MESA Students Never Cease to Amaze!
by Christine Reed, MESA Counselor/Coordinator

Speaking of momentous, I am proud to announce that this is the first of many official Allan Hancock College MESA newsletters to come. MESA has stood strong at the college now since 2000. From the beginning, it was apparent by the number of students interested in the program that our college was desperately in need of STEM student support. Today, the program serves 125 students (its state designated maximum) and the MESA Center is utilized by many other STEM students who, for either financial or educational reasons, do not officially qualify for the program. As the students say, MESA is their second family and the center is their home away from home. Whether students are officially MESA designated or not, the program is here to serve. This newsletter is designed to focus on students. Most of the articles are written by MESA students. As their program coordinator and counselor, I am here to guide and support them. It is ultimately their responsibility and privilege to engage in the learning and support opportunities available. It is their efforts that matter most as we, the MESA staff and STEM instructors, gently nudge, inform, and support them. I am sure I am safe to state that all of us are proud of them and our role in their development. Their stories speak louder than anything I can say about them, and they never cease to amaze me.

Finding My Way
by Cecia Cesares, MESA Student, Mechanical Engineering, transferring to Cal Poly-SLO, fall ‘12

Many interesting things have happened to me in my life, but the most memorable are the ones that have helped me develop into the person I want to be. I have struggled to find exactly where I want to be in the next few years, but I am so glad that I have taken my time to grow and establish a purposeful goal.

When I was only 6 years old I lost my mother to a deadly illness called Lupus. My brother and I were sent to live out of the country with distant relatives that were concerned about my father’s depression and prescription drug abuse. Later my father married a wonderful woman and when my father was sent to jail for a time, our relationship with her grew.
Keeping up my grades in school and being involved in clubs and sports helped me deal with my troubles. Though going to a university after high school was always my goal, the thought suddenly became intimidating when I got my letters of acceptance. I took some time to find out what attracted me, but it was always hard to set my priorities because I was interested in so many things. Getting married young was also a distraction, but my husband pushed me to find my place in education.

When I enrolled at Hancock I joined the MESA program which guided me to choose a career path and today I finally feel that I am where I need to be. It took a while to get here with all the distractions I had on the way. I did panic when I unexpectedly found out I was pregnant. But with the help of my mentors in the MESA program, I was able to keep my ambitions. Now I plan to major in mechanical engineering and have gotten accepted to Cal Poly. It is difficult to juggle everything at once but I am glad I have taken the time to learn how to do so; my struggles have only boosted my determination.

ExxonMobil Provides Continued Support to AHC’s MESA Students

In August, the Allan Hancock College Foundation accepted a $2,000 donation from ExxonMobil to help support the college’s Math, Engineering, Science Achievement (MESA) program. In March, they generously gave another $5,000 to support program student scholarships and services. Troy Tranquada, Operations Supervisor for ExxonMobil, made the presentation at the Allan Hancock College Board of Trustees meeting. ExxonMobil has given to the college for many years, and this is the third donation directed to the MESA program, which Tranquada believes "is a good fit" as the next generation of students help develop new energy sources. "MESA’s focus is to encourage education in STEM (science, technology, engineering and math)," said Tranquada. "And the future will require a global population very skilled in math and science. MESA is helping to make that happen."

In December, MESA students visited the ExxonMobil Processing Plant in Gaviota. Tranquada coordinated the student experience. Here is the reflection of Manilyn Dancel, one of the MESA students on the trip.

The Exxon Mobil trip was a great escape from the books. It was a great experience to see hands-on work from both long-term and starting off engineers. They both gave their two cents and motivated us to keep reaching our goals. When we first arrived, we had a brief presentation from a chemical engineer about their oil platforms and their efforts to find an efficient way to supply energy. He explained how the oil comes out from the ground and the stages it goes through to produce crude oil, natural gas, and petroleum. He also included expenses and their efforts in environmental protection. It was interesting to hear the different directions of drilling and how deep they need to go to find the resource. After the presentation, we had a tour around the area. We went to the control room and saw the system they used to protect the plant and to keep their employees safe. Last semester, I took a computer drafting class called Auto Cad. An engineer presented a similar program that was used for their designs. It was great to see the knowledge I learn being used hands on at a big company. My experience at ExxonMobil was definitely worth a trip. I was able to see engineers explain and show their job description and learn more about the resources used to keep the world going.
Top 10 Career Strategies While in College
by Zak Sheerazi, Counseling Intern, MESA (adapted from Penn State Career Services)

1. Get good grades! Employers look for consistent academic performance. Maintaining a good academic record shows employers you have a strong work ethic and the ability to learn new concepts and ideas.

2. Identify your interests, strengths, challenges and values. In order to know your career goals, you first should understand who you are. Think about what really interests you, what skill sets you have, what skills you need to gain, and what you value in life.

3. Investigate career opportunities. Do informational interviews with employers or do some work shadowing. Attending career fairs and employer presentations on your campus can help you investigate career options.

4. Whatever your interest, get involved. Joining a club or volunteering is an excellent way to contribute to the community and gain valuable skills that employers look for, such as teamwork and time management.

5. Continually improve your communication/teamwork skills. No matter what your future career is going to be, it is important that you learn how to communicate effectively on a one-to-one basis, as well as in a team environment.

6. Develop strong writing skills. It goes without saying that computer skills are very important, but just as important is your ability to write cohesively with no errors.

7. Obtain an internship. Internships give you an inside view to see if you will like a particular career. They are a great way to establish contacts in your chosen field and can lead to full-time employment.

8. Broaden your horizons through study abroad. Studying abroad can be a great way to see another part of the world, to challenge yourself, gain appreciation for diversity and prepare you for a global workforce.

9. Meet your professors. You should try to get to know your professors, as they too have knowledge about industries and sectors that might be of interest and value.

10. Google yourself. Make sure that your Facebook page, LinkedIn account and all on-line presence is professionally appropriate (pictures and content). Make sure your “personal brand” on-line is perceived as professional and proper is very important in this digital age.

An Emerging Engineer
by Chris Welch, MESA Student, Mechanical Engineering, GPA 3.82

Hi my name is Chris Michael Welch and am 19 years old. The idea of wanting to become an engineer started around age 15. There wasn’t much to do in the small town of Guadalupe and so I just began making things. I created flamethrowers, 5 gallon vinegar/baking soda rockets, potato launchers; I even mounted a chainsaw engine onto a bicycle in an attempt to create a motorcycle. I would have continued to build things but I made a mistake. I accidently lost my phone at school. The security found it, searched it, and saw pictures and videos of my creations. Next thing I knew I was in a closed room sitting in front of the school police with the security searching my back pack. I had no intentions on hurting anyone; I was just feeding my imagination. One of the only good things that came out of that incident was the officer’s comment “…you should work for Vandenberg and make rockets there…” and that comment still makes me smile to this day. But sadly these days I don’t have much time to
build things since I’m going to school at Allan Hancock College majoring in mechanical engineering. Taking all the math and sciences required for engineering is tough and I know for a fact I wouldn’t be anywhere near as successful as I am without the MESA Program and the friends I’ve made through the program. My goal at AHC is to transfer by 2014 to Cal Poly, SLO or UCLA.

A few blurbs about myself outside of school. I live with loving and very supporting parents and occasionally get to talk with my sister who lives in the Irvine area working as an art advertiser. I really like music and play bass, drums, and guitar (in order from best to worst). I currently play bass in a Latin Jazz Band called Calo’.

Digital Literacy Project Equips Students to Train Others

Eighty students in the Allan Hancock College Mathematics, Engineering, Science Achievement (MESA) program were awarded laptops in the 2010/2011 academic year as part of a statewide program designed to increase digital literacy rates among underserved communities in California.

The laptops, which are also being distributed to students at 32 other community colleges throughout the state, come fully equipped with state-of-the-art technology provided by many of today’s top communications and technology companies, including Hewlett Packard, Microsoft, AT&T and Insight Technology Solutions. With laptops in hand, the Allan Hancock College students, including Lucio Casiano pictured providing training to a community member, will prepare for training members of the community who otherwise would not have access to or knowledge of navigating the Internet.

"We’re pleased with the number of Allan Hancock College MESA students who have chosen to accept this challenge of teaching members of their community how to use a computer to better their lives. This program is a win-win for both students and the community, and Allan Hancock College is proud to support it," said Christine Reed, the college's MESA program academic specialist.

The laptops are available thanks to California Connects, a federally-funded statewide program designed to increase digital literacy and broadband access among underserved communities. California Connects is funded by a $10.9 million Broadband Technology Opportunities Program grant from the U.S. Department of Commerce's National Telecommunications and Information Administration. Approximately 3,000 students at community colleges throughout the state have earned the laptop computers by agreeing to train others over the coming months.

The participating MESA students will be provided with hands-on training in the coming months to prepare them for educating others on how to gain access to and navigate the Internet, all in an effort to increase California's broadband Internet users by more than 61,000 individuals over the next three years and positively impact the digital divide that still exists in many communities. MESA students will use the applications they've learned to teach new users how to use the Internet for essential tasks such as securing gainful employment, exploring higher education opportunities, accessing health and finance resources, utilizing social networks and advancing their general quality of life.

Over the next three years, a total of 5,800 laptops will be distributed to MESA students at 33 California community college campuses.
MESA Club Especially Active this Year

by Ruben Sarino, MESA Club member

At Allan Hancock College, clubs and organizations give students opportunities to learn skills beyond what is taught in the classroom. The MESA Club provides opportunities for any student to become involved in organizing events, leading committees, and community service activities.

Every year, the MESA Club members organize fundraiser and community service events. Fundraisers are geared toward funding the club’s efforts as well as providing scholarships for its active members. This year, club members have been busy working to make many events happen.

Taking advantage of the warm weather in the fall 2011 semester, club members organized a tri-tip barbecue and strawberry shortcake sale, bringing in over $2200. In addition, the club hosted a coin drive for foster children in Santa Maria, raising over $1000 for Christmas presents.

Spring 2012 was kicked off with the annual Masquerade Dance, and despite various setbacks in the days leading to the event, the night was a success. The dance raised $400 which will allow the club to fund upcoming events this spring. Members are currently organizing another tri-tip barbeque, the Opportunity Drawing, and a community service event.

Many of the members are in the MESA program and the club provides an excellent outlet for these students to become involved in their community through a variety of community service opportunities and leadership activities.

The Mathematics, Engineering, Science Achievement (MESA) Program is an academic program that provides a wide range of support services and activities aimed at fostering student achievement and increasing the success and participation they experience while pursuing a degree in mathematics, engineering, computer science, biology, agriculture, architecture, kinesiology, nursing or other science based programs. MESA enables students to prepare for and graduate from a four-year university with a math-based degree. It also seeks to increase the diverse pool of transfer-ready community college students who are prepared to excel as math, engineering and science majors. Through the program, students develop academic and leadership skills, increase educational performance, and gain confidence in their abilities to compete professionally.

"MESA sets high standards while providing the academic tools needed for helping students to succeed. This deceptively simple approach is effective and has produced remarkable results."

Henry T. Yang, Chancellor, UC Santa Barbara

Visit our website at www.hancockcollege.edu; click on MESA under Quick Links
MESA Activities Spring 2012

### Student Success Seminars

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<tr>
<td>Wed, 2/15</td>
<td>10AM-11AM M212 &amp; 5PM-6PM M439</td>
<td>Careering: Resume and Cover Letter Development</td>
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<td>Wed, 3/21</td>
<td>10AM-11AM M212 &amp; 5PM-6PM W31</td>
<td>Networking and Getting Linked via Social Media</td>
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<td>5PM-6PM M439</td>
<td>Industry Connections: Santa Maria Pacific LLC</td>
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<td>Wed, 5/9</td>
<td>10AM-11AM M212 &amp; 5PM-6PM M439</td>
<td>Professionalizing Yourself</td>
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### Field Trips

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<tr>
<td>Friday, 4/27</td>
<td>Cal Poly State University, San Luis Obispo</td>
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<td>Saturday, 4/28</td>
<td>UCSB Regional Competitions</td>
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<td>Friday, 5/11</td>
<td>FzioMed, Inc., San Luis Obispo</td>
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### Workshops, MESA Center

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<td>Thurs, 3/22</td>
<td>4PM – 5PM</td>
<td>Transfer Strategies</td>
<td>MESA Center</td>
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<td>Tues, 4/17</td>
<td>12PM-1PM</td>
<td>Transfer Strategies</td>
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<td>Tues, 3/27</td>
<td>11AM – 12PM</td>
<td>Outta Here</td>
<td>MESA Center</td>
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<tr>
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<td>5PM – 6PM</td>
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<td>11AM – 12PM</td>
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<td>MESA Center</td>
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### MESA Student Recognition Reception

Thursday, May 17, 2012
5:30PM – 8:00PM  Room G106

Transfer Strategies workshops are designed for STEM students in their first or second year at AHC.

Outta Here workshops are designed for STEM students who have applied to university and are transferring fall 2012.