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**1. Please enter the name of the person to contact regarding this submission.**

John J. Rezek

**1a. Please enter their phone number for follow up questions.**

516 495-7730

**1b. Please enter their e-mail address for follow up contact.**

jrezek@islandtrees.org

**2. Please indicate below whether this is the first submission, a new or supplemental submission or an amended submission of a Smart Schools Investment Plan.**

First submission

**3. All New York State public school districts are required to complete and submit a District Instructional Technology Plan survey to the New York State Education Department in compliance with Section 753 of the Education Law and per Part 100.12 of the Commissioner's Regulations. Districts that include investments in high-speed broadband or wireless connectivity and/or learning technology equipment or facilities as part of their Smart Schools Investment Plan must have a submitted and approved Instructional Technology Plan survey on file with the New York State Education Department.**
**By checking this box, you certify that the school district has an approved District Instructional Technology Plan survey on file with the New York State Education Department.**

☑ District Educational Technology Plan Submitted to SED and Approved

**4. Pursuant to the requirements of the Smart Schools Bond Act, the planning process must include consultation with parents, teachers, students, community members, other stakeholders and any nonpublic schools located in the district.**
**By checking the boxes below, you are certifying that you have engaged with those required stakeholders. Each box must be checked prior to submitting your Smart Schools Investment Plan.**

☑ Parents
☑ Teachers
☑ Students
☑ Community members

**4a. If your district contains non-public schools, have you provided a timely opportunity for consultation with these stakeholders?**

☐ Yes
☐ No
☑ N/A

**5. Certify that the following required steps have taken place by checking the boxes below: Each box must be checked prior to submitting your Smart Schools Investment Plan.**

☑ The district developed and the school board approved a preliminary Smart Schools Investment Plan.
☑ The preliminary plan was posted on the district website for at least 30 days. The district included an address to which any written comments on the plan should be sent.
☑ The school board conducted a hearing that enabled stakeholders to respond to the preliminary plan. This hearing may have occured as part of a normal Board meeting, but adequate notice of the event must have been provided through local media and the district website for at least two weeks prior to the meeting.
☑ The district prepared a final plan for school board approval and such plan has been approved by the school board.
☑ The final proposed plan that has been submitted has been posted on the district's website.

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**5a. Please upload the proposed Smart Schools Investment Plan (SSIP) that was posted on the district's website. Note that this should be different than your recently submitted Educational Technology Survey. The Final SSIP, as approved by the School Board, should also be posted on the website and remain there during the course of the projects contained therein.**

Smart Schools.pdf
SBDrawings.pdf

**6. Please enter an estimate of the total number of students and staff that will benefit from this Smart Schools Investment Plan based on the cumulative projects submitted to date.**

3,500

**7. An LEA/School District may partner with one or more other LEA/School Districts to form a consortium to pool Smart Schools Bond Act funds for a project that meets all other Smart School Bond Act requirements. Each school district participating in the consortium will need to file an approved Smart Schools Investment Plan for the project and submit a signed Memorandum of Understanding that sets forth the details of the consortium including the roles of each respective district.**

☐ The district plans to participate in a consortium to partner with other school district(s) to implement a Smart Schools project.

**8. Please enter the name and 6-digit SED Code for each LEA/School District participating in the Consortium.**

| Partner LEA/District | SED BEDS Code |
|---|---|
| (No Response) | (No Response) |

**9. Please upload a signed Memorandum of Understanding with all of the participating Consortium partners.**

(No Response)

**10. Your district's Smart Schools Bond Act Allocation is:**

$1,536,993

**11. Enter the budget sub-allocations by category that you are submitting for approval at this time. If you are not budgeting SSBA funds for a category, please enter 0 (zero.) If the value entered is $0, you will not be required to complete that survey question.**

| | Sub-Allocations |
|---|---|
| School Connectivity | 1,196,143 |
| Connectivity Projects for Communities | 0 |
| Classroom Technology | 340,850 |
| Pre-Kindergarten Classrooms | 0 |
| Replace Transportable Classrooms | 0 |
| High-Tech Security Features | 0 |
| **Totals:** | 1,536,993.00 |

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**1. In order for students and faculty to receive the maximum benefit from the technology made available under the Smart Schools Bond Act, their school buildings must possess sufficient connectivity infrastructure to ensure that devices can be used during the school day. Smart Schools Investment Plans must demonstrate that:**

- **sufficient infrastructure that meets the Federal Communications Commission's 100 Mbps per 1,000 students standard currently exists in the buildings where new devices will be deployed, or**
- **is a planned use of a portion of Smart Schools Bond Act funds, or**
- **is under development through another funding source.**

**Smart Schools Bond Act funds used for technology infrastructure or classroom technology investments must increase the number of school buildings that meet or exceed the minimum speed standard of 100 Mbps per 1,000 students and staff within 12 months. This standard may be met on either a contracted 24/7 firm service or a "burstable" capability. If the standard is met under the burstable criteria, it must be:**

**1. Specifically codified in a service contract with a provider, and**

**2. Guaranteed to be available to all students and devices as needed, particularly during periods of high demand, such as computer-based testing (CBT) periods.**

**Please describe how your district already meets or is planning to meet this standard within 12 months of plan submission.**

We intend to use the SSBA funds to improve High-Speed broadband delivery to all classrooms and provide wireless connectivity in all of our buildings by replacing outdated switches in all wiring closets and rewiring five of our buildings with copper CAT 6E cable to replace outdated 1950's strand fiber cable that is run to all of our classrooms and that over the years is damaged or too costly to continue to replace or repair. Our secondary schools currently have wireless but three of our buildings do not have wireless. We will use the SSBA funds to provide wireless to our elementary buildings and provide a district wide wireless system to the community by installing POE switches and WAPs with a 1:1 (1 WAP for each Classroom.)

We will prepare the district for the computer testing that will be necessary during the 2017 time frame. This can be accomplished by expanding the wireless network to areas that will support the number of students taking the exams. Typically we have 200 to 300 students taking written regent exams. We will need to facilitate wireless thin client technology in a large area to support this online testing.

Wireless Access points need to be strategically located within buildings to support the need for mobility. As the district utilizes more wireless devices it is becoming critical that we begin wiring for WAP's (Wireless Access Points) throughout the district buildings.

The majority of internal connectivity is provided by older style fiber technology and CAT 3 cabling. The fiber connectivity will only support 10 megabyte connections and not provide gigabyte connectivity. There is also the requirement to convert the fiber back to copper for each device adding to the cost of every client location.

Increase the number of classroom computers. Through Wireless technology increase support for BYOD technologies. Reduce the need to visit computer labs. Increase technology to support the NYS Testing initiative to have online assessment testing.

Providing Wireless Access to all buildings and reducing the need to visit computer labs to access online instructional technology

Lastly, we will be making all of the connectivity project steps to resolve the closest to classroom roadblock and attain a connectivity speed of 1.0 Gb by 1/30/18.

**1a. If a district believes that it will be impossible to meet this standard within 12 months, it may apply for a waiver of this requirement, as described on the Smart Schools website. The waiver must be filed and approved by SED prior to submitting this survey.**

☑ By checking this box, you are certifying that the school district has an approved waiver of this requirement on file with the New York State Education Department.

**2. Connectivity Speed Calculator (Required)**

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| | Number of Students | Multiply by 100 Kbps | Divide by 1000 to Convert to Required Speed in Mb | Current Speed in Mb | Expected Speed to be Attained Within 12 Months | Expected Date When Required Speed Will be Met |
|---|---|---|---|---|---|---|
| Calculated Speed | 2,500 | 250,000 | 250 | 10MB | 10MB | 1/30/18 |

**3. Describe how you intend to use Smart Schools Bond Act funds for high-speed broadband and/or wireless connectivity projects in school buildings.**

Our instructional Technology Plan is to have the high-speed broadband and wireless supply the necessary bandwidth to each instructional classroom in our district. Both our wired and wireless networks facilitate access to network-based and online educational resources that are part of our curriculum and are used to enhance and support instruction throughout the district. Our Instructional Technology program, our technology standards, and access to online resources as stated in our Technology Plan, Question 1, Part E. Curriculum and Instruction, cannot be achieved in a district our size with the large number of computers, laptops and Chromebook we have without a modern and robust infrastructure. The current stranded fiber network we have installed in the 1950's does not currently provide us the needed bandwidth and is costly and outdated to maintain. The goal to provide Wireless to three remaining school buildings J. Fred Sparke, Michael F. Stokes, and Steven Karopczyc to support elementary curriculum software. Wireless Access points need to be strategically located within buildings to support the need for mobility. We will prepare the district for the computer testing that will be necessary during the 2017 time frame. This can be accomplished by expanding the wireless network to areas that will support the number of students taking the exams. Typically we have 200 to 300 students taking written regent exams at one time.

**4. Describe the linkage between the district's District Instructional Technology Plan and the proposed projects. (There should be a link between your response to this question and your response to Question 1 in Part E. Curriculum and Instruction "What are the district's plans to use digital connectivity and technology to improve teaching and learning?)**

Our instructional Technology Plan is to have the high-speed broadband and wireless supply the necessary bandwidth to each instructional classroom in our district. Both our wired and wireless networks facilitate access to network-based and online educational resources that are part of our curriculum and are used to enhance and support instruction throughout the district. Our Instructional Technology program, our technology standards, and access to online resources as stated in our Technology Plan, Question 1, Part E. Curriculum and Instruction, cannot be achieved in a district our size with the large number of computers, laptops and Chromebook we have without a modern and robust infrastructure. The current stranded fiber network we have installed in the 1950's does not currently provide us the needed bandwidth and is costly and outdated to maintain. The goal to provide Wireless to three remaining school buildings J. Fred Sparke, Michael F. Stokes, and Steven Karopczyc to support elementary curriculum software. Wireless Access points need to be strategically located within buildings to support the need for mobility. We will prepare the district for the computer testing that will be necessary during the 2017 time frame. This can be accomplished by expanding the wireless network to areas that will support the number of students taking the exams. Typically we have 200 to 300 students taking written regent exams at one time.
The district has been providing some secondary grade levels with Chromebooks in a one to one setting in our middle school. The goal of the district is to provide additional Chromebook to our high school with district technology funds through our current budget. Bandwidth in our middle school has been an issue with some students having issues getting online with the current bandwidth provided to the classrooms. As the district increases the number of devices from 800 to 1500 Chromebook. It will only become more of an issue that the bandwidth provided to the classroom is not sufficient to meet the needs of our classroom instruction. We are striving to make Island Trees school district a one to one school. Providing every student a device to allow them to bring instructional technology to the classroom and home.

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**5. If the district wishes to have students and staff access the Internet from wireless devices within the school building, or in close proximity to it, it must first ensure that it has a robust Wi-Fi network in place that has sufficient bandwidth to meet user demand.**

**Please describe how you have quantified this demand and how you plan to meet this demand.**

The district has currently installed 10 Gigabyte fiber connection with Nassau BOCES BoTIE ISP to our middle school server room. From this location it becomes a bottle neck. Network closets to classrooms had 100Mbps Fiber cable run to the classroom. This infrastructure requires a transceiver box for every classroom device that slows down the speed to 10 megabyte. The infrastructure doesn't support the amount of bandwidth we have delivered to the district. The only resolution would be to replace outdated infrastructure technology that will never support the current bandwidth provided to the school. Currently the district only provides wireless to two of the five buildings, our middle school and high school. The goal would be to provide all buildings wireless technology. Our instructional Technology Plan is to have the high-speed broadband and wireless supply the necessary bandwidth to each instructional classroom in our district. Both our wired and wireless networks facilitate access to network-based and online educational resources that are part of our curriculum and are used to enhance and support instruction throughout the district. Our Instructional Technology program, our technology standards, and access to online resources as stated in our Technology Plan, Question 1, Part E. Curriculum and Instruction, cannot be achieved in a district our size with the large number of computers, laptops and Chromebook we have without a modern and robust infrastructure. The current stranded fiber network we have installed in the 1950's does not currently provide us the needed bandwidth and is costly and outdated to maintain. The goal to provide Wireless to three remaining school buildings J. Fred Sparke, Michael F. Stokes, and Steven Karopczyc to support elementary curriculum software. Wireless Access points need to be strategically located within buildings to support the need for mobility. We will prepare the district for the computer testing that will be necessary during the 2017 time frame. This can be accomplished by expanding the wireless network to areas that will support the number of students taking the exams. Typically we have 200 to 300 students taking written regent exams at one time.

**6. As indicated on Page 5 of the guidance, the Office of Facilities Planning will have to conduct a preliminary review of all capital projects, including connectivity projects.**

| Project Number |
|---|
| 28-02-26-03-7-999-003 |
| 28-02-26-03-7-999-SB1 |

**7. Certain high-tech security and connectivity infrastructure projects may be eligible for an expedited review process as determined by the Office of Facilities Planning.**

**Was your project deemed eligible for streamlined review?**

Yes

**7a. Districts that choose the Streamlined Review Process will be required to certify that they have reviewed all installations with their licensed architect or engineer of record and provide that person's name and license number. The licensed professional must review the products and proposed method of installation prior to implementation and review the work during and after completion in order to affirm that the work was code-compliant, if requested.**

☑ I certify that I have reviewed all installations with a licensed architect or engineer of record.

**8. Include the name and license number of the architect or engineer of record.**

| Name | License Number |
|---|---|
| Mike Guido - MJG Architect | 24838 |

**9. If you are submitting an allocation for School Connectivity complete this table.**
**Note that the calculated Total at the bottom of the table must equal the Total allocation for this category that you**

**entered in the SSIP Overview overall budget.**

| | Sub-Allocation |
|---|---|
| Network/Access Costs | 665,211 |
| Outside Plant Costs | (No Response) |
| School Internal Connections and Components | 522,232 |
| Professional Services | 7,500 |
| Testing | 1,200 |
| Other Upfront Costs | (No Response) |
| Other Costs | (No Response) |
| **Totals:** | 1,196,143.00 |

**10. Please detail the type, quantity, per unit cost and total cost of the eligible items under each sub-category.**

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| Select the allowable expenditure type.<br>Repeat to add another item under each type. | Item to be purchased | Quantity | Cost per Item | Total Cost |
|---|---|---|---|---|
| Connections/Components | SFP-10G-LR 10 GB Single Mode Optical Transceivers (Non-Erate Portion) | 60 | 342 | 20,520 |
| Connections/Components | SFP-10G-LRM 10 GB Multi Mode Optical Transceivers (Non-Erate Portion) | 80 | 179 | 14,320 |
| Network/Access Costs | OS6450-P48 POE Network Switch (Non-Erate Portion) | 110 | 1,297 | 142,670 |
| Network/Access Costs | OS6860-P48 POE Network Switch (Non-Erate Portion) | 75 | 2,128 | 159,600 |
| Connections/Components | Wiring CAT 6e RJ45 Insert and 1 Port Biscuit Enclosure (NonErate Portion) | 6,048 | 4 | 24,192 |
| Connections/Components | Wiring 48-Port Cat 5e Patch Panel Rack Mount (Non-Erate Portion | 150 | 10 | 1,500 |
| Connections/Components | SFP-10G-C1M 10 Gigabit direct attached copper cable (Non-Erate Portion) | 100 | 27 | 2,700 |
| Connections/Components | Wiring 7 Foot Green Cat 6e Patch Cords Booted (Non-Erate Portion) | 6,000 | 10 | 60,000 |
| Network/Access Costs | Meraki MR34 WAP | 148 | 750 | 111,000 |
| Connections/Components | 1000 Foot CAT 6E Cable | 150 | 160 | 24,000 |
| Connections/Components | Wiring Installation Hardware (Non-Erate Portion) | 5 | 75,000 | 375,000 |
| Testing | Wiring Labor to Certify Cat 6e Cabling (Non-Erate Portion) | 100 | 12 | 1,200 |
| Professional Services | Wiring Project Management, Engineering and Documentation (Non-Erate Portion) | 5 | 1,500 | 7,500 |
| Network/Access Costs | Liebert Challenger 3000 AC Unit for Server Room | 1 | 50,000 | 50,000 |
| Network/Access Costs | Liebert NPower 130 KVA UPS 480V 3 Phase Uninterruptible Power System | 1 | 62,086 | 62,086 |
| Network/Access Costs | Meraki MR42-HW-BDL3 | 5 | 944 | 4,720 |
| Network/Access Costs | Cisco VS-C6513-S720-10G | 4 | 23,317 | 93,268 |
| Network/Access Costs | Cisco WS-C6504-E-WISM | 1 | 41,867 | 41,867 |

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**1. Describe how you intend to use Smart Schools Bond Act funds for high-speed broadband and/or wireless connectivity projects in the community.**

(No Response)

**2. Please describe how the proposed project(s) will promote student achievement and increase student and/or staff access to the Internet in a manner that enhances student learning and/or instruction outside of the school day and/or school building.**

(No Response)

**3. Community connectivity projects must comply with all the necessary local building codes and regulations (building and related permits are not required prior to plan submission).**

☐ I certify that we will comply with all the necessary local building codes and regulations.

**4. Please describe the physical location of the proposed investment.**

(No Response)

**5. Please provide the initial list of partners participating in the Community Connectivity Broadband Project, along with their Federal Tax Identification (Employer Identification) number.**

| Project Partners | Federal ID # |
|---|---|
| (No Response) | (No Response) |

**6. If you are submitting an allocation for Community Connectivity, complete this table.**
**Note that the calculated Total at the bottom of the table must equal the Total allocation for this category that you entered in the SSIP Overview overall budget.**

| | Sub-Allocation |
|---|---|
| Network/Access Costs | (No Response) |
| Outside Plant Costs | (No Response) |
| Tower Costs | (No Response) |
| Customer Premises Equipment | (No Response) |
| Professional Services | (No Response) |
| Testing | (No Response) |
| Other Upfront Costs | (No Response) |
| Other Costs | (No Response) |
| **Totals:** | |

**7. Please detail the type, quantity, per unit cost and total cost of the eligible items under each sub-category.**

| Select the allowable expenditure type.<br>Repeat to add another item under each type. | Item to be purchased | Quantity | Cost per Item | Total Cost |
|---|---|---|---|---|
| (No Response) | (No Response) | (No Response) | (No Response) | (No Response) |

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**1. In order for students and faculty to receive the maximum benefit from the technology made available under the Smart Schools Bond Act, their school buildings must possess sufficient connectivity infrastructure to ensure that devices can be used during the school day. Smart Schools Investment Plans must demonstrate that sufficient infrastructure that meets the Federal Communications Commission's 100 Mbps per 1,000 students standard currently exists in the buildings where new devices will be deployed, or is a planned use of a portion of Smart Schools Bond Act funds, or is under development through another funding source.**
**Smart Schools Bond Act funds used for technology infrastructure or classroom technology investments must increase the number of school buildings that meet or exceed the minimum speed standard of 100 Mbps per 1,000 students and staff within 12 months. This standard may be met on either a contracted 24/7 firm service or a "burstable" capability. If the standard is met under the burstable criteria, it must be:**
**1. Specifically codified in a service contract with a provider, and**
**2. Guaranteed to be available to all students and devices as needed, particularly during periods of high demand, such as computer-based testing (CBT) periods.**
**Please describe how your district already meets or is planning to meet this standard within 12 months of plan submission.**

Our district is committed to meeting or exceeding the Federal Communications Commission (FCC) standard of 100 Mbps per 1,000 students as a future goal to be implemented when our district demand for bandwidth necessitates it. Our current enrollment is 2500 students and we have taken proactive steps to ensure we have the demand of 250 MBPS through enrollment two years ago into BOCES BOETie and installing 10 Gigabyte fiber connection with Nassau BOCES BoTIE ISP to our middle school server room. This fiber connection will provide out district the needed bandwidth for years to come. This network gives us the ability to burst our bandwidth speed when needed beyond our current bandwidth level and beyond the FCC standard. Based on the Connectivity Speed Waiver Criteria and the Oversubscription Ratio for Large Districts, Nassau BOCES has assured us that we have sufficient infrastructure to support the larger bandwidth requirement -- when it becomes necessary and available.
All buildings are connected to the internet via our ISP – BOCES BOETie and LIFE/Sidera Fiber. In connection with Nassau BOCES BOTie, the district will use LIFE/Sidera for data communication between buildings Supporting 10GB connection speeds.
Lastly, we will be making all of the connectivity project steps to resolve the closet to classroom roadblock and to attain a connectivity speed of 1.0 Gb by 1/30/18.

**1a. If a district believes that it will be impossible to meet this standard within 12 months, it may apply for a waiver of this requirement, as described on the Smart Schools website. The waiver must be filed and approved by SED prior to submitting this survey.**

☑ By checking this box, you are certifying that the school district has an approved waiver of this requirement on file with the New York State Education Department.

**2. Connectivity Speed Calculator (Required)**

| | Number of Students | Multiply by 100 Kbps | Divide by 1000 to Convert to Required Speed in Mb | Current Speed in Mb | Expected Speed to be Attained Within 12 Months | Expected Date When Required Speed Will be Met |
|---|---|---|---|---|---|---|
| Calculated Speed | 2,500 | 100 | 250 | 10MB | 10MB | 1/30/2018 |

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**3. If the district wishes to have students and staff access the Internet from wireless devices within the school building, or in close proximity to it, it must first ensure that it has a robust Wi-Fi network in place that has sufficient bandwidth to meet user demand.**
**Please describe how you have quantified this demand and how you plan to meet this demand.**

We certify that we already have a robust, district-wide wireless network in place in secondary schools in our district and plan future upgrades through the Smart Schools Bond Act and our own budget to improve performance and coverage in future years. We currently have Cisco Meraki wireless access points and controllers that support the use of over 1,200 Chromebooks with WiFi access. We have quantified the wireless demand based on class size and assuming maximum access of one device per student. Every secondary school classroom is wired for wireless and has its own Meraki wireless access point which provides a density of coverage in all of our secondary schools that meets all of the current wireless needs of our district's secondary 1:1 initiative.

**4. All New York State public school districts are required to complete and submit an Instructional Technology Plan survey to the New York State Education Department in compliance with Section 753 of the Education Law and per Part 100.12 of the Commissioner's Regulations.**
**Districts that include educational technology purchases as part of their Smart Schools Investment Plan must have a submitted and approved Instructional Technology Plan survey on file with the New York State Education Department.**

☑ By checking this box, you are certifying that the school district has an approved Instructional Technology Plan survey on file with the New York State Education Department.

**5. Describe the devices you intend to purchase and their compatibility with existing or planned platforms or systems. Specifically address the adequacy of each facility's electrical, HVAC and other infrastructure necessary to install and support the operation of the planned technology.**

Devices purchased would be HP Apollo 4500 servers to support Hybrid network client software already purchased within our current schools budget and replace outdated IBM Server hardware equipment that is no longer supported by IBM and no longer supplied by Lenovo. The equipment will also add storage space for a Hybrid 2012 Microsoft solution. We would also purchase a SAN (Storage Area Network) to remove the risk internet interruption. A backup server to ensure that data is always available in the event of a critical failure. These hardware items are listed in under **question 15**. We currently pay for the software to support such a solution but lack the physical hardware to implement district wide solution. Since we have already funded a secondary 1:1 Chromebook initiative within our budget, and have committed to an ongoing upgrade cycle using an overlapping lease model. We need to add wireless to the elementary buildings and rebuild the infrastructure of our outdated network to support these classroom devices. Every classroom already has a computer connected to a projector and an existing interactive whiteboard. We will replace outdated Wyse terminals that support the District Computer labs only. Classes still run from these computer Labs. We have seven computer labs and 30 stations in each lab. The classroom computers need bandwidth to support the high bandwidth demand of video and interactive testing. Equipment purchase will replace existing outdated equipment that supports outdated fiber technology to the classrooms. Power HVAC has been investigated by the architect Michael Guido

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**6. Describe how the proposed technology purchases will:**

- **> enhance differentiated instruction;**
- **> expand student learning inside and outside the classroom;**
- **> benefit students with disabilities and English language learners; and**
- **> contribute to the reduction of other learning gaps that have been identified within the district.**

**The expectation is that districts will place a priority on addressing the needs of students who struggle to succeed in a rigorous curriculum. Responses in this section should specifically address this concern and align with the district's Instructional Technology Plan (in particular Question 2 of E. Curriculum and Instruction: "Does the district's instructional technology plan address the needs of students with disabilities to ensure equitable access to instruction, materials and assessments?" and Question 3 of the same section: "Does the district's instructional technology plan address the provision of assistive technology specifically for students with disabilities to ensure access to and participation in the general curriculum?"**

The district currently sees buffering of student software using flash, GoMath, IXL, Goggle Docs and BrainPoP are just some of the software that students see issues with the lack of bandwidth and server response times due to outdated equipment. The Library students are using Chromebooks to research and have complained about buffering and the degraded network response times. We have diagnosed our servers and CPU utilization is 99% creating adding to the problems. We have maxed out our memory with in our current equipment so we are desperate to replace 8 to 10 old server equipment.

The classrooms need to have technology available and working to provide differentiated instruction for all students. The students are limited to the amount of students that can utilize instructional technology at the same time. Since teachers have had issues with some applications working with the limited resources on our network they do not feel comfortable to include many technology applications available and curtail instruction to just the basics that they know work in the classroom. Until we remove these obstacles in our network the staff will not make use of educational software and reduce the differentiated instruction. Virtual classroom field trips are limited because of the issues we currently have with available bandwidth. All students are limited and unfortunately this impacts students with disabilities and those students requiring ESL instruction the most since they are in need of the available tools through the use of educational applications that target this group.

The Smart Schools Bond Act Investment Plan would benefit ELL students with this investment. The district has an increasing population of Spanish speaking students. We are supporting our ELLs with multimedia reading program that helps students develop English fluency.

The students need bandwidth for online products that support student's needs. Rosetta Stone, Kurzweil 3000 and Lexia Reading are just a few software applications that would benefit from the updated equipment and technology. Providing a host of online software that is updated online and bring our ELL students software that is not only current but has the verity available to meet the specific needs of these children. Island Trees Math and Science classrooms would be able to provide Scientific Learning Reading Assistant and My Reading Coach to help ELL students understand the phonics and meanings of scientific and mathematical syntax.

The Smart Schools Bond Act Investment Plan funding request for infrastructure upgrades will provide the required bandwidth necessary to support flash, video and interactive testing for all students. Those students who struggle will benefit from this upgrade since research has shown that struggling students make greater use of technology and show greater improvement when technology educational tools are used.

The focus of this particular technology is primarily targeted at classroom instruction and learning and does not, on its own, enhance parental communication. However, built-in functionality of the software used with interactive whiteboards and flat panels allows teachers to share presentations with students and parents at home, and we will continue to take advantage of this functionality. The district has already invested in distance learning equipment, software, and professional development, including videoconferencing equipment and Facetime/Skype software. These tools will integrate with the new flat panel displays allowing us to enhance and increase distance learning opportunities, whether they be for a student who is homebound or for students in class to collaborate with peers and experts beyond the school or take virtual field trips to museums and other agencies offering remote access experiences

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**7. Where appropriate, describe how the proposed technology purchases will enhance ongoing communication with parents and other stakeholders and help the district facilitate technology-based regional partnerships, including distance learning and other efforts.**

The purchase will provide the computer labs updated equipment to ensure areas for testing and provide staff and students the equipment needed to support the necessary curriculum. At Island Trees UFSD we stress how important it is to continue working towards completing homework every night, studying, and reviewing classroom notes. The Island Trees website promotes Homework Online along with reverse classroom technology allowing staff to support student growth in all subject areas. The flipped classroom is one avenue that teachers have taken on in all academic areas and is proving to be a success. The technology requires the infrastructure to support large bandwidth for it to succeed. The Island Trees UFSD has purchased over 1200 Chormebook devices currently and plans to purchase 800 more during the 2016-2017 school year.

**8. Describe the district's plan to provide professional development to ensure that administrators, teachers and staff can employ the technology purchased to enhance instruction successfully.**

**Note: This response should be aligned and expanded upon in accordance with your district's response to Question 1 of F. Professional Development of your Instructional Technology Plan: "Please provide a summary of professional development offered to teachers and staff, for the time period covered by this plan, to support technology to enhance teaching and learning. Please include topics, audience and method of delivery within your summary."**

We have been seeking to initiate a digital media class that would provide video editing and promote the use of broadcasting classes. These classes in the secondary schools would promote the use of broadcast video techniques instructing students in the use of video editing video animation and video journalism. The goal would be to present school events each morning through broadcasting to the classroom. Professional development are integral components of our technology plan and are part and parcel of our Smart Schools Bond Act Investment Plan. Our district has added staffing that is dedicated to professional development in each school. These technology staff developers are assigned to each school, work closely with all staff, and will provide training to teachers to support all technology purchased to enhance and support instruction. Teachers make appointments during preparation periods, lunch periods, or before or after school and receive individual training from these technology resource staff members. Teachers also receive training in the form of workshops offered through grade level, department, and team and faculty meetings. Technology staff developers also push into classrooms and co-teach lessons with classroom teachers to model best practices. In addition, a robust after-school Technology Academy Staff Development Program offers in-service credit to teachers who take professional development courses that focus on technology integration strategies. These courses are taught by colleagues who are paid a fee to share their knowledge with their colleagues and are available for ongoing support. All of these training strategies will be employed to help teachers gain comfort with new technology, understand the new functionality, and apply it to classroom instruction in order to enhance and support teaching and learning in classrooms.

**9. Districts must contact the SUNY/CUNY teacher preparation program that supplies the largest number of the district's new teachers to request advice on innovative uses and best practices at the intersection of pedagogy and educational technology.**

☑ By checking this box, you certify that you have contacted the SUNY/CUNY teacher preparation program that supplies the largest number of your new teachers to request advice on these issues.

**9a. Please enter the name of the SUNY or CUNY Institution that you contacted.**

(No Response)

**9b. Enter the primary Institution phone number.**

(No Response)

**9c. Enter the name of the contact person with whom you consulted and/or will be collaborating with on innovative uses of technology and best practices.**

(No Response)

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**10. A district whose Smart Schools Investment Plan proposes the purchase of technology devices and other hardware must account for nonpublic schools in the district.**

**Are there nonpublic schools within your school district?**

☐ Yes
☑ No

**11. Nonpublic Classroom Technology Loan Calculator**

**The Smart Schools Bond Act provides that any Classroom Learning Technology purchases made using Smart Schools funds shall be lent, upon request, to nonpublic schools in the district. However, no school district shall be required to loan technology in amounts greater than the total obtained and spent on technology pursuant to the Smart Schools Bond Act and the value of such loan may not exceed the total of $250 multiplied by the nonpublic school enrollment in the base year at the time of enactment.**

**See:**

**http://www.p12.nysed.gov/mgtserv/smart_schools/docs/Smart_Schools_Bond_Act_Guidance_04.27.15_Final.pdf.**

| | 1. Classroom Technology Sub-allocation | 2. Public Enrollment (2014-15) | 3. Nonpublic Enrollment (2014-15) | 4. Sum of Public and Nonpublic Enrollment | 5. Total Per Pupil Sub-allocation | 6. Total Nonpublic Loan Amount |
|---|---|---|---|---|---|---|
| Calculated Nonpublic Loan Amount | (No Response) | (No Response) | (No Response) | (No Response) | (No Response) | (No Response) |

**12. To ensure the sustainability of technology purchases made with Smart Schools funds, districts must demonstrate a long-term plan to maintain and replace technology purchases supported by Smart Schools Bond Act funds. This sustainability plan shall demonstrate a district's capacity to support recurring costs of use that are ineligible for Smart Schools Bond Act funding such as device maintenance, technical support, Internet and wireless fees, maintenance of hotspots, staff professional development, building maintenance and the replacement of incidental items. Further, such a sustainability plan shall include a long-term plan for the replacement of purchased devices and equipment at the end of their useful life with other funding sources.**

☑ By checking this box, you certify that the district has a sustainability plan as described above.

**13. Districts must ensure that devices purchased with Smart Schools Bond funds will be distributed, prepared for use, maintained and supported appropriately. Districts must maintain detailed device inventories in accordance with generally accepted accounting principles.**

☑ By checking this box, you certify that the district has a distribution and inventory management plan and system in place.

**14. If you are submitting an allocation for Classroom Learning Technology complete this table.**

**Note that the calculated Total at the bottom of the table must equal the Total allocation for this category that you entered in the SSIP Overview overall budget.**

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| | Sub-Allocation |
|---|---|
| Interactive Whiteboards | 0 |
| Computer Servers | 260,000 |
| Desktop Computers | 80,850 |
| Laptop Computers | 0 |
| Tablet Computers | 0 |
| Other Costs | 0 |
| **Totals:** | 340,850.00 |

**15. Please detail the type, quantity, per unit cost and total cost of the eligible items under each sub-category.**

| Select the allowable expenditure type.<br>Repeat to add another item under each type. | Item to be Purchased | Quantity | Cost per Item | Total Cost |
|---|---|---|---|---|
| Computer Servers | HP APOLLO 4500 Series | 10 | 16,000 | 160,000 |
| Desktop Computers | Dell 5012-D10D AMD G-T48E 8GB Flash 2GB RAM Wyse Thin OS Thin Client Dell 5012-D10D AMD G-T48E 8GB Flash 2GB RAM Wyse Thin Client | 210 | 385 | 80,850 |
| Computer Servers | Backup Appliance Hardware DDY68-CR02-013A Quantum DXI6802 SAN Array | 1 | 100,000 | 100,000 |

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**1. Provide information regarding how and where the district is currently serving pre-kindergarten students and justify the need for additional space with enrollment projections over 3 years.**

(No Response)

**2. Describe the district's plan to construct, enhance or modernize education facilities to accommodate pre-kindergarten programs. Such plans must include:**

**- Specific descriptions of what the district intends to do to each space;**
**- An affirmation that pre-kindergarten classrooms will contain a minimum of 900 square feet per classroom;**
**- The number of classrooms involved;**
**- The approximate construction costs per classroom; and**
**- Confirmation that the space is district-owned or has a long-term lease that exceeds the probable useful life of the improvements.**

(No Response)

**3. Smart Schools Bond Act funds may only be used for capital construction costs. Describe the type and amount of additional funds that will be required to support ineligible ongoing costs (e.g. instruction, supplies) associated with any additional pre-kindergarten classrooms that the district plans to add.**

(No Response)

**4. All plans and specifications for the erection, repair, enlargement or remodeling of school buildings in any public school district in the State must be reviewed and approved by the Commissioner. Districts that plan capital projects using their Smart Schools Bond Act funds will undergo a Preliminary Review Process by the Office of Facilities Planning.**

| Project Number |
|---|
| (No Response) |

**5. If you have made an allocation for Pre-Kindergarten Classrooms, complete this table.**
**Note that the calculated Total at the bottom of the table must equal the Total allocation for this category that you entered in the SSIP Overview overall budget.**

| | Sub-Allocation |
|---|---|
| Construct Pre-K Classrooms | (No Response) |
| Enhance/Modernize Educational Facilities | (No Response) |
| Other Costs | (No Response) |
| **Totals:** | |

**6. Please detail the type, quantity, per unit cost and total cost of the eligible items under each sub-category.**

| Select the allowable expenditure type.<br>Repeat to add another item under each type. | Item to be purchased | Quantity | Cost per Item | Total Cost |
|---|---|---|---|---|
| (No Response) | (No Response) | (No Response) | (No Response) | (No Response) |

# Smart Schools Investment Plan - Infrastructure-Work-11-02-15

Replace Transportable Classrooms

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**1. Describe the district's plan to construct, enhance or modernize education facilities to provide high-quality instructional space by replacing transportable classrooms.**

(No Response)

**2. All plans and specifications for the erection, repair, enlargement or remodeling of school buildings in any public school district in the State must be reviewed and approved by the Commissioner. Districts that plan capital projects using their Smart Schools Bond Act funds will undergo a Preliminary Review Process by the Office of Facilities Planning.**

| Project Number |
|---|
| (No Response) |

**3. For large projects that seek to blend Smart Schools Bond Act dollars with other funds, please note that Smart Schools Bond Act funds can be allocated on a pro rata basis depending on the number of new classrooms built that directly replace transportable classroom units.**

**If a district seeks to blend Smart Schools Bond Act dollars with other funds describe below what other funds are being used and what portion of the money will be Smart Schools Bond Act funds.**

(No Response)

**4. If you have made an allocation for Replace Transportable Classrooms, complete this table.**
**Note that the calculated Total at the bottom of the table must equal the Total allocation for this category that you entered in the SSIP Overview overall budget.**

| | Sub-Allocation |
|---|---|
| Construct New Instructional Space | (No Response) |
| Enhance/Modernize Existing Instructional Space | (No Response) |
| Other Costs | (No Response) |
| **Totals:** | |

**5. Please detail the type, quantity, per unit cost and total cost of the eligible items under each sub-category.**

| Select the allowable expenditure type.<br>Repeat to add another item under each type. | Item to be purchased | Quantity | Cost per Item | Total Cost |
|---|---|---|---|---|
| (No Response) | (No Response) | (No Response) | (No Response) | (No Response) |

# Smart Schools Investment Plan - Infrastructure-Work-11-02-15

High-Tech Security Features

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**1. Describe how you intend to use Smart Schools Bond Act funds to install high-tech security features in school buildings and on school campuses.**

(No Response)

**2. All plans and specifications for the erection, repair, enlargement or remodeling of school buildings in any public school district in the State must be reviewed and approved by the Commissioner. Districts that plan capital projects using their Smart Schools Bond Act funds will undergo a Preliminary Review Process by the Office of Facilities Planning.**

| Project Number |
|---|
| (No Response) |

**3. Was your project deemed eligible for streamlined Review?**

☐ Yes
☐ No

**4. Include the name and license number of the architect or engineer of record.**

| Name | License Number |
|---|---|
| (No Response) | (No Response) |

**5. If you have made an allocation for High-Tech Security Features, complete this table.**
**Note that the calculated Total at the bottom of the table must equal the Total allocation for this category that you entered in the SSIP Overview overall budget.**

| | Sub-Allocation |
|---|---|
| Capital-Intensive Security Project (Standard Review) | (No Response) |
| Electronic Security System | (No Response) |
| Entry Control System | (No Response) |
| Approved Door Hardening Project | (No Response) |
| Other Costs | (No Response) |
| **Totals:** | |

**6. Please detail the type, quantity, per unit cost and total cost of the eligible items under each sub-category.**

| Select the allowable expenditure type.<br>Repeat to add another item under each type. | Item to be purchased | Quantity | Cost per Item | Total Cost |
|---|---|---|---|---|
| (No Response) | (No Response) | (No Response) | (No Response) | (No Response) |