DOCUMENT RESUME

ED 224 267 EC 150 654

AUTHOR Plata, Maximino
TITLE Assessment, Placement, and Programming of Bilingual Exceptional Pupils: A Practical Approach.
INSTITUTION ERIC Clearinghouse on Handicapped and Gifted Children, Reston, Va.
SPONS AGENCY National Inst. of Education (ED), Washington, DC.
PUB DATE 82
CONTRACT 400-81-0031
NOTE 58p.
AVAILABLE FROM The Council for Exceptional Children, Publication Sales, 1920 Association Dr., Reston, VA 22091 (Publication No. 259, $7.00).
PUB TYPE Information Analyses - ERIC Information Analysis Products (071) -- Guides - Non-Classroom Use (055) -- Branch Around (888)

EDRS PRICE MF01/PC03 Plus Postage.
DESCRIPTORS *Bilingual Education Programs; *Disabilities; Elementary Secondary Education; *Evaluation Methods; *Limited English Speaking; *Program Development; *Student Evaluation; Student Placement; Testing

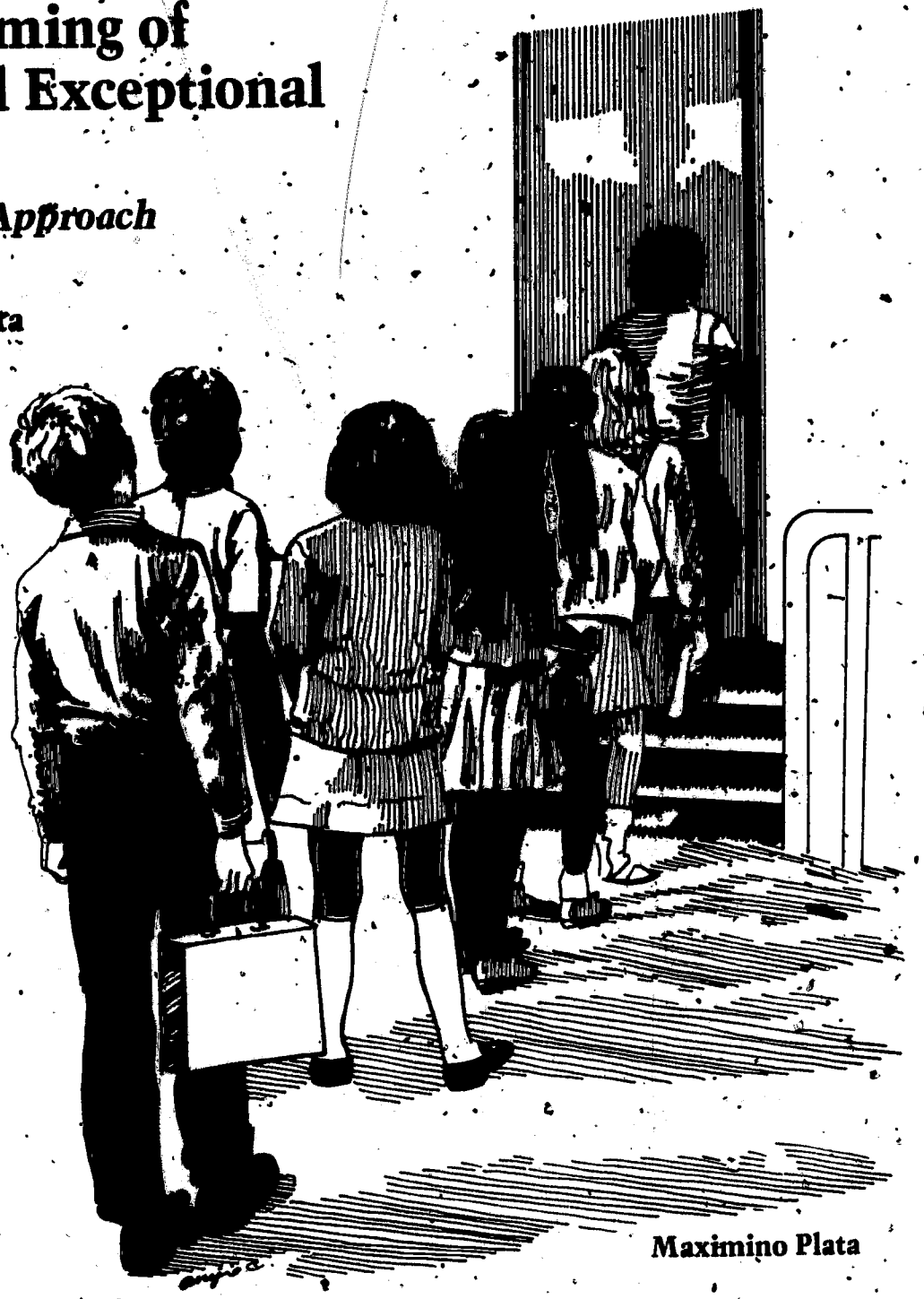
ABSTRACT

The document offers a historical perspective, practical suggestions, and guidelines for assessment, placement, and programming of bilingual handicapped students. Chapter 1 on the scope of the problem looks at student, personnel, and instrument variables affecting assessment of bilingual exceptional students. Among the factors discussed are variability withir and between ethnic groups, teacher attitudes, and test translations. Practical suggestions for assessing bilingual exceptional students are provided in chapter 2. Three levels of assessment are described--the initial level (classroom screening), the intermediate level (diagnostic-prescriptive assessment), and advanced level (comprehensive individual assessment). A proposed model is reviewed which includes procedures for informal language screening; formal language assessment, and comprehensive individual assessment of children with limited English proficiency. Also provided is information on use of informal tests (including checklists and rating scales, informal survey tests, observation, the Cloze Procedure for language assessment, and interviewing). A rating scale is outlined for assessing language proficiency in five domains--rhetoric, register/style, syntax, vocabulary, and pronunciation. The second chapter also contains sections on practical problem-solving techniques, task analysis, criterion-referenced tests, and additional assessment procedures. The final chapter addresses placement alternatives and programing for the bilingual exceptional student. Considered within this chapter are the individualized education program, cooperative vs. competitive instructional arrangements, curriculum content, instruction in the student's native language, and preparation and teaching of a bilingual lesson. A sample profile form of oral language proficiency completes the document. (SW)

Assessment, Placement, and Programming of Bilingual Exceptional Pupils:

A Practical Approach

Maximino Plata



Maximino Plata

A Product of the ERIC Clearinghouse on Handicapped and Gifted Children
The Council for Exceptional Children

Maximino Plata is Associate Professor in the Department of Special Education, East Texas State University, Commerce, Texas.

A publication of the ERIC Clearinghouse on Handicapped and Gifted Children. Publication Date, 1982.

The Council for Exceptional Children, 1920 Association Drive, Reston, Virginia 22091

The material in this publication was prepared pursuant to contract no. 400-81-0031 with the National Institute of Education, U.S. Department of Education. Contractors undertaking such projects under Government sponsorship are encouraged to express freely their judgment in professional and technical matters. Prior to publication, the manuscript was critically reviewed for determination of professional quality. Points of view or opinions, however, do not necessarily represent the official view or opinions of either the clearinghouse's parent organization or the National Institute of Education.

TABLE OF CONTENTS

The Council for Exceptional Children

Founded in 1922, The Council for Exceptional Children (CEC) is a professional association committed to advancing the education of exceptional children and youth, both gifted and handicapped.

CEC, with 50,000 members, supports every child's right to an appropriate education and seeks to influence local, state, and federal legislation relating to handicapped and gifted children. CEC conducts conventions and conferences and maintains an information center with computer search services and an outstanding collection of special education literature.

In addition to its membership periodicals, Exceptional Children, TEACHING Exceptional Children, and Update, CEC has a publications list of 75 titles including monographs, texts, workshop kits, films, and filmstrips.

Council Headquarters are at 1920 Association Drive, Reston, Virginia 22091.

The ERIC Clearinghouse on Handicapped and Gifted Children

The ERIC Clearinghouse on Handicapped and Gifted Children (ERIC-EC) is one of 16 clearinghouses in a national information system funded by the National Institute of Education, U.S. Department of Education. Since 1966, ERIC-EC has been housed with The Council for Exceptional Children.

ERIC-EC collects, abstracts, and indexes special education documents and journals for the central ERIC database as well as for its own computer file and publications. Other activities include computer searches, search reprints, and publications. Address inquiries to the ERIC Clearinghouse at 1920 Association Drive, Reston, Virginia 22091.

CHAPTER 1. HISTORICAL PERSPECTIVE AND SCOPE OF THE PROBLEM

The assessment issue is one of the most influential forces determining the destiny of a large number of linguistically different exceptional pupils. An array of problems has surfaced over the years with regard to assessing language minority pupils who have handicaps. The size of the problem is monumental because its roots comprise a system of interlocking variables.

Central to the problem of assessing ethnic minority pupils is the question of intellectual deficits. Cole and Bruner (1971) say there is little supportive evidence to indicate intellectual deficits in ethnic minority children. Instead, they propose that differences exist. Their argument basically questions whether standardized tests and other traditional assessment methods actually measure the true potential of minority group pupils. However, Cole and Bruner view the problem of assessment of ethnic minority pupils as a challenge in identifying the range of these pupils' capabilities and the extent to which these capabilities are adequate for the individual's functional needs in a particular cultural setting. This challenge is cast within a special framework when middle-class student behavior is used as a yardstick and differences between and among groups are called deficits.

Variables Affecting Assessment of Bilingual Exceptional Pupils

These variables will be discussed under the categories of student, personnel, and instruments. The order of discussion does not connote priority emphasis or importance.

Variability Among Students

Variability Within and Between Ethnic Groups

Variability, per se, is not a problem in assessment. Without variability there would be no science of psychometrics. However, the range in abilities among various ethnic groups has resulted in some confusion and misunderstanding. One misconception is that all individuals within a particular ethnic group have similar attitudes, values, beliefs, language patterns, and degree of language competence.

A study by Laosa (1975) concerning the contextual use of language by children and adults in families of three Hispanic groups in the United States revealed that ethnic groups differ in language patterns used in different social situations or contexts. Other variables that cause additional differences within and between ethnic groups include level of schooling, length of stay in the United States, child-rearing patterns, geographic location, and social-economic status (Gerken, 1978). Sattler (1982) identified values, styles, language, mores, motivation, and attitudes as factors influencing the testing situation. Most cultural factors that affect test responses are

likely to influence the broader behavior domain that the test is designed to sample. In an English-speaking culture, inadequate mastery of English may handicap a child not only on an intelligence test but also in schoolwork, play activities, and other situations of daily life.

One can conclude from the research that linguistic differences in students: (a) are not a hereditary condition; (b) can be altered; (c) can affect performance on tests administered in a different language; and (d) will similarly affect the individual's educational, vocational, and social activities in a culture that uses an unfamiliar language. The degree to which cultural influences are manifested varies along a continuum extending from minor temporary effects to those that are more basic, permanent, and far reaching.

Uncooperative, Alienated, or Poorly Motivated Students

The difficulty in achieving nonbiased assessment of bilingual and ethnic minority populations does not always stem from the examiner or testing instruments. In many instances, students may be uncooperative, poorly motivated, and generally "turned off" to all school-related activities. For these students, it matters little if the examiner is fluent in the native language of the students, is highly skilled in testing techniques, or has numerous degrees and years of educational experience. Students who exhibit antisocial behavior can impede an examiner's ability to acquire a complete and accurate assessment of what a student can or cannot do (Oakland, 1980).

Some ethnic minority group children have been known to be more wary of adults, more desirous of securing adults' attention and praise, less motivated to being correct for the sake of correctness alone, and willing to settle for lower levels of achievement success than are their Anglo peers (Sattler, 1982).

Language Dominance and Language Proficiency

"Any results obtained on verbal intelligence special ability tests administered in English to Spanish-speaking children without taking into account their degree of proficiency in English should be highly suspect" (Sattler, 1982, p. 374). Much is written about language development, language acquisition, and language proficiency, but little is written about the construct of language dominance (Bernal, 1979). Language proficiency may be described as language mastery or linguistic competence in both receptive and expressive language. In short, it is the way language is used and how well it is used. Proficiency is based on an individual's capacity to use the language fluently, appropriately, and correctly. Language dominance can be described as the higher of two language proficiency levels (Bernal, 1979). From this viewpoint, it appears that the best approach to assessing a bilingual handicapped pupil's language dominance is to measure his or her language proficiency.

There are inherent problems with this assumption, however, since there are some students who know how to communicate on an elementary level in their native language but may not be proficient in it. At least they are

not proficient in it as measured by objective assessment strategies. Of course, some bilingual children, like some monolinguals, do have language disorders that affect their language competence even in their dominant language (Bernal, 1979).

Variability Among Assessment Personnel

Teacher Attitude

Saville-Troike (1978) contends that the teacher's attitude is much more important than curriculum content. She believes that teachers are models - what they value and respect is often valued and respected by those entrusted to their care.

On the other hand, "Teachers who want to rid their room of a particular child refuse to try different educational and behavioral strategies, distort information, are uncooperative, and think that the children's environment is so deleterious that nothing they do will be beneficial . . . stand in the way of developing suitable programs" (Oakland, 1980, p. 33).

An attitude shows if a teacher would, for instance, refer a child whose behavior they find disturbing or for whom they have low expectations, such as one who: lives in a mobile home, comes from a lower class home, attends an unconventional church, dresses poorly, comes from a one-parent family, speaks a foreign language, is non-White, or has a foreign last name (Oakland, 1980).

To offset teachers' attitudes and beliefs that the problem lies with the students, Plata (1979) proposes that all who are connected with education, including faculty in teacher preparation programs, should have some knowledge of different cultures.

Inadequately Prepared Personnel

It is not uncommon to find teacher preparation programs lagging behind in providing the necessary training for educating atypical students. While there have been great strides made in specialized areas such as reading, bilingual education, and special education, more regular elementary and secondary programs need to deal with atypical student populations. Diagnostic personnel, counselors, and administrators stand to benefit from an understanding of the basic tenets of individual differences and the impact of culture on language development. Further, they need to be knowledgeable about language acquisition, the influence of teacher methods and materials in the learning process, the persuasion of peers and environment on pupils' behavior and acquisition of knowledge, and the power of litigation and legislation on education. All classroom teachers should be skilled in individualizing instruction, applying informal assessment techniques, interpreting standardized test results, developing lesson plans, creating, and/or adapting instructional materials, using task analysis techniques, developing criterion-referenced assessment instruments, and working with colleagues and parents of differing cultural backgrounds.

Competency, Integrity, and Effect of the Examiner

Oakland (1980) states that "a non-biased assessment program assumes that the examiner has an open mind and investigates both school and home-related factors that may be hampering a child's development" (p. 38). Examiners of any ethnic group must also remain alert to the possible negative effect of their own personal stereotype attitudes toward minority pupils that may interfere with interpersonal relationships or objective judgments. Not only do stereotypic or biased attitudes color test interpretation and recommendations (Sattler, 1982), but Alley and Foster (1978) have proposed additional factors regarding the match of examiner-examinee along ethnic origin line. These researchers believe that providing a minority group examiner for an ethnic minority pupil in order to eliminate assessment bias is simplistic and that several key conditions are thereby overlooked (e.g., the attitude of one person toward another may reflect social class differences to a greater extent than racial or ethnic differences). The examiner may lack empathy or feel that people from atypical backgrounds should improve themselves through hard work just as the examiner did. The ethnic minority examiner cannot reduce or eliminate assessment bias without alternative measures that more appropriately evaluate the pupil's competence. In summary, the examiner must be provided with more than the conventional culturally biased tests.

Providing Translators

Providing interpreters for Anglo examiners does not cause bilingual children to perform significantly better than do children who were assessed entirely in English (Swanson & DeBlassie, 1971). Ultimately, however, using interpreters to try to compromise the effect of the examinee's language on test results is better than no attempt at all.

There are various pitfalls in using a translator in the assessment process. These pitfalls include the following: (a) On-the-spot translation is very difficult, especially when the interpreter does not know the technical language found in test items; (b) Many words lose their meaning in the translation process; (c) The interpreter may not know all the possible terms or dialects applied to a word or concept, especially if the child being tested is from a different geographic region than that of the interpreter; and (d) There may be hostile feelings toward the examiner on the part of an interpreter who feels that he or she is "being used" to "cover up" inadequacies of the examiner or if the interpreter perceives the remuneration to be minimal for doing the work of a highly paid professional. As a consequence, translations during the testing period may be inadequate, incomplete, or erroneous.

Problems Related to Assessment Instruments

Testing of language minority pupils has focused on solving the problem of overrepresentation of these children in special education programs. Assessment data obtained for bilingual handicapped children should never be used

to place these pupils into categories of handicapping conditions without giving recommendations on how to modify curriculum and adjust educational objectives. In short, assessment strategies and instruments have not met the real goal of assessment - to develop individualized educational programming for bilingual pupils who are experiencing difficulty in school.

Test Translations

Complex language idioms, colloquialisms, and words with multiple meanings contribute to a number of problems in test translations. Some of these are as follows:

1. Sometimes only the directions are translated into the student's native language.

2. Frequently, the entire test is translated from English into another language. The examiner then proceeds to administer to the student each test item twice - once in English, and once in the native language. This procedure could produce an invalid practice effect, depending on the student's bilingual ability.

3. On occasion, tests are published in two languages under the pretense of being parallel when, in fact, no empirical verification or equating techniques have been attempted (Bernal, 1979). Some translated, multiple-choice tests are so "parallel" that even the position of the correct answer is unchanged. This is an acute problem since many students are administered both test versions in quick succession. This procedure may also contribute to an invalid practice effect.

4. Some translated versions of a test do not have norms of their own, leaving the impression that English norms are applicable or that English norms are the criteria to which the examinee would be compared.

5. Translations of tests can change the difficulty range or change the response options to an item (Bernal, 1979; Bransford, 1974; Gonzales, 1974; Sattler, 1982). Some simple words in English become rather difficult in another language. For example, the word pet in English translated to domesticado in Spanish is more difficult for the student. Furthermore, many English words have multiple meanings or can be used as different parts of speech, while the same word translated into another language is limited by the context in which it is used. For example, the word stamp may be a verb or noun in English, but if one were to choose among the terms timbre, estampilla, or sellar in Spanish, the usage would be much more limited.

6. A test that measures practical intelligence or common experience for Anglos ("What should you do if you cut your finger?") may only serve to measure the degree of acculturation by ethnic minority pupils to Anglo values and practices.

7. A student's understanding of directions on a test is related to two variables: level of vocabulary or degree of difficulty, and type of vocabulary used. Type of vocabulary relates to the vernacular or dialect used in the community. Most translated tests use formal, classical, pure, textbook-perfect language in order to produce a test with wide appeal. Pupils, under stress in a testing situation, may be hard-pressed to respond to simple questions merely because they lack the technical vocabulary attached to familiar places, things, or situations (Zigler & Butterfield, 1968). In sum, existing translated tests may yield skewed, questionable, and erroneous data that lead to ill-defined goals and misguided directions for instructional and evaluational strategies.

Adding Points

The practice of "adding points" as used in The System of Multicultural Pluralistic Assessment (SOMPA) has received much criticism due mainly to lack of validity and lack of its practical use in assessment situations. In an attempt to compensate for malpractices in assessing culturally different pupils, scores from the sociocultural scales constituting the pluralistic component of the SOMPA are used in a multiple regression equation to adjust the standard WISC-R IQs in order to derive the Estimated Learning Potential (ELP) appropriate to the child's ethnic background.

For many bilingual pupils, scores on standardized tests are low. The SOMPA's estimated learning potential is a procedure of making these low scores compensate for test bias. Ultimately, the procedure of adding points is demeaning to the culturally different student who has been subjected to a testing situation with an invalid instrument. In addition, the estimated learning potential of students derived by the SOMPA does not predict how well the student will do in mainstreamed public school instructional programs. It is designed to predict the extent to which a pupil is likely to benefit from an educational program that takes appropriate account of sociocultural background. Of course, this will be most difficult to do since it is virtually impossible to eliminate the vast differences in life experience of these pupils, including exposure to prejudice and the limited economic and educational opportunities historically afforded them (Kagan & Burial, 1977).

Simple Renorming

Renorming accomplishes what adding points does, but the numbers are determined empirically (Bernal, 1979). This procedure does nothing detrimental to the validity of the test instrument in regard to its use with the renorming population. The language of the test items, directions, administrative procedures, and details are not altered. An advantage of renorming is that it provides descriptive statistics for the renorming population and a new distribution of scores.

Conclusion

Examiners who are to assess ethnic minority pupils (in particular those who are bilingual) should be aware of the numerous factors found to contribute to possible assessment bias. These factors, discussed above, can be readily found in the literature (Anastasi, 1982; McLoughlin & Lewis, 1981; Oakland & Matusek, 1977; Sattler, 1982). Ultimately, it may be the variables among students, assessment personnel, and assessment instruments that make the difference in appropriate assessment, placement, instructional planning, and programming for bilingual exceptional pupils.

CHAPTER 2. PRACTICAL SUGGESTIONS FOR ASSESSING BILINGUAL EXCEPTIONAL PUPILS

The preponderance of assessment measures is a phenomenon of the twentieth century (Wallace & Larsen, 1979). An interest in testing and a corresponding expansion of educational appraisal techniques have been brought about by an increased interest in human behavior and how it can be affected by variables both external and internal to the human organism. In a school setting, psychologists have joined forces with educators in an attempt to discover by which methods and under what conditions students learn most efficiently and most effectively. Individualism has become the rule instead of the exception in assessment as well as in intervention.

Informal versus formal assessment is not the issue. It is not a matter of one type of assessment or the other, but instead, which type is appropriate for the specific question being asked (McLoughlin & Lewis, 1981). From this standpoint, Tucker (1980) suggests that it is very important that the two functions of eligibility and programming be clearly separated and that assessment techniques be used that are appropriate for each of these functions. In making decisions about an individual student, educators need a wide variety of information from various sources. In gathering this information, it may be necessary to use an assortment of testing instruments, testing strategies, and testing techniques. Clearly, decisions about the total assessment process will be guided by the purpose for testing. Karmel (1970) has listed the following as purposes for administering tests in the schools:

- To form classroom groups.
- To provide special study and remedial instruction.
- To evaluate capabilities and accomplishments.
- To foster educational and vocational goals.
- To discover educationally and socially maladjusted children.
- To measure outcomes of instruction.
- To certify pupils' achievements.
- To provide material for research.

While these purposes are beneficial for all pupils, they are imperative for programs that provide educational services to atypical student populations, such as bilingual, handicapped, or bilingual handicapped pupils. Educational assessment practices for these populations should be used for two major purposes: "to identify (and sometimes label for administrative purposes) those children experiencing learning problems who will probably require special education, and to gather additional information that might be helpful in establishing instructional objectives and remedial strategies for those children identified as handicapped learners" (Wallace & Larsen, 1979).

The influx and expansion of special programs serving bilingual exceptional students have forced educators and psychologists to realize that some existing diagnostic procedures are inappropriate. Diagnostic procedures used in the schools have changed focus from classifying various signs and symptoms in medically oriented disability categories to that of gathering information about a pupil in order to establish appropriate teaching strategies. At the present time, assessment practices that do not produce guidelines for instructional objectives as well as methods and materials to be used are considered by many to be a waste of time and resources (Wallace & McLoughlin, 1975). In other words, educational assessment should result in clear and explicit plans for placement and programs of instruction.

Some researchers believe that no single measure taps bilingual pupils' cognitive and intellectual development, even when bilingual pupils are tested in two languages (Mowder, 1980). Much more research is needed before such a posture can be accepted as true. There is considerable evidence showing language to be only one of the critical factors in school achievement and, indeed, in the total learning process.

Anastasi (1982) proposes that perhaps it is not as much a question of a culturally biased assessment instrument as it is a question of being culturally blind. Tests are designed to show what an individual can do at a given point in time. They can neither explain why the examinee performs as she or he does nor tell how the student might have performed differently given a different cultural upbringing.

Levels of Assessment

The complexity of a student's specific learning difficulty usually suggests the number or types of assessment measures being applied. All pupils do not require detailed evaluation involving time-consuming and expensive assessment techniques. Various examples will illustrate this point.

Level 1. Initial Level: Classroom Screening

Under certain conditions, teachers are able to plan appropriate instructional programs based on systematic observation or the appropriate use of informal teacher-made tests.

For pupils who are ethnically and linguistically different and who are suspected of having a handicapping condition, classroom teachers must have as prerequisites: a knowledge of the cultural background of the student; the capability of communicating in the student's native language, when necessary; and information about exceptional children.

During initial screening, the teacher should focus on the pupil's academic progress as well as on interpersonal and interaction capabilities. Such observation or informal assessment should provide a verification of the teacher's suspicion that the pupil is experiencing frustration and/or failure in one or more school-related behaviors. At this level, the classroom

teacher collects data for the purpose of comparing the pupil's achievement and/or social behavior with that of the peer group. Daily school work in the subject areas and the amount, duration, and quality of peer interaction are typical information that may prove useful in the initial level of assessment. Other data that may prove useful are the student's scores on educational performance measures typically administered at the beginning or end of a school year.

The classroom teacher needs to establish, to a reasonable degree, the pupil's language proficiency since the language used in assessment has a tremendous effect on the results.

Level 2. Intermediate Level: Diagnostic-prescriptive Assessment

Wallace and Larsen (1979) describe this level of assessment as one that "involves the administration of specific diagnostic tests intended to further identify and examine suspected areas of difficulty. This level focuses on an analysis of particularly troublesome skills and abilities" (p. 4).

For those students who are culturally and linguistically different and are suspected of having a handicap, classroom teachers must be prepared to administer test instruments in a language other than English and to interpret exhibited behavior from the standpoint of the student's cultural background. At this level of assessment, the classroom teacher must begin to interpret data gathered through observation or through instruments (both formal and informal) on the basis of the student's command of the English language, cultural background, and possible handicapping condition.

Some of the practical techniques that could be applied at this level are task analysis, checklists and rating scales, interviews, and other similar commercial or teacher-made criterion-referenced tests.

Level 3. Advanced Level: Comprehensive Individual Assessment

At this level of assessment, a student who is suspected of having severe learning problems is in need of more detailed assessment. Sometimes, even a mild handicapping condition can go undetected or be difficult to pinpoint without an intensive battery of tests. The primary objective of this thorough level of assessment is to obtain a complete understanding of the student's learning problem by examining and subsequently studying all factors related to the student's specific difficulties (Wallace & Larsen, 1979).

This particular level of assessment has received severe criticisms, mainly because of the misuse of standardized test instruments with language minority pupils. Users of these test instruments must remain cautious when they administer, score, and interpret results obtained from language minority students using norm-referenced tests. Examiners using standardized tests should use every precaution possible when they make available to admission, review and dismissal committees the results obtained through the use of these

tests, for it is these test results and their interpretation that may form the basis for decisions on labeling, placement, and instructional intervention programs. Anastasi (1982) makes it clear that basing decisions on tests alone, especially on one or two tests, is a misuse of tests. In the final analysis, then, decisions should be not be determined by tests but by persons who use test results only as partial indicators and not as definitive pronouncements on the ultimate potential of the student.

Without question, test results obtained at this assessment level must be interpreted on the basis of the student's command of the English language, his or her school history, health status, social-emotional history, and cultural background. Only then can optimal decision making regarding the labeling, placement, and instructional programming of language minority students be approached (Gerry, 1973).

A Proposed Model

Bernal and Tucker (1981) developed a three-phase procedure for the Levels of Assessment discussed above. The three phases specified by Bernal and Tucker include informal language screening, formal language assessment, and comprehensive individual assessment of children with limited English proficiency. Following is an adapted version of Bernal and Tucker's procedures for assessing students of limited English proficiency. The proposed model has been modified to more specifically describe the purpose of each phase and to suggest types of tests to use and personnel to involve at each phase. The criteria for decision making have been closely adhered to but expanded in certain areas where it was felt more specificity was merited.

This proposed model is based on the assumption that language is the most critical factor in the assessment process. Credence is given to this assumption by Galvan and Bordie (1977).

Statements About Language and Language Learning

1. Language is an instrument for communication.
2. Language is an instrument for social identity.
3. Language is an instrument for personal identity.
4. Language is an instrument for making generalizations about the world.
5. Language is an instrument for learning.
6. Language is an instrument for reflecting learning.
7. Language is a prerequisite for reading and writing.
8. Oral language involves decoding (listening) and encoding (speaking). Listening involves processing fewer signals than speaking.

9. Speakers of various dialects can learn to read a common set of written symbols. This is possible only when dialect variations are provided for in the curriculum.

10. A student must have oral control of the language he is to read - at least in initial instruction.

11. Understanding precedes speaking.

12. A child can be instructed in any language (or variety of language) brought to the classroom.

13. The listener and speaker are mutually responsible for communication.

14. Language includes vocabulary, pronunciation, syntax, morphology, semantics, style, register, and rhetoric. (Vocabulary and meaning are not identical.)

15. Oral codes of a language are not necessarily the same as the written code.

16. Varying styles of language are chosen for their appropriateness to a given situation.

17. Rules of linguistic appropriateness vary with social situations (domains), topics, and role relationships. Children must have access to situations in which to learn appropriateness.

18. A child learns whatever language he/she is exposed to, identifies with, and finds most useful. The child must believe he/she will find a language form useful (find immediate need for it).

19. Language is a system rather than a collection of parts.

20. Every school child has internalized a system of language. Any further instruction is an adaptation of that system.

21. Language is creative, and creativity means being able to make mistakes.

22. The purpose of language instruction is not to teach imitation but to help students create their own sentences.

Source: Galvan, M.M., & Bordie, J.G. Accutrak Texas Criterion-Referenced System for Oral Language: A Manual for Administering the Test. San Antonio, Texas: Region 20 Education Service Center, 1977. Reprinted with permission.

Procedures for Assessing Bilingual Handicapped Pupils: A Proposed Model

Informal Language Screening

Purpose: To obtain data on family ethnicity and the language spoken by the student, and by significant others at home. The questionnaire itself does not assess language ability, but it does provide initial information as to the student's language dominance.

Types of tests to use: Home Language Questionnaire

Who may assess: Classroom teacher; psychometricians; counselors; principals; any other professional.

Criteria for decision making:

a. Refer to regular educational screening process if pupil is English dominant.

b. Refer to formal language assessment if pupil comes from a home where a language other than English is spoken, even if student appears to be English monolingual. Refer pupil to formal language assessment if pupil is limited English-speaking ability.

c. Refer pupil to formal assessment when he/she has been referred by teachers and other school personnel for special educational services.

Formal Language Assessment

Purpose: To determine language proficiency as well as academic achievement performance levels.

Types of tests to use: Formal and informal language proficiency tests; standardized school achievement tests in language arts and in mathematics.

Who may assess: Psychometricians; classroom teachers with training in educational assessment.

Criteria for decision making:

a. Refer to regular educational screening or regular class placement: (1) if pupil shows proficiency in English and lack of proficiency in the native language; (2) if pupil shows proficiency in both English and native language.

Comprehensive Individual Assessment: Step 1

Purpose: (1) To verify language proficiency and language dominance in pupils referred from the informal and formal language assessment phases; (2) To gather culturally sensitive behavioral observations; (3) To specify student's suspected disabilities.

Types of tests to use: Language assessment instruments other than those that were used in Formal Language Assessment, e.g., criterion-referenced tests, checklists, rating scales, or task analysis.

Who may assess: Bilingual psychometrician experienced in language proficiency testing and capable of making culturally sensitive observations of behavior.

Criteria for decision making:

a. Refer to regular class placement if student shows English language proficiency and average achievement in English language arts.

b. Refer to bilingual program if student shows native language dominance and proficiency plus low academic achievement scores in the English language arts.

c. Continue with comprehensive individual assessment if student shows English language proficiency but has low scores in English language arts.

d. Determine the language dominance if student shows limited proficiency in both native and English languages. Continue with comprehensive individual assessment in the pupil's dominant language.

e. Use nonverbal testing techniques - such as manipulative devices pointing to the correct answer, shaking head yes or no, etc. - if pupil shows severe limitations in both English and native language proficiency and/or dominance.

Comprehensive Individual Assessment: Step 2

Purpose: (1) To obtain consent from parents or guardians; (2) To select appropriate committee members.

Types of tests to use: None necessary.

Who may assess: No assessment required.

Criteria for decision making:

a. Consent form should be published bilingually. Present orally, if necessary.

b. Use all available resources in the process, including bilingual teachers, community liaisons, and bilingual individuals.

c. Appoint to the placement, review and dismissal committee persons whose expertise or familiarity with the student will allow them to make worthwhile input to the assessment, placement, and intervention processes. This could involve a specialist in language development or in language acquisition, a specialist in the suspected disability, the referring teachers, and a person knowledgeable about the student's culture and family background.

Comprehensive Individual Assessment: Step 3

Purpose: To verify, qualify, or disprove the suspected disability in bilingual pupils.

Types of tests to use: Informal measures such as criterion-referenced tests, task analysis, adaptive behavior indices, interviews, questionnaires, observations, and problem-solving experiments as Piagetian type strategies.

Who may assess: Classroom teachers; therapists; counselors; psychometricians.

Criteria for decision making:

a. Team members must use available data and information to verify the suspected disability or disabilities. If information and data contradict the suspected disability(ies), the student is exempt from further testing and placed into the appropriate regular educational program with or without supportive help.

b. If student cannot be exempted from all further testing, specify the types of the disabilities and proceed with the next step in the comprehensive individual assessment process.

Comprehensive Individual Assessment: Step 4

Purpose: To verify, qualify, or disprove the suspected disability or disabilities in bilingual pupils. Adaptions for the Limited English Proficient (LEP) or the Limited English Speaking Ability (LESA) students may be needed.

Types of tests to use: Standardized tests, even though not totally appropriate (select tests that require minimal verbal interactions; use student's dominant language for administering tests that require verbal instructions; use imitation; use interpreters or any other technique discussed in this document).

Who may assess: Bilingual psychometrician experienced in language proficiency testing and capable of making culturally sensitive observations of behavior.

Criteria for decision making:

a. If student's performance shows no abnormality, the student is not handicapped and should be placed into bilingual education program or the English program according to the student's language dominance. Plan a supportive intervention program using information gathered in Step 3.

b. If student's performance shows some abnormality, the student is mildly handicapped and should be mainstreamed into the bilingual education or English program according to the student's language dominance. The student is eligible for special education provisions and privileges, including the individualized education program (IEP).

c. If the student's performance shows a more severe or profound handicapping condition, all of the special education provisions for placement

and treatment are applicable. The delivery of educational services in a language other than English may need to be considered as an appropriate measure for compliance with federal statutes and appropriate educational practices.

Adapted from Bernal, E., & Tucker, J., A Manual for Screening and Assessing Students of Limited English Proficiency. Used with permission.

Assessment Procedures: Conclusion

Because the final decision about whether the student is handicapped or not is made during the last step of the assessment procedure, it is important to interpret the standardized test scores with a great deal of caution. Many of these tests were not standardized on linguistically different populations. If the norms are not applicable, the student's potential may be underestimated. That is why a single test should not be the sole determinant of placement and intervention decisions.

Information gained from standardized tests is not precise enough for planning specific teaching programs. At best, the results from norm-referenced tests indicate general levels of academic functioning and possible areas of difficulties in broad areas such as reading comprehension, arithmetic computation, etc.

The teacher needs information about the specific problems a student is experiencing; therefore, observational data and data obtained through informal tests are so necessary.

Use of Informal Tests with Bilingual Handicapped Students

The classroom teacher who is to teach students experiencing learning difficulty because they receive instruction in a nondominant language, needs as much specific information as possible about the learning potential of the linguistically different student. Informal tests, as compared to standardized measures, usually provide more exact information that may be used in planning remedial strategies (Wallace & Larsen, 1979). These informal tests assess behaviors and skills that are more directly related to a student's actual achievement.

Following are techniques, strategies, and guidelines that may be useful in more appropriately assessing bilingual handicapped pupils in various academic areas.

Checklists and Rating Scales

Checklists and rating scales are useful tools in objectively analyzing specific behavior that otherwise would be judged subjectively.

A rating scale is designed to indicate the degree to which, or the frequency with which, a characteristic or behavior is observed. The checklist is used to determine the presence or absence of a particular characteristic under certain circumstances (Wallace & Larsen, 1979).

An advantage of using checklists and rating scales is that they may be constructed by knowledgeable practitioners in the field. When these instruments are created, several important principles should be kept firmly in mind. These principles directly relate to the selection of the characteristic or behavior to be observed or rated, the design of the rating scale, and the conditions under which these ratings and observations are obtained. Grolund (1976) outlines six principles that are of particular importance:

1. Characteristics/behavior should be educationally significant.

2. Characteristics/behavior should be directly observable.

3. Characteristics/behavior and points on the scale should be clearly defined.

4. Between three to seven rating positions should be provided, and rater should be permitted to mark at intermediate points.

5. Raters should be instructed to omit ratings where they feel unqualified to judge.

6. Ratings from several observers should be combined, wherever possible. (pp. 444-445)

An example of a checklist is found in Appendix A.

Informal Survey Tests

Survey tests can be criterion-referenced measures developed to sample the presence or absence of certain specific behaviors. They usually include a broad range of behaviors that are deemed essential by classroom teachers. One advantage people have found regarding these instruments is that they can be created by the user from existing instructional material. An example is the Informal Reading Inventory, commonly called IRI. The IRI consists of a graded series of 100 to 150-word passages that range from preprimer through eighth grade (Betts, 1946). As the students read each passage, the teacher marks or records the mistakes in word recognition and word analysis. After the student reads each passage, the teacher asks a series of questions that test comprehension of the content of the reading passage.

These types of tests are useful in assessing bilingual pupils because the teacher can obtain information as to the student's reading difficulties - whether the problem is in encoding or in decoding. In addition, the teacher can determine the reading level at which a student can function independently, the level at which the student comprehends what is read, the level at which the student can profit from instruction, and the level at which the student becomes completely frustrated (Johnson & Kress, 1965).

Observation

It is difficult to objectively observe others' behavior. Because this is so, teachers need to be trained in good observation techniques. Given that training, observation becomes a very effective method of obtaining important information about pupils. This technique can be used to confirm the findings of both standardized and teacher-made tests. In addition, observation can be used to detect certain skills and incidental behaviors that might go untapped by other testing procedures.

Classroom teachers have many opportunities throughout the school day to observe students in a variety of settings. Oral reading periods give the teacher the opportunity to note the students' word attack skills, word recognition abilities, and comprehension skills. The use of the chalkboard allows the teacher to observe several students doing arithmetic computation simultaneously. Physical education classes and playground activities give the teacher an excellent opportunity to observe and note students' fine and gross motor abilities as well as personal and social adjustment skills.

Some suggestions for successfully obtaining information through observation techniques are as follows:

1. Report only the facts. Do not make value judgments about behavior observed.
2. Minimize personal influence.
   a. Observe through a one-way mirror.
   b. Observe from behind an observation cubicle.
   c. Dress plainly so as not to cause unnecessary distraction.
   d. Take very few notes.
   e. Become a familiar sight to those under study.
3. Decide what to observe.
   a. What things seem to be of most interest to the child?
   b. Who does the child play with most often?
   c. How does the child get along with peers as a whole?
   d. How does the child get along with his/her teacher?
   e. What subjects does the child like best and least?
   f. What are some of the ways used to get attention?

g. Does the child need excessive amounts of attention? If so, from whom?

h. Is there a difference in the child's behavioral pattern in the morning and afternoon?

i. Does the child communicate well in the dominant language? In the second language? What does the child communicate? To whom? In what language?

j. Does the child talk about his/her family? To whom?

k. Does the child have brothers and/or sisters? How many? Where does he/she fit in?

l. Does the child seem happy? Does he/she seem friendly?

m. Does the child bring his/her lunch or eat in the cafeteria?

n. How does the child get to school?

o. How does the child dress?

p. What are the child's household chores?

q. Can the child work in groups or alone?

r. How does the child respond to praise and criticism?

The format used in reporting observations varies. Whatever the form, however, basic information relative to the observation should be given, including student's name, date, time of observation, location and/or situation, grade level, age and sex of student, a description of the behavior observed, circumstances or antecedents for behavior, possible implications, and observer's name. The quality and usefulness will be enhanced if this information is concise, clear, brief, easy to read, and accurately reported.

There are a number of potential problems with observation that teachers should be aware of. The most crucial limitation is observer bias. Too often observations tell more about the observer than about the individual being observed. An observer's biases and beliefs influence what the observer looks for in a student and also the degree of importance placed on the observed behavior. In addition, observational errors may also be caused by inaccurate recording, inappropriate sampling techniques, and preconceived notions about a student's success or failure.

An observer may jump to conclusions prematurely or make generalizations regarding a student's overall behavior on the basis of a small sampling of behavior. While all behavior is caused, there are usually a number of interwoven explanations, rather than a single one. For example, it is wrong to conclude that a student's behavior is destructive simply because the mother works or because the father travels a great deal of the time. Such factors may enter the situation, but they do not constitute the total picture.

Observers of bilingual handicapped students need to possess not only observation skills, but a knowledge of the students' culture and the ways it affects their whole pattern of behavior. Included in this pattern are factors such as the manner in which the students approach problem solving, their learning styles, personal preferences, fears, interests, and aspirations. The influences of the observer's sex, ethnicity, age, familiarity and style are also factors to be considered.

Behavior may change when a student is aware that he or she is being observed. Moreover, student behavior can facilitate or hinder a pupil's capability and adjustment to his or her own minority culture as well as to society at large. Observation of behavior is a fair tool for assessing pupils only if student behavior is evaluated by comparing it to a particular pupil's cultural values and experiences rather than comparing it to the observer's values and experiences (Diggs, 1974). The specificity, practicality, and adaptability of observation procedures have contributed to their widespread use in evaluating pupils. In addition, the direct applicability of most observational data to ongoing teaching is an advantage of the observation assessment technique. Finally, observation can play a valuable part in the assessment process of linguistically different pupils suspected of having a handicapping condition.

The Cloze Procedure for Language Assessment

If classroom teachers are in need of information about a student's reading comprehension, the cloze technique is one type of test recommended. The best application of this procedure includes selection of a passage that contains information familiar to the examinee. The passage, approximately 60 words, has every fifth word omitted. The number of missing words the student can correctly supply indicates the level of skill in comprehending and processing the material. The test can be scored in two ways: exact words correct, or contextually appropriate words counted as correct. This language assessment technique is useful for assessing the functional reading level of a language minority student.

Interview Techniques

According to many experts in the field of linguistics, an interview is one of the better techniques for gaining viable information about a student's communicative competence. Some test instruments focus on assessing specific components of language; some assess oral language proficiency. Others assess grammatical competence, while others assess knowledge of vocabulary (Calderon, undated). The interview technique is flexible and may be adapted according to the need of the examiner. For example, it can be used to help determine language dominance or language proficiency, language patterns, socialization skills, interests, family history, attitudes, or values.

Galvan and Bordie (1977) have outlined possible uses of an interview:

1. To establish much-needed rapport with students.

2. To learn what motivational strategies are most useful with a particular student.

3. To gain information about abilities and interests on which to base future instructional strategies.

4. To be able to demonstrate to the student your pride in his/her achievements.

5. To explore alternative strategies and devices to be used in class.

6. To present yourself as a very human teacher interested in what students know, feel, and value.

The over-riding purpose for interviewing students, however, is to get to know them well enough to make sound educational decisions about placement and programming.

Galvan and Bordie (1977) also provide a comprehensive list of suggestions to positively influence the outcome of an interview. Among these suggestions are the following:

1. Select a relatively quiet place to talk.

2. Use topics and questions that are familiar to students and produce good information.

   a. Questions about out-of-school activities. What do you and your friends do away from school? What would you do if you had a day in which you could do anything you wished?

   b. Questions about student's background. What things scare you? make you mad? make you happy? make you feel secure? make you feel insecure? Who was the best friend you ever had? What made him/her so special?

   c. Questions about school. What kind of schoolwork do you do best? What kind of schoolwork gives you most trouble? If you could change one thing about school, what would it be?

If the purpose of the interview is to gain rapport, no written record is necessary at the time. However, records and notes could be made if the interview were conducted to find out the student's interests, background and strengths. If the purpose is to record a sample of the student's language, thinking strategies, knowledge of information or academic competence, a tape recording or videotape could be made with a brief written record included in the student's file.

During the interview, the interviewer should be as positive as possible and concentrate on getting the student to talk. Ask questions that produce more than one-word answers. How, why, and what questions usually produce longer answers than who, how many, or where questions. Never correct a student during an interview. Live in the student's world, trying to share experiences rather than judge them. Show genuine interest in what the student can share during the interview. Give the student undivided attention by preventing outside interruptions and by giving him or her your time to listen. Let the student use any standard or variety of language with which he or she feels comfortable.

Use all the strategies of good interpersonal communication. Take as many cues as possible from the student:

- If the student is uncomfortable maintaining eye contact, do not require this to conduct the interview.
- If the student feels something is funny or serious, respond accordingly.
- If a question seems to be too personal, leave it and proceed to a less sensitive topic.
- If the student is too nervous to be productive, terminate the interview and try again later.

While one recommended use of the interview technique is to assess a student's language, certain precautions must be kept in mind when making judgments about the student's level of language dominance or proficiency. Interviewer bias is likely to influence scoring and interpreting the results of the interview. This bias may be due in part to the interviewer's level of schooling, years of experience, and knowledge about the student's culture and language. While it is difficult to control for interviewer bias, it is not impossible to do so. The judgment of teachers with the proper linguistic training can be as reliable as any test. This is promising since it is the classroom teacher who is most in need of reliable and valid data for developing appropriate instructional plans and materials.

Evaluating a Student's Language

A student's language dominance and language proficiency can be determined from speech samples. Galvan and Bordie (1977) state that "in order to get a fair appraisal of a student's ability to use a language, the speech sample would have to include information from all five domains of language" (p. 2). These are listed below with suggested weighted emphases.

- Rhetoric (25%): the characteristic of explaining a situation, describing an object, telling a story, or persuading someone toward a particular point of view.

- Register/Style (20%): includes those factors used in speaking to elicit responses from an audience, to make or convey an impression.
- Syntax (30%): the grammar of a language, the way in which words are put together to form phrases, clauses, or sentences.
- Vocabulary (20%): a list or collection of words appropriate to the topic or curriculum segment being discussed.
- Pronunciation (5%): producing the components, or the sounds, of a language (intonation stress, pitch, metrics).

Galvan and Bordie (1977) provide the following rating scale for judging a student's language sample:

Language Rating Scale

Rhetoric

5. Meets all expectations of assignment; purpose is clear, content is accurate, and presentation is interesting.
4. Differs from level 5 in clarity of information and degree of interest presentation holds.
3. Meets minimum expectations of the assignment; purpose is not clear, information weak, and presentation only minimally effective.
2. Differs from category 3 in that the purpose is mistaken, information sometimes inaccurate or inappropriate, and the structure is not clear; student does not seem to understand the structure of the presentation.
1. Does not fulfill demands of assignment; purpose is not defined, information inaccurate, and structure confused.

Register/Style

5. Presentation reflects effective adaptation of material for the specified audience and situation; performance capable of getting best response from audience.
4. Student reasonably effective in getting response from audience; seems to know how to adapt material to needs of the situation but fails to execute well.
3. Student apparently is only minimally aware of the audience; could show signs of frustration at not being able to adapt material for the specified audience and situation.

2. Student shows self-conscious signs of not being able to deal with his audience or the situation; may refuse to make a serious attempt.

1. Student seems unaware of audience reaction; seems unable to adapt material for specified situation.

Syntax

5. Makes few (if any) noticeable errors of grammar or word order; controls a wide variety of patterns consistent with a native speaker of the same age.

4. Occasionally (rarely) makes grammatical errors which do not obscure meaning; a fairly wide range and number of patterns typical of a native speaker of the same age.

3. Makes occasional grammatical errors which sometimes obscure meaning; many errors reflect non-standard usage; restricted as to number and types of patterns available.

2. Grammatical and word-order errors frequently make comprehension difficult; must rephrase sentences and/or restrict himself to basic patterns.

1. Errors in grammar and word order so severe as to make speech virtually unintelligible.

Vocabulary

5. Use of vocabulary and idioms is virtually that of a native speaker. All words (both function and content) needed for assignment are mastered.

4. Sometimes uses inappropriate terms and/or must rephrase ideas because of lexical inadequacies.

3. Frequently uses wrong words; performance somewhat limited because of inadequate vocabulary.

2. Misuse of words and very limited vocabulary make comprehension quite difficult.

1. Vocabulary limitations so extreme as to make performance virtually impossible.

Pronunciation

5. Has few traces of foreign accent; pronunciation consistent with standard dialect of the area.

4. Always intelligible, though one is conscious of a definite accent.

3. Pronunciation problems necessitate concentrated listening and occasionally lead to misunderstanding.

2. Very hard to understand because of pronunciation problems. Must frequently be asked to repeat.

1. Pronunciation problems so severe as to make speech virtually unintelligible.

Source: Galvan & Bordie, 1977.

Practical Problem-Solving Techniques

Some researchers have had success in assessing linguistic minority children through the use of Piagetian tasks. De Avila and Havassy (1975) see the value of this approach with minority-group students in that results of their research indicate a similarity in the cognitive development of pupils from diverse cultural backgrounds when assessed by performance on Piagetian tasks.

In addition to Piagetian assessment, other more informal problem-solving techniques are possible. The classroom teacher could formulate a series of problems of varying difficulty based on the cultural background and experience of the student. The student would be given the opportunity to solve as many of the problems as possible. The problem solved at the most difficult level would be an indicator of the student's potential.

The principle of problem-solving techniques is similar to that used in the development of informal survey tests and informal skills tests. As opposed to practical problem solving, survey tests and informal skills tests require application of traditional academic skills using rote learning, memorized information, and set procedures without real meaning to any given situation. In problem-solving assessment, the student may use similar skills, but they will be directed toward solving a real life problem.

Task Analysis

Another method useful in evaluating bilingual handicapped students is task analysis. This process requires that concepts be broken into task components, which are then broken into skills. Finally, steps are outlined to help the student master each skill. By following this procedure, the teacher can develop a list of skills which, when mastered, will yield a successfully completed task. In turn, as several tasks are learned, concepts will be mastered. In essence, then, task analysis is the procedure by which the concept "going from the less difficult to the most difficult" or "going from the concrete to the abstract" is operationalized.

Once the component steps of a task have been identified, the child is presented with each sequential task until a task is presented that the child cannot perform without error (Wallace & Kauffman, 1981). Following an analysis of the pupil's errors, the teacher usually designs a remedial program based on the same sequence of skills as in the task-analysis process.

Further, agreement among professionals can usually be obtained with regard to a specific task sequence if it is desirable.

On the whole, task analysis should be considered a very helpful addition to educational assessment. It may be viewed as a process that provides teachers a basis for what they want to teach, where they want to begin, when they have succeeded, and what the subsequent item or skill should be. In essence, task analysis is a prerequisite process to criterion-referenced assessment and individualized instruction - both essential elements in the total process that will provide students an appropriate education in the least restrictive environment.

Criterion-Referenced Tests

Classroom teachers are interested in the implications of test results for the instruction or discipline of the children with whom they work. Criterion-referenced tests provide a strategy by which classroom teachers can obtain specific data about specific students.

Criterion-referenced tests (CRT) are relatively recent developments in measurement and have been introduced for several reasons: (a) serious shortcomings exist with standardized tests; (b) there is an increasing demand for more accountability; and (c) behavioral psychology, which endorses criterion-referenced tests because such tests are closely related to treatment, has influenced measurement in education (Kirk, Kliebhan & Lerner, 1978, p. 189).

Criterion-referenced measures are used to ascertain an individual's status against some criteria or performance standard. According to Wormer (1974) CRT describe performance rather than compare performance. The basic goal of CRT, then, is to describe behavior as accurately as possible in relation to standards of performance deemed important to the test developer. Therefore, the meaningfulness of an individual score is not dependent on comparison with other examinees. The desire is to know what the individual can do, not how he or she stands in comparison to others (Popham & Harek, 1969).

Specific Uses and Advantages of Criterion-referenced Tests

Criterion-referenced tests can provide information which is useful in classroom instruction. By using results of these tests, an educator can make decisions about the individual student, such as (a) the degree of

achievement in a particular academic, psychomotor or vocational task; (b) the student's readiness to proceed to the next task; (c) the prerequisite skills needed by the student to succeed at a particular criterion level in a task; and (d) curriculum materials to help the student master the necessary skills for each task (Carver, 1972). Appropriately applied, criterion-referenced tests offer several advantages in relation to providing education to bilingual handicapped populations.

Plata (1977) outlines three important features of criterion-referenced assessment that make it particularly applicable to the educational needs of culturally and linguistically different handicapped children. The single most important characteristic of criterion-referenced instruments is that, unlike norm-referenced tests, the criterion-referenced instrument concentrates on a number of highly specific behaviors which are subject oriented. Second, criterion-referenced instruments are usually constructed to ascertain a point of departure in instructing students in individualized instructional programs. In other words, there is a direct relationship between the use of criterion-referenced measures and individualized instruction. Third, criterion-referenced assessment instruments are useful in various educationally related endeavors, such as social or vocational skill development.

An additional advantage to criterion-referenced assessment instruments is that practitioners can design them in any content area.

Developing Criterion-referenced Tests

Since CRT are tests specifically designed to pinpoint a student's mastery on certain tasks, it is important to consider the strategies, steps, and guidelines in developing these tests. First, the area(s) or discipline in which criterion testing is desired needs to be identified; second, the specific questions that will comprise the CRT need to be identified and placed into a hierarchy; third, the test instrument needs to be developed; fourth, the CRT needs to be administered; and fifth, the test results need to be interpreted. Following is a discussion of each of these steps.

Step 1. <u>In what area or discipline is in-depth information needed?</u>
If the examiner is not the classroom teacher and does not know the student's capabilities, he or she may want to study the results of standardized tests given to the student. Analysis of standardized test results will assist in pinpointing general areas of weakness or strength in which more detailed information is desired. The specificity of information on an area of concern may then be acquired by using criterion-referenced tests.

Another strategy is to ask the classroom teacher for input. This communication and interdisciplinary cooperation will prove beneficial to both the examiner and the classroom teacher. For the examiner it will save time by reducing the extensive analysis of standardized test results suggested above. It will provide the teacher with specific information in solving a particular problem.

Step 2. What questions should be included in the CRT? Questions for a criterion-referenced test may be obtained from several sources. Following is a list of sources and a brief discussion about each.

1. Standardized tests. After a standardized test has been given, more specific information may be desired to plan and develop instructional strategies and/or instructional materials. For example, if a student can master third grade math and language arts, the teacher may want to determine in more detail the student's capabilities in the regrouping process in addition, subtraction, and multiplication or in applying punctuation and capitalization rules correctly.

Taking the assessment process beyond standardized testing is essential for bilingual handicapped pupils. Obtain in-depth understanding of a student's specific skills and knowledge to prevent inappropriate placement, programming, and instruction of bilingual handicapped students. The willingness to take the assessment process past the stage of standardized tests is actualizing nondiscriminatory assessment and focusing on the needs of the pupil.

2. Student's classwork. The student's daily classwork is a useful source for pinpointing areas in need of criterion-referenced testing. For example, a student may make spelling errors in written classwork. To obtain information about the degree, extent, pattern, or severity of the problem a CRT could be administered that includes a wide variety of questions of differing degrees of difficulty. A vocational shop teacher may want to determine the student's knowledge of "tools of the trade" after an apparent lack of understanding of a "ball peen hammer" in a test question.

3. Observation. A teacher who is trained to be an astute observer will be able to detect possible problems through cues from a student's behavior. In order to ascertain the validity of the observation the teacher can administer a CRT. For example, a teacher may notice a student having problems in cutting out pictures from a magazine. Through the use of a specifically designed CRT, a teacher will be able to pinpoint more precisely the student's problem, to what degree it is generalized to other areas, and/or the antecedents that trigger the problem. Or, for example, a teacher may observe a disheveled appearance in a student's dress such as untied shoes. Through the use of a CRT the teacher may discover the student's inability to perform the necessary steps to tie shoes.

4. Curriculum guides. Curriculum guides are probably the most useful source for obtaining questions for a CRT. Curriculum guides are usually developed around a set of objectives and include instructionally oriented materials that are invaluable in developing specific items for CRTs. Curriculum guides are better used in combination with the other strategies outlined thus far. In other words, the curriculum guides may be more effectively used after the problem has been pinpointed either through use of standardized tests, student's classroom work, or observation. This will prevent lost time in seeking out questions without knowledge of the

specific area pertinent to the pupil's needs. When using the curriculum guide to develop CRTs for bilingual handicapped pupils, it is suggested that bilingual personnel be involved.

5. Colleagues in your discipline. Do not forget your colleagues! They are excellent sources of information and can provide help in clearly pinpointing questions, amending the sequence of items in order to assure inclusion of questions ranging in degree of difficulty, providing additional sources of information for the CRT, and, in general, acting as a source for checking content validity of the questions in the CRT.

Step. 3. How is the CRT developed? Unlike norm-referenced tests, there is no general pattern for constructing criterion-referenced tests. How the test is constructed depends on the type of measure (Swanson & Watson, 1982). In developing such an instrument, the following guidelines may be useful:

1. Create problems which are related to the skills hierarchy resulting from task analysis.

2. If necessary, divide the skills hierarchy into categories or concepts (for example, addition of whole numbers, long vowel sounds, capitalization rules, etc.).

3. Develop a one-page criterion test for each concept.

   a. Make the page attractive by adding color, cartoons, and by spacing problems creatively on the page.

   b. Use a catchy name for the title.

   c. Use codes for each of the concepts being tested (AWH = adding whole numbers; H-S.Cap. = History—state capitals; Voc.Dv. = vocabulary development).

In addition, guidelines offered by Charles (1972, pp. 333-334) may prove useful:

1. Be sure the test directions are very clear.

2. Do not include questions on trivial matters.

3. Use simple wording, language, and sentence structure.

4. Do not include more than one problem in one item.

5. Try to include items that have only one correct answer.

6. Do not use tricky statements or double negatives.

7. Use true-false items that are clearly either true or false, rather than yes or no, maybe, or sometimes.

8. Do not use words that give hints about correct answers, such as all, always, none, never, totally, exactly, completely, etc. Avoid a, an, singulars, and plurals before blanks.

9. Be sure that one item does not give the answer for another item.

Step 4. How is a CRT administered? Plata (1977) gives some practical suggestions on how to implement criterion-referenced tests and how to avoid their misuse:

1. Allow students to become accustomed to routines in the classroom before the test is administered.

2. Talk to pupils about the forthcoming testing situation in order to avoid confusion and relieve anxiety.

3. Plan to give the test over a period of several days.

4. Give only the minimum number of test items needed to pinpoint the achievement level of each student.

5. Grade the test within a day or two, since the results are to be used in the appropriate placement of each student into the curriculum.

6. File the test results as baseline data for future use in conferences and progress reporting.

7. Be open to suggestions on how to improve the test.

Step 5. How are CRT results best utilized? Results of criterion-referenced tests are best used by practitioners whose aim is to individualize educational programs for students. Classroom teachers can use criterion-referenced test results to: (a) pinpoint the strengths and weaknesses of specific students for whom they are responsible; (b) determine the starting place for the student's instruction; (c) select teaching materials to accomplish stated objectives in the student's IEP; (d) monitor progress in the student's achievement - academically, vocationally, or socially; and (e) report on the student's progress to parents, administrators, and students themselves.

Limitations of Criterion-referenced Measures

Researchers have noted limitations of criterion-referenced measures. Kirk, Kliebhan, and Lerner (1978, p. 194) outline the following limitations:

1. A disproportionate amount of time must be spent monitoring students, keeping records, and doing paperwork.

2. Hard-to-measure qualities, such as appreciation or attitude toward reading, may be overlooked.

3. Students who test at an acceptable criterion level for a specific skill may be unable to transfer that skill to another situation.

4. Students may test at an acceptable criterion level on a specific skill one day but be unable to perform that skill a few days later.

5. The hierarchy, or ordered sequence of skills, selected by the testmaker may be inappropriate for a particular child. Moreover, testmakers do not agree about a specific sequence.

6. Determining the appropriate criterion for proficiency may be difficult. That is, 60% proficiency may be sufficient for some skills, while in other skills a 95% proficiency may be required.

7. The sequence of skills to be learned does not take into account the unique strengths and weaknesses of a specific child. This is particularly important for slow and disabled learners, as well as for bilingual handicapped students.

8. Criterion-referenced tests need better test construction to determine valid and reliable content-referenced interpretation. (Davis, 1974)

In addition to these limitations, there are other concerns regarding criterion-referenced tests. Boham (1973), for example, advises that careful attention be given to certain essential questions such as: (a) Who determines the objectives? (b) Who sets the behavioral criterion levels? (c) Do test items accurately reflect the behavioral criterion levels? (d) What constitutes a sufficient sample of items at each criterion level? and (e) Do the test scores obtained describe an individual's response pattern?

Each of these questions is briefly discussed below in addition to the following two concerns: (a) specificity of questions and (b) interpretation of results. For each of these seven questions, an attempt has been made to draw implications about the assessment of bilingual handicapped students.

Questions about CRT

1. Who sets criteria? Some professionals propose that classroom teachers are in the best position to set the criterion levels that constitute acceptable performance. While there may be general agreement with this suggestion, some questions still remain unanswered, especially with regard to bilingual handicapped children. What if the teacher is not knowledgeable about the cultural factors that influence the learning of bilingual children? What criterion will be used? How will the results be interpreted and used? What about novice teachers in the field? Are they as qualified to set criterion standards as their more experienced colleagues? What about the teacher who has mainstreamed bilingual handicapped students in the class? Do teachers alone set criteria? Or do they seek the cooperation

of their colleagues in special and bilingual education? What about other assessment personnel? Do they play a part in setting the criterion level? What is the role of the community in providing input regarding the criterion level set for CRT?

"Who sets the criteria?" is a complex question. It should be kept in mind that the primary purpose of criterion-referenced testing is to specifically pinpoint the departure point for instruction of students. From this viewpoint it is understandable that McLaughlin and Lewis (1981) believe that "most criterion-referenced tests are designed by teachers in the privacy of their own classroom" (p. 175).

2. What is the criterion for acceptable performance? One of the criticisms about criterion-referenced tests is that there is little evidence of their quality. McLaughlin and Lewis (1981) believe that reasons for this criticism are due to their specificity and their local use. While most of these criticisms may be justifiable, the primary purpose served by criterion-referenced tests should not be minimized.

Howell, Kaplan, and O'Connell (1979) provide the following suggestions in setting criterion levels for acceptable performance in criterion-referenced testing: "Identify those individuals who you feel possess the skill being measured by the CRT, administer the CRT to these individuals and use the minimum levels of their performance as a standard for passing your test" (p. 97).

In general, this suggestion is acceptable. However, for specific populations, such as bilingual handicapped students, there are factors which could impede the success of this strategy if precautions are not heeded. These factors include the language barrier of the student; translation of test items; lack of bilingual personnel to administer the CRT; and poor understanding of the impact of culture, language and the handicapping condition on the bilingual handicapped child's performance. If special efforts are made to keep these factors from becoming obstacles to assessment, Howell's suggestions may be followed. In addition, it is recommended that bilingual personnel be significantly involved in setting criteria for acceptable performance of bilingual handicapped students on a CRT.

3. Selection of items. One of the major concerns about CRT is the appropriateness of questions selected to sample the performance desired. This includes the specificity and clarity of the questions.

Involving the classroom teacher reduces the possibility of discriminating against pupils through the selection of inappropriate test questions. The classroom teacher is in the best position to identify the essential skills required to accomplish a task as well as the order in which these skills need to be taught.

It is important for the CRT to include an array of questions varying in difficulty so that the student's true performance levels may be tapped. For bilingual handicapped pupils the involvement of bilingual personnel is a step toward ensuring the reduction of discriminatory practices in the

development of CRT. Bilingual personnel can assist in CRT development by (a) translating existing criterion-referenced instruments into the student's native language; (b) ensuring that terminology in the test questions coincide with community vernacular; and (c) ensuring, as much as possible, the relevancy of test questions.

4. How many test items are enough? There is no predetermined number of test items that constitutes a well-developed CRT. Factors to consider in determining the number of test items in the CRT include (a) grade level; (b) competency being addressed; (c) time limits in administering the CRT; and (d) specificity of the student's mastery of objectives in question.

The classroom teacher who has been trained in specific subject matter is the best individual to identify the appropriate number of test items for the test instrument.

The number of test items for a CRT may be determined by using the following questions as guidelines:

1. Will the number of questions identified assist in the development of a specific educational program for the bilingual handicapped pupil?

2. Will the number of questions identified assist in pinpointing departure points for instructing the bilingual handicapped student in an appropriate sequence of skills?

3. Will the number of questions identified assist in determining the true performance of the bilingual handicapped student in the desired skill?

4. Will the number of questions identified result in the identification of a learning pattern?

5. Will the number of questions identified be a factor in the bilingual handicapped student's motivation, interest, and attitude toward the assessment process or the CRT in particular?

5. Specificity of questions. To a great extent the success of the CRT will depend on the quality of the questions or items presented to students. The clarity of the question may also depend on the specificity of the item. The use of observable and measurable terminology in developing questions will prevent confusion or misinterpretation in students (McLaughlin & Lewis, 1981).

Since the main purpose of a CRT is to ascertain the mastery level of specified objectives, it is appropriate to use strategies, procedures and questions that specify the desired behavior, the conditions under which behavior should occur and the criterion for acceptable performance of the behavior (Mager, 1975).

To ensure clarity and specificity of test questions it is suggested that the CRT be circulated to several colleagues for their critiques. Additional feedback of the specificity of questions may be accomplished by following Howell, Kaplan, and O'Connell's (1979) suggestion to administer the CRT to students who possess the skill. The field testing of the CRT will give the developer an opportunity to amend any test item that is confusing to the students.

Bilingual handicapped students are in need of the opportunity to respond to a CRT that contains questions in the vernacular which they understand, clearly stated and specific enough to determine the performance desired by the examiner.

6. Interpretation of results. The interpretation of CRT results can be done by any professional who comes in contact with the bilingual handicapped child. Little or no special training is required to interpret the results of a well-constructed criterion-referenced test. Educational diagnosticians, psychologists, classroom teachers, counselors, administrators, classroom aides, parents, and volunteers may all be able to interpret CRT results.

The major goal of criterion-referenced testing is to demonstrate the skills already mastered by the examinee. Test results cannot be translated into standard scores nor can the results be used for comparisons between students for purposes of rank ordering.

According to Wormer (1974), criterion-referenced tests describe performances rather than compare performances. It is this characteristic of CRTs that make them so useful for classroom teachers. Because CRTs are created from the specific skills comprising a performance (usually discovered through task analysis), the results have a direct implication on the student's degree of mastery on the performance or task. The results are, therefore, interpreted like a checklist, i.e., whether or not the skill has been mastered. As a consequence, the results of a CRT can be used to determine departure points in the instruction of the student.

The bilingual handicapped student stands to profit greatly from the results of a well-constructed CRT, especially if the interpretation of results is aimed primarily at discovering what skills to teach and the level at which to begin instructing students. For bilingual handicapped students the appropriate interpretation of results obtained from a CRT is a major step leading to the implementation of the least restrictive environment concept.

Admittedly, criterion-referenced tests do not yield data which can be used to determine eligibility for special education placement. However, this type of testing will provide information that can be combined with data obtained from norm-referenced tests to get a view of the student from two perspectives. Since one of the suggested methods for assessing bilingual handicapped pupils is to use multicriteria assessment, criterion-referenced assessment gives much needed practical information

about the student. From this vantage point, data gathered through the use of criterion-referenced tests may be most appropriate in planning and delivering individualized education programs for bilingual handicapped pupils.

Additional Assessment Procedures

Pretest Training

Bernal (1971) used the following techniques in a study designed to assess Spanish-speaking, Black and Anglo students. He found that the ethnic minority students did not differ significantly from their Anglo counterparts in test performances when these techniques were applied. Further, Hispanic and Black students outperformed their controls who were tested under standard test administration.

The following are Bernal's techniques:

1. Language screening to eliminate students who do not possess the minimum language skills to understand the test items (e.g., recent arrivals to the country).
2. Matching the examiner-examinee on ethnicity and language or specific dialect of spoken language.
3. Rapport building and an explanation of the purpose of the test.
4. Administering the test in small, easily supervised groups.
5. Coaching on the mechanics of test taking, making best choices.
6. Explaining the testing directions thoroughly in the language and/or dialect of the students, and encouraging questions to clarify points.
7. Practicing on items similar to those to be encountered on the test or subject, group discussion of why each member of the group selected a particular response, and feedback.

Similar techniques have been tried by Budoff and Hutton (1972). These researchers used the Raven's Progressive Matrices to probe for competencies among minority-group students who were considered to be exceptional. Budoff and Hutton's approach was less culturally biased and language oriented than the traditional problem-solving measures of the Raven's Progressive Matrices. The children who initially scored low were provided with 1 hour of structured experiences in problem solving. Of these low-scoring pupils, 50% scored at the 50th percentile or above on the posttest after this short training.

Flavell (1975), in studying the learning strategies of preschool and primary grade children, found that nonhandicapped children who could describe ways of retrieving information performed better on memory tasks than those children who could not verbalize a strategy for retrieving information. Anderson and Alley (1977), using a problem-solving discrimination task, matched mentally retarded and normally functioning children of similar age. They found that knowledge of whether the student was mentally retarded or normally functioning was not as good a predictor of success on this task as was the student's ability to verbalize a strategy to solve the problem.

This strategy has implications for assessing language minority pupils. However, it may necessitate a bilingual examiner.

Using Adaptive Behavior Data

Typical everyday behavior is an underused indication of coping abilities and competence in children who do not come from the cultural mainstream (Fishman, Deutsch, Kogan, North, & Whiteman, 1964). This behavior is known as adaptive behavior. Adaptive behavior refers to the extent to which an individual meets the cultural and societal demands in his or her environment (Mercer, 1973). Performance in such activities as self-help skills, language proficiency, personal and social relationships, vocational competencies, and academic competence can be measured by adaptive behavior. Using this broader base of information, judgment can be made about the exceptional pupil's competencies in total living skills rather than only about narrow academic skills.

When recording adaptive behavior of language minority pupils, their learning styles, approaches to learning, communication strategies, and psychomotor abilities - as well as their beliefs, values, and aspirations - must be described. These characteristics form the foundation for all behavior and learning and cannot be ignored in the assessing process of role performance.

Much of the adaptive behavior information will be obtained from observing the student in different situations and in different settings. Behavioral rating scales and behavioral checklists may also be used. In addition, adaptive behavior data may be acquired from interviewing parents, siblings, peers, and significant others. The main objective is for the student's role competence to be judged by multiple measures and by a variety of observers.

During the process of gathering adaptive behavior information, examiners must be cautious in judging as atypical any adaptive behavior that is appropriate within a specific culture.

In planning the assessment process, educators may use commercial or teacher-made informal tests. In any case, selection of informal procedures could benefit from consideration of the following points made by McLaughlin and Lewis (1981):

1. The assessment procedure should produce the information needed to answer the assessment question.

2. The assessment procedure should be the most efficient method of gathering the desired information.

3. The assessment procedure must be appropriate for the age, grade, and ability level of the student.

4. The assessment procedure must be administered, scored and interpreted by appropriately trained professionals.

5. The reliability and validity of the assessment procedure must be adequate.

CHAPTER 3. PLACEMENT AND PROGRAMMING OF BILINGUAL HANDICAPPED STUDENTS

Tucker (1980) has authored Nineteen Steps for Assuring Nonbiased Placement of Students in Special Education. These steps are succinct, practical, and comprehensive. Part of the placement procedure discussed by Tucker includes the classification of students as handicapped since this is a necessary step in order to provide students with special education services.

It is important that, prior to classification, several key questions be answered:

- Is the bilingual student handicapped?
- Is the bilingual student's learning problem caused by, or significantly complicated by, the handicapping condition?
- Does the bilingual student need special education as a result of a learning problem that is due to a handicap?

The first two questions must be answered "yes" if the student is to become eligible for special education services. These questions become very critical where language minority students are being considered for special education placement. All too often, minority group members are found eligible for special education services on the basis of diagnosis of mental retardation, learning disabilities, or emotional disturbance. A more valid assessment of their status, however, would reveal that the perceived problems are due primarily to racial, ethnic, linguistic, and/or related factors such as poverty, or lack of opportunity and/or motivation to attend school.

All assessment data gathered on a language minority student through the use of norm-referenced, criterion-referenced, and informal assessment procedures must be analyzed by a multidisciplinary team of professionals. It is important to have people who are sensitive to the language and culture of the student and knowledgeable about the educational history of the linguistically different pupil.

The data about the student's performance in relationship to the peer group is of particular importance in the diagnostic process in terms of achievement objectives for a specific district. For example, if it is normal in a given district for a sixth grader to be achieving at the fourth-grade level in math, then a student who is referred for possible special education placement and who is performing at that level - even though significantly behind a national sample - is, in fact, doing as well as could be expected in that district. Such a level of achievement could not be used as evidence that there is a discrepancy between the student's mental ability and achievement level for the purpose of diagnosing a learning disability.

Extreme caution should be used in analyzing and categorizing perceived learning problems of bilingual exceptional pupils. Many times, these students' problems appear to have the same characteristics as certain handicapping conditions when, in essence, their learning difficulties are not due at all to the handicapping condition. Remember, before a student is classified as handicapped and the learning problem given a label such as mental retardation, the exhibited problem must be directly attributable to the handicapping condition and not to the related factors of ethnicity, language, culture, or lack of educational opportunity.

In the classification process, it is also important to consider the eligibility criteria for special education as outlined by the state education agency. These criteria must be met before a student is eligible for special education services. Eligibility criteria provided by the state, as well as available information in the literature about the exceptional pupil, provide a sound basis for making final decisions as to the classification into which the student will be placed, be it one of the several handicap categories or the nonhandicapped population.

Language minority students who do not meet eligibility criteria for special education services but are not achieving in school when instruction is provided in a nondominant language, may be referred to bilingual education. Refer again to the proposed model of levels of assessment and criteria for decision making at each level discussed in Part 1 of this book.

Placement Alternatives

Using data obtained from both formal and informal assessment is a sound basis for classifying and placing bilingual exceptional students into educational alternatives that meet their needs. Decisions for placement should be guided by professional ethics and guided by available information on the student. All efforts should be made to place each student in the least restrictive environment.

Possible placement alternatives include the regular education, bilingual education, and special education programs. Variations and combinations in these placement alternatives may be used in order to provide an appropriate education. Placement combination possibilities may include: bilingual education with support from special education, bilingual education with remedial reading and English as a second language support services, regular education with a teacher who is bilingual, a bilingual aide or a bilingual tutor, special education with bilingual support services, special education with a teacher who is bilingual, and special education with a bilingual aide, volunteer, or peer tutor.

To a great extent, placement alternatives will vary according to availability of qualified personnel, the number of special students, and the districts' resources in general. Some districts may have adequate facilities and personnel to implement a comprehensive educational program with the required support services. Other districts with a minimal number

of students and with limited personnel but having adequate facilities, may want to share their resources with districts under similar circumstances. Under these conditions, students may have to be transported to designated locations in order to receive appropriate educational services.

Assigning an itinerant teacher the responsibility for several schools within the same district or cooperative school program is another viable program model for a school district with too few pupils to form a self-contained class. This model could provide the students with bilingual or language specialists at least part of the day, either within the students' classroom or in a designated area (Plata & Santos, 1981).

Specific Notes About Bilingual Personnel

While one of the basic problems facing bilingual handicapped pupils is that of inappropriate assessment, these pupils face an equally crucial dilemma in the instructional process. Insufficient numbers of bilingual teachers are available to provide instruction in the students' native language. There is also a lack of teachers adequately trained and knowledgeable about cultural traits of bilingual student populations. In many cases, neither the monolingual English-speaking teacher nor the bilingual teacher is likely to have received during teacher training the intricate, precise training necessary to provide individualized instruction in two languages, develop individualized instructional material in two languages, base instruction on two cultures, and assist handicapped students in maintaining and developing their native language while learning English as a second language.

Additional problems beset the teacher who is bilingual, especially if the first language is other than English. For these teachers, command of the native language is a natural phenomenon, and its daily usage is not usually steeped in translations of technical jargon commonly found in texts, curriculum materials, and classroom settings. Therefore, even the bilingual teacher may face difficulty in providing instruction in the native language. In addition, the bilingual teacher may lack special education training. Another obstacle is the lack of instructional materials in languages other than English. If the bilingual teacher is an outsider to the community, his or her dialect may be different from the local dialects. As a consequence, the bilingual teacher would, first of all, have to gain the acceptance of the bilingual student population. Secondly, the bilingual teacher would need to develop instructional material amenable to the comprehension abilities of bilingual exceptional students who are native to the community.

Programming

The goal of any assessment approach is to obtain information about a student so that teachers may teach them better. As has been discussed in Part 2, most of the informal assessment and other practical approaches described yield specific information about the student that can be used in developing an educational program to meet the student's needs.

Classroom teachers who are in need of information on how to teach bilingual handicapped pupils may rely on results from task analysis and criterion-referenced tests such as informal survey tests and informal skills tests. These assessment approaches yield information specific enough to pinpoint the level of the student's performance, as well as information specific enough to plan what to teach, where to begin teaching, and which subsequent skills should be developed.

Education is a vehicle every society uses to transmit its cultural content. In order to impart this cultural content by the most efficient and effective means possible, teachers need to understand the characteristics and learning styles of students. Some factors that have been known to hinder the process include: the experiential background of the teacher; lack of information on characteristics of different types of students; type of training received by the teacher; motivation and attitude of the teacher to adapt to or seek out new instructional methods and techniques; amount of moral, financial, and technical support given to teachers by parents, administrators, and the community at large.

Among the goals to be realized are those providing equality of opportunity for all individuals, maximizing achievement and productivity, and extending preferential treatment to groups disadvantaged by past inequalities (Anastasi, 1982). Diggs (1974) says: "Teachers must be objective. Since public school opens its doors to all regardless of who they are, what they look like, or where they come from, it is obvious that classroom teachers should seek to be consistent with this policy" (p. 581).

The most frequent teacher variable relating to student success is respect for individuals and their cultural backgrounds. If teachers understand a child's uniqueness, respect the child's individuality, and are familiar with the child's cultural background, they are in a better position to make instructional decisions and to establish an environment conducive to learning.

Johnson, Girard and Miller (1975) found that when high-achieving Mexican American students were instructed by teachers characterized by high cultural bias, their achievement levels dropped significantly compared with other high achieving Mexican American students whose teachers were characterized by low cultural prejudice.

The IEP and the Bilingual Handicapped Student

If the student is eligible for special education services, an individualized education program (IEP) must be developed. For the bilingual exceptional student, information concerning language dominance and language proficiency plays an important part in defining goals, establishing instructional objectives, and determining type and extent of resources to use. The role played by bilingual education personnel (teachers, aides, therapists) in the instructional process is crucial and should be outlined in the IEP.

Cooperative Versus Competitive Instructional Arrangements

Most assuredly the teacher's attitude bears a significant influence on the personal adjustment and academic success of bilingual students who are handicapped.

In cooperative endeavors, as opposed to competitive instructional arrangements, teachers would be advised to keep in mind four points (Galvan & Bordie, 1977) when students are adding new behaviors and attitudes to those already learned.

1. When individuals learn behaviors indigenous to the culture, they typically perpetuate those behaviors that have proved successful in their group. Even though the student's behavior may differ from that of the teacher, it may function very well for the student.

2. Once a student's behavior has been internalized, the teacher should not hope to eradicate any aspects of the culture. Rather, teachers can work toward adding new forms of behavior to the student's repertoire that are more appropriate to new situations the student is facing.

3. New behavior is difficult to learn. It must be built onto whatever is currently practiced and must be repeated over and over in various contexts until it is part of the student's behavior repertoire. Merely telling the student to do something differently will not accomplish the task.

4. Good, sound reasons for mastering a new behavior must be made very clear to the student. People resist learning something for which they see no reason.

Curriculum Content for Bilingual Exceptional Pupils

> Many educators make the erroneous assumption that culturally diverse children lived in a cultural vacuum before they entered school. In truth, often it is the school which fails to match its methods and curriculum to the child's language, cultural background, and learning style. But when the school fails, the child is regarded as deficient. (Chinn, 1979, p. 57)

Traditionally, educational treatment of language minority students has taken a "deficit model" approach. These children are said to lack essential prerequisite skills for effective school learning. As a consequence, a great deal of effort has gone into identification of survival skills. Alley and Foster (1978), however, caution that "procedures to identify and teach competencies required to survive in the majority culture place higher value on the majority group's language and cultural information. Implicit to the procedure, but explicit to the student, is that the language, value system, cultural information, and learning strategies of the minority group are inferior" (p. 6).

It should be added that learning prerequisites cover not only intellectual skills, such as the acquisition of language and quantitative concepts, but also attitudes, interests, motivation, problem-solving styles, reactions to frustrations, self-concepts, and other personality characteristics. All of these traits influence the student's openness to the learning task, the desire to learn it well, the attention given to the teacher, and the time actively devoted to the task. There is evidence that these reactions are significantly related to educational achievement.

One's achievement in school, on the playground, and in other situations helps to shape a person's self-concept and subsequent performance. In this regard, self-concept operates as a sort of private self-fulfilling prophecy.

If educators espouse the value of individual difference and individualized instruction, these beliefs can be translated into the appropriate use of instructional materials, methods and techniques. Grant and Gant (1977) offer the following recommendations for developing and examining classroom material:

1. Reflect the pluralistic nature of our society as a positive feature of our nation's heritage instead of presenting cultural, racial, and individual differences in isolation from each other.

2. Include a wide representation of all cultures and races in all curriculum materials from kindergarten to twelfth grade.

3. Help students recognize and appreciate the racial and cultural contributions of different people to science, education, business, commerce, and fine arts.

4. Teach the cultural, racial, and individual differences of people in our society by using words and phrases that are complimentary and honest, connoting positive attitudes and acceptance of others.

5. Do not restrict the explanation of different cultures to special occasions (e.g., the study of American Indians during Thanksgiving, Blacks during Black History Week, Mexican Americans during Texas Independence Day). Instead, examine real problems and real people, not just heroes and highlights. Portray culturally, racially, and individually different people as displaying various human emotions, toiling and achieving in many aspects of life.

6. Examine the social, economic, and political forces and conditions that optimize or minimize opportunities for individuals on the basis of their race, culture, sex, age, or physical difference.

Instructional materials will continue to play an instrumental part in the education of students. Therefore, it behooves us as classroom teachers to strive to create instructional materials that offer students the most efficient and effective opportunity to learn according to their capacities.

Without question, the school environment will continue to be the most influential factor in the academic, social, and vocational development of bilingual exceptional pupils. To maximize the results of an organized, functional environment for bilingual exceptional pupils, classroom teachers, principals, school boards, publishers, and researchers all must synthesize environmental, behavioral, and instructional facets of the learning process. An environment conducive to learning provides bilingual exceptional pupils an opportunity to expand new relationships and to grow personally despite mental or physical disabilities.

Instruction in Student's Native Language

Bilingual education programs are plagued with public criticism - criticism not only from English-speaking individuals, but also from those whom the program is attempting to serve. In the future, there is no guarantee that criticism will cease even when the schools do attempt to deliver educational services to students who have dual handicaps (Chinn, 1978; Manuel, 1965).

In addition, some bilingual students face adversity in their schooling. These pupils learn very quickly that English, not their native language, dominates their entire school life.

The effects of this phenomenon on a pupil are immediate and deep. Language, and the culture it carries, is at the core of a youngster's self-concept. Especially for young children, language carries the meaning of home, family, and love; it is the instrument of their thinking and feeling, their gateway to the world (Kobrick, 1972).

While many schools provide high quality services, there do exist instances of abuse against bilingual students. Administrators who oppose bilingual education can refuse to employ bilingual personnel, purchase bilingual instructional materials, or adopt policies regarding the treatment of this special population. Instead, they will insist that all children learn to speak English since the curriculum is in English. In some cases, there is little or no constructive effort to help the child learn English and pupils are even punished for speaking their native language.

Bilingual education holds high potential and promise for salvaging students who are non-English speaking and who may have handicapping conditions. Adoption of appropriate intervention acknowledges a student's language and culture and uses these traits to enhance the student's academic and social growth. The philosophy of bilingual education allows for the student's native language to be used as a vehicle of instruction while English is learned as a second language. Theoretically, this philosophy is sound because the transition from home to school and the process of learning to read are difficult enough under the most favorable circumstances (Manuel, 1965). Also, those who would concentrate on teaching a

child English overlook the fact that it takes time for a child unfamiliar with the language to achieve a proficiency in it that even approaches that of a child raised in an English-speaking home (Kobrick, 1972).

Since the goal of school is to educate students, it would be in the best interest of all concerned to offer initial instruction to non-English speakers in the most effective channel available to them at the time they arrive at school. This approach allows the concept of instruction in the least restrictive environment to be operationalized.

It may not always be possible to have bilingual special educators. Therefore the following suggestions are offered for teachers who do not speak the students' native language.

Preparing a Bilingual Lesson

1. Identify the key words in the lesson. Not all words in a lesson are of equal importance. Identify from 10 to 35 crucial English vocabulary words for each lesson, depending on its length or the grade level.

2. Summarize key concepts. If a teacher's manual is available for the lesson, it is a good source for this task. Even if the class presentation involves free discussion, teachers usually know in advance what conclusions will be elicited.

3. Prepare a few relevant sentences. Use the key words in simple English sentences expressing the key concepts. This means avoiding conditional phrases and other complex grammatical structures. It does not imply simplifying the concepts.

4. Translate the key words and relevant sentences into the student's native language. Tape record them in English and in the student's native language. This is the primary reason every teacher with non-English-speaking students needs access to a bilingual speaker. Both oral and written translations are desirable.

5. Practice pronouncing the translation from the tape. Even if a bilingual resource person is readily available, the English-speaking teacher's sincere attempt to use the student's native language is important in establishing an attitude of recognition and acceptance of the student's language.

Teaching a Bilingual Lesson

1. Use the bilingual vocabulary list in identifying objects in pictures.

2. Have bilingual students read the key word and relevant sentence lists in both languages while listening to the tape, then alone.

3. Add questions to the discussion about the pictures that do not require an extensive knowledge of English grammar (e.g., Is this a _____? What is this?).

4. Have students copy sentences in either language to illustrate their story.

5. Use the relevant sentences and substitute words in the student's native language for English words (e.g., The weather is _____ [hot, cold, warm]).

6. When assigning silent reading, put the material on tape (either in English or in the student's native language).

7. Put some of the class discussion questions in a more controlled grammatical framework (e.g., Cars are made of _____. Books are made of _____.).

8. Make use of the exact wording of the key concepts that have been translated into the student's native language when summarizing a lesson with the entire class.

9. When study or review questions are included in a lesson, have them translated into the student's native language along with answers for self-checking. Use a bilingual format so the students can follow class discussion of the questions and answers in English.

These techniques are similar to methods specified for English as a second language (ESL) instruction. The ESL strategies are as follows:

1. Outline key points and major details for each day's lesson.

2. List key vocabulary.

3. Simplify English structure and vocabulary, not concepts.

4. If possible, use bilingual aides to translate and explain major ideas and vocabulary to students.

5. Have students build a bilingual dictionary based on their daily lessons.

6. Encourage group projects so that peer modeling and instruction can be utilized.

7. Provide both verbal and nonverbal activities in each lesson.

8. Limit the amount of time spent on classroom discussion.

9. Provide oral and written instructions for each day's assignment.

10. When possible, use actions to reinforce oral statements.

11. Keep classroom language constant.

12. When questioning a student, begin with yes/no questions, then proceed to wh questions.

13. If possible, arrange for a special grading system: a contract, pass/fail, or a monitoring grade.

14. Be realistic in your expectations, sensitive, and patient.

The Ultimate Charge

Meyen (1978) captures the essence of the complex problems educators face in working with exceptional children from minority groups. He believes that improvement in teacher effectiveness applied to exceptional minority group pupils must be couched in a generally improved instructional climate. This includes needed changes in assessment practices, changes in administrative and fiscal support, increased availability of instructional materials that reflect cultural differences among children, and changes in attitudes of children within the culture mix of the public schools.

To bring about this change, instructional and support personnel must spearhead efforts to implement sound educational practices, including nondiscriminatory assessment in the classroom setting and individualized instruction in the student's native language. Thus, education will accomplish its aim in educating pupils according to their needs. For bilingual exceptional pupils, education's primary goal is to produce a bicultural child who is capable of functioning in both his home culture and in the mainstream of society.

REFERENCES

Alley, G., & Foster, C. Nondiscriminatory testing of minority and exceptional children. Focus on Exceptional Children, 1978, 9(8), 1-16.

Anastasi, A. Psychological testing (5th ed.). New York: Macmillan, 1982.

Anderson, J.E., & Alley, G.R. A comparative study between educably mentally retarded and nonhandicapped children, on visual motor tasks and metamemory self-report performances. Unpublished manuscript, 1977.

Bernal, E.M. Concept learning among Anglo, Black, and Mexican-American children using facilitation strategies and bilingual techniques. Unpublished doctoral dissertation, The University of Texas at Austin, 1971.

Bernal, E.M. Assessment procedures for Chicano children: The sad state of the art. Aztlan, 1979, 8, 69-81.

Bernal, E.M., & Tucker, J.A. A manual for screening and assessing students of limited English proficiency. Paper presented at The Council for Exceptional Children Conference on the Exceptional Bilingual Child, New Orleans, February 1981.

Betts, E.A. Foundations of reading instruction. New York: American Book, 1946.

Bohem, A.E. Criterion referenced assessment for the teacher. Teacher College Record, 1973, 75, 117-126.

Bransford, L.A. Social issues in special education. Phi Delta Kappan, 1974, 55(8), 530-532.

Budoff, M., & Hutton, L. The development of a learning potential measurement based on Raven's Progressive Matrices. Studies in Learning Potential, 1972, 1(18), 20-39.

Calderon, M. Assessing communicative competence. Dallas: Center for Development of Bilingual Curriculum, 1982.

Carver, R.P. Reading tests in 1970 versus 1980: Psychometric versus edumetric. Reading Teacher, 1972, 26, 299-302.

Charles, C. Educational psychology: The instructional endeavor. St. Louis: C.V. Mosby, 1972.

Chinn, P.C. Curriculum development for culturally different exceptional children. Teacher Education and Special Education, 1979, 2(4), 49-58.

Cole, M., & Bruner, J.S. Cultural differences and inferences about psychological processes. American Psychologist, 1971, 26, 867-876.

Davis, F.B. Criterion-referenced testing: A critique. In W. Banton, R. Farr, & J. Truinman (Eds.), Measuring reading performance. Newark DE: International Reading Association, 1974.

De Avila, E.A., & Havassy, B. Piagetian alternative to I.Q.: Mexican American study. In N. Hobbs (Ed.), Issues in the classification of exceptional children (Vol. 2). San Francisco: Jossey-Bass, 1975.

Diggs, R.W. Education across cultures. Exceptional Children, 1974, 40(8), 578-583.

Fishman, J.A., Deutsch, M., Kogan, L., North, R., & Whiteman, M. Guidelines for testing minority group children. The Journal of Social Issues, 1964, 20(2), 127-145.

Flavell, J.H. Developmental studies of mediated memory. In L.P. Lipsitt & H. Reese (Eds.), Advances in child development and behavior. New York: Academic Press, 1975.

Galvan, M.M. & J.G. Bordie. Accutrack Texas Criterion-Referenced System for Oral Language: A manual for administering the test. Unpublished manuscript, 1977.

Gerken, K.C. Performance of Mexican-American children on intelligence tests. Exceptional Children, 1978, 44, 438-443.

Gerry, M.H. Cultural myopia: The need for a corrective lens. Journal of School Psychology, 1973, 11(4), 307-315.

Gonzales, G. Language, culture, and exceptional children. Exceptional Children, 1974, 40(8), 565-570.

Grant, C.A., & Grant, G.W. Instructional materials in multicultural education. In C.A. Grant (Ed.), Multicultural education: Commitments, issues, and applications. Washington DC: Association for Supervision and Curriculum Development, 1977.

Grolund, N.E. Measurement and evaluation in teaching. New York: Macmillan, 1976.

Howell, K.W., Kaplan, J.S., & O'Connell, C.Y. Evaluating exceptional children. Columbus OH: Charles E. Merrill, 1979.

Johnson, E.B., Girard, H.B., & Miller, N. Teacher influence in the desegregated classroom: Factors mediating the school desegregation experience. In H.B. Girard & N. Miller (Eds.), School desegregation. New York: Plenum, 1975.

Johnson, M.S., & Kress, R.A. Informal reading inventories. Newark DE: International Reading Association, 1965.

Kagan, S., & Burial, R. Field dependence-independence and Mexican American culture and education. In J.L. Martinex, Jr. (Ed.), Chicano psychology. New York: Academic Press, 1977.

Karmel, L.J. Measurement and evaluation in the schools. London: McMillan, 1970.

Kirk, S.A., Kliebhan, J.M., & Lerner, J.W. Teaching reading to slow and disabled learners. Boston: Houghton Mifflin, 1978.

Kobrick, J.W. The compelling case for bilingual education. Saturday Review, 1972, 55(18), 54-58.

Laosa, L.M. Bilingualism in these United States Hispanic groups: Contextual use of language by children and adults in their families. Journal of Educational Psychology, 1975, 67, 617-627.

Mager, R.F. Preparing instructional objectives (2nd ed.). Belmont CA: Fearon, 1975.

Manuel, H.T. Spanish-speaking children of the southwest: Their education and welfare. Austin: The University of Texas Press, 1965.

McLoughlin, J.A., & Lewis, R.B. Assessing special students: Strategies and procedures. Columbus OH: Charles E. Merrill, 1981.

Mercer, J.R. Labeling the mentally retarded. Berkeley: University of California Press, 1973.

Meyen, E.L. Exceptional children and youth. Denver CO: Love, 1978.

Mowder, B.A. A strategy for the assessment of bilingual handicapped children. Psychology in the Schools, 1980, 17(1), 7-11.

Oakland, T. Non-biased assessment of minority group children. Exceptional Education Quarterly, 1980, 3, 31-46.

Oakland, T., & Matuszek, P. Using tests in nondiscriminatory assessment. In T. Oakland (Ed.), Psychological and educational assessment of minority children. New York: Brunner/Mazel, 1977.

Plata, M. Criterion-referenced assessment for individual learning. Social Policy, 1977, 8(2), 52-55.

Plata, M. Preparing teachers for the Mexican American handicapped: The challenge and the charge. Teacher Education and Special Education, 1979, 2(4), 21-27.

Plata, M., & Santos, S.L. Bilingual special education: A challenge for the future. TEACHING Exceptional Children, 1981, 14(3), 97-100.

Popham, W.J., & Husek, T.R. Implications of criterion-referenced measurement. Journal of Educational Measurement, 1969, 6(1), 1-9.

Sattler, J.M. Assessment of children's intelligence and special abilities. Boston: Allyn and Bacon, 1982.

Saville-Troike, M. A guide to culture in the classroom. Rosslyn VA: National Clearinghouse for Bilingual Education, 1978.

Swanson, E.N., & DeBlassie, R. Interpreter effects on the WISC performance of first grade Mexican American children. Measurement and Evaluation in Guidance, 1971, 4(31), 172-175.

Swanson, H.L., & Watson, B.L. Educational and pyschological assessment of exceptional children: Theories, strategies, and applications. St. Louis: C.V. Mosby, 1982.

Tucker, J.A. Nineteen steps for assuring nonbiased placement of students in special education. Reston VA: ERIC Clearinghouse on Handicapped and Gifted Children, The Council for Exceptional Children, 1980.

Wallace, G., & Kauffman, J.M. Teaching children with learning problems (2nd ed.). Columbus OH: Charles E. Merrill, 1981.

Wallace, G., & Larsen, S.C. Educational assessment of learning problems: Testing for teaching. Boston: Allyn and Bacon, 1979.

Wallace, G., & McLoughlin, J.A. Learning disabilities: Concepts and characteristics. Columbus OH: Charles E. Merrill, 1975.

Wormer, F.S. What is criterion-referenced measurement? In W. Banton, R. Farr, & J. Truinman (Eds.). Measuring reading performance. Newark DE: International Reading Association, 1974.

Zigler, E., & Butterfield, E.C. Motivational aspects of changes in I.Q. test performance of culturally deprived nursery school children. Child Development, 1968, 39, 1-14.

APPENDIX A

Profile of Oral Language Proficiency

Name of student _____ Date of evaluation _____

Name of interviewer _____ Name of instructor _____

Most recent level of instruction _____

I. COMPREHENSION

___Understands everything; no adjustments in speed or vocabulary are needed; understands conversation between native speakers.
___Can understand all educated speech in any moderately clear context; occasionally baffled by colloquialisms and regionalisms.
___Understands most of what is said to him; can follow speeches, clear radio broadcasts, and most conversation between native speakers, but not in great detail.
___In general, understands nontechnical speech directed to him, but sometimes misinterprets or needs utterances reworded. Usually cannot follow conversation between native speakers.
___Usually requires repetitions, slowed rate of speech; understands only very simple, short, familiar utterances.

II. GRAMMAR AND WORD ORDER

___Control equal to that of an educated native speaker.

___Makes only occasional errors, and these show no pattern of deficiency.

___Good control of most basic syntactic patterns; always conveys meaning accurately in reasonably complex sentences; errors do not interfere with communication; may use unidiomatic constructions.
___Fair control of most basic syntactic patterns; conveys meaning accurately in simple sentences most of the time; certain constructions are avoided because candidate does not yet control them.
___Accuracy limited to set expressions; almost no productive control of syntax; often conveys misinformation; frequently uses the wrong tense.

III. VOCABULARY

___Equal to vocabulary of an educated native speaker. Knows regionalisms, and the slang that may be current among his peers.
___Professional and general vocabulary broad and precise, appropriate to occasion; does not know regionalisms and other obscure items that an educated native speaker would know.
___Adequate for participation in all general conversation and for professional discussions in a special field.
___Adequate for simple social conversation and routine job needs.
___Adequate only for survival, travel, and basic courtesy needs.

IV. PRONUNCIATION

___Speaks with little or no trace of a foreign accent.
___Pronunciation readily understandable, but one is always conscious of a definite accent.
___Strong foreign accent (vowels, consonants, stress and intonation) necessitates concentrated listening and occasionally leads to misunderstandings; words or sentences must sometimes be repeated.
___Examinee is very hard to understand; definitely needs more training in pronunciation.

V. FLUENCY (Evenness of delivery and average length of utterance.

___Evenness of delivery and sentence length are those of a native speaker.
___Evenness and length seem slightly limited by language difficulties, but examinee is always able to sustain conversation through circumlocutions and his hesitations do not detract noticeably from his message.
___Both evenness of delivery and length of utterance are noticeably affected by language difficulties and limitations, but conversation with him is not deterred.
___Evenness of delivery and length of utterance are so far from normal as to make conversation quite difficult; except for memorized expressions, every utterance requires enormous, obvious effort.

Adapted from Calderon, M. Assessing communicative competence. Dallas: Center for Development of Bilingual Curriculum, 1982, p. 22.