

San Mateo Community College District External Trends and Implications for Strategic Planning

Demographic Trends

United States

It is estimated that by 2025, the number of Americans over 60 will increase by 70%. Over the next decade the challenge of providing for an aging population come to the forefront. Aging individuals will increasingly demand opportunities, products, and medical services to accommodate more healthy and active senior years.¹

The demographics of the United States are growing increasingly complex. Nineteen percent of the total U.S. population consists of racial minorities while 20% report Hispanic ethnicity. A five percent increase in residents born outside the US between 2010 and 2012 culminates in 13% of the total population. Of these, a majority (53%) was born Latin America while more than one quarter (28%) were born in Asia.²

Youth and young adults from immigrant families today represent 25% of the United States' population between the ages of 16 and 26—up from 20% just 15 years ago.³

Of the 47.6 million people who classified themselves as being of Hispanic or Latino origin on the 2010 census, 30.5 percent also considered themselves "some other race." Many emphasized their Hispanic heritage by writing in "Mexican," "Hispanic," "Latin American" or "Puerto Rican" to specify what they meant.⁴

California

Over the past year, the natural increase (births minus deaths) in California was 266,000 individuals. Natural increase remains the primary source of the California's growth. In comparison, net migration increased the state's population by 66,000 residents. Net migration includes all legal and unauthorized foreign immigrants, residents who left the state to live abroad, and the balance of hundreds of thousands of people moving within the United States both to and from California. During the fiscal year just past, the state gained about 169,000 net foreign immigrants.⁵

Although California continues to add population faster than the average of other states (2.1% v 1.7%), immigration into the state has slowed.⁶ The state's immigrant population increased by only 15% (1.3 million) in the 2000's, compared to 37% (2.4 million) in the 1990's. The recent decline in international immigration has been a contributing factor in the slowdown of California's overall population growth.⁷

Asia has now surpassed Latin America as the leading source of immigrants to California. This trend will continue for the foreseeable future.⁸

California's Hispanic population now equals the non-Hispanic white population. By early 2014 the California Department of Finance expects that California's Hispanic population will have become a plurality for the first time in state history.⁹

The proportion of adults who have attained at least a bachelor's degree (30.2%) in California is higher than the national proportion (28.2%). At the other end of the spectrum, the proportion of California

adults who have earned a high school degree or higher (80.8%) lags the national proportion (85.4%), suggesting that the state imports a significant number of educated adults while native---born Californians have a lower rate of education attainment.¹⁰

High rates of educational attainment are correlated with high levels of income. California's per capita income (\$29,634) leads the U.S. statistic (\$27,915).¹¹

California's high per capita income, however, masks the fact that one in three working families in the state are considered low---income. Sixty percent of these families lack postsecondary education.¹²

More than 3.2 million children, or 40 percent of all children under the age of 18 in California, are in working low---income families.¹³

Compared to the national proportion (20.3%), California households (43.2%) are twice as likely to speak a language other than English.¹⁴

Fifty percent of California's population aged 18 and under is Latino.¹⁵

The majority of California's Latino population is native---born, especially among those under 18 years of age, while 37 percent of Latinos are foreign---born.¹⁶

Recent research finds that 83 percent of Latino parents in California hope their children earn at least a bachelor's degree and 92 percent of Latinos believe that a college education is "very important."¹⁷

More Blacks live in California than the combined total in Alabama, Louisiana, and Mississippi.¹⁸

Bay Area and the Peninsula

By 2040 the San Francisco Bay Area is projected to add 2.1 million people from 7.2 million to 9.3 million, an increase of 30%.¹⁹

People who are 65 and over now represent 12 percent of the Bay Area's total population, but by 2040 their proportion will increase to 22 percent. The result is that more than one in five people in the Bay Area will be members of the 65+ group by 2040.²⁰

By 2040 the Bay Area will become substantially more racially and ethnically diverse. Hispanics will emerge as the largest ethnic group, increasing from 23 to 35% of the population. The number of Asians will also increase, growing from 21 to 24% of the population.²¹

Bay Area, the Peninsula, and San Mateo County

San Mateo County is an urban, educated, and, a financially affluent county. The estimated population in 2013 was 747,373. Whites (41.1%) were the major demographic group. Hispanics and Asians were next with 25.4% and 26.9% respectively. African---Americans comprised 3% of the county's total population.²²

Median household income in the County is \$87,751, well above the \$61,400 state average. Educational attainment and related household income, however, is far below the county and state average for Hispanic and African---American residents.²³

Since 2010, San Mateo County has grown about 1% annually. Offshore migration is increasing while domestic migration is slowing. In 2013, the county 2,229 new residents owing to migration. Births accounted for 9,235 new residents.²⁴

The proportion of persons living in poverty in San Mateo County (4.9%) is half the California (11.5%) and United States (10.9%) proportions. However, six cities within the county exceed the county’s average: East Palo Alto (16.5%), Portola (9.8%), San Bruno (5.9%), Redwood City (5.7%), Half Moon Bay (5.4%), and Daly City (5.2%).²⁵

The County is also linguistically complex. Fifty seven percent of youth (aged 5 to 17) speak English only versus the United States proportion of English only speakers (78%). One in four of the County’s youth speak Spanish while one in ten speak Asian or Pacific Island languages.²⁶

Cities within the County that exceed the County’s overall proportion of youth speaking Spanish include East Palo Alto (63%), Half Moon Bay (49%), Redwood City (48%), San Bruno (27%), San Mateo (26%), and South San Francisco (31%).²⁷

Cities within the County that exceed the County’s overall proportion of youth speaking Asian or Pacific Island languages include Daly City (27%), Foster City (26%), Millbrae (27%), and South San Francisco (14%).²⁸

Educational attainment for San Mateo County’s adults aged 25 older exceeds both the California and United States proportions by wide margins [Table 1 below].²⁹

Level	United States	California	San Mateo County
Less Than High School Diploma	13.6	18.5	11.2
High School Graduate or GED	28.0	20.6	16.9
Some College or Associate's Degree	29.2	30.0	28.1
Bachelor's Degree	18.2	19.6	26.2
Graduate or Professional Degree	10.9	11.3	17.5
Data are for the year 2012. Source: US Census American FactFinder (n.d.). Retrieved at factfinder2.census.gov			

Those places within the County with households with children aged eighteen and under that exceed the County average (30.8%) are important locations from which the District should consider when planning for future full--time enrollment. East Palo Alto (42.0%), Hillsborough (41.6%), Portola (36.0%), Foster City (34.4%), Redwood City (33.5%), South San Francisco (33.5%), Woodside (32.1%) and San Carlos (31.6%).³⁰

The Bay Area is one of the most congested areas in the United States, costing commuters an average of \$1,109 annually.³¹

Implications of Demographic Trends. Population growth has slowed amid the County's relative affluence and educational attainment. Slow growth means that the District and its colleges will need to increase penetration rates to maintain current enrollment levels. High-income households may not view community college education as a first choice. At the same time, there are persistent pockets of poverty within San Mateo County. The number of youth who speak languages other than English will increase. Programs and partnerships focused on the success of low-income students and students of color will be of critical importance. Similarly, the increasing proportion of older citizens and their preferences for learning will be a challenge. These trends require deep evaluation of the District's current array of programs, classes, and scheduling options as well as student support programs. Matching educational offerings to new needs based on an understanding where gaps exist is critical to the District's future.

Education and Workforce Development Trends

United States

In 1970, seven in ten workers with high-school diploma were in the middle class. Today fewer than 4 in 10 with only high school degrees as their highest level of education attainment remain there.³²

Associate degree attainment is increasingly important. The median earnings of associate's degree holders during their careers are about \$259,000 more than for high school graduates.³³ Attending or graduating from a community college doubles an individual's chance of finding a job compared to those who failed to complete high school.³⁴ The U.S. Bureau of Labor Statistics projects that occupations that require an associate degree will grow by 18 percent through 2020 – faster than the new job growth for those with a bachelor's degree.³⁵

The percentage of jobs that require college degrees has doubled in the past 40 years and will continue to increase. By 2018, 637,000 more low-skill jobs will disappear or go offshore. At the same time millions of Americans could miss out on entering the middle class if they don't obtain a degree, because our workforce will require 22 million degree-equipped employees for new high-skill jobs created by 2018.³⁶

The United States is losing ground in the critical area of college completion. We now ranks 14th among 37 OECD and G20 countries in the percentage of 25 to 34 year-olds with higher education 42%, far behind the leader, Korea (65%).³⁷

The US has a higher youth unemployment rate (26.6%) than France, Britain, Japan, Germany, and Canada. This rate is vastly higher than it was in 2000, when the U.S. had lower youth unemployment than all those countries. Unemployment rates are higher among youth with high school degrees than those with college degrees.³⁸

California

California is on track to face a shortage of 2.3 million college graduates needed to meet the state's workforce demands in 2025.³⁹

The top five *fastest growing* employment industries in California through the year 2020 include: mining, quarrying, and oil and gas extraction (38%, 63,730 total jobs); education services (32%, 479,560 total jobs); professional, scientific, and technical services (27%, 1,785,860 total jobs); healthcare and social assistance (27%, 1,950,160 total jobs); and administrative and support and waste management and remediation services (25%, 1,278,930 total jobs).⁴⁰

The bottom five *slowest growing* employment industries to the year 2020 include: management of companies and enterprises (---1%, 171,650 total jobs); manufacturing (3%, 1,113,830 total jobs); agriculture, forestry, fishing, and hunting (4%, 385,350 total jobs); information (11%, 461,730 total jobs); and government (11%, 2,205,160 total jobs).⁴¹

States now appear to be increasing their budgetary commitment to higher education. However it should be remembered that the percentage increases are based upon smaller bases and thus may look greater than the actual amounts would imply. The approximate year---to---year change for public universities in California was 5 percent. It is anticipated that this will allow the UC and CSU systems to keep tuition and feed for 2015 at the 2014 levels.⁴²

The Golden State sets the gold standard for innovation and access to capital, and its economy is turning around. But "golden" could also describe the state's costs of living and doing business. California ranks 1st in access to capital and in technology and innovation but 48th overall in the cost of doing business according to a recent study. Lower rankings for the cost of living, business friendliness, and education and availability of its workforce offset the state's top rankings. The District can impact is to accelerate efforts to educate students in technology and other workforce---related programs.⁴³

A study by the University of California, Davis' Center for Watershed Sciences find that this year's drought and the resulting water shortage will cost the state about \$1.5 billion in direct agricultural costs, including \$810 million in crop revenue and over \$200 million in dairy and livestock. Total drought---related costs to the California economy for the year are projected at \$2.2 billion, with a loss of 17,100 seasonal and part---time jobs.⁴⁴

Bay Area, the Peninsula, and San Mateo County

The unemployment rate in San Mateo County was 5.1% as of November 2013 ranking the County #2 in California in the lowest unemployment rate by county in the state. Marin was #1; San Francisco was #3, and Santa Clara was #9.⁴⁵

The Bay Area is home to 2.4% of the nation's total jobs. The Bay Area has 10.3% of all software jobs in the U.S., 8.3% of the Internet services jobs, 12% of computer and electronic manufacturing jobs, 7% of computer services jobs; and 8.1% of jobs in scientific R&D services. The Bay area also has above average shares in management, consulting and architectural and engineering services.⁴⁶

An entrepreneurial spirit pervades the Bay Area. In 2010 Bay Area organizations held 16,364 patents; 2nd place was New York with 6,383. Additionally the Bay Area has the highest proportion of college grads in the workforce (44% v. 28%) and the highest share of jobs in the innovation sectors. The Bay Area has half the number of clean tech firms in the U.S., and 70% of the top social media firms.⁴⁷

Between 2007 and 2040, the Bay Area Council of Regional Governments projects above average job growth in these areas: Educational and Health Services (70%); Professional and Business Services (57%); Leisure and Hospitality (39%); Self---Employed (31%); and Information (30%). Below average growth is predicted for Manufacturing (---16%), Transportation, Warehousing, and Utilities (17%); Government (9%); Construction (9%); and Financial Activities (9%).⁴⁸

The Bay Area the world's largest center for venture capital---backed high tech industry in the United States and the world. The region — which includes Silicon Valley, San Francisco, Oakland and surrounding areas — attracted \$13.5 billion in venture capital investment in 2011, more than four times that of greater Boston or greater New York.⁴⁹

A growing number of Bay Area baby boomers will retire by 2030. These retirements will produce a large number of replacement job openings across a wide range of occupations and skill categories. These job openings will need to be filled by growth in the workforce, particularly by workers aged 25–34, by existing workers and by new immigrants.⁵⁰

In April 2014, Job levels in the Peninsula metro areas were 8.3 percent above the pre---recession peak while the Peninsula unemployment rate was down to 4.8 percent. The gains were led by a surge in technology jobs from San Francisco to San Jose.⁵¹

The Peninsula’s economic base is led by the surge in technology. The Information and Professional & Business Services sectors are where most of this job growth is occurring. Health care and the Leisure & Hospitality sector (led by restaurant and hotel growth) are the other growth leaders. These sectors were barely touched by the recession and have grown steadily during the recovery.⁵²

As of October 2013 the most recent job ads for Marin, San Francisco and San Mateo counties are Software Developers, Marketing Managers, Web Developers, Retail Sales Persons, Network and Computer Systems, Information Technology Project Managers, Computer Systems Analysts, Registered Nurses, Accountants, and Medical Scientists, Except Epidemiologists.⁵³

Against this rosy picture, an alternate view is emerging. Namely, the Peninsula economy is no longer generating as many mid---range jobs as it formerly did and low---wage jobs are proliferating, creating an “hour glass” labor market. The forecast is for the Peninsula to have more jobs that have a median wage under \$20 per hour and more jobs above \$35 per hour, and either segment will outnumber middle wage jobs paying between \$20 and \$35 per hour.⁵⁴

A substantial number of San Mateo County residents work in San Francisco and Santa Clara counties while a substantial number of workers in San Mateo County live outside the county. Of the 348,055 resident workers in San Mateo County, 75,045 worked in San Francisco County and 50,125 worked in Santa Clara County. Of the 347,120 jobs in San Mateo County 43,425 were filled by residents of San Francisco County, 41,520 from Santa Clara County and 50,900 from other Bay Area counties. Given this mobility for work and its location on the Peninsula, San Mateo County is situated squarely in the middle of a regional and not a local labor market.⁵⁵

There is more job churn in San Mateo County's labor market than any other county in the Bay Area. In an average year 9.0% of all jobs will disappear. At the same time, jobs amounting to 10.1% of existing employment will be created, resulting in a net gain.⁵⁶

In an average year, the number of jobs created by businesses moving into the county adds 9.1% of total employment, while the number of jobs lost when businesses move out of the county reduces employment by 12.5%. The county is therefore a net exporter of jobs.⁵⁷

Emerging practices in workforce development can help the County meet future needs especially for immigrants. A recent report recommends that industries should host on-site English and related job readiness programs, participate in linked learning programs to inform and excite high school students, and develop industry-driven training partnerships. The same report recommends that workforce boards and training partners should collaborate to develop regional training programs that avoid duplication, help customers learn about online job searching, and form alumni groups to mentor and network current program participants.⁵⁸

A strong practice in workforce development is contextualization in which low-skilled adults simultaneously learn job skills and basic skills. A new collaboration between the San Mateo and Santa Clara County Workforce Boards known as the Alliance for Language Learners' Education and Success (ALLIES) seeks to build the workforce competencies of adult immigrants. Skyline College and four area hotels are participants.⁵⁹

San Mateo County's average weekly wage (\$3,240) was in the top four for counties nationally in the fourth quarter of 2012. The US average was \$1,000.⁶⁰

Implications of Education and Workforce Development Trends. San Mateo County is located in the middle of the Silicon Valley one of the most dynamic employment markets on the globe. Propelled by technology and innovation, Silicon Valley and the Peninsula create both opportunity and challenges for the District, especially in matching employer needs for qualified workers and in preparing students to advance in the workforce. The number of "middle jobs" appears to be declining, placing a premium on those individuals with skills and leaving behind those without. There also is significant employment churn while more jobs appear to be leaving the County than are created. Amid these changes continued deep collaboration with industry appears crucial.

Housing Trends

Bay Area, the Peninsula, and San Mateo County

As the region ages, retirements will follow as well as an increased potential demand for smaller housing units and increased demand for housing in high-amenity neighborhoods.⁶¹

San Mateo County's homeownership rate (59.7%) exceeds California's (56.0%). The median value of owner-occupied housing in the county was nearly double the overall California statistic (\$734,100 v.

\$383,900).⁶² Both statistics suggest a stable but expensive home market, especially for first-time homebuyers and young families.

More than 70 percent of recent residential building has been in multi-family structures, for both sale and rental, a share could increase in the coming years.⁶³

About 40% of the housing units in San Mateo County are rentals and it appears that the rental share of the overall housing market is growing.⁶⁴ In 2012, median monthly rent was \$1,541. Higher rents usually translate into fewer dollars available for education. Renters are more likely than homeowners to attend community college. Rents are relative, however, and a more useful statistic is the proportion of household income paid to rent. East Palo Alto (59.5%), Portola Valley (51.9%), Brisbane (46.5%), Redwood City (46.0%), Daly City (45.9%), South San Francisco (43.8%), and Millbrae (42.5%) exceed the county's overall statistic for proportion of household income paid to rent (40.6%).⁶⁵

Implications for Housing Trends. Homeownership costs are high meaning that young families may be unable to relocate to San Mateo County without sufficiently high levels of income typically brought about by accompanying high levels of education. As the population ages in the County and as available land increases in cost, an increasing proportion of new construction will be in multi-unit structures. As the housing market, especially in places where rental costs are high, squeezes lower-income families disposable income for education and tuition may decline, making it more difficult for the District to increase its penetration rate for this key demographic.

Community College Trends

United States

After increasing throughout the Great Recession, overall postsecondary enrollments decreased 1.5% from the previous fall. In fall 2013, enrollments decreased among four-year for-profit institutions (-9.7%) and two-year public institutions (-3.1%). However, enrollments increased slightly among four-year public institutions (+0.3%) and four-year private non-profit institutions (+1.3%). The public two-year college decrease was the third consecutive decline and reflects, in part, a recovering national economy.⁶⁶

College enrollment overall is becoming more racially diverse. The national percentage of Hispanic college students rose from 11% to 17% between 2006 and 2012. The number of black students rose slightly, from 14% to 15%, while the number of non-Hispanic white students went down, from 67% to 58%.⁶⁷

Postsecondary enrollment of adults aged 25 and older is projected to grow by 25.4% between fall 2008 and fall 2019.⁶⁸

The numbers of low-income students are changing, as well. Half of low-income high school graduates were college students in 2012, up from one-third in the 1980. The current gap between high-income and low-income students entering college is 31%.⁶⁹

The United States ranks 27th among developed nations in the proportion of college students earning undergraduate degrees in science or engineering.⁷⁰

Opportunities in the middle class are shrinking for those without college. The middle class is dispersing into two equal and opposing streams: upwardly mobile college-educated haves and downwardly mobile non-college-educated have-nots.⁷¹

debt, with an average of

\$29,400 per borrower. From 2008 to 2012, debt at graduation (federal and private loans combined) increased an average of six percent each year.⁷²

Declining state funding has forced students to shoulder a bigger proportion of college costs; tuition in the United States has almost doubled as a share of public college revenues over the past 25 years from 25 percent to 47 percent.⁷³

President Obama unveiled a plan in August 2013 to measure college performance through a new ratings system so students and families have the information to select schools that provide the best value. And after this ratings system is well established, Congress would presumably have the information to tie federal student aid to college performance so that students maximize their federal aid at institutions providing the best value.⁷⁴

Changes in federal financial aid eligibility made effective in 2012 impact all community colleges efforts to recruit and retain students. These changes mandate that students must have earned either a high school diploma or a recognized equivalent [such as a General Educational Development certificate [GED] or a homeschool education] prior to admission, meaning students will longer be able to simply take a test, often know as an “ability to benefit test,” to be admitted.⁷⁵

Another large federal policy change made in 2012 is the limit in the length of time students can receive Pell Grants; students are now capped at 12 semesters or the equivalent. Those that exceed this limit are denied eligibility for future Pell Grants.⁷⁶

As the United States continues to push education in STEM (Science, technology, engineering and mathematics) areas, it is interesting to note that most students who received bachelor’s in these areas do not always end up in jobs or careers in these areas.⁷⁷

Over the past six years the percentage of community colleges student loan borrowers who have defaulted has risen from 13 to nearly 21 percent. Under the new national standard, colleges will be accountable for their three-year default rates and penalties will take effect if a colleges' cohort default rate exceeds 30 percent for three years in a row, or 40 percent for a single year.⁷⁸

Research on generational differences can yield productive planning for community college. For example, the unimaginative name “Generation Z” is no being used to portray the generation coming after the Millennials, comprising those born after 1995 and who are now 18 and under. Generation Z is the first post-9/11 generation, and raised amid institutional and economic upheaval. They are touted as industrious, collaborative and eager to build a better planet, unlike Millennials who are often characterized as overconfident, narcissistic and entitled.⁷⁹ It remains to be seen whether Generation Z will embrace community colleges as a place to satisfy their ambitions.

California

California's public higher education sectors grew in enrollment by 14.4% from 1990 through 2011. Among these sectors, the community colleges grew the least (9.8% while the California State University System grew by 44.7% and the University of California System grew by 24.8%.⁸⁰

California is home to nearly 25 percent of the nation's community college students, but approximately only half of those seeking a degree, certificate, or transfer meet their goal within six years. Hispanic and Black students in California fare even worse.⁸¹

Seven more California community colleges have stopped offering federal student loans since 2020--11. With more than 250,000 students enrolled at non--participating schools, California remained the state with the largest number of community college students without access to federal student loans.⁸²

About two--thirds of young (aged 25--34) Asians/Pacific Islanders have achieved a postsecondary degree in California, compared with 52% for White non--Hispanics, 29% for Black non--Hispanics, 27% for American Indians/Alaska Natives, and 17% for Hispanics.⁸³

In 2012, Latinos outnumbered all others in applications to the University of California schools for the first time.⁸⁴

By 2016 California community college students for the first time will need to maintain certain academic performance standards to remain eligible for fee waivers. The result may alter student attendance patterns significantly for community colleges.⁸⁵

In April 2013, the California Community Colleges joined other states to release a "Student Success Scorecard." Mandated by AB1456, it provides transfer and degree or certificate completion and persistence rates as well as data on how effectively colleges move students through remedial and career--technical courses on each of the system's 112 campuses. Each measure is reported by college--prepared and unprepared for college, and broken down by race, ethnicity, gender, and age and includes transfer rates and "momentum points," such as the percentage of students who complete 30 units.⁸⁶

California's new streamlined transfer program developed by California Community Colleges and California State University now offers 1,000 associate degrees for transfer. In the 2012--2013 academic year, the first full year that these transfer degrees were available, 1,730 Associate of Science for Transfer and 3,571 Associate of Arts for Transfer degrees were awarded to California community colleges students.⁸⁷

In the most recent California legislative session, at least two bills were introduced but not passed that could have an impact on the San Mateo County Community College District. The first, AB 1306, would have created the "New University of California," in effect a fourth system of higher education which would have issued academic credit and degrees to anyone capable of passing certain exams. The second, SB 520, would have required all public colleges and universities to grant credit for low--cost online courses.⁸⁸

A bill that did pass, SB 440, expands the Student Transfer Achievement Reform Act of 2010 to require that, prior to the 2014--15 academic year, every California Community College create an associate degree

for transfer in every major that has a transfer model curriculum. Students completing Associate Degrees for Transfer receive priority registration in the California State University system.⁸⁹

Seventy---seven percent of all students enrolled in California community colleges are categorized as “below college level.” Six---year success rates for these students are consistently in the range of 42 to 43%, contrasted to the 72% rates for students who are designated as college level.⁹⁰

The closure of the California Postsecondary Education Commission in the fall of 2011 limits public access to higher education data. According to its former executive director, CPEC’s website received up to 120,000 hits a day.⁹¹

In August 2014 the California Legislature passed a bill allowing up to 15 community college districts to establish a statewide baccalaureate degree pilot program in consultation with the California State University and the University of California. Districts would be permitted to offer one baccalaureate degree program each, to be determined by the chancellor and approved by the board of governors. This brings the total to 23 states that now authorize baccalaureate degrees at their community colleges.⁹²

California Community Colleges recently released a scorecard documenting completion rates for students by race/ethnicity. The scorecard shows that Completion rates have declined over the past six years for Latinos, African Americans, Asians, and Whites. Further, there is a large and persistent gap between “prepared” and “underprepared” students.⁹³

Experience demonstrates that narrowing programmatic and academic options for low---income students while providing them with structure can dramatically improve their success rates. The City University of New York, for example, that a third of structured program participants had graduated over two and a half years compared to less than a fifth of other students.⁹⁴

California currently bans carrying a concealed weapon on a college campus.⁹⁵

Bay Area, the Peninsula, and San Mateo County

In addition to three colleges that comprise the San Mateo Community College District, there are 10 other public community colleges operating within a 25---mile radius of the City of San Mateo.⁹⁶

There are three public higher education institutions offering bachelor’s degrees in a 25---mile radius of the City of San Mateo. San Mateo County, however, lacks a full---service 4---year public higher education institution.⁹⁷

San Mateo County Community College District recently attained a Moody’s Aaa rating reflecting the District's high resident income levels, continuing growth in the district's large---sized tax base, sound financial operations, and low debt burdens. The rating also incorporates the district's recent attainment of basic aid funding status, which will likely offset funding challenges attendant to state aid.

Implications of Community College Trends. Enrollment growth in community colleges nationwide has stabilized or declined as the national economy improves. Competition for students will increase as a result. Besides the three colleges within the District, there are ten community colleges operating in the area. Understanding their array of programs will be a strategic factor as the District explores strengthening existing programs and creating new programs based on market needs and demographics. The increasing proportion of students entering college with skills deficits will require new responses including mandatory scheduling and advising to increase student success and retention.

State Policy Trends

United States

Performance-based funding, in effect paying colleges for students that graduate or meet other criteria and not simply for enrollment, has evolved into a national movement in public higher education. Thirty-nine states are currently active in performance based funding. Twenty-two states have performance based funding in place. Seven are in transition while 10 states are actively discussing it.⁹⁸

California

According to the Public Policy Institute, unprecedented cuts in state support for community colleges from 2007 to 2012 have reduced access to education and sent enrollments plunging to a 20-year low. The cuts totaled \$1.5-billion in 2011 dollars.⁹⁹

Two years ago, the California Community College Board of Governors established the Student Success Task Force. The Task Force was to examine best practices and provide recommendations for improving student educational outcomes and workforce preparedness. The Task Force made 22 recommendations that were signed into legislation known as the Student Success Act of 2012, Senate Bill 1456. The key provisions are mandated assessment, orientation, and education planning tied to a new performance-based funding model, the Student Success Services and Programs (SSSP), replacing the categorical funding model in fall 2014.¹⁰⁰

Each segment of higher education [University of California (UC), the California State University (CSU), the California Community Colleges (CCC)] will receive a 5-percent increase in General Fund appropriations (\$125.1 million each) in the 2013-2014 enacted budget. This represents the first year of a four-year plan over which each segment will receive up to a 20-percent increase in General Fund appropriations (\$511 million each).¹⁰¹

California lawmakers are considering allowing some community college districts to offer four-year degrees. If the Governor signs this legislation and if the San Mateo elects to offer this type degree, it may respond at least in part to the lack of public four-year offerings in the District.¹⁰²

Implications of State Policy Trends. It is likely that the California Legislature will continue to develop new policies that will impact the District and its operations. Especially prominent will be policies intended to increase student transfer and completion. Accreditation is the most recent area targeted for legislative intervention.

K through 12 Trends

United States

The United States ranks 20th in high school completion rate among industrialized nations and 16th in college completion rate.¹⁰³

The average American K--12 student spends four hours a day in front of a TV.¹⁰⁴

At the national level, only 68% of ninth graders graduate from high school in four years, and only 18% go on to complete an associate's degree within three years after entry into a community college or a bachelor's degree within six years of enrolling in a 4--year college.¹⁰⁵

Sixty--nine percent of United States public school students in fifth through eighth grade are taught mathematics by a teacher without a degree or certificate in mathematics.¹⁰⁶

Ninety--three percent of United States public school students in fifth through eighth grade are taught the physical sciences by a teacher without a degree or certificate in the physical sciences.¹⁰⁷

California

California's production of high school graduates peaked in 2010--11 at over 430,000, marking the end of an era of explosive growth from 1989--90 that added over 196,000 graduates (84%). Between 2010--11 and 2013--14, production will fall by over 37,000 (a 9% decline), after which it will continue to decline, though inconsistently and at a more modest pace, through 2020--21.¹⁰⁸

California's implementation of the new Common Core State Standards and Smarter Balance standardized assessments creates a necessity for open access colleges and universities to specify academic preparation needed for college to align curricula with high schools to improve both access and completion.¹⁰⁹

Wide gaps persist in test results across racial and ethnic, gender, and income groups in California. On the most recent National Assessment of Education Progress, African American students had an average score 28 points lower than White students, a performance gap not significantly different from that in 1998 (30 Points). Hispanic students had an average score 23 points lower, narrower than that in 1998. In 2013, female students averaged 10 points higher than males while students eligible for free or reduced priced school lunch averaged 25 points lower than those who did not.¹¹⁰

The Academic Performance Index, or API has been the foundation for California's efforts to hold K through 12 schools accountable. A strong statistical correlation exists between API scores and the percentage of students receiving free or reduced lunches . In education circles the API is occasionally referred to as the "Affluent Parent Index."¹¹¹

Bay Area, the Peninsula, and San Mateo County

The county's K through 12 enrollment is projected to grow by 3% over the current planning period, from 2014 to 2020. The number of high school graduates, however, is not expected to grow from its current annual level of 5,840.¹¹²

Hispanics constitute the largest racial/ethnic group (38%) in San Mateo elementary school districts.¹¹³

More than a third (34.2%) of the County's K through 12 enrollment qualifies for free or reduced lunches.¹¹⁴

Implications of K through 12 Trends. Elementary enrollments throughout the District will grow modestly through the year 2020 while the number of high school graduates will be essentially flat. Since high school graduates entering the District's colleges enroll primarily on a full--time basis, changes in penetration rates will need to be closely monitored and new pathways built to ensure enrollment stability. Retention and outreach strategies will be increasingly critical.

New Paradigms

United States

The number of students who choose to take online courses for credit is on the rise and by 2013 totaled a record 7.1 million. In the past few years the rate has been slower, but online classes are still growing faster than higher institutions' enrollment overall.¹¹⁵

In 2011, it was estimated that about \$35.6 billion was spent on self---paced eLearning across the globe. Today, e Learning is a \$56.2 billion industry. It's predicted to double by 2015.¹¹⁶

Seventy---seven percent of academic leaders in the U.S. rate the learning outcomes in online education as the same or superior to those in face---to---face classes. However, the proportion of chief academic officers who believe their faculty accepts the value and legitimacy of online education has not increased (30.2%) from last year's survey. Nonetheless, the proportion of chief academic leaders who say online learning is critical to their long---term strategy is at a new high (69.1%).¹¹⁷

Smartphones are increasingly a vehicle for American's to access the Internet. For example, 46% of Americans have a home broadband connection and a smartphone, 24% have a home broadband connection, but not a smartphone, and 10% have a smartphone, but not a home broadband connection. These routes to connectivity are more pronounced among young people; 95% report having access to the Internet either through smartphones or home broadband.¹¹⁸

Colleges, universities, and foundations have poured more than \$100-million into creating open education resources (OER). But higher education has been slow to use the resources as alternatives to expensive textbooks. Known as the “Textbook Zero” model, savings to students can be game changing while providing the same pathway to learning mastery as traditional textbooks.¹¹⁹

Competency-based learning approaches to delivering and managing curricula are gaining newfound acceptance in American higher education and have spread to the community college sector, especially the associate’s degree level. For example, Western Governor’s University is now working with a cohort of eleven community colleges to create their own competency-based degrees and certificates, mostly in information technology tracks.¹²⁰

The University of Southern New Hampshire (SNHU) also uses competency-based curriculum to speed student completion of online associate degrees. Tuition and fees at SNHU’s College for America are \$1,250 per six-month term. The college uses a subscription-style model in which students can complete assessments at their own speed. The associate degree is designed for students to complete in an average of two years ----- at a cost of \$5,000.¹²¹ SNHU was the only university to make Fast Company’s 2012 list of the World’s 50 Most Innovative Companies, which included such companies as Apple, Google, HBO and LinkedIn.¹²²

The “Flipped Classroom” has gained traction in higher education as an active learning model. It inverts the traditional method of providing instruction by hosting video lectures for students to watch before class at home and activities and discussion in the classroom. By reversing the typical lecture and homework elements, students become more engaged in course material.¹²³

When asked whether they think students should be able to receive college credit for knowledge and skills acquired outside the classroom, nearly 9 in 10 Americans [87%] say yes. This suggests that higher education institutions could initiate community collaborations/partnerships to help facilitate certificate or degree completion for some working Americans.¹²⁴

Additionally, three-quarters of Americans (75%) indicate that they would be more likely to enroll in a higher education program if they could be evaluated and receive credit for what they already know.¹²⁵

A very recent survey of 343 US executives familiar with their company’s workforce-development strategy and higher-education efforts indicates that 71% surveyed say that increased employee loyalty and higher retention rates is a top incentive for investing in post-secondary education and training programs for employees. This report also suggests that colleges think they’re adequately preparing students for the workforce but that industry sharply disagrees.¹²⁶

A 7-inch mobile tablet running the Android operating system is now available. Known as the Datawind UbiSlate 7Ci, it is priced at just \$37.99 USD has twice the RAM capacity of the first iPad.¹²⁷

An increasing number of colleges are making use of student data to improve classes, teaching methods, and entire programs. Sometimes called Big Data, businesses have been mining such data for years to predict trends and consumer behavior patterns thereby providing a custom experience to consumers, “learning analytics” will be effective as higher education moves to personalize the educational experience for learners at the individual level.¹²⁸

Mobile computing is now defined by smartphones and simple, low-cost software extensions known as “apps.” Simple but useful apps have found their way into almost every task imaginable and they continue to grow in popularity. In 2013 it is estimated that 102 billion apps were downloaded worldwide.¹²⁹ Mobile apps are particularly useful for learning as they enable people to learn and experience new concepts wherever they are, often across multiple devices.¹³⁰

California

California, at 6.4%, was among the bottom five states as measured by the number of students taking only on-line courses.¹³¹

Of all courses offered at California’s community colleges, 12.3% are offered through distance education, and it is estimated that nearly half of all courses have some online component.¹³²

Fifty-one percent of California’s community colleges offer certificates and degrees that can be earned without stepping onto campus for classes. This typically includes a combination of both online and television courses.¹³³

Thirty-seven percent of California community college students surveyed in 2011 said they enrolled in at least one distance education course because of the convenience.¹³⁴

Bay Area, the Peninsula, and San Mateo County

The Bay Area is home to eLearning firms operating on the cutting edge and attempting to reshape education opportunities throughout the world. These including the Khan Academy, Animation Mentor, Udacity, The eLearning Guild, Emantras, and Coursera, all or one of which may be a potential partner.

A recent partnership between Udacity and San Jose State University to make Massively Open Online Courses (MOOC’s) available at low cost may hold lessons for other higher education institutions. Limited Internet experience and technical glitches hampered many students, especially those in remedial classes, which had high failure rates. One major problem is matching student needs to complete work more quickly and others to take more time, especially since SJS is set up entirely on the semester system.¹³⁵

Implications of New Paradigms. Educational technology has evolved dramatically over the past two decades, causing higher education institutions to rethink how and when to deliver courses and programs. Learners everywhere—especially in the Silicon Valley—are likely to have high expectations for the use of technology in courses and support services. Similarly, competency-based learning approaches can help develop accelerated pathways for certificate and degree attainment that are important to students and employers.

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