

## Renegade Roundup



...on STEM, MESA, and the State of the Union

February 22, 2013

Colleagues:

It has been nearly two months since I started working for Bakersfield College as president, and boy has the time passed quickly! It seems like every day brings new excitement and new challenges, and sometimes it can be hard to keep track of what is happening from one moment to the next!

In order to keep you informed about what I am working on or just things I enjoy (like students I meet in the community), I've started blogging. You can access the blog at [bcpresident.wordpress.com](http://bcpresident.wordpress.com). You could also follow the blog to receive updates when new content is posted. Enter your email address in the box on the upper right and click Follow to follow the blog. After you register you may need to respond to an email asking you to confirm if you want to follow the blog.

Now for a few highlights...

### **Obama's 2013 State of the Union**

In President Obama's State of the Union speech on February 13th a major message was in regard to manufacturing and the "Made in America" approach to economic improvement. Where does manufacturing obtain their trained, skilled employees? Community colleges, of course! You can read more about my thoughts on the State of the Union and its relation to Bakersfield College in a [recent blog post](#).

### **STEM**

#### **Bakersfield College's Efforts to Train the Future**

In his State of the Union, President Obama said:

*"Tonight, I'm announcing a new challenge...we'll reward schools that develop new partnerships...and create classes that focus on science, technology, engineering, and math, the skills today's employers are looking for to fill the jobs that are there right now and will be there in the future."*

STEM is something Bakersfield College does really well and students from Bakersfield College's STEM programs will help boost the success of the region and economic recovery as they enter the workforce.

#### **What is STEM?**

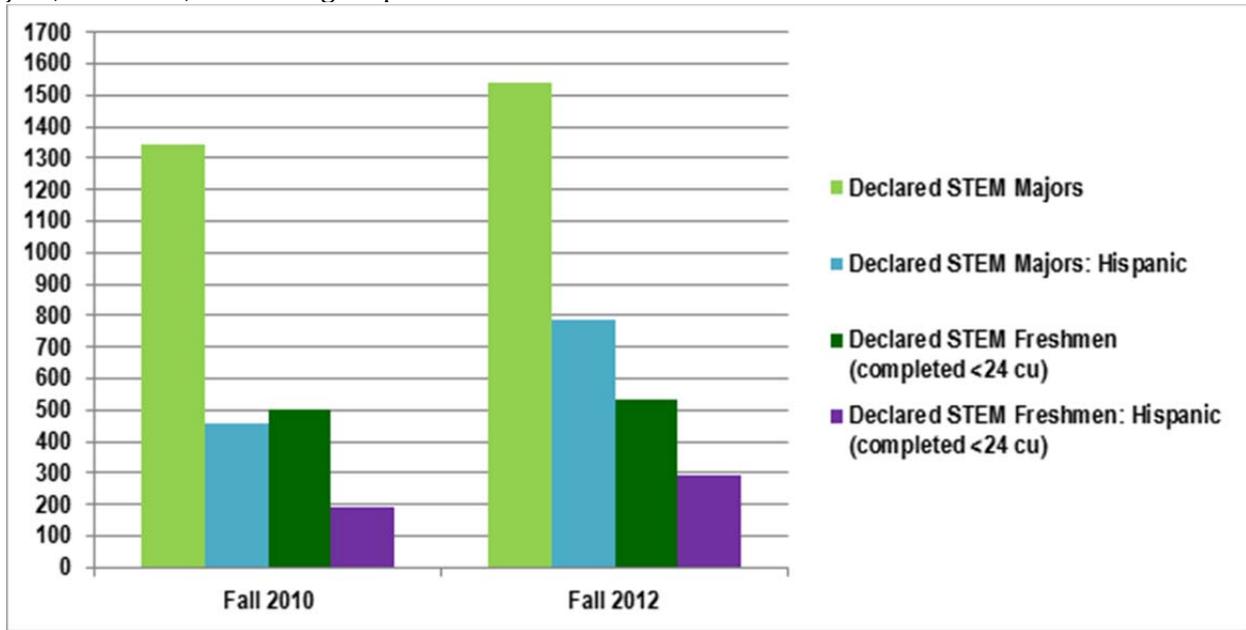
STEM students study coursework in the areas of science, technology, engineering, and mathematics. More specifically, biology, chemistry, physics, engineering, computer science, geology, and mathematics. At Bakersfield College, these students are typically pursuing transfer to a four-year college or university, though some complete an



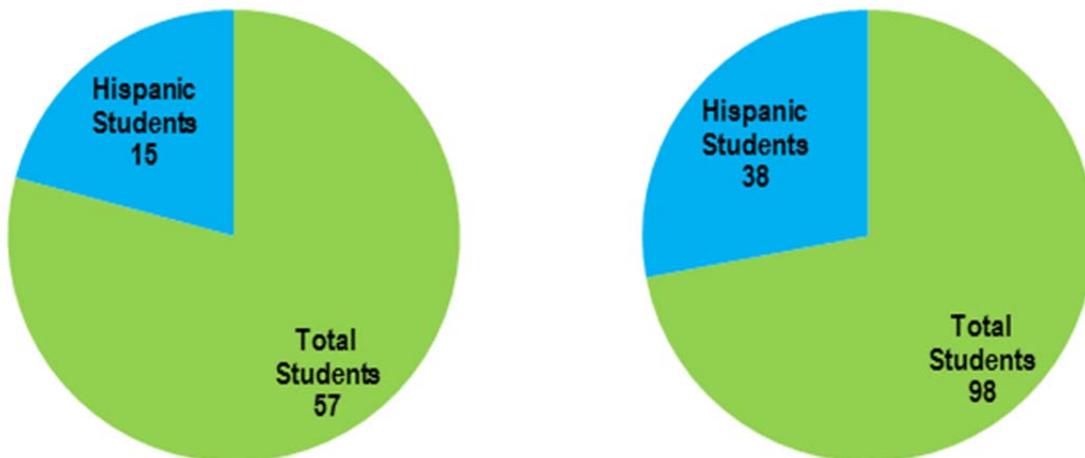
Associate of Science degree.

Bakersfield College received a STEM grant, which is staffed by Rageshwar Goldberg and Cynthia Quintanilla, with Dean Liz Rozell as the Project Director. The program provides dedicated counseling to STEM students, a peer support system, supplemental instruction through STEM Assistants (see photo), pedagogy, scholarships, interaction and engagement, and events.

The bar graph below shows Bakersfield College's STEM enrollment over a two-year period for declared majors, freshmen, and among Hispanics.



The pie charts below show Bakersfield College's transfer efforts for students in STEM programs. In 2009 (chart, left), Bakersfield College transferred 57 students to CSUB in STEM fields; 15 of those students were Hispanic. In 2012 (chart, right), Bakersfield College transferred 98 students to CSUB in STEM fields; 38 of those were Hispanic.



## MESA

### What is the MESA Program?

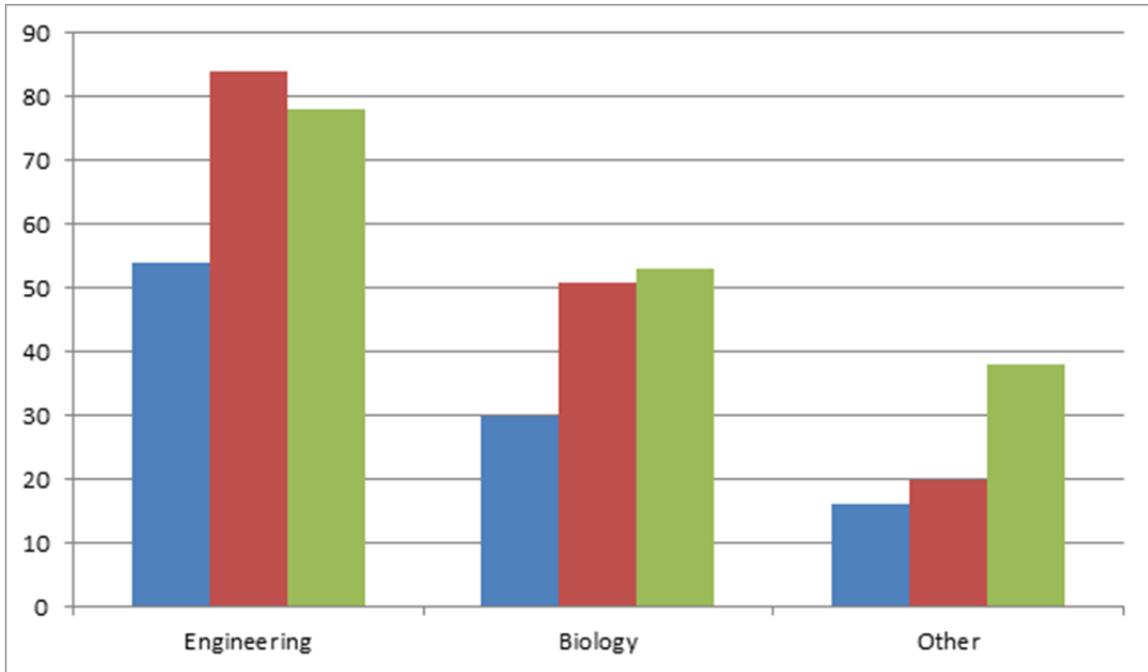
The Mathematics Engineering Science Achievement (MESA) program serves more than 500 students a year. More than 169 of these students are qualified, enrolled MESA students, with another 42 Achievement Science Engineering and Mathematics (ASME) students. The remaining 300+ students come and use the MESA center and services without full admittance to the program, such as students who do not qualify for MESA support, but who are STEM majors. MESA opened its doors as a study center and STEM network hub eight years ago, serving the needs of thousands of students in the process. Consuelo Gonzalez is the coordinator of this program.



The mission of MESA is to enable educationally disadvantaged students to prepare for and graduate from a four year college. These students historically have had the lowest levels of attainment to four year and graduate level programs. Services include tutoring and mentoring (see photo) which help promote educational success. Below is a breakdown of the students who have received MESA services since 2009.

	2009-2010			2010-2011			2011-2012		
	Gender		Total	Gender		Total	Gender		Total
	M	F		M	F		M	F	
<b>TOTAL STUDENTS</b>	65	35	100	112	43	155	112	57	169
<b>ETHNICITY</b>									
Hispanic	45	22	67	80	26	106	62	31	93
Caucasian	7	6	13	16	13	29	30	10	40
African American	2	3	5	6	2	8	6	7	13
Other (APIA, etc)	11	4	15	10	2	12	15	8	23

The bar graph below shows the number of students in different majors over the same three-year period. The category "Other" includes students in computer science, mathematics, chemistry, and more.



***A Few Final Words...***

***A Data Snippet on Budget***

The table below shows you the KCCD budget over the last five years. We continue to work to balance the budget while maintaining our service excellence.

2008-2009	2009-2010	2010-2011	2011-2012	2012-2013
\$111,237,214	\$110,631,307	\$110,029,779	\$102,495,067	\$100,751,908
	-5 percent	-5 percent	-6.8 percent	-1.7 percent

***Oops....***

At the Opening Day event, I misreported the number of staff working for Bakersfield College. There are 717 hard-working, dedicated, focused employees at Bakersfield College (Source: Fast Facts 2012 that can be found on the IR website at <http://tinyurl.com/ad8ved2>. I had reported 1,371, which is the total employees for the Kern Community College District

With Renegade pride and collegiality,  
Sonya