Informal inventories emphasize observing a child's behavior and performance in order to draw inferences about factors affecting his achievement in all areas. Suggestions are given for some uses of informal inventories, teacher-designed measures, and adaptations of such tests as the Minnesota Rate of Manipulation Test and the Gray's Oral Reading Paragraphs. Some ways to improve reliability and validity are suggested. A few techniques for identifying and interpreting behavior are given. A case study illustrating the use of boy's comments during informal reading testing is reported. References are included. (CM)
MAKING THE MOST OF INFORMAL INVENTORIES

Session: Evaluation: Informal Inventories
3:00-4:00 p.m., Thursday, April 25, 1968

The classroom teacher needs "on the spot" and practical means of studying the child. Informal inventories can provide the teacher with the opportunity to observe the individual so as to determine not only his reading needs but why they have developed. This paper suggests that many areas other than reading can
be investigated by the observation of the child as he performs various kinds of informal inventories. The use of observations rather than testing procedures will be emphasized. Objectivity, validity, and reliability of the inventories themselves are not of primary concern.

What Are Informal Inventories?
An informal inventory is a tentative and unconventional means of determining certain abilities and skills and of providing clues as to why they exist. These informal approaches can serve as a means of appraising interests, persistence, ability to concentrate, and attitudes toward reading. They can provide for the perceptive examiner information concerning the student's breadth and depth of mental content and his ability to express ideas orally. They can provide cues which can suggest such physical handicaps as defective vision and hearing. Furthermore, they can provide in the field of reading knowledge of specific needs in such areas as word recognition, skill in locating information, identification and interpretation of main ideas and supporting details, and the ability to answer why and how questions.
Informal reading inventories may be designed and constructed by the teacher. Some clinicians have utilized the Gray's Oral Reading Paragraphs and have constructed five questions for each paragraph. Care has been taken to have four questions which require recall of factual material and one question which is inferential in nature and involves how or why responses. Some teachers construct inventories from basal readers while others use informal reading inventories prepared by publishers. Inventories can be used to determine the child's independent reading level, instructional level, frustration level, as well as his capacity level. They can be used to study the child's method of attacking unknown words and of approaching a reading selection. They provide an excellent opportunity for the teacher to observe the child's reactions to both oral and silent reading. Informal reading inventories can be developed for other purposes. For example, they can be used to appraise the student's ability to recognize an author's intent, mood, and purpose. They can be designed to investigate an individual's ability to read for a purpose, to draw inferences and conclusions, to define key words,
to follow directions, and to appreciate literary style. They can also be used to determine a student's ability to read in the various content fields. Teachers who are unfamiliar with the construction and use of these informal measures can receive valuable instruction from the book on informal reading inventories by Johnson and Kress. (3)

Informal inventories can be utilized in areas other than reading. Motor coordination can be investigated, and an appraisal can be made of associative skills such as visual-visual association and visual-auditory association. The informational background and mental content of the individual can be studied. Appraisals can be made of attitudes, interests, personality, and both mental and emotional maturity. The informal use of psychological tests can be used for this purpose. For example, the child's responses on the Healy Pictorial Test or on a series of pictures which are to be arranged in sequence permit the examiner to discover how well the child can identify, interpret, and evaluate situations portrayed in pictures which do not involve language. Furthermore, one can observe his ability to set up a
Dorothy J. McGinnis

goal and to persist in its realization and the carefulness with which he works. The child's motor coordination and ability to follow directions may be observed as he performs on such placing and turning instruments as the Minnesota Rate of Manipulation Test. His associative skills may be appraised as one uses the visual-visual and visual-auditory association cards prepared by Gates. (2) Background and experiential factors as well as motor skill may be observed as the individual draws a house, tree, and person. On these inventories the examinee draws and portrays that which he understands and feels. The child's explanation of his pictures can tell much about his background, life in his home and in his neighborhood, as well as his attitudes toward himself and others. The use of incomplete sentences which have been carefully designed for the specific occasion can provide cues and hunches as to the child's personality, attitudes, and interests. In the use of these instruments and materials, no attempt is made to administer and score them under standardized conditions. The emphasis is placed upon observations and not upon testing procedures. How the child reacts and what he says about his performance
are frequently much more important than actual scores and levels of attainment. In using these devices as informal inventories rapport can be established in a setting which permits escape from the emotional concomitants of a testing situation.

Observation is the key to making the most of all informal inventories for it enables the teacher to capitalize on momentary insight. It provides an opportunity to identify and interpret specific aspects of behavior for the purpose of making inferences about the student, his reading, and the factors affecting his achievement. In all forms of informal inventories, observation is *sine qua non*.

**Mental Content, An Important Factor in Observation**

In the act of observing, the examiner sees with what he has seen. His experiential background provides information, attitudes, and points of view for the identification, interpretation, and evaluation of that which is observed. The purpose of any observation is to "read" the observed and to make effective use of the data so acquired. In order to accomplish this objective,
the observer must know not only what to look for but its significance as well. He must be well acquainted with his field of specialization and be able to determine what acts and behavior observed are relevant, material, and consequential to the situation under investigation. In the field of reading, for example, some understanding of physiology, pediatrics, ophthalmology, otology, psychology, and education is essential. Furthermore, the observer must be interested in the total personality of the observed and be willing to accept him as he is without disapproval. He must see and hear the observed with the human interest of the parent for his child and at the same time with the objective attitude of the laboratory technician.

Some Difficulties Encountered by Observers

Observations produce facts which become the basis for inferences concerning the student and his needs. Inferences based upon observations may be untrustworthy because of both sampling errors and observer errors. Conditions and situations change from day to day, and consequently the observer must be certain that he has
an adequate sampling of the examinee's total behavior. This can only be accomplished by observing specific behavior on many occasions. This requires time and careful planning. Frequently teachers, observing a child as he is administered an informal inventory, vary greatly in their reports of observed facts. Some over-emphasize some types of responses and fail utterly to report others. Obviously, they find that for which they are looking. Their errors are systematic and not random. In other words, they are biased observers utilizing their preconceived ideas and are considering only that which they believe to be significant. Sampling and observer errors can be negated and made less damaging if the observer will refrain from making fixed inferences and generalizations. Instead, he can set up "hunches" which are tentative and subject to acceptance or rejection when more facts in the total situation are available. The observer must strive for objectivity and find means of minimizing subjective errors.

**Improving the Reliability and Validity of Observation**

The teacher can improve the reliability and validity of observations by learning as much as she can about the
child and his problems from the school history, test results, and reports provided by former teachers so as to identify gaps or inconsistencies in information which require immediate investigation. Such information will suggest what to look for in studying the child. Observations productive of worthwhile facts require flexibility and originality on the part of the observer. Routine followed rigidly with all individuals limits the effectiveness of the observation. Each act and each question should have a purpose uniquely appropriate to the individual being studied. Furthermore, the individual should be observed on many different occasions for his reactions in one situation may not be the same as in another. Consideration must be given to changing physical, psychological, and environmental factors. The observer must be sensitive to subtleties of behavior and aware of internal and external events. Rapport is another essential ingredient. It can be developed by the expression of tolerance and sincerity on the part of the observer and by the creation of a psychological atmosphere that will enable the child to share his attitudes, his points of view, and his feelings. The observer should
be implicit in developing hunches. He can learn to use his "third eye" and his "third ear." On the other hand, he can be explicit and not infer too much. He should adhere to the facts and should restrict his inferences to the simplest possible interpretation. The reliability and validity of observed facts are, to a considerable degree, dependent upon the observer's awareness of his own prejudices, preconceived ideas, and emotional bias.

**Observations Become the Basis of Hunches**

Observations become the basis of hunches regarding the child and the causal factors underlying his achievement in reading. For example, John was referred to a reading clinic in order to determine why he has been unable to read at his expected level. At the time John was nine years and eight months old and was in the fourth grade. An informal reading inventory was administered. His independent, instructional, frustration, and capacity levels were 1, 2, 3, and 5, respectively. It was observed that he made use of contextual clues and that he read word by word. Questions involving who, what, where, and when appeared to be more easily answered than those
involving why and how. When asked to read the material making up the informal reading inventory, John said, "I'll read it if it's easy, but I don't like to read. Reading is hard." Throughout the administration of the Healy Pictorial Test, John asked the examiner for assistance. He frequently commented, "This looks right, but I'm not sure. I don't want to do this wrong. Is this the piece that goes there?" On the Gates Association Cards John replied quickly when he was correct. Otherwise he made no response. John's reactions to several incomplete sentences are recorded below.

<table>
<thead>
<tr>
<th>Stimulus</th>
<th>Response</th>
</tr>
</thead>
<tbody>
<tr>
<td>I like to read</td>
<td>comics, not books.</td>
</tr>
<tr>
<td>I feel bad when</td>
<td>I make a mistake.</td>
</tr>
<tr>
<td>When I have to read</td>
<td>I get afraid.</td>
</tr>
<tr>
<td>I often worry about</td>
<td>being dumb.</td>
</tr>
<tr>
<td>My teacher says</td>
<td>I guess too much.</td>
</tr>
</tbody>
</table>

In discussing his drawings of a house, tree, and person, John said, "This boy lives here. Whenever he makes a mistake, he is tied to the tree and the kids laugh at him. His mother and father want him to be smart and to
get good grades in school. They even want him to go
to college, but he's too dumb. He can't learn. Besides
he hates school and he hates reading. Do you know what
this boy wants to be? He wants to be a dog. Then he
would never have to go to school, and no one would try
to teach him to read."

Observations made during John's performance on
these informal inventories led to the following inferences.

1. John is a boy of average intelligence
   or better.

2. His only effective method of attacking
   unknown words is the use of context
   clues. He needs to learn how to use
   other word attack skills.

3. He is a word reader. He needs to learn
   how to read for the purpose of identifying,
   interpreting, and evaluating concepts.

4. He has strong negative feelings toward
   reading.

5. He lacks confidence in his ability to
   learn to read.
6. He does not put forth effort because of his fear of making mistakes.

7. He has not been challenged to think in terms of why and how stimuli.

The clinician must now determine which of these inferences are relevant or related to the immediate problem, which are material or essential to an explanation of the child's difficulty, and which are consequential and lead directly to his disability. This can be accomplished as he follows through the act of diagnosis.

Summary

The use of informal inventories can be extended to areas other than reading. Observations made during the administration of these inventories produce facts which form the basis of hunches regarding the child's reading disabilities and why they have developed. These hunches must be integrated with other data before they can be accepted or rejected. This requires evaluation of each inference so as to determine whether it is relevant, material, or consequential. Each material and consequential inference will become an integral part of the diagnosis.
The combined use of informal inventories and observations can be a valuable addition to the teacher's repertoire of skills in studying the child.
References


