

Technical Report

Bracken

Basic Concept Scale—Revised

Bruce A. Bracken

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Overview

The *Bracken Basic Concept Scale—Revised* (BBCS-R) is used to assess the basic concept development of children ages 2 years, 6 months through 7 years, 11 months.

A revision of the *Bracken Basic Concept Scale* originally published in 1984, BBCS-R measures the comprehension of 308 functionally relevant educational concepts in 11 subtests or concept categories. The first six categories comprise the School Readiness Composite (SRC), which can be used to assess children’s knowledge of the concepts that parents and preschool and kindergarten teachers traditionally teach children to prepare them for formal education.

BBCS-R is a developmentally sensitive measure of children’s basic concept acquisition and receptive language skills. The scale enables you to assess important conceptual and receptive language abilities in children rather than only their knowledge of common vocabulary. The concepts assessed are acquired in a developmentally predictable way that is consistent across cultures and languages studied.

The test is individually administered, and the concepts are presented orally within the context of complete sentences and visually in a multiple-choice format.

Revisions in the New Edition

BBCS was revised to improve the scale by updating the norms and stimulus materials while retaining the favorable features of the test. In response to customer surveys, literature reviews, and other sources, the following changes were made:

- The pictures were updated and presented in full color in a larger stimulus manual.
- Children and adults depicted in the Stimulus Manual were balanced in terms of gender and race/ethnicity.
- Subtests were rearranged so that the Sizes subtest became part of the SRC.
- New items were added to all subtests to enhance the range of ability assessment.
- Items were moved from one subtest to another.
- The Social/Emotional subtest was renamed Self-/Social Awareness.
- Item stem wording was revised for consistency across subtests.
- The procedure for obtaining a basal was simplified.

Use of BBCS-R

The BBCS-R English edition serves five basic assessment purposes: speech-language assessment, cognitive screening, curriculum-based assessment, school readiness screening, and assessment for clinical and educational research. The test is particularly useful as part of a comprehensive speech-language assessment:

- As an independent measure of a child's concept acquisition
- For addressing the receptive component when contrasting a child's receptive and expressive language skills
- For examining the relationship between a child's language development and his or her cognitive functioning when used in conjunction with other tests

- For pairing assessment results with specific intervention strategies (i.e., after assessing a child's receptive concept knowledge with BBCS-R, you may choose to remediate identified concept deficits using the *Bracken Concept Development Program*)

The BBCS-R English edition provides several important indices of student performance: raw scores, scaled scores, standard scores, percentile ranks, concept age equivalents, and normative conceptual classifications.

Description of Subtests

The 11 BBCS-R subtests include the following concept categories presented in their order on the test:

1. **Colors**—represents both primary colors and basic color terms.
2. **Letters**—measures knowledge of both upper- and lowercase letters.
3. **Numbers/Counting**—measures recognition of single- and double-digit numbers and samples the ability to assign a number value to a set of objects.
4. **Sizes**—includes concepts that describe one, two, and three dimensions.
5. **Comparisons**—measures ability to match and/or differentiate objects based on one or more of their salient characteristics.
6. **Shapes**—includes one-, two-, and three-dimensional shapes. The one-dimensional category includes linear shapes; two-dimensional shapes are represented by concepts such as the circle, square, and triangle; and three-dimensional shapes include concepts such as the cube and pyramid.
7. **Direction/Position**—includes relational terms that describe the placement of one object relative to another, the position of an object relative to itself or an unspoken second object, or a direction of placement.
8. **Self-/Social Awareness**—represents a conceptual domain measured infrequently by preschool and primary language scales. Included in the self-awareness aspect are concepts with emotional value, while the social awareness aspect includes terms describing kinship, gender, relative ages, and social appropriateness.
9. **Texture/Material**—includes terms that describe salient characteristics or attributes or the basic composition of an object.
10. **Quantity**—measures understanding of terms that describe a relative degree of existence.
11. **Time/Sequence**—measures understanding of occurrences along a temporal or sequential continuum and the degree of speed and/or order with which those events occur on the continuum.

Bias Review

A panel of speech-language pathologists and psychologists with expertise in multicultural and/or minority issues reviewed test items, administration directions, and stimulus pictures for potential gender,

race/ethnicity, class, cultural, and regional bias. Based on feedback from panel members, changes to the items were incorporated into the standardization version.

Bias Panel Members

Andrea Canter, Ph.D.
Lead Psychologist
Minneapolis Public School District
Minneapolis, MN

Li Rong Lilly Cheng, Ph.D.
Assistant Dean of the Global Developmental Program
San Diego State University
San Diego, CA

Deborah Peek Crockett, Ph.D.
School Psychologist
Atlanta Public School District
Atlanta, GA

Henriette W. Langdon, Ed.D.
Bilingual Speech-Language Pathologist
Private Practice
Cupertino, CA

Theresa C. Liu, Ph.D.
School Psychologist
Milwaukee Public School District
Milwaukee, WI

Betty Nunnery, M.S.
Speech-Language Pathologist
Adams Twelfth School District
Westminster, CO

Salvador Hector Ochoa, Ph.D.
Associate Professor of Psychology
Texas A&M University
College Station, TX

Toya Wyatt, Ph.D.
Associate Professor
Calstate-Fullerton
Fullerton, CA

Standardization Sample

The standardization and related validity and reliability research for BBCS-R took place in the fall of 1997 and involved 1,100 children between the ages of 2 years, 6 months and 8 years, 0 months. The standardization sample was representative of the general U.S. population, stratified by age, gender, race/ethnicity, region, and parent education level based on the 1995 U.S. Census update for children ages 2 years, 6 months to 8 years, 0 months.

More than 180 examiners, including speech-language pathologists,

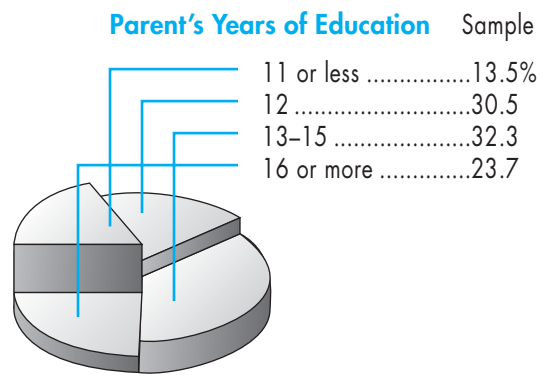
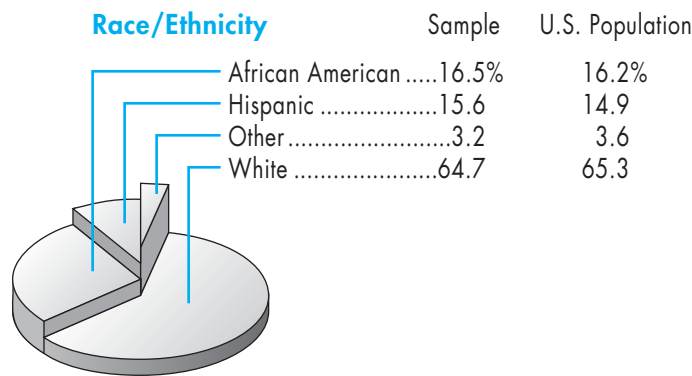
psychologists, early childhood educators, licensed professional counselors, child development specialists, educational diagnosticians, teachers, graduate assistants, and doctoral students, participated in the BBCS-R standardization validation.

The sample was collected in 3-month age intervals from 2 years, 6 months to 6 years, 0 months to capture the rapid language changes expected at these early ages and in 6-month intervals for ages 6 years, 0 months to 8 years, 0 months.

Age in years and months	2.6 to 2.8	2.9 to 3.1	3.0 to 3.2	3.3 to 3.5	3.6 to 3.8	3.9 to 4.1	4.0 to 4.2	4.3 to 4.5	4.6 to 4.8	4.9 to 5.1	5.0 to 5.2	5.3 to 5.5	5.6 to 5.8	5.9 to 6.1	6.0 to 6.5	6.6 to 6.11	7.0 to 7.5	7.6 to 7.11	Total
Number	50	50	50	50	50	50	50	50	50	50	50	50	50	50	100	100	100	100	1,100

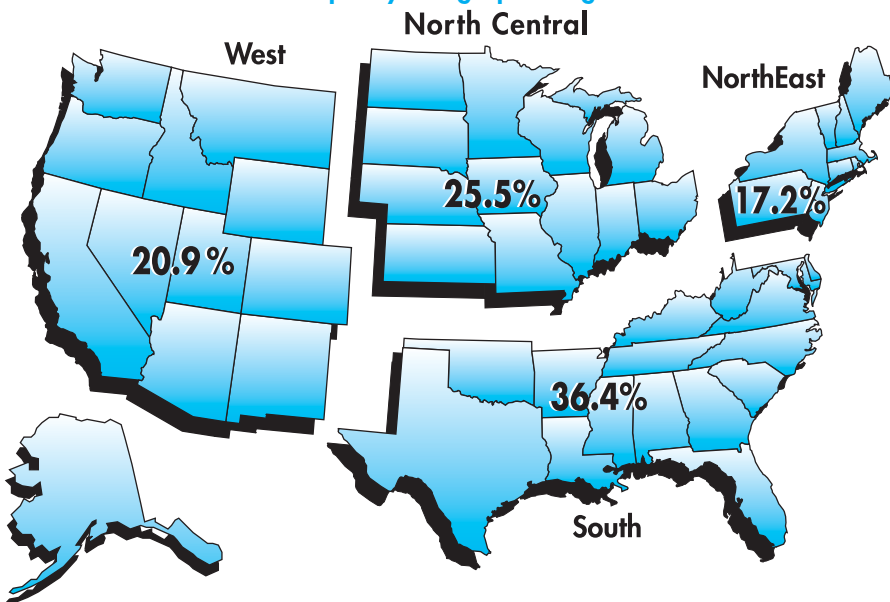
Children were not excluded from the standardization sample if they were receiving special education services or services as gifted and talented students. As a result, 4% of the standardization sample consisted of children who were classified as having attention deficit disorder (ADD), attention deficit/hyperactivity disorder (ADHD),

autism, developmental delay, learning disability, other health impairment, or speech/language delay or disorder. In addition, 1.7% of the standardization sample included children receiving gifted and talented services. Some children with severe disabilities were excluded because of the qualification to take the test without modifications.



1995 Census of Population Update, U.S. Department of Commerce, Bureau of the Census. Figures are based on the population survey of March 1995 for children ages 2 years, 0 months through 7 years, 11 months.

Sample by Geographic Region



Clinical Samples

Two clinical studies were conducted during the standardization sampling. Participation in the clinical studies required the children to be between the ages of 3 years, 0 months and 6 years, 0 months.

The 36 participants in the study of children with developmental delays had been identified previously with a cognitive deficit as well as a delay in one or more areas, such as motor skills, social skills, or communication skills. The 37 participants in the study of children with language disorders had cognitive abilities within the average range and had been previously diagnosed with a language disorder with a receptive component. Most of these children also had an expressive component to their language disorder and had been diagnosed with an articulation disorder.

Spanish Edition Overview

The Spanish edition of the *Bracken Basic Concept Scale-Revised* is adapted from the English edition and is used to assess the same concepts. However, the Spanish edition is used as a criterion-referenced or curriculum-based measure only because the field research conducted with the instrument involved a small sample. The Spanish edition Record Form is designed for use with the English edition Stimulus Manual.

A native speaker of Spanish translated the 55 new items included in the BBCS-R English standardization edition and reviewed the translation of the original edition items. A multinational panel of native, bilingual Spanish speakers familiar with Spanish spoken in Mexico, Puerto Rico, Central America, South America, Cuba, and the Southwestern United States then reviewed all items. The reviewers' goal was to make all items as similar as possible to the English items, using wording in Spanish that tests the same basic concepts.

Two experts in multicultural assessment and Spanish-language issues then reviewed the test materials:

Andres Barona, Ph.D.
Director of the School of Psychology Training Program
Arizona State University
Tempe, AZ

Luis F. Riquelme, M.S., CCC-SLP
Bilingual Speech-Language Pathologist
Assistant Professor
Long Island University/Brooklyn Campus
Co-Director, Riquelme & Santo, PC
Brooklyn, NY

Description of the Spanish Edition Sample

A total of 193 Spanish-speaking children ages 2 years, 6 months to 7 years, 11 months participated in the study. The examiners reported that 98% were Spanish dominant, while English and Spanish were spoken in 47% of the children's homes. One child was receiving

services for an articulation disorder. Because the research sample was small, it was not stratified by gender, region, or parent education level. All children in the sample were Hispanic.

Summary

The *Bracken Basic Concept Scale-Revised* has been carefully prepared to help you assess the basic concept development of young children. It can be used to assess children's knowledge of "readiness" concepts and is developmentally sensitive to children's basic concept acquisition and receptive language skills.

The test has undergone stringent quality control measures in the standardization process, including precautions to ensure that items are fair to all students. Careful review by professionals assures that ethnic and gender bias have been eliminated.

