

The School Technology Needs Assessment Interpretation Guide

The School Technology Needs Assessment (STNA, pronounced "stenna") was originally developed by SEIR*TEC at SERVE in collaboration with the North Carolina Department of Public Instruction's Educational Technology Division, as part of the LANCET project (Looking at North Carolina Educational Technology).

What the STNA Measures

The STNA (teacher version) and STNA-S (student version) are intended to determine the collective needs of a school, from the teachers' and students' perspectives, related to the use of technology in education settings. The current version of the STNA is expected to uncover teacher and student perceptions of four constructs and ten sub-constructs, listed in the table below.

<p>I. Supportive Environment for Technology Use:</p> <ul style="list-style-type: none"> a. <i>Vision</i> b. <i>Planning and Budget</i> c. <i>Communication</i> d. <i>Infrastructure and Staff Support</i> 	<p>II. Professional Development:</p> <ul style="list-style-type: none"> a. <i>Professional Development Needs</i> b. <i>Quality of Professional Development</i>
<p>III. Teaching and Learning:</p> <ul style="list-style-type: none"> a. <i>Purpose of Technology Use</i> b. <i>Frequency of Technology Use</i> 	<p>IV. Impact of Technology:</p> <ul style="list-style-type: none"> a. <i>Impact on Teaching Practices</i> b. <i>Impact on Student Outcomes</i>

How to Use STNA Data

The STNA and STNA-S provide information to help planners—administrators, technology and media specialists, and school or technology planning team members—make purchasing, resource allocation, or other decisions relating to technology. They also provide decision makers and policy makers with data to guide building- and district-level decisions about resource allocation, professional development, and school readiness for technology initiatives.

Collecting Data

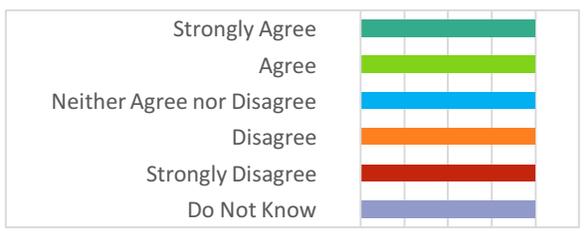
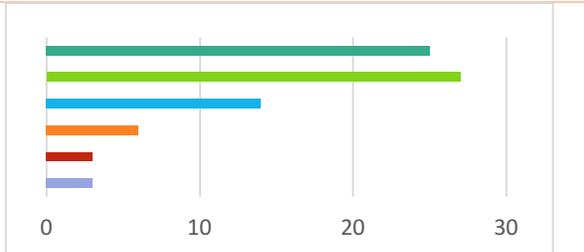
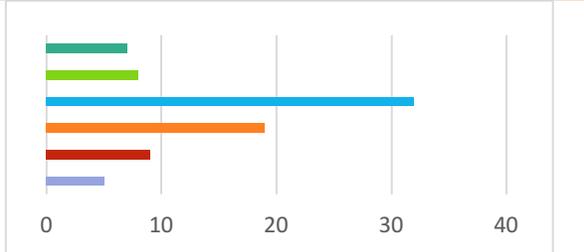
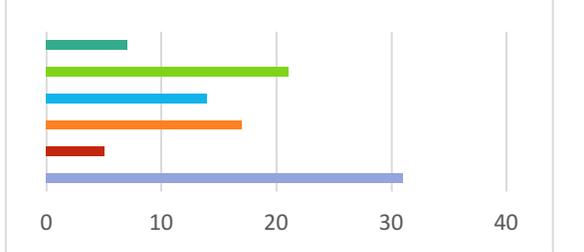
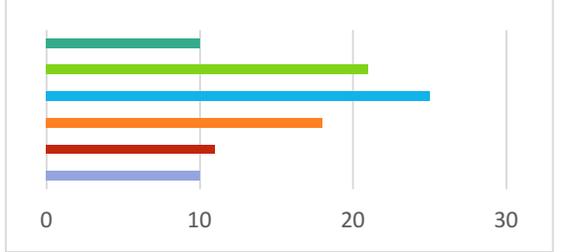
The STNA collects perception data (what teachers or students think or feel) about a variety of broad areas of technology implementation in your school. Survey data provides information from one angle so it may be helpful to employ other methods of data collection to compare results and to gain better insight into why participants think or feel about a certain topic. Consider collecting additional information to see if responses point to a common conclusion. Interviews or observations, for example, are other angles from which you can better understand how technology implementation impacts teachers and students in your school or district.

How to Interpret Your STNA Report

Data for the STNA were collected through an online surveying system by the Friday Institute for Educational Innovation at North Carolina State University in Raleigh, NC. Responses were analyzed through the online system and the results provide a picture of your school as a whole, presented as frequencies and percentages of responses to all items, and as bar chart representations of those values.

To simplify the interpretation of the STNA, all items are designed as positive statements. Each construct examined by the STNA is thought to be beneficial for successful implementation of technology in teaching and learning settings. This means that it is generally good if a large number of staff members report that they "Strongly Agree" with a STNA item statement, or that they do something "Very Often" with technology in their classrooms. However, even schools with high levels of technology integration should expect to have items for which the most positive response options are not highly endorsed.

STNA Report Profile Examples

	<p>The following profiles illustrate potential STNA data distributions and suggestions for how to interpret such data for additional information gathering or planning purposes. It is important to identify bar charts that “stand out” from others and to think critically about the results for each item.</p>
	<p>1. All responses either “Strongly Agree” or “Agree” with the statement. Since all STNA items are worded positively, it is reasonable to infer that needs are being met in the area examined by the item. However, if you expected a much more enthusiastic response (e.g., mostly strongly agree), there might be room for improvement but may not be an immediate priority.</p>
	<p>2. In this example, respondents as a group are feeling neutral to negative about the area examined by the item resulting in this profile. This response distribution represents an issue that should be an area of concern for decision makers, assuming that the substance of the item is a priority.</p>
	<p>3. In this profile, a large number of respondents report that they “Do Not Know” – that they do not have enough information to respond to the statement in the item. This may suggest that a large portion of the staff is not fully informed about its substance. It may be that they did not recognize a key term in the item, or that in their position they do not have access to some information necessary to respond. Gathering additional information may prove useful to learn more.</p>
	<p>4. This profile more closely resembles the normal or bell-shaped curve, indicating a staff that is mixed in the nature of members’ thinking about the area examined by the item. While it may be that the staff as a whole does not have strong feelings about the substance of the item, it would be useful to investigate further why people feel the way they do, including why a number chose “Do Not Know.”</p>
	<p>5. For this item, more staff members do not agree with the statement provided, than agree with it. This profile suggests that substantial disagreement exists within the staff, making this an area of concern for decision makers. Nobody chose “Do Not Know,” suggesting that awareness in this area is good.</p>

Note: Table adapted from the SERVE Center at UNC Greensboro STNA interpretation guide (<http://www.serve.org/uploads/docs/STNA3inferences.pdf>).