researcher bias in a systematic manner can greatly enhance the legitimation of accounts of social and behavioral phenomena" (Onwuegbuzie et al., 2008, p. 2). Through the reflexive journal (Cunliffe, 2004), students regard all aspects of the

³Appendix B is posted online at http://www.uncw.edu/cte/et/articles/Vol11_1/FrelsAppB.pdf.

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qualitative research course, including the qualitative notebooks, the biases they bring to the course, their personal investment in and commitment to the course, and their relationships as a result of the interactive writing and feedback process. As a result, the purpose of the reflexive journal is two-fold: (a) to become a critically reflexive practitioner (Cunlife, 2004) and (b) to integrate reflective learning (Kolb, 1984). Thus, students maintain the journal through personal entries on a weekly basis.

Reflections on the Process

Students' Perspectives

Upon first impression, students who have not taken a research class might be overwhelmed at the extensive nature of the Checklist. Even though the terminology of the Checklist items is introduced in Phase I and Phase II of the qualitative course, the list might appear intricate or complicated upon first glance. To understand the cognitive and emotional responses of students taking the four phase qualitative course, Frels, Stark, and Onwuegbuzie (2010) examined the reflexive journals of one class and uncovered that emotional changes accompanied the developmental phases of learning. With respect to the initial introduction to the Checklist, one student noted,

Oh my goodness! We got a rubric tonight about our first notebook and I had no idea of any of the words the professor used or even what he was talking about! It is a good system, but sometimes we rush through so much I tend to zone. I asked and he clarified and then I think I understood a little bit more, but I feel like a contestant on the Amazing Race. I get a clue and then use my energy and detective skills to figure out what's going on. I think I'm smart enough, and I think I can persevere, so okay. But, I really love the enthusiasm that our teachers have.

Another student explained,

The class work is very demanding. I am not sure what to expect on the first write up. There were a lot of challenges. I could not believe the immense number of items on the rubric. If I can make a suggestion...it would be the need for a model write up.

In addition, as students receive feedback via both Part I and Part II of the Checklist at the same time, instructors might recognize that even though formative feedback is a purpose of the Checklist, the first time students receive the Checklist, they might focus more on their number score than their developmental growth as a researcher. One student explained,

I think I did well on my first qualitative notebook, but I am still not sure what my grade is. I earned a B on one section, a C on another section, and an A at the end. I hope the A is correct; it was on the last page.

Similarly, when receiving the first assignment's feedback, another student noted,

The rubric is very confusing, and I believe that the professors should have taken a class session to explain the points. There were many times that I thought I had mentioned the appropriate information, but I was informed that I stated it incorrectly.

Taking into account the detailed nature of the Checklist, the emotional response of students might include feelings of being overwhelmed due to not only the new concepts introduced, but also to the vast number of items included in the scoring checklist. Indeed, one student remarked,

I feel lost at times when I am writing in this class because of the strict rubric. I sat down and went through each point and found that this is going to be very difficult. Some of the material that we have to cite is nowhere to be found. I mean it is tough, and writing for such rigorous standards for the first time is a challenge. I hope that our inexperience is taken into account. It should be an interesting write up. It will take time to master this writing style. With practice anything can be done.

Furthermore, course instructors should recognize that even though the scoring checklist provides the framework for students to write each qualitative notebook, it is the feedback that accompanies the assignment that promotes reflective growth. Often times, students might not respond to the feedback positively. In fact, one student responded, "We got back our first papers and I was a bit embarrassed with the errors I made regarding citations. I could have made a decent A without them." However, to evidence the confidence that accompanies the third and fourth phases of the course, one student noted that,

I arrived 30 minutes early tonight and mapped out our last three assignments. I really think I would like to do qualitative research, but just not for my dissertation; I want to do it in my career. I have been thinking so much this week about how to even write the paper on ethnographic analysis and discourse analysis, because truly I can only skim the surface with these designs...I wish we had more time. This class is too short.

Also, with respect to the writing growth that occurred after the use of the Checklist, another student observed,

The [Checklist] has begun making sense. I met with the professors and found that they can explain concerns at a human level. I was impressed with the effort taken to design such a rubric. Honestly, once I began to believe in it, it made a lot more sense, and I could begin to see how I needed to address these issues in my own write-ups. When I wrote my first write-up it became apparent to me that I was not a competent writer.

As a testament to the impact of the use of the Checklist, three of the seven doctoral students participating in the four-phase model qualitative research course deemed the Checklist as foundational in the success of their dissertation research. Other students in

the class either engaged in quantitative dissertation studies or have yet to complete the dissertation process. In fact, at the conclusion of the class and in the emergent scholar phase, the three doctoral students who used the checklist to help in conducting their dissertation research embarked on co-authoring this article because they believed that their qualitative expertise and writing expertise were results of the use of the Checklist as both a guide and an assessment tool.

Instructors' Perspectives

As noted by Frels et al. (2010), professors of the four-phase model for teaching and learning qualitative research observed that teaching this course for the first time at an institution might generate heightened levels of anxiety initially because students are taken on a journey with no prior history as to how this journey will end. However, as the course unfolds and students advance down the path of learning, many, if not most, of them begin to trust that the destination will yield positive outcomes. The second time the course is taught at the same institution, one or more students who previously took this course are asked to team-teach the course, thereby serving as teaching assistants. These teaching assistants not only can validate the initial trepidation of the new students, but also they can assure them that the journey on which they are embarking will maximally prepare them to be both consumers and producers of qualitative research. Thus, these teaching assistants continue to grow as emergent scholars (i.e., Phase 4), as they help the new students negotiate the first three phases of the course. Indeed, these teaching assistants likely are in a better position than are the instructors to identify the items on the Checklist that are causing the most problems. In addition, the teaching assistants facilitate the new students' understanding of the interactive nature of the course (e.g., how the notebook, instructor feedback, and reflexive journal processes work together), which is key for the new students' journeys. As this course is taught over the years, a *culture of scholarship* ensues.

Implications

A qualitative course that combines experiential learning through a dialogical process allows participants, as noted by Brookfield (1985), to "encounter experiences, attitudinal sets, differing ways of looking at their personal, professional, political, and recreational worlds and a multitude of varying purposes, orientations, and expectations" (p. 41). The changing field of qualitative research, as noted by House (2005), involves the role of researcher as a methodological and interpretive *bricoleur* acting as "an artist, a quilt maker, a skilled craftsperson, a maker of montages and collages [who can] interview, observe, study material culture, think within and beyond visual methods..." (p. 1084). In her approach to teaching qualitative research, Lapadat (2009) explained a "triumvirate of methodology instruction" (p. 957) wherein learning involves three main strands: (a) learning what (i.e., familiarity with the language, concepts, theories, history, debates within the field); (b) learning how (i.e., focusing on a study, conducting interviews, transcribing tapes); and (c) recognizing doing (i.e., engaging and identifying with the self's values, emotions, and understanding the human conditions associated with qualitative research).

In addition, Bizzell (1992) explained that often times instructors fall into the trap of teaching academic discourse "as if it were a matter of a static relationship between individual student and 'body' of knowledge: step by step, through 'requirements' and 'prerequisites'" (p. 145). As a result, this approach might leave students struggling to seek comprehensive knowledge to increase understanding (Bizzell, 1992). Conversely, the Checklist serves as a guide for technical and cognitive discourse because it seems to be a repetitious and stabilizing component to increase learning and dialogue.

Even though the interactive use of the Checklist and the Qualitative Notebooks was designed for the purpose of an introduction to qualitative research course involving data analysis for a case study, the Checklist would be a valuable tool as both a guide and rubric for other frameworks within the qualitative tradition (e.g., phenomenological research, ethnographic research, grounded theory). In addition, items could be added or subtracted from the Checklist to adapt it for various levels of instruction (e.g., undergraduate, master's level). Thus, the Checklist becomes a launching pad for students and beginning researchers to embark upon the technical, logistical, ethical, personal growth, and awareness involved in becoming emergent qualitative scholars.

Conclusion

Knowledge is acquired through an individual's interaction with social processes and contexts (Kelly, 1955; Piaget, 1954; Vygotsky, 1978). Kolb (1984) contended that learning is a continuous, holistic, and adaptive process wherein a person experiences a range of emotions, increased awareness, and innovative conceptualizations. Hence, the interaction of writing and feedback (socially and contextually) between instructors and students after using the Checklist continues well after students have completed the qualitative coursework. Describing a holistic approach to academic writing, educators Antoniou and Moriarty (2008) noted that "privately, many academics struggle with their writing, that they often cannot find time and space to write, experience fear and anxiety about writing, feel they lack knowledge and expertise, and worry they are not good enough" (p. 158). With this in mind, as instructors and students, we hope that the Checklist, when used with the 13-step methodological framework (Leech & Onwuegbuzie, 2010) for qualitative research, offers advantages for instructors and sheds light upon the qualitative research process for students for confidence in writing rigorous qualitative research reports.

References

Adler, P. A., & Adler, P. (1987). *Membership roles in field research*. Thousand Oaks, CA: Sage.

American Psychological Association. (2010). *Publication manual of the American Psychological Association* (6th ed.). Washington, DC: Author.

Antoniou, M., & Moriarty, J. (2008). What can academic writers learn from creative writers? Developing guidance and support for lecturers in higher education. *Teaching in Higher Education*, 13, 157-167. doi:10.1080/13562510801923229

- Bangert-Drowns, R. L., Kulik, C. L., Kulik, J.A., & Morgan, M. T. (1991). The instructional effect of feedback in test-like events. *Review of Educational Research*, 61, 213-238. doi:10.3102/00346543061002213
- Bizzell, P. (1992). *Academic discourse and critical consciousness*. Pittsburgh, PA: University of Pittsburgh Press.
- Boote, D. N., & Beile, P. (2005). Scholars before researchers: On the centrality of the dissertation literature review in research preparation. *Educational Researcher*, *34*(6), 3-15. doi:10.3102/0013189X034006003
- Brookfield, S. D. (1985). Self-directed learning: From theory to practice. New directions for continuing education. San Francisco, CA: Jossey-Bass.
- Butler, S. (2004). Question: When is a comment not worth the paper it's written on? Answer: When it is accompanied by a level, grade or mark! *Teaching History*, 115, 37-41.
- Chenail, R. J. (2007). *Teaching and learning qualitative research references*. Retrieved from http://www.nova.edu/ssss/QR/Teaching.pdf
- Christians, C. G. (2005). Ethics and politics in qualitative research. In N. K. Denzin & Y. S. Lincoln (Eds.), *The Sage handbook of qualitative research* (2nd ed., pp. 139-164). Thousand Oaks, CA: Sage.
- Clarke, E. G. (1985). Grading seminar performance. College Teacher, 33, 129-133.
- Constas, M. A., (1992). Qualitative analysis as a public event: The documentation of category development procedures. *American Educational Research Journal*, 29, 253-266. doi:10.2307/1163368
- Creswell, J. W. (2007). *Qualitative inquiry and research design: Choosing among five traditions* (2nd ed.). Thousand Oaks, CA: Sage.
- Cunliffe, A. L. (2004). On becoming a critically reflexive practitioner. *Journal of Management Education*, 28, 407-426. doi: 10.1177/1052562904264440
- Denzin, N. K., & Lincoln, Y. S. (2005). The discipline and practice of qualitative research. In N. K. Denzin & Y. S. Lincoln, (Eds.), *Sage handbook of qualitative research* (3rd ed., pp. 1-32). Thousand Oaks, CA: Sage.
- Flanders, N. A. (1970). Analyzing teaching behavior. Reading, MA: Addison-Wesley.
- Frels, R. K., Stark, M. D., & Onwuegbuzie, A. J. (2010). Experiences of students and teachers of a qualitative research course: The journey of becoming a researcher. Unpublished manuscript. Sam Houston State University, Huntsville, TX.
- Fontana, A., & Frey, J. H. (2005). The interview: From neutral stance to political involvement. In N. K. Denzin & Y. S. Lincoln (Eds.), *The Sage handbook of qualitative research* (2nd ed., pp. 695-727). Thousand Oaks, CA: Sage.
- Guba, E. G., & Lincoln, Y. S. (1989). Fourth generation evaluation. Newbury Park, CA: Sage.
- Guba, E. G., & Lincoln, Y. S. (2005). Paradigmatic controversies, contradictions, and emerging confluences. In N. K. Denzin & Y. S. Lincoln (Eds.), *The Sage handbook of qualitative research* (3rd ed., pp. 191-215). Thousand Oaks, CA: Sage.
- Henson, K. T. (2007). Writing for publication: Steps to excellence. *Phi Delta Kappan*, 88, 781-786.
- House, E. R. (2005). Qualitative evaluation and changing social policy. In N. K. Denzin & Y. S. Lincoln (Eds.), *The Sage handbook of qualitative research* (3rd ed., pp. 191-215). Thousand Oaks, CA: Sage.

- Hurworth, R. E. (2008). *Teaching qualitative research: Cases and issues*. Rotterdam, NY: Sense Publishers.
- Janesick V. J. (2004). *Stretching exercises for qualitative researchers* (3rd ed.). Thousand Oaks, CA: Sage.
- Kelly, G. A. (1955). The psychology of personal constructs. New York, NY: Norton.
- Kolb, D. A. (1984). Experiential learning: Experience as the source of learning and development. Englewood Cliffs, NJ: Prentice Hall.
- Lapadat, J. C. (2009). Writing our way into shared understanding: Collaborative autobiographical writing in the qualitative methods class. *Qualitative Inquiry*, *15*, 959-976. doi: 10.1177/1077800409334185
- Lather, P. (1991). *Getting smart: Feminist research and pedagogy with/in the postmod-ern*. New York, NY: Routledge.
- Lather, P. (1993). Fertile obsession: Validity after poststructuralism. *Sociological Quarterly*, *34*, 673-693. doi:10.1111/j.1533-8525.1993.tb00112.x
- LeCompte, M. D., & Goetz, J. P. (1982). Problems of reliability and validity in ethnographic research. *Review of Educational Research*, 52(1), 31-60. doi: 10.3102/00346543052001031
- Leech, N. L., & Onwuegbuzie, A. J. (2008). Debriefing. In L. M. Given (Ed.), *The Sage encyclopedia of qualitative research methods* (pp. 199-201). Thousand Oaks, CA: Sage.
- Leech, N. L., & Onwuegbuzie, A. J. (2010). *Qualitative data analysis: A step-by-step ap-proach*. Unpublished book.
- Le Brun, M., & Johnstone, R. (1994). *The quiet revolution: Improving student learning in law*. Sydney, Australia: Law Book Company.
- Lincoln. Y. S., & Guba, E. G. (1985). Naturalistic inquiry. Beverly Hills, CA: Sage.
- Linn, R. L., & Gronlund, E. (1999). *Measurement and assessment in teaching*. Englewood Cliffs, NJ: Prentice Hall.
- Maxwell, L. A. (1992). Understanding and validity in qualitative research. *Harvard Educational Review*, 62, 279-300.
- Miles, M. B., & Huberman, A. M. (1994). *Qualitative data analysis: An expanded sourcebook* (2nd ed.). Thousand Oaks, CA: Sage.
- Onwuegbuzie, A. J. (2003). Effect sizes in qualitative research: A prolegomenon. *Quality & Quantity: International Journal of Methodology*, 37, 393-409.
- Onwuegbuzie, A. J. (2010). *Checklist for Qualitative Data Analysis Notebook* (Version 4). Sam Houston State University, Huntsville, TX.
- Onwuegbuzie, A. J., & Combs, J. P. (2009). Writing with discipline: A call for avoiding APA style guide errors in manuscript preparation. *School Leadership Review*, 4(1), 116-149.
- Onwuegbuzie, A. J., Combs, J. P., Slate, J. R., & Frels, R. K. (2010). Editorial: Evidence-based guidelines for avoiding the most common APA errors in journal article submissions. *Research in the Schools*. Retrieved from http://msera.org/download/RITS 16 2 APAErrors6th.pdf
- Onwuegbuzie, A. J., & Leech, N. L. (2003). Assessment in statistic courses: More than a tool for evaluation. *Assessement & Evaluation in Higher Education*, 28, 115-127. doi: 10.1080/0260293032000044465

- Onwuegbuzie, A. J., & Leech, N. L. (2006). Linking research questions to mixed methods data analysis procedures. *The Qualitative Report*, 11, 474-498. Retrieved from http://www.nova.edu/ssss/QR/QR11-3/onwuegbuzie.pdf
- Onwuegbuzie, A. J., & Leech, N. L. (2005). The role of sampling in qualitative research. *Academic Exchange Quarterly*, *9*, 280-284.
- Onwuegbuzie, A. J., & Leech, N. L. (2007a). Validity and qualitative research: An oxymoron? *Quality & Quantity: International Journal of Methodology*, 41, 233-249. doi:10.1007/s11135-006-9000-3
- Onwuegbuzie, A. J., & Leech, N. L. (2007b). A call for qualitative power analysis. *Quality & Quantity*, 41, 105-121. doi:10.1007/s11135-005-1098-1
- Onwuegbuzie, A. J., & Leech, N. L., & Collins, K. M. T. (2008). Interviewing the interpretive researcher: A method for addressing the crises of representation, legitimation, and praxis. *International Institute for Qualitative Methodology*, 7(4), 1-17.
- Onwuegbuzie, A. J., Leech, N. L., Slate, J. R., Stark, M., Sharma, B., Frels, R... & Combs, J. P. (2009, February). *A model for teaching and learning qualitative research*. Paper presented at the annual meeting of the Southwest Educational research Association, San Antonio, TX.
- Onwuegbuzie, A. J., Slate, J. R., Leech, N. L., & Collins, K. M. T. (2009). Mixed data analysis: Advanced integration techniques. *International Journal of Multiple Research Approaches*, *3*, 13-33.
- Paisley, P. O., & Reeves, P. M. (2001). Qualitative research in counseling. In D. C. Locke, J. E. Myers, & E. L. Herr (Eds.), *The handbook of counseling* (pp. 481-498). Thousand Oaks, CA: Sage.
- Piaget, J. (1954). The construction of reality in the child. New York, NY: Basic Books.
- QSR International Pty Ltd. (2008). *NVIVO: Version 8. Reference guide*. Doncaster Victoria, Australia: Author.
- Ramsden, P. (1992). Learning to teach in higher education. London: Routledge.
- Richardson, L., & St. Pierre, E. A. (2005). Writing: A method of inquiry. In N. K. Denzin & Y. S. Lincoln (Eds.), *The Sage handbook of qualitative research* (3rd ed., pp. 959–978). Thousand Oaks, CA: Sage.
- Spradley, J. P. (1980). *Participant observation*. Fort Worth, TX: Holt, Rinehart and Winston.
- Stake, R. E. (2005). Qualitative case studies. In N. K. Denzin & Y. S. Lincoln (Eds.), *The Sage handbook of qualitative research* (2nd ed., pp. 443-466). Thousand Oaks, CA: Sage.
- Vygotsky, L. S. (1978). *Mind in society: The development of higher psychological processes.* Cambridge, MA: Harvard University Press.
- Werner, O., & Schoepfle, G. M. (1987). Systematic fieldwork: Ethnographic analysis and data management. Newbury Park, CA: Sage.
- Yin, R. K. (2009). Case study research: Design and methods. (4th ed.). Los Angeles, CA: Sage