ABSTRACT

        To increase the value of teacher inservice workshops,
the authors of this paper suggest obtaining teacher participation in
the selection of workshop topics and interviewing teachers to
determine their utilization of the methods presented in the
workshops. Noting that participants found fewer than half of 52
selected workshops both necessary and desirable, the authors propose
the use of a standard form and personal contacts to learn what
teachers want to study. When teachers fail to see the need for
workshops deemed necessary by administrators, it may prove more
useful to convince the teachers of the need than to schedule a
workshop and require uninterested teachers to attend. Application of
the "Levels of Use" interview technique can inform administrators of
the effectiveness of the inservice programs. In personal interviews
with workshop participants, interviewers can collect information
concerning the number of teachers implementing the new program, the
level of implementation, modifications made in the program, and
problems encountered using the program. The interviews also reveal
teacher attitudes about the effectiveness of various aspects of the
workshops and permit future inservice programs to be altered. Three
cases in which this interview technique was employed are described to
illustrate the concept's usefulness. (PGD)

EVALUATING STAFF DEVELOPMENT ACTIVITIES

WITH

LEVELS OF USE INTERVIEWS

or

THE SLEEPER EVALUATES INSERVICE PROGRAMS

By

Paul Casper
Alan Roecks

Education Service Center, Region 20
Dwain M. Estes, Executive Director
Evaluation Services
Alan L. Roecks, Coordinator
1314 Hines Avenue
San Antonio, Texas 78208
Phone: 512-271-7611

EA 015 100

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Evaluating Staff Development Activities with Levels of Use Interviews

or

The Sleeper Evaluates Inservice Programs[1]

INTRODUCTION

Like Rip Van Winkle, I was absent from the scene for over 20 years.
I was a high school teacher in the late 40's and early 50's. Then, after
serving a career in the military, I returned to education in the late 70's.
It was like having been asleep for 25 years. Changes, as well as new and
different ways, were all too apparent to this old sleeper. Sometimes it was
embarrassing to have to ask the meaning of the in-vogue terms and the language
of today's educators. In particular, terms such as cognitive dissonance,
affective behaviors, behavior modification, Bloom's taxonomy, Maslow's
hierarchy of needs, and yes, teacher inservice. We may have had some sort
of teachers' meetings in the old days, but I don't recall attending anything
resembling a workshop or staff development training. The point of this
explanation is that when someone suddenly looks at a process without having
grown up with it, the process is seen somewhat differently. Perhaps more
objectively, I'd like to think. At least, the existing practices are observed
without the benefit or hinderences of the developmental processes leading to
their existence.

For the past four years, I have been evaluating educational programs for
a regional education agency. Most of the programs, at this level, are of the
"inservice" type in which the program staff introduce new techniques and skills
to teachers through series of workshops and followed up with on-site assistance.

[1]The sub-title and related views represent the perspective of the senior
author only.

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Participant reactions usually place the workshops in one of these four categories:

.   Needed and desired. . The participants believed a need existed for the

information being taught, and, in addition to that, the participants person-

ally benefited from attending and were pleased to have been present.

.   Needed but not desired. The participants believed a need existed for the

information but not necessarily for them. They either did not gain much

by attending, or for other reasons, would rather have been elsewhere.

.   Not needed but enjoyed. The participants could see no realistic need or

perhaps because of their assignment, had no immediate need for the informa-

tion. At the same time, they were glad they attended because of the manner

.   of presentation or their interest in the subject.

.   Not needed and not desired. This category is self-explanatory. The par-

ticipants neither wanted to be there nor felt it was needed.

The following breakout, based upon 52 workshops, illustrates the percent

of the participants indicating these factors for the inservice they attended.

	Percent of Participants		
	Desired	Not Desired	Overall
Needed	43%	14%	57%
Not Needed	18%	25%	43%
Overall	61%	39%	100%

PURPOSE

With that as a situational background, permit me to explain the purpose

of this paper. I believe that at least 50 percent of the staff development

activities in the form of inservice training are a wasted effort. Of those

that are of value, only a small portion of the participants effectively use

the materials presented. This paper offers a few suggestions intended to

(1) increase the percentage of needed inservice topics, and (2) to accent

the value of knowing the levels at which teachers are using what was taught.

NEEDS

The importance of inservice education is not in question. Anyone not believing in it must be operating under the assumption that teachers entering the profession have all the education and training they need. Burrello and Orbaugh, in their scholarly article in the KAPPAN (February 1982) listed six constituents of effective inservice education. They were stated in terms too lofty for the old sleeper to fully appreciate, except for Number III.

"Inservice education programs should be grounded in

the needs of the participants."

What an obvious statement! Doesn't everyone know this? Maybe its the "how" that is not understood. Who determines the need? Certainly, the views of the participants should be considered. Looking back at the categories of workshops, you will note that two were considered needed and two were believed not needed. If the participants did not believe the inservice was needed, how effective do you think it was? On the other hand, does the teacher really know what the students need? The principal or superintendent may be more aware of the overall curriculum needs. For example, if tests covering the basic skills reveal the average for a school is well below the state average, the principal will undoubtedly perceive a need to raise the school's average.

The generally accepted understanding of an educational need is the gap that exists between "what is" and "what should be" (discrepancy model). Needs are determined from perceptions of the beholders. When teacher perceived needs do not coincide with administrator perceived needs, some convincing must ensue by one party or the other. As a rule, the impetus of identifying needs comes from the administrators. Probably the most frequently used questionnaires are those of the discrepancy model type. The most popular form devised by our office

and used by at least eight school districts is one in which the teachers were asked to plan an inservice program for the school district. From a "shopping list" of 67 topics (and ideas of their own), they were asked to select a schedule of inservice sessions covering a period of 24 hours; four days at six hours per day. (A copy of the form is attached as Appendix A.)

A more personal method of identifying needs as perceived by teachers is through informal discussions with teachers. This is particularly effective if done by the boss. Imagine the importance a person would place upon the issue when asked: "I need your advice. What subjects do you believe we should cover in our inservice?"

Regardless of techniques used, the important facts concerning needs are:

1. Inservice participants must be convinced of the need for the training before and after the sessions.

2. Remove or reduce the importance of chores or activities the participants might be doing if they had not attended the sessions.

3. In one way or another, make the training relevant to each participant.

4. Ensure that participants leave the inservice sessions with specific behavioral knowledge for implementing the instruction.

IMPLEMENTATION

Now, through the beady eyes of the old sleeper, the purpose of the inservice education was to produce change. The change could be different ways of doing things, a new specialized program, changes in procedures or physical arrangements, or any number of teacher activities designed to increase proficiency. The end result of the change, in nearly all cases, must manifest itself in improved student learning. Measuring student learning has been

going on a long time, and, in spite of short comings, it can be done rather easily and with a good deal of accuracy. However, the measurement of student achievement does not tell us much about the process. If the effectiveness of the inservice training is to be judged, we must know the extent the teachers *used* the instruction and applied what was taught.

The procedure adopted by my office to examine teacher implementation and change is an interview technique developed by the Research and Development Center for Teacher Education, University of Texas at Austin (Hall, et al), called Levels of Use (LoU). This model assumes that whenever someone becomes involved with a new program, they systematically progress through a predictable series of steps or levels. These range from Non-use (Level 0), where the person has little knowledge of the program to Renewal (Level VI), where the person seeks major modifications or alternatives to the program. The following are the major steps involved in conducting an LoU study.

1. Deterine the Criteria: The implementation criteria for the program behaviorally defines the major program components. That is, it specifies what the program is suppose to "look like" in the classroom.

2. Conduct the Interviews: The interviews, which take from 20 to 30 minutes, are conducted individually with the program teachers. The interviews are focused on two major aspects. First, questions are asked to determine how teachers address each of the components specified in the criteria. Second, questions are asked to determine at what level the teacher is in the implementation process.

3. Analyze the teacher Responses: Analysis of the data will answer the following type questions.

. What percentage of teachers are implementing the program?

(Studies indicate a .98 correlation between the answer to this question derived from LoU interviews and that derived from full day classroom observations.)

. At what level are the teachers implementing the program?

(Teachers at different levels of use require different kinds of interventions to assist in implementing their program.)

. What kinds of modifications have teachers made in implementing each of the major program components?

(In order to make a program manageable in the classroom, teachers frequently modify it from the way it was originally designed.)

. What kinds of problems have the teachers encountered in attempting to implement the program?

(This will allow administrators to identify what actions they can take to strengthen the program.)

I consider Step 1 to be critically important. If the person responsible for the inservice program can adequately describe to you what it is the teacher is expected to do in the classroom, that person has, in effect, described their workshop objectives. Knowing specifically what is to be achieved in the inservice education is paramount to launching any innovation or program.

RESULTS

Our office has evaluated over 80 programs using Levels of Use interviews. Without exception, the interview information has provided definitive evidence on the existance of programs, as well as providing other program improvement

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indicators. We have also found that information from this source is more likely to be used by the decision makers than information from other sources (Roecks and Andrews, 1980). The examples explained below illustrate the different types and uses of information available.

Case 1: An inservice director conducted a four day training session of the "Theory and Practice of Teaching Reading Comprehension," to 25 elementary teachers and reading specialists. The training was held in August. Later in the school year (April), the inservice director wanted to know the extent the teachers were applying what had been taught. She was preparing for the next inservice training and intended to use the information in her planning. The underlying concept of the workshop was called the "Efficiency Teaching Model." Eight teachers were interviewed using the LoU interview technique with some variance in the basic procedure. The emphasis was to document which concepts taught in the workshops in August had been used by the participants in their classrooms.

If our purpose was to rate the level of use of the material presented in the training, all teachers would be rated as "non-users." Two of the teachers said they may have used some information but only after modifying it to their own use. In reply to a question regarding their use of the "Efficiency Teaching Model," all teachers stated they did not use it. Four could not remember anything about it, two could vaguely remember it, and two knew what it was.

The teachers' comments concerning the inservice training were generally the same. They thought it contained too much theory and not enough practical

work they could use in their classrooms. Teachers spoke against having to play games. They said, in essence, "make your point and go on." The teachers said their comments were not directed to the consultants whom they said were gracious and competent; their criticism was basically the lack of specific activities related to their classrooms. Suggestions for future workshops were:

1. Have more concrete steps in the teaching of reading.

2. Reduce the amount of theory to a minimum.

3. No game playing.

4. Cover specific ways to use our new reader.

5. Use simple terms; don't use "educationalize."

6. New ways to present phonics.

7. Exchange of ideas between participating teachers.

8. We need help with the above average reader.

9. Go through the new book.

10. Keep it real and helpful in a practical classroom.

Case 2: The goal of this effort was to assist school districts with migrant programs in establishing a form of program evaluation which could help them improve at the local level. Eight school districts participated and each had two representatives trained as LoU interviewers. The regional service center assisted the districts by coordinating the effort. Reading instruction was the component selected for this study. Although the districts' reading programs varied somewhat, the participants agreed upon a common set of criteria by which to judge the program. The five criteria

selected are shown on a chart at Appendix B. Each criterion was described in three different degrees of implementation and values of 3, 2, and 1, were assigned. It was decided that a teacher should obtain a value of 10 or more to be adequately implementing the program.

Table 1 shows, for each district and overall, the average that each criterion was being implemented by the teachers.

Table 1

Average Values of Teacher Implementation

District	Number of Interviews	CRITERIA					
		Diagnosis	Activities	Objectives	Monitoring	Coordination	Total
1	6	1.0	1.5	1.0	1.2	1.8	6.5
2	4	2.5	2.5	1.8	1.8	1.0	9.5
3	6	2.2	2.0	1.3	1.8	2.0	9.3
4	6	3.0	2.7	2.5	2.7	2.7	13.5
5	9	1.9	2.1	1.2	2.0	2.1	9.3
6	6	2.7	2.7	1.7	2.3	2.0	11.3
7	5	2.0	2.2	2.8	2.4	2.0	11.4
8	4	2.3	2.3	2.0	1.8	1.0	9.3
Average	5.75	2.2	2.3	1.7	2.0	1.8	10.0

NOTE: Values ranged from 0 (not doing) to 3 (most desirable), with 2 being considered minimum acceptable.

The criteria receiving the lowest overall rating were "training to achieve objectives" (1.7) and "coordination between foundation and migrant teachers" (1.8).

Table 2 shows the numbers of teachers of each district assigned LoU ratings of III, IVa, and IVb. No teacher received a rating level below III or above IVb.

Table 2

Numbers of Teachers Operating at Various
Levels of Use

District	Number of Interviews	LEVELS OF USE			Percent at Level III
		III	IVa	IVb	
1	6	5	1	0	83%
2	4	1	2	1	25%
3	6	4	2	0	67%
4	6	0	5	1	0%
5	9	4	5	0	44%
6	6	1	5	0	17%
7	5	3	2	0	60%
8	4	1	3	0	25%
Totals	46	19	25	2	41%

Overall, 19 teachers were operating at a Level of Use III, defined as "mechanical use" in which the focus is on the short-term, day-to-day, application of the criteria. Twenty-five were operating at Level IVa, a routine stage where application of the criteria is stabilized and two were at Level IVb, a refinement stage. Teachers at Level III, characteristically are having problems implementing the objectives of the

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program. It was apparent that Level III teachers needed help if their program was to be improved. The percentages in the right hand column of Table 2 point out that districts 1, 3, 5, and 7 have problems. Looking at student achievements in reading confirmed that these districts were not doing well. The Levels of Use Interviews revealed a major factor in the low scores. The district concerned then planned a program to assist the teachers who were having problems.

Case 3: This was the second year of a Title IVC project called "Math Attitudes." The purpose was to improve math instruction through staff development sessions for Kindergarten through 8th grade teachers. Major concepts covered in the training were (1) use of the concrete to abstract learning sequence, (2) methods to improve instruction of the problem solving process, and (3) methods to improve student attitudes toward mathematics. A total of 152 teachers from eight school districts participated in the project.

The project staff expected:

1. Teachers to use concrete materials to teach math.

2. Teachers to use activities that specifically teach the problem solving process. That is, they were to help students bridge the gap between computation and word problems.

3. Teachers to use activities to improve students' attitudes to math.

4. Teachers to use activities that address students' understanding of the language of math (vocabulary, symbols, etc).

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LoU interviews found:

1. A total of 81% of the teachers were using concrete activities, but were using them in isolation and not as a part of the concrete-pictorial-abstract continuum.

2. A total of 33% of the teachers taught the problem solving process. Teachers felt they did not have many activities or materials for working on problems solving. They also felt that more of the workshop time should be devoted to this.

3. A total of 76% of the teachers were using activities to improve students' attitudes. This usually consisted of "real life" math and math games.

4. A total of 43% of the teachers made some changes in how they presented math vocabulary.

5. Many teachers believed the workshop placed too much emphasis on theory.

6. Many teachers believed there wasn't enough workshop time placed on making classroom materials.

7. Many teachers believed more of the workshop time should have focused on materials and content for their specific grade level.

The project staff reacted to the above findings as shown below:

1. Doubled the amount of workshop time spent on this aspect with additional classroom activities presented on applying the full continuum.

2. Presented the teachers more classroom activities on problem solving. The amount of workshop time spent on problem solving was tripled.

3. Judged this aspect to be less important than use of concrete materials and problem solving. They decreased the amount of workshop time spent on this, and incorporated some of the activities from this area into problem solving and concrete materials.

4. Same as 3.above.

5. Allocated less workshop time for presenting theoretical concepts, and used the extra time showing teacher how to apply the concepts. The presentors also spent more time modeling how to apply the different strategies.

6. Held special workshops where parent volunteers came in to assist in making materials.

7. Developed separate sets of materials for primary and intermediate level teachers. In the workshops, participants were grouped by grade level.

The point of this example was to illustrate the specific actions taken by project staff to strengthen weaknesses disclosed by the interviews.

CONCLUSIONS AND COMMENTS

A Rip Van Winkle view of education revealed that among the more positive innovations to develop during the past 20 years has been the broad use of inservice education. Through inservices all sorts of ideas are introduced or programs launched. Whether we are evaluating the inservice itself or the programs produced through inservice, all can be improved.

The first item of business is to ensure the inservice comes close to meeting the needs of the participants and the districts. A method suggested

here was to draw the participants into the planning phase. And secondly, if it is a program for which the participants may not see the need, a selling job is a prerequisite.

The second item of business is to find out what, if anything, the participants are doing with the inservice training. There are several ways of doing this. One method, the LoU type interviews, has proven effective in obtaining qualitative information for modifying and improving programs. Three case studies were presented to illustrate the type information that was obtained, and how it was used to improve the programs.

Finally, the old sleeper has found that information produced through interviews seems to meet with less resistance than data produced by other means.

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APPENDIX A

DISTRICT INSERVICE INTEREST FORM

How would you spend your inservice time?

Inservice time is limited and extremely important. In an effort to cover those subjects you feel would be most helpful, please take the time to complete this survey.

Below is a list of nine areas which might be desirable for our inservice sessions. If you were planning the total inservice program of 24 hours (4 days at 6 hours per day) how would you divide up those hours? After dividing up the hours, indicate specific subjects you would include. You may put down the numbers of the subjects from the attached "Shopping List" or write in subjects not listed.

Hours	Area	Subjects
_____	Instructional Planning	_____
_____	Classroom Management	_____
_____	Classroom Instruction	_____
_____	Student Evaluation	_____
_____	Community Projects	_____
_____	Campus/District Projects	_____
_____	Federal Programs	_____
_____	Region 20 Programs	_____
_____	Broad Interest Subjects	_____

Total 24 hours

_____   _____   _____
Present Position   Level (Ele;MS;HS)   Major Teaching Area
                                                  (if a teacher)

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Shopping List

Instructional Planning

1. Curriculum mapping
2. Writing instructional objectives
3. Developing learning centers
4. Preparing instructional materials
5. Use of audio/visuals

Classroom Management

6. Setting up learner contracts
7. Assertive discipline
8. Glasser's Discipline Model
9. Microcomputers for management
10. Motivating students

Classroom Instruction

11. Oral language development
12. Reading in the content areas
13. Challenges for Gifted/Talented Students
14. Spanish writing/language skills
15. Integrating career activities
16. Using art, drama, and music in classroom
17. Consumer mathematics education
18. Using the computer in the classrooms
19. Newspapers in education
20. Test taking skills for students
21. Decision making and problem solving
22. Composition skills and ideas

Student Evaluation

23. Use of learner objectives
24. Short answer test construction
25. Essay test construction
26. Intepreting and using test results
27. Administering standard tests
28. Monitoring student progress
29. Use of microcomputers in evaluation

Community Oriented Projects

30. Back to basics program
31. Parental involvement
32. Handicapped education
33. TABS
34. Achievement test scores
35. Crime and drug education
36. Adult education

Campus and District Projects

37. Teacher evaluation
38. Textbook selection
39. Curriculum guides
40. Team teaching
41. In-house suspension
42. Use of library
43. Accreditation
44. Teacher improvement
45. District guidelines for special programs

Federal Programs

46. Special education
47. Title I Regular
48. Migrant
49. Mainstreaming
50. Bilingual
51. Compensatory education
52. Nutrition education

Region 20 Programs

53. Higher level reading
54. Citizenship
55. Career education
56. Basic skills
57. Champ
58. Orbit
59. Professional Development Centers
60. Handicapped
61. Metrics

Broad Interest Subjects

62. Calligraphy
63. Stress management
64. NDN Network
65. Survival skills
66. Computer Assisted Instruction
67. Beautification Projects

Appendix B

DIAGNOSIS FOR READING COMPONENT +3	+2	+1
Determines instructional reading levels of each student using IRI and diagnoses specific reading skills deficiencies. Develops individual educational plans for each student.	Conducts diagnosis using IRI and generally uses the information in preparing reading activities.	Diagnoses reading needs of students but makes little or no use of results.
ACTIVITY SELECTION FOR STUDENT NEEDS +3	+2	+1
Provides instruction and exercises directed toward alleviating those deficiencies, and prescribes follow-up exercises and practice which allow for individual learning styles, motivation, and stage of maturation.	Provides instruction directed toward alleviating student deficiencies.	Provides reading instruction to students with no particular regard to individual deficiencies.
TRAINING TO ACHIEVE OBJECTIVES +3	+2	+1
Directs all training toward specific reading objectives as outlined in the districts' program proposal approved by TEA.	Directs training to achieve objectives established by the teacher.	Directs training without knowledge of specific objectives.
SKILL MONITORING AND RETEACHING +3	+2	+1
Acquisition of skills is monitored on a systematic and regular basis. Reteaching of skills not mastered is done as needed. Records are maintained.	Student progress is noted and remedial reading is given as necessary.	Student progress is observed by the teacher.
COORDINATION BETWEEN FOUNDATION AND MIGRANT TEACHERS +3	+2	+1
The classroom teacher is knowledgeable about the child's reading level, skills needs, and has a process for keeping up with his progress. The teacher understands that teaching migrant children is a "joint" effort and good communication is maintained to ensure a common	The classroom teacher knows the child's general reading ability and provides some help and instruction to improve his skills.	The classroom teacher relies upon the migrant teacher to monitor and develop the child's reading skills.