Using an Adversary Hearing to Evaluate the Effectiveness of a Military Program

Richard L. Miller and Jeanne Butler
University of Nebraska at Kearney, Kearney, Nebraska

This study describes the design and implementation of an adversary hearing used to evaluate professional development initiatives in a military environment. The adversary hearing model used in the evaluation was developed to meet the requirements of an environment that differs from other environments in which adversary hearings have been used. The evaluation was conducted to determine whether a professional development program of the U. S. Army, Europe, actually enhanced soldier development and demonstrated consideration by leaders for their followers. Several key issues related to program effectiveness were discovered in the process of the adversary hearing that were not evident in a survey evaluation of the program. Key Words: Adversary Hearing, Program Evaluation, Judicial Evaluation Model, and Participatory Research

A primary purpose of any program evaluation is to provide information for decision-making in planning, implementing, and determining the intended and unintended effects of a project. Two critical factors in determining the value of that information is the extent to which a systematic process is used to evaluate the project and whether there is inquiry into all aspects of potential program alternatives. Without consideration of these two factors, decision-making is frequently based on partial information that may not be representative of the key issues that determine the effectiveness of the program.

In the past, the process for conducting evaluation research followed the experimental research model, a mostly quantitative approach that provides a systematic process, but one that cannot consider numerous program alternatives (Guttentag, 1971; Patton, 2002). In experimental research, the researcher chooses a design to maximize the effect of the independent variables, minimize systematic sources of variance, and control error variance. In evaluation research the evaluator exerts control over only a small number of variables. With the decrease in control, there is an increase in the number of contingent factors that can impact program effectiveness (Tyler, 1991). The challenge of conducting evaluation research, unlike an experimental study, is that the researcher evaluates the merit and worth of a program based on a set of standards, generally agreed on by the parties involved, not the effects of a variable on an outcome (Scriven, 2003/2004). Another important difference is that an evaluator does not formulate the hypothesis. Program goals provide the evaluator with what is to be investigated. Finally, as Riecken (1952) noted in his classic study, evaluation research involves a value judgment of the worthiness of some activity, based on pre-determined criteria. This is quite different from the value-free position of experimental research. In fact, some
authors have explicitly addressed the need to harmonize program and evaluation values (Guba & Lincoln, 1989; Patton). These basic differences in the goals, procedures, conditions, and outcomes of experimental vs. evaluation research may explain why attempts to fit evaluation research into the experimental model have sometimes been unsuccessful. Of particular concern is the role of the participant in experimental vs. evaluation research (see Gray, Fitch, Davis, & Phillips, 2000). Evaluation research is more successful when the individuals being studied participate collaboratively in the research process (Heron, 1996; Wadsworth, 1993).

**Adversary Hearings**

Levine (1973) proposed a participatory method for testing the effectiveness of programs in real social contexts. He suggested a legal model in which there are claims and counterclaims, arguments and counter-arguments, with each side advanced by an advocate attempting to make the case for his or her position. Levine (1982) further describes the adversarial hearing as a model based on the assumption that truth emerges from a fair fight between opposing sides that present evidence in support of each position. A neutral party who arrives at a fair conclusion referees the hearing and considers all evidence. Owens (1973) suggests that the adversary hearing allows for the consideration of alternative proposals to keep the evaluation intellectually honest.

The judicial evaluation model (Levine, 1974) adapts and modifies legal procedures from both jury trials and administrative hearings. The purpose is to develop a clear set of issues on which to focus the inquiry, and to rely more on human testimony than do other evaluation approaches. Two or more evaluation teams, exploring different sides of the issue, are used to structure the deliberations of the decision making group. This provides a more balanced view of the evidence. The adversary hearing is intended to provide an effective way of presenting balanced, factual data. Unlike true adversary proceedings in law where the objective is to win, adversary evaluation hearings provide a broad understanding of the program being evaluated by exploring the complexity of the issues from more than one perspective.

**Benefits**

Smith (1985) has compiled a list of benefits in using the adversary hearing for program evaluation. In an adversary hearing, it is possible to: (a) present both pro and con evidence and provide for cross-examination of testimony (Owens, Haenn, & Fehrenbacher, 1976), (b) admit human testimony and judgment as evidence, rather than traditional evaluation data (Wolf, 1975, 1979), (c) use a wide variety of data, while preserving the complexity and social setting of the program (Levine & Rosenberg, 1979; Wolf, 1975), (d) involve various persons affected by the program in the evaluation to provide a variety of perspectives (Wolf, 1975, 1979), and (e) provide various interpretations of evidence prior to reaching a conclusion (Wolf, 1975). Tebes and Kraemer (1991) suggest that the adversarial hearing can enhance both experimental and quasi-experimental approaches to obtain qualitative and quantitative knowledge. Yin (1999) points out that rival explanations can provide rigor in qualitative analyses, and
Popham (1993) suggests that an adversary hearing may provide clarification about program effectiveness rather than a decision as to which of two views is most correct.

Limitations

Smith (1985) describes some of the limitations of the adversary hearing related to the competitive nature of this approach, complexity of managing the process, and lack of skilled individuals to fill the various roles in the hearing. The limitations associated with each of these are that: (a) the audience may focus on the persuasiveness of the individuals rather than the evidence (Owens, 1973; Owens et al., 1976), (b) hearings require extensive preparation time (Owens, 1973), (c) time limitations may lead participants to focus on only a few issues (Levine et al., 1978; Owens et al., 1976; Wolf, 1975), (d) it can be difficult for hearing members to develop recommendations that are specific and operational (Wolf, 1979), (e) highly persuasive expert witnesses can sometimes carry considerable weight beyond the merits of their case (Cooper & Hall, 2000), and (f) the approach requires considerable resources to implement (Braithwaite & Thompson, 1981).

Recommendations

In addressing the problems associated with using the adversary hearing in program evaluation, Wolf (1979) suggested that providing detailed and agreed upon issues to the participants will increase the likelihood that their recommendations will be specific and operational. Providing participants with training, specific instructions, and shared expectations will improve the quality of the proceedings (Levine et al., 1978; Wolf, 1975; Wolf, 1979). It is also important to provide procedures for counterbalancing the order of the arguments and closing statements (Brown & Newman, 1982).

To increase the effectiveness of adversary hearings, Madaus (1982) and Worthen and Owens (1978) recommend the most appropriate situations for the use of the adversary hearing. These situations include controversial programs in which public opinion is polarized, and the termination of large-scale programs that affect a large number of people.

Applications

The first application of the adversary hearing in evaluation research was in the field of education (Owens, 1971). Since then, there have been numerous applications of the adversary hearing in evaluating school curricula (Owens et al., 1976), teacher training programs (Arnstein, 1975; Stenzel, 1982), graduate professional programs (Levine et al., 1978), competency testing (Thurston & House, 1981), special education (Wolf 1979), team teaching (Nafziger, Worthen, & Benson, 1977), and school program evaluation (Wood, Peterson, DeGracie, & Zaharis, 1986). The evaluations have ranged from small-scale projects staffed by volunteers to large-scale projects requiring a large staff and many months to complete. The projects have been conducted at local, state, and national levels. Since most of this research focused on educational evaluation, researchers have urged the expansion of adversary approaches to fields outside education (Kourilsky & Baker, 1976; Owens & Owen, 1981), but thus far there have been few such applications,
perhaps because of some of the limitations noted previously, or because of the time and expense involved in implementing an adversary hearing.

Among the few applications of the adversary hearing outside of educational evaluation, Schensul (1985) applied advocacy research strategies to ethnographic research. Braithwaite and Thompson (1981) evaluated the effectiveness of state employment agencies, and Bornstein (1990) suggested that the adversary model could be applied to the manuscript review process. Recently, Jordan, Bogat, and Smith (2001) have recommended the adversary approach as a means for ensuring the integrity of research in studying social change within the Black community.

Barker and Pistrang (2005) outline quality criteria for conducting such community-based research. The adversary hearing is an approach that addresses several of their criteria, including transparency of procedures, ethical treatment of participants, promoting empowerment, giving voice to traditionally underrepresented populations, and promoting social justice. Thus, we believe that this adversary approach is worthy of new consideration and application. The present paper expands the focus of the adversary hearing from education to the evaluation of a program associated with performance appraisal in a military context. One characteristic of the military environment that distinguishes it from other settings in which the adversary hearing has been implemented is the clearly defined rank structure. Most decision making in the military is made within the rules of this rank structure so that in order to conduct an adversary hearing, the full range of decision makers must agree to respect the conclusions reached by the adversary process.

In order to utilize an adversary system, it is necessary to translate legal procedures and concepts into an evaluation format. Some of the critical dimensions to be translated are the applicable law relevant to the trial, and adequate analogs to the judge, jury, and counselors. In the first full-scale tryout of the adversary system, Wolf (1979) evaluated the effectiveness of a teacher education program. The analog Wolf used for the law was a compilation of complaints about the program in question that emerged from the experience of the participants that contained implicit standards (the law). These complaints were written, and a formal response obtained from the program’s defenders. An alternative to this system, which is more feasible in a military setting, would be to utilize the goals and desired outcomes of the program being evaluated as the standard by which the program’s success may be measured.

In his study, Wolf used a panel of experts as the jury, which then played a major role in summarizing and characterizing the evidence. While such a panel is possible in military program evaluations, a more likely source would be peers of the program participants who understand the impact of the program. As illustrated by these examples, Wolf’s system does not translate perfectly into the military environment. The current study considers the differences between Wolf’s system and the military environment to determine the design of an adversary system that will be effective in evaluating military programs.

**Designing an Adversary Hearing for Military Program Evaluation**

Based on the results of the implementation described in this paper, we recommend that the adversary hearing for program evaluation in a military environment
be designed in five distinct phases: (a) the outcome identification phase, (b) the outcome selection phase, (c) the participant staffing phase (judge, jury, witnesses, etc.), (d) the preparation of arguments phase (collection of pre-trial testimonies, synthesis of pretrial evaluation data), and (e) the hearing phase.

The outcome identification phase is used to identify a comprehensive set of goals, objectives, and possible unplanned effects of the program being evaluated. In order to accomplish this task, a variety of sources needs to be consulted including: (a) the individual/agency responsible for designing the program, (b) the administrators of the program, (c) the recipients of the program, and (d) the evaluators of the program. A series of in-depth fact-finding interviews with each of these groups is necessary to accomplish this phase.

The outcome selection phase is designed to limit the number of potential outcomes/effects identified in phase one to a manageable size. To accomplish this, a priority survey is administered to all of those involved in planning the adversary hearing. The purpose of this survey is to identify which of the outcomes/effects are perceived to be most important and potentially controversial. Each agency/individual involved ranks each identified issue and any new ones not previously included. The final selection of outcomes is the responsibility of the advocates who will actually conduct the trial, and the hearing officer who oversees the trial. The primary basis for outcome selection is the relevance of the outcome to the decision to continue, discontinue, or modify the program being evaluated.

Phase three involves the identification and preparation of the various individuals who will participate in the trial. Included in this phase is the selection of the evaluation teams responsible for arguing the pro and con positions regarding the program being assessed. We recommend that the evaluation teams be headed by social scientists involved in the assessment of the program and familiar with the adversary process. It is important that the communication skills of these advocates be balanced, as noted by Popham and Carlson (1977). The teams are comprised of one or more members who are involved in the program itself. These members act as associate advocates, legal aides, interviewers, and researchers. Each team builds arguments that reflect two potential courses of action. One team will focus on the positive outcomes, accomplishments, and benefits derived from the successful implementation of the program. Thus, their role is to support the continuation of the program. The second team will focus on the shortcomings of the program in meeting its stated goals and, thus, underscore the need for new and different approaches to solving the problems addressed by the “unsuccessful” program. Each team has the responsibility for: (a) presenting their “case,” (b) challenging the other teams’ arguments, and (c) cross-examining the other teams’ witnesses.

A second important group of participants are the witnesses who will offer testimony relevant to the success/failure of the program. These witnesses should include administrators, recipients, and overseers of the program being evaluated. Witnesses may be selected initially by dividing groups of participants into pro and con camps based on a “quick and dirty” survey. After such a division, it is the responsibility of the evaluation team to interview and screen prospective witnesses, and to select those with the most relevant testimony.
Hearing Officers should be experienced Judge Advocate General's Corps (JAG) lawyers. In the role of judge, during the adversary hearing, the officer will control the flow of testimony and cross-examination. Also, it is the judge’s role to assist the jury in determining the adequacy of the evidence, clarifying points of contention, ruling on objections by opposing counsel, relaying questions to the advocates by the jury, and instructing the jury in their responsibility after the testimony has been given. Also, the Hearing Officer works with the advocates in developing the rules and procedures for the trial before the hearing itself begins.

The jury or hearing panel must weigh the arguments of the advocates and arrive at a decision about the success and future of the program. These individuals should not include anyone personally involved in the program, but should include peers of both administrators and participants in the program. (Thus, if a stratified program administered by officers for enlisted personnel is being evaluated, the jury should include officers and enlisted personnel from a non-involved unit.)

Phase four involves the preparation of formal arguments by the evaluation teams. The first step is to identify those program outcomes that are likely points of contention around which each team can prepare its respective arguments. The basis for this phase is the result of the earlier outcome selection phase. The focus of the arguments should be behavioral in nature, and designed to highlight the consequences of various actions with regard to the program.

In phase four, the advocates meet with their respective witnesses and collect pre-trial testimony (depositions) relevant to each of the contested outcomes. It is critical that the evidence generated in this phase be grounded in actual behavioral occurrences relating to the program’s implementation. In addition to taking depositions from witnesses involved in the program itself, expert witnesses may be asked to participate if their testimony is relevant to the outcomes being considered. Examples of such expert witnesses include individuals who have designed, administered, or participated in similar programs. In addition to interviewing and preparing witnesses, the evaluation team should at this time study previous non-adversary evaluations, if any, of the program being considered in order to prepare supporting documentary evidence.

Phase five, the hearing itself, is conducted in a manner similar to actual administrative hearings. Step one involves a meeting between the hearing officer (judge) and the advocates, in which agreement is reached on the rules and procedures for the hearing. Such rules and procedures include criteria for determining evidence admissibility, the number of witnesses allowed per point of contention, the scope of cross-examination, and the instructions to be given to the jury.

The hearing itself begins with opening arguments in which both advocates briefly outline the case they intend to demonstrate to the jury. Step two involves the examination and cross-examination of the prosecution (anti-program) witnesses. Step three is the examination and cross-examination of the defense (pro-program) witnesses. Step four is the closing arguments by the advocates and associate advocates, and the instructions to the jury. Step five is deliberation of the jury. Step six is the announcement of a verdict and a polling of the jury for the basis of their decision. This polling provides an opportunity to collect valuable qualitative data related to program evaluation that is very useful in post-hearing deliberations about the program.
Implementation of the Adversary Hearing

This test of the adversary hearing in a military setting was a planned assessment of a program for soldier development created by the Office of the Deputy Chief of Staff for Personnel (ODCSPER), U. S. Army, Europe (USAREUR). The soldier development plan was a systematic procedure implemented as a pilot program, and designed to ensure that enlisted soldiers met their personal education and professional development objectives. The plan included an early assessment procedure to establish the level of each individual’s capabilities based on training and experience, development of an educational and military training plan for maintaining the individual’s current skill levels and improving needed abilities, and a quarterly review of each soldier’s progress and a re-statement of objectives. This development plan was implemented for a three-month period in three company size units. The adversary system was used to evaluate the effects of the program in one of those units, while a more traditional survey method was used in the remaining units. The questions asked in the adversary hearing were identical to those asked in the traditional survey approach (see, Appendix A). In the survey approach, each of the questions was accompanied by a 4-point Likert scale ranging from 1 (not at all) to 4 (to a very great extent).

Outcome Identification Phase

The goals and objectives of the program were determined by: (a) content analysis of Commander and Chief, U. S. Army, Europe’s original memo outlining the program, (b) interviews with the agency (ODCSPER) who had responsibility for design and implementation of the program, and (c) consultation among the evaluators (U. S. Army Research Institute for the Social and Behavioral Sciences, USAREUR Field Unit) of the program. Two general goals were derived from this process: (a) enhanced professional development of the enlisted soldier and (b) leader concern demonstrated to the enlisted soldier. In addition, a number of possible side effects were explored including the impact of the program on morale and soldier performance.

Outcome Selection Phase

Since the goals of the program were very broadly defined in phase one, the task in this phase was to refine the goals into a limited number of events. Professional development was divided into three categories: Civilian education, military occupational specialty (MOS) correspondence courses, and military on-the-job (OJT) training. The identification of remedial needs, and the scheduling of training to meet those needs, were included as necessary outcomes. In addition to these specific outcomes, it was expected that there might be some effect on the general soldiering performance of those involved in the program.

Leader concern was defined as both a positive attitude toward meeting the soldiers’ needs and the leaders’ responsiveness in following through on the development plan. Some side effects included the impact of the program on the leaders’ general managerial skills, especially those skills commonly referred to as "people skills."
An assessment was conducted to determine whether these two effects (increased professional development and leader concern) were a result of the program. The results were assessed by a series of questions to identify the extent to which the leader implemented all the aspects of the program. Appendix A contains the questions that formed the basis of the evaluation. In the adversary hearing, these questions provided the basis for the presentation of evidence and the cross-examination of witnesses. In the traditional evaluation conducted with a sister unit, each question was accompanied by Likert scales that provided a quantitative score.

**Participant Staffing**

To ensure that quality and rigor were maintained in the adversary hearing, experienced research scientists, involved in the design of the overall evaluation of the soldier development plan, led the evaluation teams. This was done partially to lend credibility to the process, but also because the scientists were those most familiar with the technique being implemented. The scientists were assigned prosecutor/defense roles on a random basis. In order to obtain associate advocates and witnesses, the scientists visited the unit where the hearing was to be held and conducted a group interview of squad leaders and squad members designated by the unit. This process helped promote empowerment and gave voice to a traditionally underrepresented population in military decision-making; the enlisted soldier. A total of 30 individuals participated in the interview. The initial phase of this group interview explored the general stance of the participants toward the program, whether positive or negative. It was found that an approximate fifty percent split had occurred. On this basis, the groups were divided into two sub-groups that met with the scientist responsible for presenting the position advocated by these participants. During subsequent interviews, the scientists designated one member of the group to be an associate advocate and one to be a legal aid in obtaining witnesses. The scientist then took pre-trial testimony from the others as potential witnesses, and developed an outline of the case. The task of completing the pre-trial preparations was given to the associate advocate (a squad leader in both cases).

The hearing panel was selected from a company in the same battalion that did not participate in the program. A five-person jury was selected and included one platoon leader (1st Lt), two squad leaders (E-6), and two enlisted men (E-3). The hearing officer was a JAG lawyer assigned to the community where the test took place.

In accordance with the principles that guide the ethical treatment of research participants, all of the military personnel who participated in the adversary hearing freely volunteered and were treated. No information was withheld from the participants or the decision-makers in this study.

**Preparation of Formal Arguments**

The outline of questions for the trial was given to the associate advocates, who then interviewed prospective witnesses, who could offer evidence on one or more of the points related to each question. From this effort, the scientists were able to construct their case supporting or not supporting the continuation of the program.
Trial Phase

The trial was conducted in one afternoon. The basic contention of the defense was that the program should be implemented because: (a) professional development had been enhanced since soldiers had been routed into the educational center counselors for assessment and (b) military skills and MOS needs had been assessed. The prosecution contended that the program should not be implemented since not all of the participants had received the remedial training or educational programs indicated by the assessment. In leader concern, the defense contended that squad leaders had demonstrated their concern by showing a positive attitude towards the professional development of the soldier and by a desire to follow-through on the development plan. The prosecution contended that lack of any real follow-through made the squad leaders’ professions of concern appear hypocritical, and in fact undermined the soldiers’ confidence in his or her superiors. In general, the defense argued that given enough time, the plan would have impact, while the prosecution argued that the “system” did not afford the plan opportunity for any significant impact. In this implementation, the jury ruled for the prosecution, indicating that the program was flawed and should be modified, if it was to be effective.

Conclusions

The critical aspect of this adversary procedure was the open forum in which a variety of viewpoints were heard. Thus, the polling of the jury for the reasons behind their judgment was especially important. In the present tryout, the jury, because they were from the same battalion as the program participants, was able to introduce opinions not anticipated in the survey questionnaire (see Appendix A). While the conclusion drawn from the quantitative data generated from the survey data indicated mixed support for the program, the adversary hearing provided detailed reasons for that support that allowed developers to modify the program to make it work better.

It should be noted, however, that the experience of the members of the jury with the battalion introduced a possible bias in the impartial consideration of the evidence. It was the opinion of the jury that no development plan decentralized to the squad level could be effective, since the resources and decision-making processes for obtaining time to professionally develop soldiers were concentrated at the battalion level and above. Thus, in the jury’s opinion, the program had been seriously handicapped from the beginning because of invalid assumptions about the implementation of training policies. It was interesting to note that this notion was not clearly articulated in the evaluation of the soldier development plan that utilized the traditional survey method for assessing program effectiveness.

The adversary hearing was recorded and transcribed. A report that described the process and summarized the arguments and the conclusions was prepared for the decision-makers. This report provided sufficient information, so that those not witnessing the adversary hearing could evaluate the validity of the conclusions reached. In keeping with the standard set by Stenzel (1975), the report was shared with all of the participants. This process ensures transparency, not only of the methods used, but how those methods inform the conclusions that were reached. It is important that in participatory research, all
of the participants have the opportunity to contribute to the process, which includes the preparation of the materials summarizing the process. As a result of the adversary hearing, several modifications in the program were developed and implemented. Post-evaluation interviews with those who participated in the process were very positive. Enlisted personnel, in particular, were appreciative of the fact that the "chain-of-command" appeared to be willing to listen to their point of view, in what was a structured, formal process.

The present study demonstrated some of the strengths and weaknesses of the adversary system. In comparison to the more traditional measures of program evaluation, the adversary system allowed greater participation in the decision making process by those actually involved in the program. Also, points of contention were articulated during the hearing that are not easily derived from a questionnaire. A promising side effect of the hearing was that both the administrators and the recipients of the program were able to better understand each other’s point of view. On the less than positive side, it is certainly the case that an adversary hearing is more costly than a survey in terms of time and resources. Also, opinions that might be shared privately may not be stated in a group of people who interact with one another on a daily basis. This drawback was countered somewhat in the present study by running the trial behind closed doors, with only the evaluation teams, evaluation panel, and hearing officer present during the testimony. A final concern relates to the selection of advocates. In order to insure a fair and impartial trial, the prosecution and defense teams need to be closely matched in terms of presentational and judicial skills. One approach that might help equalize the advocates is the exchange of opening arguments during the pre-trial phase.

By demonstrating the usefulness of the adversary approach in an area not previously addressed, we hope that others will consider this form of participatory research. In particular, we believe that community psychologists, involved in psychological interventions designed to promote social change, may find this technique particularly useful, especially as it may be used to incorporate both the professional knowledge of a researcher and the pragmatic, experiential knowledge of the program participant in such a way as to create autonomy rather than dependence among those who will be effected by the recommended changes that occur as a result of the research process.

References


Appendix A

Outcomes of Soldier Development Plan: Adversary Hearing Questions

Professional Development

Question:
To what extent has the Assessment/Development Program enhanced the professional development of the soldier (E1-E4)?

Evidence:
1. Did the A/D program improve the identification of needed military training and the scheduling of such military training?
2. Did the A/D program improve the identification of needed MOS correspondence courses and the utilization of such courses?
3. Did the A/D program improve the identification of needed civilian education and the scheduling of such educational opportunities?
4. Does the development plan fit the individual needs of the soldier (E1-E4)? If so, why?
5. Are the skills the soldier brings to the company more effectively utilized as a result of the A/D program? If so, how?
6. Has the soldier gained skills as a result of the A/D program? If so, how?
7. Are the soldiers’ capabilities of doing a good job improved as a result of the A/D program? If so, how?
8. Has the A/D program facilitated the maintenance of soldiers’ skills by the E1-E4? If so, how?
9. In general, is the E1-E4 a better soldier as a result of the A/D program?

Leader Concerns

Question:
To what extent does the Assessment/Development program enable leaders to demonstrate their concern for the soldier?

Evidence:
Specifically, as part of the A/D program:
1. Did the squad leaders follow through on the development plan? If so, How?
2. What were the squad leaders’ attitudes towards the assessment/development program?
3. Did the chain of command respond to the soldiers’ needs?
4. Was the assessment of the soldiers’ current abilities fair and accurate?
5. Did the A/D program enhance the squad leaders’ managerial skills?
Author Note

Dr. Richard L. Miller is professor and chair of psychology at the University of Nebraska at Kearney where he is Chair of the Institutional Review Board for the Protection of Human Subjects in Research. His main research interests are cross-cultural psychology, environmental psychology, and evaluation research. The author can be contacted at the Department of Psychology, University of Nebraska at Kearney, Kearney, NE 68849; Email: millerrl@unk.edu

Dr. Jeanne Butler is Director of the Office of Assessment at the University of Nebraska at Kearney. Her main research interests are evaluation, change management, and online learning research related to participation and retention. The author can be contacted at the Center for Teaching Excellence, University of Nebraska at Kearney, Kearney, NE 68849; Email: butlerjm2@unk.edu

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