

**ACADEMY FOR MATH, ENGINEERING & SCIENCE (AMES)
Year End Report 2009-2010**

Graduating Class 2010 – AMES 5th Graduating Class

Graduation was held on June 4, 2010 at Libby Gardner Hall on the University of Utah campus at 4:00 p.m.

- Facts: 92 students graduated from AMES (2 students were 1st Semester graduates, 1 student was promoted from Junior to Senior in January and graduated at 16 yrs old)
- 2 Foreign Exchange Students were given Certificates of Accomplishment
- 47 Females
- 47 Males
- 40% of graduates identify themselves as ethnic minority
- 24 Students stated that neither parent has received a college degree, or attended college.
- 41 Identified as economically disadvantaged.

74 of 92 graduates have declared they are going to college 80% of class. College or University of choice:

2	Art Institute	31	U of U
1	BYU (Provo)	5	Utah State
1	Embry Riddle University	1	Utah Valley University
1	LDS Business College	2	Weber State University
1	Lewis & Clark	1	Wellesley College
1	Macalester	5	Westminster
1	Pomona College	1	Univ. of Colorado/Denver
1	Sam Houston St. College		
21	SLCC		

Scholarships Received by AMES Graduates

46 of 92 graduates received scholarships in the amount of **\$1,388,887**.

29 students have been awarded the designation of “Utah Scholar” and received certificates and medallions.

33 Students applied for the Regents Scholarship (statistics on number awarded not available until September).

- The University of Utah awarded the following scholarships to AMES graduates: Honors at Entrance, Utah Achievement, Continuing Ed, Suder Scholarship (2 students), Chicano, Student Scholarship, Honors College, and Top 10%.

- The Westminster College awarded the following scholarships to AMESgraduates: Presidential (4 students), Founders (2 students), Deans (4 students), Horizon, New Scholar and Salt Lake Valley Regional Science & Engineering Fair.
- Dixie College awarded the following scholarships to AMESgraduates: Deans' and Trustee.
- Southern Utah University awarded the following scholarships to AMESgraduates: Centurium and Dean's Multicultural.
- Utah State University awarded the following scholarships to AMESgraduates: Presidential and Opportunity Scholarship.
- Embry-Riddle University awarded the Presidential Scholarship to an AMES graduate.
- Lewis & Clark awarded the Dean's Scholarship to an AMES graduate.
- Five AMES students received MESA scholarships.

University of Utah Partnership – School Year 2009-2010

1. **79** AMES Students took University Classes and earned **1,148 University Credits while at AMES**. Per credit hour charge at the University of Utah (no fees included) is **\$426.61/hour**. This means a savings to the 79 students of **\$489,748**. In addition AMES paid for student text books and related materials, for an average of \$100 per student, an additional savings of \$7,900.
2. **33** students who took one or more concurrent class identified themselves as a minority student.
3. AMES/U of U Classes taught: Academic Writing, Calculus, Chemistry, Chemistry lab, Statistics, Humanities, College Algebra, Quantitative Reasoning and Physics.
4. AMES students and parents were invited to presentations from U of U staff about admissions, financial aid, and the Honors College.
5. Campus tours for AMES Juniors and Seniors.
6. The U of U provided faculty and graduate student mentors for AMES science fair research class students.
8. Omelets & Admissions: Twice a year AMESadministration and counselors along with advisors from the U of U including financial aid staff meet with AMESseniors to help them complete college entrance applications, FAFSA applications and other scholarship applications during two Saturday workshops. A total of 70 AMES students attended.
9. Professor Paul Gore and Amy Metz and a team of U of U Ed. Psychology graduate student piloted a special project with AMESstudents involving the SSI (Student Success Inventory), a non-cognitive skill inventory. Activities included parent presentations, support of SEOP Conferences and faculty professional development.

School Demographics

As of June 4, 2010

Grade 12	92
Grade 11	115
Grade 10	114
Grade 9	<u>136</u>
Total Students:	457

Ethnic Minority (50%):	Asian	9%
	African American	4%
	Hispanic	24%
	Native Am.	3%
	Pacific Islander	10%

Test Performance:

1. ACT: AMES students average 22.1 composite for this exam, a few points above the state average of 21.8 and three points above the national average of 21.1. AMES students out-perform state & national bench marks in all 4 ACT categories.
2. SAT: AMES students who have taken the PSAT/SAT test have consistently scored in the 1600-2000 range. We have one National Merit Finalist 2010 2010.
3. PLAN (pre ACT): AMES 10th grade students composite score of 17.6 (2010). The national composite score was 17.5. (AMES also administers the pre-ACT EXPLORE test to all AMES freshman.)
4. AMES juniors Chas Blakemore, Christian Butler, Jesse Chillington and Nathan Goodman have been named National Merit semi-finalists. All semi-finalists are monitored until February of their senior year when the finalists are announced.

AMES Community Partnerships – Funded in part by State Trustlands PLACEMENTS AS OF JANUARY, 2010

AMES Science Fair	Haircutters Salon
Arizona Heavy Equipment	
ARUP	Hispanic Chamber of Commerce/Tongan Youth Group
Bad Dog Art	Holy Cross Ministries
Bio Science Research	HS Teacher – AMES Alisa McDonald
Blindside (skateboard design)	HS Teacher – AMES Vaughn Webster
Boys & Girls Club	IHC Internship
Community Writing Center	Jesse Stearn (guitar making)
Dancing Cats Feline Health Center	Jordan Valley Hospital
Fotsol Academy (soccer)	Kamina Jodejuan (Yoga Instructor)
GP Photography	Ken Sanders Rare Books
Granger Pediatrics	League of Women Voters
Gypsy Moon (art)	Living Plant Aquarium
Habitat for Humanity	Lone Peak Vet Clinic
Hand & Orthopedic Rehabilitation Specialists	

Magna Clinic (medical)
Midvale Family Clinic
Midvale Peer Court
Mirci Dental
Neighborhood Partners (medical)
NSF Engineering
Pioneer Valley Hospital
Planned Parenthood (office management)
Salt Lake Peer Court
SoCupcake Bakery
Special Olympics

Stansbury Elementary School
Taylorsville City Library
The Children's Center
The King's English Bookstore
U of U Materials Science Engineering Lab
U of U Physics Lab
Utah Realtors Association
West Valley City Animal Shelter

Continuing Features

1. AMES students participate in hosted Cottonwood High School programs including music, drama, debate, art and athletics.
2. Active PTSO with over 145 family memberships.
3. Open access AP classes include: Human Geography (9th Grade), European History (10th Grade), US History (11th Grade), Art History, Psychology, and Calculus.
4. AMES sponsors co-curricular clubs including:

Student Council	Satellite Newspaper	
Chess/Knitting/AMES-GASA	Ping Pong Club	Astronomy/Rocket Club
Garden Club	Arabic Club	Running/Glee Club
Math Club	Ecology Club	Aquarium Club
Yearbook	Gamer Club	Bridge Card Club
Bennion Student Service Club	Sketchbook Club	
5. Math Saturday School: AMES staff and cross-age AMES student tutors offered assistance to 50-60 AMES students every week at the Hunter Library funded by Title One Funds.
6. AMESSummer School: Entering AMES freshman participate in a week long study skills camp each summer; approximately 85% participation.

Student Accomplishments

Salt Lake Valley Science & Engineering Fair

In the last 5 years AMES has participated in science fair, 4 have resulted in one or more AMES students attending the Intel International Fair. This year, AMES Junior Charles Blakemore represented AMES in San Jose, California, along with high school students from around the world. In attendance at the fair was AMES FIRST ISEF attendee (2008), Candace Murray, Junior at MIT. Below is a list of students and their SLVSEF accomplishments:

Kyle Brinkerhoff:

American Institute of Aeronautics and
Astronautics, Utah Section
Computer Science division - 2nd place
Symantic - Honorable mention

Nick Corpuz:

American Meteorology Society - 1st place
Stockholm Junior Water Prize
UofU Biology Dept - Special Mention
Nature High Camp Award
Environmental Science division - 1st

Lindy Clark:

American Psychological Association - 1st
Behavioral and Social Sciences division - 1st

Nathan Nguyen, Kathryn Nelson and Schwan Javdan:

American Society of Civil Engineers - 1st
Roots and Shoots Youth Environmental Fair invitee
Utah Department of Transportation
Senior Team Award - 3rd place overall

Kathryn Nelson:

Association for Women Geoscientists, Salt Lake
Chapter

Chris Bujnowski:

Great Basin Chapter of Air and Waste Management
Association
Utah Department of Transportation
US Metric Association
Environmental Sciences division - 2nd place
Roots and Shoots Youth Environmental Fair Invitee

Matt Vitelli:

Intel Excellence in Computer Science
The Leonardo Award
Yale Science and Engineering Association
Computer Science division - 1st

Peter Tran:

Northern Utah Energy Efficiency and
Renewable Energy Fair
Energy and Transportation division - 1st

Patti Keene:

Roots and Shoots Youth Environmental Fair
Invitee
Environmental Management division - 1st

Brady Bowen:

Utah Council of Teachers of Mathematics
Mathematical Sciences division - 2nd

Cesia Dominguez and Maia Bromley-Dulfano:
Roots and Shoots Youth Environmental Fair
invitee

UofU Biology Dept - Special mention
Senior Team Division - 2nd place overall

Josue Pacheco:

US Public Health Service

Chas Blakemore:

UofU Biology Dept - Special mention
Biochemistry division - 1st
ISEF attendee

Jesse Chillington:

Medicine and Health Sciences - 2nd

Blake Heathman:

Chemistry division - 1st

Danielle Niitsuma:

Medicine and Health Sciences division - 1st

Jason Murray:

Physics and Astronomy division - 2nd
US Army - 4th

Chess Club

The AMES chess club were Chess Champions in 1A, 2A, and 3A Division. Anthony Lanier, Nathan Hansen, Ryan Larsen, William Jones, Holland Bosarge, Chris Bujnowski, Oscar Gonzalez, Jose Garcia, Simone Gaspar, Bryson Christensen represented AMES.

JETS (Junior Engineering Technical Society)

The annual competition (similar to the state math competition) features the following:

- Engineering issues, not simply math. Questions are physics related, some chemistry, biology, and some purely engineering.
- The test is taken by a school team, The team divides up the various questions and can ask each other for help as they work on the questions.

This year's test dealt with water-related issues.

Two AMES teams competed in the varsity and junior varsity. The JV team took first place in the state (in the JV division). Arin Martin, Ryan Larsen, Spencer Phippin, Nathan Goodman, Bryson Christensen represented AMES.

State Math Contest

In February 180 AMES students took the American Mathematics Competition 10 (for 9-10th grade) and American Mathematics Competition 12 (11-12th grade) test. The top 10 highest scores per grade on this test were invited to the State Math Contest. These top 40 students competed against others of their grade. The contest was held at Utah Valley University and our AMES students represented us well.

First Robotics Competition

AMES Robotics team competed in the Utah regional FIRST Robotics Competition (FRC) at the U of U in March. Students had worked on their robot for over six weeks with help from teachers and staff. The team learned a lot by competing and observing the other teams. This year's team consisted of: Aeris Bui, Kyle Brinkerhoff, Kevin Bustamante, Jesse Chillington, Jose Garcia, Oscar Gonzalez, Nathan Goodman, Nathan Hansen, Rachel Howery, Patti Keene, Ryan Larsen, Arin Martin, Riley Milne, Jason Murray, Craig Nguyen, Philip Osborne, Spencer Phippen, and Matt Vitelli.

ART Access Grant

Thanks to a grant from Art Access AMES art studio students had the opportunity to work with ceramic artist Paul Heath. Students were introduced to the art of mosaics, a new field to be explored for many of the students. AMES students were happy to show what they had learned by sharing their work at an art show held at AMES.