Title: Bicultural Self-Efficacy and Student Achievement and Persistence for Mexican American College Students.

Problem: This proposal will address two problems. The first problem being explored is the relationship between bicultural self-efficacy and Hispanic college student achievement and persistence. The second problem addressed is a theory that grounds an understanding of bicultural self-efficacy to explain student achievement and persistence. The second problem is explored by comparing the experience of first generation Mexican American students in an Advancement Via Individual Determination Higher Education (AHE) student success course with a similar group of students not participating in an AHE course.

There is little recent evidence that shows if a sociocultural cognitive approach, such as cultural self-efficacy, can be useful to understand the educational achievement and persistence of Hispanic students at two year post-secondary institutions, especially as it pertains to the bi-cultural context of Mexican American students. While studies exist that combine self-efficacy with career commitment and achievement at the postsecondary level (Hsieh, Sullivan & Guerra, 2007; Wolf & Betz, 2004), there are few that do the same with bicultural self-efficacy, student achievement, and persistence (Phinney, 1997; Lafromboise, T., Coleman, H. L. K., & Gerton, J., 1993; Lafromboise & Rowe, 1983).

Research on student retention has focused on the gap between college completion and achievement and persistence rates of non-white students. The retention rates are low for Hispanics in general, and for Mexican Americans in particular (Fry, 2011). Best practices for student retention of Hispanic and Mexican American students have been studied in previous research (Gandara, 2009; Cavazos, 2010). One practice receiving in-depth study at the secondary school level is the Advancement Via Individual Determination (AVID) approach to student learning (Mendiola, Watt, & Huerta, 2010; Watt, Huerta, & Alkan, 2011). While initial AHE research with two year and four year colleges (Watt, Huerta, & Alkan, 2011; Watt & Ramirez, 2012) shows promise for Hispanic and Mexican American student retention, it does not address whether or not participation in an AHE class supports an understanding of bicultural self-efficacy.

Contribution: This study seeks to contribute to the literature on biculturalism and diversity as it relates to Mexican American college student achievement and persistence (Roche, Ghazarian, & Fernamdez-Esquer, 2011; Escobedo, 2007; Fiebig, Braid, Ross, Tom & Prinzo, 2010; Torres, 2003, 2004; Torres & Ebelia, 2007; Teranishi, Suarez-Orozco & Suarez-Orozco, 2011; Cavazos and Cavazos, 2010). Understanding ethnic identity is an important component in motivating bicultural student populations to succeed. This study on bicultural self-efficacy will contribute to a contemporary conversation on the importance of ethnic identity development theories for student achievement and persistence. Hispanic populations are projected to have a significant impact on the growth of the U.S. economy (U. S. Bureau of Labor Statistics, 2010). As a result, college completion for these groups will be vital for economic growth. The study will lend support for continuing college-to-career initiatives for Mexican American students that strengthen academic and student development programs for degree attainment and workforce commitment, especially in areas of science, technology, engineering and mathematics (STEM). The study will give credence to the importance of developing educational theory and practice that prepares workers for valuing diversity in the workplace (King, Gulick & Avery, 2010).
Research Questions: The following research questions are proposed.

1. What is the relationship between bicultural self-efficacy and student achievement for Mexican American students attending a two-year college?
2. What is the relationship between bicultural self-efficacy and persistence for Mexican American students attending a two-year college?
3. What is the difference between bicultural self-efficacy scores for Mexican American students enrolled in the AHE structure course and those who are not enrolled in an AHE structured course?
4. How does participation in an AHE structured class explain the influence of bicultural self-efficacy for Mexican American student achievement and persistence at a two year college?

Study Procedures: The study will employ a mixed methods design to explore the impact of bicultural self-efficacy on college student achievement and persistence. The mixed methods model of QUAN-qual, or explanatory, model will be used. The model is often used to develop a typology from quantitative data to identify themes that emerge from qualitative procedures such as interviews or observations (Mays, Mills, & Airasian 2009).

The research design will compare two groups, a study group and control group, of first generation Mexican American students. Each group will take the Bicultural Self Efficacy Scale Minority Adult survey (Soriano & Bandura, 2005). The scale measures bicultural self-efficacy for minority adults using a likert model response format. The study group will participate in an AVID for Higher Education (AHE) structured student success course, and the control group will not. A follow-up focus group interview with participants from the study group will be conducted for the qualitative purposes of the research. The focus group questions will be generated from factors resulting from a factorial analysis of responses to the BISES-MA survey.

A factor analysis will be conducted to derive factors from the BISES-MA survey that can be correlated with student achievement and persistence. An analysis of variance (ANOVA) will be computed between the study group and control group mean responses to the BISES-MA survey. The ANOVA will determine if a significant difference exists between the two groups on bicultural self-efficacy. A correlation measure will be used for both groups to determine relationships to end of term grade point average (GPA) to measure achievement and pre-registration rates for either summer or fall semesters to measure persistence. The qualitative component will explore the themes that emerge from the focus group interaction on questions about participants’ perceived understanding of bicultural self-efficacy based on their common experience of an AHE structured learning course. These elements of focus group interaction -- self-reflexivity of individuals’ perceived understanding of bicultural self-efficacy and the group experience of the AHE structured course -- will ground a theory in “data from participants who have experienced the process” of focus group interaction (Strauss & Corbin, 1998 in Creswell, 2013, p. 83). As a result of the focus group interaction, this process will yield an explanation on how the influence of bicultural self-efficacy supports academic achievement and persistence for Mexican America students at a two year college.