

Data-Informed Decision Making at the School and District Levels

by Shannon LeBlanc

The CAT·4 assessment reports provide an external source of information for districts and schools about student achievement in literacy and mathematics. This information, along with school and classroom assessment information, provides districts and schools a cohesive balance of evidence about student achievement that can be used to inform school/district improvement planning and decisions.

In this age of accountability, schools and districts are expected to provide reliable and valid evidence of improved student achievement over time. The CAT-4 assessment reports provide reliable and valid information that can be used to compare student achievement results from year to year. When a school or district has at least three reference points of data using the CAT-4, trends in the results can be identified. These trends are a useful source of evidence to inform and support decisions made at the school and district levels (i.e. school/district goals, professional development foci, purchasing of resources for students and teachers). These trends in the data also provide reliable and valid information at the school and district levels about change in student achievement over time. Using this information, school and district teams can infer with some confidence factors that contributed to or impacted identified trends in student achievement.

CAT-4 provides several reports that support data-informed decision making at the school and district levels. The District and School Administrator's Summaries include norm-referenced results which provide information about student performance on the assessments relative to the performance of same-grade groups of students. The District Administrator's Summary provides comparison data between the district performance and that of the nation. The School Administrator's Summary provides comparison data between school performance and that of the district and nation. These administrator summaries also include criterion-referenced results which provide information about student performance relative to predefined performance criteria which was established by Canadian teachers with curriculum expertise at each grade level. The criterion-referenced report classifies student performance on each assessment using the following categories: Low, Competent and Proficient. This information can be used to identify areas of strength and areas of weakness in student performance on the assessment. Teachers and administrators can use this information to inform next steps for school and district level planning and decision making. For information on how to interpret the

Administrator's Summary or Norm-Referenced and Criterion-Referenced reports, see "Interpretation of Score Reports at the School and District Levels."

The CAT-4 Item Analysis Report provides norm-referenced information at the test objective and item levels. This information enables the school and district to compare their students' performance on each of the CAT-4 test objectives and test items with the performance of same-grade groups of students at the district, regional and national levels. This report, along with the item descriptions, enables the users to view student performance on specific curriculum areas/concepts in literacy and mathematics. (Curriculum match tables can be found at www. canadiantestcentre.com.) This more specific information enables schools and the district to identify areas of relative strength and areas that may require further investigation and instructional support. For information on how to interpret the Item Analysis Reports see "Interpretation of Score Reports at the School and District Levels."

Suggestions for Examining One Year of CAT-4 Data (at the school and/or district level):

- Working with your team, examine the CAT-4 data for each grade assessed. Look for strengths and areas of concern on this assessment.
- Compare the school results to the district and/or Canadian results. Are the strengths and areas of concern you identify the same or different from those of the District?
- Are the CAT-4 results corroborated or supported by evidence from the classroom, school, surveys, and other data sources? Explain.
- What questions do you have after looking at your school/district data?
- In what areas do you need to dig deeper?

Identifying trends in the CAT-4 data:

- Look at your school/district CAT-4 reports over the past three years (a minimum of 3 points of data is recommended to be able to identify trends in the data).
- Based on the CAT-4 reports over a minimum of three years, consider the following questions:
 - What trends do you see over time?
 - What are the strengths? Are they the same every year? Are they different from those identified for the current year?
 - What are the needs? Are they the same every year? Are they different



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from those identified for the current year?

- How do the school trends compare to the district trends over time?
- What are the areas of growth over the three or more years? Have any areas declined over this time period? Have any areas remained unchanged?
- What factors might have impacted these results? What other factors might contribute to the results? What PD focus has your school/district had over the past few years?
- Have you seen the same trends in the classroom or school assessment data that you've collected over time? Compare and contrast those trends. If differences exist, what factors might have impacted those differences?
- What questions do you have about the trends you have observed in your data? Where do you need to investigate further?

When comparing data from year to year it is important to pay attention to:

- Sample size: When sample sizes are small, the results can vary significantly from year to year, as one student's results (if extremely high or low) can sway the data significantly.
- Percent for Low, Competent and Proficient: Depending on the questions in a given section, the teachers who set the criteria may have allowed only one or no errors for the Proficient category...setting Proficient as a goal for all students to meet may, therefore, be unrealistic.
- Focus on test objectives with the highest percentage of students in the Low category. Consider whether or not these aspects of the assessment represent a curriculum area that would have a significant impact on student achievement in mathematics or literacy? How can we dig deeper?