



Laying the Foundation: A professional development program that provides a comprehensive investigation of math, science and English concepts and skills with scaffolded, differentiated classroom-ready materials



Laying the Foundation (LTF) is a resource program that provides vertically aligned classroom ready lessons and Web-based resources for grades 6-12 in mathematics, science, and English. LTF materials were created by and for math, science and English classroom teachers to develop and enhance the rigor in their classrooms. LTF also provides numerous classroom-ready diagnostic activities and end-of-course assessments that can easily serve as both formative and summative assessments. These activities can provide the impetus for highly effective data team meetings. All modules are aligned with Connecticut State standards and support implementation of the common core.

All the components of this resource support district initiatives related to CALI and SRBI.

Training is designed around core modules in mathematics, science, and English, with an option to complete 12 modules over 3 years. At the end of each day of training, teachers have scaffolded, differentiated classroom activities that are engaging to students and enhance student achievement. All modules include a companion lesson written in Spanish for use with English Language Learners.

One of the unique features of this training is that the student activities, diagnostics and end-of-course assessments can easily be drop-in units within the parameters of the district's curriculum document. The emphasis on embedded scaffolding and the differentiation of activities, along with the instructional strategies that are modeled during the training, provides teachers with the skills needed to meet the diverse needs of their students. Additionally, the teachers examine core content-specific topics in detail and examine how skills are developed in grades 6-12.

MATHEMATICS

LTF training for Pre-AP math utilizes resources and strategies to employ the five elements of math learning:

1. Graphical: understand and interpret data, communicate data via visual representations, conceptual geometry comprehension
2. Physical: utilize manipulatives and models, data collection for experiments, “real world” applications
3. Verbal: interpret, explain, justify, and summarize data
4. Analytical: understand and utilize functions, variables, definitions, theorems, and symbols
5. Numerical: perform calculations, approximations, and data analysis

Through the modeling of lessons, teachers learn to integrate rigorous critical strands from AP Calculus and Statistics in every grade from sixth-grade through high school, thus allowing students to build on concepts introduced early in middle school and reinforced every year in order to fully master concepts at the AP and college level. Strategies for integrating graphing calculators and manipulatives into classroom lessons represent a particularly significant component of LTF math training. Teachers also learn through demonstration the value of hands-on student involvement and ways in which it enriches existing curricula and increases levels of student engagement.

Math Core Training Modules 1-4—Year One

Participants explore the AP* Calculus or AP Statistics Connection topics through manipulative-rich student lessons. Graphing calculator skills are introduced, extended, and applied as a part of each training session. In addition,

the participants explore the LTF on-line diagnostics with both multiple choice and free response problems and discuss scoring practices and rubrics of Pre-AP* questions related to the AP connection topic. Teachers finish every training day with lessons that are classroom-ready and with sufficient preparation to start using the lessons and assessment tools immediately.

Module 1: Analysis of Piecewise Functions

A combined group of middle-school and high-school teachers may attend a common session using an analysis of functions to investigate student lessons that demonstrate how upper level concepts are developed from sixth grade through pre-calculus. Participants are given password access to on-line versions of LTF lessons, diagnostics tests, and end-of-course examinations.

Module 2: Areas and Volumes

Middle-school and high-school teachers attend separate sessions where they will explore manipulative-rich student lessons that investigate the area of two-dimensional figures, as well as surface area and volume of three-dimensional solids that result from revolving the planar figures about an axis. As the lessons progress through this vertical strand, teachers learn how students graph the original planar figure by first plotting points, then graphing equations, and finally graphing systems of inequalities. This session demonstrate how concepts involving area and volume are developed from sixth grade through pre-calculus.

Module 3: Rate of Change: Average and Instantaneous

Teachers explore lessons that differentiate between the average and the instantaneous rate of change of a function. Middle school teachers explore manipulative-rich lessons that introduce the concepts of constant rate of change and average rate of change. High school

teachers are introduced to the concept of a curve with a varying slope and to the calculus notation for a derivative to represent that slope. The session further emphasizes how the concepts involving rate of change are developed from sixth grade through pre-calculus.

Module 4: Graphical Displays; Distributions: Measures of Center, Variability, and Shape

Teachers explore the concept of graphical displays by working student lessons that construct, compare, analyze, and interpret box-and-whisker plots, line plots (dot plots), and stem-and-leaf plots. Each lesson employs real-world data to construct, by hand and with a graphing calculator, appropriate graphical displays and to analyze the graph using measures of central tendency, variability, and shape. The session emphasizes how the concepts involving graphical displays and distributions can be used from sixth grade through pre-calculus.

MATH Core Training Modules 5-8 —Year Two

Middle and high school teachers attend separate sessions for each of the modules.

Module 5: Accumulation

Participants explore the concept of accumulating area that leads to the concept of the definite integral in AP Calculus. Teachers explore techniques for approximating area of various closed regions through manipulative-rich middle school lessons. High school lessons extend these techniques to determining the area under a curve using geometric figures. In addition, non-area applications involving rates of change are investigated. The session emphasizes how the concepts involving accumulation are developed from sixth-grade through pre-calculus.

Module 6: Probability

Participants delve into student lessons that investigate probability. Techniques include using a sample space, conducting simulations, and collecting data. Teachers discover and apply Pascal's Triangle and the Binomial Theorem to probability. Additional topics include geometric probability and permutations and combinations. The session emphasizes how the concepts involving probability and statistics are developed from sixth grade through pre-calculus.

Module 7: Position/Velocity/ Acceleration

Participants explore the concepts and relationships of position, velocity, and acceleration. They use physical activities and technology such as a CBR and a graphing calculator to more fully understand the concepts. Lessons include sketching a graph from a story, interpreting graphs from a verbal description, and analyzing and comparing graphs of position, velocity, and acceleration. The session emphasizes how the concepts involving position, velocity, and acceleration are developed from sixth grade through pre-calculus.

Module 8: Limits

Participants explore the concept of limits from various perspectives. Student lessons use pattern recognition, perimeter and area of polygons, secant and tangent lines to circles and ellipses, and end-behavior of rational functions to lead to an informal notion of a limit. The session emphasizes how the concepts involving limits are developed from sixth-grade through pre-calculus.

MATH Core Training Modules 9-12 —Year Three

Middle and high school teachers attend separate sessions for each of the modules.

Module 9: Optimization: Area and Volume Applications

Participants explore manipulative-rich student lessons that investigate the concept of optimization. Lessons include maximizing and minimizing area and volume to determine an optimum solution. This session demonstrates how concepts involving optimization are developed from sixth grade through pre-calculus.

Module 10: Linear and Non-linear Bivariate Data

Participants explore the concept of linear and non-linear bivariate data. They investigate data coding, fit functions to data, use models to predict values, and determine residuals. In addition, slope and intercepts are explored in the context of questions. The session further emphasizes how the concepts involving bivariate data are developed from sixth grade through pre-calculus.

Module 11: Analysis of Functions: Transformation

Participants delve into student lessons that investigate transformations and parent functions. They explore translations, reflections, rotations, and dilations analytically, graphically and numerically. This session demonstrates how concepts involving transformations are developed from sixth grade through pre-calculus.

Module 12: Rate of Change: Related Rates

Participants explore manipulative-rich student lessons that investigate the concept of related rates. The session begins with a review of literal equations and how these equations can be emphasized from sixth grade through pre-calculus. Participants explore dynamic situations where a change in one quantity results in a change in another quantity through related rates applications involving triangles, curves, areas, and volumes.

SCIENCE

The training and resources place a heavy emphasis on hands-on learning through laboratory activities and the use of technology in the classroom. Teachers learn through modeling and demonstrations that integrate critical strands from chemistry, biology and physics. Users of the lessons have learned that by engaging students in a hands-on, interactive learning environment, their students were more likely to take advanced science courses later in high school and opened up opportunities to explore scientific careers.

The LTF activities also “put the math back into science.” The graphing, data interpretation/analysis, and mathematical problem solving encouraged by LTF science trainers provide important links from early grade science classes to math-based expectations in AP-level courses in grades 11 and 12. Teachers gain a more thorough understanding of the finding that, according to the Third International Mathematics and Science Study (National Science Foundation in conjunction with National Center for Education Statistics), students who take rigorous mathematics and science courses are more likely to go on to college than those who do not.

The training is consecutive over three years, 4 modules offered each year. There are core modules for *Middle Grades*. High School teachers select from *Chemistry, Physics, and Biology*. Each day entails some direct content instruction as well as active learning through laboratory explorations. Participants examine the processes of learning science and engage in meaningful discussions of rigor and pace of the curriculum. Participants are given passwords to access the protected materials on the LTF Web site, including diagnostic activities and End-of-Course test materials. Teachers leave every training day with lessons that are

LAYING THE FOUNDATION — Science

classroom-ready and with sufficient preparation to begin using the lessons in their own classrooms.

Middle School Modules Grades 5-8 Earth, Life and Physical Science Modules 1-12

Module 1: Introduction to Laying the Foundation through Experimental Design

This is the first module of all the science training series. Its purpose is to present the Laying the Foundation philosophy and what pre-AP means. Experimental design is the content focus of this module. Participants engage in selected activities from biology, chemistry and physics and discuss how these concepts are developed across all grade levels.

Module 2: Numbers in Science

This module explores activities from the Middle Grades Life and Earth and Middle Grades Chemistry and Physics that demonstrate the many ways that students are asked to deal with numbers in the science classroom. Concepts such as measurement, error, significant digits, and numerical relationship are discussed and demonstrated.

Module 3: Meaningful Graphs

This module explores activities from the Middle Grades Life and Earth and Middle Grades Chemistry and Physics that emphasize students' abilities to create and interpret meaning from graphical representations of data. A look at the graphing skills required by AP students and a discussion of proper graphing techniques are presented. Participants have the opportunity to perform some activities that incorporate graphing skills into the middle school classroom.

Module 4: Rate

This module explores activities from the Middle Grades Life and Earth and

Middle Grades Chemistry and Physics that emphasize the variety of instances where rate can be explored in the middle school classroom. Rate is a common theme among all AP science courses and its introduction and development in the middle school classroom can help lay a strong conceptual foundation.

Module 5: Patterns

This module explores activities from the Middle Grades Life and Earth and Middle Grades Chemistry and Physics that emphasize patterns in science. The topics addressed include taxonomy, genetics, periodic trends, and lunar phases. Participants perform activities to better visualize and apply these topics in the middle grades classroom.

Module 6: Properties of Matter and Density

This module explores activities from the Middle Grades Chemistry and Physics that apply to all middle grades' classes. As matter and density are explored, the topics will be related to life and earth science topics, as well as AP biology, chemistry and physics classes.

Module 7: Evolution and Energy

This module explores activities from the Middle Grades Life and Earth and Middle Grades Chemistry and Physics spending part of the day focused on predator/prey relationships and genetics and the second part of the day, focused on work, power, and energy. Participants engage in hands-on activities that explore real-life topics.

Module 8: Environmental Human Impact

This module explores activities from the Middle Grades Life and Earth that emphasize the impact we have on our environment. Current topics such as global warming and pollution are discussed and studied. Participants explore how simple changes can affect the impact they have on the world around them.

Module 9: Models and Reactions

This module explores activities from the Middle Grades Life and Earth Science as well as middle-grades chemistry and physics topics. The activities include the use of models and addresses different types of reactions in science. The topics addressed include photosynthesis, the solar system, thermodynamics, and waves. Participants perform activities to better visualize and apply these topics in the middle grades classroom.

Module 10: Misconception and Magnets

This module explores activities from Life and Earth Science and middle-grades-level chemistry and physics topics that are often misunderstood by students. *Misconceptions* are addressed in Life, Earth, chemistry and physics units. Magnets and magnetic fields are also addressed with a direct tie to planets.

Module 11: Adaptations and Changes

This module explores activities from the life and Earth science as well as chemistry and physics middle-grades-level topics. Adaptations, black holes, acceleration, and chemical reaction are all explored. Participants spend the day completing hands-on activities using data collection devices and probeware.

Module 12: Effects and Effectiveness

This module explores activities from the life and Earth science as well as chemistry and physics middle-grades-level topics. Current topics such as the greenhouse effect and global commons are discussed and studied. Participants also explore heating curves and the effectiveness of levers.

LAYING THE FOUNDATION – Science

Biology Modules Grades 9-12

Module 1: Introduction to Laying the Foundation through Experimental Design

This is the first module of all the science training series. Its purpose is to present the Laying the Foundation philosophy and what pre-AP means. Experimental design is the content focus of this module. Participants engage in selected activities from biology, chemistry and physics and discuss how these concepts are developed across all grade levels.

Module 2: Chemistry of Life and Cells I

Participants will explore foundation activities that involve the chemistry of life. Over the course of the training sequence, these topics will be revisited and explored in depth each year. This module investigates the four major classes of biomolecules along with enzyme structure and function. An introduction to cellular structure and surface area-to-volume relationships is also explored.

Module 3: DNA, Genetics, and Animals I

Participants explore introductory activities from units on DNA, Mendelian genetics and animal systems. Over the course of the training sequence, these topics will be revisited and explored in depth each year. This first group of activities explores Mendelian inheritance principles in maize, extracting DNA from plants, and using graphing calculators to simulate Mendelian inheritance patterns. An activity comparing endotherms and ectotherms emphasizes the importance of incorporating computational activities in the biology classroom.

Module 4: Plants, Ecology and Evolution I

Participants explore introductory activities from units on plants, ecology and evolution. Over the course of the training sequence, these topics will be revisited and further developed. This first group of activities compares monocots and dicots with respect to stem and stomate structure and function, simulates natural selection, and identifies the photosynthetic component of plants.

Module 5: Measurement and Statistics

Participants discuss and develop student skills related to measurements and statistics in the biology classroom. Lessons incorporate microscopes and graphing calculators. Data analysis and its inclusion in laboratory reports is also addressed.

Module 6: Chemistry of Life and Cells II

Participants investigate the laws of thermodynamics and kinetics as they relate to biology classrooms. In addition to traditional wet labs, Laying the Foundation lessons incorporate probeware and modeling techniques when exploring enzyme catalysis and membrane structure.

Module 7: Cellular Processes and Animal Adaptations

In this second look at DNA, genetics and animals, participants explore lessons related to endotherms and ectotherms and other animal adaptations. Participants perform an introductory gel electrophoresis and discuss the implications of DNA fingerprinting.

Module 8: Plants, Ecology, and Evolution II

The plant lessons in this module investigate plant transpiration and pigment chromatography. Participants also discuss and explore the response and interactions of organisms with their environment as well as population studies.

Module 9: Mitosis, Passive Transport, and Genetics

Participants discuss and develop student skills related to mitosis and karyotypes using manipulatives. Passive transport is explored in two labs using microscopes and graphing calculators.

Module 10: Bacteria, Viruses, and Paramecia

A discussion is conducted over *common misconceptions* in the biology classroom. Participants also investigate bacterial transformation, viral transmission, and the trp operon using modeling strategies. Participants use microscopes to observe a paramecium feeding process in a traditional wet lab.

Module 11: Plants, Ecology and Evolution III

In this look at plants, ecology and evolution, participants explore lessons related to adaptations and alternation of generations in plants. Participants explore evolution in the animal kingdom with an in-depth look at the different forms of body cavities and symmetries.

Module 12: Enzymes and Body Systems

Participants explore strategies for teaching about enzymes and conduct a lab designed to illustrate enzyme-substrate specificity using technology. The body system activities include the endocrine system, respiratory system and the excretory system.

Chemistry Modules Grades 9-12

Module 1: Introduction to Laying the Foundation through Experimental Design

This is the first module of all the science training series. Its purpose is to present the Laying the Foundation philosophy and what pre-AP means. Experimental design is the content focus of this module. Participants engage in selected activities from biology, chemistry and physics and discuss how these concepts are developed across all grade levels.

Module 2: Graphing Calculators and Data Collection Devices

Participants explore the use of TI graphing calculators and data collection devices in the chemistry classroom. A step-by-step guide to using the calculator and data collection device is examined and practice activities are performed.

Module 3: Atomic Structure

Participants explore lessons that develop the concepts of matter and atomic structure. The discussion portion of the day focuses on student friendly methods for teaching electron configurations, orbital notation and quantum numbers. Participants perform two simple activities that integrate algebra and graphing skills into this unit of study.

Module 4: Bonding and Nomenclature

This session focuses on bonding and nomenclature topics. The discussion portion of the day addresses teaching students to draw Lewis structures, determine molecular geometries, and write correct chemical formulas. Two activities investigate the importance of intermolecular forces and the geometry of molecules.

Module 5: Mathematics and the Periodic Table

Participants investigate mathematical problem-solving strategies in chemistry and investigate relationships between elements on the periodic table. Traditional wet and dry labs are explored with the intention of solidifying student understanding of periodic trends and their role in chemical behavior. An examination of AP-style questions and *common student misconceptions* further develop the strategies that can be implemented to facilitate student success.

Module 6: Intermolecular Forces and Condensed States of Matter

This session focuses on intermolecular forces and the solid and liquid states. Techniques include computer simulations, probeware and traditional lab activities. Participants review *common student misconceptions* and strategies to overcome those obstacles. Assessments that enhance rigor across the curriculum are explored to assist participants in better preparing their students for the expectations of AP science.

Module 7: Thermodynamics

Participants will focus on thermodynamics and apply them to problem solving and laboratory experiments. Investigations using probeware and traditional laboratory equipment are explored with emphasis on developing the conceptual framework necessary for successful problem solving.

Module 8: Assessment and Kinetics

Participants spend time examining specific assessment strategies that can be implemented in the pre-AP classroom to prepare students for AP exams. A review of student samples from the 2008 LTF Chemistry End of Course exam will help participants identify *student misconceptions* and emphasize the finer points of assessment development. In addition to developing participants' assessment

skills, instruction in chemical kinetics and a traditional clock reaction experiment is included.

Module 9: Reactions and Equations

The focus of this session is type of reactions and the equations that accompany them. Traditional wet and dry labs are explored with the intention of solidifying student understanding of chemical reactions. An examination of AP-style net ionic questions and *common student misconceptions* further develop the strategies that can be implemented to facilitate student success.

Module 10: Solutions

Participants use a variety of techniques to explore the properties and nature of solutions together with *student misconceptions* related to these topics. Multiple wet labs are performed and colorimeters and data collection devices are used to analyze solutions.

Module 11: Equilibrium

The focus of this session is concepts in equilibrium and applying them to problem solving and laboratory experiments. Investigations using probeware and traditional laboratory equipment are explored with emphasis on developing the conceptual framework necessary for successful problem solving.

Module 12: Gases and Wrap Up

Participants explore lessons and activities relating to gas laws. In addition, time is spent analyzing and evaluating the components that define a rigorous chemistry lesson and participants will have the opportunity to apply those components to an activity that they can take back to their classroom.

LAYING THE FOUNDATION — Science

Physics Modules Grades 9-12

Module 1: Introduction to Laying the Foundation through Experimental Design

This is the first module of all the science training series. Its purpose is to present the Laying the Foundation philosophy and what pre-AP means. Experimental design is the content focus of this module. Participants engage in selected activities from biology, chemistry and physics and discuss how these concepts are developed across all grade levels.

Module 2: What is Pre-AP Physics and Kinematics I?

Participants explore physics lessons that focus on constant and changing motion. Probes and data collection devices are used to collect and analyze data. Participants consider a curriculum system that supports establishing a rigorous physics course.

Module 3: Developing Skills and Mechanical Waves

This session focuses on longitudinal and transverse wave motion. Participants investigate waves in a string, a spring and ripple tank as well as determine the speed of sound in air. This session also emphasizes graphing calculators, graphing skills, problem-solving skills and ways to administer and evaluate labs.

Module 4: Using the Tools—Electricity and Magnetism I

Participants explore lessons that introduce electrostatics and electric circuits. Participants map an electric field and examine equipotential and electric field lines, as well as build and investigate various types of circuits involving light bulbs and resistors in both series and parallel circuits. Methods for resolving circuits and for the formulation of Ohm's Law are discussed and practiced. Emphasis is placed on data collection and display devices.

Module 5: Kinematics—Two-Dimensional motion-Impulse and Momentum

Participants investigate kinematics, two-dimensional motion, momentum and impulse. Experiments exploring acceleration in one- and two-dimensions are performed with emphasis on graphing and vector activities that enhance understanding and development of concepts. Exercises which strengthen problem solving and analysis of motion are examined and practiced. Problem-solving activities and assessments are included.

Module 6: Dynamics—Work, Power and Energy

Participants explore dynamics, Newton's laws, free-body diagrams, work, power and energy. Teachers perform experiments using carts and ramps and use technology to investigate Newton's 2nd Law and the effects of friction. A roller-coaster lab is used to develop concepts of work, power and energy. The day includes practice with free-body diagrams and their importance in problem solving.

Module 7: Waves and Sound—Light and Optics

Participants examine the concepts of waves, sound, light and optics. Labs that determine the speed of sound in the laboratory and investigate wave properties of reflection, refraction and diffraction of waves and light are performed. These involve optics experiments using lenses, mirrors and water. Practice with ray diagrams and computer simulation for lenses and mirrors are included in the day's activities. Example homework activities and assessments are included.

Module 8: Electricity, Magnetism and Modern Topics

Participants investigate electricity, magnetism and modern topics. Labs include building a capacitor and measuring its capacitance, constructing a circuit involving resistors and capacitors, and the effects of current on magnetic fields. Exercises on right-hand rules and a discus-

sion of magnetic fields and their effect on moving charges are included. Again homework activities and assessments are included.

Module 9: Relationships

Participants discuss methods for data analysis and practice determining relationships from data. Labs which not only develop skills and concepts germane to pre-AP physics, but also focus on analysis of data strategies that facilitate student success are included. Further study of kinematics, two-dimensional motion, dynamics and the concept of physical and mathematical constants are included in the laboratory activities.

Module 10: Gathering and Manipulating Data

Participants discuss *misconceptions and discrepant events* which impede student's ability to understand physics concepts. They investigate aspects of work, power and energy, impulse and momentum through laboratory exercises and discussions. Included is further emphasis on data analysis and the use of curve fitting, data smoothing and additional techniques.

Module 11: Data Analysis

This module continues the theme of gathering and analyzing data using technology and traditional methods. Ways to ensure that all students are given instruction in terms of their needs and individual requirements are discussed along with ways to build physics and other science programs to include a larger and more diverse group of students. Lab activities include an emphasis on *thermodynamics and fluids*.

Module 12: Extending Physics to Modern Topics

Participants explore lessons and activities relating to electricity and magnetism such as Faraday and Coulomb's Laws. Also, concepts in modern and particle physics are discussed and investigated in laboratory experiences. In addition, time is spent analyzing and evaluating the

LAYING THE FOUNDATION – English

components of a rigorous pre-AP physics lesson or lab activity and participants will have the opportunity to apply those components to an activity that they can take back to their classroom.

ENGLISH

Participants explore the skills, concepts, and teaching strategies included in the grade specific LTF Resource and Planning guides for English. The guides were developed to help teachers build rigor into the Language Arts curriculum starting in the middle school to prepare students for success in Advanced Placement Language and Literature courses.

Each guide includes lessons that are classroom-ready as well as lessons that serve as models from which teachers can develop their own lessons. Participants are given passwords to access the protected materials on the LTF Web site, including diagnostic activities and End-of-Course test materials. Teachers leave every training day with lessons that are classroom-ready and with sufficient preparation to begin using the lessons in their own classrooms. All modules include a lesson written in English and in Spanish for use with English language learners.

Year one modules: **Introduction to Laying the Foundation, Annotation and Analysis of Text, Integrating Grammar, Exploring Syntax, and From Journal to Essay.** The strategies and activities focus on analyzing and annotating texts, understanding levels of thinking, and determining the distinction between grammar and syntax. Teachers work through the entire process of creating an essay to teaching students how to develop and organize an essay to scoring with rubrics.

Year two provides an in-depth look at some of the skills, concepts and teaching strategies introduced in the first year of training and integrates close reading, grammar and composition activities in a study of style analysis.

Year two modules: **Connecting Devices to Meaning, Linking Characterization to Meaning, Determining Tone and Determining the Underlying Meaning.** Participants review methods of teaching students to find examples of literary devices in a text, link those devices to meaning and compose an essay that includes textual evidence and analytical commentary (including a lesson on Analyzing a visual Text).

Participants also focus on indirect and indirect characterization, analysis of poetry with a particular emphasis on

determining tone through recognizing devices that contribute to tone, and strategies that enable students to recognize and state the theme of a literary work and support their theme statement with relevant textual evidence. Using challenging and grade level appropriate passages from prose and poetry, participants review strategies for teaching students how concrete elements such as diction, imagery, figurative language and syntax help to reveal an abstract concept like theme in a work of literature.

Year three explores a variety of argumentative texts, including essays, speeches, advertisements, and visual texts, and explores strategies for teaching rhetorical analysis through the integration of close reading, grammar, and composition activities. Year three modules: **Understanding the Appeals, Analyzing Organization and Syntax, Writing Analysis and Persuasion, and Evaluating and Revising.** These training modules emphasize recognition and use of the rhetorical appeals, persuasive techniques, and organizational structures. Training includes lessons for teaching students to develop their own persuasive writing and revising skills. Participants examine diagnostic activities and End-of-Course test materials from the LTF Web site, review the tenets of holistic scoring, and evaluate a set of student responses to a rhetorical analysis free response question.

For courses, dates, times and registration information
go to www.registereastconn.org

Questions? Contact Helen Weingart,
860-455-1571, hweingart@eastconn.org