The Oregon Legislature and Teacher Standards and Practices Commission has developed standards for future teachers requiring demonstration of the ability to plan, teach, and assess pupil learning in a classroom setting. The work sample consists of a series of related lessons drawn from the school curriculum where the preservice teachers are teaching. Each work sample contains: goals for a study unit; instructional plans for each lesson; information about students' knowledge and skills prior to instruction; data on learning gains resulting from instruction; interpretation and explanation of learning gains or lack thereof; and description of uses to be made of the findings on learning gains in planning further instruction and in reporting pupil progress. In contrast to developing a traditional lesson plan or unit for a hypothetical class, the work sample requires the preservice teacher to prepare and teach a unit to a specific group of students while modifying the program to meet the needs of these students. Student teachers, cooperating teachers, school administrators, and teacher educators have appreciated the value of the work sample process although all have been concerned with the amount of time required to prepare the work sample. The Teacher Standards and Practices Commission now requires two work samples prior to initial licensure. (LH)
AUTHENTIC LEARNING/AUTHENTIC ASSESSMENT:
LET'S BEGIN WITH TOMORROW'S TEACHERS

Nancy G. Nagel
Lewis & Clark College
Teacher Education, Box 14
Portland, OR 97219
Phone: (503) 768-7775
Fax: (503) 768-7715

1993
AUTHENTIC LEARNING/AUTHENTIC ASSESSMENT:  
LET'S BEGIN WITH TOMORROW'S TEACHERS

The primary intent of every teacher certification or licensure system is to protect the public from incompetent teachers (Vorwerk and Gorth 1986). Is this the sole purpose of professional licensure or do we want our potential teachers to have expertise beyond the minimal standards typically established for licensure purposes? How do we determine if future teachers are prepared to teach prior to entering the teaching profession? These questions posed important considerations for professional agencies and committees in Oregon in their revision of teacher licensure standards and development of assessment criteria for potential teacher candidates. Following is a description of the authentic learning process and authentic assessment procedure created by the requirement of work samples prior to initial licensure.

IMPACT OF NATIONAL REFORM EFFORTS

Educational reform reports (Carnegie 1986, Holmes Group 1986, Nation At Risk 1983) exerted pressures on many states to review licensure policies. The review of these policies resulted in varied changes in certification and licensure across the nation (Pipho 1986). Some states, such as Texas, scrutinized college programs and mandated a maximum number of hours that could be completed in education course work. Other states required that teachers hold a master's degree prior to initial certification or within the first few years of teaching. One outcome of the review process was that states clearly became more active in legislating standards and exercising "control over the process of preparing teachers" (Roth & Pipho 1990).

Presently, most states rely upon a program approval process conducted with each university or college. Successful program approval leads to initial licensure for students following completion of an approved program. Program approval is generally focused on the content of college or university course work that compose teacher education programs. A
grave weakness found in traditional program approval is the reliance on prescribed courses, grade point averages, and test scores as demonstration of "mastery" of basic skills or content to be taught (Schalock 1990). Most of these skills are assessed within the college setting and do not provide authentic assessment of classroom practice.

As the discontent with current practice in teacher education increased and the states' role in licensure became more active, professional organizations and agencies in Oregon searched for solutions to address the issues of authentic assessment and the important connection between teacher education and licensure. Following an extensive review of teacher licensure requirements and practices, the Oregon Legislature and Oregon's Teacher Standards and Practices Commission (1988) developed standards which extend beyond completion of prescribed course work and require the preservice teacher to demonstrate the ability to plan, teach, and assess pupil learning within the context of the classroom setting.

THE WORK SAMPLE AND AUTHENTIC LEARNING AND ASSESSMENT

Work Sample Description

The new licensure standards in Oregon employ a work sample model that focuses attention on the preservice teacher's ability to apply knowledge and skills acquired through approved teacher education programs and to produce learning gains with pupils (Myton, Nagel, Osterman 1991). The work sample consists of a series of related lessons, of two to five weeks duration, drawn from the school curriculum where the preservice teacher is student teaching. A major distinction of the work sample is the requirement of assessing and analyzing pupil learning. Therefore, if the preservice teacher is to analyze pupil learning following their teaching, the work sample requires lesson planning, actual teaching over a period of several weeks, along with evaluation of pupil learning. Each work sample contains the following components:

- Goals for a unit of study;
- Instructional plans for each lesson;
- Information on pupils' knowledge and skills prior to instruction;
- Data on learning gains resulting from instruction;
- Interpretation and explanation of learning gains or lack thereof; and
Description of uses to be made of the findings on learning gains in planning further instruction and in reporting pupil progress.

Work sample topics are selected by the preservice teacher, in conjunction with the cooperating teacher, and represent curriculum that is taught during the student teaching experience. Examples of topics vary according to grade level and subject matter, but included titles such as "Settlers and Pioneers in the 1800's", "Measurement All Around Us", and "Traveling to the Moon" at the elementary school level. Work sample topics at the secondary school level included "Rational Exponents and Logarithms", "Les Impressionists", "Multicolor Linoleum Block Printing", and "Confucianism and Taoism". Each work sample incorporates a variety of learning activities and resources, and integrates curriculum content where appropriate. Both the cooperating teacher and college supervisor evaluate the work sample. Evaluation is based on the construction and planning of the work sample and on the actual teaching and learning with the students.

Differences Between a Traditional Unit and the Work Sample

Typically, most teacher education programs include training in developing objectives, selecting instructional materials and media, estimating time for instruction, and planning for evaluation of learning. The critical discrepancy between preparing a traditional unit of study and the work sample is the emphasis on pre- and post-teaching assessment data, interpretation of learning gains, and use of data on learning gains. Thus, the work sample forces the goal of student teaching to shift from imitating an effective teacher to demonstrating that one is an effective teacher and that pupils made learning gains following instruction. In order for preservice teachers to be successful with the work sample, they must be able to plan, teach, and assess pupil learning within the real life setting of the classroom. Therefore, the preservice teacher becomes immersed in authentic learning while also preparing authentic assessment materials (i.e., work samples) which are used to evaluate their teaching expertise.

Authentic Learning and the Work Sample

In authentic learning and assessment, "the student not only completes or demonstrates the desired behavior, but also does it in a real-life context" (Meyer, 1992). With the implementation of the work
sample requirement, preservice teachers now develop documentation of their teaching ability throughout the student teaching experience. Student teaching in itself is not novel, yet the requirement of demonstrating successful planning, teaching, and analysis of pupil learning creates an assessment component that lends objectivity to evaluation of the student teaching experience.

In contrast to developing a traditional lesson plan or unit for a hypothetical class, the work sample requires the preservice teacher to prepare and teach a unit to a specific group of students, while monitoring and modifying teaching to meet the learning needs of these students. Preservice teachers meet frequently with their cooperating teacher and college supervisor to discuss planning ideas before teaching the unit. The preservice teacher also develops and conducts the pre-assessment of pupils prior to teaching the unit. During the teaching period (two-five weeks for each work sample), the preservice teacher continues to meet with the cooperating teacher and college supervisor to gain input on teaching and share feedback. At the end of the unit, a post-assessment is administered, and the preservice teacher analyzes learning gains and prepares feedback to the students about their learning. The preservice teacher also analyzes pupil learning gains while reflecting on the unit as a self-assessment activity. Each of these activities is integral to the work sample and is conducted within the real-life setting of the classroom.

**Authentic Assessment and The Work Sample**

In authentic assessment, the "locus of control rests with the student" (Meyer 1992). With the work sample, preservice teachers develop the topic, activities, materials, and assessment procedures. Each preservice teacher selects their own best ideas for the work sample, enabling the preservice teacher to plan for the type of learning activities and teaching to occur in the classroom. The work sample allows preservice teachers to demonstrate their personal planning and teaching abilities and to construct a relevant experience within the classroom structure.

Traditionally, student teaching is evaluated by a college supervisor, who makes several observation visits to the school. Based on the teaching observed during these visits and input from the cooperating teacher, the college supervisor then determines if the student teacher has met the
program standards. Basing a recommendation for initial licensure on a few, brief observations may not yield reliable or valid evaluation measures. Through the work sample and authentic learning model, we are able to obtain a larger and richer picture of the preservice teacher's ability to effect learning in the classroom. The work sample reveals planning, teaching, and assessment of learning over a period of time and presents a compilation or portfolio of the preservice teacher's work.

PROFESSIONAL FEEDBACK ABOUT WORK SAMPLES

Feedback provided by preservice teachers indicated that work samples required a tremendous amount of time and effort, yet "pushed" them to think about developing and utilizing a repertoire of assessment procedures not typically found in most classrooms. Preservice teachers also stated that the work sample "forced me to learn about a bigger picture of teaching and helped me move away from the day to day activity type of planning and teaching." The learning experience that resulted from the development, teaching, and assessment of a work sample was considered meaningful and relevant by preservice teachers. In addition, many of the preservice teachers reported that they presented completed work samples during interviews for teaching positions.

Cooperating teachers assume an active role in the development, implementation, and evaluation of the work sample. The role includes frequent discussions with preservice teachers about selection of appropriate topics, developing lessons, selecting and utilizing assessment procedures, and interpretation of learning gains. The teacher education faculty from the colleges present seminars on development and implementation of work samples for cooperating teachers.

Cooperating teachers commented about the work sample's impact on the planning process and with evaluation of learning. The preservice teachers frequently discussed long-range learning goals and plans for linking these learning goals with assessment of student learning. Cooperating teachers noted that preservice teachers expended time and attention to these important topics throughout the student teaching experience.
While cooperating teachers were generally supportive of the work sample model, there was some concern expressed about the amount of time required to prepare a work sample. This feedback informed us that the teacher education faculty and the cooperating teachers need to work together to further develop and refine the work sample format. One step we have taken in this direction is to design a work sample program (available on computer disk) to reduce the amount of time the preservice teachers spend in developing and typing the format.

School administrators reported that they were impressed with the planning component of the work sample, as they were better able to make evaluative decisions about preservice teachers' expertise by examining their work samples. Another comment made by administrators related to authentic assessment of the preservice teacher's student teaching. Administrators felt that input from the schools in the evaluation of the student teaching (along with evaluation by the university supervisor) was a critical component in the initial licensure procedure. Drawing an evaluation from observations of teaching and the written work sample that documented the teaching enabled evaluators to make decisions based on actual teaching performance and pupil learning attributed to this teaching.

Teacher educators were enthusiastic about the work sample and the heightened awareness of the integral connection between teaching and student learning. Requiring authentic assessment of preservice teachers through the work sample enables teacher educators to model assessment techniques that these future teachers are expected to utilize in their classrooms. As the role of assessment and evaluation of learning increases in education, educators are expected to improve accountability and demonstrate that students are learning. Completion of a work sample allows preservice teachers to document their ability to assess student learning.

The Teacher Standards and Practices Commission (the agency charged with administering teacher licensure in Oregon) now requires the completion of two work samples prior to initial licensure. During the past two years, workshops were conducted to explain the work sample and the use of the work sample to cooperating teachers, administrators, and teacher educators around the state of Oregon. These sessions were well
attended and provided a forum for discussion of the work sample as an indicator or measure of teacher effectiveness. The commission has noted continued improvement in the quality of work samples, along with an increase in the understanding of the work sample model.

**IMPLICATIONS FOR EDUCATORS**

Work samples prompted three significant changes in the preparation of teachers. First, through development and implementation of work samples, preservice teachers are expected to go beyond mastery of subject matter knowledge or teaching skills. Through work samples they must demonstrate their ability to promote pupil learning. Work samples provide authentic assessment of the preservice teacher's ability to promote learning in the classroom. Second, work samples change the focus of traditional program approval from relying on completion of specific courses, grade-point average, and test scores (Schalock, 1990). We can now rely upon an authentic sample of the preservice teacher's work with students. Third, work samples provide a means to assess preservice teachers' ability to apply knowledge and skills in a "real" teaching setting. Authentic assessment must occur within the "real" environment or setting. For preservice teachers, the "real" setting is the school classroom, which is the focus of the work sample.

If we expect change in our assessment procedures in the schools, we must model changes in our teacher education programs. Moving to inclusion of authentic assessment requires viewing performance assessed in a context similar to "real life" (Meyer, 1992). The move to authentic learning and assessment enables the preservice teacher to develop and teach a unit based on learning needs of a specific group of students. The preservice teacher, mentor teacher, and college supervisor collaborate and discuss the work sample throughout the planning, teaching, and assessment process. Therefore, the work sample becomes a relevant learning activity, one that is conducted in a real classroom setting, with real students and provides authentic assessment of the preservice teacher's ability to plan, teach, and assess learning.

Work samples provide a meaningful tool for us to use in assessing the knowledge and skills of prospective teachers. Documentation of the prospective teacher's ability to foster pupil learning has enabled us to
shift the focus in initial teacher licensure from a prescribed list of courses and test scores to one that requires actual demonstration of success in teaching and learning.
REFERENCES


I. DOCUMENT IDENTIFICATION:

<table>
<thead>
<tr>
<th>Title: Authentic Learning/ Authentic Assessment: Let's Begin With Tomorrow's Teachers</th>
</tr>
</thead>
<tbody>
<tr>
<td>Author(s): Nancy J. Nagel</td>
</tr>
<tr>
<td>Corporate Source:</td>
</tr>
<tr>
<td>Publication Date:</td>
</tr>
<tr>
<td>1993</td>
</tr>
</tbody>
</table>

II. REPRODUCTION RELEASE:

In order to disseminate as widely as possible timely and significant materials of interest to the educational community, documents announced in the monthly abstract journal of the ERIC system, Resources in Education (RIE), are usually made available to users in microfiche, reproduced paper copy, and electronic/optical media, and sold through the ERIC Document Reproduction Service (EDRS) or other ERIC vendors. Credit is given to the source of each document, and, if reproduction release is granted, one of the following notices is affixed to the document.

If permission is granted to reproduce and disseminate the identified document, please CHECK ONE of the following two options and sign at the bottom of the page.

For Level 1 Release:

- Permitting reproduction in microfiche (4" x 6" film) or other ERIC archival media (e.g., electronic or optical) and paper copy.

The sample sticker shown below will be affixed to all Level 1 documents

**PERMISSION TO REPRODUCE AND DISSEMINATE THIS MATERIAL HAS BEEN GRANTED BY**

<table>
<thead>
<tr>
<th>Sample</th>
</tr>
</thead>
<tbody>
<tr>
<td>TO THE EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC)</td>
</tr>
</tbody>
</table>

Level 1

For Level 2 Release:

- Permitting reproduction in microfiche (4" x 6" film) or other ERIC archival media (e.g., electronic or optical), but not in paper copy.

The sample sticker shown below will be affixed to all Level 2 documents

**PERMISSION TO REPRODUCE AND DISSEMINATE THIS MATERIAL IN OTHER THAN PAPER COPY HAS BEEN GRANTED BY**

<table>
<thead>
<tr>
<th>Sample</th>
</tr>
</thead>
<tbody>
<tr>
<td>TO THE EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC)</td>
</tr>
</tbody>
</table>

Level 2

Documents will be processed as indicated provided reproduction quality permits. If permission to reproduce is granted, but neither box is checked, documents will be processed at Level 1.

* "I hereby grant to the Educational Resources Information Center (ERIC) nonexclusive permission to reproduce and disseminate this document as indicated above. Reproduction from the ERIC microfiche or electronic/optical media by persons other than ERIC employees and its system contractors requires permission from the copyright holder. Exception is made for non-profit reproduction by libraries and other service agencies to satisfy information needs of educators in response to discrete inquiries."*

<table>
<thead>
<tr>
<th>Signature: Nancy J. Nagel</th>
<th>Printed Name/Position/Title: Nancy J. Nagel, Associate Professor of ED</th>
</tr>
</thead>
<tbody>
<tr>
<td>Organization/Address:</td>
<td>Telephone: 503-768-7775, FAX: (503) 768-7715</td>
</tr>
<tr>
<td>Lewis &amp; Clark College</td>
<td>E-Mail Address: <a href="mailto:nagel@clark.edu">nagel@clark.edu</a>, Date: 4-3-97</td>
</tr>
<tr>
<td>0615 SW Palantine Hill Rd</td>
<td>Portland, OR 97219</td>
</tr>
</tbody>
</table>
III. DOCUMENT AVAILABILITY INFORMATION (FROM NON-ERIC SOURCE):

If permission to reproduce is not granted to ERIC, or, if you wish ERIC to cite the availability of the document from another source, please provide the following information regarding the availability of the document. (ERIC will not announce a document unless it is publicly available, and a dependable source can be specified. Contributors should also be aware that ERIC selection criteria are significantly more stringent for documents that cannot be made available through EDRS.)

Publisher/Distributor:

Address:

Price:

IV. REFERRAL OF ERIC TO COPYRIGHT/REPRODUCTION RIGHTS HOLDER:

If the right to grant reproduction release is held by someone other than the addressee, please provide the appropriate name and address:

Name:

Address:

V. WHERE TO SEND THIS FORM:

Send this form to the following ERIC Clearinghouse:

THE ERIC CLEARINGHOUSE ON TEACHING AND TEACHER EDUCATION
ONE DUPONT CIRCLE, SUITE 610
WASHINGTON, DC 20036-1188
(202) 293-2450

However, if solicited by the ERIC Facility, or if making an unsolicited contribution to ERIC, return this form (and the document being contributed) to:

ERIC Processing and Reference Facility
1100 West Street, 2d Floor
Laurel, Maryland 20707-3598

Telephone: 301-497-4080
Toll Free: 800-799-3742
FAX: 301-953-0263
e-mail: ericfac@inet.ed.gov
WWW: http://ericfac.piccard.csc.com

6/96