

## Interpreting Results from the *Iowa Assessments*<sup>™</sup>

This document helps teachers, counselors, and school administrators interpret and use results of the *Iowa Assessments*. The *Iowa Assessments* have been designed, developed, and researched to support a variety of important educational purposes as indicated in the table below.

<b>Purposes Supported by the <i>Iowa Assessments</i></b>	
Assessing the Iowa Core	A student's performs in the areas of reading, writing, math, science and social studies as defined by the Iowa Core
Proficiency Level Indicators	A student's proficiency level as defined by the state of Iowa
Growth Indicators	A student's growth over time
Relative Strengths and Weaknesses	A student's relative strengths and limitations
Comparing Student Performance to the Nation	A student's performance relative to other students in the nation
Informing Instruction	A classroom's performance to help inform changes in instruction

The table below categorizes reports by the testing purposes that the data can help inform.

	Profile Narrative Report	Performance Summary in Mathematics and Reading (Individual Student and Group)	Performance Profile (Individual Student and Group)	Common Core Report (Group)	Item Analysis (Group)	Class Item Response Record (Group)
Assessing the Iowa Core		✓	✓	✓	✓	✓
Proficiency Level Indicators	✓	✓				
Growth Indicators		✓				
Relative Strengths and Weaknesses	✓	✓	✓	✓	✓	✓
Comparing Student Performance to the Nation	✓	✓	✓	✓		✓
Informing Instruction		✓	✓	✓	✓	✓

## Assessing the Iowa Core

The *Iowa Assessments* measure key elements of the Iowa Core.

Alignment information can be found at:

<https://itp.education.uiowa.edu/ia/ContentOverviewWebinarsWithAudio.aspx>

The *Iowa Assessments* measure levels of student thinking. The three levels (essential competencies, conceptual understanding, and extended reasoning) are described below.

	Essential Competencies	Conceptual Understanding	Extended Reasoning
<b>Mathematics</b>	<ul style="list-style-type: none"> <li>Perform simple one-step procedure</li> </ul>	<ul style="list-style-type: none"> <li>Make decisions of how to approach the problem</li> <li>Specify and explain relationships between facts, terms, properties, or operations</li> <li>Perform multiple-step procedure</li> </ul>	<ul style="list-style-type: none"> <li>Use reasoning, use planning, draw conclusions, or cite evidence to solve a problem</li> <li>Develop a strategy to connect and relate ideas to solve problems while using multiple-step procedures and a variety of skills</li> </ul>
<b>Reading</b>	<ul style="list-style-type: none"> <li>Recognize or identify basic information</li> </ul>	<ul style="list-style-type: none"> <li>Use more complex thought processes in interpreting text</li> <li>Determine important ideas</li> <li>Read between the lines</li> </ul>	<ul style="list-style-type: none"> <li>Use critical thinking in judging, evaluating, or analyzing text or in integrating ideas within and beyond the text</li> </ul>
<b>Science</b>	<ul style="list-style-type: none"> <li>Identify basic scientific information such as definitions, terminology, principles, concepts, and relationships</li> <li>Recognize fundamental components of scientific investigations</li> </ul>	<ul style="list-style-type: none"> <li>Understand scientific concepts and apply them to explain phenomena</li> <li>Analyze and interpret scientific information</li> <li>Make simple inferences, predictions, and conclusions</li> <li>Formulate hypotheses</li> </ul>	<ul style="list-style-type: none"> <li>Propose solutions to scientific problems</li> <li>Make in-depth inferences, predictions, and conclusions</li> <li>Evaluate the appropriateness of scientific findings, conclusions, and experimental design</li> <li>Integrate ideas from various scientific disciplines and phenomena</li> </ul>
<b>Social Studies</b>	<ul style="list-style-type: none"> <li>Read and understand social studies material such as maps, charts, graphs, cartoons, and primary source documents</li> </ul>	<ul style="list-style-type: none"> <li>Interpret social studies information and materials</li> <li>Apply social studies knowledge to new situations</li> <li>Distinguish between facts and opinions</li> <li>Make contrasts and comparisons</li> <li>Make simple inferences and predictions</li> <li>Identify cause and effect</li> </ul>	<ul style="list-style-type: none"> <li>Evaluate social studies information in order to draw conclusions, form generalizations, and solve problems</li> <li>Analyze underlying meanings of social studies materials, such as recognizing author's purposes and assumptions</li> <li>Make connections among important ideas in social studies</li> </ul>
<b>Language Arts</b>	<ul style="list-style-type: none"> <li>Identify and/or correct errors in the use of language</li> <li>Recognize correct written language</li> <li>Locate information</li> </ul>	<ul style="list-style-type: none"> <li>Apply knowledge of sentence construction to a piece of writing</li> <li>Make basic decisions regarding research for writing</li> </ul>	<ul style="list-style-type: none"> <li>Exercise judgment in researching, structuring, and developing a piece of writing</li> </ul>

## Reporting Metrics

**Standard Score:** The *National Standard Score* (NSS) is a score that describes your student's achievement on a standard scale. The **average** NSS for the *Iowa Assessments* is provided below. For example, if your sixth grade student receives a standard score of 219 on the *Iowa Assessments Reading Test* in the fall, this means your student is performing like the typical sixth grade student in reading.

Grade	Fall	Midyear	Spring
1	138	143	150
2	157	162	168
3	176	181	185
4	192	196	200
5	205	210	214
6	219	223	227
7	231	235	239
8	243	246	250
9	254	257	260
10	263	265	268
11	270	273	275

**National Percentile Rank:** A percentile rank is a score that tells the percent of students in a group with a lower score on the test than your student. This score shows your student's rank in that group. Percentile ranks range from 1 to 99. A *National Percentile Rank* (NPR) indicates your student's rank with other students in the nation.

*For Form E, the National Percentile Ranks (NPRs) are based on up-to-date research on the achievement of students throughout the United States. National achievement in core areas such as reading, mathematics and science has improved during the past 10 years, especially in the early elementary grades. Due to this increase in national performance, the NPRs reported may be lower than scores from previous years.*

*Additional information about the extent of these changes can be found at:*

<http://itp.education.uiowa.edu/ia/InterpretingNationalPerformance.aspx>

*Percentile Ranks, Standard Scores and Grade Equivalent Scores based on performance from the state of Iowa students will be available after all schools within the state have completed the Iowa Assessments (following the 2011-2012 academic year).*

**National Grade Equivalent:** A grade equivalent is a score that describes your student's achievement on a grade level scale. The NGE is a decimal number that describes academic performance in terms of grade level and month. For example, if your student (as a 3<sup>rd</sup> grade student) receives a NGE of 4.2 on the third grade Reading Test, this means your student scored as well as a fourth grade student in the second month of the school year if given the same third grade Reading Test.