

# The Systematic Monitoring Process for Learning

*The Berea, Ohio, schools are using a systematic change model to assess implementation of new programs before measuring student achievement.*



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Important reforms in schooling practices have rarely been realized in the actual work of teachers and pupils. Several scholars have argued for more comprehensive evaluations of reform programs, taking into account what actually happens in classrooms. Conceptual models progressively developed by Carroll (1973), Bloom (1973), Harnischfeger and Wiley (1975), and Romberg and others (1980) have been refined to provide a basis for studying classroom instruction and learning.

The Systematic Monitoring Process for Learning (SMPL) adds a new feature: commitment of the staff of a school district over a long period to consider, develop, and put into practice a self-monitoring scheme.

**The SMPL Strategy**

Educators have traditionally relied on assessing pupil performance to evaluate the introduction of a new curriculum or program. SMPL does this too, but it also monitors changes in teacher and student activities occurring *between* the introduction of a new program and the final evaluation of student achievement.

The SMPL model attempts to answer three basic questions: What

changes are planned? What *really* changed? What are the outcomes of those changes? To obtain this information, more specific questions must be answered:

- Did the staff understand and internalize the philosophy or rationale of the new program?
- Was the new content emphasized?
- Were the new skills taught?
- Were the new priorities and sequences a basic part of teacher planning?
- Were the appropriate techniques or strategies of the new program used with students? Did they replace less effective activities?
- Was sufficient time provided to develop the skills, concepts, and content?
- Did teachers use the new resources?
- Were students engaged in classroom roles correlated with available research on effective classrooms?
- Was the new view of student learning and progress implemented into classroom procedures?
- Were students involved in the manner anticipated by the new program?

**The Berea Experience**

In 1976 the Berea, Ohio, board of education and superintendent made a commitment to use SMPL as part of a K-12 curriculum review process. The purpose was to develop a comprehensive scope and sequence of skills and content for mathematics, language arts, science, and other subjects, and to implement them over a five-year period.

This process involved national consultants, workshops and seminars, reviews of current research, and adoption of the programs by the board of education. Priority skills were identified for each grade level. In addition, each redesigned curriculum review area included plans for staff development and other implementation procedures, plus specific goal-setting by every staff member. Thus, the *use* of these new programs became the focal point for applying the SMPL strategy.

The Systematic Monitoring Process for Learning calls for administrators and staff members to gather, summarize, and analyze information concerning four basic questions (Figure 1):

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**Figure 1. The Systematic Monitoring Process for Learning (SMPL) Design Overview.**

I. What related background information is available?	II. How are the programs being used?		III. What data describe student learning in classroom?	IV. How well have students achieved?
Related Background Information	Teacher Actions		Pupil Actions	Pupil Outcomes
	Preliminary	Direct		
1. Pupil Characteristics 2. Teacher Characteristics 3. Social Environment	1. Planning <ul style="list-style-type: none"> <li>• Daily</li> <li>• Long-Range</li> </ul> 2. Knowledge of Program	3. Student Role in Learning <ul style="list-style-type: none"> <li>• Structuring</li> <li>• Feedback</li> <li>• Individualization (Diagnostic-Prescriptive)</li> <li>• Motivation</li> <li>• Peer Relations</li> </ul>	1. Allocated Time 2. Engaged Time 3. Quality Instruction	1. Student Achievements/ Knowledge/Skills 2. Student Attitude
Research: Effective Schools and Classrooms				
What changes and future goals are needed?				

1. What related background information is available?
2. How are the programs being used?
3. What data describe student learning in the classroom?
4. How well have students achieved?

The first issue addressed by SMPL deals with acquiring and studying information about students, staff, and community background. Describing the context of a program change and identifying factors that facilitate or restrain it can stimulate self-analysis, identification of priorities, and reflection.

Answering the second question—How are programs being used?—involves collecting data about teacher planning and student roles in learn-

• *Peer relations.* Students cooperate in helping each other learn.

In gathering data to describe classroom learning, we must look at how much time is allocated for teaching the program. More important, how much time do students spend actually engaged in learning a particular skill, concept, or content area? The quality and appropriateness of teaching activities are also monitored. Which activities are basic to the new program? Which activities best develop a skill or teach a concept? Which activities did not work?

In Berea, the sources of data used to answer questions about time and quality of instruction included classroom observations, work samples, lesson plans, teacher logs or diaries, faculty discussions, grade level and

procedures, goals, and actions, using the data gathered through SMPL.

Second, a detailed examination of planning has resulted in a totally new assessment of teacher lesson plans. The quality of lesson plans has improved.

Third, time is now more carefully considered and used. Not only has allocated time been documented, but teachers and principals are more aware of engaged time. They view the use of time as a critical element in learning.

Fourth, SMPL has changed staff documentation of the implementation of new programs. Every teacher has set goals in reading, mathematics, written communication, and social studies, and provided a status summary of these goals.

Fifth, the use of SMPL has changed the principal's role to that of instructional leader and evaluator. Classroom observations have increased, and principals regularly discuss curriculum and school goals with teachers.

Sixth, SMPL has placed curriculum and instruction in the spotlight. Our data show that the new programs are indeed being used and are the basis for teacher planning.

SMPL has helped us say *what* we want to do, *how* we're going to do it, and *when* we've done it. ■



ing. Student achievement does not change unless teachers understand the rationale and philosophy of a new program and reflect specific aspects of the program in their lesson planning and classroom activities. There are five aspects of classroom interaction that research shows make a difference in learning:

- *Structuring.* The teacher informs students of the purpose of the lesson.
- *Feedback.* The teacher communicates to students their successes, strengths, or needs.
- *Individualization.* The teacher provides specific and varied resources and activities to meet student needs.
- *Motivation.* Students are motivated and want to learn because they are treated and respected as individuals; school is a positive and responsive environment where success can be achieved.

department sharing sessions, regular status report forms, and individual teacher-principal conferences.

The fourth issue—extent of student achievement—can be determined only after the system has verified that a new program has actually been implemented. The Berea schools were involved with questions one and two during 1978 and question three during 1980-81. A premature leap to measuring student achievement without first documenting instructionally significant changes would no doubt have produced little evidence of improvement.

### Results

The Systematic Monitoring Process for Learning has helped improve the educational process in Berea in six ways. First, principals, staff, and program supervisors are continuously studying their implementation plans,

### References

- Bloom, B. "Time and Learning." Thorndike Address, 81st Annual Convention of the American Psychological Association, Montreal, 1973.
- Carroll, J. "A Model for Learning." *Teachers College Record* 64 (November 1973): 723-33.
- Fisher, C.; Berliner, D.; Filby, N.; Marliave, R.; Cahen, L.; Dishaw, M.; and Moore, J. *Teaching and Learning in Elementary Schools: A Summary of the Beginning Teacher Evaluation Study*. San Francisco: Far West Laboratory for Educational Research and Development, 1978.
- Harnischfeger, A., and Wiley, D. *Teaching-Learning Processes in Elementary Schools: A Synoptic View*. Studies of Educative Processes, report no. 9. Chicago: University of Chicago, February 1975.
- Romberg, T. A.; Small, M.; and Carnahan, R. *Research on Teaching from a Curricular Perspective*, theoretical paper no. 81. Madison: Wisconsin Research and Development Center for Individualized Schooling, 1980.

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