Albemarle High School Newsletter

April 2015

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Principal's Message

Dear Parents and Guardians,

Spring is an exciting time of year for your sons and daughters at Albemarle High School, but especially for the families of seniors. It's a time of transition, celebration, recognition and achievement. It is also the time of year of intense testing and social activity.

Our junior/senior prom celebration was held at the Double Tree in Charlottesville in April. Seeing students dressed so elegantly underscored how much they have matured over these last four years and served as a reminder they will be moving on to forge their own places in the world.

Exams

Within a few short weeks your children will be taking final exams beginning with senior final exams commencing on May 18th. Graduation is at 5 p.m. on May 30th at JPJ Arena.

Underclassmen exams will be given on June 4th, 5th, 8th, and 9th. For more information on year-end activities and dates, please be sure to review other content inside this newsletter.

Senior Awards Night

We will send letters to families of seniors inviting them to a special Senior Awards Night, Wednesday, May 20th from 6:30 to 8:30 p.m. Our seniors help plan this occasion which recognizes and celebrates the achievements of the Class of 2015. While guests enjoy refreshments, our AHS award winning jazz band will entertain you with their musical magic. Mark your calendar and plan to attend!

Guidance Department and Important News

Please be sure to note the section from the Guidance Department (continued on page 2)
Contact Information
Main Office 975-9300
Main Fax 974-4335
Athletics 974-4308
Attendance 974-4310
Community Ed 975-9450
Guidance 974-4321

Important Dates
Senior Exams 5/18-21
Senior Awards Night 5/20 6:30-8:30 p.m.
Senior Release & Movie Day 5/22
Graduation 5/30
JPJ 5:00 p.m.
Final Exams 6/4-9

Did you know?
More than 70% of our graduating students have acquired college credit at the time of graduation. In fact, last year 224 seniors earned an Early College Scholars designation with at least 15 transferable college credits during enrollment at AHS. They also earned an Advanced Studies Diploma with the Governor’s Seal and subsequently were accepted by a college or university.

Principal’s Message (continued)
as there are several important dates and reminders that you will need to know that involve you and your children.

Student and Staff Achievements and Recognition
This has been a year filled with numerous awards and recognition of staff and students alike. The following pages will highlight many of these exciting accomplishments and achievements.

Jay Thomas, Principal

AHS MESA Students are 2015 Grand Award Winners at the Virginia Piedmont Regional Science Fair.

This past March, AHS students competed with other schools in the region at the Piedmont Regional Science Fair.

Grand Award Winners are all from Albemarle High School’s Math, Engineering, and Science Academy.

Congratulations to:

Monika Grabowska for her win with project “Cardioprotective Effects of Quercetin in Ischemia-Reperfusion Injury: The Role of Oxidized CaM Kinase II”

Seth Liyanage and Ishpreet Singh for their win with project “Gills: The Use of Electrolysis for Extended Underwater Exploration”

Runners up for the Grand Award are:

Will Knopse for his project “Responding to Infectious Diseases Using Game Theory”

Selina Feng for her project “Optimization of Contactless Heartbeat Imaging”

There were more than 50 additional students from AHS who won various awards for their work at this regional fair.

Cherry Wang a Winner of the National Center for Women in Technology Aspirations Award

She is one of 12 women chosen in the VA/DC area as a winner of this prestigious award. She was honored on March 12 at a luncheon at Virginia Tech. Congratulations to Cherry for this outstanding recognition.

AHS Swim Team wins State Championship for Two Consecutive Years

Congratulations to the AHS ladies’ swim team who was recognized in February as the state champions for the second year in a row.

AHS Winners in National Scholastic Art and Writing Awards

AHS seniors, Emily Farabaugh and Allison Jaggers placed in the National Scholastic Art and Writing Awards. Allison placed in Silver Key and Honorable Mention for two of her poems.

Emily placed in Honorable Mention for personal essay/memoir and Gold Key for one of her poems.

Additional AHS students won specific individual awards: Melanie Gray, Rachel Lemley, Nathaniel Saxe, Ian Johnson, and Maddie Neilson.
New Robotics Program Is Big Hit with Students

Within the new Maker Space at AHS, for Makers, Artists, and Creators, is a new exciting program in robotics. It’s a class where students delve into the challenges of creativity and critical problem solving with enthusiasm. Last semester, Tetrix and Lego parts were used for designing, building, programming, and testing robotic projects. Frequently, student designed robots were tested within autonomous or remote controlled robotic competitions including formula one races, drag races, sumo matches, soccer matches, and more. All projects and their challenge rules were conceived and outlined by students, giving them an open door for creativity on all projects.

Individual midterm projects included a claw machine, electric drum machine, Mars Rover, and a Rubix Cube solver. Several students utilized our schools recording studio, A3 House, to record music created with their project robots. Check out these links of student robotic projects:

Drum Machine
http://youtu.be/d0h6diRTE7Q

Rubics Cube Solver
http://youtu.be/EZ-tnP8R3K4

The Claw
http://www.youtu.be/qslgHcXoNkE

This semester students are utilizing the Arduino microcontroller platform with SparkFun Inventor Kits. These are tools they use to discover circuits, electricity, and programming, giving greater challenges to designing and building more complex and customizable robots and automation systems.

The robotics curriculum also involves the occupational and career applications involving robotics and automation, as well as the significance of this technology in our everyday lives. Some of these applications are in a variety of engineering and industry, others are in occupational health, safety control, medical, aeronautics, and military. In fact, the U.S. military's drones – or Unmanned Aerial Vehicles (UAVs) – were probably the most talked about robots in the past three years.
Reminders:

The last day to change course requests for the 2015-2016 school year was April 24th. Please see your child's school counselor as soon as possible if you still have questions or need to review the course requests for this next school year.

Missed the Rising Senior Parent Presentation?

Click here to view the presentation http://www2.k12albemarle.org/school/AHS/counseling/Lists/Announcements/Attachments/39/Rising%20Senior%20Parent%20Presentation.pptx

Upcoming Events for Students

If you are interested in learning more about STEM careers and are considering attending PVCC, either as a home school student, as a dual enrollment student or as a transfer student, PVCC is offering scholarships to attend a FREE Summer STEM Academy (June 8-12). This will allow students to earn a college credit in one week while learning about each of the STEM areas through hands-on learning activities. This one credit class is the required student development (SDV) class for PVCC’s associate’s degree programs. The week will culminate with meeting area technology firms to experience these careers in the real world and to learn about possible summer jobs/internships directly from local employers. Scholarships will be awarded based on grade level and program aspirations at PVCC. If interested, please register by visiting: http://goo.gl/forms/XnSCyJrgo. You will be notified by May 15th whether you are selected for this program. Space is limited to 25 students. For more information, call Gigi Davis at 434-961-5336 or email madavis@pvcc.edu.

Earning College Credits

Want a head start on earning college credit in Engineering that is transferrable to UVA, Va. Tech, VCU and ODU? PVCC is offering an intensive Summer Engineering Academy where both Introduction to Engineering (EGR 120 – 2 credits) and Engineering Graphics (EGR 115 – 3 credits) will be taught between June 10-August 5 (mornings Mon-Thur) allowing students to earn up to five credits in two short months (students can choose just one of the classes if planning on taking the other in their high school or college of choice). PVCC only costs $141.15/credit (including student fees) whereas UVA costs $349/credit (with an added $366 student fee!). Financial aid may be possible for graduating seniors who have filled out the FAFSA. Students must have taken pre-calculus and be able to test into the EGR classes either via the SAT Math Subject test or the VPT. If calculus has been taken, no need to test into the class! Please visit the following for more information: http://www.pvcc.edu/stem

Scholarships for possible summer jobs/internships directly from local employers. Scholarships will be awarded based on grade level and program aspirations at PVCC. If interested, please register by visiting: http://www2.k12albemarle.org/school/AHS/counseling/Lists/Announcements/Attachments/34/ENRICHMENT 2015 PROGRAMS.docx

2015 Regional Summer Enrichment Opportunities

For complete information, click on: http://www2.k12albemarle.org/school/AHS/counseling/Lists/Announcements/Attachments/34/ENRICHMENT 2015 PROGRAMS.docx

Summer Opportunities

The Virginia Discovery Museum is looking for enthusiastic teenagers (ages 15-18) to serve as volunteers over the summer. If you enjoy working with kids and are interested in science, history, and art, this is an excellent opportunity to gain some work experience while having fun. Please see your school counselor if interested.

Robin and Mani’s Buddy Camp

Rising juniors and seniors that have a desire to work with students with disabilities in a fun, structured environment. Must be able to commit to attending camp at Jackson-Via Elementary School (June 15-19th) from 8:30-1:30. See your school counselor if interested.
If it sounds complicated, that's because it is. However, it's not for four students at AHS. As part of the GSTAR collaboration, Albemarle High School MESA students Catie Grebe, David Hatter, Doyeop Kim, and Brendan Ventura presented their research findings at two conferences in California earlier this year. The ITSP conference (International Teacher-Scientist Partnership) was held in San Jose and the AAAS (American Association for the Advancement of Science) was held in San Francisco. The students presented a preliminary analysis of optical observations of the nearby spiral barred galaxy NGC 1097. In a nutshell, they determined the age of specific star clusters in this galaxy through the immersion of original research, concluding star age ranged from one million to five billion years.

The Galaxy Science Through Astronomy Role-modeling (GSTAR) program is an EPO project supported by the Hubble Space Telescope (HST) and implemented by researchers at the National Radio Astronomy Observatory and the University of Virginia. It uses original HST data to enable research immersion for high school students at the Math, Engineering, and Science Academy (MESA) at Albemarle High School in central Virginia.

In the words of one of the AHS student presenters, Brendan Ventura, the most exciting aspects of the program involved “working with images from the Hubble Space Telescope that had never been looked at before and undergoing original research on that information.” Equally as important and exciting was the fact they were able to present original research to many people from the same field. The AAAS conference was the most interesting to Brendan because of the various stimulating and informational talks he attended. “We were able to talk to many other research groups and organizations including NASA Kepler and the International Space Station group.”

He went on to explain he had always been fascinated with the mysteries of astronomy and found himself drawn, at an early age, to shows, magazines, books, and anything related to space, planets, stars and galaxies. “This experience has been a great gift. It gave me a new appreciation for research and the time, effort, and organization it takes to make it work. I learned that you could engage in research for many years and only achieve part of your original goal. And even after that research is finished the conclusion may only be a ballpark estimate or theory rather than a concrete conclusion.”

New doors have opened for these talented students, but there's still another universe of experience ahead. Space really IS the final frontier!
AHS Girls’ Basketball Team Takes a Strong Lead

Congratulations were well deserved for Rachel Proudfoot and her amazing girls’ basketball team as they took a strong lead over Orange 63-41 in the Conference Championships this past February.

AHS Forensics Team Wins States 15th Straight Year

Another outstanding effort by Fay Cunningham, Abby Baum and our Forensics team as they won States competition for the 15th straight year. All 21 students placed!

They followed this competition with another outstanding accomplishment, winning the Regionals for the 13th time in 14 years. What an incredible faculty and student body we have at AHS.

Students Selected for All State Orchestra

Carrie Finnegan’s Orchestra students Quinn Legollo-Malone, Joshua Ling, and Stephen Tan were selected by competitive audition to the All-State Virginia Orchestra this spring. They performed with the ensemble over spring break at Christopher Newport University.

Students Selected for All State Orchestra

Congratulations to Greg Thomas and his students Roger Martin, Rachel Willis, Mary Fitzpatrick, Julia Stumbaugh who were selected by competitive addition to participate in the All Virginia Band the last weekend in February. They also performed at Christopher Newport University over the spring break.

AHS Robotics Team 7953 Wins States and Advances to the Regionals

Albemarle Robotics Team 7953 won at states and advances to the Eastern Super Regional in Scranton, PA. They were undefeated all day and won the winning alliance as first seed team captains.

Mathematics Department News

AHS Math Honor Society and Math Club students have been very busy the past few months. In February students held the 2nd Annual Junior Albemarle Middle School Mathematics competition for area middle school students. For the past few months Math Club members have been participating in several competitions. AHS finished in the top 8 nationally of the Interstellar Math Madness Competition, are currently in 6th place in our region in the Mu Alpha Theta Log1 competition, and are 1st in the state in the VHSL math league. Four AHS students have also qualified to participate in the American Invitational Mathematics Exam (AIME): fewer than 5% of the top students in the country qualify for this.

AHS Academic Team

For the second year in a row the Albemarle Academic team won the state championship under the guidance of Matt Clay.

2015 Albemarle County Golden Apple Award for Albemarle High School Teacher Karin Anne Ryan.

Congratulations to Karin! The national Golden Apple Awards for Excellence in Teaching was the idea of Golden Apple founder Martin J. (Mike) Koldyke, who felt that excellent teachers did not receive adequate recognition for their contributions to building a stronger, better-educated society. Every year different counties in Virginia choose a teacher from each school who exhibits a set of characteristics considered ideal and invaluable in a teacher’s role in education.

Art Students Recognized for Outstanding Work

Gabriella DeGennaro took first place in the high school division for a poster design she created for the Virginia Festival of the Book.

Pingyi Zhu took one of two high school awards for a painting she submitted to the 2015 Art In Place juried art show “Charlottesville in Two Dimensions” which was on display at McGuffey Art Center through March.
The room was not big. Old classroom furniture, a few chairs, old English Department books, and old boxes gave the sense that the room had not been used for anything but storage for a while now.

To newcomer Chance Dickerson, it was ripe with seeds for inspiration. As a quiet respite from the daily challenges of his work, this little room offered fertile ground to think beyond boundaries, ultimately fostering inspiration that grew into a successful program reaching far outside its limiting physical boundaries.

Initially, Dickerson’s primary work was with students within the ESOL Department (English for Speakers of Other Languages). Very quickly he saw a thread that bound most of the students together: the expression of each group’s indigenous music. His own background of music and recording offered an opportunity for these students to learn the art of recording and sound engineering.

Serendipitously, discussions were currently underway at AHS to build its own recording studio and Chance was instantly brought into the discussions.

The concept would eventually be named A3House (named by students for Albemarle Alternative Art House). Dickerson’s concepts began to take on a broader, more universal scope. Not only had A3House given these students a voice to develop ideas and concepts already within themselves, he could see the potential for it to take on a role that was more than an outlet for poetic and musical expression. It was something that

In short time, Dickerson had a video produced to show the diversity of the studio’s use. For an in-depth look at academic applications of the recording studio, watch these innovative examples on A3House video:
https://www.youtube.com/watch?v=HNc7JGEWTIE

According to Chance, the most important element of the studio is the opportunity within A3House that allows students to find ‘home’ and family within the school.

“Some students may have had a harder time in life, perhaps even considered ‘at risk’ students.” These students have become Chance Dickerson’s muse. “For some, it became a transformational opportunity. Here they find a safe means and place to express themselves. There are resources here to help them find their inner voice, to find the person they are inside.”

With such a diversified group of students, collaborating on projects brought out differences culturally, socially, and religiously. This became an important opportunity for students to confront, and then understand each other’s differences. “In the end, they learn to see with open minds, and gain new ways of listening. Ultimately, it is the language of music, and the love of music that brings them together.”

~ by Alyssandra Young

A3House ~ In a Diverse Student Body, Music is the Universal Language
The Albemarle High School newsletter is a publication of Albemarle County Public Schools. It is published quarterly and distributed to all Albemarle High School families.

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Director of Human Resources 401 McIntire Road Charlottesville, VA 22902 Phone: (434)296.5827

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Title IX Coordinator Department of Human Resources 401 McIntire Road Charlottesville, VA 22902 Phone: (434)296.5827

Our Vision:
All learners believe in their power to embrace learning, to excel, and to own their future.

AHS Wins Blue Ribbon Status

Once again, our band, orchestra and choir won Superior Ratings in the district assessments this past March. The triple Blue Ribbon wins culminate in achieving the National Association for Music Educators and the Virginia Music Educators Associations Blue Ribbon Status. This achievement is no easy feat and takes a great deal of dedication and effort by students and staff alike.

In the words of Doug Granger, Lead Coach in Fine Arts for Albemarle County Public Schools, “After two decades in the music education field I can testify that accomplishments such as this do not happen by chance and never happen in a vacuum. They are the result of dedicated, intelligent teachers who love kids, love music, and never sacrifice their musical integrity. Greg Thomas, Jennifer Morris, and Carrie Finnegan are awesome (teachers). And they are surrounded by others who are like them...passionate kid-magnets who push their students to high standards and support them well.”

Bravo to our students and our teachers in our Fine Arts program. You are amazing!

2015 Summer Residential Governor’s School Selections

We are honored to announce to you the selection of the following AHS students for Summer Residential Governor’s School:

Visual & Performing Arts, Instrumental Music: Obed Restituyo (Dance)
Visual & Performing Arts, Instrumental Music: Alexandra Schienfeld (Vocal - Alto)
Visual & Performing Arts, Vocal Music: Emmet Haden (Instrumental - Trumpet)
NASA /Engineering: Selena Feng
Foreign Language: Ayub Herman (French)
Foreign Language: Magaret Townes (Japanese)
Foreign Language: Stephen Dolan (German)
Foreign Language: Gwendolyn Pattison (Latin)

AHS Student Lauren Considine is accepted into NSL1-Y Program

AHS Senior Lauren Considine was accepted to the US Department of State’s National Security Language initiative (NSLI-Y). She has received a full scholarship and will be studying in a full immersion program in Korea next school year.

The National Security Language Initiative for Youth (NSLI-Y) program, sponsored by the U.S. Department of State, provides merit-based scholarships for eligible high school students and recent high school graduates to learn less commonly taught languages in summer and academic-year overseas immersion programs.