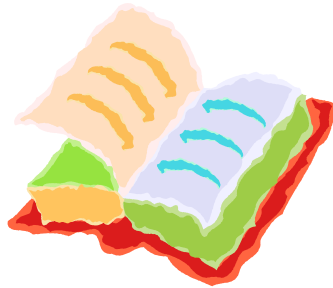




***Read On!,
Lakeside High School***



**MIT 522
May 2, 2006
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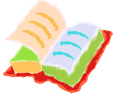


Table of Contents

| | |
|---|-----------|
| INTRODUCTION..... | 3 |
| PROJECT IMPLEMENTATION PLAN | 4 |
| COMMUNICATION PLAN | 5 |
| DESIGN OF THE INFRASTRUCTURE | 6 |
| STAFF DEVELOPMENT PLAN..... | 7 |
| TECHNOLOGY SUPPORT SERVICES | 8 |
| PROJECT BUDGETS AND TIMELINE | 9 |
| APPENDIX A..... | 10 |
| APPENDIX B..... | 12 |
| APPENDIX C..... | 14 |
| APPENDIX D..... | 16 |
| APPENDIX E..... | 19 |
| APPENDIX F | 20 |



Introduction

Lakeside High School is one of five high schools within the New Hanover County School System and the only school that is considered an *alternative school*. Students who are enrolled at Lakeside have failed either the math and/or reading 8th grade EOG and have been sent to Lakeside for an *alternative* 9th grade year.

Poor reading skills among students have been identified as a major obstacle to student performance. Data obtained from surveying the Lakeside teachers and from directly interviewing the reading resource teacher, revealed that 82% of students are reading well below grade level. Reading levels are not currently being directly measured; however, teachers surveyed felt Lakeside students are reading below the 5th grade level. Thus the scores on the EOG tests are well below average. In December 2006 only 11% of the students enrolled at Lakeside passed the repeat competency exam. Direct observation of classrooms revealed that 80% of teacher's instructional strategies are not adjusted to students with multiple needs and backgrounds. All classrooms have at least one computer and the school has a computer lab; however, during observation, data shows that the computer lab was not utilized during instruction and teachers failed to use technology to facilitate student learning.

The goals of this technology plan include:

- Students will read at grade level
- Students will actively engage in classroom activities, using technology 80% of the time
- Teachers will develop learning activities to improve student learning daily
- Teachers will develop lesson plans integrating technology daily

A technology change team includes key Lakeside School personnel (see Appendix A) and has been established to develop the mission and vision statements for the technology change plan. This plan includes the integration of interactive reading software to measure and monitor reading and writing skills improvement. This plan also allows for the installation of 5 data drops per classroom in order to accommodate more computer stations and student computer accessibility. Phase I of the project involves the purchase of reading software to assess the current reading level of each and every student who enters Lakeside High School and can be used for independent student work along with ongoing reassessment. A change to the current infrastructure would include the installation of additional data drops so that each classroom would be able to house five computers, increasing student access to technology and the reading software. The purchase of additional headphones will help to ensure that students can work independently while other classroom activities are going on. Language Arts teachers will participate in the first phase to begin developing lesson plans integrating technology and developing classroom activities to improve active learning.

Phase two brings in the social studies teachers, and by Phase three, all teachers at Lakeside High School have moved away from the traditional lecture style teaching and are actively engaged in classroom activities that improve student participation and learning. The ultimate goal is to improve reading skills, enabling students to pass the competency test and return to their traditional school with new skills to make their high school years rewarding and successful. With this preface to the technology plan for Lakeside School, the following mission and vision statements have been established:

Mission Statement:

The mission of the reading technology plan of Lakeside High School is to improve reading skills of the students. Through this technology plan, teachers of Lakeside High School will engage in and enjoy reading software use in students' reading task, and students of Lakeside High School will be interested in reading and enhance their reading and comprehension skills beyond their current grade level of reading, which in return, will result in effective use of other technology use in classroom instruction. Ultimately, through the technology plan, a majority of students in Lakeside High School will be able to pass EOG test for 9th grade and return to a traditional high school with the necessary skills at 9th grade level to allow them to actively participate in learning.

Vision Statement:

We believe in that all children in Lakeside High School can learn and that the use of *Read On!* software will improve reading skills for students. Our vision is to provide teachers, students, and families an opportunity to access and integrate *Read On!* software use in reading, teaching and learning for students within and beyond the school setting and to become active participants in technology use in curriculum instruction. We have been given the task of empowering our students with the desire to make learning a life-long process. Using technology is a basic skill that will help students become lifelong learners, capable of critical thinking and problem solving and become active members of the world beyond our door.

Technology Change Goals:

- Improve available infrastructure related to running *Read On!* software by August, 2006
- Complete *Read On!* training for change management team by August, 2006
- Combine *Read On!* training for other teachers with curriculum instruction through daily work.
- 80% of the school time, students will be able to engage in reading activities along with *ReadOn* software
- Students will be able to read at grade level.
- Teachers feel comfortable incorporating *Read On!* software into reading instruction.
- Teachers will be able to develop learning activities and lesson plans related to *Read On!* use.
- Install 5 data drops per classroom.



Project Implementation Plan

The technology change plan at Lakeside High School will be implemented in three phases. The first phase will be focused on putting the infrastructure into place. Phase one begins with the installation of classroom data drops. Currently all classrooms have at least one drop, however, the goal is for all classrooms to have a total of five. This will allow for several students to be working independently on computerized learning activities while others are engaged in other classroom activities. The cost of installing additional data drops can be reduced if all are installed at once instead of in phases, therefore, the plan calls for installation in the beginning of the first year.

Read On! software is an interactive reading program designed especially for high school students with reading difficulties. This software assesses learners and places them at the appropriate level. The program builds vocabulary, comprehension and analyzes writing skills. *Read On!* is a product of Steck Vaughn and states, "ongoing assessment embedded in the program constantly monitors learners' progress and adjusts instruction to meet their needs. To accelerate mastery, learners focus only on the skills they need." *Read On!* will be installed on the Lakeside server and will be accessible by all classroom computers.

The final technology portion involved in phase one will be the purchase of headsets for the classroom computers. This will enable those working on the computer to "tune out" the rest of the classroom noise and improve concentration.

Teachers and students in Language Arts will be the first to implement the changes. Phase two brings the social studies and math teachers actively participating in the stated goals and increases the daily time students are exposed to technology related activities. Phase three brings in the science teachers and all other Lakeside teachers. Complete details of the Implementation Plan along with indicators and benchmarks can be found in Appendix B.

| | Phase One | Phase Two | Phase Three |
|---------------------|---|---|---|
| Technology | <ul style="list-style-type: none"> • 5 data drops/classroom • Computer headphones • <i>Read On!</i> Software | | |
| Teachers & Students | <ul style="list-style-type: none"> • Language Arts | <ul style="list-style-type: none"> • Social Studies/Math | <ul style="list-style-type: none"> • Science |

Listed below are the strategies for students and teachers to accomplish the stated goals and achieve reading success. As stated above, Language Arts teachers will be the first to participate, using the strategies listed in the table below to integrate technology into their classrooms. Successful performance can be monitored through direct classroom observation and viewing lesson plans.

Students in Language Arts classrooms will begin the year with testing in order to determine their current reading level. *Read On!* software can then be used as a tool for individual learning improvement. Classroom activities, peer tutoring and individual sessions with the reading specialist, if necessary, are strategies to continue the learning process. This will be measured by classroom observation and teacher or administration reports. All are designed to have students ultimately reading at grade level and will be measured by comprehensive exams.

See Appendix C for further details.

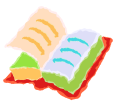
| Students | Teachers |
|--|--|
| <ul style="list-style-type: none"> • All students will take a test to determine their current reading level | <ul style="list-style-type: none"> • Teachers will participate in training workshops for professional development regarding integrating technology into the classroom and individualizing instruction |
| <ul style="list-style-type: none"> • Students will participate in reading improvement activities during class time 3 hours weekly | <ul style="list-style-type: none"> • Teachers will participate in training workshops for proper use of <i>Read On!</i> software. |
| <ul style="list-style-type: none"> • Students of high level will tutor lower level students 2 hours weekly, during class time | <ul style="list-style-type: none"> • Teachers will develop lesson plans with technology use in curriculum |
| <ul style="list-style-type: none"> • Students will participate in peer assessments of reading skills and tests | <ul style="list-style-type: none"> • Teachers will design reading improvement activities with technology integration in the classroom |
| <ul style="list-style-type: none"> • Students identified by the reading specialists will meet with her weekly | <ul style="list-style-type: none"> • Teachers will participate in peer sharing of ideas in weekly meetings |
| | <ul style="list-style-type: none"> • Teachers will participate in peer assessment of reading improvement activities with technology use within classroom |



Information is currently distributed within the Lakeside community through weekly staff meetings, e-mails and direct communication. A communication plan has been developed in order to smoothly integrate the technology change plan at Lakeside High School.

The computer resource teacher at Lakeside High School will lead the change management team. Other team members include the reading resource teacher, the vice principal, the school counselor, social worker and special population's coordinator. This team will also be responsible for disseminating information during all phases of the technology implementation to all stakeholders. In addition to the change management team, other stakeholders include the principal, vice principal, NHC Central office, all Lakeside teachers, parents and students, and any potential funding resources.

The communication plan as listed in Appendix A, provides the details as to the format of the communication, the method of communication and party responsible for its publication.



Design of the Infrastructure

Lakeside server is a Netware server and was recently updated. This server currently houses all programs allowing access by all computers connected to the server. Through routine observation and check report from Helen, a computer resource teacher, 80% of teachers, except computer teachers, rarely use software related to subject in class instruction. Software that teachers and students use most is word processing, internet search, and games. For example, Star Reader Program and Skills tutor are rarely used by teachers and students. Computer lab is used infrequently by teachers for activities and they were accustomed to lecturing in traditional styles. Internet is accessible for every student and staff with an ID and Password. Internet access and internet environment are always under safety. By inventory for teachers and students from Lakeside school, 80% teachers stated that they felt comfortable using computers in their classroom; however, 90% of teachers felt compelled to stay on track and teach to the NC curriculum guidelines for 9th grade. As per teacher surveys, 90% of Lakeside students are very comfortable with technology for personnel use, however reading is a major obstacle for proficient use of technical programs and computer based testing. By class observation from teachers and the reading specialist, 80% of students are reading below grade level. Lakeside only has one reading resource teacher. Presently, other subject teachers like SS teachers, LA teachers, are required to teach reading in turn. One computer resource teacher is mainly responsible for basic troubleshooting, for example, simple network and hardware problems, monitoring computer use in classroom, and training the staff on new software application. When problems related to technology use cannot be solved by the computer resource teacher, a technician from New Hanover County School Technology department will be asked to fix these problems. Scanners are seldom used in relevant subject instruction, mainly used for school administrating needs.

The technology plan includes the purchase of *Read On!* software, an interactive tool for people with reading difficulties that is especially targeted to high school students. This software will be loaded onto the server at Lakeside High School, which has been recently updated and the software program can be accessed from all classrooms. The computer resource teacher will be responsible for installing the software onto the server. Any advanced technical assistance can be obtained through New Hanover County School Technology Department.

Each classroom is equipped with a variety of computers that differ greatly in performance capacity and application. Some classrooms have only one computer, others have up to five. The technology change plan includes the installation of additional classroom data drops so that each classroom will have the potential for five working computers. Lakeside personnel have recently submitted a purchase request for the new computers. It is anticipated the new computers will be in place in phase one of the implementation plan.

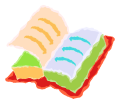
The purchase of headphones for each computer of all classrooms will allow students to work within the classroom environment while other activities are occurring. Specifications on infrastructure improvement are listed in the below table.

Goal:

Make available new software running in server and the classroom.
 Prompt smoothly use of up-to-date technology among teachers and students.

| Minimal Requirements of <i>ReadOn</i> Software | What we need | What we have |
|--|---|--------------|
| Hardware | Windows 98, ME, NT4 (Service Pack 6), Win2000, XP | √ |
| | Pentium 300MHz processor | √ |
| | 64MB RAM | √ |
| | Sound Card | √ |
| | 300 MB free disk space | √ |
| | CD ROM Drive | √ |
| | Screen resolution of 800×600 pixels with high (16bit) color | √ |
| Peripherals | Speakers | |
| | A TWAIN-compliant scanner | √ |
| | Keyboard and mouse | √ |
| | Printer | √ |
| | Headphone set for classroom | |
| Software | Office | √ |
| | Acrobat Reader | √ |
| | Network | √ |
| Language support | English | √ |

In terms of minimal system requirement of *Read On!*, the current hardware condition (for details, please see Appendix D.) will be able to meet the needs of running of the new software within classrooms and the computer lab. So, no hardware needs to be updated or added.



Staff Development Plan

A plan for professional development is needed in order to change the pedagogy of teachers at Lakeside school. Teachers are accustomed to lecture style teaching that does not address student individual needs and backgrounds. The staff development goals for this technology plan include:

- Teachers will develop learning activities to improve student learning daily
- Teachers will develop lesson plans integrating technology daily
- Teachers will become educated on the proper use and benefits of the *Read On!* software program

The technology change plan utilizes the Three Levels and Small Group Training professional development model. This model states that technology integration requires three distinct levels. The first requires teachers to actually use and become familiar with a particular piece of software. Second, teachers must be trained to evaluate the selected technology for their particular classroom use, and finally, teachers must discuss how to integrate software into their curricular and how they are to change what they are doing in their classrooms.

This model is project based, for technology is only the tool, not the focus of the activity. As the above goals are implemented, each learning activity is ultimately designed to improve student learning by improving reading skills. Discussion with the reading specialist revealed that students were not interested in focusing on reading improvement skills directly through book reports or phonic instruction, however, were eager to participate in projects, especially involving community-based activities such as newspaper research (recent inclusions: Bird Flu and the port of Wilmington).

The three levels and small group training model states that training must be progressive, continuous and ongoing, for single-shot training is ineffective. Teachers need longer times in order to thoroughly absorb the information and incorporate it into their classrooms. This model also states that learning to use technology is required, not voluntary and that principals, superintendents and other administrators should take technology staff development courses along with the teachers who will be implementing the information.

The technology staff development courses are to be taught in a workshop group forum setting. This setting allows for discussion and sharing of ideas and experiences amongst teachers. Initial training is to be delivered by a representative or subject matter expert who is a seasoned *Read On!* software user. The goal is for the representative to deliver a one day workshop on a teacher work day, with both hands on technical sessions, troubleshooting sessions, and open discussion sessions. This training will be delivered first to the change management team (see Appendix A). Upon receiving this training, the change management team will facilitate the implementation of the software in the classroom. They will train the remainder of the teaching staff (12 teachers in all), in phases as referenced in the technology plan, starting with the Language Arts teachers, on the *Read On!* software and relate their success stories and experiences to the group. These sessions will be conducted on a teacher work day and a small stipend will be paid to each participating teacher. These sessions will consist of two parts: the first portion is a hands-on demonstration in the computer lab. The second portion will be in a forum setting to encourage round table discussion.

Estimated cost of the training workshop for the change management team is \$830. Budget details for each training session can be found in the Budget section below and in Appendix F.



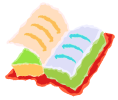
Technology Support Services

Technology support services will not be complex as the *Read On!* Software support is available through the website: www.steckvaughn.harcourtachieve.com as well as the United States service support phone line.

Technology Support Ladder

| Problem | Support Contact |
|---|--|
| Technical difficulty with hardware or standard software | 1 st line – Computer Resource Teacher |

| | |
|--|---|
| or accessories | 2 nd line – New Hanover County Schools ITSD 3 rd line – Hardware, Software, Accessory Vendor |
| Technical Difficulty with the Read On Software Program | 1 st Line – Reading Resource Teacher 2 nd Line – Computer Resource Teacher 3 rd Line – Read On Software Support Services |
| Data Drop Technical Support | 1 st Line – Computer Resource Teacher 2 nd Line – New Hanover County Schools ITSD |



Project Budgets and Timeline

The majority of the expense for this technology change plan is derived from the purchase of the *Read On!* software and the installation of classroom data drops. All other expenses are listed below and further details are listed in Appendix F.

A Summary Budget Table

| Direct Cost | 2006-2007 | 2007-2008 | 2008-2009 | Total |
|--|------------------|---------------|---------------|------------------|
| Consultants | \$ 2,000 | \$ 500 | \$ 500 | \$ 3,000 |
| Software | \$ 20,872 | | | \$ 20,872 |
| Headphones | 260 | | | 260 |
| Data Drops | \$ 6,600 | | | \$ 6,600 |
| <i>Read On!</i> Workshops – Change management team | \$ 830 | | | \$ 830 |
| <i>Read On!</i> Workshop - teachers | \$ 175 | \$ 350 | \$ 175 | \$ 700 |
| Total | \$ 30,737 | \$ 850 | \$ 675 | \$ 32,262 |

Appendix A

Coalition Team

- Principal
- Vice Principal
- Computer Resource Teacher
- PTA

Change Management Team

- Computer Resource Teacher – Leader
- Reading Resource Teacher
- Vice Principal
- Counselor
- Social Worker
- Special Populations Coordinator

Additional Stakeholders

- Central NHC Office
- Lakeside Teachers
- Parents
- Students
- Potential Funding Resources

| Stage and objective of the communication | Stakeholder Group | Format | Vehicle | Responsible Party |
|--|---------------------------|-----------------------------|---|------------------------|
| Mission Statement Communicate Vision to the Stakeholders | Change Management Team | Verbal, Electronic | Presentation, Internet (School website announcement) | Coalition Team |
| | Central NHC Office | Verbal, Electronic | Presentation, Internet | |
| | Teachers | Verbal, Electronic | Presentation, Internet (School website announcement) | |
| | Parents | Written, Verbal | Newsletter, PTA discussion | |
| | Students | Verbal | Announcement and preview | |
| | Potential funding sources | Verbal, Written, Electronic | Presentation, Newsletter, Internet (Priority Email) | |
| | | | | |
| Goal Setting Communicate goals of the project | Coalition Team | Verbal, Electronic | Presentation, Internet (Priority Email) | Change Management Team |
| | Central NHC Office | Written, Electronic | Report, Internet | |
| | Teachers | Verbal, Electronic | Presentation, Internet (School website announcement) | |
| | Parents | Written, Verbal | Newsletter, PTA discussion | |
| | Students | Verbal | Classroom Announcement | |
| | Potential funding sources | Verbal, Written, Electronic | Presentation, Newsletter, Internet (Priority Email) | |
| | | | | |
| Data Gathering Communicate the | Coalition Team | Written, Electronic | Report, Internet (Project progress E-board of school website) | Change Management Team |
| | Central NHC Office | Written, Electronic | Report, Internet meeting | |

| | | | | |
|---|---------------------------|-----------------------------|---|------------------------|
| current situation | Teachers | Written, Electronic | Report, Email, School website announcement | |
| | Parents | Written, Verbal | Report, PTA discussion | |
| | Students | Verbal | Classroom discussion | |
| | Potential funding sources | Written, Electronic | Report, Internet (Priority Email) | |
| Planning Communicate program plans; provide objectives, timelines and reinforce mission statement | Coalition Team | Verbal, Written, Electronic | Presentation, Report, Internet Posting | Change Management team |
| | Central NHC Office | Verbal, Written, Electronic | Presentation, Report, Online | |
| | Teachers | Verbal, Written, Electronic | Presentation, Report, Online forum | |
| | Parents | Written, Electronic | Report, Internet | |
| | Students | Verbal | Classroom Discussion | |
| | Potential funding sources | Verbal, Written, Electronic | Presentation, Report, Online announcement | |
| | | | | |
| Implementation Communicate the processes involved with implementation | Change Management Team | Written, Electronic | Report, Internet Posting, Detailed handout | Coalition Team |
| | Central NHC Office | Written, Electronic | Report, Internet Posting | Change Management Team |
| | Teachers | Verbal, Written | Discussion, Report, Project forum E-board | |
| | Parents | Written | Newsletter | |
| | Students | Verbal, Written | Classroom announcement, detailed handout | |
| | Potential funding sources | Written, Electronic | Report, Internet Posting | |
| Evaluation Communicate the results of measurable values | Change Management Team | Verbal, Written, Electronic | Presentation, Report on Success and subsequent remediation or direction, Internet Posting | Coalition Team |
| | Central NHC Office | Verbal, Written, Electronic | Presentation, Report on Success and subsequent remediation or direction, Internet Posting | Change Management Team |
| | Teachers | Verbal, Written, Electronic | Presentation, Report on Success and subsequent remediation or direction, Internet Posting | |
| | Parents | Verbal, Written, Electronic | Presentation, Report on Success and subsequent remediation or direction, Internet Posting | |

| | | | | |
|--|---------------------------|-----------------------------|---|--|
| | Students | Verbal | Communicate program results via classroom discussion – receive feedback | |
| | Potential funding sources | Verbal, Written, Electronic | Presentation, Report on Success and subsequent remediation or direction, Internet Posting | |

Appendix B

Project Implementation Plan

Phase 1 - 2006

| Goals (Outcomes) | Indicators | Benchmarks | Measures |
|---|--|---|---|
| Students in Language Arts classrooms read at grade level | Score on the reading test | By December 2006, student reading exam scores will improve by one grade level | Comprehensive exam scores |
| Students in Language Arts classrooms will actively engage in classroom activities, using technology 80% of the time | Reading assignments and activities. Story writing and reading | By December 2006, 50% of the classroom time, students will engage in classroom activities with technology use | Teacher Report Classroom Observation |
| Teachers in Language Arts classrooms will develop learning activities to improve student learning daily | Group reading exercises Peer review and compilation writing exercises Reading comprehension activities | By December 2006, teachers will administer learning activities 50% of their instructional time | Lesson Plans Classroom Observation |
| Teachers in Language Arts classrooms will develop lesson plans integrating technology daily | Technology supported lesson plans | By December 2006, 50% of the teacher lesson plan contains technology related activities | Lesson Plans Classroom Observation |
| Updated interactive reading software available on school sever | All classrooms and the computer lab can access software on the server | By August 2006, all software needed is installed and updated on server | Technology specialist measure and test report |
| Accessories available on all computers | Headset | By August 2006, all accessory equipment needed is available on every computer | Technology resource teacher observation |
| 5 data drops per classroom | Data drop is usable | By August 2006, 5 data drops are access to per classroom | Technology resource teacher observation |

Phase 2 - 2007

| Goals (Outcomes) | Indicators | Benchmarks | Measures |
|--|--|---|---|
| Students in Language Arts and Social Studies classrooms read at grade level | Score on the reading test | By December 2007, student reading exam scores will improve by one grade level | Comprehensive exam scores |
| Students in Language Arts and Social Studies classrooms will actively engage in classroom activities, using technology 80% of the time | Reading assignments and activities. Story writing and reading | By December 2007, 50% of the classroom time, students will engage in classroom activities with technology use | Teacher Report Classroom Observation |
| Teachers in Language Arts and Social Studies classrooms will develop learning activities to improve student learning daily | Group reading exercises Peer review and compilation writing exercises Reading comprehension activities | By December 2007, teachers will administer learning activities 50% of their instructional time | Lesson Plans Classroom Observation |
| Teachers in Language Arts and Social Studies classrooms will develop lesson plans integrating technology daily | Technology supported lesson plans | By December 2007, 50% of the teacher lesson plan contains technology related activities | Lesson Plans Classroom Observation |

Phase 3 - 2008

| Goals (Outcomes) | Indicators | Benchmarks | Measures |
|---|--|---|---|
| All students read at grade level | Score on the reading test | By December 2008, student reading exam scores will improve by one grade level | Comprehensive exam scores |
| All students will actively engage in classroom activities, using technology 80% of the time | Reading assignments and activities. Story writing and reading | By December 2008, 50% of the classroom time, students will engage in classroom activities with technology use | Teacher Report Classroom Observation |
| All teachers will develop learning activities to improve student learning daily | Group reading exercises Peer review and compilation writing exercises Reading comprehension activities | By December 2008, teachers will administer learning activities 50% of their instructional time | Lesson Plans Classroom Observation |

| | | | |
|---|-----------------------------------|---|---------------------------------------|
| All teachers will develop lesson plans integrating technology daily | Technology supported lesson plans | By December 2008, 50% of the teacher lesson plan contains technology related activities | Lesson Plans Classroom Observation |
|---|-----------------------------------|---|---------------------------------------|

Appendix C

Identify Implementation Strategies/Activities

| Goals & Benchmarks | Description of Strategies/Activities to Achieve Goals & Benchmarks | Timeline (Projected date for Achievement) | Budget |
|---|--|--|--|
| Technology Infrastructure | | | |
| <p>The teachers and students will have uniform and quality learning environment with technology use.</p> <p>Benchmarks:</p> <p>By August of 2006,</p> <ul style="list-style-type: none"> ● All software needed, especially interactive reading software is installed and updated on school sever ● Accessory equipment required for optimal use is available on all computers ● 5 data drops are access to per classroom | <ul style="list-style-type: none"> ● Technology resource teacher, with the help of NHCS Technology Department, will install new software on the server at Lakeside ● Technology resource teacher, with the help of NHCS Technology Department, will install accessory equipment on all computers ● The NHCS Technology Department will arrange for the installation of 5 data drops per classroom | <p>Installation by August 2006</p> | <p style="text-align: right;">\$ 20,872</p> <p style="text-align: right;">\$ 260</p> <p style="text-align: right;">\$ 6,600</p> |

| | | | |
|---|--|---|--|
| <p>Students All students will be able to read at grade level and engage in classroom activities with technology use.</p> <p>Benchmarks:</p> <p>By December 2006,</p> <ul style="list-style-type: none"> ● Students in Language Arts will improve by one grade level in reading exam scores. ● Fifty percent of the classroom time, students will engage in classroom activities with technology use <p>By December 2006,</p> <ul style="list-style-type: none"> ● Students in Language Arts and Social Studies classrooms will improve by one grade level in reading exam scores. ● Fifty percent of the classroom time, students will engage in classroom activities with technology use. <p>By December 2006,</p> <ul style="list-style-type: none"> ● All students will improve by one grade level in reading exam scores. ● Fifty percent of the classroom time, students will engage in classroom activities with technology use | <ul style="list-style-type: none"> ● All students will take a test to determine their current reading level ● Participate reading improvement activities during class time three hours weekly. ● Students of higher level will tutor lower level students 2 hours weekly, during class time. ● Peer assessments of reading skills and tests ● Students identified by the reading specialist will meet with her weekly | <p>Phase 1: Sept 2006</p> <p>Phase 1: Nov 2006</p> <p>Phase 1: Nov 2006</p> <p>Phase 1: Nov 2006</p> <p>Phase 1: Nov 2006</p> | <p>No cost</p> <p>No cost</p> <p>No cost</p> <p>No cost</p> <p>No cost</p> |
| <p>Teachers</p> | <ul style="list-style-type: none"> ● Participate in training workshops for | <p>Phase 1: Attend at</p> | <p>No cost</p> |

| | | | |
|--|---|---|---|
| <p>Teachers will develop lesson plan and learning activities integrating technology to improve student learning daily</p> <p>Benchmarks:</p> <p>By the end of phase one,</p> <ul style="list-style-type: none"> Teachers in Language Arts classrooms will administer learning activities 50% of their instructional time Fifty percent of lesson plan of teacher contains technology related activities <p>By the end of phase two,</p> <ul style="list-style-type: none"> Teachers in Language Arts and Social Studies classrooms will administer learning activities 50% of their instructional time Fifty percent of lesson plan of teacher contains technology related activities <p>By the end of phase three,</p> <ul style="list-style-type: none"> All teachers will administer learning activities 50% of their instructional time Fifty percent of lesson plan of teacher contains technology related activities | <p>professional development regarding integrating technology into the classroom and individualizing instruction</p> <ul style="list-style-type: none"> Participate in training workshops for proper use of <i>Read On!</i> software. Change management team Language Arts teachers Develop lesson plans with technology use in curriculum Design reading improvement activities with technology integration in the classroom Peer sharing of ideas in weekly meetings Peer assessment of reading improvement activities with technology use within classroom | <p>least one workshop prior to August 2006</p> <p>Phase 1: Aug 2006</p> <p>Phase 1: Nov 2006</p> <p>Phase 1: Nov 2006</p> <p>Phase 1: Nov 2006</p> <p>Phase 1: Nov 2006</p> | <p>\$ 830</p> <p>\$ 175</p> <p>No cost</p> <p>No cost</p> <p>No cost</p> <p>No cost</p> |
|--|---|---|---|

Appendix D

Current Technology Resources

Hardware

Classroom Hardware

| Room # | Subject | Pentium | | | | Printer | | | Scanner | CD Burner | Projector | Comments |
|--------|----------------|---------|----|----|----|---------|-------|-----|---------|-----------|-----------|----------|
| | | 1 | 2 | 3 | 4 | HP | Epson | IBM | | | | |
| 101 | Science | | | 1C | 1C | 1 | | | | | | HP 1012 |
| 102 | Social Studies | | 2C | | 1C | 1 | | | | | | HP 1012 |
| 103 | Language Arts | | | | 1C | 1 | | | | | | HP 1012 |

| | | | | | | | | | | | | |
|---------------|--|----------------|----------|----------|-----------|----------------|--------------|------------|----------------|------------------|------------------|-------------------------|
| 104 | Math | | | | 1C | 1 | | | | | | HP 6122 |
| 108 | Suspension | | | 4C | 1C | 1 | 1 | | | | | HP 740; Epson 680C |
| 201 | Science | 1C | | | 1C | 2 | | | | | | HP 6MP; 670C |
| 202 | Language Arts | | | 1C | 1C | | 1 | | | | | Epson 740 |
| 203 | Social Studies | | | 3C | 1C | 1 | | | | | | HP950C |
| 204 | Math | | 1C | | 1C | 1 | | | | | | HP 6122 |
| 205 | Social Studies | | | 1C | | 1 | | | | | | HP 6122 |
| 206 | Computer Aps | | | 15C | 1C | 2 | | | 1 Opscan | | | HP 4050N; 685XI |
| 207 | Math | | | 1C | 1C | 1 | | | | | | HP 1012 |
| 208 | Science | | 1C | | 1C | 1 | 2 | | | | | HP 1012; Epson LQ570 |
| 209 | Disability | | 1C | | 1C | 2 | | | | | | HP 4050N; 680C |
| 210 | Language Arts | | | | 1C | 1 | | | | | | HP 4050N |
| 211 | Nurse | | | 1C | | | | | | | | |
| 300 | PE | | | 2C | 1C | 1 | | | | | | HP 670C |
| 301 | Lounge | | | 1C | | | | | | | | |
| 302 | Language Arts | | 1C | | 1C | 1 | 1 | | | | | HP 840C; Epson LQ570 |
| 303 | Reading Specialist | | | 1C | 1C | 1 | | | | | | HP 4050 |
| 304 | Nova Net | | 1C | 26C | | 2 | 2 | | | | | HP 930C, 5SI; Epson 740 |
| 305 | Social Studies | | | | 1C 1HP | 2 | | | | | | HP895 CI, 940C |
| 306 | Nova Net | | | 1C | | | | | | | | |
| 400 | Science/Math Long suspension | | 1C | 4C | 1 HP | 2 | | | | | | HP 840C, 400 |
| 401 | Language Arts/Social Studies Long suspension | | | 6C | | 1 | | 1 | | | | HP 6122; IBM 400 |
| 600 | Secretary | | | 1C | | 1 | | | | | | HP 6122 |
| 601 | Secretary | | | | 2HP | 2 | | | | | | HP 4500N; 6122 |
| Room # | Subject | Pentium | | | | Printer | | | Scanner | CD Burner | Projector | Comments |
| | | 1 | 2 | 3 | 4 | HP | Epson | IBM | | | | |
| 602 | Principal | | | | 1C 1CL | 1 | | | | | | HP 820C |
| 603 | Vice Principal | | | | 1C | 1 | | | | | | HP 930C |
| 604 | Counselor | | | | 1HP | 1 | | | | | | HP 930C |
| 605 | Deputy | | | 1C | | | 1 | | | | | Epson 740 |
| 607 | Social Worker | | | 1C | | 1 | | | | | | HP 3820 |

| | | | | | | | | | | | | |
|--|--------------------------|-----------|------------|----------------------|-----------------------------------|-----------|-----------|----------|----------------------------|----------|---------------------|--|
| 610 | Computer Lab | | | 26C 16DL | 2HP 1A | 2 | | | 1- HP Scan Jet 5490C | | 1 Hitachi 1 Elmo | HP Laser 4000 |
| 611 | | | 2C | 5C | 2 C | 2 | | | 1- HP Scan Jet 5490C | | | HP Laser 4050; 670C |
| 612 | | | | | 1C 1CL | 2 | 1 | | | 1-lomega | | HP Laser Jet, 810C; Epson 777 |
| 613 | Media AV | | 2C | | | | | | | | | Epson 740 |
| | Wireless cart Laptops | | | 14D | | | | | | | | 5 yrs old; 63 MB memory; not configured to server |
| | Totals | 1C | 12C | 45C 20 DL | 23C 1A 7HP 2CL | 40 | 10 | 1 | 3 | 1 | 2 | |
| Codes: C = Compaq HP = Hewlett Packer A = Apple DL = Dell Laptop CL = Compaq Laptop | | | | | | | | | | | | |

| Software | Network | Human Resources | Facilities |
|--|--|--|--|
| All classrooms: <ul style="list-style-type: none"> Inspiration Green Globbs – Graphing Equations MS Office 2000 Excel NCWise Access Timeliner Power Point World Discovery Deluxe Publisher Student Reference Library Windows movie maker Acrobat Reader Multi Media Encyclopedia | Internet access in every classroom and administrative office Dedicated server for faculty, staff and administration only WAN, LAN or Wireless Connectivity | Computer Resource Teacher is responsible for maintaining and servicing equipment. She is able to draw support from the county office if needed. | Two-level, 59,576 sq. ft facility 15 Classrooms 1 Computer Lab 1 Media Center 1 Nova Net Lab |

| | | | |
|--|--|--|--|
| <ul style="list-style-type: none"> • Dictionary, thesaurus and encyclopedia • Encarta • SkillsBank • MS Works • Eyewitness History of the World • Occupational Outlook Handbook • Windows Media Player • GroupWise • Star Reader Program • OPAC • Classroom Manager | | | |
|--|--|--|--|

Appendix E

Relationship among Implementation Activities, Timeline, Budget Needs and Assessment/Evaluation

| Implementation Activity | Timeline | Budget needs | Assessment Activities |
|---|---|--|---|
| <p>Technology</p> <ul style="list-style-type: none"> • Technology resource teacher, with the help of NHCS Technology Department, will install new software on the server at Lakeside • Technology resource teacher, with the help of NHCS Technology Department, will install accessory equipment on all computers • The NHCS Technology Department will arrange for the installation of 5 data drops per classroom | <p>Summer 2006</p> <p>Summer 2006</p> <p>Summer 2006</p> | <p>\$ 20,872</p> <p>\$ 260</p> <p>\$ 6,600</p> | <p>Teachers will be able to use the software program to monitor student's progress</p> <p>Teachers will be able to directly observe students using technology in the classroom, using headphones to eliminate outside noise.</p> <p>Teachers will be able to engage some students in classroom activities while others work on self-paced computer programs</p> |
| <p>Students</p> <ul style="list-style-type: none"> • All students will take a test to determine their current reading level • Participate in reading improvement activities during class time three hours weekly. • Students of higher level will tutor lower level students 2 hours weekly, during class time. | <p>Phase 1: Completed by the end of Sept 2006</p> <p>Phase 1: Nov 2006</p> <p>Phase 1: Nov 2006</p> | <p>No cost</p> <p>No cost</p> <p>No cost</p> | <p>Reading resource teacher will coordinate administration and grading of test</p> <p>Students will work independently with reading software, using built-in assessment activities and tests to monitor progress.</p> <p>Teachers will monitor and supervise tutoring efforts</p> |

| | | | |
|---|---|---|--|
| <ul style="list-style-type: none"> Peer assessments of reading skills and tests | Phase 1: Nov 2006 | No cost | Teachers will monitor and supervise tutoring efforts |
| <ul style="list-style-type: none"> Students identified by the reading specialist will meet with her weekly | Phase 1: Nov 2006 | No cost | Reading resource teacher will be able to provide one-on-one activities to improve reading skills for those that require more attention |
| Teachers <ul style="list-style-type: none"> Participate in training workshops for professional development regarding integrating technology into the classroom and individualizing instruction Teachers will participate in a workshop training for <i>ReadOn</i> software Develop lesson plans with technology use in curriculum Design reading improvement activities with technology integration in the classroom Peer sharing of ideas in weekly meetings Peer assessment of reading improvement activities with technology use within classroom | Phase 1: Attend at least one workshop prior to August 2006 Phase 1: LA teachers Aug 2006 Phase 1: Nov 2006 Phase 1: Nov 2006 Phase 1: Nov 2006 Phase 1: Nov 2006 | No cost No cost No cost No cost No cost | Professional Development Office of New Hanover County Schools will track teacher participation in workshops Lakeside Change Management Team will observe and evaluate training School administration and reading specialist will observe classrooms and provide guidance as needed. School administration and reading specialist will observe classroom activities and provide guidance. Teachers will be able to exchange lesson plans and ideas in staff meeting and through direct interaction Teachers will guide and monitor each others progress in integrating technology with reading activities. |

Appendix F

Budget Details

| Direct Cost | Description | 2006-2007 | 2007-2008 | 2008-2009 | Total |
|---|--|-----------|-----------|-----------|--------|
| Change team workshop – <i>Read On!</i> software | Paid staff development - Change Management team members x 6 (\$125 each) | \$ 750 | | | \$ 750 |
| | Training materials supplied by software representative | No cost | | | \$ 0 |
| | Lunch | \$ 80 | | | \$ 80 |
| Language Arts teachers workshop - | Paid staff development – Language | \$ 150 | | | \$ 150 |

| | | | | | |
|--|---|----------------|--|--------------|----------------|
| <i>Read On!</i> software | Arts teachers x 3 (\$50 each) | | | | |
| | Copy/supplies | \$ 25 | | | \$ 25 |
| Social studies and math teachers workshop - <i>Read On!</i> software | Paid staff development – Social studies/math teachers x 6 (\$50 each) | | | \$ 300 | \$ 300 |
| | Training materials | | | \$ 50 | \$ 50 |
| Science teachers workshop - <i>Read On!</i> software | Paid staff development – Science teachers x 3 (\$50 each) | | | | \$ 150 |
| | Training materials | | | | \$ 25 |
| | | \$ 1005 | | \$350 | \$ 175 |
| | | | | | \$ 1530 |

Timeline for Activities Table

| Activities 2006 | May | June | July | Aug | Sept | Oct |
|--|-----|------|------|-----|------|-----|
| Install data drops | | x | x | | | |
| Purchase <i>ReadOn</i> software | | | x | | | |
| Purchase headphones | | | x | | | |
| Evaluate student reading levels | | | | x | x | |
| Differentiation workshop | | | x | x | | |
| <i>ReadOn</i> software workshop – Change team | | | | x | | |
| <i>ReadOn</i> software workshop – Phase 1 (Language Arts teachers) | | | | x | x | |

Evaluation

| Name of Evaluator | Description of the Specific Evaluation Strategies to be Used | Projected Date to be Completed | Expected Cost of Services |
|--|---|--|---------------------------|
| UNCW – Department of Education, Reading Specialist | <ul style="list-style-type: none"> Meet with change management team and create check-list for reviewing implementation of strategies Interview and observe classroom teachers to determine level of classroom technology integration Collect data from observation, lesson plans, teacher reports and student test scores Formative results presented to Team | <ul style="list-style-type: none"> Aug 2006 Oct 2006 Dec 2006 Jan 2006 | \$ 3,000 |