# Special Education Students & eTextbooks: Lessons Learned from the Title IID Grant Schools

Presented by:
Elbert County High School
Swainsboro High School
Thomasville High School

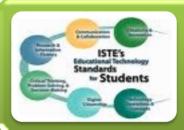
Carol Moore-McLeod, GaDOE

### Primary Goals of Georgia's Title II, Part D eTextbook Grant

Awarded to Five (5) Title IID Eligible High Schools to:



Develop a <u>self-funding model</u> that utilizes current, engaging, and cost efficient alternatives to hard copy textbooks and provides a model that may be leveraged across all school districts in Georgia.



Increase student technology literacy by providing students educational opportunities to use digital tools.



Provide teacher professional development in the use of engaging digital content to differentiate instruction and improve student engagement.

#### **eTextbooks**

(\$1,335,184 per school)

-Netbooks with electronic textbook and other engaging digital content for all students and teachers

-Other interactive classroom technologies

Upgrades to infrastructure and internet

Minimum of 25% for Professional Development



Dr. John D. Barge, State School Superintendent "Making Education Work for All Georgians" www.gadoe.org

#### eTextbook Grant Participants

Carver High School (Muscogee County)

• Superintendent: Susan Andrews

• Principal: Chris Lindsey

Elbert County High School

• Superintendent: Abe Plummer Jr.

• Principal: Rick Higginbotham

Swainsboro High School (Emanuel County)

• Superintendent: Erma Jenkins

• Principal: Sonji Leach

Thomasville High School (Thomasville City)

• Superintendent: Sabrina Boykins-Everett

Principal: Todd Mobley

Washington County
High School

• Superintendent: Donna Hinton

Principal: Allen Grey

топалта

#### **Sharing Experiences**

- Elbert County High School (Elbert County Schools)
- Thomasville High School (Thomasville City Schools)
- Swainsboro High School (Emanuel County Schools)

#### **Contact Information**

#### Carol Moore-McLeod

Education Technology Specialist 1952 Twin Towers East 205 Jesse Hill Jr. Drive SE Atlanta, GA 30334 cmoore@doe.k12.ga.us



### ELBERT COUNTY COMPREHENSIVE HIGH SCHOOL













SCHOOL INFORMATION

PUBLIC, RURAL SCHOOL



888 STUDENTS

70 TEACHERS

39% BLACK, 6% HISPANIC, 53%WHITE, 2% OTHER

10% SPECIAL ED

67% FREE OR REDUCED LUNCH





AND SANDEE DRAKE
CP BIOLOGY



STUDENTS GET CLICKERS AS THEY ENTER THE CLASSROOM

#### TYPICAL (IF THERE IS SUCH) DAY IN CP BIOLOGY



QUICK FORMATIVE
ASSESSMENT WITH
CLICKERS WHILE
SOFTWARE IS OPENING.



TTUDENTS USING TECHNOLOGY TO COMPLETE ACTIVITIES



# INTERACTIVE WHITEBOARD AND SOFTWARE



I. DNA, RNA, and Proteins
A. DNA = deoxyribonucleic acid
1. double (stranded) helix

2. In the nucleus

3. Made up of nucleotides

- a. Deoxyribose sugar
- b. Phosphate group
- c. Nitrogenous base
  - 1) A = adenine
    2) T = thumine

2) T = thymine

3) C = cytosine 4) G = guanine

Joined by 3 H bonds

Joined by 2 hydrogen bond

4. Gene - segment of DNA that codes for a particular traits Ex. height

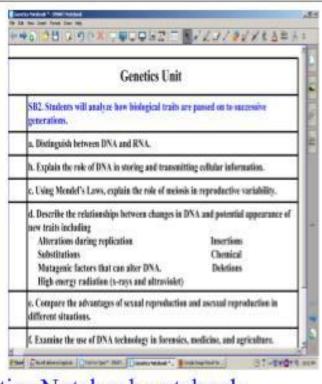
5. Alleles - variations of a gene Ex. Short, tall

B. RNA = ribonucieic acid

- Single stranded
- Mostly in cytoplasm (mRNA made in <u>Ducleus</u>
- 3. UraCil in place of thymine
- C. Central Dogma = Transcription Translation Protein Synthesis

D. Protein Synthesis

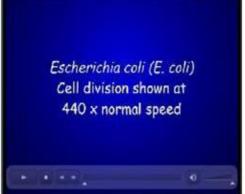
transcription - mRNA is made from gene of DNA



Genetics Notebook.notebook

Electronic Notebooks are gradually replacing traditional notebooks and textbooks. In one place, students can take notes, view images, manipulate activities, and hyperlink to files and websites.





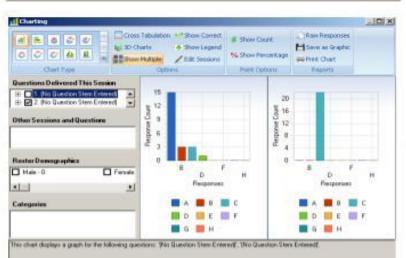




2197

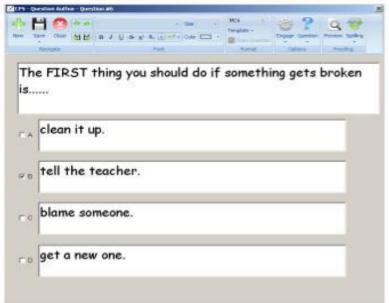
Carcel







Instructor Summary Study Guide Study Guide - Incorrect Answers Study Guide - Class Summary Question Report Response Report Item Analysis Item Analysis w/ Standards Question Grid Export Session Data Export Classroom Manager Export AEISIT Export Standards Analysis Standards Analysis w/ Student Cross Index Opinion Survey Star Chart Ontrack Export Response Data Export Data Slicing Raw Response Data Export Question Response Data Export Post Report



#### LEARNING MANAGEMENT SYSTEM



http://elearn.elbert.k12.ga.us/

Welcome to College Prep Biologyl We look forward to exploring the living world with you... from the microscopic to the gigantic! We'll learn about what is extinct and what we need to make sure it doesn't happen to us. Come along with us for a class we hope you never forget •

Below you will find the current unit we are studying in CP Biology. Links and resources listed at the bottom of the unit will help you along the way. If you lose worksheets or handouts, never fear! You can download a copy from below.

Also, the following forums give you an opportunity to discuss topics that are relevant to biology and to find information you may need to be successful in this class. Please visit a forum weekly and provide some discussion.



QUIZZES

UPLOAD FILES

FORUM

CHAT

JOURNAL



Questions in Biology

Surviving Biology 101

Vocabulary Practice Textbook Website

BrainPOP videos

ECCHS Biology Webste

RESOURCES

WEBSITES

AND MORE....

SECURE

ITEM ANALYSIS

CALENDAR

FILES

TEXT PAGES

WEB PAGES

LABELS

#### ASSISTIVE TECHNOLOGY



#### TEXT-TO-SPEECH

Html, Rtf and other files can be read aloud using text-to-speech programs. Students can open websites directly in the program. Notes can also be taken alongside the text for further study.

#### WRITING ASSISTANCE

Software that helps students brainstorm and put together ideas. Includes vocabulary related to a variety of subjects. Students can also copy and paste text into the program to be manipulated.





JOSE

CP BIOLOGY
STUDENT

#### EXPERIENCE



#### FUTURE PLANS

MODIFY SMART NOTEBOOKS FOR SPED STUDENTS

DESIGN WRITING ACTIVITIES
USING ASSISTIVE TECHNOLOGY

INCORPORATE ADDITIONAL QUIZZES AND TESTS INTO ELEARN

THARE OUR IDEAS, RESOURCES, TECHNIQUES, ETC...WITH OUR PEER FACULTY THROUGH PROFESSIONAL LEARNING COMMUNITIES



Closing the communication gap and Opening the door to increased learning

#### How do SHS teachers feel about netbooks?

"Before, some of the quiet students would not participate in class. Now that they have direct and accessible email through the school, the quiet, withdrawn students can ask their questions. The boisterous students also are able to voice their concerns through email instead of bursting out in class. The teacher just needs to be sure to answer the students in a timely manner."

#### What do I think of netbooks?

#### Miss TuaShannon Sherrod, 10<sup>th</sup> grade

- "I can email my teacher a question if I don't understand the lesson."
- "I can use my earbuds to listen to the story. This feature really helps out when my classmates are too noisy."
- "My writing has improved because my English teachers help me proofread my essays. Now, I know how to use Microsoft to format my papers."
- "Before netbooks I didn't know how to use fonts or doublespace a paper."

#### How do SHS teachers feel about netbooks?

"I feel that my true special needs students benefit from the use of technology. They are excited to learn new software."





#### How do I use my netbook?

#### Miss Racheal George, 11th grade

- "I use my netbook to research"
- "If I am going to miss school, I let my teachers know by emailing them"
- "If I feel I might be missing work, I ask my teachers through email"
- "When I work in groups and we don't get our work finished, we email each other so we can keep the discussion going and get our assignment turned in."

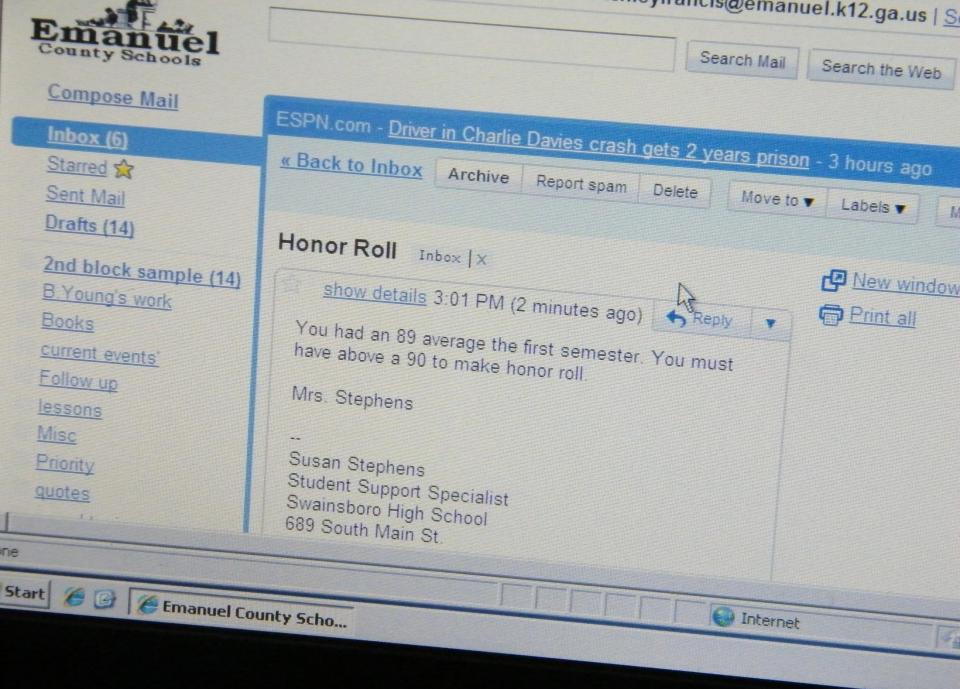


 "I think that it helps like if you don't have time, to get work turned in, you just email it.
 If you have work like projects, you have more internet access to get your work done."

-- Derionna, 10<sup>th</sup> grade

## How do SHS teachers feel about netbooks?

"Special needs students use ebooks almost as well as the regular students in my classes. Also their behavior improves if allowed to use them!"



#### What do SHS students think?

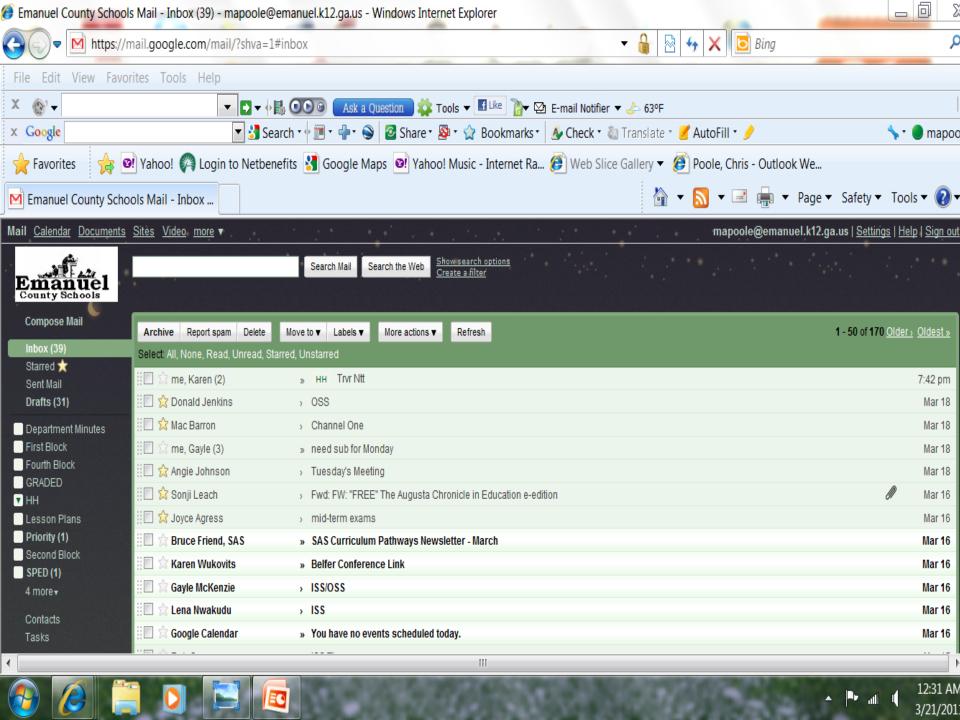
 "I wish the teachers would let us use them more. I think some teachers don't trust us, maybe they don't feel comfortable using the netbooks."

-- DaMarcus, 10<sup>th</sup> grade



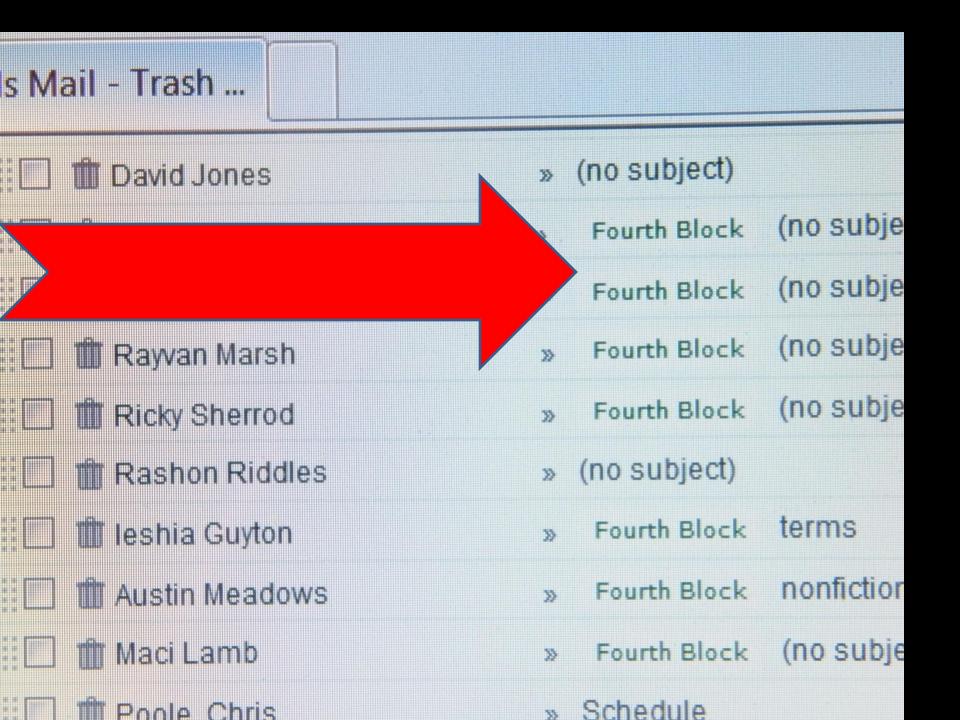
#### **Teacher Concerns**

- Negative influence of the internet
- Limit the type of internet access to only educational resources
- Not enough training on how to use email or how to electronically grade
- Broken screens

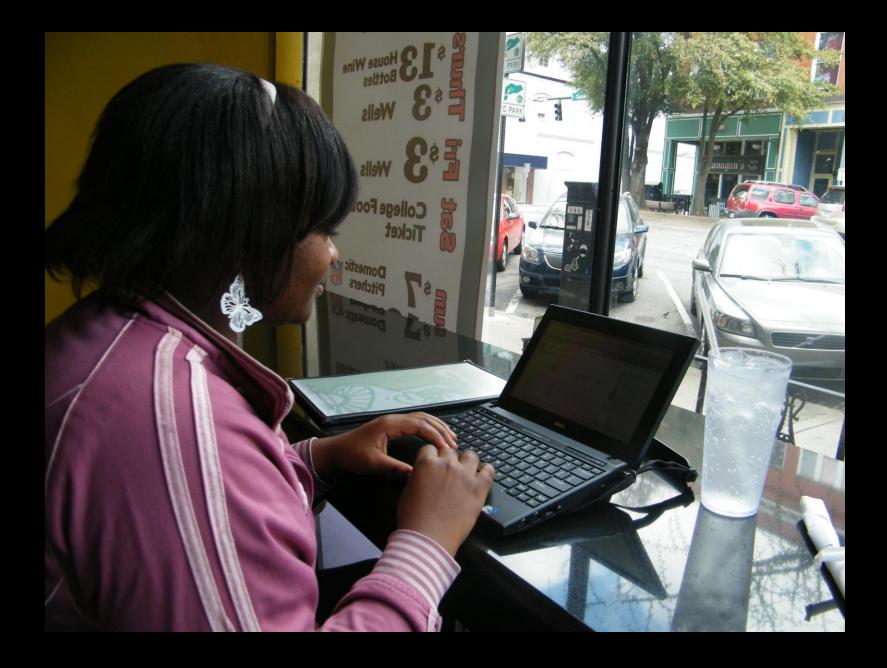


Department Minutes First Block Fourth Block GRADED HH Lesson Plans Priority (1) Second Block

11 23/







# Swainsboro, GA Swainsboro, GA

Thank you for inviting us!



#### **eTextbooks**

#### Thomasville High School

# DONITA HINCKLEY THOMASVILLE CITY SCHOOLS



#### **Grant Information**

- Title IID ARRA Grant awarded to five high schools in the state of Georgia
- Grant application submitted in May,
   2010
- Approval notification in June, 2010
- Amount = \$1,335,184 over three years



#### **Goals of Grant**

- Use engaging digital content
  - Differentiate instruction
  - Improve student engagement
- Increase student technology literacy

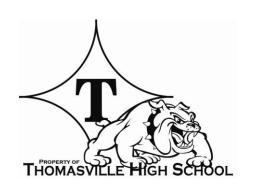


# About Thomasville City Schools

Thomasville

City Schools

- Located in Thomasville, GA (about 35 miles north of Tallahassee, FL)
- Approximately 2,900 students
- Almost 70% of students eligible for free/reduced meals
- Five schools (3 elementary, 1 middle, 1 high)



# Thomasville High School and Schoolars Academy

- Total enrollment = 741
- Scholars Academy program enrollment= 210
- "School within a school"
- Two shared campuses







# Thomasville High School and School and Scholars Academy

- Special Education enrollment = 60
  - Autism = 4
  - EBD = 13
  - Hearing Impaired = 1
  - Mild Intellectual Disability = 9
  - Moderate Intellectual Disability = 8

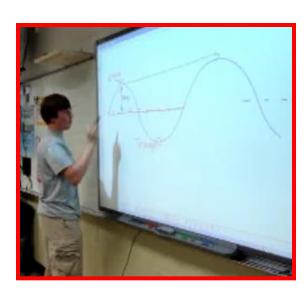


# Thomasville High School and Schoolars Academy

- Other Health Impairment = 6
- Severe Intellectual Disability = 1
- Specific Learning Disability = 18
- Pathways (EBD) = 6



- Equipment in every classroom (including special education)
  - SmartBoards
  - Mounted projectors
  - Document cameras
- Infrastructure
- Wireless
- Upgraded network backbone





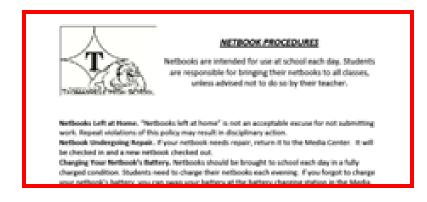
- Digital content
  - Textbooks
  - Gizmos
  - Online resources
- Orientation sessions
  - Variety of times, dates
  - Videotaped







- Distribution of netbooks
- Policies & Procedures
  - Internet Use Agreement
  - Battery charging, netbook care, etc.





- Same requirements for special education students and parents
- One exception: Self-contained class for students with autism, mild, moderate & severe intellectual disabilities, and EDB
  - Teacher checked out netbooks
  - Netbooks remain in class; students do not take them home



#### **Teachers**

- Mandatory orientation and distribution
- Classroom equipment
- Digital textbooks and online content
- Special education and Pathways teachers included

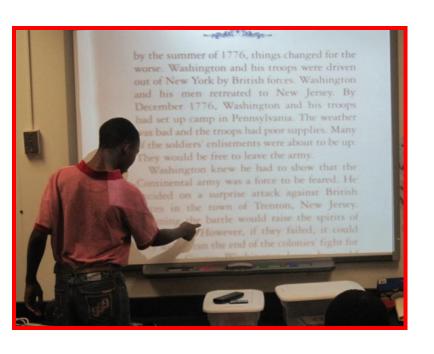




#### Professional Learning

- SmartBoards & other classroom equipment
- Software
- Coaching
- Summer training





Crossing the Delaware is a Revolutionary War book that correlates to the US History curriculum that a teacher projected onto the SmartBoard using the Elmo document camera. The students read the book from the SmartBoard. The Revolutionary War came alive on the SmartBoard!







A student using the computer program "Kidspiration 2" to make a character web about Huckleberry Finn.







Students watching Huckleberry Finn movie (American Literature) after reading the adapted book.



This is a student using the interactive program "Cells Alive" found on the Internet to learn about the difference between animal and plant cells and to learn about cell organelles.









Teachers and students have used GeoGebra, which is free interactive software available at <a href="http://www.geogebra.org/cms/">http://www.geogebra.org/cms/</a>



Students say that netbooks come in handy if you do not have a computer at home. One student shared that she used the netbook to study for the EOCT in subject areas by going to <a href="http://www.usatestprep.com/Home">http://www.usatestprep.com/Home</a> with her netbook. The school system provides the subscription for this service. She also said she had used search to find out how to simplify square roots.



Mr. Connell: "Another student said he had used his home computer to Google "how to balance equations" and viewed the YouTube video to help understand the process. While he said he used his home computer, our netbooks could be used to view other videos with an academic focus."



Mr. Connell: "Several students and I reflected on the advantages of having the netbooks to use in school and home. Students seem to take to technology and enjoy using their netbooks more than a conventional textbook. And, although the novelty factor may wear off, students have the ability to grow into using the computer that they would not be able to do with textbooks. The computers extend our capability for learning."





Ms. Brown: "Teaching has changed totally with the use of technology. It's like Disney – the kids really pay attention."

#### Technology in Deaf Education: Letting the Student who is Deaf/HH "See" the Meaning of Writing

Patricia Souders, M.Ed.
Teacher of Deaf/HH
Thomasville High School

#### Ten Years Ago....Assistive Technology for English/Language Arts

- Electronic Dictionary
- American Sign Language Dictionary "Cut and Paste"
- Classroom Volumes

#### Last few years....

- Computer Labs limited numbers of computers, group shared spaces and time
- SmartBoards a little here, a little there, regular education classrooms first

#### **Today....Assistive Technology**

SmartBoards in EVERY classroom:

Manipulating Meanings and Maneuvering Minds from brainstorm activities to rough draft to final product

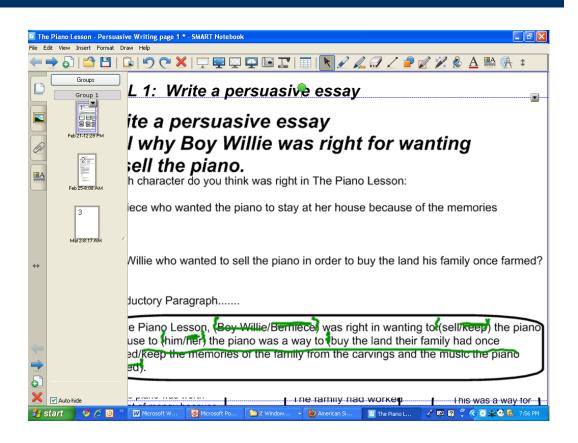


#### NOW... Thank you technology grant! Equal Access for ALL!!!!

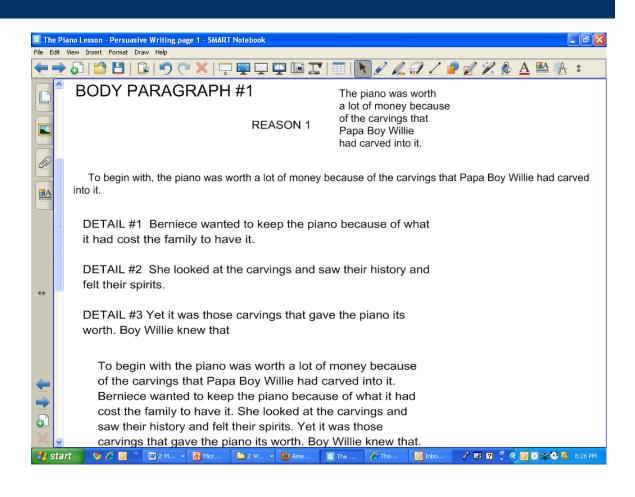




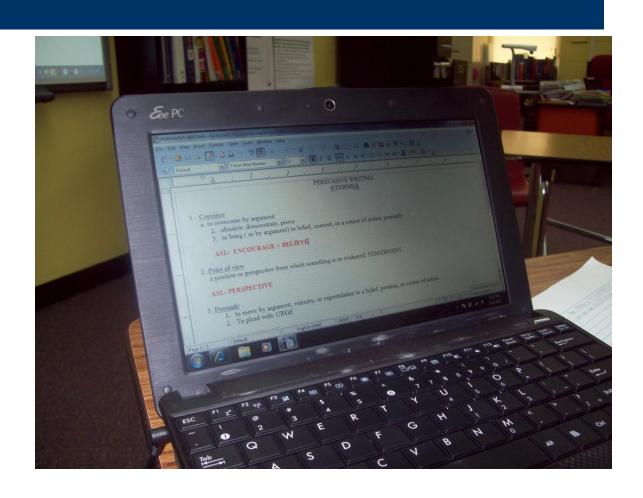
#### Piece by Piece Success



#### Just click and drag...



#### **Creating a Meaningful Meaning**



#### Creating a Document With Hyperlinks

Insert hyperlinks using webpage addresses
 PERSUASIVE WRITING
 TERMS <a href="http://www.aslpro.com">http://www.aslpro.com</a>

http://www.merriamwebster.com

OR

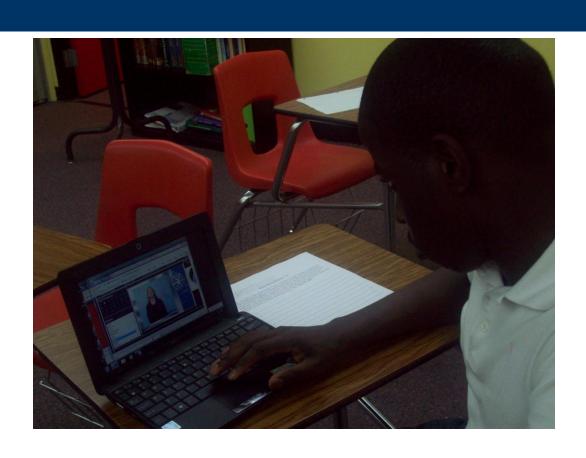
 Insert a hyperlink using text to replace the hyperlink

PERSUASIVE WRITING
TERMS
English and ASL

#### Hyperlinks embedded into Word Document



#### Stimulate Learning by ASL Video Dictionary links



#### Teaching a Ready Mind without turning away from the Student

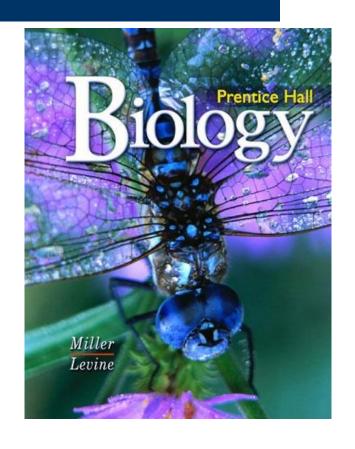


#### Why is this important?

- English Language Learner
- Visual Learner
- Linguistics
  - Morphemes from the sign breaking it down
  - Comparing the sign to the English dictionary meaning
  - Overlearning vocabulary and making connections

#### Carrying it into Content Areas....

- Textbooks are accessible and built into software
- Internet access for students that need support through tutoring webpages



#### Taking it home....

