# TABLE OF CONTENTS

<table>
<thead>
<tr>
<th>Section</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>TABLE OF CONTENTS</td>
<td>Page</td>
</tr>
<tr>
<td>Table of Contents – Assessments</td>
<td>iv</td>
</tr>
<tr>
<td><strong>INTRODUCTION</strong></td>
<td></td>
</tr>
<tr>
<td>The BRIGANCE® Family of Products</td>
<td>vii</td>
</tr>
<tr>
<td>Introduction to the IED III Standardised</td>
<td></td>
</tr>
<tr>
<td>Overview</td>
<td>viii</td>
</tr>
<tr>
<td>How the IED III Standardised Supports Your Program</td>
<td>ix</td>
</tr>
<tr>
<td>Standardisation and Validation</td>
<td>x</td>
</tr>
<tr>
<td>Step-by-Step Assessment Procedures</td>
<td></td>
</tr>
<tr>
<td>Step 1: Get Ready for Assessment</td>
<td>xi</td>
</tr>
<tr>
<td>Step 2: Administer the Assessments</td>
<td>xiv</td>
</tr>
<tr>
<td>Step 3: Record Results in the Standardised Record Book</td>
<td>xvii</td>
</tr>
<tr>
<td>Step 4: Analyse Results</td>
<td>xxii</td>
</tr>
<tr>
<td>Step 5: Identify Next Steps</td>
<td>xxv</td>
</tr>
<tr>
<td>Evaluating Children with Special Considerations</td>
<td></td>
</tr>
<tr>
<td>Children Kept Back a Year</td>
<td>xxvii</td>
</tr>
<tr>
<td>Bilingual and Non-English-Speaking Children</td>
<td>xxviii</td>
</tr>
<tr>
<td>Children with Exceptionalities</td>
<td>xxviii</td>
</tr>
<tr>
<td><strong>APPENDICES</strong></td>
<td></td>
</tr>
<tr>
<td>Appendix A: History of BRIGANCE®</td>
<td>158</td>
</tr>
<tr>
<td>Appendix B: Acknowledgements</td>
<td>159</td>
</tr>
<tr>
<td>Appendix C: Determining Rounded Chronological Age</td>
<td>160</td>
</tr>
<tr>
<td>Appendix D: Assessments to Administer by Age Range</td>
<td>161</td>
</tr>
<tr>
<td>Appendix E: BRIGANCE® Program-level Implementation Decisions</td>
<td>164</td>
</tr>
<tr>
<td>Appendix F: References</td>
<td>165</td>
</tr>
<tr>
<td>Appendix G: Standardisation Study Sites</td>
<td>169</td>
</tr>
</tbody>
</table>
# Table of Contents – Assessments

## A PHYSICAL DEVELOPMENT: GROSS MOTOR

<table>
<thead>
<tr>
<th>Assessments</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>A-1 Early Gross Motor Skills</td>
<td>3</td>
</tr>
<tr>
<td>A-2 Standing</td>
<td>7</td>
</tr>
<tr>
<td>A-3 Walking, Skipping and Galloping</td>
<td>9</td>
</tr>
<tr>
<td>A-4 Jumping and Hopping</td>
<td>11</td>
</tr>
<tr>
<td>A-5 Stair Climbing</td>
<td>13</td>
</tr>
<tr>
<td>A-6 Rolling, Throwing and Catching</td>
<td>15</td>
</tr>
</tbody>
</table>

## B PHYSICAL DEVELOPMENT: FINE MOTOR

<table>
<thead>
<tr>
<th>Assessments</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>B-1 Early Fine Motor Skills</td>
<td>20</td>
</tr>
<tr>
<td>B-2 Builds Tower with Blocks</td>
<td>24</td>
</tr>
<tr>
<td>B-3 Visual Motor Skills</td>
<td>25</td>
</tr>
<tr>
<td>B-4 Draws a Person</td>
<td>30</td>
</tr>
<tr>
<td>B-5 Prints Personal Information</td>
<td>31</td>
</tr>
<tr>
<td>B-6 Writes Numerals in Sequence</td>
<td>32</td>
</tr>
<tr>
<td>B-7 Prints Uppercase Letters in Sequence</td>
<td>33</td>
</tr>
<tr>
<td>B-8 Quality of Printing</td>
<td>34</td>
</tr>
</tbody>
</table>

## C LANGUAGE DEVELOPMENT: RECEPTIVE AND EXPRESSIVE

<table>
<thead>
<tr>
<th>Assessments</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>C-1 Early Receptive Language Skills</td>
<td>41</td>
</tr>
<tr>
<td>C-2 Early Expressive Language Skills</td>
<td>45</td>
</tr>
<tr>
<td>C-3 Identifies Pictures</td>
<td>49</td>
</tr>
<tr>
<td>C-4 Identifies Parts of the Body (Receptive)</td>
<td>54</td>
</tr>
<tr>
<td>C-5 Understands Verbal Concepts</td>
<td>56</td>
</tr>
<tr>
<td>C-6 Follows Verbal Directions</td>
<td>60</td>
</tr>
<tr>
<td>C-7 Knows Uses of Objects</td>
<td>63</td>
</tr>
<tr>
<td>C-8 Identifies Colours (Receptive)</td>
<td>66</td>
</tr>
<tr>
<td>C-9 Repeats Sentences</td>
<td>69</td>
</tr>
<tr>
<td>C-10 Identifies Parts of the Body (Expressive)</td>
<td>71</td>
</tr>
<tr>
<td>C-11 Identifies Colours (Expressive)</td>
<td>73</td>
</tr>
<tr>
<td>C-12 Verbal Fluency</td>
<td>75</td>
</tr>
<tr>
<td>C-13 Articulation</td>
<td>77</td>
</tr>
<tr>
<td>C-14 Uses Grammar and Language in Context</td>
<td>79</td>
</tr>
</tbody>
</table>

## D ACADEMIC SKILLS/COGNITIVE DEVELOPMENT: LITERACY

<table>
<thead>
<tr>
<th>Assessments</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>D-1 Experience with Books and Text</td>
<td>85</td>
</tr>
<tr>
<td>D-2 Recites Alphabet</td>
<td>89</td>
</tr>
<tr>
<td>D-3 Visual Discrimination</td>
<td>90</td>
</tr>
<tr>
<td>D-4 Identifies Uppercase Letters</td>
<td>92</td>
</tr>
<tr>
<td>D-5 Familiarity with Sounds: Phonological Awareness</td>
<td>94</td>
</tr>
<tr>
<td>D-6 Auditory Discrimination</td>
<td>97</td>
</tr>
<tr>
<td>D-7 Familiarity with Sounds: Phoneme Manipulation</td>
<td>100</td>
</tr>
<tr>
<td>D-8 Reads Words from Common Signs</td>
<td>103</td>
</tr>
<tr>
<td>D-9 Word Recognition</td>
<td>104</td>
</tr>
</tbody>
</table>
# ACADEMIC SKILLS/COGNITIVE DEVELOPMENT: MATHEMATICS

<table>
<thead>
<tr>
<th>Assessments</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>E-1 Understands Number Concepts</td>
<td>108</td>
</tr>
<tr>
<td>E-2 Counts by Rote</td>
<td>110</td>
</tr>
<tr>
<td>E-3 Compares Different Amounts</td>
<td>111</td>
</tr>
<tr>
<td>E-4 Sorts Objects (Size, Colour, Shape)</td>
<td>113</td>
</tr>
<tr>
<td>E-5 Matches Quantities with Numerals</td>
<td>115</td>
</tr>
<tr>
<td>E-6 Reads Numerals</td>
<td>116</td>
</tr>
<tr>
<td>E-7 Solves Word Problems</td>
<td>117</td>
</tr>
<tr>
<td>E-8 Knows Missing Numerals in Sequences</td>
<td>119</td>
</tr>
<tr>
<td>E-9 Adds Numbers</td>
<td>120</td>
</tr>
<tr>
<td>E-10 Subtracts Numbers</td>
<td>123</td>
</tr>
</tbody>
</table>

# SOCIAL AND EMOTIONAL DEVELOPMENT

<table>
<thead>
<tr>
<th>Assessments</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>G-1 Relationships with Adults (younger than 3 years)</td>
<td>141</td>
</tr>
<tr>
<td>G-2 Play and Relationships with Peers (younger than 3 years)</td>
<td>143</td>
</tr>
<tr>
<td>G-3 Motivation and Self-Confidence (younger than 3 years)</td>
<td>145</td>
</tr>
<tr>
<td>G-4 Prosocial Skills and Behaviours (younger than 3 years)</td>
<td>147</td>
</tr>
<tr>
<td>G-5 Relationships with Adults (3 years to 7 years)</td>
<td>149</td>
</tr>
<tr>
<td>G-6 Play and Relationships with Peers (3 years to 7 years)</td>
<td>151</td>
</tr>
<tr>
<td>G-7 Motivation and Self-Confidence (3 years to 7 years)</td>
<td>153</td>
</tr>
<tr>
<td>G-8 Prosocial Skills and Behaviours (3 years to 7 years)</td>
<td>155</td>
</tr>
</tbody>
</table>

# ADAPTIVE BEHAVIOUR: DAILY LIVING

<table>
<thead>
<tr>
<th>Assessments</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>F-1 Eating</td>
<td>127</td>
</tr>
<tr>
<td>F-2 Dressing and Undressing</td>
<td>130</td>
</tr>
<tr>
<td>F-3 Toileting and Bathing</td>
<td>133</td>
</tr>
<tr>
<td>F-4 Knows Personal Information</td>
<td>135</td>
</tr>
</tbody>
</table>
The BRIGANCE® Family of Products

SPECIAL EDUCATION

Meet your requirements and address student needs from birth to secondary school:
- Determine present level of performance
- Develop IEP goals and objectives
- Monitor student progress
- Support transition planning

EARLY CHILDHOOD

Help children become school-ready by developing the skills they need to succeed at school:
- Identify potential developmental delays as well as giftedness
- Monitor child progress toward school readiness goals
- Target instruction for key skills based on assessment results
Introduction to the **IED III Standardised**

**OVERVIEW**

The *BRIGANCE® Inventory of Early Development III Standardised*, or *IED III Standardised*, is a selection of 55 key assessments that span the critical domains of child development and learning. The valid, reliable and well researched developmental assessments of the *IED III Standardised* have been standardised and validated on a normative sample of children from birth to seven years of age.

**INFORMATION ABOUT A CHILD’S SKILL MASTERY**

The *IED III Standardised* produces a complete range of information about a child's early developmental and academic skill mastery.

Results from administered assessments of the *IED III Standardised* produce a variety of scores, including standard scores, percentiles and age equivalents in the following domains:

- Physical development (gross motor and fine motor)
- Language development (receptive and expressive)
- Academic skills/cognitive development (literacy and mathematics)
- Adaptive behaviour (daily living)
- Social and emotional development (interpersonal and self-regulatory)

Because the skills within assessments are sequenced from the earliest mastered skills to more difficult ones, a child's present level of performance can be pinpointed along a skill continuum. Results from administered assessments allow professionals to identify a child's strengths and needs within and across these domains (skill areas). And because the *IED III Standardised* is norm-referenced, professionals can compare a child's mastery of skills to that of other children of the same age across these skill areas. Therefore, the *IED III Standardised* meets common assessment requirements and can be used as the educational and developmental portion of a battery that identifies children with potential developmental or learning delays, language impairment, advanced development and other exceptionalities.

**KEY FEATURES OF THE IED III STANDARDISED**

- The *Standardised Record Book* provides a specific and easily communicated system for recording a child’s performance for each assessment.
- The *Standardised Scoring Sheet*, included in the *Standardised Record Book*, provides a concise review of the child’s performance for all assessments.
- The *Total Developmental Score*, included in the *Standardised Record Book*, reflects the child's overall performance in all skill areas.
- The *Developmental Profile*, also included in the *Standardised Record Book*, provides an easy-to-interpret visual representation of a child's strengths and needs across skill areas.
- The *IED III Standardisation and Validation Manual* provides information on deriving standardised (normative) scores as well as details on the validity and reliability of the *IED III Standardised* assessments.
- The *BRIGANCE® Online Management System* provides a means for tracking and reporting individual and group progress. (Subscription rates apply.)

The *IED III Standardised* is well-positioned to support your program needs and to help teachers and program directors:

- determine present level of performance, areas of strength and need, and instructional objectives.
- derive a range of standardised (normative) scores to support reporting needs.
- communicate normative scores to parents/caregivers.
- support referrals for further evaluation or special services and/or to confirm a diagnosis.
- monitor individual and group progress, using the *BRIGANCE® Online Management System*. (Subscription rates apply.)

Some programs will need to make specific program-level decisions about how the *IED III Standardised* will be implemented. See the chart in Appendix E: BRIGANCE® Program-level Implementation Decisions on page 164 for questions to consider.

The *IED III* is broadly consistent with the *Belonging, Being & Becoming: The Early Years Learning Framework for Australia*, which stipulates that assessing children’s learning refers to the process of gathering and analysing information as evidence about what children know, can do and understand, as part of an ongoing cycle of planning, documenting and evaluating their learning.
HOW THE IED III STANDARDISED SUPPORTS YOUR PROGRAM

The IED III Standardised can help your program determine school readiness and effectively support the success of children with and without special needs. The IED III Standardised is an invaluable resource for early childhood and primary school programs responsible for addressing many requirements. Specifically, the IED III Standardised supports programs that are required to

- provide standardised (normative) scores in key developmental domains.
- determine a child’s specific strengths and needs.
- identify instructional objectives.
- communicate results with parents/caregivers.

PROVIDE STANDARDISED SCORES IN KEY DEVELOPMENTAL DOMAINS
The IED III Standardised produces standard scores, percentiles and age equivalents in the following domains, which correlate with common early learning, academic and content standards.

- Physical Development
- Language Development
- Academic Skills/Cognitive Development
- Adaptive Behaviour
- Social and Emotional Development

DETERMINE A CHILD’S STRENGTHS AND NEEDS
The IED III Standardised is ideal for identifying a child’s individual strengths and needs. Because the skills within assessments gradually increase in difficulty, a child’s present level of performance can be pinpointed along the skill continuum.

The IED III Standardised can also be used to identify a child’s performance across skill areas. By looking at a child’s overall performance, it is possible to see if the child has strengths and needs in one skill area relative to another (e.g. the child has well-developed gross motor skills but shows some delay in social and emotional skills). It is also possible to see if the child has strengths and needs within a particular skill area (e.g. the child has strong receptive language skills but limited expressive language skills). This information can be valuable in identifying developmental delays as well as advanced development, determining school readiness, making referrals, confirming a diagnosis or developing a child’s IEP.

IDENTIFY INSTRUCTIONAL OBJECTIVES
Assessments in the IED III Standardised provide instructional objectives that help teachers and parents/caregivers identify appropriate next steps for instruction. Educators can tailor these objectives to a child’s specific needs and use the identified instructional objectives to write IEPs or IFSPs. If instructional objectives are required on locally developed forms, the customisable objectives provided in both the IED III Standardised and the BRIGANCE® Online Management System can be used.

COMMUNICATE RESULTS WITH PARENTS/CAREGIVERS
The Developmental Profile, found on page 37 of the IED III Standardised Record Book, can be a useful tool in reporting standardised assessment results to family members. Standard scores (composite scores) for key skill areas are plotted on a graph to create a visual representation of the child’s strengths and needs. This graph can easily be shared with parents/caregivers. See the example of a completed Developmental Profile shown below.
Standardisation and Validation

Built on more than thirty years of research and experience in child development, the IED III Standardised is a highly accurate, reliable and valid assessment tool. Selected assessments from the criterion-referenced Inventory of Early Development III were standardised and validated on a U.S. nationally representative geographic, demographic and socioeconomic sample. Teachers can confidently compare a child to the U.S. national sample to help set goals that focus on academic success.

The assessments in the IED III Standardised were standardised in 2012. The standardisation study was conducted on a large, geographically diverse sample of 2416 children whose families are representative of the United States (U.S.) population, in terms of ethnicity, gender and family socioeconomic status. As a result of this strong research base, results from administered IED III Standardised assessments reliably identify those children with delays, those who are advanced in development and those who are developing at a typical rate.

The IED III Standardised is a highly reliable and valid tool. The overall scores have:

- outstanding internal consistency (0.78–0.95).
- a high degree of inter-rater and test-retest reliability (0.80–0.97).
- substantial content validity. Assessment items selected by a pool of educators and psychologists were drawn from research and other measures. The IED III Standardised also demonstrates desirable age-related trends: younger children score lower on assessments than older children.
- substantial construct validity. The IED III Standardised factor structure is confirmed.
- excellent concurrent validity. Assessments are highly correlated with a variety of criterion measures.
- a high degree of discriminant validity. Children with disabilities and children without disabilities score differently on the IED III Standardised. The IED III Standardised is non-discriminatory with regard to ethnicity and gender but is responsive to psychosocial risk factors.
- standard errors of measurement and mean that can be used to determine confidence intervals and instructional ranges respectively, which can guide appropriate curricular materials for individualised instruction.

Standardisation means that

- the directions for administration and for scoring have been field-tested and are explicitly stated so that the test can be administered in exactly the same way by different examiners.
- the more than 2000 children to whom the test was administered represent the geographic regions of the U.S. and the demographic characteristics of the U.S. population as a whole.
- the scores generate normative results or “norms” that are reflective of average performance and also capture the range of performance. Thus, standardisation enables those who use the IED III Standardised to confidently compare each child tested to the U.S. national sample.

For detailed information on the standardisation and validation study, see Chapters 5–7 of the IED III Standardisation and Validation Manual.
Step-by-Step Assessment Procedures

STEP 1: GET READY FOR ASSESSMENT

PLAN AHEAD
To administer the IED III Standardised effectively and efficiently, it is critical that examiners
• spend time becoming familiar with the directions and scoring procedures before administering the assessments to a child.
• practise administration several times before administering the assessments to a child.
• administer the IED III Standardised in strict accordance with the directions given for each assessment.

The following guidelines can help you plan ahead for successful assessment.

Become familiar with the assessment procedures so that you can conduct the assessment in a natural manner and focus your attention on the child. If helpful, mark pages you will use so that you can quickly locate the information you will need.

Schedule assessment early in the day, reducing the chance that the child will be hungry or tired. When a comprehensive assessment is needed, plan for several sessions, each session no longer than the child’s attention span.

Choose the proper environment. The assessments in the IED III Standardised can be administered in different settings (e.g. a child care centre, a preschool, a primary classroom). When planning where to administer assessments, consider the child’s comfort level and behavioural readiness. Most children do not mind working individually with a teacher in a classroom, but others may be self-conscious or easily distracted. Use discretion in deciding if the child can be tested in a classroom setting or if a more private setting would be preferable. Test in the classroom only when other children are not engaged in exciting or noisy activities.

Eliminate distractions. Administer the assessments in an environment free of background noises or disturbances and remove any materials that may distract the child.

Postpone or reschedule testing if the child is not well or if testing requires the child to miss a special event, such as an excursion or a performance.

SELECT ASSESSMENTS
Follow the guidelines below, knowing that assessments may be administered in any order.

Decide Which Assessments to Administer
Assessments within a skill area are sequenced developmentally. For example, in skill areas that have assessments appropriate for infants and toddlers, those assessments come at the beginning of the section. Each assessment provides at least one Entry indicating the age of a child for which the assessment or items within the assessment are appropriate.

Not all assessments are administered to every child. The number of assessments you will administer within a specific skill area is based on the child’s age. See Appendix D, page 161, for a chart of age-appropriate assessments in each skill area.

If one skill area (domain or sub-domain) is of primary or immediate concern, you may wish to administer the age-appropriate assessments related only to that skill area. For example, if the child’s fine motor skills are in question, administer all age-appropriate assessments that make up the Fine Motor Skills sub-domain. In the Introduction of each section, a chart of assessments to administer by age range is provided for that specific skill area.

When deciding which specific assessments to administer, use your professional judgment and keep the following questions in mind:
• Which assessments are most relevant to the immediate concern or reason for referral?
• Which assessments are likely to yield the most valuable information within the time allowed?
• Which assessments can best be conducted in a particular setting?
• Which assessments meet your program needs and requirements?
**DETERMINE ROUNDED CHRONOLOGICAL AGE**
To derive normative scores, you must first determine the child’s rounded chronological age. To determine rounded chronological age by hand, see the directions in Appendix C on page 160.

**RECORD CHILD DATA IN THE STANDARDISED RECORD BOOK**
Before conducting the assessment, write the child’s name on the cover of the child’s *Standardised Record Book* and complete the Child Information section on page iv. The information should be current and should clearly identify the child. Use official records to confirm the accuracy of the information.

**Mark likely entry points in the Standardised Record Book.** To ensure that the child is not presented with unnecessary items and that the assessment is completed in a reasonable amount of time, suggested entry points are provided. An Entry indicates the age of the child for which the assessment or items within the assessment are appropriate and provides an entry point (the item with which to begin the assessment) for that specific age. Based on the age of the child with whom you are working, mark an entry point for each assessment you plan to administer to the child.

Entry points are typically below expected performance for chronological age to ensure that children give, wherever possible, an initial series of correct responses. This series of correct responses (called the basal) gives the child a positive initial experience and allows normative scores to be produced. Most children can and do give the required correct responses for this initial series of items (called establishing the basal). For the very youngest or delayed children, a series of correct responses may not be possible, but even in these rare instances, normative scores can still be produced.

(For further information about entry points and basals, see pages xiv and xviii.)

---

**Select the Most Appropriate Item with Which to Begin an Assessment**
The items within assessments are sequenced developmentally, where possible. Suggested entry points help ensure that a child gives a series of correct responses to the first items administered and, therefore, experiences initial success.

Based on your knowledge of the child, you may skip ahead to a later entry point or begin at an earlier entry point than the one suggested, given the child’s chronological age. For instance, if developmental delays are suspected, select an entry point appropriate for a younger child.

**Select the Most Appropriate Assessment Method to Use**
The *IED III Standardised* offers three assessment methods:

- Observation
- Interview
- Performance

Specific assessment methods are indicated for each assessment. Some assessments are administered using one specific method. For other assessments, a choice is given. If more than one method is listed, choose the method or methods that will make the child most comfortable and that will be the most convenient and efficient to produce valid results in your particular situation. (For further information about assessment methods, see page xv.)

**Anticipate Administration Time**
Administration time will vary, depending on the child’s age and whether you plan to administer all age-appropriate assessments or only those in selected skill areas. For example, if administering all age-appropriate assessments, the battery requires, on average, between 30 minutes (for infants and toddlers) and 60 minutes (for most five- to seven-year olds). Less time is needed if only selected assessments are administered.

To ensure that the child is rested and optimally cooperative, administration may take place in multiple sessions; however, assessment should be limited to only a few sessions, preferably on consecutive days. Shorter sessions are recommended for very young children.
ORGANISE MATERIALS

Gather and organise all materials required for the assessments you are administering. This will allow you to focus your attention on the child and on administering the assessments.

To administer the assessments, you will need:

- The IED III Standardised
- The child’s Standardised Record Book

The following materials, which are included in the IED III Box of Materials, are needed for administering some assessments in the IED III Standardised:

- A squeaking toy
- A rattle
- 12 2.5-cm coloured blocks
- 2 regular pencils
- 2 primary pencils
- A box of crayons
- 12 small discs (counters)
- 16 shapes (circles and squares) for sorting
- Blank sheets of paper for covering distracting items on a child page

Additional materials you may need include:

- A picture book with at least 3 lines of text on each page
- A few sheets of paper (the type commonly used in your program)
- A timer or watch with a second hand
- A copy of age-appropriate child pages

Some assessments include child pages for the child’s written responses. For these assessments, provide the child with a copy of the child page.
STEP 2: ADMINISTER THE ASSESSMENTS

PURPOSE OF STANDARDISED ASSESSMENT
Standardisation means that each time an assessment is administered, it is administered in the same way, with every child and by every examiner. It is important when administering standardised assessments that you administer the assessments in exactly the same manner, using the same prescribed directions and language with every child. It is also important that the scoring of items be consistent (i.e. the determination of whether a child receives credit for an item must be consistent for all children).

Remember that the purpose of assessment is to determine a child’s individual strengths and needs and can invalidate assessment results.

Prompting, giving unnecessary encouragement, or providing unscripted demonstrations can do the child a disservice by concealing the child’s actual strengths and needs and can invalidate assessment results.

POSITIONING THE IED III STANDARDISED CORRECTLY
The format of the IED III Standardised allows the examiner and the child to follow the assessment procedures easily. For those assessments that have an accompanying child page (i.e. a page with illustrations for the child or parent/caregiver), the IED III Standardised can be opened to the assessment and placed on a table between the examiner and the child as shown below.

ASSESSMENT PROCEDURES
To administer the standardised assessments correctly and to derive valid normative scores (standard scores, percentiles and age equivalents), you must follow the instructions exactly.

Before beginning an assessment, read all information on the first page of the assessment. Make special note of the Scoring Information (Entry, Basal and Ceiling). Then follow the specific Directions for Assessment given for that assessment.

Each assessment provides at least one Entry. An Entry indicates the age of a child for which the assessment or items within the assessment are appropriate and provides an entry point (item with which to begin the assessment) for that specific age. Administer those assessments with an Entry at or below the child’s age. For assessments that provide only one Entry, begin with item 1. For assessments with more than one Entry, begin with the item indicated for the child’s age. With very advanced children, you may wish to begin at a later Entry than the one suggested. With children who are developing more slowly, you may wish to start at an earlier Entry. It is best not to administer an assessment to a child younger than the first entry age unless you are confident the child is able to demonstrate the skills in the assessment.

If, after beginning testing at the suggested Entry, the child does not receive credit for an initial short series of items (the Basal), drop back to an earlier Entry (if there is one) and, beginning with the item indicated, attempt to establish a basal.

The assessment can be discontinued when a child gives incorrect responses for a short series of items (the Ceiling). The ceiling is the point within the developmental sequence of items in the assessment at which you can assume the child would not receive credit for any later items. After discontinuing an assessment (once a ceiling is reached), you can begin the next assessment, if you have another to administer.
ASSESSMENT METHODS
There are three assessment methods for administering assessments in the IED III Standardised – Observation, Interview and Performance. Some assessments are administered using one method. For other assessments, a choice of methods is given. If more than one method is listed for administering an assessment, choose the method or methods that will make the child most comfortable and that will be the most convenient and efficient to produce valid results in your particular situation. Specific assessment methods are indicated on the first page of each assessment.

• Observation
Some assessments can be administered by observing the child in a natural setting. For younger children, you may wish to observe first. Familiarise yourself with the items you will be administering by reading through them several times. Spend some time interacting with the child and then, if possible, record the child’s performance on those items you observed. For example, you may observe the child’s ability to grasp an object; you may observe the child’s vocalisations and movements. After you have recorded data for as many items as possible, interview the parent/caregiver or administer the remaining items directly to the child, depending on the assessment methods listed on the assessment.

For older children, observations in a natural setting provide you with the unique opportunity of observing the child performing a skill consistently and at the appropriate times. For example, if you observe that the child consistently catches a thrown tennis ball with both hands, give credit for this skill in the child’s Standardised Record Book.

If you observe that the child’s skill mastery is marginal, emerging or inconsistent, do not give credit.

• Interview
Some assessments can be administered by interviewing the parent/caregiver or someone who knows the child well (e.g. the child’s teacher). For these assessments, specific questions are included. It is important that you use the prescribed directions and exact wording provided. When responding to an interview question, parents/caregivers often report on a child’s emerging but not yet mastered skills by giving answers such as “sometimes”, “if I let him”, “a little”. Give credit only for skills the parent/caregiver or teacher can ensure the child is performing most of the time. It is important that the determination of whether a child receives credit for a skill is consistent for all children.

• Performance
Performance (administering items directly to the child for the child’s response) is the only assessment method used to assess some skills. For example, this assessment method is the only method used to assess a child’s mastery of mathematics skills.

When working with the child, read directions and questions in a natural manner. Remember to remain objective. Extra assistance given to a child during assessment may influence the child’s performance and could invalidate the results.

Pace the items in the assessments so that the child has enough time to perform the skill but not so much time that the child becomes bored waiting for the next direction.

ESTABLISHING RAPPORT
Children are generally slow to warm up to and cooperate with unfamiliar people. They may refuse to answer questions, attempt to leave the testing area, become fearful or tearful, or alternately grab for test materials or play with toys they brought with them. To establish rapport with the child during the assessment session, consider the suggestions in this section.

Guiding Desirable Behaviour
The following suggestions may help make the assessment process more comfortable, enjoyable, and even fun, for both you and the child and/or parent/caregiver.

• If a parent/caregiver is present, engage the parent/caregiver first. Talking with the parent (or caregiver) makes both the parent and the child comfortable. This may be an opportune time to find out which skills parents think may be strengths for their child and which skills may be weaknesses. This is also a good time to discuss with parents what works in terms of managing challenging behaviour. To establish and maintain rapport and cooperation, it is important to begin testing with the child’s strengths and to have strategies for handling challenging behaviours.
Handling Undesirable Behaviour

The following suggestions may help if the child becomes upset or refuses to participate.

- **Take a break or stop the assessment and reschedule** if the child becomes upset or cries and cannot be soothed.
- **Offer choices** if the child refuses to participate in the assessment process. For example, say, “Would you like to play with blocks first or use the crayon?”
- **Switch to another task** if the child refuses to engage in a particular assessment. After the child feels more secure, return to the earlier assessment.
- **Drop back to an earlier Entry (if there is one) and begin assessment with the item indicated** if the child is initially reluctant to respond to items in an assessment.

Because children generally enjoy demonstrating skills they have mastered, inconsolable behaviour or a great number of refusals may be an indication of developmental or behaviour problems. Of course, refusals can also indicate the child’s reaction to assessment items that are difficult for him/her.

- **Create a friendly, non-threatening assessment environment.** Make sure there is ample seating for the child (and parent, if present) and that the space is quiet and well lit. Smile and be welcoming. Thank the child beforehand for participating. Explain to the child that you will be presenting several different kinds of games and tasks. Explain that it is not expected for the child to give all correct responses. Ask the child to do the best that he/she can.

- **Use clear but pleasant requests** such as, “Come with me. We are going to look at a book and play with some blocks.” Do not ask if the child would like to participate since any subsequent refusals can be challenging.

- **Incorporate “wiggle breaks”.** Because it is unlikely that young children can remain seated throughout the assessment, “wiggle breaks” should be interspersed among assessment items. Take cues from the child’s behaviour to determine appropriate breaks or stretching times. It is acceptable to move to the floor and to show the child how to stretch his/her arms and legs.

- **Introduce tasks as “games” rather than as tests.** Present assessment items rapidly, but not so rapidly that the child feels rushed.

- **Use verbal reinforcement** and show interest and enthusiasm in the child’s effort. Phrases such as “Good job” and “Way to go” are appropriate since they do not indicate that the child’s response was correct or incorrect. Be careful to remain objective. Do not show feelings of disappointment when the child gives an incorrect response or feelings of satisfaction when the child is doing well.

- **Use stickers to reinforce the child’s effort.** You may wish to give a sticker between assessments (after the child finishes an assessment and before the child begins the next). Be careful to give stickers throughout the assessment process, not only when the child has success with items within the assessment.

- **Set time expectations for the child.** To help the child understand how long the assessment session will be, you may wish to have the child turn the dial of a timer to a predetermined point that represents a specific amount of time. Base the amount of time on the number of assessments you plan to administer and how long you feel the child can stay engaged. Explain to the child that when the timer goes off, you will stop the assessment and he/she will have a chance to play or take a break.
PRECAUTIONS WHEN ADMINISTERING ASSESSMENTS

Remember that the purpose of assessment is to determine a child’s individual strengths and needs in each of the five developmental domains by allowing the child to demonstrate what he/she can do and what he/she knows.

- Prompting, giving unnecessary encouragement or providing unscripted demonstrations can mask the child’s actual strengths and needs and can invalidate the child’s assessment results, making it challenging to detect a child with difficulties.
- Do not give the child reminders. It can be tempting for an examiner or teacher to provide reminders as a form of encouragement, such as “You know this. We did it yesterday.” Reminders may cause the child to give a response that is not representative of his/her knowledge or abilities, potentially invalidating the child’s assessment results.
- Avoid gazing at the correct choice. Occasionally a child is alert to where the examiner is looking and will use this as a cue to responding. If the child gives a correct response based on where the examiner is looking, performance may be inflated.
- Eliciting responses for items above the ceiling is permissible only for instructional planning. Do not give credit for any item above the ceiling; this may inflate scores and may mask detection of developmental delays or academic weaknesses. (For further information about performance above the ceiling, see page xix.)
- Some children feel anxious when they see an examiner recording performance. Place the Standardised Record Book on your lap so that it is out of the child’s line of vision.
Adhere to Basal and Ceiling Rules

Basal and ceiling rules are used to ensure efficient assessment, keeping administration as short as possible while providing high-quality and accurate information about the child’s skill mastery. All assessments have basal and ceiling rules. As you mark the child’s responses to assessment items, be careful to adhere to the basal and ceiling rules for the assessment.

Basals: Ideally, a child should give correct responses (receive credit) for a short series of initial items, usually two to five items in a row. This series of correct responses is called the basal. The basal is the point in the assessment at which you can be confident the child would receive credit for all earlier items. If the child does not reach a basal following the entry point, drop back to an earlier Entry (if there is one) and administer items until a basal is established. If the basal rule for an assessment is Basal: None, begin with item 1. When a basal is established, the child RECEIVES CREDIT FOR ALL ITEMS BELOW THE BASAL.

Marking the Basal

Each assessment has a unique basal rule. In the example below, the basal for the assessment is five correct or yes responses in a row. Mark basals in the child's Standardised Record Book as shown below.

- O = receives credit
- / = does not receive credit
- // = the basal (the required number of responses in a row for which the child receives credit, where possible)

STEP 3: RECORD RESULTS IN THE STANDARDISED RECORD BOOK

Record the child’s responses in the Standardised Record Book as you administer assessments. Then compute and transfer the raw score for each assessment to the Standardised Scoring Sheet (found on page 29 of the Standardised Record Book) and summarise the child’s standardised scoring data.

Follow the instructions below to record the child’s performance in the Standardised Record Book and the child’s scores on the Standardised Scoring Sheet.

1. RECORD THE CHILD’S RESPONSES TO ITEMS IN THE STANDARDISED RECORD BOOK

As you administer an assessment from the IED III Standardised, record the child’s responses to assessment items on the appropriate page of the child’s Standardised Record Book. Circle the number of an item for which the child receives credit; slash through the number of an item for which the child does not receive credit.

Observe the child’s general demeanour as you administer an assessment. Based on your observations, you may wish to record additional information about the child. For example, you may observe that the child squints when looking at a child page or appears to have difficulty hearing over background noise. Record such observations in the NOTES section that follows each assessment in the child’s Standardised Record Book.

The Standardised Record Book is designed to support two administrations. If you plan to use the IED III Standardised for progress monitoring, the child’s performance for the second administration can be recorded in the back half of the Standardised Record Book. For further information about progress monitoring, see page xxvi.

Use Age-Appropriate Entries as Guidelines

Using the suggested age-appropriate Entry helps you begin an assessment with an item that will ideally ensure initial success for the child. It also helps ensure that a child is not presented with unnecessary items. Based on your knowledge of the child, you may select a higher or lower Entry than that indicated by the child’s chronological age. You may select a lower Entry if the child exhibits substantial developmental or academic delay. You may select a higher Entry if the child exhibits advanced development.

Sometimes a child does not receive credit for every item before establishing a basal and then establishes a basal on more difficult items. In this case, GIVE CREDIT FOR ALL ITEMS BELOW THE BASAL for the purposes of deriving scores. However, for instructional purposes, note the items for which the child did not receive credit; the child may later need review and practice on these lower-level skills.
Marking the Ceiling

In the example below, the ceiling for the assessment is five incorrect or no responses in a row. Mark the ceiling and record performance above the ceiling in the child’s Standardised Record Book as shown below.

- - receives credit
/ - does not receive credit
// - the basal (the required number of responses in a row for which the child receives credit, where possible)
/// - ceiling (the required number of items in a row for which the child does not receive credit before discontinuing)

Two Basals or Two Ceilings

Some children will obtain a false basal or a false ceiling – meaning there are two basals or two ceilings. If this happens, use as the true basal the one that is closest to the ceiling; use as the true ceiling the one that is closest to the basal. On extremely rare occasions, both a false basal and a false ceiling occur. When this happens, use the higher of the two ceilings, but note this for instructional purposes because it suggests that the child needs review and practice with lower-level skills.

2. COMPUTE A RAW SCORE FOR EACH ASSESSMENT

Once you have completed the standardised administration of items and marked the child’s responses in the child’s Standardised Record Book, count the number of items for which the child received credit (i.e. circled item numbers) including all items below the basal. Do NOT count any items above the ceiling (even those for which the child demonstrates mastery). Any items that are mastered above the ceiling can be used for instructional purposes only, and should not be factored into the child’s raw score.
3. TRANSFER RAW SCORES TO THE STANDARDISED SCORING SHEET
After computing a raw score for each administered assessment, transfer the raw scores to the Standardised Scoring Sheet that begins on page 29 of the Standardised Record Book. The Standardised Scoring Sheet is used to organise and summarise the child's standardised scoring data.

4. DERIVE STANDARD SCORES, PERCENTILES, AGE EQUIVALENTS AND INSTRUCTIONAL RANGES
Derive standardised scores by using the tables in the Appendices of the BRIGANCE® IED III Standardisation and Validation Manual. See Chapter 3 of the IED III Standardisation and Validation Manual for detailed instructions on deriving standardised scores by hand.

Scores can be derived for all sub-domains and domains for which there are age-appropriate assessments. See Appendix D: Assessments to Administer by Age Range on page 161 for charts that show the specific assessments to administer by age range within sub-domains. Review the Entry information for each identified assessment to see if it is appropriate for the child's age.

For an explanation of each type of normative score, see page xxiii. For a full discussion of normative scores, see Chapter 4 of the IED III Standardisation and Validation Manual.

5. RECORD STANDARDISED SCORES ON THE STANDARDISED SCORING SHEET
Once you have derived standard scores (scaled scores and composite scores), percentiles, age equivalents and instructional ranges for the appropriate sub-domains and domains, record this information in the appropriate spaces on the Standardised Scoring Sheet. See a completed example on page xxi.

6. COMPUTE THE TOTAL DEVELOPMENTAL SCORE
The Total Developmental Score offers an overall view of the child's development across skill areas. To compute a Total Developmental Score, you must have scores for all skill areas with age-appropriate assessments. For most age levels, you must have scores for all five domains. (For 0–11 months, you will not have scores for the Literacy and Mathematics sub-domains. For 12–23 months, you will not have a score for the Mathematics sub-domain.)

The Total Developmental Score can be computed automatically using the BRIGANCE® Online Management System or by hand-scoring following the instructions in Chapter 3 of the IED III Standardisation and Validation Manual. See a completed example on page xxi.

7. COMPLETE THE OPTIONAL DEVELOPMENTAL PROFILE
Once you have completed the Standardised Scoring Sheet, you can plot the standard scores (sub-domain composite scores) on the Developmental Profile found on page 37 of the Standardised Record Book. The Developmental Profile serves as a useful tool to communicate the child's assessment performance to parents and caregivers. See a completed example of the Developmental Profile on page xxii.
# IED III Standardised Scoring Sheet and Total Developmental Score

## A PHYSICAL DEVELOPMENT: GROSS MOTOR

### ASSESSMENTS

<table>
<thead>
<tr>
<th>SUBDOMAIN</th>
<th>RAW SCORE</th>
<th>SCALeD SCORe</th>
</tr>
</thead>
<tbody>
<tr>
<td>A-1 Early Gross Motor Skills</td>
<td>20/20</td>
<td>11</td>
</tr>
<tr>
<td>A-2 Standing</td>
<td>4/9</td>
<td>10</td>
</tr>
<tr>
<td>A-3 Walking, Skipping and Galloping</td>
<td>6/12</td>
<td>10</td>
</tr>
<tr>
<td>A-4 Jumping and Hopping</td>
<td>3/8</td>
<td>11</td>
</tr>
<tr>
<td>A-5 Stair Climbing</td>
<td>10/10</td>
<td>13</td>
</tr>
<tr>
<td>A-6 Rolling, Throwing and Catching</td>
<td>2/4</td>
<td>8</td>
</tr>
</tbody>
</table>

**TOTAL RAW SCORE** 45/63  
**TOTAL SCALED SCORE** 63

**COMPOSITE SCORE: GROSS MOTOR**

## B PHYSICAL DEVELOPMENT: FINE MOTOR

### ASSESSMENTS

<table>
<thead>
<tr>
<th>SUBDOMAIN</th>
<th>RAW SCORE</th>
<th>SCALeD SCORe</th>
</tr>
</thead>
<tbody>
<tr>
<td>B-1 Early Fine Motor Skills</td>
<td>20/20</td>
<td>11</td>
</tr>
<tr>
<td>B-2 Builds Tower with Blocks</td>
<td>7/11</td>
<td>9</td>
</tr>
<tr>
<td>B-3 Visual Motor Skills</td>
<td>9/16</td>
<td>11</td>
</tr>
<tr>
<td>B-4 Draws a Person</td>
<td>5/13</td>
<td>10</td>
</tr>
<tr>
<td>B-5 Prints Personal Information</td>
<td>0/3</td>
<td>8</td>
</tr>
<tr>
<td>B-6 Writes Numerals in Sequence</td>
<td>10/10</td>
<td>10</td>
</tr>
<tr>
<td>B-7 Prints Uppercase Letters in Sequence</td>
<td>26/26</td>
<td>10</td>
</tr>
<tr>
<td>B-8 Quality of Printing</td>
<td>8/8</td>
<td>8</td>
</tr>
</tbody>
</table>

**TOTAL RAW SCORE** 41/107  
**TOTAL SCALED SCORE** 49

**COMPOSITE SCORE: FINE MOTOR**

## TOTAL DOMAIN: PHYSICAL DEVELOPMENT

<table>
<thead>
<tr>
<th>SUBDOMAIN</th>
<th>TOTAL RAW SCORE</th>
<th>COMPOSITE SCORE</th>
<th>SE&lt;sub&gt;m&lt;/sub&gt;</th>
<th>CONFIDENCE INTERVAL</th>
<th>PERCENTILE</th>
<th>AGE EQUIVALENT</th>
<th>INSTRUCTIONAL RANGE</th>
</tr>
</thead>
<tbody>
<tr>
<td>GROSS MOTOR</td>
<td>45/63</td>
<td>99</td>
<td>5</td>
<td>95 - 106</td>
<td>53</td>
<td>3-3</td>
<td>± 0.1 3-2 - 3-4</td>
</tr>
<tr>
<td>FINE MOTOR</td>
<td>41/107</td>
<td>103</td>
<td>5</td>
<td>98 - 108</td>
<td>58</td>
<td>3-3</td>
<td>± 0.1 3-2 - 3-4</td>
</tr>
</tbody>
</table>

**SUM OF GROSS AND FINE MOTOR** 86/170

<table>
<thead>
<tr>
<th>DOMAIN</th>
<th>TOTAL DEVELOPMENTAL SCORE</th>
<th>SE&lt;sub&gt;m&lt;/sub&gt;</th>
<th>CONFIDENCE INTERVAL</th>
<th>PERCENTILE</th>
<th>AGE EQUIVALENT</th>
<th>INSTRUCTIONAL RANGE</th>
</tr>
</thead>
<tbody>
<tr>
<td>PHYSICAL DEVELOPMENT</td>
<td>98</td>
<td>3</td>
<td>95 - 101</td>
<td>46</td>
<td>3-1</td>
<td>± 0.1 3-0 - 3-2</td>
</tr>
</tbody>
</table>

**TOTAL DEVELOPMENTAL SCORE** 98

### Directions: Computing Total Developmental Score

1. Transfer Total Raw Scores and Composite Scores from each domain to the summary table below.
2. To compute the Total Developmental Score, proceed with the following steps:
   - Sum the Domain Composite Scores to a Total of Domain Composites.
   - Turn to Appendix D and locate the appropriate page for the child’s age.
   - Locate the Sum of Domain Scores on the appropriate page of Appendix D and identify the corresponding Total Developmental Score.
3. Transfer the Total Developmental Score to the appropriate space on the table below.
4. To compute the confidence interval, percentile, age equivalent and instructional range for the Total Developmental Score, refer to steps 8 and 9 on page 29 of the scoring sheet.

**TOTAL DEVELOPMENTAL SCORE** 98

### Example of a Completed IED III Standardised Scoring Sheet and Total Developmental Score
Developmental Profile

- Physical Development: Gross Motor
- Physical Development: Fine Motor
- Language Development: Receptive Language
- Language Development: Expressive Language
- Academic Skills: Literacy
- Academic Skills: Mathematics
- Adaptive Behaviour: Daily Living
- Social and Emotional Development: Interpersonal
- Social and Emotional Development: Self-Regulatory

Average Range:
- 140
- 130
- 120
- 110
- 100
- 90
- 80
- 70
- 60
- 50
- 40

Example of a Completed Developmental Profile
STEP 4: ANALYSE RESULTS

The IED III Standardised provides assessment results in the form of normative scores. The interpretation of a child's assessment results (normative scores) is based on a comparison of the child's performance to the performance of a U.S. nationally representative sample of same-aged children. When interpreting a child's assessment results, it is important to understand each of the standardised, or normed, scores generated.

Normative scores (standard scores, percentiles, age equivalents and instructional ranges) are generated from a child's raw scores. Raw scores reflect the total number of assessment items for which the child receives credit. Because different assessments have different numbers of items, a child's raw scores cannot be compared across assessments or across skill areas and therefore have little meaning by themselves. In addition, raw scores fail to factor in the impact of age and experience. The conversion of raw scores to normative scores overcomes these problems.

TYPES OF NORMATIVE SCORES

Standard Scores
Standard scores, also known as quotients, scaled scores or composite scores, are normative scores that enable teachers to compare a child's performance across skill areas to that of same-aged children. A child's raw score for an individual assessment is converted to a scale with a mean (or average) of 10 points and a standard deviation of 3 points. A scaled score of 10 indicates that, based on the performance of same-aged children in the normative sample, the child's performance is average for his or her age. A scaled score of 13 indicates the child is performing above average (one standard deviation above the mean), and a scaled score of 7 indicates the child is performing below average (one standard deviation below the mean).

The standard score (composite score) for a sub-domain or domain has a mean of 100 points and a standard deviation of 15 points. A composite score of 100 indicates that, based on the performance of same-aged children in the normative sample, the child's performance is average for his or her age. A score of 115 indicates the child is performing above average (one standard deviation above the mean), and a score of 85 indicates the child is performing below average (one standard deviation below the mean).

Percentiles
A percentile is a score between 0.1 and 99.9 that reflects a child's performance in relation to the normative sample. A percentile rank tells you the percentage of scores within the normative sample that fall below the child's score. For example, a percentile rank of 20 means that 20% of same-aged children within the U.S. national sample scored below this point.

Age Equivalents and Instructional Ranges
Raw scores can also be converted to age equivalents, which reflect the average age of children who achieve a particular score. Age equivalents are often reported to give an indication of a child's performance compared to other children at a particular age. An age equivalent score indicates the median score for children of that given age.

Despite the seeming ease with which age equivalents can be explained, use caution when considering these scores. Age equivalents are commonly misinterpreted normative scores given their lack of precision and uniformity across ages. For example, the difference between performance of a 1-year, 0-month old and a 1-year, 11-month-old is quite large, but the difference between the 5-year, 0-month old and the 5-year, 11-month old is much less substantial. Thus, even minor discrepancies between the child's chronological age and age-equivalent score must be considered seriously for younger children, but may be less meaningful for older children.

Finally, when considering age equivalents, be aware that these scores are not generated based on developmental or academic standards, but rather in comparison to average performance of same-aged peers in the normative sample. As such, these scores do not take into account the developmental needs of the individual child. For example, a 10-year-old with an overall age-equivalent score of 6-0 is quite different from a 4-year-old with an age equivalent score of 6-0. Each of these children will learn very differently and need quite different instructional supports, as one (i.e. the 10-year-old) is functioning at a low level compared to same-aged peers and one (i.e. the 4-year-old) is functioning at a high level compared to same-aged peers. Parents who try to interpret these findings to imply that their child should be receiving intervention or instruction appropriate for an average 6-year-old are mistaken.

Age-equivalent scores can assist with the selection of curricular content and materials, particularly when these scores are reported as a range. However, these scores should not be used for making diagnostic or placement decisions. The standard scores (composite scores) are more accurate in terms of capturing a child's ability.
Age equivalents can also be reported as instructional ranges. Instructional ranges are calculated by adjusting the age-equivalent score with an appropriate confidence interval. Banding scores with confidence intervals has helpful implications for instruction. Teachers should interpret the instructional range as a general indicator, especially with older children, due to the uneven properties of age equivalents. For a complete discussion of issues pertaining to age equivalents, see Chapter 4 of the IED III Standardisation and Validation Manual.

**Total Developmental Score**

The Total Developmental Score reflects the child’s overall performance. This score is considered a summation of performance in the physical development, language development, academic skills/cognitive development, adaptive behaviour, and social and emotional development domains.

**FACTORS THAT MAY IMPACT PERFORMANCE**

If the child’s assessment results are lower than expected, it is important to consider factors that may have influenced the child’s performance. You may wish to analyse observations that were noted in the child’s Standardised Record Book at the time of assessment. Sometimes observations about how a child performs reveal much about the presence or absence of learning strengths and needs. Consider factors such as health, environment and culture when deciding the most likely reason for the child’s performance, when identifying skill areas of apparent need, and when making appropriate follow-up decisions.

- **Physical Limitations**
  Physical limitations, such as poor vision or hearing, can cause a delay in the development of some skills, which can impact performance. A child administered assessments just prior to the onset of an illness or just after an illness may perform at a lower level than usual. Poor nutrition or an imbalance in body chemistry can cause a child to be lethargic or hyperactive, resulting in poor performance.

- **Undiagnosed Disabilities or Psychosocial Risk**
  Common reasons for poor performance are undiagnosed disabilities or substantial psychosocial risk factors. Record and report relevant observations regarding these concerns and make appropriate referrals for services or additional testing.

- **Poor Testing Conditions**
  Uncomfortable room temperature, noise, visual distractions or poor lighting may prevent a child from performing well. In addition, if a child finds the assessment atmosphere uncomfortable, feels discouraged or unmotivated, or is tired, the child’s performance may suffer. If you feel that the assessment conditions influenced the child’s performance, consider conducting the assessment again at a later date.

- **Language or Cultural Barriers**
  A child from a home in which English is not the primary language may not understand what responses are expected. Whenever possible, assessment should be conducted by personnel fluent in the primary language of the child and knowledgeable of the child’s cultural background.

The linguistic and cultural background of the child’s parents/caregivers should be considered when deciding if assessment results truly represent the developmental ability of the child. A parent/caregiver may be limited in his/her understanding and use of English and therefore during an interview may have difficulty fully describing the child’s abilities and behaviours. Professional judgment should be used in determining to what degree a child’s performance was affected by language or cultural differences.
STEP 5: IDENTIFY NEXT STEPS

The information gathered from administering assessments in the IED III Standardised and deriving normative scores can serve many purposes. Many early childhood, primary and special education programs use this information to:

- make appropriate referral decisions.
- determine when to provide additional assessment with the criterion-referenced IED III.
- identify present level of performance.
- identify instructional objectives.
- monitor progress.
- share results.

MAKE APPROPRIATE REFERRAL DECISIONS

Referrals for further evaluation may be made after analysing assessment results across skill areas (domains and sub-domains). For example, delays in fine motor skills or gross motor skills may indicate the need for a physical or occupational therapy evaluation. Expressive or receptive language weakness may indicate the need for a speech-language evaluation. Developmental or learning delays across multiple skill areas may suggest the need for evaluation by a developmental psychologist.

In addition, when making recommendations for further evaluation, consider the presence of psychosocial risk factors (e.g. parents/caregivers with less than a high-school education, parents/caregivers with limited literacy, or a child's history of domestic abuse or violence). It may be necessary to distinguish psychosocial risk factors from other potential issues or factors that may have influenced an at-risk child's performance.

Referral Decisions for Bilingual Children

It is important for those making referral decisions to recognise that:

- bilingualism often contributes positively to cognitive development.
- bilingualism can cause mild delays in language acquisition in both languages. If, however, acquisition is substantially delayed in both languages, a language disorder should be suspected. Testing in both languages is required to discern the presence of disorder or substantive delay.

- bilingualism does not contribute to native language difficulties in articulation or in expressive syntax. There is some debate about whether bilingual children typically mix different languages in the same sentence. Mixing different languages is most prevalent in communities in which combination vocabulary is common (e.g. border towns between the U.S. and Mexico). Difficulties in articulation or in expressive syntax in the child’s native language suggest the presence of cognitive delays or language disorders.

- below-average performance is rarely due to bilingualism alone. A child may not only be bilingual but may also have psychosocial risk factors (e.g. limited parental education, single parent status, parental mental health problems, authoritarian parenting style, large family size, minority status, frequent household moves and poverty) that adversely affect performance (Sameroff et al., 1987). Such risk factors, in the absence of intervention, may have an enduring and problematic impact on a child’s skill acquisition, particularly in academic areas.

- because the standardisation of the IED III Standardised assessments included bilingual children, bilingual children with no psychosocial risk factors who were tested in their native language and perform below average should be referred for further evaluation.

PROVIDE ADDITIONAL ASSESSMENT WITH THE IED III

There may be a need to provide more in-depth assessment than is found in the IED III Standardised. Many programs use the IED III Standardised as a normed measure to derive normative scores and then use the criterion-referenced assessments in the Inventory of Early Development III (IED III) to determine even more specific information about the breadth and acquisition of a child’s skills.

The criterion-referenced assessments in the IED III can be used to identify which prerequisite skills a child has mastered and which will require additional instruction or time for mastery. These assessments provide a more detailed sequencing of developmental skills, which can also be used for planning instruction, writing IEPs, and tracking individual growth and progress.

IDENTIFY PRESENT LEVEL OF PERFORMANCE

You can use the results from the administered assessments in the IED III Standardised (and from any additional assessments administered from the criterion-referenced IED III) to identify the child’s present level of performance. Because the skills within assessments are sequenced from the earliest
mastered skills to more difficult ones, a child's present level of performance can be pinpointed within the skill continuum.

You can also use the resulting normative scores to identify a child's strengths and weaknesses across and within developmental and academic skill areas (domains and sub-domains). By looking at a child's overall performance, it is possible to see if the child has strengths and needs across skill areas (e.g. the child has strengths in daily living skills but limited mastery of social and emotional skills). It is also possible to see if the child has strengths and needs within a particular skill area (e.g. the child has strengths in gross motor skills but shows some delay in fine motor skills.) This information can be valuable in identifying developmental delays, identifying advanced development, determining school readiness, making referrals, developing a child's IEP or confirming a diagnosis.

**IDENTIFY INSTRUCTIONAL OBJECTIVES**

It is important to identify as objectives those skills that are appropriate for the child and will meet the child's instructional needs. In an assessment's skill sequence, skills immediately following those identified as mastered (items for which item numbers are circled in the child's Standardised Record Book) are, in most cases, logical objectives for the next instructional period.

In determining the number and priority of instructional objectives for the next instructional period, teachers should consider the following factors:

- Length of the next instructional period
- Discrepancy between the child's present level of performance and the anticipated level of performance
- Types and degrees of physical impairments or emotional disorders
- Presence of advanced development or academic talent
- Environmental factors in the home and school
- Mental and physical health of the child

**IDENTIFY INSTRUCTIONAL OBJECTIVES**

It is important to identify as objectives those skills that are appropriate for the child and will meet the child's instructional needs. In an assessment's skill sequence, skills immediately following those identified as mastered (items for which item numbers are circled in the child's Standardised Record Book) are, in most cases, logical objectives for the next instructional period.

In determining the number and priority of instructional objectives for the next instructional period, teachers should consider the following factors:

- Length of the next instructional period
- Discrepancy between the child's present level of performance and the anticipated level of performance
- Types and degrees of physical impairments or emotional disorders
- Presence of advanced development or academic talent
- Environmental factors in the home and school
- Mental and physical health of the child

**SHARE RESULTS**

In addition to providing normative scores, assessment results provide insight into the child's development and instructional needs. Communicating assessment results may require careful handling. A well-conducted conference can help teachers and parents/caregivers understand the child's developmental and academic strengths and needs and can promote an optimistic attitude toward exploring differences in development or learning.

When reporting numerical scores, explain what the scores mean and report age equivalents in an instructional range. To do this, you must be fully aware of the purposes and meaning of the normative scores and must have a working knowledge of the technical qualities of the instrument. (See Chapters 4–7 of the IED III Standardisation and Validation Manual).

The Developmental Profile (found on page 37 of the Standardised Record Book) can be a useful tool, especially when reporting assessment results to parents. Standard scores (sub-domain composite scores) plotted on the grid create a visual representation of the child's strengths and needs. (A completed example is found on page xxii.) The Developmental Profile shows the extent to which a child's scores are in the average range and distinguishes those scores that deviate from the average. Using the Developmental Profile with parents to communicate the child's performance can eliminate the need to describe the child's performance in terms of age equivalents – a concept that can be confusing to parents.
Evaluating Children with Special Considerations

It is often necessary to evaluate children who have been kept back a year, children who are bilingual, or children who have known exceptionalities to determine their skill levels, especially in areas of development that may not be affected by any of these conditions. For example, a child with vision impairment needs assessment to determine whether the child has other impairments or delays (e.g. language impairment, fine motor skill delay).

When evaluating children with special considerations, use the following general strategies in addition to the specific strategies provided.

- Keep a record of the accommodations implemented.
- Be aware of the way certain accommodations may impact performance and scoring.
- Be aware of the child’s strengths that will support reliable responses or those behaviours that may hinder reliable responses.
- Use information from families to identify what may act as a motivator to facilitate the child’s optimal performance.

CHILDREN KEPT BACK A YEAR

Children who have been held back a year have a high degree of risk for academic difficulties. This makes sense because it can be assumed that a child was “retained” because his/her parents or teachers felt the child was not ready or was unable to handle age-appropriate academic tasks. Yet because a retained child competes academically with younger children, a retainee with developmental delays or learning problems is often difficult to detect.

It is reasonable to consider whether an older child, especially a child who initially compares favourably to younger classmates, may actually be at risk. Although an older child who has been retained may perform as well or better than his/her younger classmates at the beginning of the school year, it is possible that the older child continues to learn language or academic skills more slowly. If so, the retained child’s initial adequate performance may be temporary and the child may again fall behind during the school year.

To safeguard against under-detection of retained children with developmental and academic delays or disabilities, the following steps are recommended:

- Use the correct norms for the child’s age, not an assumed chronological age for the child’s year level.
- Re-evaluate performance in three to four months to monitor progress and make appropriate referral decisions.

Continue to monitor the progress of children who have been retained. These children may have problems that surface later. For example, a child who currently shows language-based deficits may later exhibit reading-comprehension problems that often are not evident until the end of year three or beginning of year four (Scarborough and Dobrich, 1990).

BILINGUAL AND NON-ENGLISH-SPEAKING CHILDREN

The following accommodations are designed to help bilingual children demonstrate skills they have mastered.

- Administer assessments to children who are bilingual or non-English-speaking in their primary language – the language spoken most at home. Even children who speak some English perform best when assessments are administered in the child’s native tongue.
- If the examiner is not fluent in the child’s language, an interpreter will be needed during the assessment and for gathering parent information and interpreting results.
- A professional interpreter should evaluate a child’s articulation and syntax skills in the child’s native language.
- Consider the native language of the child’s parents/caregivers. A parent/caregiver may be limited in his/her understanding and use of English and, therefore, may have difficulty fully describing the child’s abilities and behaviours during an interview conducted in English.

For information about making appropriate referral decisions for bilingual children, see page xxv.
CHILDREN WITH EXCEPTIONALITIES

ACCOMMODATIONS FOR THE IED III STANDARDISED

It is important for administrators to recognise the difference between accommodations and modifications and how to use accommodations appropriately when administering assessments. This is particularly important when considering standardised assessment to avoid invalidating the assessment results.

Accommodations are alterations for administering the assessments that enable children to more accurately demonstrate their knowledge. Accommodations
  • permit alternate test settings, testing formats, timing and test scheduling, and means of responding in order to demonstrate a child’s true mastery of a skill.
  • are not methods to bypass standardised scoring principles.

Accommodations are designed to reduce the effect of language limitations and disabilities and therefore increase the probability that the same target construct is measured for all children. Accommodations provide fairness, not advantage, for children with disabilities, so that the child is assessed on a level playing field with other children. When incorporating appropriate accommodations, their use should always be recorded in each child’s Standardised Record Book in the NOTES section associated with the assessment where the accommodation was used.

In contrast, modifications are a change in the actual content of the assessment (for instance, changing the phrasing of a question). Modifications cannot be used under any circumstances when administering the IED III Standardised with the intent of generating normative scores with normative information. Modifying the assessment content undermines the standardisation process and comparability of performance, thereby invalidating normative scores for a child.

Children with Individualised Education Programs (IEPs)

Children who have special needs may already be identified as eligible for special education services and therefore have an Individualised Education Program (IEP).

The child’s IEP should indicate whether the child should receive accommodations during an assessment and what the nature of those accommodations should be. These guidelines should be followed, within appropriate bounds, when administering the IED III Standardised.

English Language Learners (ELLs) or Limited English Proficient (LEP) Children

Children who are English language learners (ELLs) were included in the U.S. national standardisation study for the IED III Standardised, and their needs were accounted for in the development of the assessments.

Before assessing the skill mastery of children who are either ELL or limited English proficient (LEP), consider whether the child’s English-language skills are suitably developed to permit assessment in English. The purpose of using accommodations with English language learners is to enable assessment administrators to measure these children’s knowledge and skills without being hindered by their limited exposure to the English language. If a child has limited English proficiency, consider specific accommodations to help the child demonstrate his or her knowledge. Procedures already in place in the school should always be considered when making accommodation decisions about these children.

Any accommodations used should always be recorded in the child’s Standardised Record Book.
**GENERAL ACCOMMODATIONS**

The following accommodation strategies are appropriate when administering the *IED III Standardised* and may be considered, as needed, for children with exceptionalities.

- **Allow Extended Time:** The majority of the assessments in the *IED III Standardised* are untimed. A child should be allowed to use as much time as necessary to complete the assessment.
  - Some assessments include a time limit that cannot be altered:
    - D-9 Word Recognition
    - E-9 Adds Numbers
    - E-10 Subtracts Numbers

  Similarly, some items in individual assessments have a time limit. For example, item 16 in A-1 Early Gross Motor Skills asks: “Can _____ stand on one foot for five seconds if he/she holds onto something?” Specific time restrictions such as these should always be respected. In sum, if a time limit is provided for an assessment (or for a specific item), it should be followed. Otherwise, allow as much time as needed.

- **Select an Alternate Entry:** Consider beginning the assessment with an item at an Entry below the child’s chronological age to establish a basal for a child whose development is delayed.

- **Organise Appropriate Assessment Session(s):**
  - Separate Space: Administer the assessment in a separate, quiet room.
  - Frequent Breaks: Allow break times for the child to maintain focus and sufficient energy.
  - Multiple Sessions: Plan for multiple sessions so the child can maintain performance during each session.

If there is any doubt about how an accommodation might affect the validity of the assessment results, consult with a specialist in the child’s area of exceptionality or with someone experienced in administering standardised assessments, such as a school psychologist or clinical psychologist.

If accommodations (and/or modifications) outside of those described in this section (pgs. xxix–xxx) are needed, it is recommended that the administrator use the criterion-referenced *IED III* to obtain a valid picture of the child’s skill mastery and to monitor the child’s progress. Remember: **Modifications cannot be used under any circumstances when administering the *IED III* Standardised with the intent of generating normative scores with normative information.**

---

**STRATEGIES FOR ASSESSING SKILL MASTERY OF CHILDREN WITH SPECIFIC EXCEPTIONALITIES**

Many of the general accommodations described earlier may be helpful for assessing children with a variety of exceptionalities and should be considered as needed. Some additional accommodations that are relevant for children with specific exceptionalities are included below.

**Children with Motor Impairment**

Possible strategies:

- Allow the child to use adaptive seating or other adaptive devices unless the assessment is explicitly testing gross or fine motor skills.
- Allow the child to formulate a verbal response before requiring a written response, whenever possible.
- Allow the use of different writing products (not just a HB pencil).
- Allow the use of scratch paper.
- Allow frequent breaks for physically tiring activities associated with the assessment.

**Children with Visual Impairment or Blindness**

Possible strategies:

- Read items to the child (with the exception of any items that require the child to demonstrate specified reading skills.)
- Provide magnification devices for visual stimuli (e.g. pictures).
- Provide additional lighting, as needed.
- Reduce visual distractions by covering extraneous visual stimuli on a child-facing page.

**Children with Hearing Impairment or Deafness**

Possible strategies:

- Allow the child to use his/her communication system or assistive technology if used in regular classroom work. (NOTE: Spend time in advance of the assessment session becoming knowledgeable about the way the child communicates and receives information to ensure the most effective strategies are put in place.)
- Provide a sign language interpreter, if needed.
Evaluating Children with Special Considerations

Introduction

Children with Autism Spectrum Disorders (ASD) and Developmental Disorders

Possible strategies:

- In advance of testing, let the child know about the upcoming assessment session so that he/she is aware of the change in his/her usual schedule. Tell the child what the assessment session will entail. If the child has questions, answer them and attempt to dispel any anxiety that the child may have about the assessment process.
- Determine the child’s method of communication if the child has limited verbal skills or is non-verbal, and consider using the accommodations for children with hearing or speech impairments described earlier.
- Consider providing a list or pictorial representation of the tests to be completed (then cross them off as you go), particularly for children who are used to using a visual schedule.
- Allow alternate response methods (e.g. pointing, drawing) when these alternatives will not compromise the construction of an assessment item. For instance, if the assessment specifically requires that the child respond using expressive language, it would invalidate the normed scores to have the child respond receptively (i.e. by pointing at a picture instead of naming what the picture represents).

Children with Traumatic Brain Injury, Significant Health Problems or Multiple Disabilities

The use of any strategy for the specific disabilities listed as well as the general accommodations in the previous section can be used for a child with traumatic brain injury, health problems or multiple disabilities as needed.

Children with Severe Speech Impairment

Possible strategies:

- Enlist the assistance of someone who is familiar with the child’s speech patterns (a parent/caregiver) to help interpret the child’s communication.
- Allow the child to use his/her communication system or assistive technology if used in regular classroom work. (NOTE: Spend time in advance of the assessment session becoming knowledgeable about the way the child communicates and receives information to ensure the most effective strategies are put in place.)
- Allow alternate response methods (e.g. pointing, drawing) when acceptable and when these alternatives will not compromise the construction of an assessment item. For instance, if the assessment specifically requires that the child respond using expressive language, it would invalidate the normed scores to have the child respond receptively (i.e. by pointing at a picture instead of naming what the picture represents).

Children with Emotional Disturbance and Behaviour Problems

Possible strategies:

- Consult with someone who has experience with children with emotional disturbance, such as a school psychologist or clinical psychologist, or with someone who has worked with the child. Ask specifically about the duration and intensity of the child’s behaviours and solicit suggestions for working with the child to ensure optimum outcomes.
- In advance of testing, prepare the child for what the assessment session will entail. Answer any questions and attempt to dispel any anxiety that the child may have about the assessment process.
- Foster an assessment environment that will support positive and appropriate behaviours.

Although the IED III Standardised provides accommodation strategies for children with special needs, administrators should use professional judgment when determining which strategies are appropriate for an individual child while ensuring the validity of the assessment is not compromised.

For further information about using accommodations when assessing children with any of the exceptionalities described above, see the Resources for Administering Assessments to Children with Specific Exceptionalities, found on page 168 of Appendix F: References.