

PURPOSEFUL HISPANIC-SERVING INSTITUTION IDENTITY FORMATION FOR  
LATINO STUDENT SUCCESS:

A Conceptual Model and Plan to Create a Culture Supporting Latino Student Success at a  
Predominantly White Community College Planning to become a Hispanic-Serving Institution

By

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**Abstract**

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This study and practical application is intended to provide institutional guidance in the absence of direct research findings about creating an effective institutional culture at a predominantly White community college transitioning to a Hispanic-Serving Institution (HSI). Many higher education institutions in the United States are on the verge of HSI designation based on demographic shifts in student body composition, but becoming an HSI does not guarantee an institution is ready to support Latino student success in terms of equitable educational attainment (F. Contreras, Malcom, & Bensimon, 2008). Since the literature is nearly silent on institutional cultures which support Latino student success in any higher education context, this research will attempt to bridge the gap between what is known about Latina/o student retention and persistence at the community college and a conceptual model of a supportive institutional culture with the practical outcome of a plan for institutional change. Qualitative research on Latina/o student achievement at community colleges was analyzed utilizing thematic synthesis to develop a conceptual model of Latina/o community college student success. From these themes a conceptual model of institutional culture supportive of Latina/o student success is proposed as well as a planning process to facilitate rethinking the organizational culture to better support Latina/o students.

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## Chapter 1. Introduction

The United States is facing a crisis in its ability to prepare citizens to function in a rapidly changing, information and technology rich world, and to equip those citizens with the twenty-first century skills needed to remain internationally competitive. National policy direction recognizes this growing gap and sets aggressive targets for increasing college completion (Kanter, 2011). The retiring baby boom generation led the world in educational attainment while the youth taking their place are increasingly diverse and exhibiting wide disparities in two-year and four-year college completion. Educational attainment is socioeconomically stratified and large achievement gaps exist by race/ethnicity with White and Asian population educational attainment much higher than Latinos, Blacks and Native Americans. The largest and fastest growing minority group in the United States is Latina/o<sup>1</sup> and these students tend to enroll in open access two-year colleges thus placing themselves on the trajectory least likely to result in college completion (Zumeta & Hunt, 2012).

Rapid growth has also occurred in the number of higher education institutions designated by the federal government as Hispanic-serving, which is defined as a student body comprised of at least 25% Latino students. Because of the high numbers of degrees granted to Latinos at these institutions, Hispanic-Serving Institutions (HSIs) are a focus of public policy related to the college completion agenda. HSIs are often Predominantly White Institutions (PWIs) that achieved their status by demographic shifts leading to changes in student composition rather than through intentional planning and development of a mission and culture to better serve Latino students. Contreras et al. state, “their conversion seems to be accidental and evolutionary rather

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<sup>1</sup> The term Latina/o refers to all groups of Hispanic origin, including, but not limited to people of Mexican, Puerto Rican, Central American, and South American descent. To increase readability, the remainder of the document will use the term Latino as inclusive of both male and female.

than strategically planned,” (Contreras et al., 2008). The focus of this study and project is to create a plan to increase the academic success and completion of Latino students by purposefully shifting the culture of historically predominantly White community colleges towards a more supportive culture for Latino students.

### **National College Completion Agenda and Latino Students**

In his first State of the Union address, President Obama noted declining educational attainment in the United States relative to the rest of the world and advanced the goal, “By 2020, America will once again have the highest proportion of college graduates in the world,” (Obama, 2009). These words became a catalyst and rallying cry for a whole series of national, state, and non-governmental organization college completion initiatives. College completion has been framed as an economic necessity to assure international competitiveness and economic prosperity in a rapidly changing knowledge economy that is reliant on a highly educated workforce (Zumeta & Hunt, 2012). The major forces at play include: 1) a shifting economy and change in workforce needs; 2) decreasing overall educational attainment driven in part by changing demographics and wide educational achievement gaps; 3) a need for efficiency which positions non-selective institutions and especially community colleges as central players in converting student access to student completion. The tone of policy discourse is urgent and pragmatic emphasizing the consequences of lower college attainment such as lower workforce productivity and taxes, decreased civic engagement and higher social costs for prisons or welfare programs. Equity and social justice arguments have been nearly nonexistent in this policy discourse.

A few generations ago, a high school diploma was adequate preparation for a well-paying job. That economy no longer exists and now 59% of jobs require postsecondary education. In

another decade, 63% of jobs will require postsecondary education. The Georgetown University Center on Education and the Workforce predicts that by 2018 we will need 22 million new college degrees and 4.7 million new postsecondary certificates, for a shortfall of 300,000 college graduates each year between 2008 and 2018 (Carnevale, Smith, & Strohl, 2010). It is worth noting that while college completion tends to focus on the bachelor's degree, there is a sizable gap in workforce demand at the less than associate degree level.

Data from the Organization for Economic Co-operation and Development are often cited to illustrate declining educational attainment in the United States and the rest of the world. In 2012, the United States ranked 2<sup>nd</sup> in the world in postsecondary attainment of 55-64-year-olds, but 10<sup>th</sup> for 25-34-year-olds (OECD, 2012).

The intense national policy focus on college completion has highlighted the disparities in educational attainment between the rich and poor, female and male, and among racial and ethnic groups. When educational achievement is disaggregated, we find that the fastest growing segments of the population have the lowest educational attainment. Of particular concern is Latinos, the largest minority group in the United States and a group that tends to enroll in 2-year colleges (Zumeta & Hunt, 2012), or minority-serving institutions (Snyder & Dillow, 2012). In Washington State, where the non-white labor force is expected to reach 19% by 2030, the State Board for Community and Technical Colleges repeats the tone of the national policy discourse: "As future economic growth relies more and more on productivity improvement, raising the education levels of these fast-growing racial and ethnic minorities becomes a major policy concern. It underscores the need to successfully address the attainment gap that persists for students of color compared to their white counterparts." (Prince, 2009). Saenz & Ponjuan (2009) reinforce human capital arguments, "Given the ongoing demographic shifts that point to a

younger, more Latino labor supply, this population represents the fastest growing employment pool yet the most underutilized talent pool. America's human capital capacity and global competitiveness will be increasingly dependent on this growing segment of the population.” (Saenz & Ponjuan, 2009). College completion policy discourse is increasingly focused on closing the achievement gap and finding ways to do this through community colleges and non-selective institutions (Aud et al., 2010; Contreras, Flores-Ragade, Lee, & McGuire, 2011; Fry, 2009; Fry, 2004; Kirst, 2003; Lee et al., 2011). The argument is also being made that a sole focus on a small segment of the educational pathway such as the community college will not successfully address the achievement gap. Only through adopting a preschool-to-graduate-school (P-20) problem-solving framework will progress be possible (Bahr, 2011; Oliva & Nora, 2004; Pérez & Ceja, 2010b).

The intersection of a rapidly growing Latino population with lower educational access and attainment coupled with workforce trends that increasingly require employees with at least some postsecondary education sets the stage for significant negative consequences for the health of the community and the vitality of the local economy. In their book, *The Latino Education Crisis*, Gándara and Contreras write, “As a group, Latino students today perform academically at levels that will consign them to live as members of a permanent underclass in American society. Moreover, their situation is projected to worsen over time. But as alarming as this is for Latinos, it is equally so for the U.S. population as a whole; neither the economy nor the social fabric can afford to relegate so many young people to the margins of society” (Gándara & Contreras, 2009).

The College Board recognized Latino educational attainment as essential to national college completion goals and created The *College Completion Agenda Research and Context Brief: Latino Education* specifically addressing the issue of developing a healthy educational

pipeline for Latinos and supporting them through college completion (Contreras et al., 2011).

The degree of human capital loss resulting from past and continued lower educational attainment for Latinos is significant, and as Sólorzano, Villalpando & Oseguera state, “this lack of achievement and attainment at each point in the educational pipeline has resulted in both a loss of talent to U.S. society and a loss of important role models for the next generation of Latino students who aspire to educational and professional careers,”(Sólorzano, Villalpando, & Oseguera, 2005).

### **Focus on Community Colleges and HSIs to Increase College Completion**

Latinos are more likely to enroll in 2-year colleges regardless of the quality of their academic preparation. Of the Latinos that enrolled in undergraduate school in 2011, 46% chose a 4-year school and 54% chose a 2-year school (NCES, 2012 Table 241.5). This is consistent with 30 years of data indicating the proportion of traditional-age Latino postsecondary students who chose community college as the first institution of attendance has ranged between 53 and 56% (Adelman, 2005; Bailey, Jenkins, & Leinbach, 2005b).

### **Community College**

The charge to simultaneously increase the academic achievement of populations that have consistently shown lower educational attainment and to do so with flat or decreased funding has been placed squarely in the lap of community colleges. Community colleges are significant players in U.S. higher education claiming 37% of all students enrolled in degree granting institutions in 2011 (Snyder & Dillow, 2012). The approximately 1,200 community colleges are geographically dispersed, making them highly accessible; they are predominantly public institutions, and tuition is substantially below the cost of 4-year colleges (Cohen & Brawer, 2008). In 2011, the tuition for a public, in-district community college student was \$3,130 versus

\$8,660 for public, in-state 4-year college tuition (AACC, 2013). Due to geographic and financial accessibility and lack of selectivity in admissions, these institutions have been termed “open door” or “democracy’s college”. Community colleges have had an evolving mission includes:

- (a) preparing students for transfer to a 4-year institution to pursue a bachelor’s degree;
- (b) preparing students for entry directly into the workforce in living wage and high demand position;
- (c) providing a second chance for high school equivalency completion or to learn English as a second language instruction (termed “Basic Skills”);
- (d) and providing personal enrichment classes for individuals and skill-upgrade ‘contract training’ for incumbent workers.

Low cost and accessibility combined with a range of flexible course options have caused community colleges to serve a diverse range of students. They tend to be older, with 46% over the age of 24. They are more likely to attend college part-time (63%) compared to 22% at four-year colleges (Cohen & Brawer, 2008; McIntosh & Rouse, 2009). Community colleges enroll 56% of Native American students, 49% of Latino students, 44% of Asian/Pacific Islander students, and 42% of Black students. Almost half (40%) of community college students are the first generation in their family to attend college. The majority of students are working while attending school. Forty percent of part-time students are employed full-time and an additional 47% are employed part-time (AACC, 2013). Many have unclear educational goals, are under-prepared for college-level work, and have limited English language proficiency (Cohen & Brawer, 2008; Provasnik & Planty, 2008).

Because of the diversity of the student body and lack of adequate preparation for college-level work, remedial education is becoming a larger component of the mission at the community college. While 60% of all students require some remediation in their first year, more than 75% of Black and Latino students require remediation. This massive national need for remediation is

one of the major obstacles for the college completion agenda. Most students are unprepared for college-level work and being placed into remedial coursework significantly impacts the likelihood of college completion (Bailey, Jenkins, & Leinbach, 2005b). Recent research on the remedial or basic skills function also questions whether community colleges are taking remediation too far by setting the bar higher than a 4-year college might, thus serving as a gatekeeper to the 4-year institutions (Attewell, Lavin, Domina, & Levey, 2006).

Meeting the needs of diverse students at their level of preparation, providing remediation and acceleration, and preparing them for transfer or workforce has become the specialty of the community college and has been the basis of their equity agenda (Bailey & Morest, 2006). But despite striving for equity, as Bailey, Jenkins, and Leinbach note, “Enrollment and outcome distributions in American postsecondary education are stratified by race/ethnicity, household income, and parents’ level of education.” (Bailey, Jenkins, & Leinbach, 2005b). Even after accounting for degree intent and controlling for family background, students who initially begin post-secondary education at community colleges are 15% less likely to complete a bachelor’s degree (Long & Kurlaender, 2009). These lower outcomes are in part due to community colleges’ lack of mission focus and lack of selectivity, compounded by low funding levels. Community colleges have consistently had the lowest funding level per full-time-equivalent (FTE) of any higher education institution in the United States (American Institutes for Research, 2012). Fewer resources translate into limited advising and support services and fewer full-time faculty. In addition to outcomes in degree attainment being stratified across types of higher education institutions, the utilization of community colleges is also stratified, with middle class families accessing transfer pathways and low-income, first-generation students enrolling in workforce programs or basic skills (Bailey, Jenkins, & Leinbach, 2005b; McIntosh & Rouse,

2009). This portrait of the community college at the epicenter of the national college completion agenda is of an institution with high social justice aspirations, insufficient resources for the difficult task of meeting the needs of the most vulnerable populations, and inadequate completion outcomes.

### **Hispanic-Serving Institutions**

Hispanic-Serving Institutions (HSIs) are receiving national policy attention as a potential productive area of focus to increase Latino higher education degree completion. Nearly half of all Latino students enroll in a HSI and over half of all HSIs are community colleges, predominantly located in California (Bridges, Kinzie, Nelson Laird, & Kuh, 2008). More than half (56%) of all undergraduate degrees awarded to Latinos are from HSIs (Jackson Mercer & Stedman, 2008). Recent research utilizing 2004/09 Beginning Postsecondary Students Longitudinal Study (BPS:04/09) data found Latinos enrolled in community college HSIs compared with those not in HSIs more likely to be older males with transfer degree aspirations who are the first in their family to attend college. (Núñez, Johnelle Sparks, & Hernández, 2011). A positive finding in a study of California HSIs revealed a higher 4-year transfer rate for Latinos attending 2-year HSIs than those not enrolled at a HSI (Laden, Hagedorn, & Perrakis, 2008). Also, HSIs with a critical mass of Latino faculty, administrators and programs have been shown to have a positive effect on outcomes (Bridges et al., 2008). While a substantial number of Latinos are accessing HSIs, research has questioned whether HSIs are providing equitable educational attainment outcomes for Latinos compared to overall student educational attainment. Because most HSIs started as predominantly White institutions (PWIs) and transitioned to HSI status when their Latino enrollments grew to 25% or more, they have less clarity of mission than Historically Black Colleges and Universities (HBCUs) or tribal colleges (Contreras et al., 2008).

## **Latino Demographics**

The data in the upcoming section will paint a picture of demographic trends, post-secondary access and educational attainment for Latinos nationally and in the state of Washington. The data show the growth of the Latino population, positive trends in high school completion, and increasing college access utilizing the community college pathway. They also show a lack of preparedness for college and high enrollments in remedial coursework, and alarming gaps in college completion caused in part by the selection of community college as the starting point for the educational pathway.

Latinos deserve specific policy attention because their census of 51.9 million in 2011 makes them the largest minority group in the United States (Motel & Patten, 2013). By 2060, this population will grow by 120% to 122 million (US Census Bureau, 2012). In 2011, Latinos became the largest minority group on 4-year college campuses (Fry & Lopez, 2012). The Latino population is predominantly of Mexican descent (64%). Of the 33.7 million Mexican-origin Latinos residing in the United States in 2012 the majority (22.3 million) were born in the U.S., while 11.4 million were immigrants. This is a young population which is significant when thinking about public education and entry into college. Mexican-origin Latinos median age is 25, a few years younger than Latinos overall, and significantly lower than the U.S. population that has a median age of 37 (Gonzalez-Barrera & Lopez, 2013).

With a 12% Latino population, Washington state ranks 12th in the nation in number of Latino residents (US Census Bureau, 2010). Mirroring the nation, this is a young population that currently makes up 20% of public school students in Washington (Office of Superintendent of Public Instruction, 2012).

Latino families are more likely to be in poverty, which impacts the level of resources they have to support college attendance for their children. The median household income for Latinos is \$39,000 versus \$50,000 for the U.S. overall equating to a 26% poverty rate versus 16% overall (Motel & Patten, 2013). In Washington, 38% of Latinos 17 and under live in poverty (Contreras, 2013; Motel & Patten, 2013).

In 2011, nearly a quarter of all births nationwide were to Latina mothers and almost half of those were to unmarried women (Motel & Patten, 2013). Eight percent of young Latinas age 16-25 are mothers, and to not in school or the labor force, while half that percentage of Whites and Blacks fall into that category (Fry, 2009).

## **Latino Educational Attainment**

### **College Enrollment**

Nationally, Latino college enrollment reached an all-time high in 2011. Nearly half (46%) of 18-24 year old high school completers enrolled in a 2 or 4-year college (Fry & Lopez, 2012). Record level high school completion and subsequent college enrollment indicate that college completion is becoming less a factor of access and more related to equitable preparation and more supportive systems at the college level for better completion outcomes. According to a Washington State University study of 2009 high school graduates, the percent enrolling in college within year of high school completion by race/ethnicity was 47% American Indians/Alaska Natives, 49% Latino, 64% Black, 65% White, 76% Asian (Contreras, 2013). Just 7% of the Washington State public 4-year college enrollment in 2011 was Latino compared to White 63%, Asian 12%, Black 3%, (State of Washington, Office of Financial Management, 2012). In 2009, the community and technical college system enrollments were 13% Latino; 66% White, 11% Asian; and 6% Black – all percentages that are higher than the Washington State

percent of population. However, when only those students enrolled in college-level work are counted, the proportion of Latinos enrolled in community college drops to below the Washington population level for an access ratio of 0.87. Any result below 1.0 indicates that the population is enrolled at less than parity with the population. When high demand, high wage fields are disaggregated, the access ratio for Latinos is below parity in all categories (Prince, 2009).

### **College Completion**

The most recent large-scale longitudinal study of college completion, the 2004/09 Beginning Postsecondary Students Longitudinal Study (BPS:04/09) is based on a nationally representative sample (n=19,000) of undergraduates who entered postsecondary education for the first time during the 2003–04 academic year and follows these students for six years until 2008-09. The table below describes the attainment outcomes of the entire cohort at any institution they might have transferred to during that time period (Radford, Berkner, Wheelless, & Shepherd, 2010):

*Table 1 6-Year Degree Attainment 2003-04 Entering Cohort*

	Cert	AA	BA/BS	Still Enrolled	No Degree Not Enroll
Overall Attainment	9%	9%	31%	15%	35%
Students First Enrolling in 2-Year College	8%	14%	12%	20%	36%
2-Year Students with Vocational Intent	10%	20%	6%	17%	47%
2-Year Students with Transfer Intent	5%	15%	14%	21%	45%
Students First Enrolling in 4-Year College	2%	5%	58%	12%	24%

Consistent with previous longitudinal research using NELS data, students who first enroll in a 4-year institution will graduate with a bachelor degree at nearly five times the rate of those who start at a 2-year college. When 2-year students are disaggregated by degree type to isolate those who intend to secure a transfer degree, the bachelor completion rate increases slightly to 14%.

Using the same data set, Table 2 further disaggregates the educational outcomes of those who started at a 2-year college. The associate's degree attainment for Asians (15%) and Whites (16%) is dramatically higher than Latinos (12%) and Blacks (10%). The gap is larger at the bachelor's degree level Asians (19%) and Whites (13%) compared to Latinos (8%) and Blacks (6%).

*Table 2 6-Year Degree Attainment for 2003-04 Entering Cohort in 2-year College by Race/Ethnicity*

	Cert	AA	BA/BS	Still Enrolled	No Degree Not Enrolled
White	9%	16%	13%	17%	44%
Latino	6%	12%	8%	21%	53%
Black	10%	10%	6%	25%	49%
Asian	7%	15%	19%	29%	32%

Bailey, Jenkins, & Leinbach disaggregate 2-year institutions into public and private and calculate Latino student attainment rates as follows (Bailey, Jenkins, & Leinbach, 2005b):

*Table 3 Latino Degree Attainment in 6 Years at 2-Year Institutions by Institutional Control*

	Cert	AA	BA/BS
Public 2-Year	9%	15%	5%
Private 2-Year	28%	29%	6%

Previous research utilizing older data from the National Education Longitudinal Study (NELS: 88:00), a nationally representative sample of eighth-graders first surveyed in 1988 and then resurveyed in 1990, 1992, 1994, and 2000, found results consistent with Radford et al. Analysis of NELS data found only 7% of Latinos who started college in a two-year institution had obtained a bachelor's degree by 2000 while 44% of those who started at a 4-year institution completed a bachelor's degree (Hoachlander, Sikora, Horn, & Carroll, 2003; Swail, Cabrera, Lee, & Pew Hispanic Center., 2004).

In Washington 30% of Latinos who start at a community college have either completed a degree or certificate, transferred, or remain enrolled after six years. This compares to 50% for Asians and 48% for Whites. The 30% breaks down as follows for Latinos: 19% received an associate degree, 3% received a certificate, 1% still enrolled, and 7% transferred without completing a degree or certificate. The alarming fact is that 70% of Latinos left higher education, the highest loss rate of any racial/ethnic group. Thirty percent of those who left did so quickly, after the first quarter, another 60% left after the first year (Prince, 2009).

### **Odds of Community College Completion for Latino Students**

Research that examines community college completion specifically for Latino students is limited, although information can be derived from general community college research that disaggregates Latino outcomes or research that looks at the community college pathway to the baccalaureate for Latino students. Research on college completion for Latinos who directly enroll in 4-year institutions is more readily available but less likely to provide meaningful information due to the self-selection of students into these environments and substantially different school context.

In their examination of Latino college degree attainment, Arbona and Nora used NELS 88:00 data. The sample contained traditional college-aged Latinos who enrolled in community college (n=517) and 4-year institutions (n=408). The odds of completing a bachelor degree for those who started at a community college increased if students were female (33% more likely than male), and if they already had expectations to complete a college degree by 10th grade (93% more likely to complete). Consistent with previous research on community college students (Adelman, 1999), this study found if the student completed a rigorous academic curriculum in high school they were 59% more likely to complete a bachelor's degree.

Enrollment patterns such as starting college without delay (93% more likely to complete) and enrolling continuously (67% more likely to complete) also contributed to completion. Although many conceptual models identify environmental pull factors such as work and family responsibilities as factors in attrition, in this study student employment and making financial contributions to the family did not emerge as negative factors related to college attainment (Arbona & Nora, 2007).

The decision whether to initially enroll in a 4-year versus a 2-year institution significantly impacts degree completion. Nuñez & Kim examined the factors that lead to a decision to enroll into a 4-year institution utilizing data at the individual student, school and state level. As with previous studies, parents had a significant impact on college enrollment: parental expectations, parental involvement in school, and parent involvement in college planning had a significantly large positive effect on Latino students' college enrollment. Students with higher educational expectations were just over 40% more likely to enroll in a four-year institution. Taking middle-level and especially advanced mathematics was particularly strongly associated with enrollment in a four-year institution. Latino students who took middle-level math were just over four times as likely to enroll in a four-year institution, compared with not enrolling at all. Latino students who took advanced-level math were about 45 times more likely to enroll in a four-year institution, compared with not enrolling at all (Núñez & Kim, 2012).

Zarate & Gallimore have found differences in college enrollment prediction factors between male and female Latinos. Enrollment is more likely for Latinos with high academic achievement, parental support and language proficiency. Predictors for Latinas included teacher-rated performance and seeking college counseling in high school (Zarate & Gallimore, 2005).

Achievement of intermediate outcomes or milestones can help to increase the odds of completion for all community college students including those that need remediation (Moore, Offenstein, & Shulock, 2009a; Roksa & Calcagno, 2010). In a study of 247,493 California community college students, factors that increased the probability of degree completions were identified. For example, students who completed college level math in the first year versus those who didn't had a probability of completion of 61% and 22% respectively (Moore, Offenstein, & Shulock, 2009a). Adelman found that completion of college level math is a significant predictor of two-year degree completion and transfer for all students (Adelman, 2006), and for low-income students, completion of two college-level math courses dramatically increases the likelihood of transfer (Cabrera, Burkum, & LaNasa, 2005). Those who completed college-level English in their first year versus those who didn't had a 51% probability of completion versus 21%.

Completion of a college success course was more impactful for traditional-age students but the probability of all those who enrolled in this course versus those who didn't was 35% versus 27% respectively. Achieving 20 college-level credits in the first year made a large difference in probability of completion (58% vs. 19%). Taking summer credits was also a positive indicator (45% vs. 15%). Students passing the majority of their classes to earn a credit completion ratio of 80% or higher increased their probability of completion to 39% versus 15% for those who did not (Moore, Offenstein, & Shulock, 2009a). Several other researches have confirmed the credit accumulation findings (July/August 2007; Adelman, 2005; Arbona & Nora, 2007; Calcagno, Crosta, Bailey, & Jenkins, 2007; Prince & Jenkins, 2005; Roksa & Calcagno, 2010). Especially significant is that Latino students' cumulative GPA at the end of the first year of college is three times more important in college persistence for Latinos as compared to White students (Nora & Cabrera, 1996). In addition, several factors related to attendance pattern

increased the probability of completion including full-time attendance in first term (39% vs. 21%), continuous enrollment (36% vs. 29%), and on-time registration (32% vs. 24%) (Moore, Offenstien, & Shulock, 2009a). Again, these findings have been supported in multiple research studies (Adelman, 2005; Arbona & Nora, 2007).

Roksa & Calcagno examined the transfer rates of first-time degree-seeking students who entered Florida community colleges without meeting the Florida standards for academic preparation. Twenty percent of the 20,900 unprepared student studied were able to transfer as compared to the 34% of the well-prepared students who entered. In addition, the attainment of intermediate outcomes of completion of college-level math and earning 24, 36, and 48 college-level credits were significantly predictive of transfer (Roksa & Calcagno, 2010). Despite this accomplishment, students still lag their counterparts in attainment if they are unprepared. In another study, Latino ESL students and those that tested into remediation were negatively correlated with the achievement of most milestones toward degree completion (Leinbach & Jenkins, 2008).

Students who are sure of their direction and enter a program of study in their first year are twice as likely to transfer, complete a certificate or degree than those that do not. Students who begin a program of study in the first year were twice as likely to complete a certificate or degree or transfer as students who delayed (Moore & Shulock, 2011). In California community colleges, Latino students are less likely than White and Asian students to enter a program of study (Shulock, Moore, Ceja, & Lang, 2007). Jenkins & Cho also found that all community college students who enter a program of study within a year increase their chance of completion (D. Jenkins & Cho, 2012). However, low socioeconomic status students are less likely to enter a

program of study, and if they do, it is likely in low-wage professional or technical program (Jenkins & Weiss, 2011).

### **Latino Post-Secondary Educational Attainment**

Latinos attain bachelor degrees at a little less than half the rate of the U.S. population. The percentage of the U.S. adult population 25 years of age and over with a bachelor's degree increased from 26% to 30% from 2001 to 2011 while Latinos increased from 11% to 14% (Snyder & Dillow, 2012). Since 1971 the gap between Latino and White degree attainment has grown by more than 11 percentage points (Gonzalez & Ballysingh, 2012). In Washington (82%) of Latinos are of Mexican descent. In 2010, 8% of Mexican-origin Latinos ages 25 and older had at least a bachelor's degree – about half the rate of Latinos as a whole (Motel & Patten, 2013). 2012 data on educational attainment for Mexican-Origin Latinos is shown below (Gonzalez-Barrera & Lopez, 2013):

*Table 4 Educational Attainment for Mexican-Origin Latinos*

	Mexican Origin	Mexican Foreign Born	Mexican Native Born	All Hispanics
<b>Educational Attainment (ages 25 and older)</b>				
Less than high school diplomat	22%	49%	7%	20%
High school diploma or equivalent	14%	20%	11%	12%
Some college	11%	10%	11%	12%
Bachelor's degree or more	5%	5%	5%	7%

Educational attainment for Latinos varies as subpopulations are disaggregated and examined by socio-economic status, citizenship and gender. As shown above, Latinos of Mexican descent tend to have lower educational attainment than other Latinos. When data are further disaggregated by socioeconomic status and foreign-born, the range of attainment is fairly large but still well below all other Latino subgroups.

Educational attainment data for undocumented students is not readily available. Research on bachelor's degree attainment in the Southwest reported noncitizen Latinos completing at half the rate of U.S.-born Latinos (Flores & Kyle, 2010). Research conducted in Washington state indicates these students experience additional barriers to educational attainment including pervasive presence of fear of deportation resulting in separation from family members and financial difficulty paying for college due to lack of access to financial aid (Contreras , 2009).

### **College Completion Agenda - Unique Challenges Faced by Latinos**

The Latino demographics section above points to many risk factors for educational attainment, including citizenship, lower socio-economic status, lower parental educational attainment, a greater number of first generation attending college, and students needing English language skill development. These risk factors are compounded by structural inequalities such as segregated patterns of residence and a higher likelihood of attending a lower quality school with fewer resources, less qualified teachers, and fewer curricular options. Families have less social and cultural capital to advocate for their students throughout high school to assure they are adequately prepared for college-level work. In many states, there is limited systems alignment between high schools and community college. Latinos are more likely to attend schools with minimal college counseling, thus limiting access to accurate information about college admissions, placement testing, and access to financial aid.. Latinos tend to limit their college choice process and predominantly select a community college. Choosing a community college can be financially beneficial if students are not diverted from attainment of a bachelor's degree if that is their goal, and if 2-year and 4-year institutions are actively working to ease the structural barriers of transition. Strong concerns have been expressed about the ability of community colleges to support Latino students to degree completion and transfer to a 4-year institution

(Contreras, 2011; Gándara & Contreras, 2009; Ornelas & Solorzano, 2004). Once in community college, Latinos are often placed in remedial courses, reducing the probability of either a 2 or 4-year degree. Several states have removed remedial courses from their public four-year universities and offer them only at community colleges (Bettinger & Long, 2005). This creates a structural barrier to 4-year college entry and could further reduce the likelihood that Latino students will obtain a bachelor's degree. Because many community colleges are PWIs, Latinos may face an unwelcoming institutional climate that diminishes their chances of success.

Research has consistently found higher graduation rates among students who pursued a rigorous academic curriculum, were able to attend college full time and continuously without delay in entry, and whose parents also went to college (Adelman, 1999; Cabrera et al., 2005). The data indicate that this is quite the opposite profile of most Latino students. If the college completion agenda accountability measures are defined narrowly, community colleges could attempt to game the system by becoming more selective and only enrolling students who are most likely to be successful. The American Community College predicts that screening and placement will become more prevalent and students will be given less choice in course selection (Cohen & Brawer, 2008). A move in this direction could result in more tracking into vocational or shorter-term programs to assure completion or more limited access for students who are academically unprepared. In “Community Colleges as Gateways and Gatekeepers: Moving Beyond the Access ‘Saga’ Toward Outcome Equity”, Dowd expressed concerns about drifting away from the community college equity agenda and has proposed accountability measures that include ‘outcome equity’ rather than a simple completion measurement (Dowd, 2007). Another potential unique issue to Latinos is in the construction of college completion accountability measures and financial aid policy that can be restrictive in time frame and often assume students

will be academically prepared and attending full-time, factors that are unlikely to be true for Latino students (Bailey, Calcagno, Jenkins, Leinbach, & Kienzl, 2006).

### **Research Questions and Rationale for Methodology**

This chapter illustrates the rapid growth of the Latino student population, the persistent educational attainment gap, and the focus of college completion policy on community colleges and HSIs. While demographics are shifting and many higher education institutions in the United States are on the verge of HSI designation, research indicates that becoming an HSI does not guarantee an institution is ready to support Latino student success in terms of equitable educational attainment (Contreras et al., 2008). Higher education institutions need to proactively prepare in order to be effective HSIs, but little information exists about the type of institutional culture that needs to be fostered. This research asks three related questions of interest to leaders and policymakers at community colleges preparing to become HSIs: What should be included in a conceptual model of a community college institutional culture that is supportive of Latino student success? What theory of organizational change would be appropriate for a PWI attempting to build a culture supportive of Latino student success? What action steps, benchmarks and assessments would be appropriate to purposefully create a community college culture prepared to support equitable access and attainment for Latino students?

Since the literature is nearly silent on institutional cultures that support Latino student success in any higher education context, this research will attempt to bridge the gap between what is known about Latino student retention, persistence and completion at the community college and a conceptual model of a supportive institutional culture with the practical outcome of a plan for institutional change to alter the culture to become more supportive of Latino students.

## **Chapter 2. Literature Review-Latino Student College Retention**

To create a plan to build a college supportive of Latino student success, the starting place is a conceptual model of Latino student retention at community colleges. This chapter provides a literature review of college retention from traditional research at 4-year residential institutions to new theories that account for more diverse students at 2-year and commuter colleges. Though college student retention has been studied extensively for the past 70 years and more than 1,400 research studies completed (Seidman, 2012), it is still described as an ill-structured problem that generates multiple solutions with uncertain outcomes (Braxton, Hirschy, & McClendon, 2004). In addition, the most extensively researched retention models were developed with an understanding of college as a four-year residential institution, and the typical college students being middle- or upper-class young adults leaving home for the first time to live on campus. It is only within the past few decades that these models have begun to integrate the new realities of the higher education landscape in the United States (Braxton et al., 2004). Today, college can mean anything from a fully-online program to two- and four-year commuter schools to the traditional residential college or university. Community college enrollment has grown dramatically, and now 40 percent of higher education students attend two-year community colleges. College students, likewise, are far more diverse in terms of race and ethnicity, socioeconomic status, age and family status as well as enrollment patterns that are much more likely to be part-time, intermittent, and at multiple institutions. The profile of students at two- and four-year schools is substantially different, and minority and low-income students are concentrated in community colleges where retention and completion is far lower than 4-year institutions (Provasnik & Planty, 2008). Defining and measuring retention becomes more

difficult due to the open access nature of community colleges and the multiple reasons students attend.

Despite extensive work documenting existing knowledge of Latino retention (Padilla, 2007) and a recent synthesis of advances in Latino retention theory (Oseguera, Locks, & Vega, 2009), a comprehensive model of Latino student retention that has gained general scholarly acceptance does not exist. As Rendón, Jalomo, & Nora (2000) state, “Much of the research that provides important modifications to the problem definition, introduces new variables to the retention equation, and attempts to refine traditional paradigms of student retention is scattered and unconnected,” (Rendón, Jalomo, & Nora, 2000). Braxton et al. (2004) recommend a multi-disciplinary approach to addressing student departure including constructs from economic, organizational, psychological and sociological orientations. It is clear that theory and research about higher education retention for minority students at the community college will continue to evolve.

The organization of this literature review begins with an overview of the most well-researched retention models, then describes the components most frequently agreed upon as contributing to retention of nontraditional and commuting students including:

- Background characteristics
- Encouragement and family support
- Environmental pull factors
- Sense of purpose and institutional allegiance;
- Academic and social experiences at college
- Validating experiences;
- Financial support
- Institutional responsibility for student success
- Social capital formation
- Institutional alignment and college readiness
- Institutional agents
- Institutional climate
- Academic performance and academic momentum
- Sense of belonging and competent membership

These factors are based on Nora's (2003) *Student Engagement Model* with modifications to include additional research findings particularly the role of institutional policy coherence, more detailed definitions of academic momentum, and the role of institutional agents (Nora, 2003).

### **Traditional Retention Models**

Tinto's Theory of Student Departure (Tinto, 1987; Tinto, 1993; Tinto, 1997) is the most studied of the persistence<sup>2</sup> theories and has achieved what Braxton et al. (2004) have termed 'near paradigmatic status' (Braxton et al., 2004). Tinto proposes that student entry characteristics directly influence both initial commitment to a particular higher education institution and the goal of college graduation and these in turn affect the student's degree of integration. Students who persist go through the process of becoming socially and academically integrated into the attitudes and beliefs of the institutional culture resulting in increased commitment to their educational goal and to the institution. Lack of integration will lead to departure. Through research, social integration, the psychological experience of identification and affiliation, has been operationalized as social interactions with peers, faculty or staff and extra- or co-curricular activities. Academic integration includes interactions inside and outside classroom that increase intellectual development and has often been operationalized by grades.

Other major models of persistence have built on the foundation that students who invest time and energy into education-related activities are most likely to persist (Wolf-Wendel et al., 2009). Astin (1984) calls the amount of physical and psychological energy a student devotes to academic experience 'student involvement' (Astin, 1984). Involvement has been operationalized in research as the amount of time spent doing homework, studying alone or with other students,

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<sup>2</sup> Retention is sometimes defined as continued enrollment at a single institution as opposed to persistence which can be continued enrollment at any higher education institution. In this document persistence and retention are used interchangeably.

and time spent living and working on campus, club membership, and socializing with peers and/or faculty members. Astin's model focuses primarily on the student, while Kuh's (2001) concept of engagement combines student involvement with an institutional responsibility to provide learning opportunities, purposeful student-faculty contact and active/collaborative learning, and inclusive and affirming environments (Kuh, 2001).

Braxton, Sullivan and Johnson analyzed peer-reviewed research utilizing Tinto's model to assess the amount of empirical evidence supporting the model (Braxton, Sullivan, & Johnson, 1997). Fifteen propositions were tested and four were supported by multi-institution research:

1. The initial level of institutional commitment affects the subsequent level of institutional commitment.
2. The initial level of commitment to the goal of graduation from college affects the subsequent level of institutional commitment.
3. Student entry characteristics affect the level of initial commitment to the goal of graduation from college.
4. The greater the level of subsequent commitment to the goal of college graduation, the greater the likelihood of student persistence in college.

An additional five propositions were supported in single-institution research. The conclusion of the researchers is that past evidence only modestly supported the model and lacks empirical internal consistency.

Braxton et al. (2004) reviewed attempts to test Tinto's theory on two-year and commuting students and minority students and found support for the following propositions: (a) Economic-the lower the cost incurred the higher the likelihood of persisting; (b) Organizational-the more a student perceives that the institution is committed to the welfare of its students, the lower the likelihood of the student's departure; (c) Psychological-the higher the motivation to graduate and higher self-efficacy positively impact student retention; (d) Sociological- parent education level and engaging in 'getting ready behaviors' or anticipatory socialization are negatively correlated with persisting at commuter college (Braxton et al., 2004). Additional sociological factors

identified to increase persistence include the important role of support from significant others, and involvement in communities of learning.

The theories of Bean & Metzner (1985) critique Astin's involvement, Kuh's engagement, and Tinto's integration concluding that all are more applicable constructs for full-time, traditional age, and residential students (Bean & Metzner, 1985). In contrast, their *Student Attrition Model* is based on the interaction between attitude and behavior in models of organizational turnover and is intended to capture relevant retention factors for students who have some combination of the traits: part-time attendance, commuting to campus, and older than age twenty-four. The *Student Attrition Model* introduced environmental variables including finances, employment, and family responsibilities, outside encouragement, and transfer opportunities in interaction with student coping behaviors and intent to leave as important considerations leading to dropout. Bean & Metzner found nontraditional students to be mainly concerned with academic offering rather than the social environment of the higher education institution and significant factors leading to dropout included low grade point average, intent to leave, background characteristics, and environmental variables.

Integration of the Tinto and Bean models was proposed by Cabrera et al. (1992) based on the many similarities between the two models (Cabrera, Castañeda, Nora, & Hengstler, 1992). Both models recognize a complex set of interactions over time as well as the impact of student background characteristics on adjustment to college. Cabrera et al. conducted a convergent validity test on the two models and concluded that a more comprehensive understanding can be achieved by combining these two theories taking into consideration institutional, personal and external factors.

Nora and Cabrera (1996) introduced a *Student Adjustment Model* that asserted that academic preparation equally impacted minorities and non-minorities and that physical separation from family does not impact persistence if a strong emotional support system is maintained (Nora & Cabrera, 1996). Expanding on this work and influenced by Tinto (1993) and Braxton (2001), Nora (2003) introduced an integrated *Student/Institution Engagement Model*, which emphasizes the interaction between the student and the institution (Nora, 2003).

This model includes:

1. Precollege Factors and Environmental Pull-Factors
2. Sense of Purpose and Institutional Allegiance
3. Academic and Social Experience
4. Cognitive and Non-Cognitive Outcomes
5. Goal Determination/Institutional Allegiance
6. Persistence

This model responds to research related to the impact of campus climate on Latino students (Hurtado, 1996; Hurtado & Carter, 1997) and the impact of validation (Rendón & Jalomo, 1994; Rendón, 1994) for these students. The model also moves away from Tinto's terminology of integration and instead utilizes an outcome of 'Sense of Belonging' (Hurtado & Carter, 1997) related to persistence. Each of these concepts will be covered later in this document.

## **Factors Contributing to Latino Student Retention**

### **Background Characteristics**

Background characteristics that are most frequently taken into consideration and have proven significant in prior research include socioeconomic status, parental education level, age, race/ethnicity and gender and are documented in the previous section (Adelman, 1999; Arbona & Nora, 2007; Braxton et al., 2004; Cabrera et al., 2005; Hoachlander et al., 2003; Provasnik & Planty, 2008; Swail, Cabrera, Lee, & Williams, 2005).

### **Academic Preparation**

Similar to Adelman's findings for the general population (Adelman, 1999), Arbona & Nora's (2007) study of Latino students using NELS 88 data student found a rigorous academic curriculum in high school to significantly increase the chances of bachelor's degree completion (Arbona & Nora, 2007) and Swail et al.'s research with this data set reinforced the finding with an emphasis on the importance of advanced mathematics in high school (Nuñez & Kim, 2012; Swail et al., 2005). Academic preparation at the high school is often evaluated based on college preparatory course taking patterns and grade point average. Students who attend high poverty schools often do not have access to college-preparatory classes, AP classes that can provide advanced placement in college, or dual enrollment/dual credit opportunities. Latino students are less likely to enroll in advanced math, which is one of the key predictors of attending a 4-year school or placing into college level courses (Gándara & Contreras, 2009). The availability of AP courses is one mechanism for assuring students have access to a more rigorous college preparatory curriculum. The numbers of Latinos taking AP tests increased from 1994 to 2003, although a large gap exists between Latino and White students, and passing rates on AP exams for Latino students remain lower than for their White peers (Contreras, 2005). The College Board also reported in 2012, 62% of prepared students were left out of an AP subject for which they had potential to complete either by choice or tracking or because they attended a school that did not offer the subject. Latinos were even less likely to take AP classes, with 70% of those qualified not taking these classes for the same reasons (College Board, 2013).

Dual enrollment/dual credit programs that allow students to earn college credits while still in high school have been shown to offer the benefit of increasing college aspirations, easing college transition, better aligning high school and college curriculum and reducing the cost of college by providing advanced standing at college (Karp et al., 2007). However, Latinos may

not be accessing these programs at a rate on par with other students. Only 4.8% of the students utilizing Washington State's highly successful Running Start program were Latinos compared with 79.4% for White students (Contreras, 2013). Because state funding follows the student to the community college when a student enrolls in Running Start, leaving the sending high school with a potential budget shortfall, it is possible that only those students whose parents have high levels of social capital know how to access this service. Latino students in rural context either had not heard of the program, were misinformed, or dissuaded from enrolling by counseling staff (Contreras & Stritikus, 2008).

### **Encouragement and Support from Family**

Family support, encouragement and validation have also been found to be significant in impacting student persistence (Nora & Cabrera, 1996). Hurtado, Carter & Spuler's study of Latinos in their first year at college identified that maintaining family support in the first year was positively associated with personal-emotional adjustment and these students named family second only to peers as the groups that provided them with the most support during the first year (Hurtado, 1996).

### **Environmental Pull Factors**

Bean and Metzner (1985) and Nora (2003) identified environmental factors that may impact college persistence and both included family and work responsibilities as significant factors. While family can be a significant source of support, studies have found that students who have to deal with family responsibilities are less likely to complete a college degree (Nora & Cabrera, 1996), and Braxton et al. (2004) concluded that these pull factors may be more intense for minority students (Braxton et al., 2004). Another significant pull factor identified by Nora et al. (1996) was commuting to campus (Nora, Cabrera, Hagedorn, & Pascarella, 1996).

### **Sense of Purpose and Institutional Allegiance**

Retention theories suggest that the greater the strength of a student's commitment to an educational goal or a higher education institution, the greater the likelihood of persistence (Cabrera, Nora, & Castañeda, 1993). Several studies have found a significant predictor of college degree completion is the student's aspirations while still in high school (Arbona & Nora, 2007; Bailey, Jenkins, & Leinbach, 2005b; Swail et al., 2004), as well as high parental expectations for advanced degrees (Swail et al., 2004). Latino parents with low education levels and low socioeconomic levels still have high aspirations for their children (Contreras & Stritikus, 2008; Contreras, 2011; Stage & Hossler, 2000). Research by Braxton et al. (2004) found that first generation students and those with low socioeconomic status tend to have low commitment to graduate. Deil-Amen (2011) has also hypothesized that community college student goal commitment tends to be weak (Deil-Amen, 2011). Ornelas & Solorzano indicated that Latino college students develop strong goal commitment from their parents, "This passion was often inculcated by the motivation the students received from their parents, their appreciation for their parents, and by an understanding of their place in a society that marginalized them on the basis of their race, class, and gender. Students expressed their feelings as a strong sense to 'prove them [society] wrong,' a sense of responsibility to become role models to their younger siblings or their children, and a commitment to their community to succeed." (Ornelas & Solorzano, 2010).

### **Academic and Social Experiences at College**

When Braxton et al. (2004) analyzed the Tinto student departure model for two-year commuting students and minority students, they found more academic integration lead to stronger subsequent institutional commitment and greater likelihood of persistence. Their

conclusion was that the academic dimension of integration plays a significant role in the departure process in commuter institutions, whereas the social dimension is more important in residential colleges and universities. (Braxton et al., 2004). Deil-Amen (2011) substantiated this finding, discovering that non-residential community college students place a priority on academic integration and are less concerned with social integration. These students relied on instrumental use of peers to increase ability to navigate the system with no expectation or desire for college relationships to extend beyond the classroom (Deil-Amen, 2011). Rendón, Jalomo & Nora (1995) study results indicating social integration as traditionally defined for students was difficult for Latino first-year community college students since most are non-traditional, older, working part-time and the first generation in their family to attend college (Rendón & Jalomo, 1995). Since the types of social integration normally provided for traditional students may not be relevant or provide social capital for Latino students, this research expressed the need to allow students to define meaningful involvement and to value external networks as supports not simply negative ‘pull factors’ (Rendón et al., 2000).

In the community college setting the primary opportunity for socio-academic integration is through the classroom since most students drop in to campus for class and leave again without engaging in other activities and services. Learning communities where students can form a cohort, inclusive pedagogy and curriculum that reflects student identity have all been found to support academic integration of Latino students (Tinto (in Braxton), 2000).

Nora’s *Student/Institution Engagement model* replaces Tinto’s “integration” terminology with social and academic experiences because integration has been widely criticized as inappropriate and assimilationist terminology. Academic and social integration incorporates Van Gennep’s theory (Van Gennep, 1960) and expectation that students must separate from their

community and abandon prior identity in order to integrate into the college environment. In considering a community college context, separation is less salient because students often remain in their community of origin (Deil-Amen, 2011). Multiple researchers urge reframing minority students' communities of origin as a source of strength and a student's ability to move between the cultures of the community and college environments as a significant skill rather than proposing that to successfully persist at college they need to break former ties and adopt the culture of the educational institution (Guiffrida, 2006; Hurtado & Carter, 1997; Rendón et al., 2000; Tierney, 1992). Van Gennep's model of developmental progression within a culture could prove harmful to minority students in a college setting if it causes them to lose cultural traditions and supportive relationships, which have been shown to be necessary for minority college students' persistence (Guiffrida, 2006; Tierney, 1992).

### **Validating Experiences**

To ensure the persistence of first generation, low-income and minority students, the higher education institution must take the initiative to provide non-patronizing encouragement and support in and outside of class in order to succeed. Rendón (1994) termed this support and connection, 'validation' which includes: 1) the burden of initiating contact with students is on institutional agents<sup>3</sup>; 2) students feel confident in ability to learn and have self-worth when validation is present; 3) students will get involved after they experience academic and interpersonal validation; 4) validation can occur in and out of class; 5) validation is a developmental process; 6) validation is especially important early in college experience (Rendón, 1994). Rendón demonstrated that uncertain and insecure students can be transformed into full participants in college life, if institutions "take a proactive role in reaching out to students to affirm them as being capable of doing academic work and to support them in their academic

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<sup>3</sup> See discussion of "institutional agents" later in this chapter.

endeavors and social adjustment.” (Rendón, 2002). When Latino community college students perceive acceptance and faculty behavior that validates their academic potential, they participate more fully in classroom discussions, interact more effectively with faculty and reconsider decision to drop out (Rendón, 1994). This is especially important for Latino students who express the most fear about displaying inadequacy in the classroom (Deil-Amen, 2011). Implementing validation strategies in a community college context is problematic as students are most likely commuters who spend limited time on campus. Since faculty may be the only institutional agents with which these students interact, Barnett (2010) examined the role of faculty validation in student persistence and found that more faculty validation did lead to greater intention to persist especially for Latino and Black students (Barnett, 2010).

### **Financial Support**

Concerns about the cost of a college education as well as the actual ability to pay are a major factor in college choice as well as persistence to degree (Nora, 2004; Santos & Saenz, 2013). A review of retention literature related to two-year, commuting students and minority students found the lower the cost incurred the higher the likelihood of students persisting (Braxton et al., 2004). The current policy environment for federal financial aid has been described as a “perfect storm” with the convergence of spiraling tuition costs limiting Latino access and a shifting cost burden to students and their families partially by relying more on loans and preference for policies that favor the middle class (Santos & Saenz, 2013). These rapid increases in the price of tuition most adversely affect those with the fewest resources.

Latino families are often unaware or misinformed about the costs of college. In a survey of 1,210 Latino youth and 1,219 Latino parents in eight metropolitan areas, most said they relied on schoolteachers and counselors as sources of information about college. The majority (51%)

of Latino youth surveyed and 71% of the parents of Latino youth indicated they did not receive information or advice about college financial aid while the youth were enrolled in kindergarten through 12<sup>th</sup> grade. Most parents (54%) and nearly half of the youth (38%) could name no sources of financial aid (Zarate & Fabienke, 2003).

Despite the fact that Latino students are increasingly relying on their parents to fund higher education (Santos & Saenz, 2013), Latino families are less likely than White parents to save money for their child's post-secondary schooling or to seek information about financial aid (O'Connor, Hammack, & Scott, 2010). Studies have also found that as many as three fourths of Latino adults not in college would have attended if they had a better understanding of the financial aid system (Zarate & Pachon, 2006). The more parents know about financial aid, the more likely their child is to attend a 4-year school regardless of ethnicity; but the effect of parental knowledge for Latinos is more than twice the effect for Whites (O'Connor et al., 2010).

Providing financial aid information in a format that is accessible to Latino students and their families is complex. Perna's conceptual model (2006) to understand access and use of information about college prices and financial aid contains four nested layers of context: habitus; the school and community context; the higher education context; and the broader social, economic, and policy context. Perna makes the argument that simply making financial aid information available is inadequate. What is needed is to make the information accessible and relevant within the multiple levels of context in which individuals reside (Perna, 2006).

Financial Aid forms are complex and require information that may be unavailable to students. The American Council on Education has estimated that nearly one in five low-income students who have enrolled in college and would likely be eligible for federal Pell Grants never filed a Free Application for Federal Student Aid (FAFSA). Low-Income students who file a

FAFSA are more likely than middle-income students to file late, which reduces their eligibility for state and institutional aid (Roderick, Nagaoka, Coca, & Moeller, 2008). Financial aid packages that include loans do not facilitate access for Latino students. In part due to socioeconomic status, parents are more resistant to taking out loans than the general population (Dowd, 2008).

Latino students are more likely to believe they will leave school because of lack of finances (Longerbeam, Sedlacek, & Alatorre, 2004). Finances directly influence academic integration and grades because financial concerns can lead to working longer hours, working off campus, and reducing course load. Cabrera, Nora, and Castaneda (1993) state “the availability of college financial aid and other forms of financial assistance provides Latino students with the ability to meet their financial needs and the opportunity to direct more attention to their academic responsibilities. Furthermore, sufficient financial aid contributes to a sense of relief for Latino students, who often feel stressed by the lack of funds to finance college and familial obligations to send money home (Cabrera et al., 1993).

On a positive note, a study by Nora (1990) found that Latino community college students who received higher levels of financial aid in the form of grants enrolled in more semesters, earned more credit hours, and received some type of credential (Nora, 1990). This has been consistent over time, as Santos & Saenz show in a 30-year review of financial aid policy and college costs, Latinos have consistently reported a greater degree of responsiveness to financial assistance and costs compared to their White peers (Santos & Saenz, 2013). Availability of financial aid appears to be a major determinant of choice and persistence for Latino students.

## **Academic Performance and Academic Momentum**

### *Academic Performance*

The most salient factor in persistence for Latino students is their performance during the first year of college. Latinos are three times more likely to drop out of college based on academic performance than their White counterparts (Nora et al., 1996; Nora, 2003).

### *Academic Momentum*

Adelman's 1999 longitudinal study of college completion utilizing the National Center for Education Statistics of the U.S. Department of Education "High School & Beyond/Sophomore cohort" follows the high school graduating class of 1982 from the time they were in 10th grade in 1980 until roughly age 30 in 1993 (Adelman, 1999). The two most important variables to predict college completion were the intensity and quality of secondary school curriculum and continuous enrollment once a true start has been made in higher education. Adelman described momentum as coursework taken, student performance in courses (grades) and trajectory over time such as grade improvement or increasing number of credits earned. Students who demonstrate a significant commitment to degree completion by enrolling in college immediately (Adelman, 2006), attending college full time, continuing enrollment through the summer, and avoiding stopping out will have a much greater likelihood of college completion (Arbona & Nora, 2007; Attewell et al., 2003; Bailey, Jenkins, & Leinbach, 2005a; Bailey, Jenkins, & Leinbach, 2005b; Moore, Offenstien, & Shulock, 2009a). However, Latino students often demonstrate the opposite pattern: they delay college entry after high school, enroll part-time, and have breaks in their enrollment (Fry, 2004; Wassmer, Moore, & Shulock, 2004). Moore and Shulock (2007) also argue that Latino students who register late for classes are less likely to complete degrees or transfer to 4-year institutions. Students who are sure of their

direction and enter a program of study in their first year are twice as likely to transfer or complete a certificate or degree than those that do not (Shulock et al., 2007).

Students who enter a program of study in the first year were twice as likely to complete a certificate or degree or transfer as students who delayed (Moore & Shulock, 2011). Multiple pathways in the community college can present a barrier to students and Ornelas & Solorzano (2010) have questioned the community college's commitment to the transfer function given that students in their study received limited and confusing information about the requirements for a transfer degree (Ornelas & Solorzano, 2010).

Because community college students attend for a variety of purposes, progress can best be assessed based on intermediate indicators or "milestones" such as the completion of basic skills, remedial education, course credits, passing an initial college-level or degree-credit "gateway" courses in writing and mathematics (Calcagno et al., 2007; Moore, Offenstien, & Shulock, 2009b). Each of these milestones provides momentum toward degree completion.

In order to understand the larger picture of college completion, research has identified success indicators along the college pathway that provide students momentum towards successful degree completion. These indicators include progress through remediation, gateway course completion, and credit accumulation. A variety of milestone and momentum models have been proposed (Attewell et al., 2003; Leinbach & Jenkins, 2008). Leinbach and Jenkins added to this model the concept of "momentum points," or short-term measures that research has shown increase the probability that students will reach milestones. (Leinbach & Jenkins, 2008). Moore, Offenstien, and Shulock propose a similar division of "milestones" and "on-track indicators" that is fairly consistent with Leinbach and Jenkins. The On-Track Indicators align on measures of remediation, completion of gateway courses, and credit accumulation. A time element is added

in the Moore model, as are the ratio of courses completed to courses attempted, attending school during summer term, full-time and continuous enrollment, on time registration, and maintaining an adequate GPA, (Moore, Offenstein, & Shulock, 2009a).

*Table 5 Milestones and on track indicators*

Milestones	On Track Indicators
<ul style="list-style-type: none"> <li>• Return for subsequent term</li> <li>• Complete remediation</li> <li>• Begin college-level coursework in math and English</li> <li>• Earn one year of college-level credits</li> <li>• Complete general education coursework</li> <li>• Complete a community college transfer curriculum</li> <li>• Transfer from community college to university</li> <li>• Complete certificate or degree</li> </ul>	Remediation – begin first term if needed Gateway Courses <ul style="list-style-type: none"> <li>• Complete college-level math and or English in the first or second year</li> <li>• Complete a college success course</li> <li>• Credit accumulation</li> <li>• Complete high percentage of courses attempted</li> <li>• Complete 20-30 credits in the first year</li> <li>• Earn summer credits</li> <li>• Enroll full time</li> <li>• Enroll continuously</li> <li>• Register on time</li> <li>• Maintain adequate GPA</li> </ul>

### ***Basic Skills/English as a Second Language***

There has been a shift in recent decades toward providing ABE/ESL in community colleges rather than the K-12 sector (Bailey & Morest, 2006) but these programs have struggled to provide a pathway to higher-level college credit or degree attainment. In Washington State's community and technical college system, only 13% of adults who started in English as a Second Language programs earned any college credits during the next 5 years, and only 30% of students in Adult Basic Education and GED programs transitioned to college-credit courses during that time (Prince & Jenkins, 2005). These findings led to the development of Integrated Basic Education and Skills Training (I-BEST) instructional models that are team taught by a basic skills or ESL instructor with an instructor in the occupational content area. These programs have increased the success of these lowest level community college students dramatically. I-BEST

students had a 55% probability of earning college credits that culminate in a degree or certificate, compared to only 15% for non I-BEST students (D. Jenkins, Zeidenberg, & Kienzl, 2009).

### ***Remedial/Developmental Classes***

In most community colleges, the determination to enroll a student into remedial<sup>4</sup> coursework is based on a placement test. Placement is problematic because being college-ready is not well defined, a single measure and cutoff point can exaggerate the distance between developmental and college-ready, diagnostic information from placement tests is minimal or nonexistent, and these tests do not help to determine who will benefit from developmental education or another intervention (Hughes & Scott-Clayton, 2011). Criticisms of these tests have also noted the lack of alignment between high school completion requirements and the content of these tests. Placement tests evaluate 60% of all students at community college as requiring some remediation in the first year, but for Blacks and Latinos the percentage is 75%. If Latino students began remedial classes they were far less likely to complete a degree or transfer (24%) than those who did not need remediation (43%) (Bailey, Jenkins, & Leinbach, 2005b). An important consideration when interpreting this data is Adelman's analysis of the "High School and Beyond" data set, which followed a cohort of students who graduated high school in 1982 and 1992. While this study also showed large gaps in degree completion for those who took remedial courses, he also found that remediation ceases to predict graduation, once secondary school academic performance and preparation is added to the model (Adelman, 1999). Fry argues that the issue is not academic preparation but the "low trajectory" Latino students take by choosing non-selective institutions that leads to gaps in attainment (Fry, 2004).

Even though students may be placed through testing into developmental courses, many never enroll in these classes. In examining data collected from *Achieving the Dream* colleges,

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<sup>4</sup> The terms remedial and developmental are used interchangeably in this document.

about one-fifth of all students referred to developmental math education and one-third of students referred to developmental reading never enroll within three years. Of those referred for reading remediation, about 44% complete their full sequence, and for those referred for remedial math: only 31% complete their sequence in three years (Bailey, 2009; Bailey, Jeong, & Cho, 2010).

Attewell, Lavin, Domina, Levey (2006) analyzed NELS:88 high school class of 1992 cohort data and found that those who take remedial classes are not clearly weaker in academic skills or high school preparation than their peers. They also found 2-year colleges to be more likely than 4-year colleges to place students in remedial education even for students with equivalent academic skills (Attewell et al., 2006). The efficacy of remediation is still in question and this analysis has begun to focus in on the continuum of developmental placement test scores to identify which students are truly benefitting from these classes. Calcagno & Long evaluated students who were near the placement test cutoff to enter college level work and found that placement into developmental education does not provide momentum toward a degree (J. C. Calcagno & Long, 2008). Similarly, Boatman & Long used longitudinal data from the state of Tennessee and found negative effects of remedial coursework for those students on the margins of needing any remediation, but for those students markedly below the cutoff, the negative effects of remediation were much smaller and occasionally positive (Boatman & Long, 2010). Bettinger and Long (2005) used variation in remediation policies across Ohio colleges and controlled for student preparation. Their results more strongly support math remediation finding that students placed into these classes were 15% more likely to transfer to a four-year college while students taking remedial English were not significantly different than those for non-remedial English students (Bettinger & Long, 2005). Counter to Bettinger and Long, in the

study described above, Attewell et al. found the likelihood of completion of a degree for 2-year college students were improved if remedial coursework in writing occurred but somewhat lessened if remedial coursework in mathematics occurred (Attewell et al., 2006).

### ***Accumulation of College Credit***

Full-time attendance and early accumulation of college credits are strong predictors of degree completion. Adelman's 'The Toolbox Revisited', reported that earning fewer than 20 units in the first year of enrollment negatively related to completion (Adelman, 1999; Adelman, 2006; McCormick & Carroll, 1999). In their study of Florida community colleges, Roksa & Calcagno found that reaching 24, 36, and 48 credit thresholds was associated with higher likelihood of transfer from community college to a university (Roksa & Calcagno, 2010). In a study of California community colleges, students of traditional college age, and those attending full time were more likely to complete a degree (Moore, Offenstien, & Shulock, 2009a).

### ***Completion of Gateway Courses***

Completion of "gateway courses" also has been shown to significantly impact the probability of college completion. In an examination of NELS data, of those that completed a bachelor's degree whether they started at community college or university, 70% had completed math courses during first two years of enrollment (Adelman, 2006). Adelman also reported that the number of credits earned in college-level math is significant predictor of transfer to university and earning an associate degree. Each step up the three levels of math credits earned (none, one to four, more than four) increased the probability of earning an associate's degree by 11.5% (Adelman, 2005). Full-time, degree-seeking students in Florida's community college system who passed a college-level math course were more than twice as likely to transfer. Academically underprepared students who passed a college-level math course were more than

four times as likely to transfer to a similar student who did not (Roksa & Calcagno, 2010). A study of High School & Beyond data showed that completing three math courses increased chances of degree completion by 42% (Cabrera et al., 2005; Cabrera & La Nasa, 2001).

### **Social Capital Formation**

Bourdieu, a structural theorist, developed the concept of *Forms of Capital* (1986), or resource bases (capital) that can be accumulated to indicate social class (Bourdieu, 1986). The original theory identified two forms of capital: economic (money, material, objects) and cultural (informal interpersonal skills, habits, manners, linguistics, educational credentials, and lifestyle preferences) (J. P. Berger, 2000). In later research he added multiple types of capital including social capital, the relationships and networks that provide access to information or can facilitate action (Coleman, 1988). Stanton-Salazar offers a definition of social capital as “key forms of social support embedded in one’s network or associations, and accessible through direct or indirect ties with institutional agents” and defines “institutional agents” as “high-status, non-kin who have positional power and relationships to leverage social and institutional support” (Stanton-Salazar, 2011). Researchers utilizing variations of this model propose that it is through access to social capital students are able develop human, and economic capital that can lead to greater educational outcomes (Perna & Titus, 2005; Saenz & Ponjuan, 2009).

### **Institutional Factors**

#### ***Institutional Responsibility for Student Success***

Tinto’s *Model of Student Departure* has also been critiqued because it places responsibility primarily on the student rather than on institutions as actors in student retention (Rendón et al., 2000) and because it ignores the impact of social capital on college outcomes, especially affiliations with families and communities outside of college (Nora, 2001). Kezar

(2011) notes that higher education in the United States was created to support middle- and high-income students and it is necessary for institutions to deconstruct unquestioned assumptions that disadvantage low-income students in order to reconstruct institutions that can better serve these populations (Kezar, 2011). Although Kezar's critique is focused on low-income students, it also has bearing on Latino students who are more likely to live in poverty. These researchers point to the critical need to incorporate sociological models of post-structuralism, institutional alignment and policy coherence, institutional culture, social capital, and institutional agents into any conceptual framework for understanding Latino student persistence.

Educational research regarding access and attainment for minority students has focused on individual behaviors, individual deficits, and attempts to fix or remediate individuals. As

Bensimon notes:

A distinguishing aspect of the dominant paradigm is the existential image of the student as an autonomous and self-motivated actor who exerts effort in behaviors that exemplify commitment, engagement, self-regulation, and goal-orientation ... a distinctive feature of this scholarship is that success (defined as persistence after the first year and/or degree attainment) is understood as an outcome of individual efforts. The survey instruments commonly used in these studies consist of questions that assume all students are free to make independent choices about what college to attend, what goals to pursue, what activities to become involved in, and with whom to spend time. (Bensimon, 2007, p.447)

Structuralism looks at the broader systems, practices and policies that create barriers for individuals to advance. Post-structuralism focuses on deconstructing normative values and changing policies and practice to make them more inclusive (Kezar, 2011). Many researchers have noted that the secondary institutions that Latino students are likely to attend are often resource-poor which translates into difficulty recruiting and retaining highly qualified teachers, funding adequate counseling staff to serve the number of students enrolled, and providing college preparatory curricula and co-curricular options for students. Substantive research exists confirming differential access to academic preparation for college: Minority and poor students

are more likely to be in high schools that struggle with high poverty rates, large proportions of English language learners, and high absenteeism. They are more likely to be channeled into vocational rather than academic tracks and enroll in fewer math and science courses (Cabrera et al., 2005; Goldrick-Rab, 2010; Nora, Amaury, Rendón, 1990; Orfield, 1992; Roderick et al., 2008). Other research has noted the lack of qualified counselors at these schools (Núñez & Kim, 2012). As Oakes et al. note (Oakes et al., 2006):

“The college chances of every student—wealthy or poor, regardless of race or ethnicity—will be affected by whether he or she has access to essential college-going conditions, including access to curriculum, high-quality teaching, counseling, and opportunities for extra academic support. It is important to note that none of these conditions is within the control of the student or his or her family.”

### ***Institutional Alignment and College Readiness***

Prior research indicates the need for institutions from preschool to graduate school to form strong partnerships to assure clear information and support to facilitate student success as they transition from one institution to the next (Núñez & Oliva, 2009; Pérez & Ceja, 2010a). David Conley has defined multiple domains of preparation for college, one of which he terms ‘college readiness,’ defined as contextual knowledge comprised of the privileged information necessary to understand how a college operates culturally and as a system (Conley, 2005). This is the assumed knowledge that is rarely explicitly shared. High schools and community colleges do not do an adequate job of communicating how high school graduation requirements align with community college preparation and placement. Well-educated parents can compensate for this lack of information by purchasing extra tutoring and services such as hiring private college counselors (Oakes et al., 2006). When students seek to enroll in community college classes, they

are surprised by college placement testing and often find the advising and information about remedial courses confusing (Venezia, Bracco, & Nodine, 2010). Community colleges in an attempt to make remedial education stigma-free may further confuse students and cause them to be unsure whether they are in college-level classes or not (Deil-Amen & Rosenbaum, 2002). Multiple research studies have found that once Latinos are enrolled at a college, they find access to accurate information and resources limited (Ornelas & Solorzano, 2010). Community college students are likely to receive conflicting or incomplete information due to bureaucracy and organizational complexity (Rosenbaum, Deil-Amen, & Person, 2006).

Research on Latino students in California found a significant barrier to college access is lack of instrumental knowledge of the steps needed to go to college (Gándara & Moreno, 2002). Students and their families may be hampered in acquiring social capital due to resource constraints at the high school or college and limited social capital in their peer groups. Other research has shown that Latino high school students are less likely than others to receive encouragement from school personnel to pursue four-year higher education (Oakes et al., 2006). When Latino students had access and utilized college counseling services it significantly affects future college enrollment (Zarate & Gallimore, 2005).

### ***Institutional Agents***

The research of Stanton-Salazar (1997, 2001, 2004) has emphasized the importance of “institutional agents” in the development of social capital for working-class minority youth. Stanton-Salazar defines agents as high-status, non-kin with positional power and relationships to leverage social and institutional support for students. Institutional agents can take on multiple roles such as providing direct support as an advisor or advocate; providing integrative support as a cultural guide or connection to essential networks; as a system developer providing program

development and advocacy; and system linkage and network support bridging and coordinating between institutions (Stanton-Salazar, 2011).

Students, their families and their peer groups can build social capital beginning in high school by establishing connections with institutional agents such as counselors and teachers, and gathering information that will be useful in college preparation, course selection and college choice.

There are significant barriers for first generation college students to take the initiative to gather information from individuals in authority within the high school or community college. Stanton-Salazar (1997) speaks to the many distancing factors which may make it difficult for minority students and their families to gather the needed information to go to college, “Among the structures that may restrict the growth of social capital for working-class minority students are the focus of schools on bureaucratic processes, the dual role of teachers and counselors as mentors and gatekeepers, and the short-term duration of interactions,” (Stanton-Salazar, 2011). Bensimon (2007), Guiffrida (2006), and Tierney (1992, 1999) have suggested that marginalized students are more successful when they receive assistance from institutional agents. Osegura and Locks cite additional benefits of institutional agents:

Tierney and Jun (2001) also suggest that marginalized students may enjoy the benefits afforded to privileged students when institutional agents generate a “socialization process that produces the same sort of strategies and resources” (p. 210) that advantaged youth have access to. Finally, these institutional agents may also be a source of valuable information about financial aid, involvement opportunities, and advocacy on behalf of Latina/o students.(Oseguera et al., 2009).

Recent research by Deil-Amen (2011) in a community college setting found that students identified institutional agents (including staff and faculty) as key to persistence (Deil-Amen, 2011).

Another primary source of support for Latino students is faculty or staff mentors who have navigated and succeeded within the educational system and can serve as role models of academic success. However, in many institutions there are not adequate numbers of faculty and staff of color to serve in this role (Gloria, Castellanos, Lopez, & Rosales, 2005). Stanton-Salazar indicates that faculty and staff mentors can become institutional agents, “In the context of the development and empowerment of low-status youth, educators, social workers, intervention program staff, and similar others become ‘institutional agents’ when they mobilize or directly provide resources and support to a student or youth that significantly enables the latter to effectively navigate and exert control over the principal environments within which he or she is embedded.” (Stanton-Salazar, 2011, p. 1078). Empowerment of the student is the desired goal in this model, and Stanton-Salazar describes “empowerment agents” as those who go beyond the role of the institutional agent to develop critical consciousness in those they support and to encourage changing the world rather than assimilation into the status quo (p. 1090).

When institutional agents and mentors are not available, participation in college success courses that communicate information that might have been received from a mentor have been shown to increase student completion over those who do not complete such a course (Shulock et al., 2007).

### *Institutional Climate*

The percentage of Latino students enrolled at the college, the diversity of faculty and staff and the college climate all play a role in the retention of Latino students. The percentage of Latinos enrolled at an institution makes a difference in degree attainment for Mexican American male students (Cerna, Pérez, & Sáenz, 2009). Increased percentage of Latino faculty at HSIs

produces better educational attainment outcomes for students (Bridges et al., 2008; Hagedorn, Chi, Cepeda, & McLain, 2007).

Campus climate has been found to be related to retention (Hurtado, Alvarez, Guillermo-Wann, Cuellar, & Arellano, 2012) and Latinos can experience forms of exclusion in college that interfere with their development of a sense of belonging and decrease social adjustment (Hurtado, 1996; Hurtado & Carter, 1997). However, experiencing academic and interpersonal validation decreases the impact of experiencing bias or discrimination in a chilly campus climate (Hurtado, Ruiz Alvarado, & Guilermo-Wann, 2012)

### **Sense of Belonging and Competent Membership**

Tinto's "social integration" has been defined as normative congruence between an individual's expectations, values, and attitudes and those encountered in campus peer group. When operationalized in research social integration has been measured as participation in social and academic systems and this focus on behaviors ignores the psychological experience of identification and affiliation represented by sense of belonging which measures students' feelings of social cohesion and group membership (Deil-Amen, 2011; Hurtado & Carter, 1997). Perceptions of a hostile climate negatively impacts sense of belonging (Hurtado, 1996; Nora & Cabrera, 1996), and a sense of isolation or not belonging has been found to negatively affect persistence (Nora & Cabrera, 1996). Belonging to sororities or fraternities and religious organizations and social-community organizations has been linked to high sense of belonging (Hurtado, 1996). Structural modeling of validation, campus climate and sense of belonging show a positive relationship between interpersonal and academic validation and sense of belonging (Hurtado, Ruiz Alvarado et al., 2012). More recent research extending Tinto's *Theory of Student Departure* to two-year commuting students found that subjective sense of belonging

and membership is fundamental component of student decision-making to persist or depart. In addition, socio-academic integrative experiences such as in-class interactions, study groups, interactions with institutional agents that developed social capital, cohorts, and academic-relevant clubs and activities facilitated development of sense of competent membership (Deil-Amen, 2011).

### **Conclusion**

The preponderance of literature related to student retention has used quantitative methods to understand the factors leading to retention or departure of traditional-aged students at 4-year, residential colleges. Relatively little is known about student retention at 2-year commuter colleges, and even less about sub-populations such as Latinas/os. The predominance of quantitative methods has been critiqued as “a probability game where . . . we learn about the majority, but little about students on the margins” (Bensimon quoting Frances Stage, 2007, p. 449). The methodology proposed in the next chapter focuses on qualitative research to highlight the perspectives of students who are often on the margins and whose stories have not been heard to any great extent in the research literature.

### **Chapter 3. Methodology**

Since the goal of this project is to impact practice, research synthesis can be used to understand the body of knowledge generated in this area (Sandelowski & Barroso, 2007). Existing qualitative primary research on retention and persistence of Latino students at community colleges was analyzed using thematic synthesis (Thomas & Harden, 2008). Thematic synthesis is one of several approaches to qualitative research synthesis, a methodology that is increasingly being relied upon to translate research to practice especially in the field of health and just emerging in the field of education (Howell Major & Savin-Baden, 2011). Thematic synthesis combines approaches from meta-ethnography and grounded theory. The text of research findings were coded, then organized into “descriptive” themes, which were further interpreted to create “analytical” themes. This approach is inductive and themes are developed using a “constant comparison” method (Strauss & Corbin, 1998). Coding was supported using NVivo qualitative analysis software.

The initial parameters for the literature search were qualitative studies of Latino student retention at public community colleges in the United States published in peer-reviewed journals between 1988 and 2013. 1988 is the first date with a specific reference to Latinos at community colleges in the initial literature review. The initial search was narrowed to peer-reviewed journals to keep the resulting inclusion set small enough to allow time for analysis. Qualitative research was selected to highlight student perspectives on institutional factors that support or create barriers for persistence and completion. Qualitative research, as defined by Sandelowski “typically entails: (a) some form of purposeful sampling for information-rich cases; (b) in-depth and open-ended interviews, lengthy participant/field observations, and/or document or artifact

study; and (c) techniques for analysis and interpretation of data that move beyond the data generated and their surface appearances (Sandelowski & Barroso, 2003, p.893-894).

Thematic synthesis does not require an exhaustive literature search, but rather a purposive sample aiming for conceptual saturation (Thomas & Harden, 2008).

### **Search Procedure**

The initial search was performed on a RefWorks database of 451 references developed by the researcher over a two-year period of studying Latino college completion. The database was populated using University of Washington electronic databases, Google Scholar searches, and building from bibliographies of articles that were retrieved initially to identify additional references. Seventy-six references addressed Latino college completion. These references were scanned individually to identify qualitative research at 2-year colleges addressing retention-related issues. Retention was framed in a variety of ways in this research including transition to college, socio-academic integration, and persistence. Research related to college choice and transfer from 2-year to 4-year was not included in the initial set. Only seven of the seventy-six articles met all of the inclusion criteria, but a closer look during coding revealed that one article did not meet the standards of qualitative research as described by Sandelowski above. This dramatic dearth of available literature is not surprising. Pascarella and Terenzini (2005) estimated that just 5 to 10% of the 2,500 studies in higher education concerned with the impact of college on students focused on community college students and went on to state “...community colleges are still significantly underrepresented in the total body of evidence on college impacts” (p. 3). As evidenced by this search process, research specifically about Latinos at community college limits the available literature even further.

Coding into general themes and analytical themes was completed on the initial set of articles. Because of the small sample size, the inclusion set was broadened to include peer reviewed journal articles related to Latino community college student transfer to a 4-year institution because the ability to transfer is a positive indicator of retention. This increased the included articles by four, but closer review during coding eliminated the Perez & Ceja article (2009) because it was a literature synthesis rather than a qualitative study. Eight total articles were included in set two. These additional articles on transfer to 4-year institutions were coded.

With only eight articles available, the special issue of the Community College Journal of Research and Practice volume 34, number 10 on Latinos at community colleges was purchased (2010). Two articles from this publication met the inclusion criteria, bringing the total articles to ten.

Because the journal literature set was still small, dissertations were included. Five dissertations met all the original inclusion criteria except publication in a peer-reviewed journal: Becerra (2006); Brandes (2013); Bruce (2010); Pryzymus (2012); Valenzuela (2006).

Backward- and forward-chaining searches of citations in the inclusion set (Bates, 1989; Cooper, 1998) yielded one additional journal article (Wirth & Padilla, 2008), and one conference paper (Rendón & Jalomo, 1994). A final review of all included literature revealed that the Ceja, Casparis & Rhodes (2002) item was a conference report rather than a peer-reviewed article. Because it met all the remaining criteria and the inclusion set was still relatively small, the paper was included in the analysis.

### Inclusion/Exclusion Criteria

Table 6 Articles and Inclusion/Exclusion Criteria

Inclusion	Name	Peer-Reviewed Journal	Dissertation	Latino	Public 2-Year	Qualitative	Retention	Student Perspective	Institutional Factors
Set 1-Included	Campa 2010 Critical Resilience, Schooling Processes, and the Academic Success of Mexican Americans in Community Colleges	✓		✓	✓	✓	✓	✓	✓
Set 1-Included	Cejda Casparis Rhodes 2002 Influences on the Educational Decisions of Hispanic Students Enrolled in Hispanic Serving Institutions	-		✓	✓	✓	✓	✓	✓
Set 1-Included	Deil-Amen 2011 Socio-Academic Integrative Moments	✓		*	*	✓	✓	✓	✓
Set 1-Included	Rendon 2002 Community College Puente - A Validating Model of Education	✓		✓	✓	✓	✓	✓	✓
Set 1-Included	Vigil Laden 1999 Socializing and Mentoring College Students of Color	✓		✓	✓	✓	✓	✓	✓
Set 1-Included	Zell 2010 Achieving a College Education - The Psychological Experiences of Latina-o Community College Students	✓		✓	✓	✓	✓	✓	✓
Set 2-Included	Bensimon Dowd 2009 Dimensions of Transfer Choice Gap-Experiences of Latina and Latino Students	✓		✓	✓	✓	✓	✓	✓
Set 2-Included	Omelas Solorzano 2010 Transfer Conditions of Latina-o Community College Students	✓		✓	✓	✓	✓	✓	✓
Set 3-Included	Garcia 2010 When Hispanic Students Attempt to Succeed in College, But Do Not	✓		✓	✓	✓	✓	✓	✓
Set 3-Included	Perrakis Hagedom 2010 Latino-a Student Success in Community Colleges and Hispanic-Serving Institutions	✓		✓	✓	✓	✓	✓	✓
Set 4-Included	Becerra 2006 Hispanic Students' Perceptions of Institutional Factors that Affect Their Persistence		✓	✓	✓	✓	✓	✓	✓
Set 4-Included	Brandes 2013 Latina/o Student Success at an Emerging Hispanic-Serving Community College		✓	✓	✓	✓	✓	✓	✓
Set 4-Included	Bruce 2010 Latina Success: Following the Legacy of High School Advancement via Individualized Determination (AVID) to College		✓	✓	✓	✓	✓	✓	✓
Set 4-Included	Przymus 2012 Perceptions of Belonging-A Qualitative Study of Latino Community College Students		✓	✓	✓	✓	✓	✓	✓
Set 5-Included	Wirth Padilla 2008 College Student Success: A Qualitative Modeling Approach	✓		*	✓	✓	✓	✓	✓
Set 5-Included	Rendon Jalomo 1994 Transforming At-Risk Students into Powerful Learners	-		✓	✓	✓	✓	✓	✓
Set 1-Excluded	Vigil Laden 2004 Serving Emerging Majority Students	✓		*	✓	-	✓	-	✓
Set 2-Excluded	Perez Ceja 2009 Building a Latina o Student Transfer Culture	✓		✓	✓	-	✓	✓	✓
Set 2-Excluded	Reyes Unique Challenges for Women of Color in STEM Transferring from Community Colleges to University	✓		-	✓	✓	✓	✓	✓
Set 4-Excluded	Valenzuela 2006 Mi Fuerza/ My Strength: The Academic and Personal Experiences of Chicana/ Latina Transfer Students in Math and Science		✓	✓			✓	✓	✓
	- Indicates article did not meet this criterion								
	* Indicates a portion of the article met the criterion								

### Annotated Bibliography of Articles with Inclusion or Exclusion Factors

Bensimon, E. M., Dowd, A. (2009). Dimensions of the transfer choice gap: Experiences of Latina and Latino students who navigated transfer pathways. *Harvard Educational Review*, 79(4), 632-658.

This study focused on the Latino community college student “transfer choice gap” (Bensimon, Dowd, Alford, & Trapp, 2007), or the phenomenon of students who qualify to transfer to a selective university, but instead choose a less selective institution or not to transfer at all. Secondary analysis of interviews with a sample of three Latina and 2 Latino students who were eligible to transfer to highly selective institutions was conducted. The findings indicate that institutional agents are needed to help community college students overcome informational and cultural barriers to transfer into selective institutions.

Campa, B. (2010). Critical resilience, schooling processes, and the academic success of Mexican Americans in a community college. *Hispanic Journal of Behavioral Sciences*, 32(3), 429-455. Retrieved from /eonline/ database.

This study consisted of semi-structured interviews, focus groups and observations of five Mexican-American students who had attended community college for at least two semesters. Students varied in gender, age, marital status, family composition, occupation and degree intent. The study focused on student resilience rather than institutional factors related to retention, but recommended institutional policies to foster student critical resilience. Study findings indicated that critical resilience was promoted by cultivation of a larger purpose to increase opportunities for family and community.

Cejda, B. D., Casparis, C., & Rhodes, J. (2002). *Influences on the educational decisions of Hispanic students enrolled in Hispanic serving institutions*. Retrieved from /ericresearch/

This research asked the question, “Who influences the educational decisions of Latino students at Hispanic-serving community colleges?” This multiple-site case study occurred at three community college HSIs with varying Latino student compositions varying from 25 – 91% Latino. Thirty students were interviewed at each institution and these students varied in gender, age, credit completion, and parent educational attainment. Family members, community college faculty, and peers most influenced educational decision-making for Latino students. At a later review the researcher discovered this document was a conference paper rather than an article from a peer-reviewed journal, but due to the small number of articles meeting all criteria it was included.

Deil-Amen, R. (2011). Socio-academic integrative moments: Rethinking academic and social integration among two-year college students in career-related programs. *The Journal of Higher Education*, 82(1), 54.

This study examined the role of social and academic integration in cultivating feelings of belonging and academic competence for commuting community college students. This multi-site study occurred at seven public and seven private community colleges and utilized interviews, observations and surveys to gather information. 125 students participated and 37% were Latino. The study found that in-class socio-academic integrative moments were most frequently cited by students as precursors to their persistence by providing opportunities for validation and social capital formation. Institutional agents were also a valuable source of support.

Garcia, M. (2010). When Hispanic students attempt to succeed in college, but do not. *Community College Journal of Research and Practice*, 34(10), 839-847.

In this study, first semester Hispanic community college students from a single institution were called to welcome them to the college and offer guidance and assistance. 461 students provided comments and 124 (27%) of these comments referred to institutional barriers. This article reports the themes identified in student comments.

Ornelas, A., & Solorzano, D. G. (2010). Transfer conditions of Latino community college students: A single institution case study. *Community College Journal of Research and Practice*, 28(3), 233-233-248.

This single institution case study of a predominantly Latino California community college asked the questions: (1) What are the resources for academic motivation and potential barriers that inform the transfer function and process for Latino community college students?; and (2) What are the essential elements required for instituting a community college transfer culture? The study focused on the experience of students and included 13 focus groups with 191 students, anonymous surveys, and in-depth interviews of 24 students selected from the surveys. Seventeen counselors, 12 faculty, and 6 administrators were also interviewed. The study found the following contributors to low transfer rates: (1) a lack of institutional commitment to the transfer function; (2) administrators' tendency to assume Latino families did not value education; (3) complexity of student lives as they balance multiple roles.

Pérez, P., & Ceja, M. (2010). Building a Latina/o student transfer culture: Best practices and outcomes in transfer to universities. *Journal of Hispanic Higher Education*, 9(1), 6-21. Retrieved from /eonline/ database.

This article was a literature synthesis of quantitative and qualitative research on Latino community college student transfer utilizing a critical race theory and validation lens to review the literature. This article was eliminated from the review because it did not meet the qualitative guidelines. However, important themes were highlighted in the article and its inclusion may be reconsidered if these themes do not emerge from qualitative research.

Perrakis, A., & Hagedorn, L. S. (2010). Latino/a student success in community colleges and hispanic-serving institution status. *Community College Journal of Research and Practice*, 34(10), 797-813. Retrieved from /eonline/ database.

This report combined information about the role of HSIs in increasing Latino college completion and the impact of HSI status on student and staff experience. The qualitative portion of this report included fourteen interviews with students, one faculty member, one counselor, and two administrators at an urban HSI with approximately 70% Latino enrollment and a strong record of degree completion for Latino students. While students were largely unaware of HSI status, the staff were keenly aware of the unique needs of Latino students and the need for different understanding and approaches to respond to these needs. Latino students desired interaction with more Spanish-speaking employees, and increased instructor cultural competency. Most Latino students expressed a desire to transfer but remain close to home in order to meet family and work obligations.

Rendón, L. I., & Jalomo, R. (1994). Transforming at-risk student into powerful learners. Chicago, IL: Prepared for the American Association for Higher Education 1994 National Conference.

The purpose of this study was to assess how experiences, in and outside of class, influenced culturally diverse students' belief in their innate capacity to learn, self-concept, and learning. Focus groups were conducted at two community colleges, one with a growing African-American population and the other with a growing Latino population. Forty-nine students participated. The article identified types of invalidating and validating behavior and proposed a relationship between validation and changes in student sense of self-efficacy and motivation and

beliefs about their academic competence. This transformation allows students to transition to college and be successful students. Even though this was paper was presented at a conference rather published in a peer-reviewed journal, the concepts appeared seminal in the literature review and it met all other criteria. It was therefore included.

Rendón, L. I. (2002). Community college Puente: A validating model of education. *Educational Policy, 16*, 642.

This case study of Community College Puente examines where validation occurs, who provides validation and the impact validation on students. The case study included interviews with Puente Project staff, focus groups with 15 high school and community college Puente Project counselors, observation of Puente classroom, and review of 22 written college student narratives about what the Puente Project meant to them. Study findings indicate that validation can have a transformative impact on students and the creation of personal, caring relationship is key to keeping students in college.

Reyes, M. (2011). Unique challenges for women of color in STEM transferring from community colleges to universities. *Harvard Educational Review, 81*(2), 241-263. Retrieved from /ericresearch/ database.

This study examines the factors that assist women of color transfer students in their pursuit of postsecondary degrees in STEM fields. Four women of color (2 African-American, 1 Native American, 1 Chinese) were interviewed twice. Findings indicate that students experience a chilly climate based on attitudes and treatment signaling that they do not belong because of age, ethnicity, and gender as well as preconceptions that transfer students are not adequately prepared. This study was eliminated because none of the women of color were Latina.

Vigil Laden, B.V. (1999). Socializing and mentoring college students of color: The Puente project as an exemplary celebratory socialization model. *Peabody Journal of Education, 74*(2), 55-74. Retrieved from /ericresearch/ database.

This case study of the Community College Puente project highlights the role of mentoring and organizational socialization in Latino transition to college. The study consisted of interviews with program administrators and faculty, program observations, and program document review. Latino professionals serving as mentors act as cultural role models of cultural identity and professional success. Integration of mentors, counselors, and increasingly rigorous writing and reflection increases student sense of identity and academic competence.

Vigil Laden, B. (2004). Serving emerging majority students. *New Directions for Community Colleges, 127*(Fall), 5.

This introductory chapter to a volume on serving emerging majority students in community college set the context for the remaining chapters by describing demographic trends and highlighting two model community colleges. This book chapter was eliminated from the review because narrative text highlighting student perspectives and experience was not a component of the chapter.

Ralph Mario Wirth & Raymond V. Padilla (2008). College Student Success: A Qualitative Modeling Approach. *Community College Journal of Research and Practice*, 32(9), 688-711, DOI: 10.1080/10668920701380942.

This single site qualitative study involved four student focus groups with a total of 22 participants who were successfully progressing toward a degree at a Hispanic-serving community college in an urban area of Texas. The purposeful sample reflected the demographics of the college with 46% Latino. The study examined barriers to student success, the knowledge that successful students possess to overcome the barriers, and the actions that successful students undertake to overcome the barriers. Six categories of barriers were identified: personal, financial, coursework, learning, institutional, and student support. The knowledge students relied on to negotiate barriers included: experiential knowledge, knowledge about studying and study skills, relational and comparative knowledge, and motivational knowledge. The actions students took to address barriers were: strategic, pragmatic, persuasive, and supportive.

Zell, M. (2010). Achieving a college education: The psychological experiences of Latina/o community college students. *Journal of Hispanic Higher Education*, 9(2), 167-186. Retrieved from /z-wcorg/ database.

The purpose of this qualitative study of the psychological and subjective experiences of Latino students at community colleges is to understand factors that might contribute to persistence toward achieving their higher education goals. Semi-structured interviews were conducted of fifteen students who were Mexican immigrants or of Mexican descent attending one of seven urban community colleges. Students varied in gender, marital status, family composition, parental educational attainment and credits obtained. The study found psychological resilience (Ceja, 2004) increased motivation to overcome social and economic barriers to college access. College-student identity developed in those students who described subjective experiences involving self-efficacy, satisfaction with college experience, and a sense of purpose.

### **Annotated Bibliography of Dissertations and Inclusion or Exclusion Factors**

Becerra, Beatriz. (2006). *Hispanic Students' Perceptions of Institutional Factors that Affect Their Persistence at Austin Community College* (Doctoral Dissertation). Retrieved from <http://www.lib.utexas.edu/etd/d/2006/becerrab18315/becerrab18315.pdf>.

This study examined Hispanic students' perceptions of institutional factors that affect their persistence at Austin Community College using focus groups and follow-up interviews. The findings of this study suggest that: cost of education, external factors, faculty/student interaction, student support services and campus climate contribute to college persistence for this group of students.

Brandes, Derek. (2013). *Latina/o Student Success at an Emerging Hispanic Serving Community College: Understanding the Heuristics at Work In The Black Box* (Doctoral Dissertation). Retrieved from <http://hdl.handle.net/2376/4781>.

This study seeks to understand the barriers to college persistence Latino students experience and the knowledge needed and actions taken to overcome these barriers. Twenty-seven successful Latino students identified 34 barriers that were classified into the following categories: psychological, decision-making, self-discipline, preparation, family, institutional, and cultural barriers. Successful Latino students at PLCC used experiential, procedural, relational and comparative, motivational and anticipatory knowledge tools to address the barriers that they faced and took persuasive, supportive, pragmatic, strategic and introspective actions. Staff at the community college emphasize barriers related to resources, preparation, and the institution while the students focused on psychological, decision making and self-discipline barriers.

Bruce, Gail Berg. (2010). *Latina Success: Following the Legacy of High School Advancement Via Individualized Determination (AVID) to College* (Doctoral Dissertation). Retrieved from UMI Dissertation Publishing, UMI Number: 3415762.

Eight Latina community college students were interviewed to better understand how colleges could better support their success in coursework and degree completion. Major themes that emerged from their stories included: the importance of family relationships and support; the value of a dedicated faculty and staff who provided the participants with learning strategies to succeed in the classroom; the importance of AVID strategies as a tool for college success; the understanding of how to access the resources that lead to college admission, and the development of pride that bolsters the motivation to achieve college success.

Przymus, Beth. (2012). *Perceptions of Belonging: A Qualitative Study of Latino Community College Students* (Doctoral Dissertation). Retrieved from UMI Dissertation Publishing, UMI Number: 3546811.

This study explored factors contributing to Latino students' perceptions of belonging at a residential community college in the Midwest using qualitative methods including focus group interviews, photo elicitation, and individual interviews. Faculty and staff members, a small college atmosphere, an emphasis on personalized attention, and friendships with fellow students, and engaging in "the college experience" made students feel welcomed and comfortable. Findings about the groups with which Latino students associated and how this impacted their experiences were mixed. Knowledge about college and being recognized for achievements were conditions that contributed to participants' comfort level, self-confidence, and happiness.

Valenzuela, Yvonne. (2006). *Mi Fuerza / My Strength. The Academic and Personal Experiences of Chicana/Latina Transfer Students in Math and Science*. (Doctoral Dissertation). Retrieved from UMI Dissertation Publishing, UMI Number: 3243278.

The study sought to examine the level of academic and social integration of eight Chicana/Latina Santa Ana Community College transfer students in math and science fields who went on to UC Irvine and California State University Fullerton. Critical race theory (CRT) methodologies included interviews, storytelling, counter storytelling, and served as the primary source of data collection. Since the focus of this research was on experiences after transfer to a university, this study was eliminated from the inclusion set.

### **Conceptual Model from Analytical Themes**

As described in one of this researcher's earliest thematic analysis memos (Sandelowski & Barroso, 2007), initial descriptive thematic coding resulted in more than eighty themes that began to organize around: (1) roles encountered in the institution, (2) student motivation and development, and (3) the importance of in-class support versus outside of class activity. Initial roles noted frequently were instructors, peers, institutional agents, and to a lesser extent counselors and mentors. Students experienced self-doubt and feelings of being lost and unconnected. They indicated a need for access to counselors, development of college knowledge, emotional and moral support, and support for educational planning. In-class support and engagement figured much more prominently than any outside of class activity. Peer instrumental support is valued even more than social engagement.

Initial grouping into analytical themes resulted in thirty-two themes. The most frequently occurring coding referred to institutional supports and barriers, student development, and roles. Another round of analysis illuminated differences between formal roles in the institution and roles acquired by types of action taken. For example, instructor, counselor, advisor are formal roles, but acting as an institutional agent mentor or a role model occurs based on behaviors and type of relationship developed with students. Mentor occurred in the literature both as a formally assigned role and as a role that was acquired based on behaviors on type of relationship. Another frequently cited supportive relationship was role modeling by family members, even distant family members who had gone to college before.

The third round of analysis consolidated analytical themes into the fifteen categories shown in Table 7, which could be grouped into broader categories of institutional factors, student development, roles and relationships, location (in or outside of class), and external factors

(family support and/or pull factors). The majority of the coding both in terms of sources and number of references has to do with institutional supports and barriers. The next most common set of analytical themes has to do with student development.

*Table 7 Analytical Themes*

Name	Sources	References
Institutional Supports	15	201
Institutional Barriers	13	152
Student	12	82
Student Development - Motivation	11	76
Student Development - Success Attributes	12	115
Instructor	12	69
Role Model	12	22
Institutional Agent	10	75
Peer	10	54
Counselor	7	23
Mentor	6	13
In-Class	11	97
Pull Factor	11	56
Family Supports	7	29

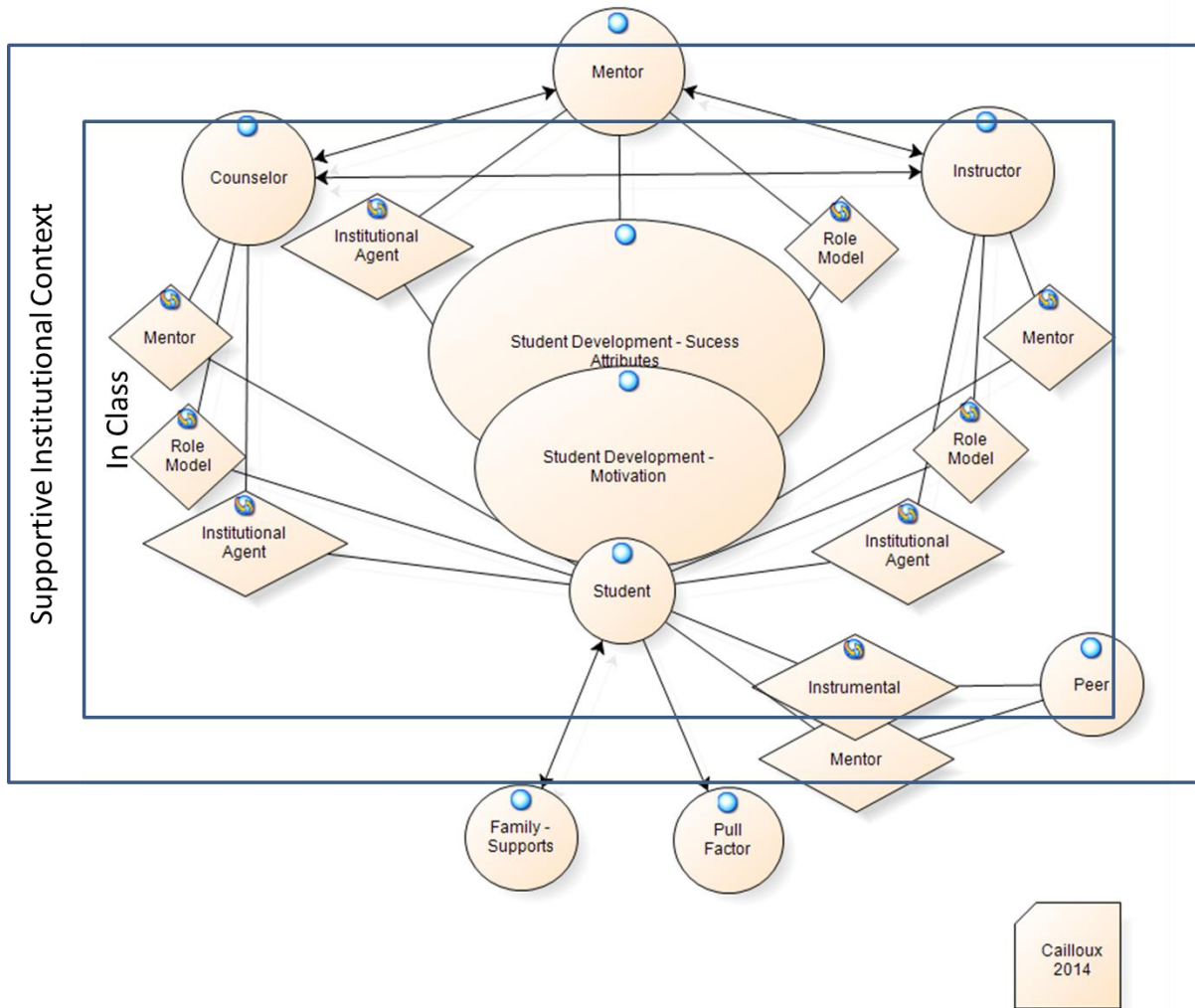


Figure 1 - Conceptual Model from Analytical Themes

### Student Development and Student Success

The center of this model is the student and their development over time as they persist towards their educational goals. Students enter the two-year college filled with self-doubt and fear of revealing their outsider status and inadequate preparation. They describe a lack of college knowledge, unclear goals, and a feeling of being unconnected or lost.

*“When I started college, it felt like I walked into a whole other world. Thinking of going to class and being around other people who are also there to learn made me nervous... I am always nervous, I am always nervous when I am here at ACC, especially if I do not know the teacher, or if I get a new teacher or if I have new students. I always get nervous to talk to them, not expecting how they*

*are going to answer or how I will get to know them. I was nervous, but maybe because it was my first year, but also I felt kind of lost all the time. Everything was so different from high school and it was so different from what I thought college would be, so I was lost. I was lost and I was so insecure that I would doubt myself about everything.” (Becerra, p. 76)*

*It’s real tough when you don’t find or you don’t have that help or when you don’t know, or you’re just lost. I think that’s a big thing for us. When we feel lost and we don’t know what to do and we don’t feel like we’re normal. (Przymus, p.92)*

*Making an appointment to seek information and advice from a counselor was not something that Josefina knew how to do. Based on her own experience and that of other students... she summed up the two biggest barriers to seeking help as “not knowing what to ask” and “being afraid that if they do ask that they’re going to feel like they shouldn’t be asking.” (Bensimon & Dowd, p.650)*

*Not being able to deal with setbacks in their education was another psychological barriers that PLCC Latinas/os experience. Irma, a fourth quarter PLCC student suggested, “sometimes students who fail a quarter don’t come back because they don’t think that they can progress and get better.” (Brandes, p. 37)*

One recurring theme in terms of student motivations was a desire to serve as a role model for family members, whether they are younger siblings or their own children. Another theme was being motivated to uplift and serve the Latino community and to disprove low expectations.

*For me, my daughter is what motivates me! What keeps me going is the fact that if she sees that I graduate and made something of myself, then she will be motivated to do the same thing. She sees me do my work in the computer, and she wants to get her play computer toy. When I pick up a book, she gets her book. If she sees me succeed, she will do it too (Campa, p.440)*

*I have seen my mom’s hands. I have seen my mom’s body. I have seen my dad—he works every day from seven in the morning to eight o’clock at night as a barber. He used to work as a carpenter. His body has gone through a lot. And I know that my mom and my dad came here [the United States] for a reason, and that was to have a family and to see us have a better life. That’s my main concern of what I’m doing, of why I’m going to a university. That’s my main concern. My mom and dad are my main role models. I don’t care if they didn’t go to a university. I don’t care if they’re not scientists. They are my role models (Ornelas, p. 237).*

*Everybody is looking up to me in my family. My brother wants to go into law and I have a cousin that wants to be a photographer. ... I’m opening doors for my family and others. (Bruce, p.122)*

*I want to make people realize that we're not worthless, like many people think about Hispanics. I want to be an example for people that are struggling like me. (Yurelia)*

*I want to better myself because I am Hispanic. More and more cultures are beginning to be more successful than the American culture. I think that being Hispanic motivates me to become something. (Jennifer)*

*You feel stereotyped by everyone. I know I can do this and I am going to do this, even though I came from a Hispanic culture, I want to do better and be successful. (Jeannette) (Bruce, p. 124)*

## **Roles and Relationships**

The conceptual model developed from this thematic synthesis places the student and student development at the center of a web of supportive relationships that occur primarily through classroom contact. This model envisions counselors, instructors and mentors working together as institutional agents to increase the social capital of first generation college students and to support student success. Individuals in these roles engaged in institutional agent behaviors of “bridging to opportunities”, “building high aspirations”, “direct support”, and “system linkage and networking support.”

*My professor encouraged me to think about continuing on. My first goal was to earn the certificate so I could get a better job. She showed me that with the associate's degree I could get do more with employment so I continued on. Now she is suggesting I think about a bachelor's degree and I'm thinking about transferring (Cejda, Casparis, Rhodes, p. 13)*

*Carola ended up majoring in English, a choice she attributed to a professor who acted like an “informal advisor.” He told her “you’re good at English, I can see that you have—he didn’t say talent, he said the potential to write better, and like okay, so I guess I’ll be English [major].” Speaking about the professor she said “he kind of broke it down for me. ‘If you’re going to law school, writing skills and argumentative skills, those will be the best for you.’ That’s what he said,” Carola recalled. (Bensimon & Dowd, 2009)*

*Students sought faculty they perceived as experts in their area of interest. These were seen as mentors and guides regarding future professional options and career opportunities. They spent time with faculty in and out of the classroom and relied on them for support to resolve academic difficulties, discuss personal*

*problems, and navigate the campus' bureaucracy. Some of these relationships were particularly meaningful in leading students to access certain resources that would not otherwise be available. These resources include letters of recommendation or reference, information regarding specific scholarships, review of students' scholarship applications, and professional contacts in the student's field of interest. Respondents also pointed out that having conversations and interactions with faculty outside of the classroom made them feel cared for and comfortable asking for help when needed. The faculty's welcoming attitude not only meant that instructors were concerned about them as students but also that they saw them as individuals. Several students reported that interactions with faculty motivated them to pursue career goals and to anticipate professional possibilities (Zell, p.178)*

*Many two-year students are marginal in that they are so tenuous in their college student role that seemingly minor setbacks are not interpreted as such and could easily throw them off course and back into a re-adoption of a non-college student identity. Greg was "just going to quit school and leave." Julia was ready "just give it up." Maria, in her first semester, constantly thought, "What the hell am I doing here?" It was the help offered to procedurally navigate the institution that emerged as a center- piece of relationships that solidified their confidence in and commitment to their college student role. Greg described his transformation as a "re- birth." Rating her confidence on a scale of 1 to 10 Julia said, "When I started, I'd say about a five, but now I'm . . . I'd say about a nine." Maria, toward the end of her second year as a part-time student, confidently stated, "Now I'm completely turned around and I'm not stopping." (Deil-Amen, p.61)*

Student began to feel successful as they built college knowledge and insider knowledge, developed a sense of college identity and academic competence, and increased self-efficacy and sense of direction. These success attributes were built primarily through interactions with college employees.

### **Family Support and Pull Factors**

While the family was mostly cited as a motivating factor, to a lesser extent, family obligations were mentioned as "pull factors" which could cause a student to not persist in their education. Other pull factors included economic issues such as needing to hold down a job.

### **In-Class Socio-Academic Integration**

A recurring theme was the many commitments and lack of time to engage in activities outside of class, and the existence of social support systems outside of the college environment for most community college students.

*I really do not have a lot of time. Although there might be some clubs and organizations, I have not looked into them because I do not have a whole lot of time. I am not part of any club or organization. I do not have time to be in clubs, or any other deals just classes work and then go home. I do not really stick much around campus. I only go there for class. I have too much going on to be involved. It seems that students have jobs that they work forty hours a week or plus, there is not a lot of time (Becerra, p.70)*

*Even if I did have friends, I don't have time for friends. . . . I'm doing 13 credit hours and working a full-time job. But sometimes, like this weekend . . . even though we're set for 40 hours, they [her supervisors] will still run us on the weekends (Przymus, p.85).*

*Those who did participate in out of classroom activities did so only if the activity would advance academic or professional goals. For example, one student said she became involved with the college's nursing association, only because it provided support and mentoring to nursing students, something she could benefit from professionally. (Zell, p. 175)*

Relationships with peers are important and the openness and friendliness is seen as part of the institutional climate, but the nature of the relationship is instrumental.

*Students described limited, yet purposeful interactions with other students. For instance, Deanna relied quite heavily on other students' answering of her questions "just in class time; not out of class, like when I have a question to ask, and they know, and tell me." (Deil-Amen, p 68).*

This model proposes adoption of socio-academic integrative moments framework (Deil-Amen, 2011) rather than parallel social integration occurring outside of class as theorized in many four-year retention models.

### Supportive Classroom Environment

Relationships occur primarily within a supportive classroom environment. Analytical themes about a supportive classroom environment included providing encouraging feedback and affirming student's personal voice, use of inclusive pedagogy, creating a sense of *familia* and providing personalized support. Maintaining academic rigor, and creating a learning community were mentioned less frequently.

### Supportive Institutional Context

The most important element of a supportive institutional context was access to personalized, accurate, supportive, high-touch advising. As important was a sense of mattering and being validated within the institution. Other supportive factors included academic support, a welcoming institutional culture and climate, institutional relationship with members of the student's family, institutional relationship with K-12 institutions, financial supports, and faculty and administrators of color. Institutional supports are listed in Table 8.

*Table 8 Institutional Supports*

Name	Sources	References
Institutional Supports	15	201
Advising - Supports	12	50
Personalized Support - Mattering - Validation	9	38
Institutional Culture	9	31
Institutional Relationship with K-12	5	15
Academic support	5	10
Financial Supports	5	8
Faculty and Administrators of Color	4	8
Institutional Relationship with Family	4	4
Curriculum reflects Student Identity	3	6
Easily Navigable Systems	2	12



*guys, check it out, ’’ but it was “maybe like once a semester from every professor.” He also complained that announcements of transfer activities were usually posted on bulletin boards that had “hundreds” of other announcements on them. The limited availability of counselors also forced him to take charge of his transfer choices. (Bensimon & Dowd, p. 646)*

*The student shared, “This was my first time in college and I have been out [of high school] for a long time and I’m a single parent of two and I just have trouble finding enough time in the day to do homework.” I informed her she could attend part-time and would still be eligible to receive financial aid (grant) at part-time status. She replied, “I wish I had known that it was okay for me to attend college part-time my first semester and I wouldn’t have to be experiencing so much trouble.” I asked why she believed she had to attend full-time. She said, “It was my own perception of college since I didn’t know who to ask, I just assumed.” In this instance, had an advisor provided holistic advising by taking time to gather personal information about the students, this student would not have felt helpless, inadequate, or overwhelmed. (Garcia, p. 843)*

*Being undecided about your major or career was the main barrier student participants identified. Pia explained that being undecided was a challenge that stopped other students she knew from progressing at PLCC: Most students, like most of my friends, they didn’t know what to come for. They just wanted to come because they just wanted to go to college or further their education. But, they got to a point where they didn’t know where to go and they didn’t have that help...they ended up dropping. (Brandes, p. 41)*

### **A Revised Model of Community College Latino Student Success**

The previous chapter introduced several factors impacting Latino Student Success based in large part on the *Student/Institution Engagement Model* (Nora, 2003) which emphasizes the interaction between the student and the institution, includes the impact of campus climate on Latino students (Hurtado, 1996; Hurtado & Carter, 1997) and the mediational effect of validation (Rendón, 1994) in promoting ‘Sense of Belonging’ (Hurtado & Carter, 1997) as opposed to social and academic integration (Tinto, 1987; Tinto, 1993; Tinto, 1997).

The factors identified as contributing to Latino community college student retention identified in Chapter 2 include:

- Background characteristics

- Encouragement and family support
- Environmental pull factors
- Sense of purpose and institutional allegiance;
- Academic and social experiences at college
- Validating experiences;
- Financial support
- Institutional responsibility for student success
- Social capital formation
- Institutional alignment and college readiness
- Institutional agents
- Institutional climate
- Academic performance and academic momentum
- Sense of belonging and competent membership

This thematic synthesis supported the importance of academic preparation as a precollege factor and the impact of environmental pull factors. Educational aspirations occurred in the negative as students struggled with unclear goals. Likewise, the importance of college readiness was evident in the many ways students spoke about being lost, full of self-doubt, and lacking in college or “insider” knowledge. The predominant factors of importance in the research synthesis were related to academic and social experiences with a focus on relationships and validation from counselors and instructors and formally assigned mentors as they acted as institutional agents, mentors and role models. Classroom climate and inclusive pedagogy were also important in creating a sense of belonging. Academic rigor combined with strong relationships and validation lead to a sense competent membership.

The major differences in the conceptual model developed is the focus on socio-academic integration in the classroom, and the importance of teachers and counselors building relationships and serving as institutional agents in support of student success. Commitment to attend a specific institution did not show up in research synthesis at all. Academic performance and momentum was only addressed through student development of academic competence and self-efficacy.

Table 10 - Analytical Themes compared to Factors from Literature Review

Analytic Theme	Factors from Literature Review
Institutional Supports	Institutional Responsibility for Student Success
Advising - Supports	
Personalized Support - Mattering - Validation	Validating Experiences
Institutional Culture	Institutional Climate
Institutional Relationship with K-12	Institutional Alignment
Academic support	
Financial Supports	Financial Support
Faculty and Administrators of Color	
Institutional Relationship with Family	
Student Development - Motivation	Sense of Purpose
Student Development - Success Attributes	Academic Performance & Academic Momentum; Sense of Belonging & Competent Membership
Instructor	
Role Model	
Institutional Agent	Institutional Agent/Social Capital Formation
Peer	
Counselor	
Mentor	
In-Class	Academic & Social Experiences at College
Provide Encouraging Feedback and Affirm Student Personal Voice	
Creating Familia In-Class and Provide Personalized Support	
Inclusive Pedagogy	
Learning Community-Multiculturalism or Pluralism	
Academic Rigor	
Pull Factor	
Family - Supports	Encouragement and Family Support

### Institutionalizing Latino Student Success

#### Organizational Culture

Organizational culture has been interpreted in many ways by a variety of researchers as the following definitions illustrate:

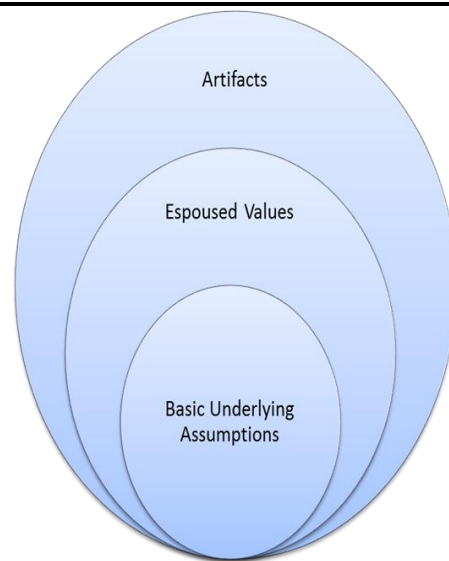
*Culture is a “pattern of shared basic assumptions that the group learned as it solved its problems of external adaptation and internal integration, that has worked well enough to be considered valid and therefore, to be taught to new members as the correct way to perceive, think, and feel in relation to those problems” (Schein, 1992, p.12)*

*Culture is persistent patterns of norms, values, practices, beliefs, and assumptions that shape the behavior of individuals and groups in a college or university and provide a frame of reference within which to interpret the meaning of events and actions on and off the campus (Kuh & Whitt, 1988)*

*Culture is the dominant patterns of shared assumptions, values, beliefs, ideologies, and meanings that people have about their organization that shapes what individuals do and how they think (Peterson & Spencer, 1991 from Eckel & Kezar 2003)*

Combining these definitions, organizational culture is comprised of patterns of shared assumptions, values and beliefs, is created and reinforced over time through the experience of the group and it influences how group members think and behave. Schein describes culture as “deep, pervasive, complex, patterned, and morally neutral” (1992, p.48). He speaks of organizational culture as a concept that is “hard to define, hard to analyze and measure, and hard to manage.” (p. xi), yet an essential role of leadership is in creating and sustaining a culture that functions effectively within its environment (Schein, 1992). Schein provides a taxonomy of culture to explain the multi-layered complexity of this concept which includes (p. 17):

*Table 11 Schein's Taxonomy of Organizational Culture*



Layers of Organizational Culture	Description
Artifacts	Visible organizational structures and processes
Espoused Values	Strategies, goals, philosophies
Basic Underlying Assumptions	Unconscious, taken-for-granted beliefs, perceptions, thoughts, and feelings

At the deepest level of “Basic Underlying Assumptions”, Schein examines how individuals in organizations understand truth, time, space, human nature, human activity, and human relationships. In this context, basic assumptions about human nature, human activity, and human relationships are probably most in need of examination. The predominant Western view

of human nature views the individual as author of his or her fate, and views the individual as perfectible if the right actions are taken (such as working hard). Elements of human activity include assumptions about hierarchy and role definition; work versus family roles; and the perception of the group's ability to alter its environment. Human relationships have to do with individualism versus group orientation; perception of power distances; reliance on group work to solve problems & implement solutions. Another underlying assumptions that could have a significant impact on model building is the concept of truth, what is considered valid and relevant information, how should it be interpreted, and the amount of information necessary for decision-making. Understanding of time considers the importance placed on scheduled time; pace and duration of event; orientation toward the past, present or future, time horizon and speed of completion (Schein, 1992).

### **Community College Culture for Latino Student Success Model**

Using the other higher education diversity models (see following section) to inform a Community College Culture for Latino Student Success (CCCLSS) results in the following markers of culture change that will require examination and change to support Latino success in a community college context:

CCCLSS	Analytic Themes
Curriculum	Curriculum reflects student identity; Curriculum alignment K-12 & 4-year institutions College/ Insider Knowledge; Career/ Education /Financial Planning; Co-curriculum is classroom- connected
Campus Climate	Highly supportive, easily navigable systems with validating practices; Classroom-focused support systems; Faculty preparation for Latino students; Friendly climate; Celebration of student culture
Access	<i>(Access did not appear in the analytic themes, but was added as a key marker based on later comparisons to other diversity models.)</i>
Pedagogy	Sense of ‘Familia’ in Class Affirm Student Personal Voice; Inclusive Pedagogy; Academic Rigor & Scaffolding
External Relations	Latino Community; Families of Latino Students; P-20 Partnerships; Community Members as Mentors
Policies & Services	Advising - Supports Personalized Support - Mattering - Validation Academic support Financial Supports Faculty and Administrators of Color

These six markers are seen as creating a supportive structure for college employees to build relationships with students and take on institutional agent roles which in turn supports student development, learning and achievement.

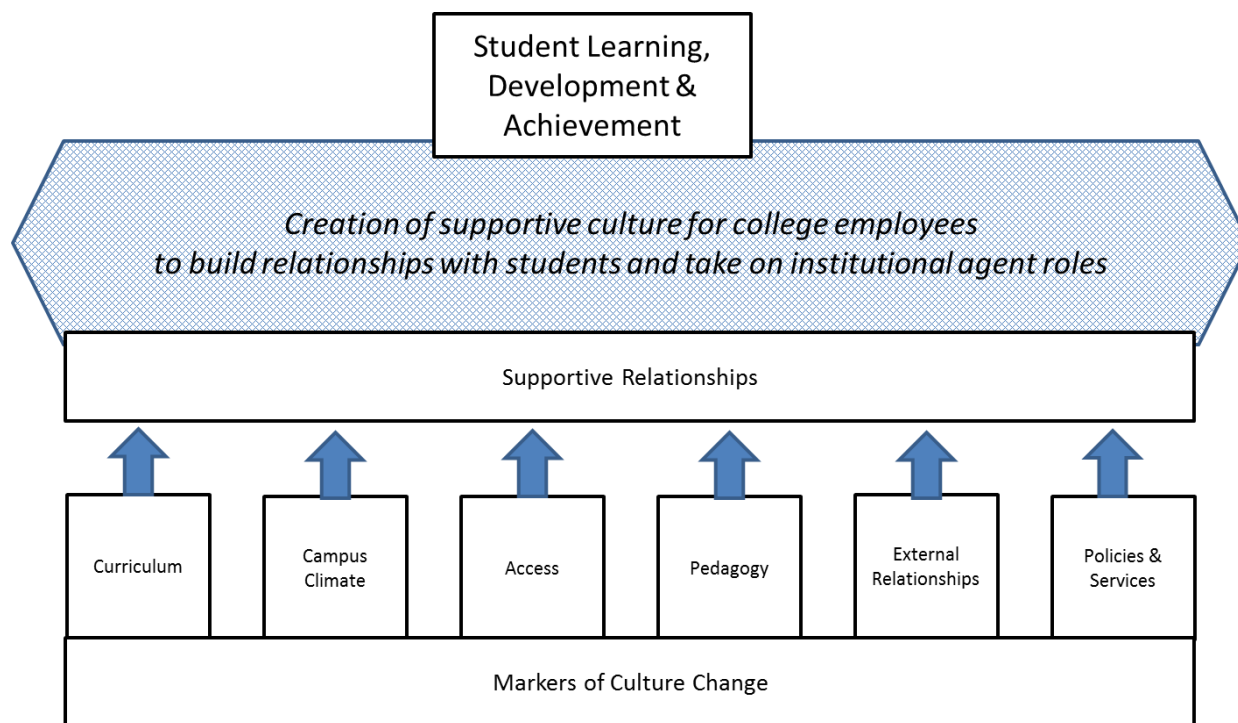


Figure 2 Community College Culture of Latino Student Success (CCCLSS) Model

CCCLSS	Analytic Themes
Supportive Relationships	Networks of relationships to support students; Institutional Agent role Adoption
Student Development, Learning & Achievement	College/Insider Knowledge; College Identity; Academic Competence Sense of Direction

### Other Models to Inform Culture of Latino Student Success

In this section, the analytical themes described above have been organized and grouped in order to compare the proposed *Community College Culture of Latino Student Success (CCCLSS)* model described on the previous page to existing diversity models. The models are the Multi-contextual Model for Diverse Learning Environments (Hurtado et al., 2012), the American Association of Colleges and Universities (AACU) model of Inclusive Excellence (Williams,

Berger, & McClendon, 2005a), and the Transformational Tapestry Model (Rankin & Reason, 2008).

Hurtado et al. (1998) introduced a diversity framework based on a synthesis of research which models the forces that interact to create the conditions under which students can learn from diversity. The original model included: (1) historical legacy of inclusion or exclusion; (2) structural diversity; (3) psychological; and (4) behavioral dimensions (Hurtado, Milem, Clayton-Pedersen, & Allen, 1998). Milem et al. (2005) refined this model by adding an organizational element focused on supportive structures for institutionalizing diversity including policies, practices, curriculum, tenure processes, organizational decision-making, and budget allocation. A more comprehensive conceptualization, the *Multi-contextual Model for Diverse Learning Environments* (MMDLE), places student, instructor and staff identity at the core of institutional climate which includes pedagogy, course content, and co-curricular practice and programming within the context of historical, compositional, organizational, psychological and behavioral dimensions. This institutional context is embedded within socio-historical, policy, community and external commitment macro contexts ((Hurtado & Ruiz, 2012; Hurtado et al., 2012).

As part of their *Making Excellence Inclusive* initiative, the Association of American Colleges and Universities (AACU) commissioned several reports to propose a model and change process to create institutions that systematically leverage diversity for student learning and institutional excellence. The model envisions “diversity as a key component of a comprehensive strategy for achieving institutional excellence—which includes, but is not limited to, the academic excellence of all students in attendance and concerted efforts to educate all students to succeed in a diverse society and equip them with sophisticated intercultural skills” (Williams et

al., 2005a). The Inclusive Excellence change model is based on addressing multiple dimensions of organizational behavior as described by Berger and Milem (2000) including: systemic, bureaucratic/structural, collegial, political, symbolic (J. B. Berger & Milem, 2000). A scorecard is proposed to drive and assess change in: (1) access and equity; (2) campus climate; (3) diversity in the formal and informal curriculum; and (4) learning and development (Williams et al., 2005a).

The *Transformational Tapestry Model* (TT) (Rankin & Reason, 2008) provides tools to assess and move campuses from their current campus climate toward a “transformed campus climate” via assessment and interventions. The model is grounded in critical theory and examines power and privilege and systems that maintain power imbalance. The campus climate model is comprised of: (1) access/retention; (2) research/scholarship; (3) inter-and intragroup relations; (4) curriculum and pedagogy; (5) university policies and services; and (6) external relations.

In the table that follows, analytical themes of the CCCLSS were grouped to try to align with existing diversity models and similarities and differences were noted.. Curriculum and Campus Climate are the only components included in all four models. CCCLSS, MMDLE, and TT address pedagogy, external relations, and policies and services. CCCLSS and MMDLE and AACU included co-curriculum, but in the case of CCCLSS the emphasis is on embedding or connecting co-curricular functions to the classroom, so that item was included in curriculum in CCCLSS. AACU includes student learning and development and the MMDLE model starts with student and staff identity at the core. CCCLSS emphasizes student learning and development supported by a network of relationships and the curriculum and instruction in the classroom. The relationship component of this model is so critical, this was added as a separate component of the

CCCLSS. The three comparison models all included Institutional Composition/Access & Equity but CCCLSS addressed this only in the composition of faculty and staff. Adding an element for student access is a necessary change to CCCLSS. Student achievement was included with student development and learning. The MMDLE model contains several components that reference institutional and macro contexts. While not a part of the CCCLSS, these will be important considerations as an institution performs an initial culture assessment to prioritize change implementation process. In the table that follows (Table 12, Column 2), a name is proposed for each component of the CCCLSS.

Table 12 Matrix of Diversity Models

<b>Analytic Themes</b>	<b>CCCLSS</b>	<b>MMDLE</b>	<b>Inclusive Excellence</b>	<b>TT</b>
Curriculum reflects student identity; Curriculum alignment K-12 & 4-year institutions College/ Insider Knowledge; Career/ Education /Financial Planning; Co-curriculum is classroom- connected	Curriculum	Institutional Context: Course Content	Diversity in Formal & Informal Curriculum	Curriculum
Highly supportive, easily navigable systems with validating practices; Classroom-focused support systems; Faculty preparation for Latino students; Friendly climate; Celebration of student culture	Campus Climate	Institutional Context: Behavioral & Psychological	Campus Climate	Inter and intra-group relations
	Access <i>Achievement included with Student Learning</i>	Institutional Context: Compositional	Access and Equity	Access and Retention
Sense of 'Familia' in Class Affirm Student Personal Voice; Inclusive Pedagogy; Academic Rigor & Scaffolding	Pedagogy	Institutional Context: Pedagogy		Pedagogy
Latino Community; Families of Latino Students; P-20 Partnerships; Community Members as Mentors	External Relations	Macro Context: Community Context & External Commitments		External Relations
Advising - Supports Personalized Support - Mattering - Validation Academic support Financial Supports Faculty and Administrators of Color	Policies & Services	Institutional Context: Organizational		University Policies & Services
	<i>Combined with Curriculum above</i>	Institutional Context: Co-Curricular	Diversity in Formal & Informal Curriculum	
Networks of relationships to support students; Institutional Agent role Adoption	Supportive Relationships	Student & Staff Identity		
College/Insider Knowledge; College Identity; Academic Competence Sense of Direction	Student Development, Learning & Achievement		Student Learning & Development	
		Institutional Context: Historical		
		Macro Context: Policy		
		Macro Context: Socio-Historical		
				Research and Scholarship

### **Higher Education Institutional Change Models**

Higher education institutions with their historical disciplinary autonomy, shared governance, and loosely coupled organizational structures prove to be extremely resistant to change as several researchers have noted (Birnbaum, 1991; Kezar, 2001; Williams, Berger, & McClendon, 2005b). Even if institutions intend to make transformational changes, higher education institutions are much more likely to NOT experience transformational change than to do so (Eckel & Kezar, 2003). In addition, given that a higher education institution is likely made up of many different subcultures such that even when substantial change has occurred; every constituent may not have experienced it and may debate its occurrence. Since it is a function of culture to create predictability and reduce individual anxiety, this resistance is not surprising, but as a practitioner preparing an institution for known demographic shifts, promoting change to the culture is a necessity.

Helping people to think differently about assumptions and values is a starting point for institutional change, and can be accomplished by: (1) numerous, continuous & widespread conversations (2) cross-departmental teams; (3) faculty & staff training; (4) outsiders and their ideas; (5) creating defining documents; (6) public presentations; and (7) making a case for change. Institutions that successfully accomplished transformative change engaged in the following strategies: (1) senior administrative support; (2) collaborative leadership; (3) flexible vision; (4) staff development; and (5) visible action (Eckel & Kezar, 2003, p.78). These strategies are interconnected and must be balanced in their use and adjusted in recognition of the existing culture of the institution (Kuh & Whitt, 1988; Schein, 1992).

Kezar's (2006) interviews of college presidents who successfully navigated transformational change reinforced the important role of leadership at each phase of a change

initiative. Three phases of diversity initiative implementation: Phase 1 – Mobilization (becoming aware of the change, exploring understanding); Phase 2 – Implementation (processes and structures put in place to support change); and Phase 3 – Institutionalization (practice becomes a core value and part of culture) (Kezar, 2006). In Phase 1, leaders need to set priorities, develop and communicate vision and direction, explore meaning of the change, create support systems and energize people. In Phase II, leaders need to build momentum, provide rewards, create opportunities for involvement, act as inspirational leader or persuader, and create more systemic support systems. In Phase III, leaders need to focus on the meaning of the change, help sort, resolve conflicts and build consensus around values, and institutionalize the change (Kezar, 2006, p. 418).

The *Inclusive Excellence Change Model* (Williams et al., 2005b) is more structured and looks specifically at creating organizational change towards greater diversity and inclusion. This model utilizes an “Inclusive Excellence Scorecard” which includes: Access and Equity, Diversity in the Formal and Informal Curriculum, Campus Climate, Student Learning and Development. Goals, Objectives, Strategies and Measures (Baseline/Target/Equity) are included for each element. Each unit develops their version of the scorecard based on strategies within their control so this tool cascades throughout the organization to create focus on the objective and accountability in every area of the organization (Bensimon, 2004; Williams et al., 2005b). The Inclusive Excellence Change Model employs “levers” for enacting change: senior leadership and accountability, vision and buy-in, building capacity, and leveraging resources to help implement organizational change. It also requires that attention be paid to multiple dimensions of organizational behavior: systemic, bureaucratic/structural, collegial, political, and symbolic,

within the context of shifting demographics, social inequalities, workforce needs, and political & legal dynamics.

Bensimon et al. (2007) applied a sociocultural-based structure involving practitioner inquiry, learning and change in an action-research project entitled *Equity for All* involving nine community college campuses starting initiatives to achieve equitable educational outcomes for students that had been historically marginalized (Bensimon, Rueda, Dowd, & Harris III, 2007). *Equity for All* change efforts look first to practitioners' underlying assumptions or "cognitive frames" especially in relationship to their beliefs about the causes of racial inequity and sense of self-efficacy as agents of change. Purposeful inquiry is required to explore these frames because they aid in understanding the world and diminish the chances of uncovering inequitable practices that have become normal. Bensimon proposes that individuals in higher education tend to adopt one of three cognitive frames in relationship to underrepresented students: diversity, deficit, and equity. Those with a diversity cognitive frame are focused on demographic composition of students and employees and interracial interaction resulting in learning outcomes that allow students to function in an increasingly diverse workforce and society. Those with deficit cognitive frames may value diversity but tend to attribute achievement gaps in higher education attainment to cultural stereotypes or lack of initiative or motivation from minority students. Those with an equity cognitive frame are focused specifically on educational outcomes for minority students (Bensimon, 2005). Engaging in what Bensimon calls "equity mindedness" requires double-loop individual and organizational learning. This type of learning focuses on root causes and changes that need to be made in values and beliefs as opposed to single loop learning which externalize problems and develops compensatory strategies or corrections leaving internal values, norms and beliefs intact (Argyris & Schon, 1996).

Practitioners (instructors, administrators, student services and student support staff) are asked to examine “Equity Scorecards” of Access, Retention, Excellence, and Institutional Receptivity measures disaggregated by race and ethnicity. Practitioner inquiry groups establish measures, produce baseline data, determine goals and define equity. Change occurs in this collaborative inquiry as practitioners reexamine the normalcy of race-based patterns of inequity and become more color conscious (rather than color blind), more aware that beliefs, expectations and practices can be racialized unintentionally, and more willing to assume responsibility for elimination of inequality (Bensimon et al., 2007). In other words, practitioners move through the stages of gaining awareness, making meaning, and taking action in response to a new way of thinking that is equity-minded rather than student-deficit-minded.

### **Types of Organizational Change**

In their research on institutions attempting transformative change, Eckel & Kezar (2003) create a template of elements of organizational culture that should be affected if change that impacts the overall culture of the institution had taken place. Their work builds on that of Schein, but rather than focusing on underlying assumptions, their model begins to theorize how changes in those assumptions might play out in various structural and cultural aspects of the organization. Eckel & Kezar (2003) differentiate between adaptation, innovation and transformational change. Adaptation is seen as a reaction to the environment. Innovation is more proactive, but may occur in isolation within the organization. Transformative change is something that: changes the institutional culture; is deep and pervasive and affects the whole institution; is intentional; and changes over time. Eckel & Kezar identify structural and cultural elements that will likely change if transformational change to the organization has occurred, “To add up to transformation, the following structural and cultural markers had to be aligned,

mutually reinforcing, and reflect progress in a common direction” (2003, p. 40). These structural and cultural elements overlap to a great extent with the CCCLSS model which is shown in parenthesis:

**Structural Elements:**

1. Changes to the curriculum (Curriculum)
2. Changes to pedagogies (Pedagogy)
3. Changes to student learning and assessment practices (Student Development, Learning & Achievement)
4. Changes in policies (Policies & Services)
5. Changes in budgets (Policies & Services)
6. New departments and institutional structures
7. New decision-making structures

**Cultural Elements:**

1. Changes in the ways groups or individuals interact with one another
2. Changes in the language the campus used to talk about itself
3. Changes in the types of conversation
4. Old arguments abandoned
5. New relationships with stakeholders (External Relations)

**Expected Changes in Institutional Culture**

In the following section, possible changes to cultural elements to support Latino student success in a community college setting are theorized based on the conceptual model of analytical themes referenced against the Eckel and Kezar (2003) template of expected areas of change if transformation has occurred.

**Possible Changes to Cultural Elements**

**Changes in the ways groups or individuals interact with one another**

- College services reflect the needs of the Latino community.
- Cross-institutional systems exist to ease Latino student transition.

- Courses integrate Latino issues and priorities through guest speaking, mentorship, service learning or student-lead research projects
- Latino students and their families are empowered through interactions with college personnel.
- Students acquire sense of direction, academic competence, and belonging.
- Students access resources and easily navigate college systems.
- Students utilize support services.
- Curriculum is related to college success skills, educational planning, career planning, and financial planning is integrated into courses.
- Students are provided with high-touch, just-in-time interventions and advising.
- Students are motivated to persist to completion.
- Students develop supportive peer relationships.
- Latino students have mentors and role models from the Latino community.

#### **Changes in language campus used to talk about itself**

- The college refers to itself as a Hispanic-Serving Institution and has a common understanding that this designation means equitable access and attainment outcomes for Latino students.
- The college talks about its welcoming climate that embraces diversity, inclusion, pluralism and equity.
- College personnel define themselves as institutional agents (or as personally responsible for developing student social capital and student success).

**Changes in type of conversations**

- College personnel demonstrate high level of awareness and knowledge of the Latino culture and community and current and desired level of Latino student success.

**Old arguments abandoned**

- Problem-solving related to student achievement focuses on institutional structures as well as individual student responsibility.
- Equitable treatment replaces equal treatment and ‘color-blindness’.
- Inclusion is no longer seen as a tradeoff with academic rigor or standards.

**New relationships with stakeholders**

- Latino community organizations, service providers to the Latino community, and the families of Latino students are seen as key stakeholders to the college.
- P-20 relationships are formed with shared responsibility for Latino student success.

**Pragmatic Validity**

The next chapter will define a planning process for institutionalizing a culture more supportive of Latino student success. An assessment of the pragmatic validity of the process and plan will be conducted (Sandelowski & Barroso, 2007). The president and institutional effectiveness director at the researcher’s institution will be provided with the process and plan to review and then a semi-structured interview will be conducted to gain an understanding of the pragmatic validity of this proposal and possible implementation barriers. The plan, which is the end product for this study, has immediate applicability to practice both at the researcher’s institution and the many community colleges moving towards emerging HSI or HSI status.

## **Chapter 4. Plan to Create a Culture Supportive of Latino Student Success**

In Chapter 3 a conceptual model of Latino community college student success (Figure 1) was introduced based on a thematic synthesis of qualitative literature. Multiple models of organizational cultures and elements supportive of diversity were compared to the conceptual model and a Community College Culture of Latino Student Success (CCCLSS) model was proposed (Figure 2). Models of organizational change were also introduced. This chapter integrates the work of the previous chapter to propose a change process for a predominantly White institution to address the need for culture change to more effectively support the success of Latino students.

### **Senior Administrator Role in Change Process**

Institutional change of the magnitude required in this model will take senior administrator commitment and strategic planning. Based on the needs of the institution a balance of major and supporting strategies as identified in *Taking the Reins* (Eckel & Kezar, 2003) need to be selected and utilized to maintain the momentum of the change effort. The five core strategies identified for transformational change are: (1) senior administrative support, (2) collaborative leadership, (3) flexible vision, (4) staff development, and (5) visible action. In addition, Eckel & Kezar propose fifteen supporting strategies (2003, p.110):

1. Putting issues in a broad context
2. Setting expectations and holding people accountable
3. Persuasive and effective communication
4. Invited participation
5. Opportunities to influence results
6. New interactions
7. Changes in administrative and governance processes
8. Moderated momentum
9. Supportive structures
10. Financial resources
11. Incentives
12. Long-term orientation

13. Connections and synergy
14. External factors
15. Outside perspectives

Eckel & Kezar conceptualize the core and supporting leadership strategies as interconnected and reinforcing, like the strings holding together a mobile. In their *Mobile Model for Transformational Change* the core and supporting strategies reinforce the ability of the college community to build new understanding of a changed environment and the need to take action. Eckel & Kezar state, “what holds the transformation process together is the collective making of meaning” (2003, p. 148). These leadership strategies combined with practitioner-lead inquiry into institutional data, a strategy developed by the University of Southern California Center for Urban Education (CUE) specifically to make racial inequalities and outcomes visible and openly discussed are proposed as the mechanisms for promoting organizational change. These inquiry groups (referred to by CUE as “evidence teams”) facilitate making new meaning that focuses on individual and collective responsibility for inequalities in outcomes that require new knowledge, practices and policies. CUE developed these protocols through their *Equity for All* research. CUE recommends inquiry group composition including institutional researchers, influential faculty members with emphasis on English and mathematics, *boundary spanners* or those who sit on cross-functional committees, and those with diverse opinions about race-based equity agendas (Bensimon et al., 2007).

### **Change Process to Create a Culture Supportive of Latino Student Success**

The change process proposed below is a combination of the work of Eckel & Kezar (2003), Williams et al. (2005), Bensimon (2004, 2005), and Bensimon et al. (2007). Despite the fact that a change process is never linear or tidy, a model of change is a helpful tool to organize thinking and planning. A nested iterative process involving shorter-term “Cultural Marker

Assessment and Change Cycle” within a longer term “College Culture Assessment Cycle” is proposed:

<p><b>College Culture Assessment Cycle (3-years or more)</b></p> <ul style="list-style-type: none"> <li>(1) Assess Institutional Culture and Needs of Latino Students &amp; Community</li> <li>(2) Establish Vision and Build Awareness</li> <li>(3) Initiate Cultural Marker Assessment and Support Change</li> </ul>	
	<p><b>Cultural Marker Change Cycle (1-3 years)</b></p> <ul style="list-style-type: none"> <li>(1) Engage Collaborative Leadership and Practitioner Inquiry</li> <li>(2) Understand and Measure Cultural Marker (Scorecard Development)</li> <li>(3) Develop and Implement Strategies</li> <li>(4) Assess Strategies</li> <li>(5) Reflection and Double-Loop Learning</li> <li>(6) Communicate and Celebrate Results</li> </ul>

**College Culture Assessment Cycle**

The “Culture Assessment Cycle” is a senior administrative function and is the starting point for understanding the college and the needs presented by the changing demographics of the community. During this stage the senior administrative team gathers data to build their own understanding and awareness and priorities for areas of needed change.

**Assess Institutional Culture and Needs of Latino Community**

The great diversity of the Latino community means that local needs and effective strategies cannot be generalized from other contexts. Demographic data as well as information gathered directly from the Latino community will be required. In turn, assessment of the culture of the institution will determine how information is communicated, how collaborative leadership is engaged, the level and type of support and structure required for practitioner inquiry and scorecard development, and communication methods from assessment. The core strategy of most importance at this stage is building senior administrative support.

### ***Institutional Culture Assessment***

The existing culture of the institution is a necessary factor to consider when determining whether transformational change is desirable or necessary and the strategies that would be most effective to implement change. “Leaders must learn to take their institutional culture, in addition to the type of change and the substance of their change agenda into consideration (Eckel & Kezar, 2003, p. 131). The *ACE Project on Leadership and Institutional Transformation* created profiles of institutional culture using a combination of the Bergquist (1992) and Tierney (1991) frameworks. *Taking the Reins* integrated these two models when proposing the template of indicators of transformational change (Eckel & Kezar, 2003). The Bergquist framework includes six institutional cultural archetypes: collegial, managerial, developmental, advocacy, virtual, and tangible (Bergquist & Bergquist, 2008). The *Academic Cultures Inventory* (Bergquist & Pawlak, 2008) can provide a starting point to gain insight into how a given institution might be similar to these archetypes. Tierney’s framework allows a closer look at what might differentiate an institutional culture looking at factors such as: environment, mission, socialization, information, strategy, and leadership (Tierney, 1991). A series of questions based on the CCCLSS and Eckel & Kezar’s framework have been included (Appendix A – Culture Assessment) as a starting point for reflecting on institutional culture and readiness to become an HSI, and as a possible tool to reassess culture on a five-year cycle. While the Culture Assessment is developed in a survey style, depending on the readiness and ability of the organization to answer the questions, it might initially be considered a set of generative question for small groups including the senior leadership team to begin to gain an understanding of impending HSI status and changes that status might require for the organization. Since

institutional culture change is a long-term proposition, it is recommended that assessment cycle be five-years or longer.

### *Assess Latino Students and Community Needs*

As student achievement data presented in Chapter 1 indicate, the experience and needs of Latinos can vary widely depending on national, ethnic, racial, gender, social and class backgrounds, immigration and citizenship status, generational status, language acquisition and academic preparation. A deeper knowledge of potential and existing students is a necessary first step to respond appropriately as an institution. Demographic, placement, and achievement data should be readily available from institutional sources. Focus groups with current and potential Latino students and their families would be another way to gather this data. Two of the documents included in the thematic synthesis (Brandes, 2013; Wirth & Padilla, 2008) utilized Padilla's (Padilla, 1994; Padilla, 1999; Padilla, 2009) qualitative focus group unfolding matrix process to discuss barriers to student success, knowledge needed to overcome each barrier, and actions necessary to overcome each barrier. This focus group protocol is a possible format for collecting information to understand local needs.

### **Establish Vision and Build Awareness**

The senior administrative team must analyze and understand the implications of the data, then firmly establish a vision and make a commitment to become Hispanic-serving. Then senior administration needs to begin the process of communicating and developing shared meaning with the college community. Framing questions to engage the college community in making meaning are, "What does becoming a Hispanic-Serving Institution mean to each department in the institution and the college as a whole?" and "What will we need to do to truly be "Hispanic-serving" defined in terms of equitable access and achievement for Latino students?" Senior

administration will need to strategize about how to build awareness of the impending change and decide upon the potential forums for building a shared understanding as a college community.

The senior administrative team will need to demonstrate their commitment to serving Latino students and build a compelling case for institutional change making it clear that higher education institutions as they have existed in the past have pretty uniformly failed in achieving equitable educational outcomes for Latinos and without significant change they are unlikely to improve these outcomes. Quantitative data describing service-area and institutional demographic trends, enrollment and achievement patterns disaggregated by race/ethnicity combined with individual stories provide a mechanism for engaging the college community. Major convocations, professional development activities, and institutional committees all can provide a forum for sharing information and providing a starting point for making sense of the changed reality, identifying each individual's role in response to the changing environment, and creating an understanding of the need for change. The leadership strategies necessary at this stage are: persuasive and effective communication, drawing attention to external factors impacting the college (changing demographics), and putting issues in a broad context (Latino student achievement). Defensiveness may occur as a result of focusing on a single subpopulation within the student body. Any institution predicting emerging HSI or HSI status should be able to point to demographic trends which justify this focus.

### **Initiate Cultural Marker Assessment and Support Change**

The most significant early decisions of senior administrative leadership will be identifying the individuals to involve in the change process as part of collaboratively lead cross-functional teams referred to as inquiry groups. The inquiry groups will need to come to a common understanding of the CCCLSS markers of cultural change. Inquiry groups can begin

their work by reviewing the analytical themes related to each CCCLSS marker to gain a common understanding of areas of importance within each element. Institutional data and focus group results can guide inquiry groups to prioritize which CCCLSS markers should be the focus of their efforts.

### **Markers of Cultural Change Assessment and Change Cycle**

#### **Engage Collaborative Leadership and Practitioner Inquiry**

Senior administration strategies while engaging collaborative leadership and practitioner inquiry are: visible action in forming inquiry groups, inviting participation, and communicating opportunities to influence results, and providing the supportive structures, financial resources and incentives to encourage participation. Senior administration must assure that the vision for change is well-understood by inquiry teams and also must have a process for staying connected to the direction and work of the teams.

Inquiry teams are encouraged to start with readily available existing data to create a *Diversity Vital Sign Profile* including indicators of student performance such as enrollment, enrollment by major, persistence, and educational attainment disaggregated for underrepresented students. Teams should also have access to data collected through institutional culture and Latino student and community needs assessment. Teams were also encouraged to take time to thoroughly understand the problems that might be occurring rather than immediately jumping to an intervention (Bensimon, 2004). In the case of emerging HSIs, a particular focus of the disaggregated data will be on equitable access and performance of Latino students as compared to overall student performance.

In this stage senior administrators show their support by creating the structures and providing the resources to engage in inquiry work. Collaborative leadership is demonstrated in

involving a broad cross section of the campus community in general conversations and inquiry work. While the vision of becoming a HSI that achieves equitable access and educational attainment outcomes for Latino students is fixed, the way the college community defines itself as an agent in promoting this outcome will vary. Support and development will be necessary in interpreting data, gaining a comfort level in addressing race/ethnicity openly, and reframing issues from a student deficit model to one of shared responsibility with the institution and practitioners. Once inquiry groups are underway, leadership will need to: evaluate training needs and provide staff development; bring in outside perspective; and continue with supportive strategies to sustain inquiry group momentum.

#### **Understand and Measure Cultural Elements (Scorecard Development)**

In seeking to understand each cultural element, the inquiry group needs to delve into underlying assumptions or “cognitive frames” that shape beliefs about both the causes of racial inequity and individual and organizational sense of self-efficacy as agents of change. Inquiry groups may need the support of experienced facilitators to identify root causes and potential institutional changes rather than focusing primarily on fixing individual students. Through this inquiry process scorecards will be developed for several of the elements of the CCCLSS model. A proposed format for the scorecards follows the Inclusive Excellence model (Williams et al., 2005b) applied to each element of the CCCLSS. Since all the cultural elements of the CCCLSS model would be overwhelming to tackle as a whole, inquiry teams should select a few elements on which to focus based on the needs of the institution. As a starting place for these conversations to occur, potential goals for each element of the CCCLSS are proposed below. Sample scorecards are also included in

Appendix B – Sample Scorecards. These are not intended to be prescriptive, but to generate ideas about the types of goals and objectives that might be generated through this process.

### ***Goals from Sample Scorecards***

#### **Curriculum**

1. Curriculum supports Latina/o student identity development and raises critical consciousness of Latina/o students.
2. Math & English curriculum is aligned from high school to college.
3. Student develop college knowledge, college identity and sense of direction.
4. Students develop sense of direction.

#### **Campus Climate**

1. Latina/o students experience support from relationships established with college employees.
2. Latina/o students and their families have strong relationships and feel they ‘matter’ to the college
3. Latina/o students experience easily navigable college systems.
4. Latina/o students experience a welcoming climate that embraces diversity, inclusion, and equity.

#### **Access**

1. Latina/o students access the college at a rate that mirrors percent of Latina/o’s in service area.

#### **Pedagogy**

1. Latina/o students engage in collaborative learning environments, co-construct knowledge building from life experience, and are recognized and visible.
2. Latina/o students engage in learning environments that purposefully build knowledge to meet college-level expectations.

#### **External Relationships**

1. The Latino community perceives the college as supportive and responsive to their needs.
2. Latina/o students experience equitable educational attainment throughout P-20 educational pipeline.
3. College curriculum requires interaction with the Latino and other underrepresented communities.

#### **Policies and Procedures**

1. Latina/o students experience easily navigable, relationship-centered, high validation processes, systems and support services.
2. Latina/o students experience advising and financial planning.

3. Latina/o students utilize needed resources and support services.
4. Latinas/os consistently experience interactions with culturally competent college personnel.
5. Latina/o students see themselves represented in multiple roles throughout the institution.

### **Supportive Relationships**

1. College personnel define themselves and act as institutional agents who take personal responsibility for developing student social capital and promoting student success.
2. Latina/o students are empowered and develop college knowledge, college identity and sense of academic competence and sense of direction through interactions with college personnel acting as institutional agents.

### **Student Development, Learning & Achievement**

1. Students are prepared to be successful learners and successful in managing college, career, finances and functioning in a multicultural world.
2. Latina/o student achievement is at or above system average for overall student population in 10 years.

While the scorecard goals listed above are specific to Latino students, this model could be used to increase success of all students or any subgroup within the student population.

### **Develop and Implement Strategies**

Once an inquiry group has taken the time to understand the cultural element and the way that element might support or present a barrier to Latino students, the group will need to develop proposed strategies to be piloted, assessed, and potentially institutionalized. Change in underlying assumptions begins to occur in this collaborative inquiry as practitioners reexamine the normalcy of race-based patterns of inequity and become more color conscious (rather than color blind), more aware that beliefs, expectations and practices can be racialized unintentionally, and more willing to assume responsibility for elimination of inequality (Bensimon et al., 2007). In other words, practitioners move through the stages of gaining awareness, making meaning, and taking action in response to a new way of thinking that is equity-minded rather than student-deficit-minded.

Now is the time for senior administrators to support visible action by creating the structures and providing the resources to implement the strategies identified through inquiry work. Senior administrators may have to take decisive steps to change administrative and governance processes and build supportive structures for strategies to be implemented and sustained.

### **Assess Strategies**

The inquiry group scorecard development includes the development of measures for each of the markers of cultural change in the CCCLSS model. Early in the scorecard development process, thought will need to be given to the measures to assure that adherence to strict research standards and protocols will be possible. Involvement of institutional research inquiry group members is critical. This attention to rigor will assure that the results of assessment will not be questioned or dismissed and this data-driven process can become central to making meaningful progress toward desired outcomes. Once strategies are implemented, assessment will need to occur to determine whether the strategy had an impact on the measure. Inquiry groups will need to review the results and determine if the strategy is effective. Measures may need to be refined, or strategies altered to achieve defined measures. Depending on the measure, the assessment cycle for strategies might occur as often as an academic term, or as long as the overall culture assessment cycle of three or more years. A key senior administrative strategy at this point will be balancing the vision of equitable access and achievement for Latino students with flexibility in adopting strategies to reach that state.

### **Reflection and Double-Loop Learning**

Inquiry groups will examine data to evaluate the results of interventions and will make recommendations about continuation and further institutionalization of the strategy. A key role

of reflection will be for inquiry groups to examine whether strategies were framed relying on existing mental models and identify whether further work needs to be done to identify root causes and shift mental models. Inquiry groups will need to assist individuals to reflect on basic underlying assumptions about the role of the institution and the individual in supporting Latino student success. The inquiry group will need to push to achieve double-loop learning where the framing of issues that underlie goals and strategies are questioned, the basic assumptions behind ideas or policies are confronted and the theories in use are tested within the inquiry groups.

Leadership will need to re-evaluate training needs and provide staff development from internal and external sources to assist teams with delving deeply into reflection and assure that root causes are explored and organizational learning occurs.

### **Communicate and Celebrate Results**

Providing forums to communicate outcomes and celebrate positive results as these practices are institutionalized will be a key responsibility of leadership. As inquiry groups continue their work, senior administrators must continuously communicate the importance of the work and provide forums for results to be shared.

### **Sustaining Effort for Transformational Change**

This transformational change will require sustained effort and focus from leadership and the community of practitioners involved in the work. Institutions successful in implementing transformational change (Eckel & Kezar, 2003, p.57):

(1) Were engaged in inclusive, ongoing, and widespread conversations that built upon one another, (2) developed inclusive processes to articulate and develop a set of concrete and meaningful concepts, (3) used cross-departmental working groups, (4) gave public presentations, (5) created faculty and staff development opportunities, including new faculty socialization experiences, and (6) benefitted from outsiders and their ideas.

Many strategies may need to be tried to reach a goal of greater educational equity for Latino students and some strategies may fail at a particular institution while others take hold. “For those institutions able to bring about transformation, the journey, as they realized, is never complete. Success only begets new challenges” (Eckel & Kezar, 2003, p. 47). For cultural change to occur, Latino student success must stay at the forefront of attention of the college community despite particular strategy implementation that fails or uneven implementation. Only through unwavering long-term commitment can strategies be tested and successes supported to create a fundamental shift in underlying assumption and resulting practices.



## **Chapter 5. Conclusions, Discussion and Pragmatic Validity**

### **Conclusions**

Community college leadership at the rapidly multiplying number of emerging HSI's will have to make a decision whether to maintain the status quo and hope that Latino students will successfully integrate, or to intentionally embark on a journey of institutional change to better meet the needs of these students. Many will place the burden on students to discover through their own initiative the knowledge and skills necessary to be successful in achieving their educational goals. These institutions may qualify for the federal designation as Hispanic-Serving due to student body composition, but are unlikely to achieve equity in educational outcomes for Latino students. Others will take on the difficult and potentially disorienting work of rethinking the institution to support the types of relationships and structures known to increase Latino student success. This research provides a starting place for examining culture and implementing appropriate change for each institutional context.

This research suggests that institutions may need to alter basic underlying assumptions about institutional responsibility for student success and the types of relationships necessary to support that success. Structural and cultural elements including curriculum, campus climate, access, pedagogy, external relations, policies and services, supportive relationships, student learning, student development and student achievement will need to be evaluated and potentially revised to meet the needs of Latino students. A socio-cultural model of practitioner inquiry is proposed to provide this evaluation and create momentum for change. Leadership must play a significant role in sustaining commitment toward the goal of Latino student success by inviting involvement, communicating need, providing supportive resources, and providing forums to communicate and celebrate results.

**What will the college culture look like with CCCLSS?**

Integrating the CCCLSS with Schein's (1992) definitions of common underlying assumption, some necessary shifts in underlying assumptions and actions that might occur are provided below. The items in parenthesis are Schein's categories of underlying assumptions.

*Table 13 Schein's Underlying Assumptions Applied to Community College Culture Supportive of Latino Student Success*

<b>Shifts in Underlying Assumptions</b>	<b>Possible Outcomes in Markers of Cultural Change</b>
1. Students matter as individuals. (Human Relationships)	College personnel take the initiative to get to know students. College personnel are allowed time to build relationships with students.
2. Knowledge of Latino student culture and experience in all its diversity is relevant information (Truth)	College personnel take the initiative to engage with the Latino community to understand priorities and issues, and supports and barriers to educational attainment. College programs and curriculum are designed to assist student identity formation and encourage outlets for student voice
3. Students are <u>not</u> solely and individually responsible for their success or failure. Educational institutions bear a responsibility as well. (Human Nature)	College personnel regularly examine norms, policies, and procedures for impact on students.
4. Students bear knowledge which can contribute to learning.(Truth)	Students and instructors co-construct knowledge. Diversity of perspectives welcomed in classroom.
5. Student involvement in developing course content and priorities is necessary for learning (Truth & Time)	Instructors solicit student input on content, schedule and priorities. Instructors identify student needs as a part of course construction.
6. Learning results from student active engagement with course material. (Human Relationships)	Faculty engage in inclusive pedagogy.
7. Student success requires a network of supportive relationships across institutional boundaries and into the community. (Human Relationships)	Student services and instructional personnel systematically engage with each other to support students. College personnel systematically engage with community members and student families to support students.

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8. The classroom is the core venue to serve the multiple purposes of student learning, student development, and formation of critical relationships. (Space & Time)	Student services personnel engage with students in the classroom. Relationship building between instructor and student, student-to-student, student-to-counselor, and student-to-mentor is prioritized in classroom.
9. Middle class social capital cannot be assumed. College knowledge, financial, career and educational planning, and disciplinary learning are all valid and necessary components of curriculum. (Truth)	College knowledge, financial, career and educational planning are explicitly taught in courses.

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It is important to note that while this model was designed specifically for institutions preparing to become HSIs, the retention and culture model and change process could have application and produce beneficial results for under-prepared, first-generation college students in general.

### **Discussion**

Evergreen Community College<sup>5</sup> (ECC), the researcher's current place of employment, is a rural comprehensive community college poised to become an emerging HSI in the near future. The Latino population at the largest feeder high school to this college has grown over 100% in the last ten years and now represents nearly 50% of the students. The Latino population at this site displays an achievement gap in high school completion with an average on-time graduation of 54% for Latinos compared to a 66% overall average (Office of Superintendent of Public Instruction). In 2010, 63% of all high school graduates and a little over 43% of Latino high school graduates went to college within the year. More than half of the high school graduates (55-59%) chose a public 2-year college and of those, 83% percent enrolled at ECC. Forty-seven percent of students enrolling in a 2-year college had a high school grade point average of less

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<sup>5</sup> A pseudonym

than 3.0. Only 37% met proficiency standards in reading and 35% met WASL proficiency standards in math (Washington State Education Research and Data Center, 2013). In 2012, the student body at the community college was 17.2% Latino, but since the college provides a significant amount of English as a second language instruction, that percentage drops to 11.8% when only degree-seeking students are included. This is 4.5% below parity with the three county district served by the college. Although these numbers can't be directly compared, it is worth noting that the high school and community college are less than two miles apart in a small town with 27% of its population comprised of Latinos. Given that nationally 50% of Latinos choose community colleges due to open-enrollment, lower cost and other factors, it is surprising that enrollment is not higher.

In fall of 2012, a new president at ECC proposed an institutional strategic priority of "Latino Community Engagement" and encouraged the college community to propose ways in which each department could support this priority. Through the colleges planning process, dozens of ideas have emerged and the most promising have been funded. In 2012 the ECC Board of Trustees also adopted targets for the core themes of "Access" and "Achievement" that require the college to provide equitable access reflective of the demographics of the community and achievement levels for underrepresented students at least equal to Washington system averages. In 2013-14 a few bilingual/bicultural staff were hired to support recruiting and advising. One position was created to support a unique partnership between area school districts with large Latino student populations, the regional university and ECC. The purpose of this consortium is to increase the percentage of Latino teachers in local schools by adopting a "grow your own" model of teacher development. In fall of 2013, the President created a part-time position to oversee Latino community engagement strategic priority. Of the six markers of

culture change identified in this model, ECC is beginning to address three: access and achievement, policies and services, and external relationships. Curriculum, pedagogy and campus climate remain to be examined. There is agreement on the target and measure for only access and achievement. A great deal of work is ahead to find a common understanding of the markers, agree upon targets and measures and implement change strategies.

Despite best intentions, positive impact will be constrained by (a) community college historical placement at the bottom of the higher education hierarchy, resulting in fewer resources to serve students with the greatest needs; (b) a trend of rapidly decreasing public funding for higher education, rapidly growing tuition costs, and financial aid policies shifting funding from grants to loans; (c) the tradition of operating in silos from K-12 to community college and from community college to 4-year institution. Addressing these issues will take partnership, policy advocacy, and double-loop learning to begin to address systemic causes of educational achievement gaps. ECC has the potential to learn a great deal from local school districts that have over a decade of experience serving a rapidly growing Latino population and have shown success in closing the educational achievement gap for these students.

It will also require insights from research and experience to understand how each college employee can engage as an institutional agent to influence student development, learning and achievement. The thematic synthesis conducted for this paper emphasized the need to focus on what occurs day-to-day in each community college classroom primarily, and on the campus as a whole in terms of inclusion, validation, and mentoring with a social justice agenda.

Relationships became the central focus of the research with attention to the way the institutional culture of a community college can enable these validating relationships that are critical to college completion.

When I started this project, I believed that identifying the elements of a retention model for Latino community college students would be the most challenging aspect of this work. As I look to the future at my current institution knowing that I will be charged with implementing a change process to prepare for becoming a HSI, I now believe the most difficult aspect of this work will be implementing and sustaining a change effort that requires reevaluation of elements of professional identity and norms of practice. Continued presidential commitment to this effort will be critical as practitioners grapple with this new identity and what it will mean in each of their roles. Constant attention will need to be paid regarding whom to involve, speed of change, addressing resistance, communicating urgency and celebrating successes.

### **Pragmatic Validity**

Semi-structured interviews were conducted with the president and director of institutional effectiveness at the researcher's institution. These positions were selected because of the instrumental role they would play in the implementation of the change model proposed in this research. They were asked to comment on overall probability of making this change occur, as well as specific barriers as well as strategies needed at each step of the change process.

Interviewees stated that thoughtful change of the magnitude proposed was absolutely essential and could be achieved, but it would be difficult, leadership dependent, and require sustained focus and belief in the vision. They emphasized that multiple markers would need to be addressed for substantive change to occur and that change to each marker would occur on differing timelines depending on the commitment of stakeholders with the most ownership of the marker. For example, policies and services, external relationships, and access are domains where senior administrative stakeholders will have more ownership, while curriculum and pedagogy will be domains with greater ownership from faculty.

There was agreement that a model combining core and supporting leadership strategies with cross-functional inquiry groups would be effective tools to promote change. Senior administrative leadership would need to articulate a clear vision and assure it was well understood by inquiry groups, assist the groups with establishing ground rules, carefully consider the composition of the inquiry groups, and stay closely connected and informed of the work of these groups to provide support and direction as needed. Leadership flexibility would also be required to let the inquiry groups move the change process forward without dictating how to do so.

The biggest barrier foreseen for this change effort is beliefs and attitudes, fatigue on race and equity-based topics, the wide variation in understanding of equity and defensiveness that might occur by introducing race or ethnicity-based discussions into the conversation on student success. Another caution centered on over-assessment.

The following section provides interview responses to specific stages of the college culture change process.

1. Assess Institutional Culture and Needs of Latino Community – Building a foundation of information was seen as extremely important to understand the internal and external environments, guide vision creation and policy and implementation strategy development, and establish benchmarks for later assessment. Recommendations specific to the culture assessment instrument included taking time for those involved to come to common understanding of terms, and, if numbers allowed, disaggregation of results by race and ethnicity.

2. Establish Vision and Build Awareness – It was seen as essential to first build understanding and establish a vision at the senior administrative level before communicating and building awareness in the college community. The senior administrative team must firmly

establish vision and beware of a rush to messaging. Then data and human stories should be used to build a compelling case for the need for change.

3. Initiate Cultural Marker Assessment and Support Change – The proposed overarching questions “What does becoming a Hispanic-Serving Institution mean to each department in the institution and the college as a whole?” and “What will we need to do to truly be “Hispanic-serving” defined in terms of equitable access and achievement for Latino students?” were seen as essential for the college community to gain an understanding that becoming an HSI is not about getting federal money, but about the values behind the federal designation. It was seen as a critical leadership role to speak in terms of values and help the institution define and refine values

The following section provides responses to specific stages of the cultural marker change cycle.

1. Engage Collaborative Leadership and Practitioner Inquiry – Defining criteria for selection of who is invited to engage in inquiry groups was seen as the make-or-break decision of leadership. The selection criteria need to include political, pragmatic and symbolic lenses. Other considerations are inclusion of a diversity of viewpoints, inclusion of early adopters and laggards, connectors and communicators, and *mavens* or trusted experts. It is also essential that teams are well tethered to the vision established for the work. Senior administrative leadership needs to stay strongly connected to what is happening in inquiry groups.

2. Understand and Measure Cultural Markers (Scorecard Development) – This stage required inquiry groups to explore underlying assumptions about both the causes of racial inequity and individual and organizational sense of self-efficacy as agents of change. While interviewees felt this was important, they were also cautious about possible defensiveness that

could arise by focusing on racial inequity. Instead, it was recommended to paint a picture of what the institution could look like with highly successful Latino students, link that picture to organizational mission/vision and guiding principles, and only later begin exploration of racial inequity. It was suggested that senior administrative leadership have initial input into scorecard framework to assure consistency. In terms of the scorecard format, it was suggested that separation of goals and objectives might make the instrument overly complex and create a barrier for utilization among inquiry groups.

3.     Develop and Implement Strategies – Leaders need to assure this work becomes central to the overarching goals of the college instead of occurring as an isolated initiative. Leaders must also take every opportunity to reinforce the importance of this work, communicating the essential contribution of each participant and assessing if the right people continue to be involved in the effort.

4.     Assess Strategies – This step is critical because limited resources require evaluation to assure that the strategies really meet the objective.

5.     Reflection and Double-Loop Learning – A change effort cannot be thoughtful or sustained without this step and if engaged intentionally this can be a source of further inspiration and motivation to keep up the effort.

6.     Communicate and Celebrate Results – This step is also essential and can contribute to sustainability by teaching and reinforcing a new culture through the choice of what is celebrated and how it is celebrated.

The change model is an iterative process that returns to assess institutional culture and needs of Latino students and the community. Feedback on this item indicated that a 5-year cycle

for culture change might be too long to sustain focus and make mid-course adjustments. The model was adjusted to a 3 or more year cycle.

### **Suggestions for Further Research**

Given the rapidly growing Latino population with a preponderance of access to higher education through community colleges, and the expanding ranks of emerging HSI community colleges, the body of related research should increase significantly in the coming years. At this point in time, almost every aspect of this field is under-researched including retention models specific to Latinos at community colleges, how well community college HSIs are serving Latino students, and the cultures and practices of HSIs that are achieving better results in terms of educational attainment for Latino students. Because of this lack of research, this proposal for planning to become a HSI is theoretical rather than grounded in historically successful implementations. Case studies that document planning efforts, employee and student perceptions and Latino student experience and achievement outcomes are necessary at multiple emerging HSI sites to begin to explore the dimensions of structure and culture that need to be in place to foster student success.

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## Appendix A – Culture Assessment

### Emerging Hispanic-Serving Institution Culture Assessment

Circle 1-5 to indicate the extent to which you agree with each statement. 1 = strongly disagree; 2 = disagree; 3 = neither agree nor disagree; 4 = agree; 5 = strongly agree; DK = Don't Know.

1. This institution has publicly committed itself to be Hispanic-serving by creating a welcoming climate and committing to equitable access and completion for Latina/o students.	1	2	3	4	5	DK
2. At this institution employees demonstrate high level of awareness and knowledge of the local Latino community and rates of Latina/o student success.	1	2	3	4	5	DK
3. At this institution access and achievement gaps are addressed through organizational learning and equitable treatment.	1	2	3	4	5	DK
4. At this institution teams of employees span institutional boundaries and prioritize building relationships with students to assure student success.	1	2	3	4	5	DK
5. The curriculum at this institution incorporates Latina/o student identity.	1	2	3	4	5	DK
6. The instructors at this institution consistently utilize inclusive pedagogy.	1	2	3	4	5	DK
7. The instructors at this institution scaffold instruction to support under-prepared students.	1	2	3	4	5	DK
8. This institution supports instructor professional development to engage in inclusive pedagogy, and scaffolding of instruction.	1	2	3	4	5	DK
9. This institution values and assesses student learning related to college knowledge, career planning, educational planning, and financial planning.	1	2	3	4	5	DK
10. This institution values and assesses student learning related to diversity.	1	2	3	4	5	DK
11. This institution creates systems and processes that are easily navigable for all students including limited English-speaking and undocumented students.	1	2	3	4	5	DK
12. This institution assures that all students (including limited English-speaking and undocumented students) receive assistance with financial planning, identification of funding sources, and securing funding.	1	2	3	4	5	DK
13. This institution assures that all students (including limited English-speaking and undocumented students) receive high touch, just-in-time educational advising with accurate advising tools.	1	2	3	4	5	DK

14. Student services personnel and instructors regularly interact in the classroom to support student success.	1	2	3	4	5	DK
15. At this institution employees demonstrate cultural competency.	1	2	3	4	5	DK
16. At this institution employees demonstrate validating practices.	1	2	3	4	5	DK
17. At this institution employees act as institutional agents by taking personal responsibility for developing student social capital to promote student success.	1	2	3	4	5	DK
18. At this institution employee composition is representative of the diversity of the community.	1	2	3	4	5	DK
19. At this institution Latino community organizations, service providers to the Latino community, and the families of Latino students are seen as key stakeholders.	1	2	3	4	5	DK
20. At this institution P-20 relationships are formed with shared responsibility for Latino student success.	1	2	3	4	5	DK

## Appendix B – Sample Scorecards

Table 14 CCCLSS Scorecard for Curriculum

Marker	Goal	Objective	Strategies	Measures
Curriculum	1. Curriculum supports Latina/o student identity development and raises critical consciousness of Latina/o students.	To integrate Latina/o current issues, history and culture into general education program.	<p><u>Strategy I</u> Provide resources to faculty to revise curriculum to include Latino current issues, history, art, literature.</p> <p><u>Strategy II</u> Curriculum addresses historical marginalization and resulting inequities in income, health and educational achievement.</p>	<p>Baseline – Current percent of Latino students reporting learning related to Latino issues, history and culture.</p> <p>Target – Growth in percent of Latino students reporting learning related to Latino issues, history and culture.</p> <p>Equity – All Latino students completing general education requirements report learning related to Latino issues, history and culture.</p>
	2. Math & English curriculum is aligned from high school to college.	To decrease time spent in remedial coursework.	<p><u>Strategy I</u> Convene cross-institutional workgroups to align curriculum.</p> <p><u>Strategy II</u> Develop and assess multiple reading, English, math placement measures including high school placement tests.</p>	<p>Baseline – Current percent of Latino recent high school graduates placing into remedial courses.</p> <p>Target – Decrease in percent of Latino recent high school graduates placing into remedial coursework.</p> <p>Equity – Latino recent high school graduates place into remedial courses at a rate equal to or less than the average for other recent high school graduates.</p>

Marker	Goal	Objective	Strategies	Measures
Curriculum	3. Students develop college knowledge, college identity and sense of direction.	To establish curriculum which includes college knowledge, career planning, education planning, and financial planning.	<p><u>Strategy I</u> Identify multiple avenues to integrate college knowledge, career planning, education planning, and financial planning into curriculum.</p>	<p>Baseline – Current percent of Latino students reporting learning related to college knowledge, career planning, education planning, and financial planning.</p> <p>Target – Growth in percent of Latino students reporting learning related to college knowledge, career planning, education planning, and financial planning.</p> <p>Equity – All Latino students report learning related to college knowledge, career planning, education planning, and financial planning.</p>
	4. Students develop sense of direction.	To establish co-curriculum connected to curriculum and class time which connects students to educational and career goals.	<p><u>Strategy I</u> Connect students to role models and mentors in major field of study or professionals working in the field of interest.</p> <p><u>Strategy II</u> Provide structure for students to serve as role models for upcoming students on same educational/career pathway.</p>	<p>Baseline – Current percent of Latino students reporting serving as role models or exposure to role models.</p> <p>Target – Growth in percent of Latino students reporting serving as role models or exposure to role models.</p> <p>Equity – Most Latino students reporting serving as role models or exposure to role models.</p>

Table 15 CCCLSS Scorecard for Campus Climate

Marker	Goal	Objective	Strategies	Measures
Campus Climate	1. Latina/o students experience support from relationships established with college employees.	To decrease student sense of being lost and increase college identity and sense of direction.	<p><u>Strategy I</u> College employees are trained in institutional agent roles and validating practices.</p>	<p>Baseline – Current percent of Latino students reporting significant support from relationships with college employees.</p> <p>Target – Growth in percent of Latino students reporting significant support from relationships with college employees.</p> <p>Equity – Most Latino students report significant support from relationships with college employees.</p>
	2. Latina/o students and their families have strong relationships and feel they ‘matter’ to the college	To build individual relationships between college personnel, students, and their families	<p><u>Strategy I</u> Create policies and practices that prioritize relationship-building as well as process.</p> <p><u>Strategy II</u> Implement activities that connect students with employees, or students and their families with the college.</p>	<p>Baseline –Of the employees who interact with students, current percent who perceive the institution as supportive of relationship-building with students and their families.</p> <p>Target –Of the employees who interact with students, growth in percent who perceive the institution as supportive of relationship-building with students and their families.</p> <p>Equity – Of the employees who interact with students, most perceive the institution as supportive of relationship-building with students and their families.</p>

Marker	Goal	Objective	Strategies	Measures
	3. Latina/o students experience easily navigable college systems.	To eliminate barriers to student admission, progression and completions	<p><u>Strategy I</u> Assess student perceptions of system ease of navigation.</p> <p><u>Strategy I</u> College policies and procedures are revised in response to student assessment.</p>	<p>Baseline – Current percent of Latino students reporting ease in navigating college systems.</p> <p>Target – Growth in percent of Latino students reporting ease in navigating college systems.</p> <p>Equity – Most Latino students reporting ease in navigating college systems.</p>
	4. Latina/o students experience a welcoming climate that embraces diversity, inclusion, and equity.	To foster inclusive practices and equity-mindedness	<p><u>Strategy I</u> College personnel are trained in techniques for fostering inclusion, adopting equity-mindedness, and interrupting harassment.</p> <p><u>Strategy II</u> College personnel are trained to solve problems by examining institutional factors rather than focusing on student deficits.</p> <p><u>Strategy III</u> College policies require evaluation of climate to promote retention of diverse employees and students.</p>	<p>Baseline – Current percent of Latino students that report experiencing a welcoming climate that embraces diversity, inclusion, and equity.</p> <p>Target – Growth in percent of Latino students that report experiencing a welcoming climate that embraces diversity, inclusion, and equity.</p> <p>Equity – Most Latino students report experiencing a welcoming climate that embraces diversity, inclusion, and equity.</p>

Table 16 CCCLSS Scorecard for Access

Marker	Goal	Objective	Strategies	Measures
Access	1. Latina/o students access the college at a rate that mirrors percent of Latina/o's in service area.	<p>To achieve equitable access overall, and in both transfer and professional/technical programs.</p> <p>To show growth in Latina/o student access in each degree field.</p>	<p><u>Strategy I</u> Establish the college as a center of Latino community activities.</p> <p><u>Strategy II</u> Develop recruitment plans specifically targeting the Latino community.</p> <p><u>Strategy III</u> Develop clear programs of study with seamless transitions from high school to 2-year college and 2-year college to 4-year college and beyond.</p>	<p>Baseline – Current percent of Latino students in degree-seeking programs at the college.</p> <p>Target – Growth in percent of Latino students in degree-seeking programs at the college.</p> <p>Equity – Latino access to degree-seeking programs at the college mirrors the percent of Latinos in service area.</p>

Table 17 CCCLSS Scorecard for Pedagogy

Marker	Goal	Objective	Strategies	Measures
Pedagogy	1. Latina/o students engage in collaborative learning environments, co-construct knowledge building from life experience, and are recognized and visible.	<p>To have all instructors utilize collaborative learning and inclusive pedagogy</p> <p>To have courses integrate Latina/o issues and priorities through guest speakers, mentorship, service learning or student-lead research projects</p> <p>To have students build supportive peer relationships through class interaction</p>	<p><u>Strategy I</u> Professional development in collaborative learning and inclusive pedagogy is readily available.</p> <p>Strategy II Faculty evaluation and tenure policies recognize competency in inclusive pedagogy.</p>	<p>Baseline – Current percent of Latino students who report experiencing collaborative learning environments where they co-construct knowledge and are recognized and visible.</p> <p>Target – Growth in percent of Latino students who report experiencing collaborative learning environments where they co-construct knowledge and are recognized and visible.</p> <p>Equity – Most Latino students report experiencing collaborative learning environments where they co-construct knowledge and are recognized and visible.</p>
	2. Latina/o students engage in learning environments that purposefully build knowledge to meet college-level expectations.	To have all instructors demonstrate ability to maintain academic rigor and scaffold instruction to address student under preparation	<u>Strategy I</u> Professional development in scaffolding instruction is readily available.	<p>Baseline – Current percent of instructors who demonstrate scaffolding in lesson planning and instruction.</p> <p>Target – Growth in percent of instructors who demonstrate scaffolding in lesson planning and instruction.</p> <p>Equity – All instructors are able to demonstrate scaffolding in lesson planning and instruction</p>

Table 18 CCCLSS Scorecard for External Relationships

Marker	Goal	Objective	Strategies	Measures
External Relationships	1. The Latino community perceives the college as supportive and responsive to their needs.	To increase college awareness of and responsiveness to the needs of the Latino community	<p><u>Strategy I</u> Dedicate resources to the establishing relationships with Latino community organizations, service providers to the Latino community, and the families of Latino students.</p> <p><u>Strategy II</u> Consistently gather information and respond to the needs of the Latino community</p>	<p>Baseline – Current percent of Latino community members who consider the college supportive of and responsive to their needs.</p> <p>Target – Growth in percent of Latino community members who consider the college supportive of and responsive to their needs.</p> <p>Equity – Most Latino community members consider the college supportive of and responsive to their needs.</p>
	2. Latina/o students experience equitable educational attainment throughout P-20 educational pipeline.	To form P-20 partnerships with shared responsibility for Latino student success	<p><u>Strategy I</u> Partners in the educational pipeline pre-K to 4-year institutions interact to build seamless pathways and systems supportive of Latino student success.</p> <p><u>Strategy II</u> Use state-level P-20 data systems to track students through educational pipeline to identify barriers and supports to educational achievement.</p>	<p>Baseline – Current number/percent of Latino students at the college who have benefitted from effective P-20 partnerships that address Latino student educational achievement.</p> <p>Target – Growth in number/percent of Latino students at the college who have benefitted from effective P-20 partnerships that address Latino student educational achievement.</p> <p>Equity – Most Latino students at the college have benefitted from effective P-20 partnerships that address Latino student educational achievement.</p>

Marker	Goal	Objective	Strategies	Measures
External Relationships (continued)	3. College curriculum requires interaction with the Latino and other underrepresented communities.	To increase faculty and student interaction with the Latino community.	<p><u>Strategy I</u> Resources and rewards are provided for increasing student interaction with the Latino community or other underrepresented communities.</p>	<p>Baseline – Current number/percent of Latino students at the college who have experienced class activities which promoted engagement with the Latino or other underrepresented communities.</p> <p>Target – Growth in number/percent of Latino students at the college who have experienced class activities which promoted engagement with the Latino or other underrepresented communities.</p> <p>Equity – Most Latino students at the college have experienced class activities which promoted engagement with the Latino or other underrepresented communities.</p>

Table 19 CCCLSS Scorecard for Policies & Services

Marker	Goal	Objective	Strategies	Measures
Policies & Services	1. Latina/o students experience easily navigable, relationship-centered, high validation processes, systems and support services.	To increase student validation, college knowledge and sense of direction	<p><u>Strategy I:</u> Professional development in relationship-centered, high validation practices is readily available.</p> <p><u>Strategy II:</u> Policies require periodic review of student services systems (including admission, placement, registration, financial aid, academic support services, etc.) to assess degree of relationship formation and validation and ease of navigation.</p>	<p>Baseline – Current number/percent of Latino students at the college who have experienced easily navigable, relationship-centered, high validation student services.</p> <p>Target – Growth in number/percent of Latino students at the college who have experienced easily navigable, relationship-centered, high validation student services.</p> <p>Equity – Most Latino students at the college have experienced easily navigable, relationship-centered, high validation student services.</p>
	2. Latina/o students experience advising, financial planning	To provide all students including limited English-speaking students and undocumented students with: a) high touch, just-in-time educational advising with accurate advising tools b) assistance with financial planning, identification of funding sources, and securing funding	<p><u>Strategy I:</u> Resources are made available to provide high touch, just-in-time advising with accurate advising tools.</p> <p><u>Strategy II:</u> Resources are made available to provide assistance with financial planning, identification of funding sources, and securing funding.</p>	<p>Baseline – Current number/percent of Latino students at the college who have experienced high touch, just-in-time advising with accurate advising tools and assistance with financial planning and securing funding.</p> <p>Target – Growth in number/percent of Latino students at the college who have experienced high touch, just-in-time advising with accurate advising tools and assistance with financial planning and securing funding.</p> <p>Equity – Most Latino students at the college have experienced high touch, just-in-time advising with accurate advising tools and assistance with financial planning and securing funding.</p>

Marker	Goal	Objective	Strategies	Measures
Policies & Services (continued)	3. Latina/o students utilize needed resources and support services.	To provide a network of supportive relationships involving student services personnel and instructors regularly interacting with students in and outside the classroom to support student success	<p><u>Strategy I:</u> Policies encourage building cross-functional systems of support for students utilizing the classroom as a primary point of intervention.</p> <p><u>Strategy II:</u> Latina/o students are personally invited and proactively and systematically engaged with college resources and support services.</p>	<p>Baseline – Current number/percent of Latino students at the college who utilize college resources and support services.</p> <p>Target – Growth in number/percent of Latino students at the college who utilize college resources and support services.</p> <p>Equity – Most Latino students at the college have utilized college resources and support services..</p>
	4. Latinas/os consistently experience interactions with culturally competent college personnel.	To have all employees demonstrate cultural competency relevant to student demographics	<p><u>Strategy I:</u> Employee orientation and professional development emphasize gaining cultural competency and awareness and knowledge of the local community.</p>	<p>Baseline – Current number/percent of Latino students and employees at the college who experience culturally competent college personnel.</p> <p>Target – Growth in number/percent of Latino students and employees at the college who experience culturally competent college personnel.</p> <p>Equity – Most Latino students and employees at the college experience culturally competent college personnel.</p>
	5. Latina/o students see themselves represented in multiple roles throughout the institution.	To have all employee groups representative of the diversity of the community	<p><u>Strategy I:</u> Human resource policies prioritize diversity in recruitment</p> <p><u>Strategy II:</u> Human resource policies require evaluation of climate to promote retention of diverse employees</p>	<p>Baseline – Current percent of Latinos in each employee group.</p> <p>Target – Growth in percent of Latinos in each employee group.</p> <p>Equity – Percent of Latinos in each employee group mirrors percent of Latinos in service area.</p>

Table 20 CCCLSS Scorecard for Supportive Relationships

Marker	Goal	Objective	Strategies	Measures
Supportive Relationships	1. College personnel define themselves and act as institutional agents who take personal responsibility for developing student social capital and promoting student success.	To have college personnel demonstrate behaviors associated with being an institutional agent.	<u>Strategy I:</u> Provide professional development in institutional agent strategies including direct support, integrative support, system developer, system linkage and networking support.	Baseline <sup>6</sup> – Current number/percent of college employees with direct student contact who can identify and demonstrate institutional agent practices.  Target – Growth in number/percent of college employees with direct student contact who can identify and demonstrate institutional agent practices.  Equity – Most college employees with direct student contact who can identify and demonstrate institutional agent practices.
	2. Latina/o students are empowered and develop college knowledge, college identity and sense of academic competence and sense of direction through interactions with college personnel acting as institutional agents.	To empower Latina/o students through interactions with college personnel	<u>Strategy I:</u> Develop systematic opportunities for college employees to interact with students as institutional agents.	Baseline – Current number/percent of Latino students at the college who have experienced institutional agent relationships.  Target – Growth in current number/percent of Latino students at the college who have experienced institutional agent relationships.  Equity – Most Latino students at the college have experienced institutional agent relationships.

<sup>6</sup> The University of Southern California Center for Urban Education has developed a self-assessment inventory for institutional agents available at <http://cue.usc.edu/tools/stem/Institutional%20Agent%20SAI%20Formatted.pdf>

Table 21 CCCLSS Scorecard for Student Learning, Development & Achievement

Marker	Goal	Objective	Strategies	Measures
<p>Student Development, Learning &amp; Achievement</p>	<p>1. Students are prepared to be successful learners and successful in managing college, career, finances and functioning in a multicultural world.</p>	<p>To show growth in student sense of belonging, sense of academic competence, and sense of direction.</p>	<p><u>Strategy I:</u> Implementation of strategies in cultural markers above.</p>	<p>Baseline – Current percent of Latino students reporting growth in sense of belonging, academic competence and sense of direction since starting at the college.</p> <p>Target – Increase in percent of Latino students reporting growth in sense of belonging, academic competence and sense of direction since starting at the college.</p> <p>Equity – Most Latino students report growth in sense of belonging, academic competence and sense of direction since starting at the college.</p>
	<p>2. Latina/o student achievement is at or above system average for overall student population in 10 years.</p>	<p>To show growth in Latina/o student transition from basic skills to both transfer and professional/technical programs.</p> <p>To achieve persistence and completion for Latina/o students at or above system average for overall student population.</p> <p>To show growth in Latina/o student achievement in each degree field.</p>	<p><u>Strategy I:</u> Implementation of strategies in cultural markers above.</p> <p><u>Strategy II:</u> Implement proven transition strategies such as I-BEST, bridge programs, and first-year experiences.</p>	<p>Baseline – Current percent of Latino students who: (1) transition from basic skills to transfer or professional/technical programs; (2) persist and complete at or above system average for overall student population in each degree field.</p> <p>Target – Growth in percent of Latino students who: (1) transition from basic skills to transfer or professional/technical programs; (2) persist and complete at or above system average for overall student population in each degree field.</p> <p>Equity –Latino students transition from basic skills to transfer or professional/technical programs and persist and complete at or above system average for overall student population in each degree field.</p>