

Success Story

New Brighton Area School District Process provides results beyond math achievement



Recap/Key Points

- Root cause analysis focuses search for math solutions
- Using process has significant impact far beyond original issue

Background

New Brighton Area School District (NBASD) is a small but dynamic district located in an economically-challenged area in western Pennsylvania.

Problem/Challenge

The district was experiencing lagging math scores—especially in 6th grade. It seemed that no matter what they tried, they weren't seeing enough improvement. District leaders wanted to look more closely at the problem and work to improve 6th grade math achievement.

Solution

In Phase I of the project, a project team was established consisting of teachers and administrators, and representatives from student support services, and the local education service agency. Team members learned all four TregoED analytic tools, maximizing workshop time by applying them on the pivotal 6th grade math achievement problem. This allowed them to make headway on the issue while gaining confidence and skill in applying the tools to actual issues.

An in-depth root cause analysis uncovered the need to consider new solutions. The team determined that solutions required:

- A new textbook series that was better aligned with common core standards
- Professional development around common core standards, and expectations
- Some teacher reassignments to maximize teacher aptitudes and strengths

In Phase II, two action teams were created to continue the work begun in Phase I. One team used Decision Analysis to set criteria, gather and organize data and ultimately select a new math series. They used Potential Problem Analysis to develop an unassailable implementation plan. The other team determined what professional development was required in order to better align math instruction with common core standards.

Project Results

Math-related

The pandemic made it impossible to adequately compare pre- and post-PSSA (Pennsylvania System of School Assessment) tests as originally planned. The district could see early on though, that they were on the right track with some of the changes they made. Teachers and school leaders reported:

- tremendous satisfaction and support of the math changes that have been made;
- excitement about the new math series and its regular use. The series also provides more support for parents (something that was essential during school shutdowns);
- greater alignment between grades and between elementary and middle school math—making for easier transitions for teachers and students; and
- the district anticipates better math scores on the next round of PSSA, thanks to the changes they have implemented.

New Brighton Area School District

Process provides results beyond math achievement

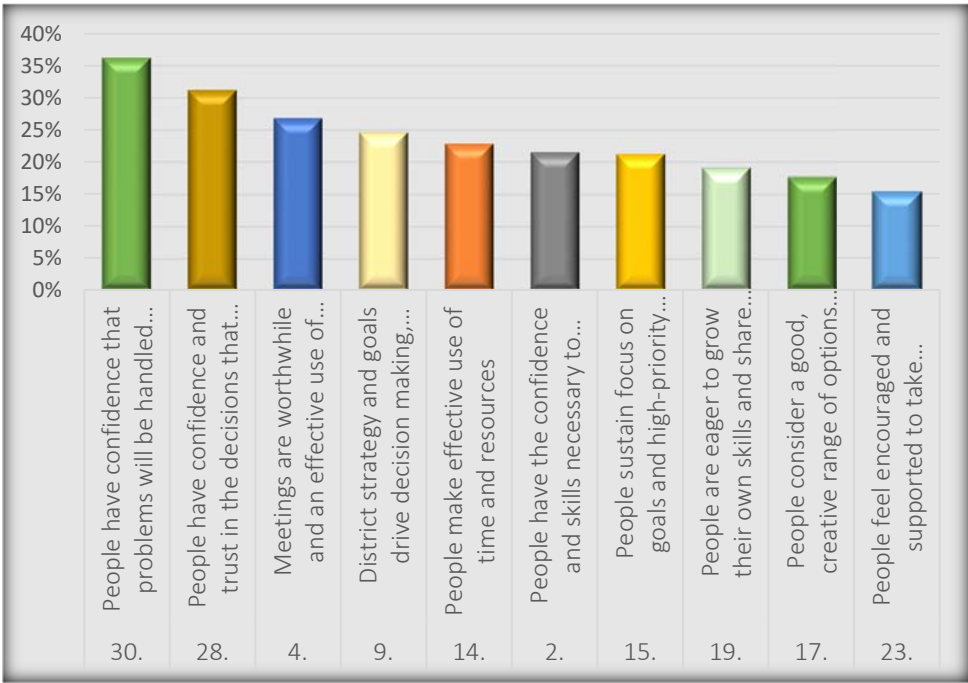
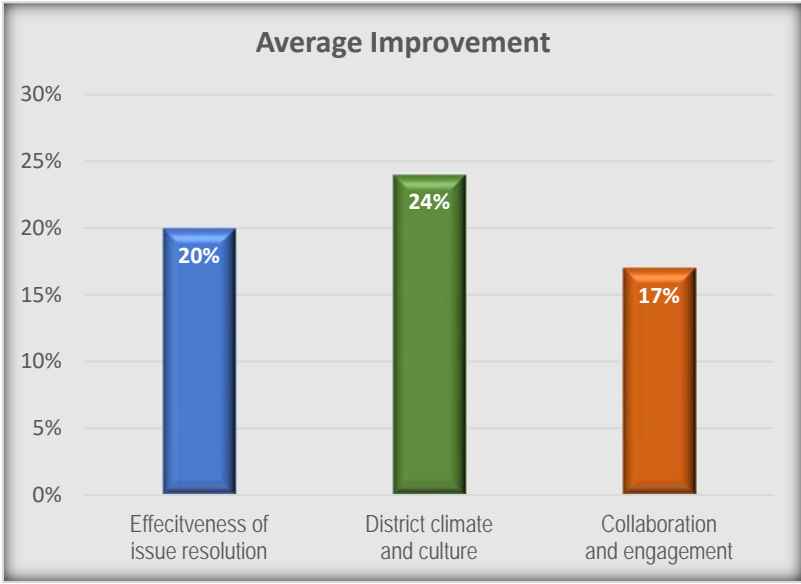
Impact on the District Beyond Math

In order to assess project impact beyond math, an identical assessment was administered before, during, and after the project. Questions examined peoples' perceptions in three major areas:

- Effectiveness of issue resolution
- District climate and culture
- Collaboration and engagement

It is notable that there was significant improvement for **every** single one of the 30 questions asked. As the project progressed, so did peoples' perceptions of the positive impact. Average improvement for each of the three categories is shown on the chart on the right.

For purposes of illustration, below are the results from "District Climate and Culture".



It is evident that teaching people collaborative problem-solving and decision-making skills -and ensuring their use, has a positive impact in multiple areas. NBASD results demonstrate that using process to tackle a tough, persistent issue not only resolves the issue, it profoundly affects district morale and climate through increased understanding, sense of efficacy, teamwork and transparency.

“Every school out there should have access to this.... We’re never going to eliminate the zip code inequalities that exist in this country. But when you have TregoED tools, you can make up for some of the inequities through quality problem solving and decision making that benefits students. High-quality thinking need not be zip code dependent.”

Dr. Joseph A. Guarino, Superintendent, New Brighton Area School District

