

New York Military Academy

Cornwall-on-Hudson, New York



2010-11 Curriculum Summary

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KEY NYMA CURRICULUM EMPHASES—2010-2011 AND BEYOND

Building Forward to the Fully Intentional Academic Journey—Tracking Toward Success

Year after year, NYMA cadets have been unique as young men and women in that they have come to Cornwall with real ideas about the kinds of lives they want to lead and real vision for the kinds of leaders they hope to become. Of course, like most kids, they don't always *begin* their high school years with a clear idea of how they intend to get there, nor do they always have a sense for what they need to know *specifically* in order to succeed. The NYMA Cadet Academic Tracks of Intention Initiative is designed to help cadets plan for success and acquire the skills and knowledge they need to achieve it.

Beginning this year and with full implementation planned for 2012, we will enhance our capabilities to deliver on the NYMA mission by offering cadets "tracks of intention" in their academic program leading to specialized diploma recognition that will be awarded by the school and noted on cadet transcripts. Potential academic tracks (all in disciplines/vocations for which a military-model education can demonstrably be highly effective) will include the Classical Studies Track, the Service Academy Preparatory Track, the Research & Green Technology Innovation Track, the *Teach for America* Education Track, the International Business and Diplomacy Track, the Health Professionals Leadership Track, and the Business/Entrepreneurial Leadership Track. Academic credit, activity participation, service learning and thesis based requirements within each track will have sufficient commonality so that students will be able to choose (or change) their track at various points in their academic career.

Developing the Art of Expression at New York Military Academy

Research still demonstrates that, more than anything else, to write and speak effectively is critical to success in college and leadership in any field. Thus, cadet writing and grammar fluency will be a *core focus* across the curriculum at NYMA in 2010-11. This initiative is grounded in the belief that focused, interdisciplinary collaboration on written and oral expression will give our students a leg up, arming them with the capability to establish connections between and among subject matter, and to effectively communicate their conclusions. Most importantly this kind of focus helps to make sure that, once they graduate, a NYMA cadet's ideas will be *heard* above the roar of an increasingly competitive world.

There are many opportunities designed into the 2010-11 NYMA curriculum for cadets to express themselves through their writing and to drill on critical basics like vocabulary, spelling and grammar. English and the Social Sciences students will write *every day* and will drill frequently in every grade on grammar and composition rules and style. But students will also be challenged in other disciplines to articulate their ideas and conclusions capably and articulately. Math, Science, Language and JROTC classes will all demand well thought out expression by cadets, and will offer frequent opportunities for writing in genres appropriate to the content of the class. Whether it is a lab report or a math inquiry, an essay in Spanish, a presentation on leadership in JROTC, or cadet announcements in the mess hall – there is no area of endeavor at NYMA where "grammar and spelling don't count!"

Our 121 year-old student newspaper, *The Ramble*, will feature student essays and articles each week. A new on-line literary and arts magazine that will be championed by the faculty and edited by our upperclassmen will feature creative expressions from the cadets both in and out of class including essays, poetry, and short stories as well as visual art, musical compositions and other works.

The NYMA Thesis Project

New in 2010-2011, the NYMA Thesis Project is designed to represent the culmination of the student's intellectual development experience at New York Military Academy. Once this program ends its first year in 2011-12, graduates of NYMA will have worked over a 14 month period to complete and successfully defend a major college-level project before a committee of NYMA faculty. (In this first year of the program, only Juniors will participate in the Thesis program.)

Beginning in the fall of the Junior year and concluding in the second quarter of the Senior year, the Thesis program enables each cadet – carefully mentored by faculty, their academic advisor, and an outside advisor – to use the skills of scholarly research, original composition, and both multimedia and written presentation to explore and report on a topic of intense personal interest. The essence of the Thesis may take the form of a written research effort (such as an in-depth written analysis or critique on a subject of interest to the cadet) or it could be a 3-dimensional work product (for example a robot, a hand-made wooden canoe, or a rebuilt automobile.) In any event, to succeed, the final product of the Thesis program will be the equivalent of a college level comprehensive project or paper. Through regular oral reports to their peers, students will be accountable for steady progress on their work while helping them to develop the skill and confidence to present and defend their completed thesis.

Making it Real – Applied Arts & Technologies

New in 2010-2011, every cadet will have the opportunity to work in large or small groups with peers, as an individual in a mentored independent study, or with an outside practitioner as an intern on a range of projects that will help make the classroom curriculum come alive. Each grade will pursue an appropriate experiential education endeavor during the newly minted Applied Arts & Technology class as an assessed part of their curriculum.

With faculty mentorship and student leadership, 9th grade cadets will work together as a class to create an exciting Renaissance Faire from start to finish. They will conduct the Faire in May for elementary school children from the Cornwall and surrounding areas. Similarly but in smaller groups of five or fewer, Sophomores will participate in Environmental Engineering and Green Business Initiatives of their design and choosing with the assistance of several national experts on Green technologies. 11th graders will pursue their NYMA Thesis individually during the Applied Arts class, working with peers to bounce ideas around and hold each other accountable. Seniors will finish their NYMA Thesis in the first quarter of Applied Arts, and then undertake a Service Learning based internship (either locally in town or virtually on the Internet) with an expert practitioner in a field of their interest.

In 2010-11, Seniors will work on SAT prep during the first semester during Applied Arts. (Juniors will have the opportunity for SAT prep during Activity Periods) In future years, while completing their theses in the first quarter, Seniors will have access to SAT prep during other times arranged during the day.

THE 2010-2011 CURRIUCLUM – A Brief Summary

HUMANITIES A -- English & Language Arts

Key Disciplinary Content:

- English Language Grammar, Composition and Vocabulary
- English Language Literature, Reading Comprehension, and Literary Analysis
- The NYMA Stylebook of Report Writing and Research Presentation
- Philosophy and Critical Thinking for Young Leaders

Major School-Wide Learning Initiatives

- Grammar Drill Team
 - All cadets will be expected to learn and drill on fundamental aspects of English language Grammar in Humanities and in other disciplines including developing an expertise in sentence diagramming, a fluency with key terms and usage of grammatical forms, and a comfort with the key elements of written and spoken language style.
 - Grammar Drill will be assessed in Humanities A and will be the subject of cadet competitions in the Spring.
- Word of the Day
 - An SAT Vocabulary word fostered by the Humanities faculty will be announced at Advisory each school day, then will be used in context at least once in every discipline as well as in all faculty announcements on that day.
 - WODs will be assessed alongside the vocabulary curriculum in Humanities A.

Humanities A (English/Language Arts) Scope & Sequence

8th Grade Humanities Program: Humanities A & B is an integrated and self-contained course in the 8th grade (using two different periods) in which the traditional content of English and Social Sciences are woven together. The Social Sciences component of the 8th Grade Humanities course considers physical, political and cultural geography in several key regions of the world (including the United States) using relevant age-appropriate literature to stimulate not only awareness of place but also effective cultural analysis. The English Language component of 8th grade Humanities is a comprehensive writing and expression workshop in which students learn and drill on foundational grammar and usage principles, SAT vocabulary, and the basic principles and building blocks of effective expression both written and spoken. Students in 8th Grade Humanities receive **two** grades on their report cards for this class that are based on separate assessments covering 1) *World Geography & Cultural Analysis* and 2) *Grammar, Composition & Vocabulary*. Success in both aspects of the Humanities program is necessary for promotion to 9th grade.

9th Grade Humanities A – English & Language Arts 9

- Grammar and Composition 9
- Vocabulary 9
- Literature & Literary Analysis 9 (Western Classical Literature including The Odyssey, Beowulf, Chaucer, Shakespeare, Twain, and short stories from the early 20th Century.)
- Basics of Philosophy – (Ancient Western Legends, Biblical Stories, and the Greek Philosophers)
- Basic architecture of the effective Research Paper

10th Grade Humanities A – English & Language Arts 10

- Grammar & Composition 10
- Vocabulary 10
- Literature & Literary Analysis 10 (Non-Western literature and poetry written in or translated into English including core classics such as The Art of War, Black Elk Speaks, Siddhartha, works of Gabriel Garcia-Marquez, and Cry the Beloved Country as well as modern works drawn from Asian and South Asian settings.)
- Basics of Comparative Religious Philosophies – (Primal Religion, Confucianism, Hinduism, Buddhism, Judaism, Christianity, Islam)
- Steps to the creation of a substantive and authoritative Thesis Paper.

11th Grade Humanities A – English & Language Arts 11

- Grammar & Composition 11 (Curriculum design based on the content covered in the AP English Language Curriculum)
- SAT Vocabulary 11
- Literature & Literary Analysis 11 (American Literature, poetry and short stories including Washington Irving, Dickinson, Fitzgerald, Steinbeck, Hemingway, Dos Passos and female authors of the 20th Century.)
- Introduction to Modern Political Philosophy (Kant, Locke, Hobbes, Robespierre, Rousseau, Jefferson, Marx, Friedman)
- 11th Grade College and Life Self-Assessment Project (Creating an effective college essay and articulating a vision for an extraordinary life.)
- NYMA Thesis Project (in conjunction with Applied Arts and Technology class)

12th Grade Humanities A – English & Language Arts 12

- Grammar & Composition 12 (Advanced concepts in grammar and style)
- College Vocabulary 12
- Non-Fiction Studies and Analysis Technique (Using topical works from the New York Times best-seller list.)
- Introduction to College Philosophy
- Interviewing and Presentation Skills for the College Interview
- College Application Support and College Freshman Writing Workshop

HUMANITIES B – History & Social Sciences

Key Disciplinary Content:

- World Geography and History
- Critical & Abstract Thinking and Analytical Skills
- Global Patterns and Trends
- Civics and Citizenship

Major School-Wide Learning Initiatives

- World Issues Briefings
 - A cadet team will be responsible for a 5-minute Corps briefing on a key global issue at every Community Meeting on Wednesday. Every grade will be working on a key world issue as part of the curriculum in their grade throughout the year.
 - World Issue knowledge and fluency will be assessed parallel to the history content of Humanities B.
- The NYMA Expository Writing Program
 - All cadets will be expected to learn and master a common set of format and style expectations for expository writing (research papers).
 - Every cadet will undertake a major research-based work product in Humanities B that is grade appropriate and which follows the standard guidelines for NYMA expository writing.

Humanities B (History and Social Science) Scope & Sequence

8th Grade Humanities Program: Humanities A & B is an integrated and self-contained course in the 8th grade (using two different periods) in which the traditional content of English and Social Sciences are woven together. The Social Sciences component of the 8th Grade Humanities course considers physical, political and cultural geography in several key regions of the world (including the United States) using relevant age-appropriate literature to stimulate not only awareness of place but also effective cultural analysis. The English Language component of 8th grade Humanities is a comprehensive writing and expression workshop in which students learn and drill on foundational grammar and usage principles, SAT vocabulary, and the basic principles and building blocks of effective expression both written and spoken. Students in 8th Grade Humanities receive **two** grades on their report cards for this class that are based on separate assessments covering 1) *World Geography & Cultural Analysis* and 2) *Grammar, Composition & Vocabulary*. Success in both aspects of the Humanities program is necessary for promotion to 9th grade.

9th Grade Humanities B – Social Sciences 9

- Western Civilization (Modeled on the content and skill requirements of the AP European History curriculum)
- Key World Issues Emerging from Western nations (other than the U.S.)
- Basic Introduction to the Principles of Economics

10th Grade Humanities B – Social Sciences 10

- World Civilization (Modeled on the content and skill requirements of the AP World History curriculum)
- Key World Issues Emerging from non-Western nations.
- Introduction to Global Economics (Macroeconomics)

11th Grade Humanities B – Social Sciences 11

- U.S. History (Curriculum designed based on the AP US History curriculum)
- Key Domestic Issues in U.S. Affairs.
- Introduction to American Economic Trends

12th Grade Humanities B – Social Sciences 12

- American Government
- Comparative Government
- Principles of Microeconomics and Macroeconomics
- World Issue Analysis: Understanding and Analyzing the World's 10 Most Vexing Challenges

TECHNOLOGIES A--Mathematics

Key Disciplinary Content:

- Mathematics
- Analytical Reasoning

Technologies A (Mathematics) Scope & Sequence

Pre-Algebra/Introduction to High School Math

- Pre-Algebra
- Introduction to Geometry
- Introduction to Everyday Mathematics

Algebra I

- Beginning
- Introduction to Econometrics

Geometry

- Geometry
- Introduction to Engineering

Algebra II

- Intermediate Algebra
- Introduction to Trigonometry

Advanced Algebra & Trigonometry

- Advanced Algebra
- Trigonometry
- Introduction to Applied Mathematics

Pre-Calculus

- Introduction to Calculus
- Introduction to Statistics

Calculus

- Beginning and Intermediate Calculus

Statistics

- Introduction to Statistics (content based on the AP Statistics curriculum).

Accounting (Semester)

- Principles of Accounting
- Budgeting and Financial Reporting
- Mathematics for Institutional Accountability

Personal Finance (Semester)

- Introduction to Finance
- Mathematics for Everyday Living
- Reading Annual Reports and Other Financial Documents

Introduction to Business Planning and Modeling (Semester)

- Business Plans
- Business Models
- Mathematics for Financial Planning and Forecasting

TECHNOLOGIES B—Physical Sciences

Key Disciplinary Content:

- Physical Sciences
- Analytical Reasoning
- Principles of Engineering Design

Technology B (Physical Sciences) Scope & Sequence

Earth Science—Introduction to High School Science

- Earth Science
- Introduction to Conceptual Physics
- Introduction to Biology
- Introduction to Chemistry

Conceptual Physics

- Basic relationships of the physical world.
- Introduction to the relationships between mathematical formulas and the physical world.

Biology

- Human and Plant Biology
- Introduction to Anatomy and Physiology
- Introduction to Genetics and Genetic Engineering

Chemistry

- Chemistry
- Introduction to Chemical Engineering

Advanced (Computational) Physics

- College Physics
- Formula based Understanding of Physical Relationships

Anatomy & Physiology (Semester)

- Human Anatomy & Physiology
- Introduction to Forensics
- Introduction to Nutritional Science

Environmental Science (Semester)

- Content modeled on the AP Environmental Science Curriculum
- Introduction to Green Technology Solutions

Astronomy (Semester)

- Introduction to Astronomy

LANGUAGES OTHER THAN ENGLISH

Key Disciplinary Content:

- Latin and Classical Cultures
- Spanish
- Self-Driven, Mentored Language Study

Languages Other Than English Scope & Sequence

Latin I (NOTE: Latin I will be a graduation requirement beginning with the Class of 2012)

- Introduction to Latin
- Classical Culture
- Connections between Latin and English

Spanish I

- Beginning Spanish.
- Basic word recognition, grammar, and pronunciation.
- Class taught in English with Spanish and English interaction.

Spanish II

- Intermediate Spanish
- Beginning conversational Spanish and intermediate grammar comprehension
- Class taught in Spanish and English with Spanish interaction.

Spanish III

- Advanced Intermediate Spanish
- Intermediate Conversational Spanish
- Advanced Spanish Grammar
- Introduction to Spanish language literature
- All class teaching and interaction is in the Spanish language.

Independently Paced, Self-Driven Language Instruction (Tentative)

- Language department facilitated Language Instruction via software-based programs in French, German, Modern Hebrew, Italian, Mandarin, Japanese and Korean. (We are currently finalizing arrangements with various Internationally-acclaimed vendors of software-based language programs to pioneer this as a school-based curriculum in the United States.)
- Students will pursue their language instruction using the software *outside* of the school day using study facilities provided by the school and taking advantage of the mentorship and pedagogy of trained language department faculty.
- Academic credit will not be available for this activity in 2010-11 however this activity will be noted on student transcripts as non credit-based independent study and will be affirmed by the student performance on a College Board SAT Subject Test (available for each of the above-referenced languages) that will be administered in the Spring.

APPLIED ARTS & TECHNOLOGIES

Key Disciplinary Content:

- Experiential learning
- Project-based endeavor
- Large-group, Small-group, and Self-Driven learning

Applied Arts & Technologies Scope & Sequence

Band

- Band members will utilize the Applied Arts period for at least two and as many as three of the four weekly class meetings for small-group or individual music instruction or small group rehearsal. On off days they will report with the rest of the grade to the Applied Arts location. (See below).
- Band will meet as an entire group for rehearsal during at least one of the three 45-minute Activity Periods during the week

Applied Arts & Technologies 8

- Middle scholars use the Applied Arts and technologies slot in the schedule for classroom-based one quarter discovery courses featuring 1) Exploring Music, 2) Library and Internet Research Methodologies, 3) Lifetime Skills (knitting and sewing, cooking, hygiene and nutrition, etc.) and 4) Industrial Arts
- Assessment will be made in this class based on class participation and work products by faculty mentors.

Applied Arts & Technologies 9

- Large group class project mentored by the faculty but driven by student leaders.
- The entire Freshman class will work together as a large group on a year-long effort to design, build, advertise, and conduct a Medieval Renaissance Faire for local elementary scholars who will be invited to attend the event from Cornwall and other nearby school districts. The event will be held in May, 2011.
- Assessment will be made in this class based on project participation and task deadlines that will be monitored by the faculty mentors.

Applied Arts & Technologies 10

- Small group projects mentored by the faculty but driven by student leaders.
- Sophomore groups of 5 or fewer will work throughout the year on Environmental Engineering or Green Business projects with the assistance of outside experts.
- Assessment will be made in this class based on project participation and task deadlines that will be monitored by the faculty mentors.

Applied Arts & Technologies 11

- Individual NYMA Thesis project.
- Juniors will work on their NYMA Thesis during this period in a mentored and supervised location all year long.
- Occasionally, juniors will be pulled out of Applied Arts individually for college counseling.
- The NYMA Thesis will be worked on from September of the junior year until it is due after the first quarter of Senior year.
- Assessment will be made in this class based on progress checkpoints set up for each student and monitored by faculty thesis advisors.

Applied Arts & Technologies 12

- 1st Semester 2010-11: As current seniors do not have a thesis project in progress, this year Seniors will receive SAT and college skills prep work during Applied Arts in the fall.
- 2nd Semester 2010-11: Seniors will design Service Learning Internships in which they use the Applied Arts period to undertake virtual or on-site internships in an area of interest in Cornwall or via on-line interaction with an external mentor facilitated by the faculty mentor.
- 2011-2012 & Beyond: Beginning next year, Seniors will use the first quarter to finish their NYMA Thesis which will be presented in November. The final three quarters will be devoted to Service Learning Internships undertaken in Cornwall or through virtual interaction on-line.

JROTC

Key Disciplinary Content:

- Leadership Skills
- Health
- Communication Skills
- Life Skills
- Presentation Skills
- Rescue and Emergency Preparedness Skills

JROTC Scope & Sequence

LET1

The first year class for Leadership, Education, and Training (LET) provides students with an overview of the history and purpose of the Junior Reserve Officers Training Corps (JROTC) Program; ranks, organizational structure and awards of the Army JROTC program; and the traditions, customs and courtesies of the military. Students are taught basic drill and ceremony, how to wear their uniform properly, and the responsibilities of their position within the Corps of Cadets. Students are also introduced to leadership theory and its applications, wellness, fitness, and first aid.

LET2

The second year class for Leadership, Education, and Training (LET) provides students with challenges and opportunities designed to sharpen written communications skills; promote citizenship skills through an awareness of basic rights; recognize the importance that participation in service learning has on the community. This advanced instruction prepares students for responsible leadership roles while making them aware of their rights, responsibilities, and privileges as NYMA students and American citizens.

LET3

The third year class for Leadership, Education, and Training (LET) provides students with advanced challenges and opportunities designed to enhance oral communications skills; lead a service learning project; fine tune leadership skills and prepare for senior leadership positions.

LET4

Fourth year Leadership, Education, and Training (LET) provides students with advanced challenges and opportunities designed to prepare for senior leadership positions; strengthen oral communications skills in preparation for the Annual Formal Inspection briefing; lead, train and apply skills in order to enter the corporate world for ultimate success; and a roadmap to financial planning.

ACTIVITIES & CLUBS (PROPOSED)

- The Ramble (Student Newspaper both on-line and hard copy editions alternatively during the year.)
- The Shrapnel (Yearbook)
- Literary Magazine
- National Honor Society
- Future Business Leaders of America
- Software & Game Design
- Model UN and International Diplomacy
- International Club
- Theater/Drama Organization
- Forensics and Debate
- Emergency Responders (Red Cross, Volunteer Firefighter, EMS)
- SAT Prep (Juniors Only)

DISCOVERY WEEK (MAY 2011)

In June 2011 after exams, ALL cadets 8th grade through 11th grade will be required to participate in Discovery Week mini-courses which will be offered after exams and before Graduation. The Discovery Week mini-courses will offer students experiences outside of the customary classroom context that provide exposure, perspective, insight, exploration, and adventure as a final element of their academic year curriculum. Discovery Week 2011 Mini-Courses will take place over a four day period after Memorial Day and successful engagement completion in one of these activities IS REQUIRED for promotion to the next grade level.

Cadets will have the opportunity to choose their mini-course during an open enrollment period close to Spring Furlough in March. Options on and off-campus will be offered. Most options will entail no additional fee. Some options requiring travel or special equipment will require a nominal fee and parents will be given the opportunity to approve a cadet's choice before their selection is finalized.

The Discovery Week 2011 brochure with all mini-course options will be mailed home to parents before the Holiday furlough.