

## Standard III Resources

### Standard III.C Technology Resources



SANTA ROSA JUNIOR COLLEGE



## Our Values

We value *Innovation* that includes:

- Creativity, openness and risk taking
- Multiple perspectives
- Response to demographic, global, and technological changes



# SANTA ROSA JUNIOR COLLEGE





## III.C. Technology Resources

**Technology resources are used to support student learning programs and services and to improve institutional effectiveness. Technology planning is integrated with institutional planning.**

### DESCRIPTIVE SUMMARY

Santa Rosa Junior College directly addresses technology in its Strategic Plan. Technology is considered as essential as physical facilities in supporting quality instruction and efficient operations of the institution. Goal D, Improve Facilities and Technology (below right), reflects the College's intention to embrace the benefits of technology to promote educational programs, institutional communications, and fully functioning facilities and to ensure that all members of the college community can access and use technological tools and processes. Below is an overview of the technology components at SRJC, which will be described in depth in later sections with references to evidence.

Technology that supports learning programs includes:

- Computer labs at all sites
- Distance Education courses as well as online certificate and major programs
- The Student Information System (SIS), which provides students and faculty with portals for communications relating to both specific courses and institutional processes
- Online library and research functions and resources
- Assistive technology for students with disabilities
- Email systems for student and faculty communications
- Websites for faculty (both DE and on-site), academic departments, certificate and degree programs, Student Services offices, Associated Students, libraries, and many other learning support sites

Institutional effectiveness is addressed through technology in multiple ways as well. Among the most commonly used are:

- The Curriculum Database (through SIS)
- A SharePoint system representing College committees and their documentation
- A redesigned Institutional Planning website with links to data, institutional reports, assessment results, Strategic Planning accountability, and other essential records
- The online Program and Resource Planning Process (PRPP) template and departmental and unit data

- Communication systems for faculty, classified staff, and managers—primarily email, but also shared drives, portals, and technology request systems
- Websites and a SharePoint site for student learning outcome (SLO) assessment information and reports
- Institutional web pages representing all College programs and services

The College supports its goals and objectives for technology by integrating planning for technology in its institutional planning processes. This is carried out through:

- Technology requests in the PRPP
- The Institutional Planning Council (IPC), which ensures that all technology requests and technology processes are consistently reviewed for alignment with the Strategic Plan
- The Institutional Technology Group (ITG), a multi-constituent Presidential Advisory committee
- The Director of Institutional Technology as a member of the President's Cabinet (initiated when the current president took office)
- The Dean of Learning Resources and Educational Technology as the head of Distance Education
- The District Online Committee (DOC), a multi-constituent group that assesses online instructional needs and recommends best practices, policies, and procedures regarding Distance Education

### Strategic Plan GOAL D. I Improve Facilities and Technology

Provide, enhance, integrate, and continuously improve facilities and technology to support learning and innovation

- Incorporate best practices and innovation for facilities and technologies in order to enhance learning and working environments
- Improve and sustain infrastructure, facilities, and technology to proactively support our diverse learning community
- Increase District-wide coordination and collaboration to improve facilities and technology access, efficiency, and effectiveness
- Provide effective facilities and technology technical training for all employees to ensure operational effectiveness

## SELF EVALUATION

The College meets the Standard. In keeping with College goals in the Strategic Plan, all technology resources and services are used to support student learning programs and services and to maintain and improve institutional effectiveness. The PRPP, specific College committees, the President's Cabinet, and specific policies ensure that the acquisition and implementation of technology receives appropriate budget allocations and are aligned with College goals.

## III.C.1.

**The institution assures that any technology support it provides is designed to meet the needs of learning, teaching, college-wide communications, research, and operational systems.**

### Descriptive Summary

SRJC continually maintains and improves its technology support for the changing needs of the college. The College uses several methods to determine the needs for learning, teaching, college-wide communications, and research and has a system in place to determine technology priorities, appropriate budget allocations, and effectiveness of those resources.

### Determining Needs

The primary means for communicating the various types of technology needs is through specific sections of the Program and Resource Planning Process (PRPP) that require units to state their technology needs and how they align with to program goals and broader College goals, as shown in Illustration III.C.1 (III.C.1). For academic and Student Services departments, these goals directly involve teaching and learning. Other units, while indirectly supporting teaching and learning, usually focus on communications, research, and operations. The PRPP works as an evaluative mechanism as well since departments and units are asked to explain how well existing technology is serving its purposes and to describe the extent to which the department accomplished its goals, which may relate to implementation of or need for new technology.

Most technology equipment requests also go through a review and approval process by the Institutional Technology Group (ITG) to assure that needs are met according to College priorities, budgeting, and goals (III.C.2). Sometimes additional input is requested of related departments. For instance, Instructional Computing staff also review PRPP requests for computer lab equipment and provide feedback to the ITG.

In addition, the Help Desk evaluates technology service and support needs by generating a ticket database that provides useful feedback for the ITG. Analysis of the data helps ITG pinpoint areas of particular need and how to follow up with appropriate support and services, as shown in Illustrations III.C.2 and 3.

Finally, to evaluate the effectiveness of its technology in meeting its range of needs, the Information Technology (IT) department conducts periodic surveys that address technology needs of all user groups (staff, faculty, management, and students) (III.C.3). The results of the surveys are analyzed and forwarded to ITG as input to the Strategic Master Plan for Technology (Tech Master Plan),

updated to every three to five years (III.C.4). For instance, Illustration III.C.4 represents survey results indicating that email, student portals, and texting are the main ways students prefer to hear from the College, demonstrating that

the greatest support should focus on email, SIS portals, and functions relating to mobile devices. One specific action the College has taken in response is converting its websites to be fully accessible through mobile devices.

#### Illustration III.C.1 PRPP Sections Related to Technology

2.1.a	Budget Needs (narrative aligning requests with mission and goals)
2.1.b	Budget Requests (prioritized spreadsheet)
2.4.a	Desktop Technology Requests (link to request form)
2.4.b	Rationale for Instructional and Non-Instructional Equipment (narrative)
2.4.c	Instructional Equipment Requests (prioritized spreadsheet)
2.4.d	Non-Instructional Equipment Requests (spreadsheet)

#### Illustration III.C.2 How the Help Desk Increases Its Help

<b>Problem:</b>	In 2013, the ticket database revealed that the average response time for the Help Desk was two weeks.
<b>Analysis:</b>	ITG identified a need for software training (e.g., how to use Microsoft Office tools, access Citrix, access ESCAPE)
<b>Solution:</b>	(1) Extra Help Desk technician added to shorten the response time. (2) PDA Day and flex workshops were targeted to address the most frequent service requests.
<b>Example:</b>	A series of workshops on “Tips and Tricks—How to Use SRJC IT Tools” was offered with topics based on ticket data. Workshops were well attended and received by the campus community.

#### Illustration III.C.3 Help Desk Tickets

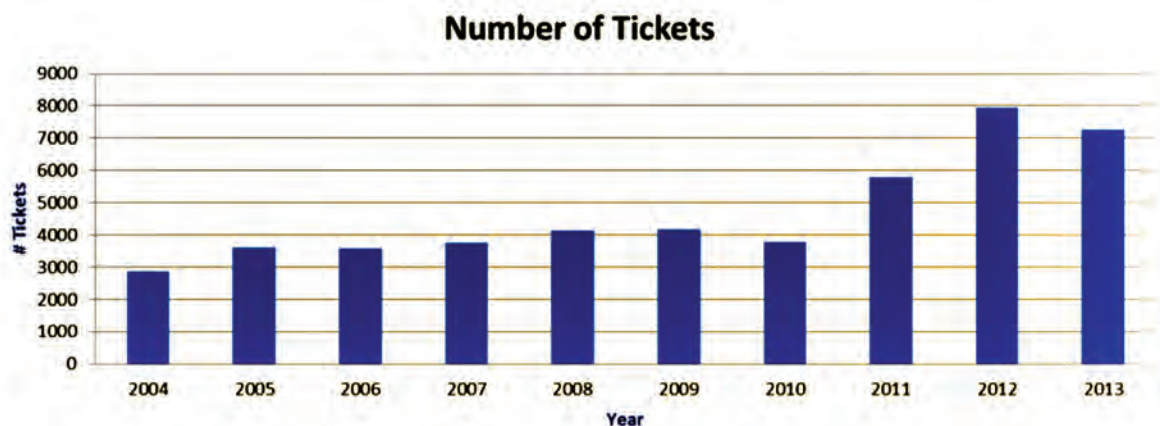
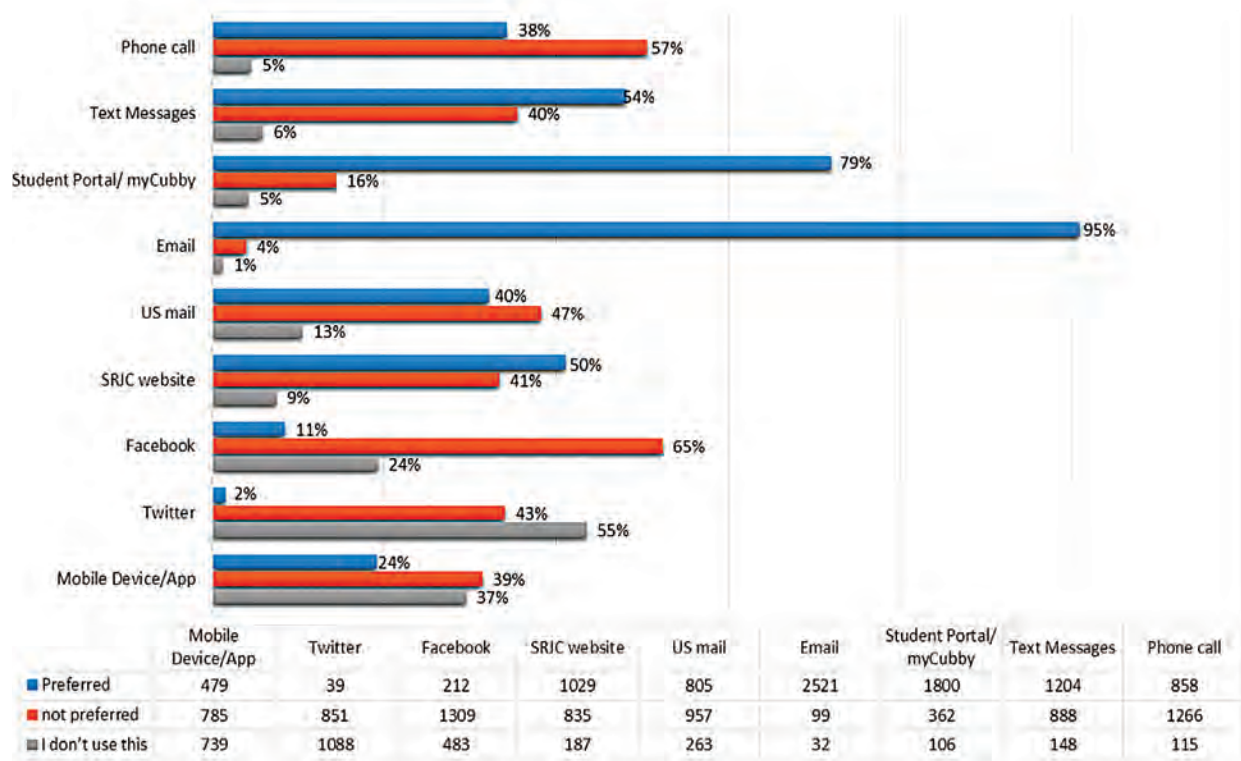


Illustration III.C.4 2013 Student Survey Results: Student Contact Preferences



Budget allocations are made according to needs that relate to teaching and learning, communications, research, and operations. The District currently has an annual operating budget of approximately two million dollars and maintains over 100 servers and 4,000 PC and Apple computers. The allocated budget from Fiscal Year 2013-2014, as represented in Illustration III.C.5, shows the scope of the technology needs within the District (III.C.5).

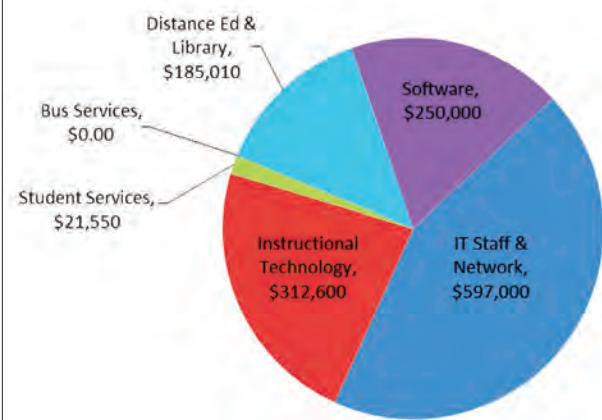
Learning and Teaching

When technology support needs have been identified and resources and services to meet those needs have been approved, IT designates the appropriate area to supply those support services. For teaching and learning, those services are provided by Instructional Computing, Media Services, the Office of Distance Education (DE), and the Disability Resources Department (DRD).

**Instructional Computing** manages computer labs on the Petaluma and Santa Rosa campuses, the Public Training Safety Center, and the Southwest Santa Rosa Center (SWC). (See Illustration III.C.6.) Instructional Computing also provides support for faculty, staff, and students through online software applications, on-site visits, and phone help.

**Media Services** is responsible for media equipment and services used to transmit multi-media content to groups of users (III.C.6). This includes managing and servicing classroom computerized multimedia stations, overseeing and maintaining a recorded media content collection, and supporting District-wide video conferencing equipment in five locations. This service is described further in Standard II.C.

Illustration III.C.5 2012/2014 Technology Budget



**Illustration III.C.6 SRJC Computer Labs List**

Campus	Building	Lab name	PC	Mac	Total
Petaluma	Kathleen Doyle Hall	Digital Media Lab		33	33
Petaluma	Kathleen Doyle Hall	Petaluma College Skills ASK Lab		38	38
Petaluma	Mahoney Library	Petaluma Mahoney Library Public Access areas	30		30
Petaluma	Mahoney Library	Petaluma Mahoney Library Teaching Lab	28		28
Petaluma	Richard W Call Building	Petaluma General Use Lecture Lab		34	34
Petaluma	Richard W Call Building	Petaluma Open Computer Lab	25	25	50
Petaluma	Richard W Call Building	Petaluma Help Desk Lab	31		31
Petaluma	Richard W Call Building	Petaluma Macintosh Lab		39	39
Petaluma	Richard W Call Building	Petaluma Networking Lab	26		26
Petaluma	Richard W Call Building	Petaluma Mobile Laptop Lab	32		32
PSTC	Need	General PSTC Lab	25		25
PSTC	Need	General PSTC Lab	25		25
PSTC	Need	AJ/Fire Lab	25		25
Santa Rosa	Analy Village	College Skills ASK Lab	24	8	32
Santa Rosa	Analy Village	College Skills Math Labs	48		48
Santa Rosa	Barnett Hall	Multi-curricular Computer Classroom/Lab	31		31
Santa Rosa	Emeritus Hall	Modern and Classical Languages Lab	38		38
Santa Rosa	Emeritus Hall	English Writing Center Lab		26	26
Santa Rosa	Emeritus Hall	English Mac Classroom/Lab		30	30
Santa Rosa	Emeritus Hall	English Reading Lab		28	28
Santa Rosa	Frank P Doyle Library	Library Teaching Classroom/Lab	30		30
Santa Rosa	Maggini Hall	Business Computer Lab	33		33
Santa Rosa	Maggini Hall	Business Computer Lab	31		31
Santa Rosa	Maggini Hall	Business Computer Lab	33		33
Santa Rosa	Maggini Hall	Computer and Info Sci Lab	1	32	33
Santa Rosa	Maggini Hall	Computer and Info Sci Lab	1	30	31
Santa Rosa	Plover Hall	Assessment Lab	50		50
Santa Rosa	Bussman Hall	Math Laptop Lab		35	35
Santa Rosa	Shuhaw Hall	Math Computer Lab	1	26	27
Santa Rosa	Shuhaw Hall	Applied Technologies/CAD Lab	25		25
Santa Rosa	Shuhaw Hall	Manual Drafting Lab	26		26
Santa Rosa	Shuhaw Hall	Applied Technologies/Graphics Integrated Lab	25	5	30
Santa Rosa	William B Race Building	Health Science Lab	32		32
SWC	Southwest Center	ESL – Southwest Center	36		36
SWC	Southwest Center	ESL - Mobile Laptop Cart Lab	25		25



**The Office of Distance Education (DE)**, supervised by the Dean of Learning Resources and Educational Technology, is responsible for the functioning of SRJC's DE programs (III.C.7). These responsibilities include:

- Hosting SRJC's online classes as well as web-based materials created for face-to-face classes by SRJC faculty.
- Assisting faculty with creating and maintaining online classes and web-based instructional materials.
- Providing training, information, and resources for SRJC faculty and students who participate in web-based teaching and learning.

Assisted by the IT department, DE currently employs two systems for hosting online content. The original system is Computer-Assisted Teaching Environment (CATE), developed by the College and in use since 1996. The newer system is Moodle, an open-source Learning Management System adopted by the College in 2011 (III.C.8). The two systems had been running parallel, but the College is currently migrating all existing courses hosted in CATE to Moodle. The DE Office offers support for faculty during this process through workshops, one-on-one consultation, and training (III.C.9).

**The Disability Resources Department (DRD)** provides students with disabilities equal access via the Assistive Technology Center (ATC) on the Santa Rosa Campus (III.C.10). The ATC is supervised by a full-time faculty member and houses eight fully accessible computer workstations with assistive software installed. The center also provides students with training in specialized hardware and software allowing them access to written documents, word processing, computer programs, the Internet, and a variety of applications. DRD also coordinates accessible workstations and software that are installed in other computer labs and offers consultation and training for lab staff and faculty (III.C.11).

### Supporting Research Functions

IT supports research involved in teaching and learning. Working in collaboration with IT, SRJC libraries provide research support for students and faculty in multiple ways, including the innovative search function on its website, individualized LibGuides for courses, workshops on software such as NoodleBib and Turnitin, and the popular online "Ask a Librarian" feature (see Standard II.C for further details). The Doyle Library also houses the Center for Excellence in Teaching and Learning, a facility devoted to hosting faculty professional development, including the effective use of media and technology (III.C.12). The specific technology support required by librarians follows the same path towards review and approval as other departments' technology requests.

The College also addresses the technology needs of the Office of Institutional Research (OIR) (III.C.13). The increasing

demands for data collection, analysis, and representation has raised the priority of OIR's support and staffing needs, and OIR and the College have successfully identified several options for addressing those needs. As with every other department, OIR requests are documented in the PRPP and go through the same levels of review and approval. While specific software implementation, such as Tableau, is conducted within OIR, the Director of Institutional Research works closely with IT to access data necessary for internal research.

### College-wide Communications

The technology needs for college-wide communications continue to evolve as technology improves and student and staff expectations and abilities grow. Within this constantly changing environment, the Infrastructure and Network staff in IT design, purchase, install, and support a responsive institutional infrastructure for college-wide communication. In addition to the College email system, which was recently transitioned to the more effective Office 365 system for all employees, the team has expanded wireless access to a number of retro-fitted buildings and deployed VoIP to replace an outdated phone system at both Santa Rosa and Petaluma campuses (III.C.14). The Infrastructure and Network group also maintains SharePoint sites, which allow essential information about the College to be accessible to the college community and often to the public. These sites include:

- Agendas, minutes, and documents for all standing committees, President's Advisory Committees, and other groups related to shared governance and College functions (III.C.15)
- Records of SLO assessments for courses, certificates, majors, and student services programs (III.C.16)
- Strategic Planning Task Force archives (III.C.17)

IT also supports the Student Information System (SIS), which has portal functions allowing for instructor-student communications and institutional communications (such as reminders of College deadlines or registration priorities).

In addition, the IT Blog keeps the campus community informed of scheduled maintenance, upgrades, and security advisories (III.C.18).

### Operational Systems

To improve its operational systems in response to the needs articulated by IT, Admissions and Records, Business Services, Human Resources, and other units, the College has invested in two major technology changes:

- In November 2009, the District embarked on a major Student Information System (SIS) conversion that was done primarily by the IT staff. The COBOL system was retired in 2009. The new SIS has provided students



with more access and automation in applying to the College and registering for classes via the student portal, and the faculty portal provides faculty more online automation in regards to their class rosters and submitting their grades. Current work focuses on enhancing SIS functions such as record-keeping and report generation for Admission and Records.

- In 2010, after a comprehensive review and assessment, SRJC migrated from the CECC Financial 2000 system to Escape Technology for the subsystems: budget development and management, general ledger processing, accounts payable processing, payroll processing, STRS and PERS retirement systems processing, purchasing, fixed assets tracking, stores inventory management, and Human Resources management.

The College continues to determine the most efficient and cost-effective ways to support its operations through technology. A list of current projects and updates related to operational systems is available to the public via the interface of the web-based IT project tracking system (III.C.19).

#### SELF EVALUATION

The College meets the Standard. SRJC uses various and systematic means to assess technology needs and evaluate technology-related implementation in all institutional functions, including teaching and learning, research (both academic and institutional), communications, and operations. Requests for equipment, support, and services go through an integrated review and planning process, so allocations to meet these needs are clearly based on their alignment with institutional goals, urgency, and cost.

### III.C.1.a.

**Technology services, professional support, facilities, hardware, and software are designed to enhance the operation and effectiveness of the institution.**

#### DESCRIPTIVE SUMMARY

As discussed above, the PRPP, ITG, and approval processes through IPC and the President's Cabinet ensure that all technology equipment, labor, and software is focused on enhancing and supporting the College's operations and effectiveness in helping students achieve learning outcomes.

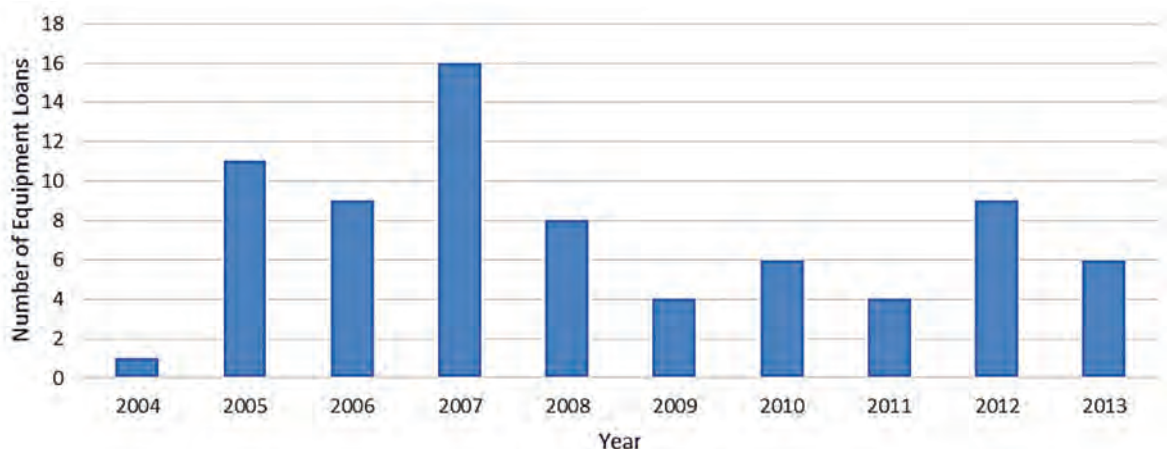
Technology services provided by the District include programming support, technology procurement support, Help Desk support, and checkout of loaner technology equipment, such as iPads, laptops, projectors, and conference phones (see Illustration III.C.7). Technology features in many facilities as well, including:

- "smart" classrooms (i.e., wired, networked, with functional computers, document cameras, and other technological tools)
- student computer labs
- smart building technology for HVAC and security (door access and video monitoring).

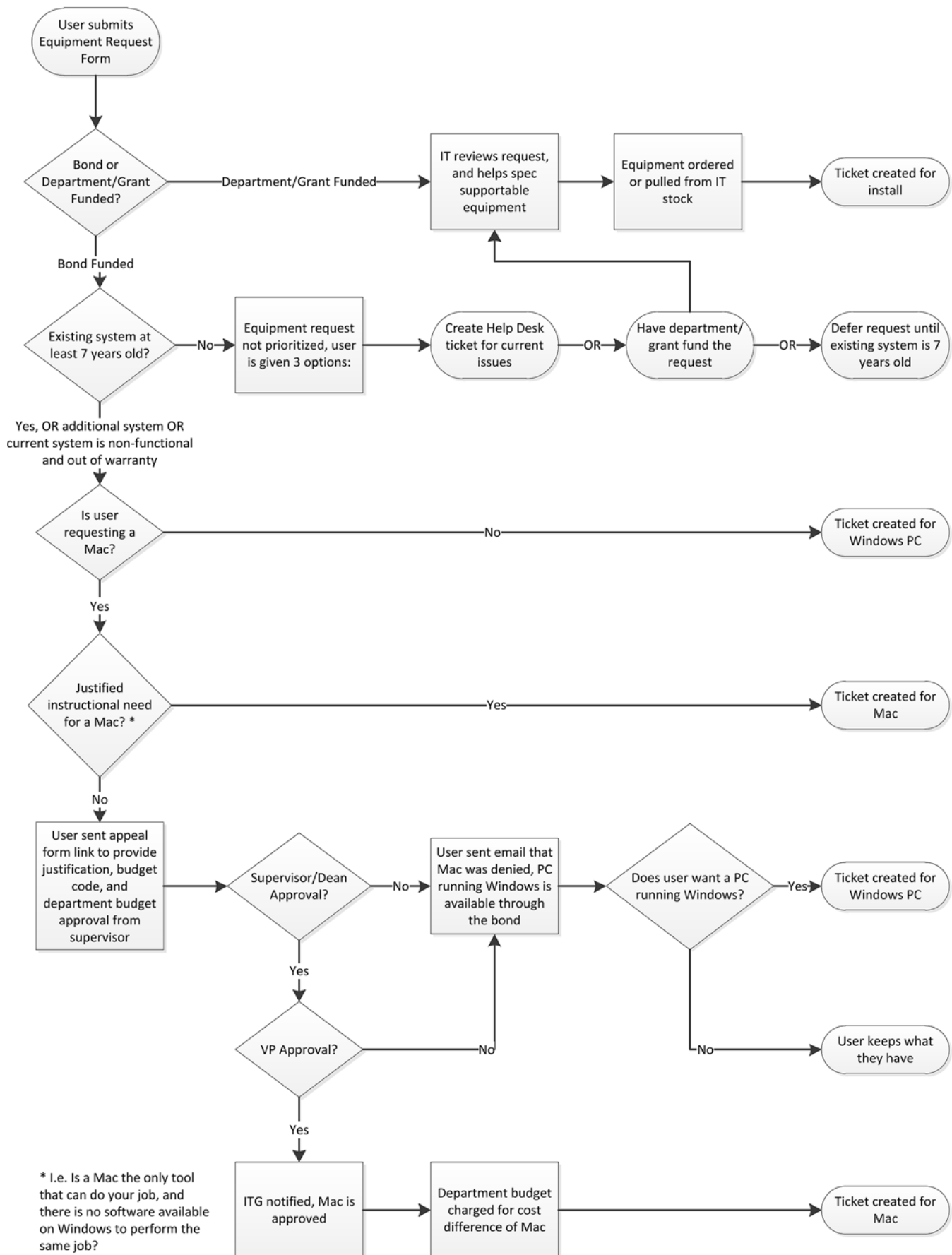
Hardware and software includes: the network infrastructure; fire wall security software; enterprise software (e.g., Finance, HR, Student Information Systems); and applications software (e.g., Microsoft Office, Turnitin, Adobe, AutoDesk).

The justification for every component of technology—that is, its relationship to institutional needs, goals, and effectiveness—is clearly represented in all stages of the request, as shown in Illustration III.C.8 (III.C.20). The College also tracks use of IT support in order to guide the decision making process.

**Illustration III.C.7 Equipment Loan Requests Submitted Through Help Desk**



## Illustration III.C.8 IT Equipment Request Workflow



To accommodate the College's curricular commitments for distance learning programs and courses, the ITG has decided to host its own technology infrastructure for the Distance Ed program. For example, to accommodate the redundancy requirement for distance education programs, the College used ITG money to fund a new higher capacity virtualized server cluster. The DE cluster now located in the IT central server room has its own independent power supply and backup. During regional power outages, the DE servers were not impacted because of these improved backup measures.

In terms of data security and privacy, the College's use of technology is compliant with Family Educational Rights and Privacy Act (FERPA) and the Health Information Portability and Accountability Act (HIPPA) (III.C.21). The College also regularly conducts security audits of its software and hardware for credit card transaction so that it complies with Payment Card Industry (PCI) Data Security Standards. There are multiple layers of data protection throughout the College systems. For example, the business system is run on a network isolated from the education systems, thereby separating confidential student information (such as grades and Social Security numbers) from the Course Management System, reducing the chance of a security breach targeting sensitive student information.

#### SELF EVALUATION

The College meets the Standard. Through careful and systematic review and planning processes, the College meets its operational needs as effectively as possible with the resources allocated to technology.

### III.C.1.b.

**The institution provides quality training in the effective application of its information technology to students and personnel.**

#### DESCRIPTIVE SUMMARY

Santa Rosa Junior College provides quality training in the use of technology through several academic support services units: the Information Technology department, the Distance Education office, the Staff Resource Center, the SRJC libraries, the Disability Resources Department, and the computer labs. Often, the focus areas of trainings for faculty and staff are prompted by the College's implementation of new systems of software programs (for example, the launch of the NEOGOV online hiring system adopted by Human Resources in August 2014). Many other trainings are offered as well, usually initiated by survey results, the Help Desk ticket database, PRPP requests, and analysis of feedback sent to the Staff Resource Center. Examples of the College's response to training needs include:

- Based on the requests submitted through the Help Desk, the District increased the number of Lynda.com licenses for software training for employees three times in the past three years (see Illustration III.C.9)
- Based on the employee feedback from the IT department, the District has purchased e-learning services provided through SkillSoft to address the training needs for IT professionals (III.C.22)

Trainings that take place through Staff Resource Center ask for evaluative feedback so that the effectiveness of the training can be assessed and improved, if needed. Training offered on a more informal basis through IT and DE consultations are evaluated as a component of periodic IT satisfaction surveys and the evaluation mechanisms for IT staff and management.

For students, trainings in institutional systems (online registration, student portal functions, career research programs, research engines) often occur through an on-site, just-in-time format in the Admissions and Records office, computer labs, and libraries, but the Counseling, Learning Resources, College Skills, and several Career and Technical Education (CTE) departments also provide specific trainings within classes or for DE.



## Training and Support from the Information Technology Department

The IT Department provides technology support and training for all staff, faculty, and administrators through the Help Desk services, PDA presentations, online training through Lynda.com, and various flex-credit workshops offered throughout the year (III.C.23). IT's personnel consists of staff with expertise in varied areas, such as network, computer repair, server-system administration, student information systems and microcomputer support and services. The Help Desk is the initial step for both immediate questions and longer term requests for information or training (III.C.24). The Help Desk provides face-to-face, phone, and email support to the campus community, which includes all administration, faculty, and staff. The number of yearly help desk requests is shown in Illustration III.C.10.

## Training Related to Distance Education

Distance Education (DE) is supervised by the Dean of Learning Resources and Educational Technology and is staffed by a webmaster, a specialist in accessibility compliance, a faculty member to provide trainings and consultation in DE instruction, and a systems administrator. Periodically the DE staff conducts a needs assessment survey to determine faculty needs for training in DE course development and implementation (III.C.25). Based on the results of the survey and developing trends in education and technology, the DE office provides face-to-face and online training and activities about the most effective design and instructional practices for DE courses.

The DE website provides a wealth of information for both students and faculty (III.C.26). Faculty can access step-by-step guidance about creating and maintaining online classes, links to descriptions of best practices and web-based instructional materials, and the procedures for submitting courses for DE approval by the Curriculum Review Committee (CRC). Students also have detailed descriptions on how to be successful in the online environment; resources such as an online readiness quiz; and a link to online student services. Students may also take a six-week credit course, "How to Take an Online Class," which is offered several times each semester and recommended on the DE student web pages and the homepage of many courses (III.C.27). Instructors preparing to teach online courses are invited to enroll in or shadow the course as well.

Faculty who want to teach DE courses must demonstrate that they have had adequate training and, if possible, experience in online instruction. The specific requirements vary somewhat across departments but are described in detail in the Special Expertise statement of departments that offer online courses. This statement is part of the approved departmental procedures for making course assignments (III.C.28).

Training for faculty is conducted by the DE office faculty or staff and is also available through online modules. Options include:

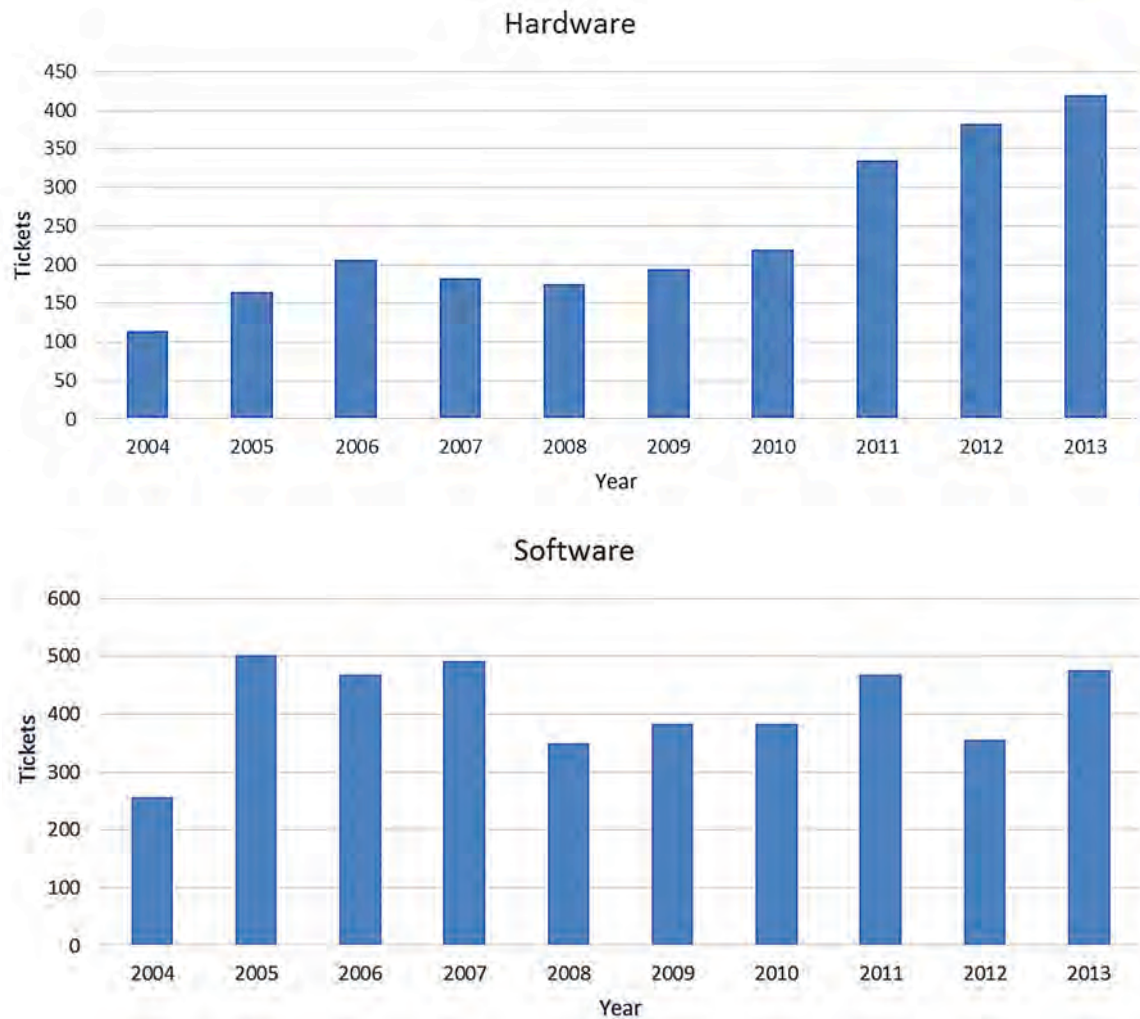
- Face-to-face consultation with the DE faculty member
- Resources and best practices information for DE through the SRJC Online Learning website (III.C.29)
- Online workshops using the DE website, CATE, Moodle, or Lynda.com. (Note: there is fund reimbursement for faculty and staff taking Lynda.com trainings.)
- Podcast on Accessible Issues for Online Materials (III.C.30)
- In-person group trainings offered during PDA Day or as flex credit workshop.
- A series of workshops that offer faculty a Completion Certificate for online instruction

Santa Rosa Junior College has implemented several grants for the Online College Project, which leads to the development of online curriculum for the College (III.C.31). The Online College Project offers support for instructors through consultations and trainings. Any instructor qualified to teach a course created through the Online College Project is allowed to use that curriculum through cloning and, if possible, consultation with other instructors of that same online course, but additional training is usually recommended.

Every newly created online class must be reviewed through a meeting with the department chair of the course discipline, the cluster dean, and the DE webmaster. Feedback is given to the instructor, who must make any required changes before the course can be approved for scheduling. This process not only ensures that a course meets criteria for effective DE practices, but allows the DE webmaster to evaluate the extent of instructors' application of skills from DE trainings and determine areas where specific types of training may be appropriate.

**Illustration III.C.9 Providing Technology Training through Lynda.com** (Usage statistics of Lynda.com licenses in 2013)

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	YTD Avg
#Users In Account	0	0	5	7	15	15	25	31	37	44	45	47	27.1
#Active Licenses	0	0	4	4	4	4	4	4	4	4	4	4	4.0
#Users That Logged In	0	0	4	0	3	1	9	6	3	6	7	2	4.1
% Active Licenses That Logged In	0	0	100	0	75	25	225	150	75	150	175	50	113.9
Distinct Courses Viewed	0	0	3	0	6	4	12	10	2	13	7	3	6.7
Distinct Movies Viewed	0	0	11	0	62	14	175	65	114	88	184	9	80.0
Total Movie Views	0	0	15	0	78	14	253	79	130	91	263	10	93.3
Hours Viewed	0.0	0.0	1.0	0.0	7.1	0.9	21.4	6.5	10.0	4.4	22.7	0.4	7.4
#Logins	0	0	7	0	7	2	39	19	13	13	15	3	11.8
Average Movie Views Per User	0	0	4	0	26	14	28	13	43	15	38	5	20.7
Average Hours Viewed Per Login	0.0	0.0	0.2	0.0	1.0	0.4	0.6	0.3	0.8	0.3	1.5	0.1	0.6

**Illustration III.C.10 Help Desk Ticket Requests, Software and Hardware**

### Staff Development Technology Workshops

The Staff Resources Center coordinates flex workshops, New Faculty Development Programs, trainings for classified staff, and PDA presentations on a variety of technology-related topics. Many of these trainings are in concert with IT staff and DE personnel, but the College extended its offerings by purchasing four site licenses for Lynda.com, an online resource that provides 24/7 on-demand training video clips on the use of over 2,000 software and hardware applications (III.C.32).

The Menu of Activities listed on the Staff Resource Center website uses icons to indicate each workshop's relation to one or more of the Professional Development Pathways, so it is easy for faculty and staff to identify online and face-to-face programs, such as those in Illustration III.C.11, that are part of the Technology Pathway (III.C.33). As with all flex and PDA workshops and presentations offered through Staff Development, participants are asked to submit evaluative feedback, which is reviewed by the Staff Development staff and faculty, summarized, and sent to presenters. This information is used to determine areas requiring more or different trainings in technology.

### Library Technology Training

The SRJC libraries support students, faculty, and staff with access to a variety of technology resources (III.C.34). Computers on all floors are provided to support learning, including distance learning, on both campuses. Students conduct research for classwork, prepare and print class assignments, access class web pages and discussion forums, email instructors, and use tools such as Turnitin and NoodleBib. Library staff are available for immediate support, but in-depth training in online research tools is available through tutorials on the library web site for both on-site and DE students (III.C.35). The Learning Resources (Library) Department also offers an introductory course in research techniques and information literacy skills, which is required for A.A. and A.S. degrees (III.C.36). Further information about technology training through the libraries is in Standard II.C.

### Disability Resources Department Trainings

The Disability Resources Department (DRD) is responsible for training both personnel and students in the use of technology that supports learning for students with disabilities. DRD holds a comprehensive orientation for its front desk staff prior to the start of the semester. During this orientation, staff are trained in computer programs that book appointments, examinations, and other services available to students. Once trained, staff assist students using computers for these and other functions.

DRD specialists offer staff and faculty from other departments trainings and in-person consultation on software and hardware that support DRD students (e.g., modified computers, digital text readers, and speech recognition software).

As described in III.c.1, the Assistive Technology Center (ATC) provides instruction in the use of assistive technology for eligible students with disabilities on both the Santa Rosa and Petaluma campuses. Students with physical, visual, learning, and other disabilities are able to benefit from training in the ATC (III.C.9).

### Individualized Support in Computer Labs

Santa Rosa Junior College owns and operates over 2,000 instructional computers in 95 labs in support of the educational programs of the College. SRJC instructional computing systems provide access to outside networks, both public and private, which furnish electronic mail, information services, bulletin boards, conferences, and other tools and resources. The labs are operated by twelve full-time staff with at least ten trained student assistants providing additional support across various locations as shown in Illustration III.C.12 (III.C.37).

Since the functions of the labs may vary—some are drop-in labs for all students and some, like the English Writing Center,

#### Illustration III.C.11 Recent and Typical Technology Workshops

- Accessible Issues for Online Materials
- Technology in the Classroom
- New Technologies in the Classroom: Problems and Possibilities
- Library Resources: Using Technology and Research to support curriculum and student success
- Understanding Computer-Based Enrollment Management Systems
- Guide on the Side: Online learning resources and interfaces
- Moodle Training
- Excel
- PowerPoint Tricks
- CCC Confer Webinar: 3C Media Solutions



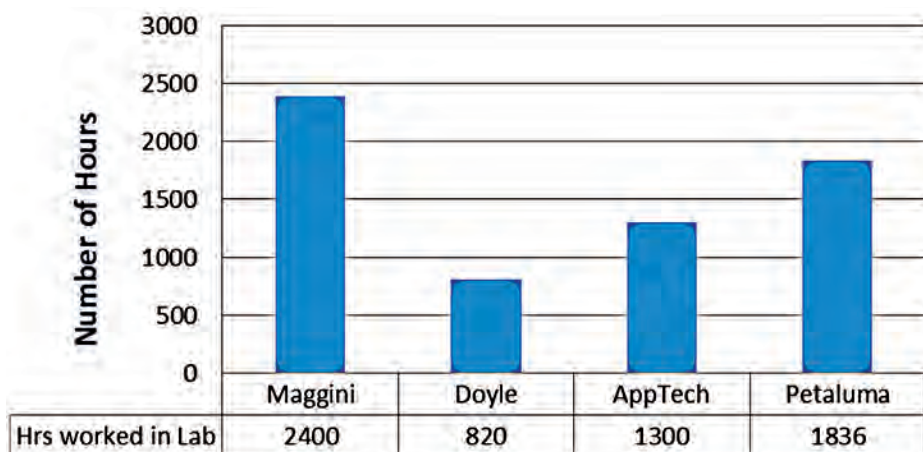
have a more focused purpose—the training for faculty, staff, student assistants, and students is usually provided by the lab supervisor, lab faculty, instructional assistants, or student assistants within the context of the individual's task. For instance, the English Writing Lab staff train student writing consultants to provide instruction in online writing applications (III.C.38). In a typical drop-in lab, instructors, classified staff, or trained student assistants help students navigate the various software related to their classes, from web-design applications to Excel.

The usage of computer labs and support for students is tracked through TimeKeeper, which is based on College ID numbers that students use when they log into a lab. This data helps departments determine the need for staff to help support and train students.

#### SELF EVALUATION

The College meets the Standard. SRJC provides trainings and support in the applications of information technology for personnel and students that are accessible, ongoing, responsive to short-term and long-term needs, and available through a variety of means. The College uses workshop evaluations, surveys, feedback to Staff Development, PRPPs, and data collected through IT, the library, and departments with computer labs to ensure that training options meet the needs of the faculty, staff, and students. Even when faced with budget restrictions, the College has sought ways to offer trainings through comprehensive online programs, podcasts, and online instruction.

Illustration III.C.12 Student Lab Assistant Hours by Location, 2013/2014



### III.C.1.c

**The institution systematically plans, acquires, maintains, and upgrades or replaces technology infrastructure and equipment to meet institutional needs.**

#### DESCRIPTIVE SUMMARY

The District has two primary processes for technology infrastructure and equipment planning, acquisition and maintenance. The first is the PRPP, the institution wide review and planning process, as described in III.C.1. Every unit submits its own PRPP requests to its cluster dean or area manager, and the ITG reviews cluster/area requests and sets a priority list with regard to the allocation of funds. For example, Illustration III.C.13 shows total costs of technology requests from the Science, Technology, Engineering, and Mathematics (STEM) cluster in 2013/2014. This information is summarized, prioritized, and reviewed for alignment with Strategic Plan goals (or, prior to 2014, College Initiatives), and then provided as input to ITG.

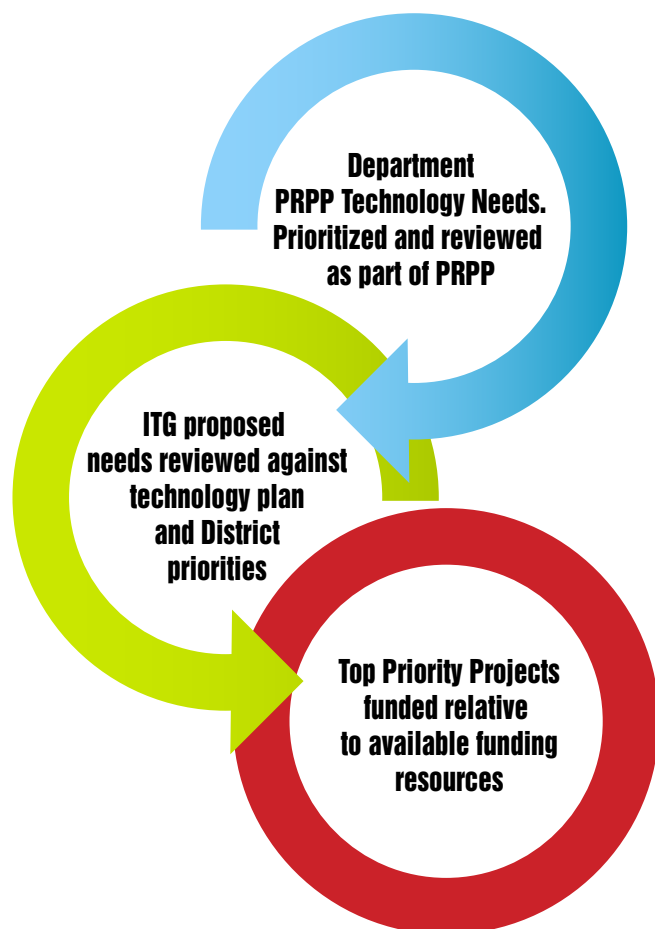
The second process occurs through ITG, which has members from all major College constituencies. The ITG team meets monthly to review technology issues, including allocating the annual technology bond spending and making recommendations on computer and software standards and procurement for the College, as shown in Illustration III.C.14. The ITG SharePoint site includes meeting, agendas, minutes, and related documents, all of which are available to the campus community (III.C.2).

**Illustration III.C.13 Costs of Technology Requested by STEM Cluster, 2013/2014**

PROGRAM	\$ REQUESTED 2013
Applied Technology	\$7,400.00
Chemistry	\$432,500.00
Civil and Surveying Technology	\$441,000.00
Construction Management Technology	\$12,750.00
Earth and Space Sciences	\$1,364,520.00
Electronics	\$68,800.00
Engineering	\$6,000.00
Life Sciences	\$135,399.00
Mathematics	\$11,700.00
MESA	\$2,100.00
Physics	\$98,115.08
Planetarium	\$1,250,000.00
Water Resources Technology	\$16,764.32

The ITG is responsible for updating the Strategic Master Plan for Technology, which is the primary planning guide that the District uses to create the budget for technology-related spending in a five-year cycle. The 2011 plan included the Bond Measure A, passed in 2002 by Sonoma County voters, which continued to provide the funds for infrastructure and equipment for more than a decade (III.C.39). The recently completed 2015 Strategic Master Plan for Technology represents a roadmap of where the College needs to go with information technology implementation over the next five years. The plan describes the current status of technology use and needs, outlines implementation strategies, and lists cost estimates (III.C.4).

**Illustration III.C.14  
From Request to Allocation Through ITG**



**Illustration III.C.15 Technology Allocations 2013/2014**

FY13		
Category	FY13 Beg. Bal	FY13 Spent
Replacement PC	\$ 100,000	\$ (68,400)
Failed Equipment	\$ 100,000	\$ (75,403)
Institutional Servers	\$ 66,000	\$ (97,804)
Infrastructure LAN/MAN	\$ 30,000	\$ (29,656)
Voice-over-IP (VoIP)	\$ 82,000	\$ (154,408)
Cloud E-mail Migration	\$ 76,500	\$ -
Disaster Recovery infrastructure		
Fiber Infrastructure to Shone Farm		
Misc		
IT Staff & Network Total	\$ 454,500	\$ (425,671)
Instructional Technology – Labs	\$ 154,850	\$ (155,637)
Software	\$ 244,927	\$ (123,258)
Information Technology Total	\$ 854,277	\$ (704,565)
Student services Total	\$ 16,403	\$ (9,068)
Digital Records System	\$ 119,154	
Asset Management System(bar coding)	\$ 70,582	
Bus Services Total	\$ 189,736	
Library	\$ -	\$ -
Distance Education	\$ 30,000	\$ (30,000)
Media	\$ 192,558	\$ (95,410)
Distance Ed & Media & Library	\$ 222,558	\$ (125,410)
Totals	\$ 1,282,973	\$ (839,043)



### Working within the Bond and Budget Restrictions

The dependence on bond funds, which are projected to run out in 2016-2017, has shaped the budgetary decisions with regard to technology. For example, the recent budget shortfalls have led ITG to extend the cycle of instructional computer replacement from six to seven years. Additional savings from the purchase of refurbished workstations and a decision to reduce the number of Macs also helped reduce the cost of replacement PCs. Upgrades to current workstations are scheduled in large groups in order to take advantage of purchasing discounts, as shown in Illustration III.C.15. Another example concerns the 85 servers that run the administrative systems that are critical to the day-to-day operation of the college, such as College Wide Information System (CWIS), Student Information System (SIS), Financial Aid, Counseling Services, Web Services, and Distance Education. The performance of these servers has been analyzed every spring, with the expectation that performance will always be responsive to the demands of the institutional users. To meet these demands, the 2015 Tech Plan recommends a replacement cycle of five years for administrative servers.

Within these restrictions, the College has still managed to maintain adequate technology support and equipment to meet institutional needs. Staff and faculty needs have been addressed through review and prioritization processes through PRPP and ITG. Computer labs have received upgrades and replacements according to IT schedules, as shown in Illustration III.C.16.

The College has a current projection of technology needs for the next 20 years of \$80-100 million. The November 2014 passage of Measure H, a \$410M bond for facilities and technology, provides the needed funding to support the technology needs of the College for the next 20 years. ITG has developed a projected 20-year spending plan for the technology spending from the bond (III.C.40).

### SELF EVALUATION

The College meets the Standard. SRJC does an effective job of meeting the technology needs of the District with the funding available. Continuous funding for technology infrastructure is secured by careful planning conducted by the Institutional Technology Planning Group (ITG). ITG has a rolling five-year technology master plan that is reviewed and revised every three years. ITG's 20-year spending plan for technology spending based on the new bond is used to guide technology investment and is reviewed against requests for technology investment as part of the College PRPP process.

**Illustration III.C.16. New Desktop And Laptop Computers Purchased And Installed**

	2006	2007	2008	2009	2010	2011	2012	2013
Windows Desktop	366	103	245	48	115	146	142	182
Windows Laptop	69	6	46	8	10	16	14	44
Total Windows	435	109	291	56	125	162	156	226
Mac Desktop	21	11	24	21	28	29	5	5
Mac Laptop	12	5	29	7	14	17	16	9
Total Mac	33	16	53	28	42	46	21	14
Total Computers	468	125	344	84	167	208	177	240

### III.C.1.d.

**The distribution and utilization of technology resources support the development, maintenance, and enhancement of its programs and services.**

#### DESCRIPTIVE SUMMARY

In keeping with Policy 2.13 and Procedure 2.3P, SRJC promotes and supports the use of computer and communications technology throughout the College and has procedures for determining how technology resources can appropriately distributed and best used to support College programs and services (III.C.41, 42).

#### Policy 2.13 Computer and Communications Technology Use

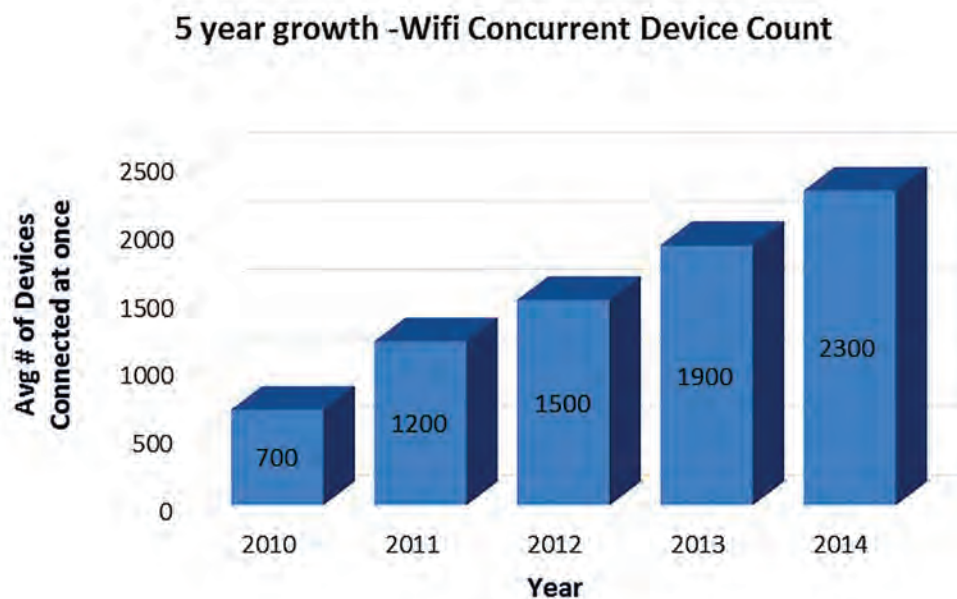
The Sonoma County Junior College District encourages the use of computer and communications technology, including computer networking, in order to enhance both the District's operation and the learning environment for students and staff. To promote the appropriate use of such technology, the College shall develop and regularly update procedures related to computers and electronic communication systems.

For usage information, the IT department regularly tracks the data generated from within the technology infrastructure. For example, the usage statistics generated by the Cisco system (see Illustration III.C.17) allowed the networking group to capture the rapid increase of mobile devices that are used on campus, prompting wireless expansion projects in several buildings. This also led to the addition of a separate network for mobile devices used by staff members on Santa Rosa and Petaluma campuses.

Another source of data stems from the regular analysis of Help Desk tickets to provide useful feedback with regard to the trends in service requests submitted by campus users. Finally, for qualitative information, the IT department conducts annual surveys of District employees. The most recent survey showed an overall perception of the services as positive (III.C.3).

In terms of providing optimal support from technology resources, SRJC relies on the PRPP, as described previously, where technology needs and requests for all programs, sites, and methods of delivery are linked to the Strategic Plan and goals. This information is reviewed by ITG in relation to the Tech Master Plan and the projected budget. For example, to secure the data centers and administrative servers (including new server clusters for Distance Education, a priority in the Tech Plan), additional earthquake proofing for the server room was included in the annual IT budget, together with new battery and generator backup. These reinforcements were installed, and during regional power outages in Fall 2013, the DE servers continued operating because of these security measures, causing no interruption of online courses provided by the college.

Illustration III.C.17 Usage Statistics of Wireless Networks



The systematic procedures of the PRPP and ITG not only guide the addition, replacement, and improvement of technological equipment and services, they assure a robust and secure technical infrastructure that provides maximum reliability for students and faculty.

#### SELF EVALUATION

The College meets the Standard. In keeping with District policies and procedures, the ITG uses IT data analysis, PRPP request procedures, and the guidelines based on the Technology Master Plan to assure the appropriate distribution of technology resources. This information is also used to monitor the utilization of technology and how it supports learning programs and services.

### III.C.2.

**Technology planning is integrated with institutional planning. The institution systematically assesses the effective use of technology resources and uses the results of evaluation as the basis for improvement.**

#### DESCRIPTIVE SUMMARY

SRJC systematically assesses the effective use of technology resources and integrates the results of evaluation as the basis for improvement. As described throughout this standard, technology planning is consistently integrated with institutional planning through the PRPP, ITG, the President's Cabinet, and IPC. The sections below review the components of this process.

#### The Role of the PRPP

The PRPP is the primary source of input for technology planning at the institutional level. Each department or unit assesses and describes its technology usage and requests in the context of the program's goals and the Strategic Plan and mission. Departments and units use a variety of means to support their requests, such as:

- Surveys of students in computer labs relating to demand for certain programs
- Surveys of technology use by enrolled students
- Instructor and staff input about gaps in technology resources for instruction (example: document cameras, smart classrooms)
- Listing the age and type of technology to demonstrate the need for updates and replacement
- Describing software needs that support curriculum
- Obtaining technical staff recommendations for new or replacement equipment

Assessment results and student, faculty, and staff input are used in section 2.4.b of the PRPP, Rationale for Instructional and Non-instructional Equipment, to support requests for new or improved equipment or software (see Part III.C.1 of this standard). This is followed by Sections 2.4.c and 2.4.d, where specific technology requests are listed along with reference to the Strategic Plan and mission. This information is compiled, downloaded, discussed, and prioritized in cluster chair meetings and managers, allowing for dialogue and shared perspectives. The supervising administrator then submits a prioritized list to the appropriate vice president .

#### Institutional Technology Group and Institutional Planning Council

The ITG develops a Technology Master Plan based on prioritized PRPP requests, data from IT, and pertinent institutional survey results. The plan is created, brought

to the President's Cabinet for discussion and review, and used for planning the annual budget allocated for technology resources. Ultimately, the budget plan reaches the Institutional Planning Council (IPC), where discussion, revision, finalization, and approval take place (III.c.43). Prioritization is based on Strategic Plan goals and objective responses to internal situations, and external demands (such as programming changes to meet state reporting requirements).

This process of linking PRPP requests for technology with ITG, which in turn reports to the President's Cabinet and ultimately IPC, assures that allocation for technology is proportional to institutional funding and budget requests in other areas, is meeting the needs of programs, and is aligned with the Strategic Plan.

### **Determination of the Effectiveness of Technology Resources**

In keeping with the PRPP cycle, technology effectiveness is evaluated each year through Section 2 if new or improved technology is still needed, and in Section 6, Planning, where long term plans may be made while acknowledging satisfaction with existing technology.

Institutionally, IT tracks and regularly inventories technology resources to determine the age and functionality of computers and other equipment, indicating when equipment is eligible for upgrade or replacement according to the Technology Master Plan. This reflects an effort to maintain effectiveness within the limitations of the budget. For example, the recommendation for most computers is a seven-year life span, after which IT initiates a replacement plan.

Surveys by IT allow employees to provide feedback about technology equipment and services. This contributes to ITG's planning process. For instance, as the College website development and revision ensue (see Illustration C.19), IT will monitor the effectiveness and respond with training and support, as needed. Also, IT uses its Help Desk ticket data to identify areas of need, as well as those areas that effectively serve their purpose with only minimal assistance, such as the recent migration of all employee email to Office 365.

The College meets the Standard. Technology planning is integrated with institutional planning through the PRPP, the ITG, and IPC. The PRPP allows for ongoing assessment of technology at the department and unit level, and regular IT surveys and data analysis provide information about the effectiveness of college wide systems and services. Technology planning occurs in relation to other areas requesting resources (such as facilities and staffing) in the overall budget planning, and all decisions reflect the Strategic Plan goals and institutional priorities articulated by IPC.

<http://accreditation.santarosa.edu/>

### **Actionable Improvement Plans**

None.

#### **Illustration III.C.19**

#### **A New Website: How IT Meets Institutional Needs**

To meet the institutional need for more consistent and current web pages on SRJC's website, IT introduced Drupal, an accessible, user-friendly Content Management System (CMS). As part of the College's redesign and upgrade of its major websites, this CMS also allows departments and programs to easily create and use their own websites.

The entire web migration is the result of ongoing cross constituency dialogue and planning for over two years. While gradual changes had been made throughout 2013/2014, the newly designed homepage was officially launched in fall 2014, quickly followed by redesigned top tier websites such as Admissions, student information page, Human Resources, and Institutional Planning. At the same time, regular trainings have been offered throughout 2014/2015 to assist faculty and staff in converting their websites into the new platform. Requests for feedback using the Help Desk ticket system and resulting improvements will continue as well.

Features of the new system include:

- Responsive design: adjusts appearance for phone, tablet or desktop.
- Easier navigation: redesigned rollover and dropdown menus and simplified labels for faster, more direct access
- Updated design: more images and white space, less text, following student preferences and best practices in web design.
- Real time data: using Google Analytics to better respond to web usage.
- Faster content updates: in the new content management system, departments can update their information more easily.
- A more unified look: Department and program sites will match the District look and feel for a high quality web experience.
- Better search: as more departments move to the new system, the search function will improve greatly.



## **Evidence:**

### **Standard III.C Technology Resources**

- III.C.1    **Program and Resource Planning Process Website**  
<http://goo.gl/n9F0jG>
- III.C.2    **Institutional Technology Group (ITG)**  
<https://bussharepoint.santarosa.edu/committees/institutional-technology/SitePages/Committee%20Home%20Page.aspx>
- III.C.3    **2013 Accreditation Student Survey**  
<http://goo.gl/BPG8wT>
- III.C.4    **Strategic Master Plan for Technology, 2015 and Beyond**  
<http://goo.gl/UoRIkl>
- III.C.5    **SRJC IPC Technology Future Needs Preliminary FY 2015 ITG Budget Presentation**  
<http://goo.gl/lvvCGz>
- III.C.6    **Media Services**  
<https://www.santarosa.edu/media/>
- III.C.7    **Distance Education Homepage**  
<http://online.santarosa.edu/>
- III.C.8    **SRJC Moodle Resource Web Page**  
<http://online.santarosa.edu/>
- III.C.9    **Moodle Support for Faculty, News and Information Website**  
[http://online.santarosa.edu/moodle\\_info/](http://online.santarosa.edu/moodle_info/)
- III.C.10   **Assistive Technology Center (ATC)**  
<http://online.santarosa.edu/presentation/page/?35772>
- III.C.11   **Example of DRD Support: Multi-Curricular Computer Lab, DRD Information Web Page**  
<http://www.santarosa.edu/administration/administrative-services/information-technology/labs/bcl/drd>
- III.C.12   **Center for Excellence in Teaching and Learning**  
<http://www.santarosa.edu/library/about/doylelibrary.html>
- III.C.13   **Office of Institutional Research Website**  
<http://www.santarosa.edu/research/>
- III.C.14   **Current IT Projects Website**  
<http://www.santarosa.edu/administration/administrative-services/information-technology/projects/>
- III.C.15   **Committees and Councils Homepage**  
<https://bussharepoint.santarosa.edu/committees/default.aspx>
- III.C.16   **Student Learning Outcomes (SLO) SharePoint Site (Link from SLO Website)** <http://www.santarosa.edu/slo/forms/>
- III.C.17   **Web Access to Strategic Planning Task Force Page**  
<http://libguides.santarosa.edu/strategicplanning>
- III.C.18   **IT Blog**  
<http://www.santarosa.edu/administration/administrative-services/information-technology/blog/>

**III.C.19 College Operational System Projects**

<http://www.santarosa.edu/administration/administrative-services/information-technology/projects/programming/>

**III.C.20 ITG Equipment Request Workflow**

<https://www.santarosa.edu/administration/administrative-services/information-technology/purchasing/Equipment%20Request%20Workflow.pdf>

**III.C.21 Family Educational Rights and Privacy Act (FERPA) Web Page**

<http://admissions.santarosa.edu/family-educational-rights-and-privacy-act-1974-ferpa>

**III.C.22 SkillSoft E-learning Services Training**

<http://online.santarosa.edu/presentation/schedule/?6145>

**III.C.23 Staff Resource Center Website, Menu of Activities**

[http://www.santarosa.edu/src/menuOfActivities\\_current.html](http://www.santarosa.edu/src/menuOfActivities_current.html)

**III.C.24 Online Support for Faculty and Staff Website**

<http://www.santarosa.edu/administration/administrative-services/information-technology/support/>

**III.C.25 Distance Education Needs Assessment Survey Summary**

<http://www2.santarosa.edu/f/?nBvDQHXT>

**III.C.26 Distance Education Help for Faculty Website**

<http://online.santarosa.edu/dehelp/>

**III.C.27 Course Outline: CSKLS 334, How to Take an Online Class**

[https://portal.santarosa.edu/SRweb/SR\\_CourseOutlines.aspx?CVID=22941&Semester=20117](https://portal.santarosa.edu/SRweb/SR_CourseOutlines.aspx?CVID=22941&Semester=20117)

**III.C.28 Example of Special Expertise Requirement for Distance Education Instruction, College Skills Department Hourly Assignment Procedures, per All Faculty Association (AFA)/District Contract, Article 16**

[http://www.santarosa.edu/afa/Hourly\\_Assign\\_Proc\\_Xdept/college\\_skills.pdf](http://www.santarosa.edu/afa/Hourly_Assign_Proc_Xdept/college_skills.pdf)

**III.C.29 SRJC Online Learning Website, Page: Best Practices**

<http://online-learning.santarosa.edu/best-practices>

**III.C.30 Podcasts and Other Resources for Faculty on Accessibility for Online Materials**

<http://online.santarosa.edu/presentation/page/?67742>

**III.C.31 Online College Project Website**

<http://online-learning.santarosa.edu/online-college-project>

**III.C.32 Lynda.com**

<http://www.lynda.com/>

**III.C.33 Staff Development Technology Pathway, Screenshot and Link to Menu of Activities**

<http://www2.santarosa.edu/f/?nDERFQTy>

**III.C.34 Library Home Page**

<http://www.santarosa.edu/library/>

**III.C.35 Library Skills Program Exercises**

<http://www.santarosa.edu/library/services/lsp.html>

**III.C.36 Course Outline of Record, LIR 10, Introduction to Information Literacy**

[https://portal.santarosa.edu/SRweb/SR\\_CourseOutlines.aspx?CVID=24532&Semester=20137](https://portal.santarosa.edu/SRweb/SR_CourseOutlines.aspx?CVID=24532&Semester=20137)

**III.C.37 Computer Labs Schedule**

<http://www.santarosa.edu/administration/administrative-services/information-technology/labs/>

- III.C.38 English Writing Center**  
[http://www.santarosa.edu/english/writing\\_center.html](http://www.santarosa.edu/english/writing_center.html)
- III.C.39 Bond Measure A Website**  
<http://goo.gl/gyY22l>
- III.C.40 ITG Presentation of Master Technology Plan, 2015 and Beyond**  
<http://www2.santarosa.edu/f/?nDKvFREw>
- III.C.41 Board Policy and Procedures 2.13/2.13P, Computer and Communications Technology Use**  
<http://www.santarosa.edu/polman/2govern/2.13.pdf>  
<http://www.santarosa.edu/polman/2govern/2.13P.pdf>
- III.C.42 New SRJC Website Launch Email, October 16, 2014**  
<http://www2.santarosa.edu/f/?nDXJPFND>
- III.C.43 Institutional Planning Council Homepage**  
<http://goo.gl/6FeLJ9>