

Township of Ocean School District



Three Year Technology Plan

Ocean Township, NJ
2013 - 2016



State of New Jersey

DEPARTMENT OF EDUCATION

PO Box 500

TRENTON, NJ 08625-0500

CHRIS CHRISTIE
Governor

KIM GUADAGNO
Lt. Governor

CHRISTOPHER D. CERF
Commissioner

July 11, 2013

Mr. John Lysko
Superintendent of Schools
Township of Ocean Board of Education
163 Monmouth Road
Oakhurst, NJ 07755

Technology Plan Approval Letter

Laurence Cocco, Director of the Office of Educational Technology for the New Jersey Department of Education, is certified by the Universal Service Administrative Company to approve technology plans as required for participation in the Schools and Libraries Program (E-Rate).

Township of Ocean School District has a technology plan that meets required E-Rate program elements.

This technology plan covers the period starting on July 1, 2013 and ending on June 30, 2016.

All applicants and service providers are required to retain documents related to the Universal Service Fund for a period of at least **five (5) years from last date of service**. The suggested list of documents to be retained can be found in Paragraphs 45-50 in the FCC's 5th Report and Order ([FCC 04-190](#)).

If you have any questions please send an email to edtech@doe.state.nj.us.

Name: Laurence Cocco
Director, Office of Educational Technology
Division of Innovation

Signature:

Date:

7-11-13

Stakeholders

2013 – 2016 District Technology Committee Members

Rob Acerra,
Parent, BOE member, and Businessman

Michelle Cartaya,
Social Studies Teacher

Marion Conrad,
Assistant Superintendent - Curriculum

MaryAnn Conway,
Parent and Help Desk Support

Donna Emeric,
Librarian

Kristin Gasser,
Teacher

George Glynn,
Parent and Businessman

Kathy Hackler,
Librarian

Michael Hall,
Network Manager

Karen Jardel,
Student Data Base System Manager

Ken Jannarone,
School Business Administrator

Shalom Labkovski
Math Teacher

Rich Long,
BOE member

John Lysko,
Superintendent

James Maliff,
Assistant Principal

Roseann McCarthy,
Science Teacher

Kathryn Miller,
Director of Guidance

Elizabeth Paterno
Special Ed. Teacher

Denise Ricciardi,
Asst. Superintendent of Special Services

John Ryan
Student

Patrick Sullivan,
Supervisor of Science

Cathy Young,
Librarian

Rob Acerra

Michelle Cartaya

Marion Conrad

MaryAnn Conway

Donna Emeric

Kristin Gasser

George Glynn

Kathy Hackler

Michael Hall

Karen Jardel

Ken Jannarone

Shalom Labkovski

Rich Long

John Lysko

James Maliff

Roseann McCarthy

Kathryn Miller

Elizabeth Paterno

Denise Ricciardi

John Ryan

Patrick Sullivan

Cathy Young

1. Technology Needed to Improve Student Academic Achievement

Technology Plan Checklist for NJ School Districts/Charter Schools (2013 - 2016) TECHNOLOGY INVENTORY			
Area of Need	Describe for 2013-14	Describe for 2014-15	Describe for 2015-16
Technology Equipment including assistive technologies	Provide 1 to 1 computer access for students in grades 4 and 5. Replace aging computers at the Elementary Schools. Enhancements of existing assistive technology as determined by student needs.	Provide 1 to 1 computer access for students in grades 6 and 7. Replace aging computers at the High School. Enhancements of existing assistive technology as determined by student needs.	Provide 1 to 1 computer access for students in grades 3 and 8. Replace aging computers at the Intermediate School. Enhancements of existing assistive technology as determined by student needs.
Network Capacity	Evaluate and recommend changes to the network to increase Internet bandwidth. Replace 50% of the network switches at the Intermediate School	Replace remaining 50% of the network switches at the Intermediate School	Evaluate and recommend changes to the network to increase network and Internet bandwidth. Replace 30 % of the network switches at the High School
Filtering Method	LightSpeedRocket	LightSpeedRocket	LightSpeedRocket
Software used for curricular support and filtering	SuccessNet, Imagine It, eSuite, enVision	SuccessNet, Imagine It, eSuite, enVision	SuccessNet, Imagine It, eSuite, enVision
Technology Maintenance and Support	<ul style="list-style-type: none"> • Virus protection • Backup system • Software updates • Library subscriptions • Student Information System • Network Monitoring Software • Verisign • Server & UPS Maintenance 	<ul style="list-style-type: none"> • Virus protection • Backup system • Software updates • Library subscriptions • Student Information System (enhanced) • Network Monitoring Software • Verisign • Server & UPS Maintenance 	<ul style="list-style-type: none"> • Virus protection • Backup system • Software updates • Library subscriptions • Student Information System (enhanced) • Network Monitoring Software • Verisign • Server & UPS Maintenance
Tele-communications Equipment and Services	<ul style="list-style-type: none"> • Basic phone service • Internet access • Direct Internet Connections • Cell Phones 	<ul style="list-style-type: none"> • Basic phone service • Internet access • Direct Internet Connections • Cell Phones 	<ul style="list-style-type: none"> • Basic phone service • Internet access • Direct Internet Connections • Cell Phones

Area of Need	<ul style="list-style-type: none"> Website ASP Describe for 2013-14	<ul style="list-style-type: none"> Website ASP Describe for 2014-15	<ul style="list-style-type: none"> Website ASP Describe for 2015-16
Other Services	<ul style="list-style-type: none"> Maintenance of radio, security and phone services Add additional cameras and upgrade radios district wide Evaluation of emergent technologies Move to open source options 	<ul style="list-style-type: none"> Maintenance of radio, security and phone services Add additional cameras and upgrade radios district wide Evaluation of emergent technologies Move to open source options 	<ul style="list-style-type: none"> Maintenance of radio, security and phone services Add additional cameras and upgrade radios district wide Evaluation of emergent technologies Move to open source options

2. Needs Assessment:

As part of the professional development plan (district and building levels), staff members were polled for their preferences for technological professional development opportunities. Of the 217 respondents, 76.5% indicated having participated in professional development that focused on technology within the past year. Teachers expressed a desire for more technology training with SMART boards and content specific programs (eSuite and SuccessNet) as well as other areas (figure 1). Access to digital delivery devices (i.e., computers, projection devices, handheld devices) was identified to be the greatest barrier in using digital instructional materials in lesson delivery (figure 2).

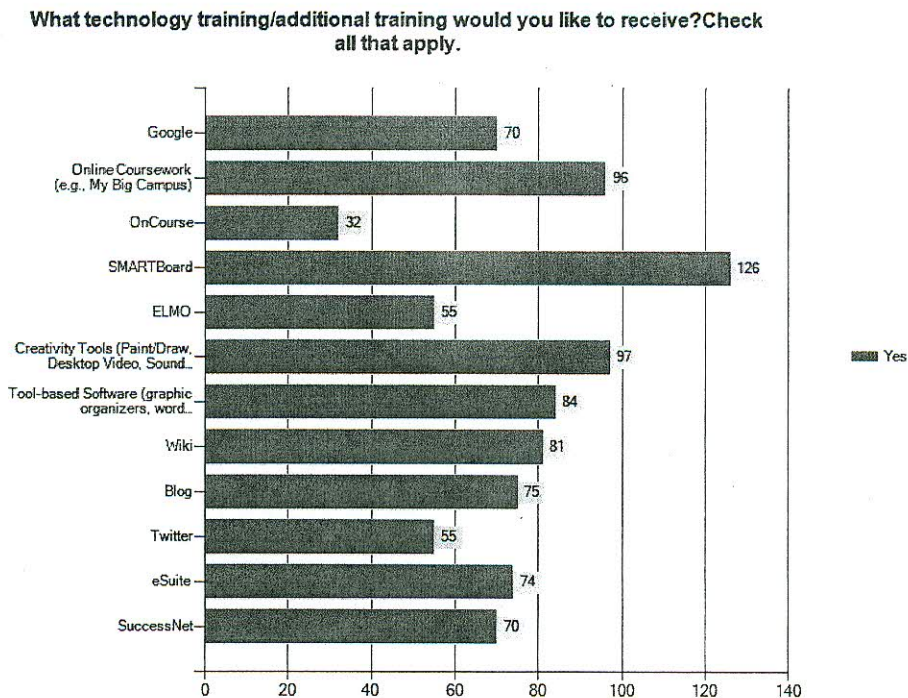


Figure 1

What do you perceive is the primary barrier to using digital instructional materials in your school?

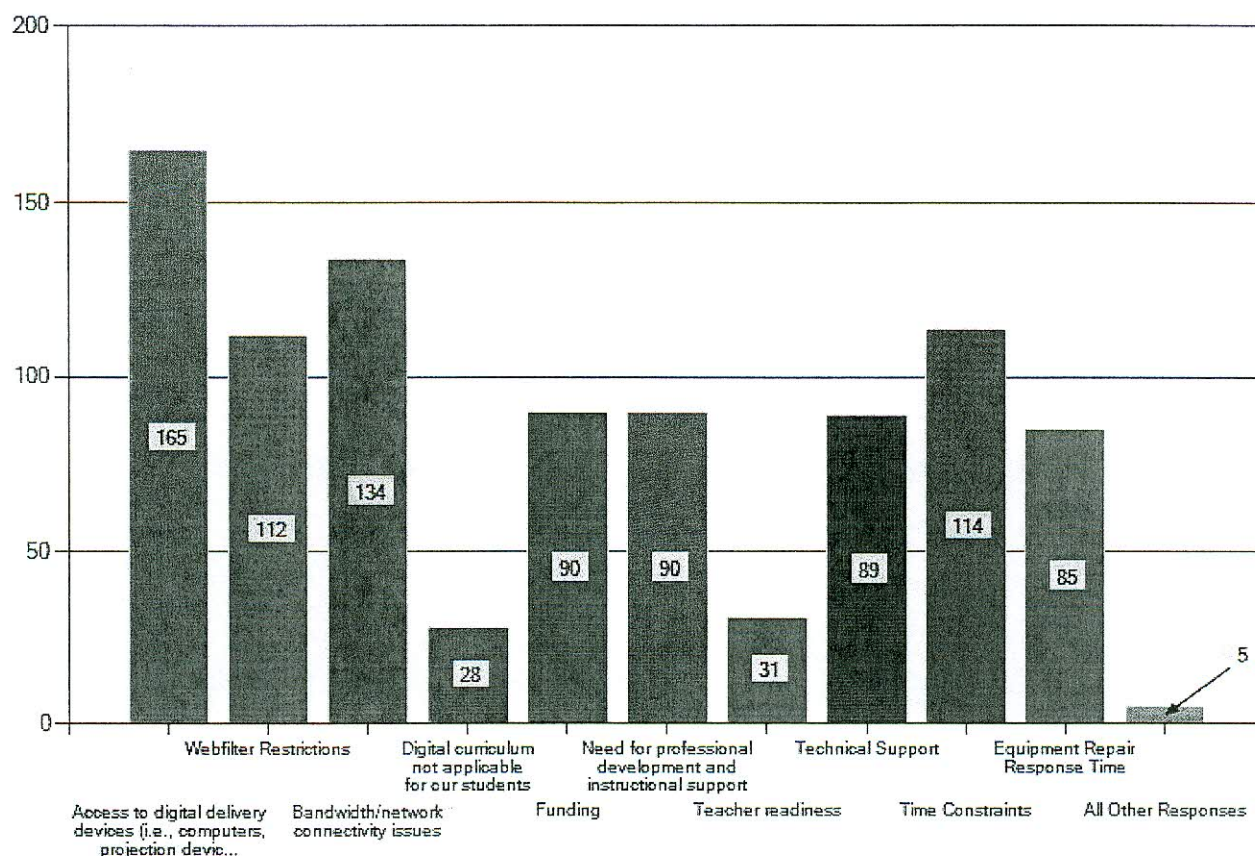


Figure 2

Currently more staff members than ever before are integrating technology into their lessons; this is based on the frequency that NJCCCS 8.1 & 8.2 are indicated in (on-line) lesson plans. This is the direct result of the district's efforts to increase available technology, for both staff and students, as well as to increase teachers' comfort-level and knowledge base through targeted professional development and technology purchases.

Beyond the 'hard tech support' provided by the Technology Department, our district employs four computer lab assistants who are versed in the use of technology. Both serve to aid students and staff in the use of district administrative software, e-mail, educational software, updating websites and providing methods for technology integration. Staff members are proficient in many Microsoft-based applications, e-mail, on-line lesson planning and grade reporting. Many others have expanded their knowledge to include mastering more advanced functions, manipulating digital media, incorporating technology in lesson design and presentation, and working on-line collaboratively.

All educators are assured access to state-of-the-art multimedia technology, high-speed wireless Internet access, and on-going professional development opportunities to facilitate technology integration. Detailed information related to professional development that focuses on technology is provided on the following table.

Descriptors	Current Educational Environment	Barriers
i. Educators are assured access to technology to facilitate technology integration across the curriculum.	Each teacher has a laptop and visual hookup in his/her classroom. Each classroom has wireless Internet access.	Technology is constantly changing and because of budget constraints, it is difficult to upgrade all of our equipment in a timely manner.
ii. Often students have access to technology to support the use of 21 st century skills in their learning environment.	Each building and each media center (in each building) has a (number of) dedicated computer labs. Additionally, the district has a number of mobile wireless laptop carts, Elmos and SMART boards. Every classroom has a ceiling mounted projector.	The challenge is to keep pace with the explosion of different technologies, the need to modernize our infrastructure, and the increasing technology needs of digital learners with a shrinking budget.
iii. The needs of educators are evaluated.	Educators' needs are determined through an annual Needs Assessment survey, lesson plans and observations, and professional dialogue.	Limited time for professional development and the diverse developmental needs of our staff, coupled with shrinking budgets, presents challenges in training.
iv. The needs of students are evaluated.	Students' needs are assessed through grades in technology-based classes, integrated technology activities/projects, and through teacher observation.	Students' diverse technological skills and diverse accessibility to home technology presents challenges in instruction.
v. Past professional development addressed the educators' and students' needs for technology integration.	Educators are encouraged to attend workshops as deemed necessary for professional growth. The district has provided numerous opportunities within the district for additional professional development.	Limited time for professional development, shrinking budgets, and the diverse developmental needs of our staff and students presents challenges in training.
vi. Past professional development for all administrators was provided to further support the effective use of technology in the classroom or library media center.	All administrators are encouraged to attend workshops and webinars as deemed necessary for professional growth. The district has provided numerous opportunities within the district for additional professional development. Many district	A number of barriers exist including: lack of expertise, equipment availability, time, and financial constraints. Limited personnel in the tech dept. have had a great impact on technology usage.

	administrators attended iPad training and as a result, received an iPad that is used regularly.	
vii. Supports were provided for educators other than professional development.	District technology staff (Technology Department, Help Desk), computer lab assistants and the Network Manager provide ongoing support to encourage greater use and integration of technology.	A number of barriers exist including: lack of expertise, teaching style, equipment availability, time, and growing financial constraints. Limited personnel in the tech dept. have had a great impact on technology usage.
viii. Professional development needs and barriers related to using educational technology as part of instruction have been identified.	The Brookdale Network provides opportunities for select staff to receive technology PD, and additional PD offerings are made throughout the year.	A number of barriers exist including: lack of expertise, teaching style, equipment availability, time, and growing financial constraints. Limited personnel in the tech dept. have had a great impact on technology usage.

Based on the information above, the needs of the district to improve academic achievement for all students through the use of technology must include expanded professional development for teachers and administrators, the continued expansion of bandwidth to accommodate exponential growth of the network, increased staffing in the technology department, and more computers in the hands of students. Additional professional development in the areas of technology use, differentiated instruction, and technology integration must also be offered.

The identified needs are prioritized as follows:

- Successful budget process
- Increase technology support personnel
- Purchase additional equipment
 - Student computers
 - Increased bandwidth
- Improve communication between the technology department and staff members
- Provide additional time that can be devoted toward professional development
- Provide additional professional development in the areas of technology use, differentiated instruction, and technology integration

3 and 4. Three-year Goals & Implementation Strategies

DISTRICT GOAL I: To use technology to improve instruction and to provide opportunities to acquire technological skills.

Objective 1.1	Integrate content with interactive and on-line technology resources across the curriculum.			
	STRATEGY/ACTIVITY	TIMELINE	PERSON RESPONSIBLE	DOCUMENTATION
	1. Provide and support models that emphasize the use of technology in curriculum areas.	7/13 - 6/2016	Asst. Supt. Principals Supervisors	Meeting Agendas Handout Materials
	2. Schedule presentations to demonstrate new technologies and applications to content.	7/13 - 6/2016	Asst. Supt. Principals Supervisors SIP	Meeting Agendas Handout Materials
	3. Provide PD for staff members in the area of technology	7/13 - 6/2016	Asst. Supt. Principals Supervisors SIP	Ed. Leave Reports Building based PD
	4. Plan site visits for key staff members to research effective uses of technology in program areas.	7/13 - 6/2016	Supervisors Instructional Staff	Ed. Leave Reports
	5. Incorporate technology skills into all curriculum areas as per the NJCCCS and CCSS	7/13 - 6/2016	Asst. Supt. Principals Supervisors Instructional Staff	Lesson Plans Meeting Agenda Handout Materials
	6. Improve communication with parents and community through expanded technology utilization: <ul style="list-style-type: none"> • Emergency Communications • Parent Portal • Ocean Website • Academic and Attendance Records • Teacher Websites • Twitter • Facebook • E-backpack 	7/13 - 6/2016	Superintendent Asst. Supt. Principals Supervisors Instructional Staff	Access Logs Websites

Objective 1.2	Update curriculum to integrate 21st Century Skills, Technology Skills, NJCCCS and CCSS.			
	STRATEGY/ACTIVITY	TIMELINE	PERSON RESPONSIBLE	DOCUMENTATION
	1. Review curriculum and impending PARCC requirements to identify specific technology needs.	Ongoing	Asst. Supt. Supervisors Instructional Staff	Meeting Agenda Ed. Leave Reports
	2. Review and evaluate new and existing software, on-line resources, multimedia resources related to curriculum.	Ongoing	Asst. Supt. Supervisors Instructional Staff	Meeting Agenda Handout Materials
	3. Plan for instructional staff to visit other schools implementing technology.	As needed	Asst. Supt. Principals Supervisors Instructional Staff	Ed. Leave Reports
	4. Support the development of grade level/program-based plans to infuse technology into each area.	Ongoing	Asst. Supt. Principals Supervisors Instructional Staff	Meeting Agenda Handout Materials Program Plans
	5. Review, on a regular basis, current research relevant to instructional programs, learning, assessments, and technology.	Ongoing	Asst. Supt. Principals Supervisors Instructional Staff	Print Materials PDF downloads Meeting Agendas
	6. Attend seminars, conferences and meetings.	Ongoing	All Staff	Ed. Leave Reports

Objective 1.3	Continue to align software, curriculum needs and appropriate technology-based tools.			
	STRATEGY/ACTIVITY	TIMELINE	PERSON RESPONSIBLE	DOCUMENTATION
	1. Provide instructional staff with the opportunity to view new technology resources (hardware and software).	Ongoing	Asst. Supt. Principals Supervisors Network Manager	Ed. Leave Reports Handout Materials
	2. Provide instructional staff with the opportunity to include Internet based learning opportunities/projects as part of revised curriculum.	Ongoing	Asst. Supt. Principals Supervisors	Meeting Agendas Lesson Plans
	3. Include technology components as new curriculum materials are adopted.	Ongoing	Asst. Supt. Principals Supervisors	Meeting Agendas Lesson Plans Dist. Curriculum Guides
	4. Implement effective systems for addressing equipment malfunctions, installations, and summer projects	Ongoing	Superintendent Asst. Supt. Principals Network Manager Maintenance Dept. Technology Dept.	System Plan Summer Project Timeline Purchase & Installation Timeline

DISTRICT GOAL II: Implement consistent, ongoing professional development and support in order to further develop instructional staffs' expertise in utilizing technology within the disciplines as a tool for improved teaching and learning.

Objective 2.1	Expand the district's staff development plan to include varied levels and modes of (integrated) technology training.			
	ACTIVITY	TIMELINE	PERSON RESPONSIBLE	DOCUMENTATION
	1. Identify a multifaceted approach to providing staff development.	9/13 - 6/2016	Asst. Supt. Principals Supervisors SIP	Meeting Agenda Handout Materials Ed. Leave Reports PD Plans
	2. Survey instructional staff and identify sessions based on levels of expertise.	Ongoing	SIP	School-based surveys
	3. Based on needs, offer a series of sessions including varied times and locations as well as during scheduled meeting times.	10/13 - 6/2016	Principals Content Area Supervisors SIP	PD Sign-in Sheets Meeting Agendas
	4. Work with grade level/program area staff to determine more effective curriculum – technology infusion techniques.	7/13 - 6/2016	Principals Supervisors SIP	Meeting Agendas Lesson Plans Handout Materials
	5. Encourage instructional staff to include a technology component in the professional development plans of each staff member	7/13 - 6/2016	Principals Supervisors	Meeting Agendas Lesson Plans PDP's Observations
	6. Provide training and technology support to enable instructional staff to help students learn through use of computers and through accessing information on the Internet.	9/13 - 6/2016	Asst. Supt. Principals SIP Supervisors Computer Lab Assistants Network Manager	Meeting Agendas PD Sign-in Sheets Ed. Leave Reports Help Desk Logs

5. Professional Development

- a. The Assistant Superintendent of Schools (Curriculum & Instruction) and each School Improvement Panel (SIP) is responsible for coordinating the professional development activities in the Technology Plan. Critical partners associated with technology professional development include Supervisors of Instruction, Principals, the Instructional Council, and the District Technology Committee.

Sustained, focused, and high quality professional development for 2013-2016 will target the infusion of technology into the curriculum at all grade levels. Job embedded professional development will be delivered through PLC meetings, grade level meetings, department meetings, and faculty meetings. Planned professional development activities for teachers, administrators, and school library personnel will be provided through participation in the Brookdale Technology Network, Techspo 2013-2016, and job embedded training programs. Participation in the Microsoft Network also affords staff and students opportunities for growth in the area of technology.

These workshops will provide staff members with a knowledge and understanding of the role of technology in promoting student learning and professional development. Application programs include, but are not limited to, OnCourse Lesson Plan Management System[®], Applitrack[®], Power School[®], Administrative Observer[®], and SubFinder[®]. Projected professional development activities that will support needs through 2016 include the following: Google Applications, Windows 8, Project Based Learning, Integrating STEM throughout the curriculum, and Managing Data to Drive Instruction.

- b. Professional development opportunities exist for technical staff. These include industry based technical training in Microsoft applications, specific software, server maintenance, Citrix applications, network management, and network security. A subscription to Safari Books Online for each member of the technology department provides unending opportunities for professional growth.
- c. Professional development addressing the use of assistive technologies is provided in collaboration with the Department of Special Services. These technologies include alternative keyboards, electronic point devices, microphones and amplifying systems, tablet devices, and touch screens.

6. Evaluation Plan

- 1. Staff participation in professional development opportunities that focus on technology integration will be monitored through submitted Educational Leave Reports, informal reporting and turn-key activities.
- 2. Performance on standardized tests, such as CogAT's, SAT, and AP tests and state mandated assessments such as the NJASK4, NJASK 8, and HSPA, will be analyzed. Performance on local assessments will also be analyzed. Content Area Supervisors will also monitor their departments' embedded technology progress via OnCourse reporting systems, classroom observations, and lesson plan review. Finally, state and local graduation requirements will be reviewed.
- 3. Technological skill proficiency will be monitored through successful completion of courses such as *Computer Applications* and our mandated course for all freshmen, *Instructional Technology*.

7. Process for Mid-Course Corrections

Each school in the district has a building Technology Integration Committee that meets throughout the year with the Network Manager, Assistant Superintendent of Curriculum and Instruction, and the Student Data Base System Manager. Building level issues, technology initiatives, and relevant online resources are items of focus at such meetings.

A needs assessment survey is conducted on an annual basis and the results are shared with all the relevant stakeholders. Providing a forum for technology-focused discussions as well as obtaining valuable feedback and input from educators across the district empowers administration to make informed decisions.