

IRP@FHDA

To: Student Services Divisions at De Anza College & Foothill College
From: Lourdes Del Rio-Parent, PhD, Sr. Research Analyst/Data Warehouse Coordinator FHDA
Date: December 22, 2017
Re: Assessment for course placement activity as a predictor of first-time student enrollment: Trend analysis of student headcounts for De Anza College and Foothill College, 2013 to 2017

Introduction

The purpose of this document is to present findings for an exploratory study of trends in the number of students or applicants who took at least one test for placement in English, ESL, mathematics, or chemistry/biology courses at De Anza College or Foothill College between the years of 2013 and 2017. A key purpose of the study was to identify factors associated with the observed decline in student headcount for test placement activity at both colleges during the last few years, including enrollment activity and demographics for first-time¹ students. The study included analyses of headcount trends disaggregated by fiscal year, calendar year and outreach season.² Within each level or time unit, data were disaggregated by month to identify sharp increases or drops in headcount that could signal the presence or absence of significant events. The study also explored whether the number of first-time students who took at least one placement test during the outreach season correlated with (or could predict) the number of first-time students who enrolled in the summer of fall term of the following academic year and the possible impact on total attendance or student workload.

Summary of Results

At the fiscal year level,³ the data show a significant decline for De Anza College (-18%) and a moderate decline for Foothill College (-5%) in the number of students or applicants who took at least one placement test between 2013-14 and 2016-17. For the last two fiscal years, data for De Anza show a significant drop in headcount during the early and late months of the fiscal year: July to August and April

¹ Enrolled at the college for the first-time, including transfer students.

² The outreach season was defined as the months in the year when colleges tend to conduct activities to reach out to high school graduating seniors (March to September).

³Fiscal year includes the period of July 1 to June 30. The fiscal year is the time unit used in the MIS SA (Student Assessment) state report. More information available at:
<http://extranet.cccco.edu/Divisions/TechResearchInfoSys/MIS/DED/StudentAssessment.aspx>

to May, while for Foothill College the data consistently show a drop in headcount during the months of April and May.

Results at the calendar year level show a clearer picture regarding changes in student headcount for test placement activity at De Anza College and Foothill College between 2014 and 2017. Data for De Anza show a significant decline in headcount from March to September, while at Foothill the data show a more clearly defined movement or headcount build-up towards the months of August and September.

At the outreach level, data for De Anza College show a slightly higher decline than previous analyses; for Foothill, the decline was not as significant at this level. The data also showed that close to 60% of those who took at least one placement test at De Anza during any of the outreach seasons (2014 to 2017) enrolled for the first-time at the College in the summer or fall term of the following academic year; for Foothill, the figure was 53%.

Specific to first-time students, data show sharper declines in placement test activity during recent outreach seasons, especially at De Anza, when compared to figures for previous years or when compared to figures for all students or applicants with placement test activity during the outreach season. The data suggest that (a) registration for the fall term has been the major driver for placement test activity for first-timers at Foothill College during the last four years; (b) during the last two years, fall registration has also become a major driver for test placement activity at De Anza College; (c) the decline in headcount for test placement activity for first-timers at De Anza College during the months of April and May signal possible issues with the effectiveness of outreach efforts to feeder high schools; and (d) in the last four years, there is no evidence that Foothill College has been unable to develop and implement outreach activities that could entice a significant number of high school students to take placement tests by the end of their senior year and enroll at this college in the following academic year.

Trend analyses for first-time students who took at least one placement test during the outreach season also showed a significant decline in the number of students who (a) began attending the college in the summer term, (b) were 19 years old or younger, and (c) recently graduated from high school, especially at De Anza College. Regarding residency status, the decline in headcount for California residents was significantly higher at De Anza College, while at Foothill College the most significant decline was for foreign or international students.

Regarding the question on whether changes in the number of recent high school graduates with placement test activity during the outreach season is related to or can predict the number of these who register in the summer or fall term of the following academic year, the data show a strong relationship. The data suggest that the number of recent high school graduates who take at least one placement test during the outreach season could be used to forecast the number who will later register in the following summer or fall term and related attendance or workload.

Recommendations based on results of this exploratory study include an in-depth evaluation of outreach activities to feeder high schools and summer course offerings for first-time students, especially recent high school graduates.

Results

Fiscal Year

Research Question # 1: Was there any significant trend in the number of students or applicants who took at least one placement test at De Anza College or Foothill College between the fiscal years of 2013-14 and 2016-17?

Data in Table 1 show that the number of students or applicants who took at least one placement test at De Anza College in the fiscal year of 2016-17 declined by 18%, when compared to the number for 2013-14. For Foothill College, the number declined by 5%. In Figure 1, the data show that during the last four years the difference in headcount figures between the colleges has declined mainly due to the sharp decline in headcount at De Anza during this period. Table 1.A and Table 1.B provide headcount by placement test and fiscal year for De Anza and Foothill, respectively.

Regarding trends throughout the months of the fiscal year, data for De Anza College depicted on Figure 2 show that in 2013-14 and 2014-15 there was a spike or significant increase in the number of students or applicants who took at least one placement test early in the fiscal year, between July and August, and later in the year, between April and May. However, in the last two fiscal years (2015-16 and 2016-17), these spikes smoothed out or disappeared. In terms of headcount and percentage, data in Table 2 show a major decline in headcount for the months of April (41%; 1,434 to 850) and August (-32%; 1,569 to 1,071).

For Foothill College, data in Table 3 show that August, which precedes the fall term, was the month that consistently had the highest number of students or applicants who took at least one placement test between the fiscal years of 2013-14 and 2016-17. Regarding changes in the last four fiscal years, data in Figure 3 show that while the headcount for April and May consistently declined, the headcount for June increased. For example, between 2013-14 and 2014-15 headcounts for April and May declined 34% and 208%, respectively. For June, the headcount increased by 52% during the same period.

Table 1. Assessment for Course Placement: Headcount by College and Fiscal Year

College	Fiscal Year				2013-14 to 2017 Change	
	2013-14	2014-15	2015-16	2016-17	Count	Percent
De Anza	9,929	9,488	8,611	8,177	(1,752)	-18%
Foothill	4,715	4,587	4,704	4,495	(220)	-5%
Relative Size	47%	48%	55%	55%		

Notes

Data for assessments approved by the CCCC for placement in English, ESL, math, or chemistry courses.

Data extract date: December 13, 2017.

Fiscal Year: July 1 to June 30. For example: 2013-14 refers to data for July 1 of 2013 to June 30 of 2014.

Relative size: Foothill's headcount (smaller number) divided by De Anza's headcount (larger number).

Figure 1. Assessment for Course Placement: Headcount by College and Fiscal Year

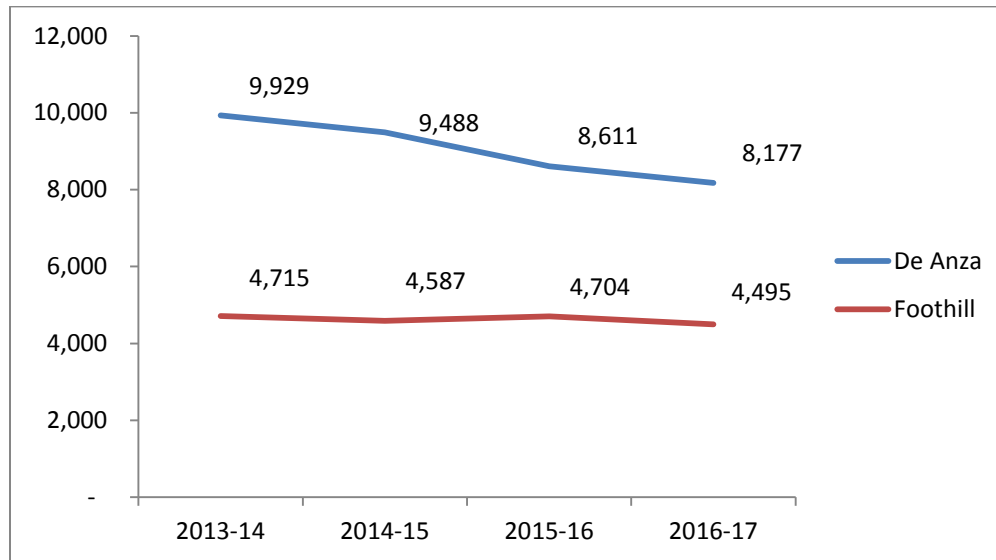


Table 1.A De Anza College, Assessment for Course Placement: Headcount by Assessment Title, College and Fiscal Year

Test Title	Headcount				2013-14 to 2016-17 Change	
	2013-2014	2014-2015	2015-2016	2016-2017	Count	Percent
Accuplacer Arithmetic	1,678	1,678	1,541	1,542	(136)	-8%
Accuplacer College Level Math	3,144	3,371	2,999	2,818	(326)	-10%
Accuplacer Elementary Algebra	4,363	4,152	3,753	3,591	(772)	-18%
Accuplacer Reading Comprehension	6,962	6,472	5,751	5,365	(1,597)	-23%
Accuplacer Sentence Skills	6,904	6,408	5,692	5,313	(1,591)	-23%
Chemistry 1A Placement Test (CCDT)	606	489	427	453	(153)	-25%
Combined English Language Skills Assessment (CELSA) Computerized	1,579	1,527	1,558	1,627	48	3%
De Anza Biology Test	356	334	317	313	(43)	-12%
De Anza Calculus Test	1,284	1,310	1,246	1,302	18	1%
De Anza English Writing Sample	6,947	6,472	5,754	5,360	(1,587)	-23%
De Anza ESL Writing Sample	1,575	1,520	1,551	1,620	45	3%
Total Headcount	9,929	9,488	8,611	8,177	(1,752)	-18%

Notes

Data for assessments approved by the CCCC for placement in English, ESL, math, or chemistry courses.
Data extract date: December 13, 2017.

Table 1.B Foothill College, Assessment for Course Placement: Headcount by Assessment Title, College and Fiscal Year

Test Title	Headcount				2013-14 to 2016-17 Change	
	2013-2014	2014-2015	2015-2016	2016-2017	Count	Percent
Accuplacer - ESL Language Use	1,034	919	908	856	(178)	-17%
Accuplacer - ESL Listening Test	1,035	919	898	858	(177)	-17%
Accuplacer - ESL Reading Skills	1,035	920	902	860	(175)	-17%
Accuplacer - ESL Sentence Meaning	1,035	919	905	859	(176)	-17%
Accuplacer Arithmetic	1,078	963	1,089	1,165	87	8%
Accuplacer College Level Math	1,770	1,968	2,042	2,396	626	35%
Accuplacer Elementary Algebra	1,250	1,197	1,414	1,689	439	35%
Accuplacer Reading Comprehension	2,636	2,510	2,639	2,678	42	2%
Accuplacer Sentence Skills	2,520	2,473	2,642	2,678	158	6%
Accuplacer Writeplacer	149	209	205	198	49	33%
Accuplacer Writeplacer ESL	493	420	441	370	(123)	-25%
California Chemistry Diagnostic Test	319	326	346	293	(26)	-8%
Total Headcount	4,715	4,587	4,704	4,495	(220)	-5%

Notes

Data for assessments approved by the CCCC for placement in English, ESL, math, or chemistry courses.
Data extract date: December 13, 2017.

Table 2. De Anza College, Assessment for Course Placement: Headcount by Fiscal Year and Month

Month	Fiscal Year				2013-14 to 2016-17 Change	
	2013-14	2014-15	2015-16	2016-17	Count	Percent
July	1,098	1,096	1,067	875	(223)	-20%
August	1,569	1,353	1,158	1,071	(498)	-32%
September	800	899	775	930	130	16%
October	250	232	267	269	19	8%
November	734	614	642	522	(212)	-29%
December	704	568	528	602	(102)	-14%
January	250	276	260	311	61	24%
February	326	445	499	332	6	2%
March	1,096	1,088	1,019	916	(180)	-16%
April	1,434	1,261	717	850	(584)	-41%
May	1,132	943	1,122	933	(199)	-18%
June	1,259	1,287	1,119	1,139	(120)	-10%
Total	9,929	9,488	8,611	8,177	(1,752)	-18%

Notes

Data for assessments approved by the CCCC for placement in English, ESL, math, or chemistry courses.

Data extract date: December 13, 2017.

Count (Change): Headcount for 2017 minus the headcount for 2014.

Percent (Change): The figure for "Count (Change)" divided by the original number—headcount for 2014.

Figures are not mutually exclusive—students may take placement tests at different times/months.

Figure 2. De Anza College, Assessment for Course Placement: Headcount by Fiscal Year and Month

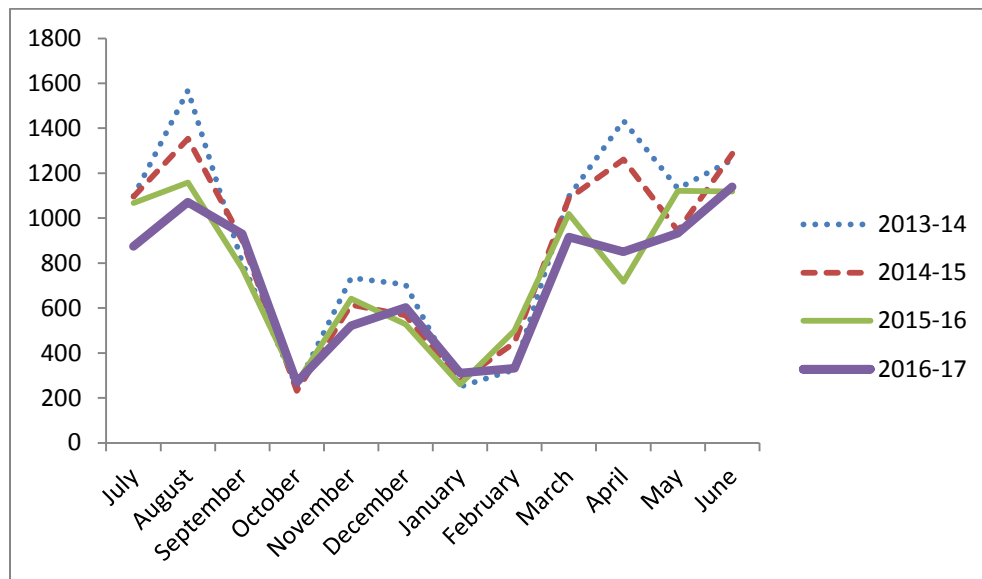


Table 3. Foothill College, Assessment for Course Placement: Headcount by Fiscal Year and Month

Month	Fiscal Year				2013-14 to 2016-17 Change	
	2013-14	2014-15	2015-16	2016-17	Count	Percent
July	553	480	595	545	(8)	-1%
August	934	790	906	905	(29)	-3%
September	829	777	771	672	(157)	-19%
October	92	86	95	92	-	0%
November	288	309	367	268	(20)	-7%
December	426	372	422	290	(136)	-32%
January	259	176	201	270	11	4%
February	115	162	199	164	49	43%
March	452	535	531	410	(42)	-9%
April	399	370	240	263	(136)	-34%
May	546	490	427	393	(153)	-28%
June	507	610	677	775	268	53%
Total	4,715	4,587	4,704	4,495	(220)	-5%

Notes

Data for assessments approved by the CCCC for placement in English, ESL, math, or chemistry courses.

Data extract date: December 13, 2017.

Count (Change): Headcount for 2017 minus the headcount for 2014.

Percent (Change): The figure for "Count (Change)" divided by the original number—headcount for 2014.

Figures are not mutually exclusive—students may take placement tests at different times/months.

Figure 3. Foothill College, Assessment for Course Placement: Headcount by Fiscal Year and Month

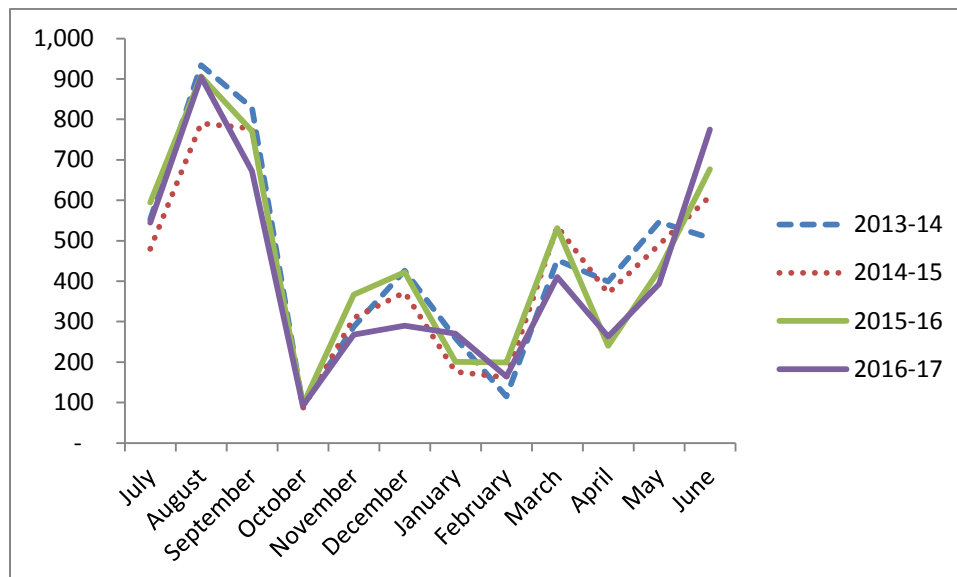


Table 4. Assessment for Course Placement: Headcount by College and Calendar Year

College	Calendar Year				2014 to 2017 Change	
	2014	2015	2016	2017	Count	Percent
De Anza	9,540	9,100	8,421	7,673	(1,867)	-20%
Foothill	4,409	4,627	4,319	4,067	(342)	-8%
Relative Size	46%	51%	51%	53%		

Notes

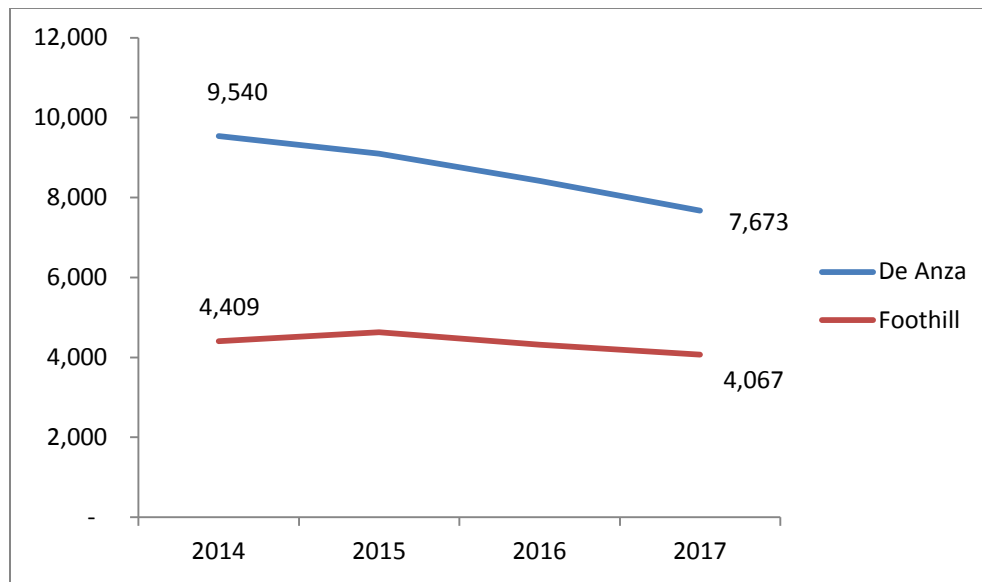
Data for assessments approved by the CCCC for placement in English, ESL, math, or chemistry courses.

Data extract date: December 13, 2017.

Calendar Year: January 1 to December 31.

Relative size: Foothill's headcount (smaller number) divided by De Anza's headcount (larger number).

Figure 4. Assessment for Course Placement: Headcount by College and Calendar Year



Calendar Year

Research Question # 2: What new trends emerge when analyzing headcounts for placement test data based on the calendar year?

For De Anza College, data in Table 5 and Figure 5 show that (a) headcount figures for students or applicants who took at least one placement test tend to be significantly higher between March and September, and (b) the decline in headcount during these months is what accounts for the significant decline in total headcount between the 2014 and 2017 calendar years (22%; 9,543 to 7,467—as shown in Table 4 and Figure 4). The analysis based on the calendar year suggest that there might have been an event, or series of events, that happened in 2014 and 2015 during the months of March to April, which changed or did not take place in 2016 and 2017.

In Table 6 and Figure 6, the data for Foothill College show a “buildup” in headcount towards the months of August and September, as the fall term approaches. Different to De Anza, data for Foothill show no major changes in headcounts figures throughout the calendar year, with the exception of the month of April. Similar to De Anza, the headcount for the months of April and May declined significantly in 2016 and 2017 at both colleges, when compared to figures for 2014 and 2015.

Table 5. De Anza College, Assessment for Course Placement: Headcount by Calendar Year and Month

Month	Calendar Year				2014 to 2017 Change	
	2014	2015	2016	2017	Count	Percent
January	250	276	260	311	61	24%
February	326	445	499	332	6	2%
March	1,096	1,088	1,019	916	(180)	-16%
April	1,434	1,261	717	850	(584)	-41%
May	1,132	943	1,122	933	(199)	-18%
June	1,259	1,287	1,119	1,139	(120)	-10%
July	1,096	1,067	875	877	(219)	-20%
August	1,353	1,158	1,071	1,108	(245)	-18%
September	899	775	930	808	(91)	-10%
October	232	267	269	183	(49)	-21%
November	614	642	522	643	29	5%
December	568	528	602	290	n/a	n/a
Total	9,540	9,100	8,421	7,673	(1,867)	-20%

Notes

Data for assessments approved by the CCCC for placement in English, ESL, math, or chemistry courses.

Data extract date: December 13, 2017.

Calendar Year: January 1 to December 31.

Figures are not mutually exclusive—students may take placement tests at different times/months.

Figure 5. De Anza College, Assessment for Course Placement: Headcount by Calendar Year and Month

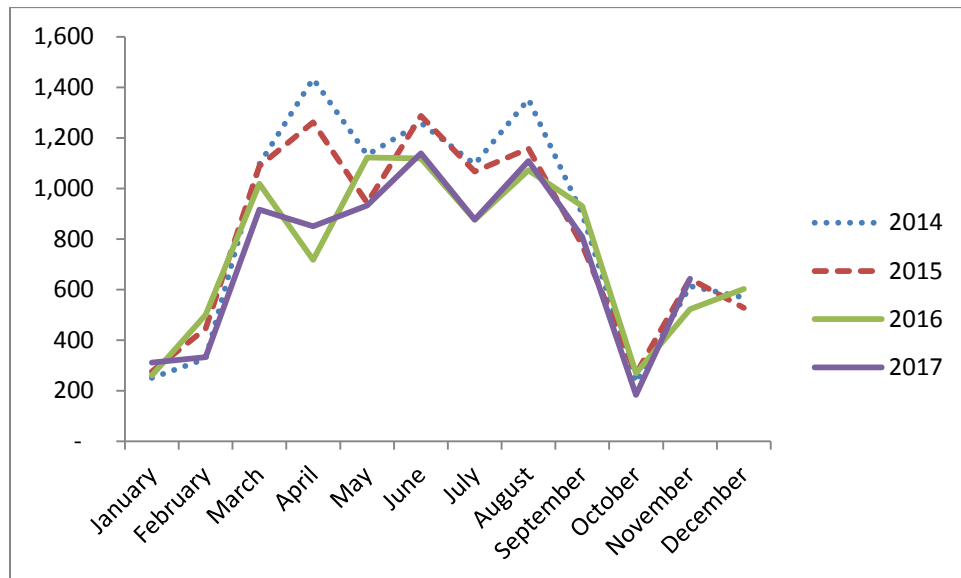


Table 6. Foothill College, Assessment for Course Placement: Headcount by Calendar Year and Month

Month	Calendar Year				2014 to 2017 Change	
	2014	2015	2016	2017	Count	Percent
January	259	176	201	270	11	4%
February	115	162	199	164	49	43%
March	452	535	531	410	(42)	-9%
April	399	370	240	263	(136)	-34%
May	546	490	427	393	(153)	-28%
June	507	610	677	775	268	53%
July	480	595	545	527	47	10%
August	790	906	905	637	(153)	-19%
September	777	771	672	789	12	2%
October	86	95	92	103	17	20%
November	309	367	268	279	(30)	-10%
December	372	422	290	n/a	n/a	n/a
Total	4,409	4,627	4,319	4,067	(342)	-8%

Notes

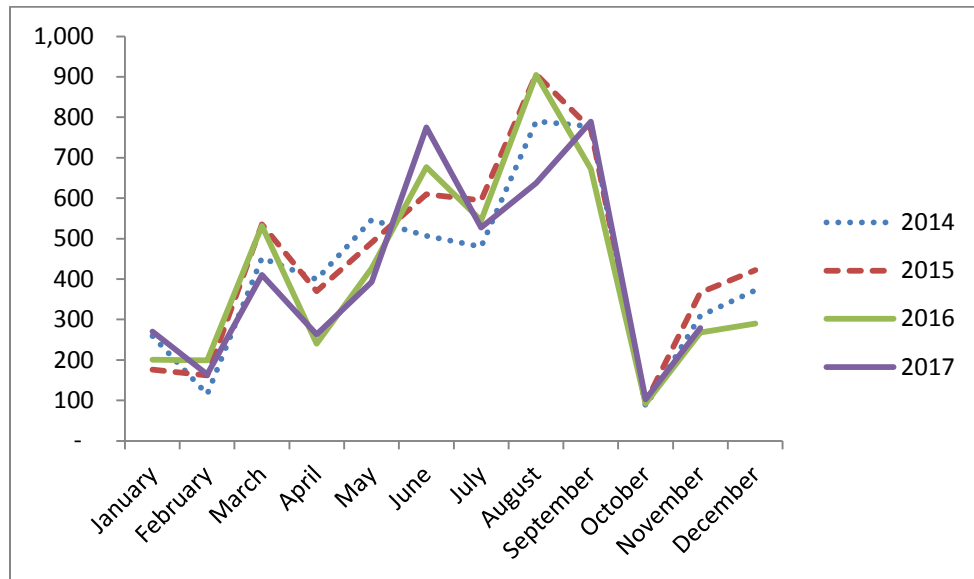
Data for assessments approved by the CCCC for placement in English, ESL, math, or chemistry courses.

Data extract date: December 13, 2017.

Calendar Year: January 1 to December 31.

Figures are not mutually exclusive—students may take placement tests at different times/months.

Figure 6. Foothill College, Assessment for Course Placement: Headcount by Calendar Year and Month



Outreach Season

Research Question # 3: With respect to the last four outreach seasons, 2014 to 2017, is there any significant trend regarding the number of students who took at least one placement test during this period at De Anza College or Foothill College? Is there any significant trend specific to first-time students?

At the outreach season level, March to September, the data show that the number of students or applicants who took at least one placement test between 2014 and 2017 declined 21% (7,896 to 6,243) at De Anza College and 4% (3,469 to 3,315) at Foothill College, as shown in Table 7. In Figure 7, the data show a continuous and significant decline in headcount for De Anza College during the last four outreach seasons, even slightly higher than that for other analysis (fiscal year: -18%; calendar year, -20%). For Foothill College, the 4% decline in headcount for the outreach season was less than the decline found in other analyses (fiscal year: -5%; calendar year, -8%).

Data in Table 7.A for De Anza College show that about 60% of the students who took at least one placement test during the outreach season registered for the first time at the College on either summer or fall of the upcoming academic year. Data for Foothill College in Table 7.B show that the percentage of first-time students who took at least one placement tests was 53%, for all four outreach seasons.

Table 7. Assessment for Course Placement: Headcount by College and Outreach Season

College	Outreach Season				R-2014 to R-2017 Change	
	R-2014	R-2015	R-2016	R-2017	Count	Percent
De Anza	7,896	7,283	6,562	6,243	(1,653)	-21%
Foothill	3,469	3,677	3,454	3,315	(154)	-4%
Relative Size	44%	50%	53%	53%		

Notes

Data for assessments approved by the CCCCO for placement in English, ESL, math, or chemistry courses.

Data extract date: December 13, 2017.

Outreach Season: March to September of the calendar year.

Figure 7. Assessment for Course Placement: Headcount by College and Outreach Season

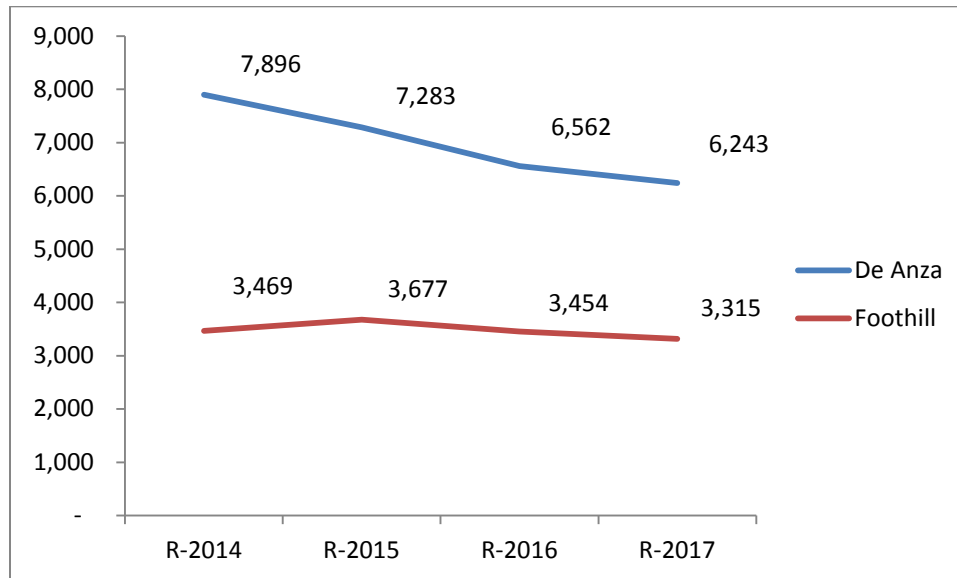


Table 7.A De Anza College, Assessment for Course Placement: Headcount by Outreach Season and First-Time Registered at the College

Outreach Season - 2014			Outreach Season - 2015		
First Term Registered	Count	Percent	First Term Registered	Count	Percent
201412	242	3%	201512	226	3%
201422	226	3%	201522	201	3%
201432	249	3%	201532	260	4%
201442	430	5%	201542	413	6%
201512	2,069	26%	201612	1,688	23%
201522	2,592	33%	201622	2,597	36%
201532	122	2%	201632	154	2%
999999	1,119	14%	999999	1,026	14%
Other	847	11%	Other	718	10%
Total	7,896	100%	Total	7,283	100%

Outreach Season - 2016			Outreach Season - 2017		
First Term Registered	Count	Percent	First Term Registered	Count	Percent
201612	168	3%	201712	149	2%
201622	170	3%	201722	239	4%
201632	218	3%	201732	224	4%
201642	302	5%	201742	328	5%
201712	1,284	20%	201812	1,051	17%
201722	2,740	42%	201822	2,607	42%
201732	127	2%	999999	1,025	16%
999999	935	14%	Other	620	10%
Other	618	9%			
Total	6,562	100%	Total	6,243	100%

Notes

Data for assessments approved by the CCCC for placement in English, ESL, math, or chemistry courses.

Data extract date: December 13, 2017.

Outreach Season: March to September of the calendar year.

First Term Registered: The first term students were registered by census date at the college.

"999999": Has not registered at the college.

Other: Registered for the first time at a different term (not included in the table).

Table 7.B Foothill College, Assessment for Course Placement: Headcount by Outreach Season and First-Time Registered at the College

Outreach Season – 2014			Outreach Season - 2015		
First Term Registered	Count	Percent	First Term Registered	Count	Percent
201421	130	4%	201521	123	3%
201441	330	10%	201541	332	9%
201511	721	21%	201611	815	22%
201521	1,110	32%	201621	1,131	31%
999999	398	11%	999999	455	12%
Other	780	22%	Other	821	22%
Total	3,469	100%	Total	3,677	100%

Outreach Season – 2016			Outreach Season - 2017		
First Term Registered	Count	Percent	First Term Registered	Count	Percent
201621	110	3%	201721	112	3%
201631	107	3%	201731	110	3%
201641	349	10%	201741	368	11%
201711	646	19%	201811	653	20%
201721	1,177	34%	201821	1,100	33%
999999	426	12%	999999	480	14%
Other	639	19%	Other	492	15%
Total	3,454	100%	Total	3,315	100%

Notes

Data for assessments approved by the CCCCO for placement in English, ESL, math, or chemistry courses.

Data extract date: December 13, 2017.

Outreach Season: March to September of the calendar year.

First Term Registered: The first term students were registered by census date at the college.

"999999": Has not registered at the college.

Other: Registered for the first time at a different term (not included in the table).

Outreach Season, First-Time Students

Research Question # 4: With respect to the last four outreach seasons, 2014 to 2017, is there any significant trend regarding the number of first-time students who took at least one placement test during this period at De Anza College or Foothill College?

Data in Table 8 and Figure 8 for students who enrolled for the first time at the college in the academic year that follow the outreach season when they took at least one placement test show a decline of 23% (4,847 to 3,745) for De Anza College and a decline of 7% (1,925 to 1,783) for Foothill College between 2014 and 2017. For both colleges the decline in headcount for first-time students was higher than the decline for all students or applicants who took at least one placement test during this period (De Anza: 21%; Foothill, 4%, as shown in Table 7).

Table 9 and Table 10 show results for drill down analyses of first-timers regarding the month when they took at least one placement test during the outreach season for De Anza College and Foothill College, respectively. For De Anza, Figure 9 depicts a significant drop in headcounts from April to May and July to August for the outreach seasons of 2016 and 2017, when compared to the seasons for 2014 and 2015. These figures suggest that the major decline in headcount for first-timers at De Anza College may relate to events happening, or not happening, during this period. Data in Figure 9 also suggest that in the last two outreach seasons (2016 and 2017) headcounts for placement tests were more likely to increase as the fall term approached, when compared to headcounts for the two prior outreach seasons (2014 and 2015).

For Foothill College, data in Figure 10 show that during the last four years the months of April and May never had much placement test activity (based on student headcount) for first-time students at this college, as it was for De Anza in 2014 and 2015. The data show that during the last four years placement test activity for first-timers during the outreach season increased at Foothill College as the fall term approached. When taking into account that registration for the fall term begins in July and the start date for this term is in late September, the data suggest that the major driver of placement test activity for first-time students at Foothill College in these past four years was registration for the fall term. At De Anza College, this trend (i.e., fall registration as the main driver of placement test activity) has become more evident during the last two years.

Table 8. First-Time Students, Assessment for Course Placement: Headcount by College and Outreach Season

College	Outreach Season				R-2014 to R-2017 Change	
	R-2014	R-2015	R-2016	R-2017	Count	Percent
De Anza	4,847	4,477	4,192	3,745	(1,102)	-23%
Foothill	1,925	2,030	1,918	1,783	(142)	-7%
Relative Size	40%	45%	46%	48%		

Notes

Data for assessments approved by the CCCC for placement in English, ESL, math, or chemistry courses. Data extract date: December 13, 2017.

Outreach Season: March to September of the calendar year.

First-Time students are those who registered any term of the academic year that followed the outreach season. For example, the headcount for the outreach season of R-2014 will only include students who took at least one of the approved assessments from March to September of 2014 and registered for the first time at the college any term of 2014-15 academic year: summer 2014 (201512) to spring 2015 (201542).

Figure 8. First-Time Students, Assessment for Course Placement: Headcount by College and Outreach Season

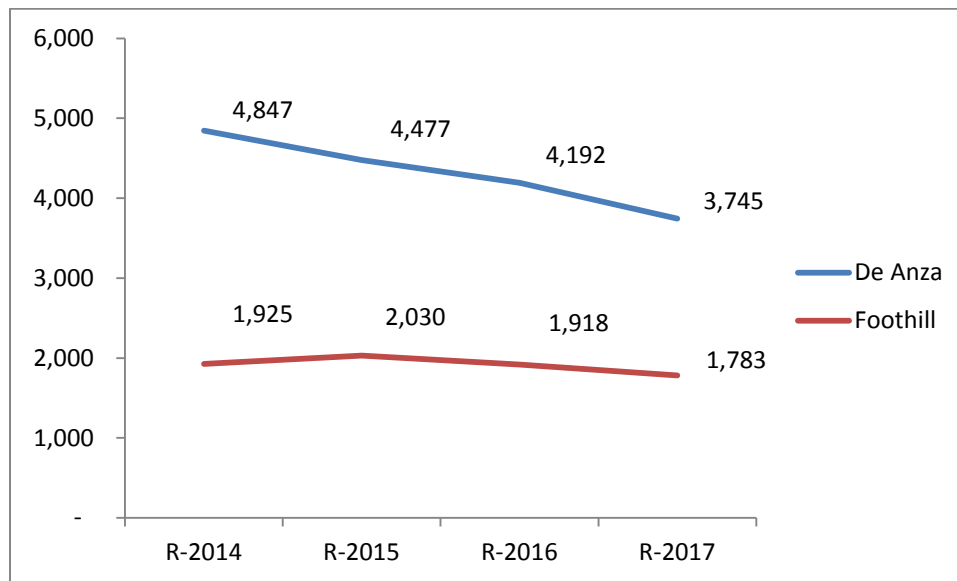


Table 9. De Anza College, First-Time Students, Assessment for Course Placement: Headcount by Outreach Season and Month

Month	Outreach Season				R-2014 to R-2017 Change	
	R-2014	R-2015	R-2016	R-2017	Count	Percent
March	193	241	299	180	(13)	-7%
April	935	782	436	505	(430)	-46%
May	785	619	737	594	(191)	-24%
June	832	914	822	781	(51)	-6%
July	786	745	626	590	(196)	-25%
August	1041	872	843	833	(208)	-20%
September	537	502	628	532	(5)	-1%
Total	4,847	4,477	4,192	3,745	(1,102)	-23%

Notes

Data for assessments approved by the CCCC for placement in English, ESL, math, or chemistry courses.

Data extract date: December 13, 2017.

Outreach Season: March to September of the calendar year.

First-Time students are those who registered any term of the academic year that followed the outreach season. For example, the headcount for the outreach season of R-2014 will only include students who took at least one of the approved assessments from March to September of 2014 and registered for the first time at the college any term of 2014-15 academic year: summer 2014 (201512) to spring 2015 (201542).

Figure 9. De Anza College, First-Time Students, Assessment for Course Placement: Headcount by Outreach Season and Month

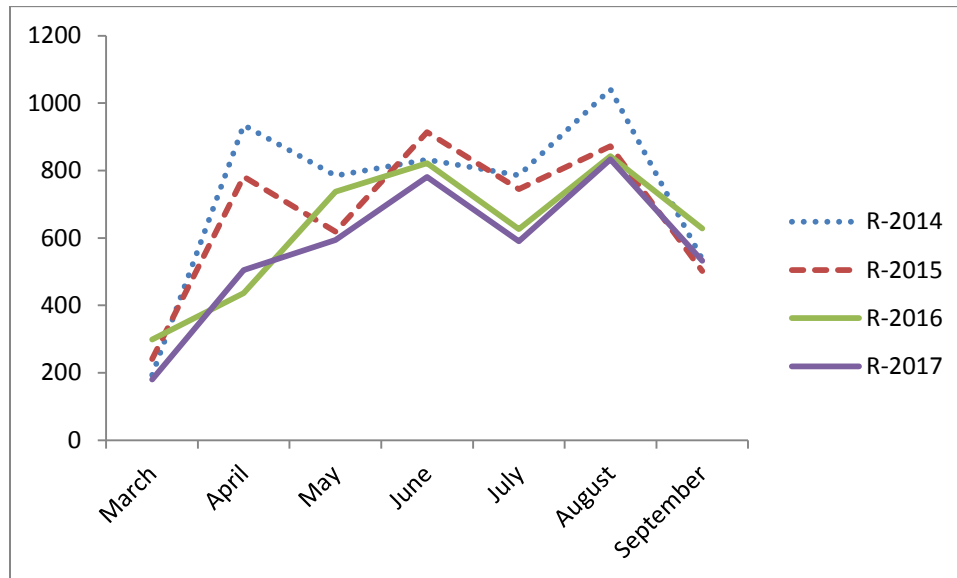


Table 10. Foothill College, First-Time Students, Assessment for Course Placement: Headcount by Outreach Season and Month

Month	Outreach Season				R-2014 to R-2017 Change	
	R-2014	R-2015	R-2016	R-2017	Count	Percent
March	18	25	33	15	(3)	-17%
April	124	142	93	55	(69)	-56%
May	362	334	254	214	(148)	-41%
June	333	392	451	516	183	55%
July	294	386	362	339	45	15%
August	601	676	677	402	(199)	-33%
September	520	526	454	575	55	11%
Total	1,925	2,030	1,918	1,783	(142)	-7%

Notes

Data for assessments approved by the CCCC for placement in English, ESL, math, or chemistry courses.

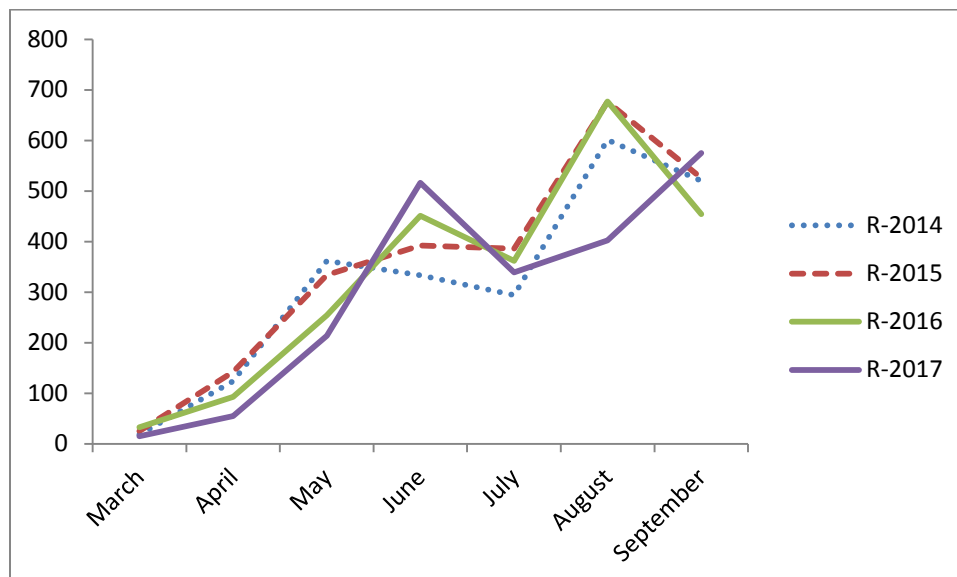
Data extract date: December 13, 2017.

Outreach Season: March to September of the calendar year.

First-Time students are those who registered any term of the academic year that followed the outreach season.

For example, the headcount for the outreach season of R-2014 will only include students who took at least one of the approved assessments from March to September of 2014 and registered for the first time at the college any term of 2014-15 academic year: summer 2014 (201512) to spring 2015 (201542).

Figure 10. Foothill College, First-Time Students, Assessment for Course Placement: Headcount by Outreach Season and Month



First-Time Students Characteristics

Research Question #5: Is there any significant trend specific to first-time students regarding their enrollment or demographics?

Regarding enrollment, data in Table 11 and Table 12 show the number of first-time students who took at least one placement test during each outreach season and the first term they registered during the following academic year at De Anza College and Foothill College, respectively. For De Anza, data in Table 11 and Figure 11 show a major drop in the headcount for those who first registered during the summer term between 2014 and 2017 (-49%; 2,069 to 1,051); headcounts for the other terms show no significant changes during the same period. Although not as significant, data for Foothill College in Table 12 also show a significant drop in the headcount for the summer term between 2014 and 2017 (-9%; 721 to 653).

Data in Table 13 to Table 22 show demographics (gender, age group, race/ethnic group, residency status, and high school graduation year) for first-time students who took at least one placement test during the outreach season by year and college. Besides identifying higher than expected changes in some groups, a key purpose for disaggregating the data was to assess the extent to which these students fit the profile of those targeted during the outreach season—recent high school graduates.

Data in Table 13 and Figure 13 show no significant changes related to gender at De Anza College: the decline in headcount for females was slightly higher (-24%) than that for males (-22%). For Foothill College results show the opposite: the decline in headcount for males (-9%) was higher than the one for females (-6%).

Regarding age group, data for De Anza College in Table 14 and Figure 14 show a significant decline (24%; 3,893 to 2,956) in the number of first-time students who were “19 or less,” when compared to the same group in 2014. The data also show a significant decline for students in the groups for “20 to 24” (27%; 514 to 377) and “25 to 29” (19%, 199 to 162). However, the decline in the “19 or less” had the most impact in the total number given that this group included about 80% of all first-timers who took at least one placement test during the outreach season at De Anza College in the last four years.

For Foothill College, data in Table 15 and Figure 15 show that the decline for the number of students 19 and younger was not as significant as it was for De Anza College. The data show that the number of first-time students “19 or less” that took at least one placement test during the outreach season declined

7% in 2017, when compared to the number for 2014 (1,379 to 1,278). The data also show that students in the “19 or less” group made about 71% of all first-timers who took at least one placement test during the outreach season at Foothill College in the last four years.

Regarding race/ethnicity, data for De Anza College in Table 16 and Figure 16 show a higher than expected decline (22%) in the number of Asian students in 2017, when compared to the number in 2014 (26%, 1,809 to 1,339). For Foothill College, data in Table 17 and Figure 17 show a significant decline for foreign/international first-time students during the same period (33%, 353 to 237). When taking into account both count and percentage change figures, none of the other race/ethnic groups show a significant change at either college.

Data for De Anza College in Table 18 and Figure 18 show that the decline in first-time students with placement test activity during the outreach season in the last four years is related to student residency status: the number for California residents declined 25% in 2017, when compared to the number in 2014 (4,072 to 3,062), while for foreign/international students, the decline was 17% (449 to 374); for out-of-state, the decline was 5% (325 to 308).

For Foothill College, data in Table 19 and Figure 19 show that the most significant decline related to residency status was for the international/foreign group: in the outreach season of 2017, the number of first-time, international students who took at least one placement declined by 33% (353 to 237), when compared to the number for 2014; for California residents, the decline between 2014 and 2017 was 8% (1,436 to 1,315). For out-of-state students, there was a significant increase of 73% (132 to 229) between the outreach seasons of 2014 and 2017.

For high school graduation year status (whether the student graduated from high school during the same year as for the outreach season), data in Table 20 and Figure 20 for De Anza College show that the number for recent high school graduates, first-time students who took at least one placement test during the outreach season declined by 27% (3,007 to 2,192) in 2017, when compared to the number in 2014. For Foothill College, data in Table 21 and Figure 21 show that the decline in the number of recent high school graduates was about 9%. The data also show that while at De Anza College recent high school graduate represent about 60% of all first-timers that take at least one placement test during the outreach season, at Foothill college this group represents about 45% of the total. Appendix A and Appendix B show headcounts for recent high school graduates with placement test activity during the outreach season by high school and academic year for De Anza and Foothill, respectively.

Table 11. De Anza College, First-Time Students, Assessment for Course Placement: Headcount by College, Outreach Season, and First Term Registered in Academic Year

Academic Term	Outreach Season				R-2014 to R-2017 Change	
	R-2014	R-2015	R-2016	R-2017	Count	Percent
1-Summer	2,069	1,688	1,284	1,051	(1,018)	-49%
2-Fall	2,592	2,597	2,740	2,607	15	1%
3-Winter	122	154	127			
4-Spring	64	38	41			
Total	4,847	4,477	4,192	3,745		

Notes

Data for assessments approved by the CCCC for placement in English, ESL, math, or chemistry courses.
Data extract date: December 13, 2017.

Outreach Season: March to September of the calendar year.

First-Time students are those who registered any term of the academic year that followed the outreach season.

For example, the headcount for the outreach season of R-2014 will only include students who took at least one of the approved assessments from March to September of 2014 and registered for the first time at the college any term of 2014-15 academic year: summer 2014 (201512) to spring 2015 (201542).

Figure 11. De Anza College, First-Time Students, Assessment for Course Placement: Headcount by College, Outreach Season, and First Term Registered in Academic Year

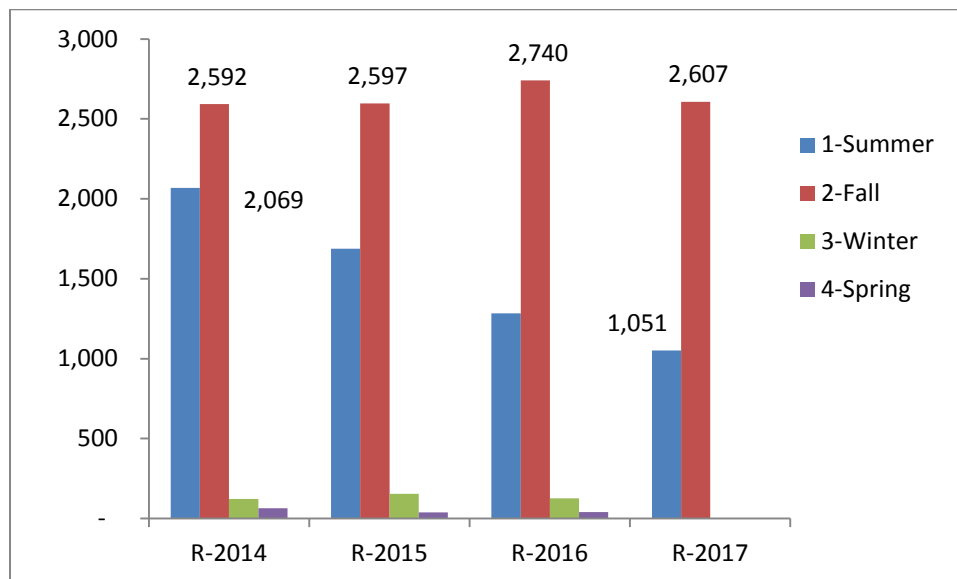


Table 12. Foothill College, First-Time Students, Assessment for Course Placement: Headcount by College, Outreach Season, and First Term Registered in Academic Year

Academic Term	Outreach Season				R-2014 to R-2017 Change	
	R-2014	R-2015	R-2016	R-2017	Count	Percent
1-Summer	721	815	646	653	(68)	-9%
2-Fall	1,110	1,131	1,177	1,100	(10)	-1%
3-Winter	72	67	72			
4-Spring	22	17	23			
Total	1,925	2,030	1,918	1,783		

Notes

Data for assessments approved by the California Community Colleges Chancellor's Office test inventory for placement in English, ESL, math, or chemistry courses.

Data extract date: December 13, 2017-- MIS SA (Student Assessment) Report.

Outreach Season: March to September of the calendar year.

First-Time students are those who registered any term of the academic year that followed the outreach season. For example, the headcount for the outreach season of R-2014 will only include students who took at least one of the approved assessments from March to September of 2014 and registered for the first time at the college any term of 2014-15 academic year: summer 2014 (201512) to spring 2015 (201542).

Figure 12. Foothill College, First-Time Students, Assessment for Course Placement: Headcount by College, Outreach Season, and First Term Registered in Academic Year

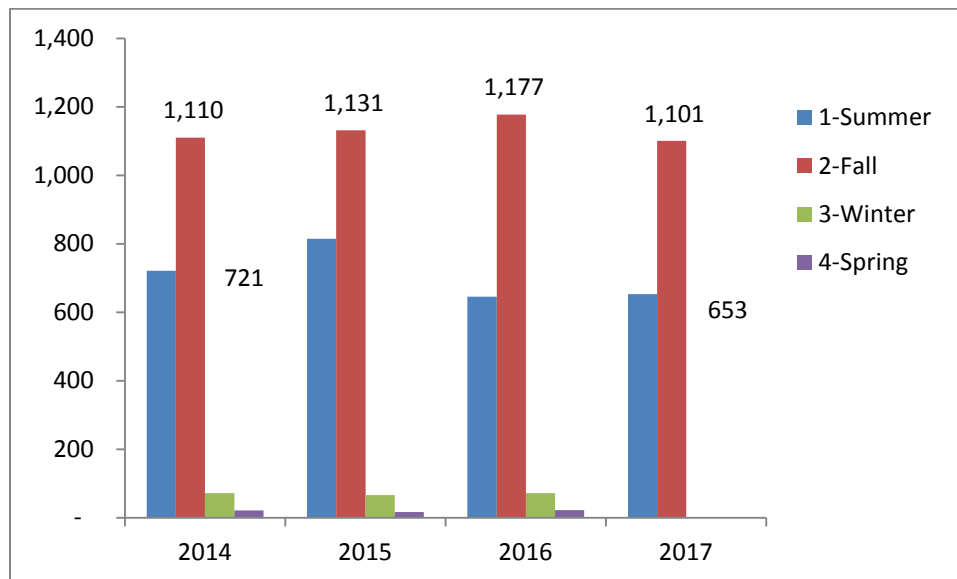


Table 13. First-Time Students, Assessment for Course Placement: Headcount by College, Outreach Season, and Gender

Gender	Outreach Season				R-2014 to R-2017 Change	
	R-2014	R-2015	R-2016	R-2017	Count	Percent
De Anza						
Female	2,286	2,110	1,983	1,737	(549)	-24%
Male	2,539	2,322	2,166	1,971	(568)	-22%
Not Reported	22	45	43	37	15	68%
Foothill						
Female	945	1020	1,001	884	(61)	-6%
Male	968	988	903	879	(89)	-9%
Not Reported	12	22	14	20	8	67%

Notes

Data for assessments approved by the CCCC for placement in English, ESL, math, or chemistry courses.

Data extract date: December 13, 2017.

Outreach Season: March to September of the calendar year.

First-Time students are those who registered any term of the academic year that followed the outreach season.

For example, the headcount for the outreach season of R-2014 will only include students who took at least one of the approved assessments from March to September of 2014 and registered for the first time at the college any term of 2014-15 academic year: summer 2014 (201512) to spring 2015 (201542).

Figure 13. First-Time Students, Assessment for Course Placement: Headcount by College, Outreach Season, and Gender

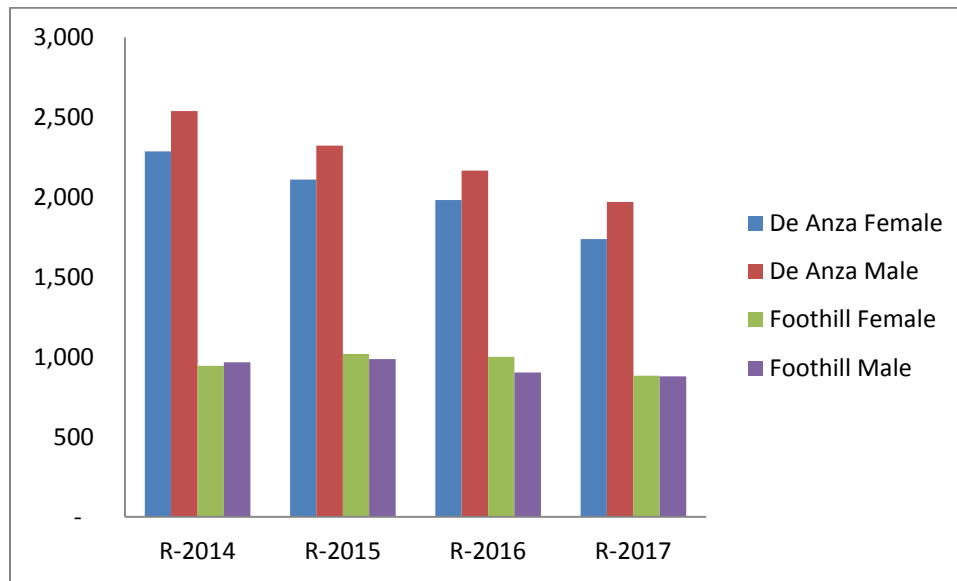


Table 14. De Anza College, First-Time Students, Assessment for Course Placement: Headcount by College, Outreach Season, and Age Group

Age Group	Outreach Season				R-2014 to R-2017 Change	
	R-2014	R-2015	R-2016	R-2017	Count	Percent
19 or Less	3,893	3,646	3,320	2,966	(927)	-24%
20 to 24	514	441	426	383	(131)	-25%
25 to 29	199	144	193	163	(36)	-18%
30 to 34	100	95	89	97	(3)	-3%
35 to 39	57	63	71	62	5	9%
40 to 44	35	41	44	33	(2)	-6%
45 to 49	23	23	23	24	1	4%
50 or more	26	24	26	17	(9)	-35%

Notes

Data for assessments approved by the CCCCO for placement in English, ESL, math, or chemistry courses.
Data extract date: December 13, 2017.

Outreach Season: March to September of the calendar year.

First-Time students are those who registered any term of the academic year that followed the outreach season.

For example, the headcount for the outreach season of R-2014 will only include students who took at least one of the approved assessments from March to September of 2014 and registered for the first time at the college any term of 2014-15 academic year: summer 2014 (201512) to spring 2015 (201542).

Figure 14. De Anza College, First-Time Students, Assessment for Course Placement: Headcount by College, Outreach Season, and Age Group

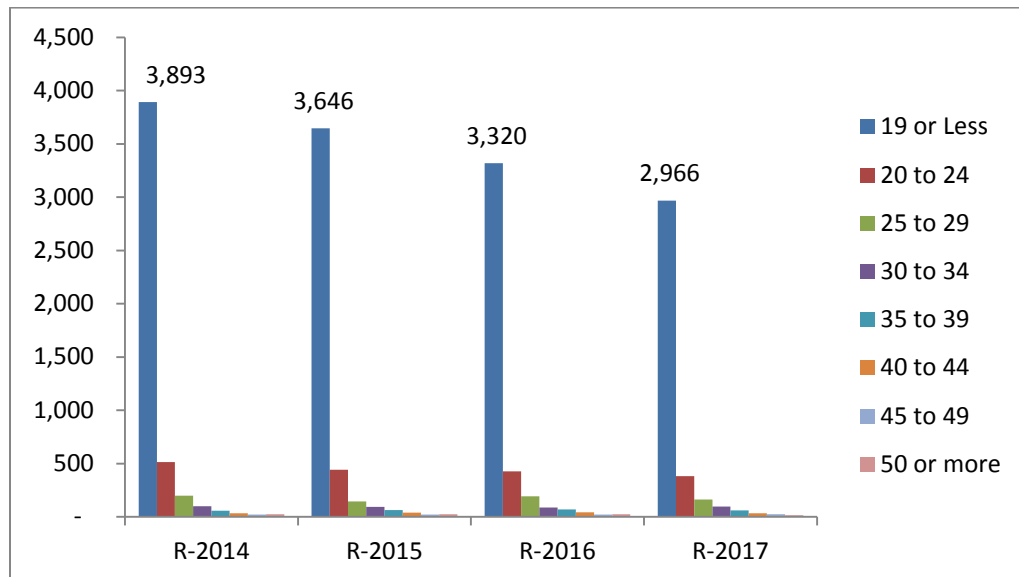


Table 15. Foothill College, First-Time Students, Assessment for Course Placement: Headcount by College, Outreach Season, and Age Group

Age Group	Outreach Season				R-2014 to R-2017 Change	
	R-2014	R-2015	R-2016	R-2017	Count	Percent
19 or Less	1,379	1,445	1,370	1,281	(98)	-7%
20 to 24	283	303	296	241	(42)	-15%
25 to 29	112	123	121	122	10	9%
30 to 34	59	72	50	52	(7)	-12%
35 to 39	39	27	29	39	-	0%
40 to 44	27	29	26	18	(9)	-33%
45 to 49	16	17	13	17	1	6%
50 or more	10	14	13	13	3	30%

Notes

Data for assessments approved by the CCCCO for placement in English, ESL, math, or chemistry courses.
Data extract date: December 13, 2017.

Outreach Season: March to September of the calendar year.

First-Time students are those who registered any term of the academic year that followed the outreach season.

For example, the headcount for the outreach season of R-2014 will only include students who took at least one of the approved assessments from March to September of 2014 and registered for the first time at the college any term of 2014-15 academic year: summer 2014 (201512) to spring 2015 (201542).

Figure 15. Foothill College, First-Time Students, Assessment for Course Placement: Headcount by College, Outreach Season, and Age Group

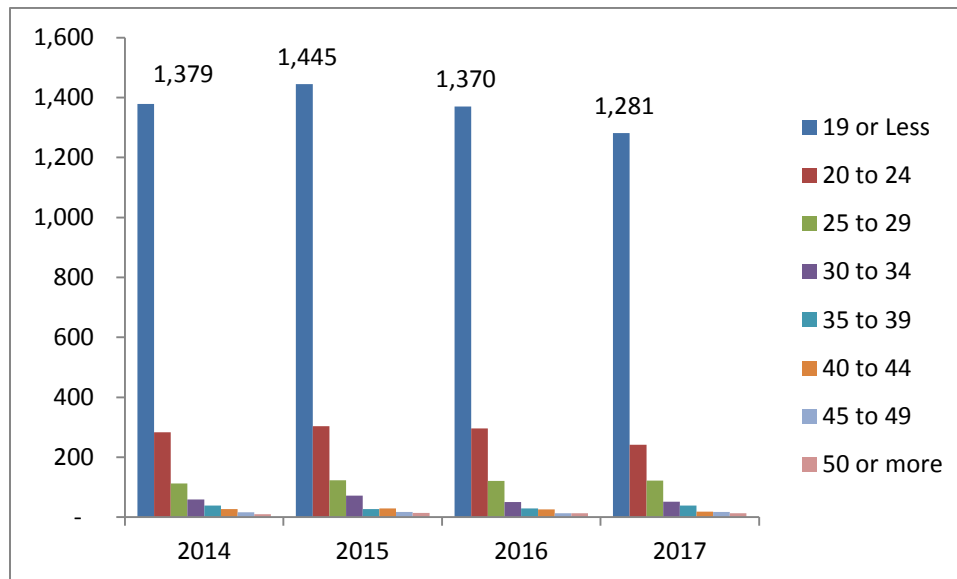


Table 16. De Anza College, First-Time Students, Assessment for Course Placement: Headcount by College, Outreach Season, and Race/Ethnic Group

Race/Ethnic Group	Outreach Season				R-2014 to R-2017 Change	
	R-2014	R-2015	R-2016	R-2017	Count	Percent
African Amer-Black	135	131	125	102	(33)	-24%
Amer Ind-Alask Nat	5	3	5	2	(3)	-60%
Asian	1,809	1,661	1,588	1,339	(470)	-26%
Hispanic	1,479	1,359	1,278	1,145	(334)	-23%
Pac Islander	19	14	19	26	7	37%
Not Reported	30	35	16	14	(16)	-53%
White	710	625	603	561	(149)	-21%
Multiple Races	206	200	196	176	(30)	-15%
International/Foreign	449	440	357	374	(75)	-17%
Unreported	35	44	21	20	(15)	-43%

Notes

Data for assessments approved by the CCCC for placement in English, ESL, math, or chemistry courses.
Data extract date: December 13, 2017.

Outreach Season: March to September of the calendar year.

First-Time students are those who registered any term of the academic year that followed the outreach season. For example, the headcount for the outreach season of R-2014 will only include students who took at least one of the approved assessments from March to September of 2014 and registered for the first time at the college any term of 2014-15 academic year: summer 2014 (201512) to spring 2015 (201542).

Figure 16. De Anza College, First-Time Students, Assessment for Course Placement: Headcount by College, Outreach Season, and Race/Ethnic Group

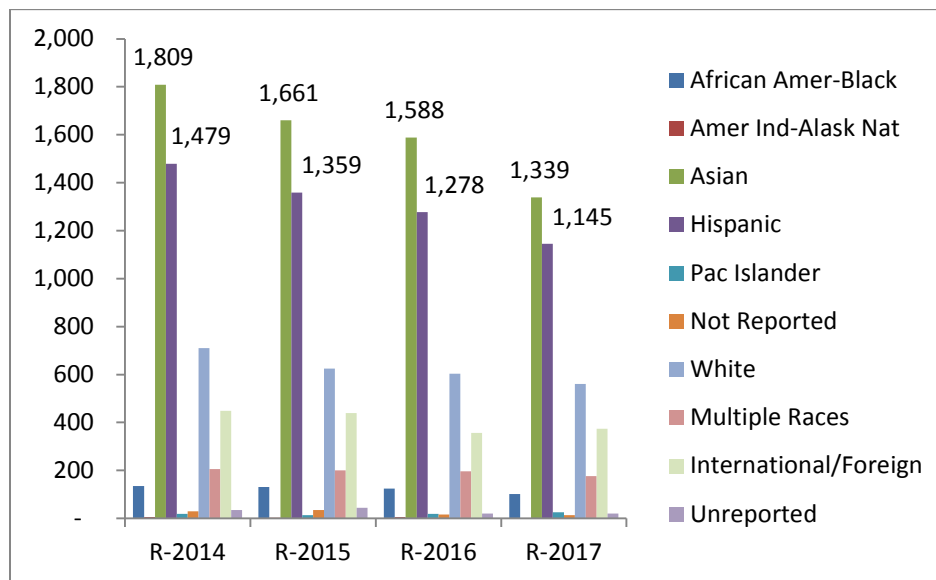


Table 17. Foothill College, First-Time Students, Assessment for Course Placement: Headcount by College, Outreach Season, and Race/Ethnic Group

Race/Ethnic Group	Outreach Season				R-2014 to R-2017 Change	
	R-2014	R-2015	R-2016	R-2017	Count	Percent
African Amer-Black	49	46	45	50	1	2%
Amer Ind-Alask Nat	-	1	2	-	-	-
Asian	427	492	446	411	(16)	-4%
Hispanic	514	581	575	550	36	7%
Pac Islander	18	24	27	16	(2)	-11%
White	446	454	448	408	(38)	-9%
Multiple Races	101	107	101	97	(4)	-4%
International/Foreign	353	309	262	237	(116)	-33%
Not Reported	17	16	12	14	(3)	-18%

Notes

Data for assessments approved by the CCCCO for placement in English, ESL, math, or chemistry courses.

Data extract date: December 13, 2017.

Outreach Season: March to September of the calendar year.

First-Time students are those who registered any term of the academic year that followed the outreach season.

For example, the headcount for the outreach season of R-2014 will only include students who took at least one of the approved assessments from March to September of 2014 and registered for the first time at the college any term of 2014-15 academic year: summer 2014 (201512) to spring 2015 (201542).

Figure 17. Foothill College, First-Time Students, Assessment for Course Placement: Headcount by College, Outreach Season, and Race/Ethnic Group

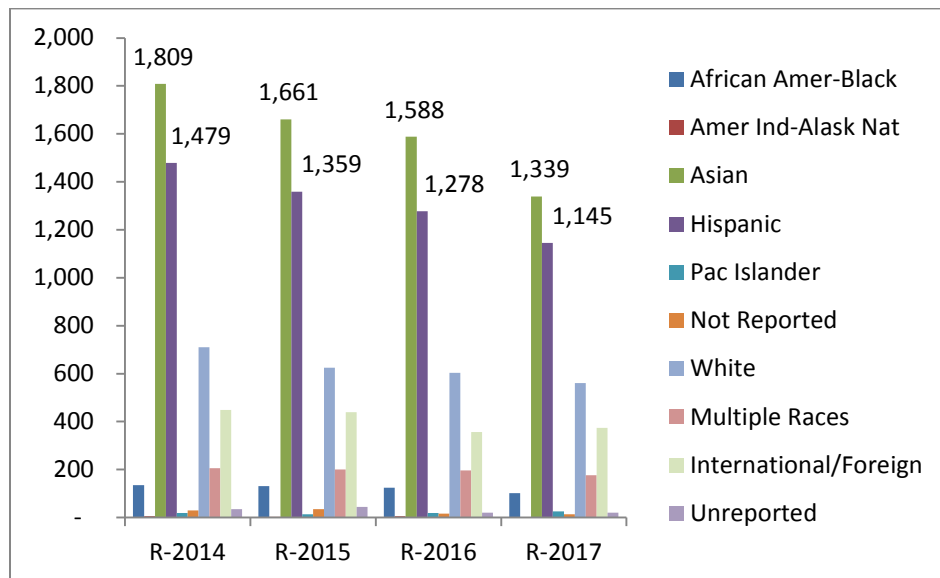


Table 18. De Anza College, First-Time Students, Assessment for Course Placement: Headcount by College, Outreach Season, and Residency Status

Residency Status	Outreach Season				R-2014 to R-2017 Change	
	R-2014	R-2015	R-2016	R-2017	Count	Percent
California Resident	4,072	3,733	3,475	3,062	(1,010)	-25%
International/Foreign	449	440	357	374	(75)	-17%
Out-of-State	325	304	360	308	(17)	-5%
Not Reported	1	-	-	1	-	0%

Notes

Data for assessments approved by the CCCCO for placement in English, ESL, math, or chemistry courses.
Data extract date: December 13, 2017.

Outreach Season: March to September of the calendar year.

First-Time students are those who registered any term of the academic year that followed the outreach season.

For example, the headcount for the outreach season of R-2014 will only include students who took at least one of the approved assessments from March to September of 2014 and registered for the first time at the college any term of 2014-15 academic year: summer 2014 (201512) to spring 2015 (201542).

Figure 18. De Anza College, First-Time Students, Assessment for Course Placement: Headcount by College, Outreach Season, and Residency Status

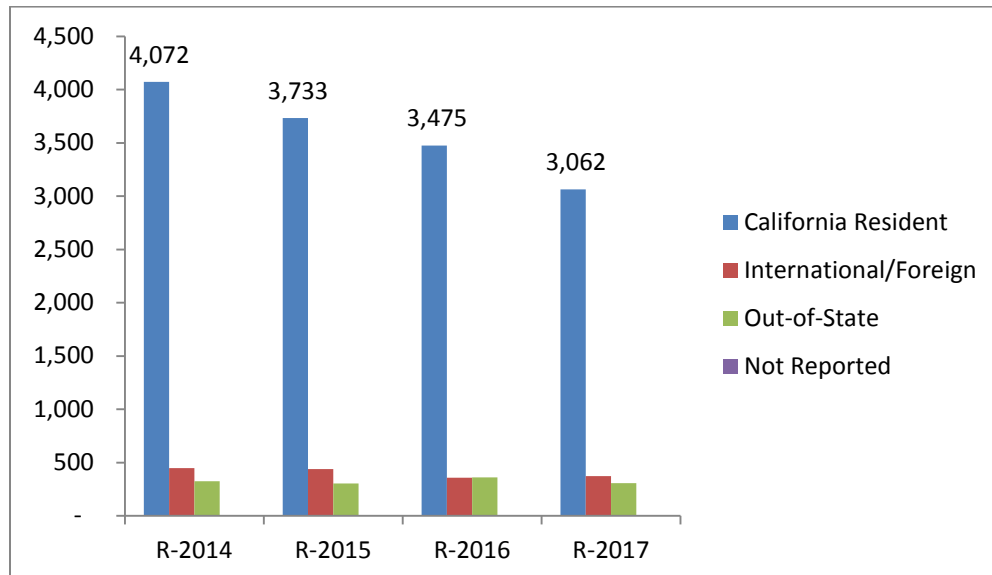


Table 19. Foothill College, First-Time Students, Assessment for Course Placement: Headcount by College, Outreach Season, and Residency Status

Residency Status	Outreach Season				R-2014 to R-2017 Change	
	R-2014	R-2015	R-2016	R-2017	Count	Percent
California Resident	1,436	1,543	1,498	1,315	(121)	-8%
International/Foreign	353	309	262	237	(116)	-33%
Out-of-State	132	170	157	229	97	73%
Not Reported	4	8	1	2	(2)	-50%

Notes

Data for assessments approved by the CCCCO for placement in English, ESL, math, or chemistry courses.
Data extract date: December 13, 2017.

Outreach Season: March to September of the calendar year.

First-Time students are those who registered any term of the academic year that followed the outreach season. For example, the headcount for the outreach season of R-2014 will only include students who took at least one of the approved assessments from March to September of 2014 and registered for the first time at the college any term of 2014-15 academic year: summer 2014 (201512) to spring 2015 (201542).

Figure 19. Foothill College, First-Time Students, Assessment for Course Placement: Headcount by College, Outreach Season, and Residency Status

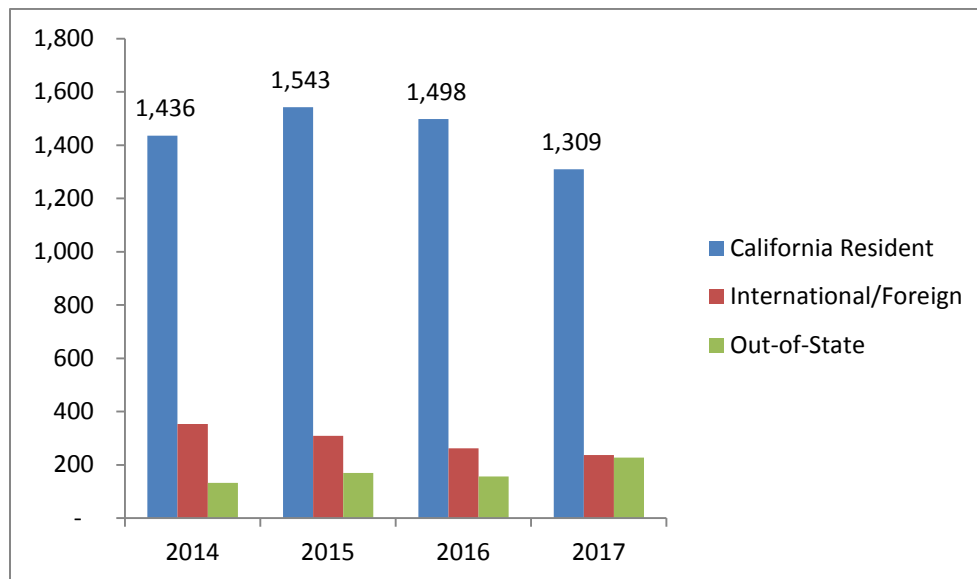


Table 20. De Anza College, First-Time Students, Assessment for Course Placement: Headcount by College, Outreach Season, and High School Graduation Year Status

High School Graduation Year Status	Outreach Season				R-2014 to R-2017 Change	
	R-2014	R-2015	R-2016	R-2017	Count	Percent
Recent HS Grad	3,007	2,832	2,615	2,192	(815)	-27%
Other	1,840	1,645	1,577	1,553	(287)	-16%

Notes

Data for assessments approved by the CCCC for placement in English, ESL, math, or chemistry courses.
Data extract date: December 13, 2017.

Outreach Season: March to September of the calendar year.

First-Time students are those who registered any term of the academic year that followed the outreach season. For example, the headcount for the outreach season of R-2014 will only include students who took at least one of the approved assessments from March to September of 2014 and registered for the first time at the college any term of 2014-15 academic year: summer 2014 (201512) to spring 2015 (201542).

Recent HS Grad: Students graduated from high school the same year as of the outreach season.

Other: Students graduated from high school in a prior year or do not have high school graduation date reported in the information system.

Figure 20. De Anza College, First-Time Students, Assessment for Course Placement: Headcount by College, Outreach Season, and High School Graduation Year Status

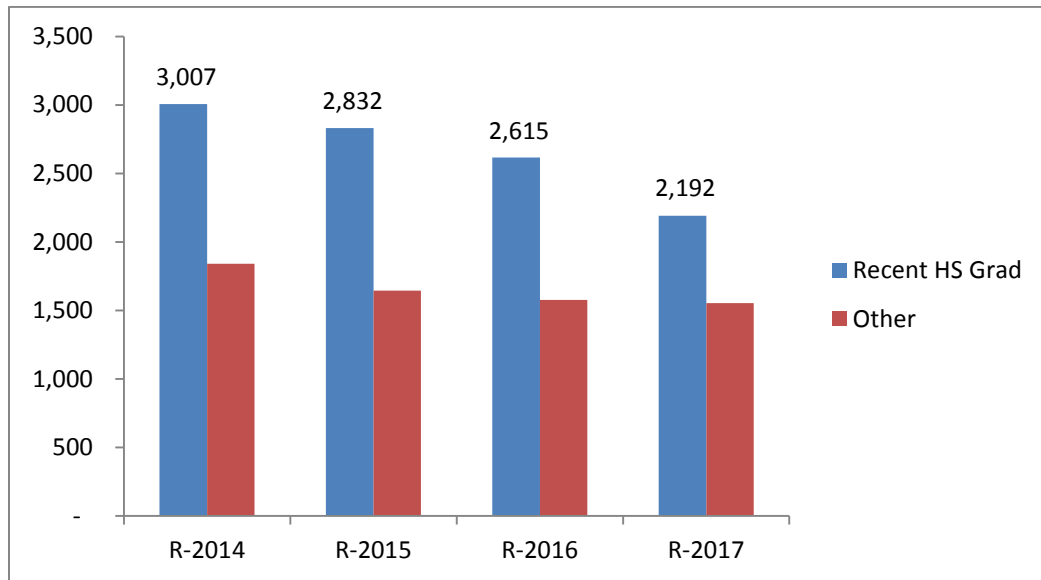


Table 21. Foothill College, First-Time Students, Assessment for Course Placement: Headcount by College, Outreach Season, and High School Graduation Year Status

High School Graduation Year Status	Outreach Season				R-2014 to R-2017 Change	
	R-2014	R-2015	R-2016	R-2017	Count	Percent
Recent HS Grad	878	893	861	802	(76)	-9%
Other	1,047	1,137	1,057	981	(66)	-6%

Notes

Data for assessments approved by the CCCC for placement in English, ESL, math, or chemistry courses.

Data extract date: December 13, 2017.

Outreach Season: March to September of the calendar year.

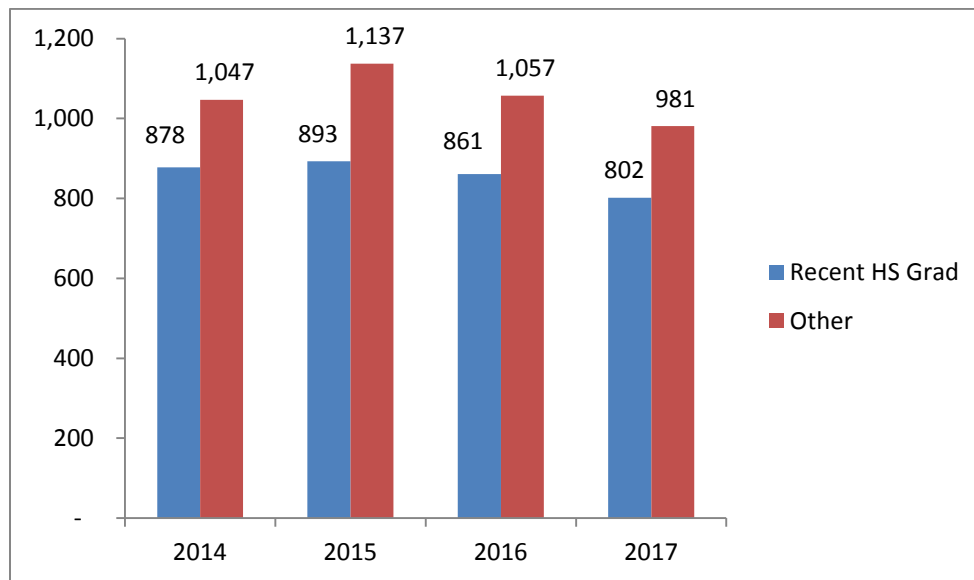
First-Time students are those who registered any term of the academic year that followed the outreach season.

For example, the headcount for the outreach season of R-2014 will only include students who took at least one of the approved assessments from March to September of 2014 and registered for the first time at the college any term of 2014-15 academic year: summer 2014 (201512) to spring 2015 (201542).

Recent HS Grad: Students graduated from high school the same year as of the outreach season.

Other: Students graduated from high school in a prior year or do not have high school graduation date reported in the information system.

Figure 21. Foothill College, First-Time Students, Assessment for Course Placement: Headcount by College, Outreach Season, and High School Graduation Year Status



Recent High School Graduate Placement Testing and Enrollment

Research Question #6: To what extent is the number of recent high school graduates who take at least one placement test during an outreach season related to the total number of recent high school graduates who registered during the summer or fall term of the following academic year?

Changes in the headcount for recent high school graduates who take at least one placement test during the outreach season are significantly related or can predict changes in the headcount of recent high school graduates who register during the summer or fall term of the following academic year. Data in Table 22 and Figure 22 show that between the academic years of 2014-15 and 2017-18 the number of recent high school graduates who enrolled at De Anza College in the summer or fall term declined by 25%; this figure correlates to the decline in the number of recent high school graduates who took at least one placement test between the outreach seasons of 2014 and 2017, 27%, as shown in Table 20. Data in Table 22 also show that during the last four years the decline in the number of recent high school graduates who enrolled in the summer or fall (- 25%) more than doubled the decline for other students at the college (-10%).

For Foothill College, the results are similar: the number of recent high school graduates who registered in the summer or fall term declined by 11% in 2017-18, when compared to the number in 2014-15. This figure correlates with a decline of 9% for the same period for the number of these students who took at least one placement test during the prior outreach season, as shown in Table 21. Data in Table 22 also show that while the number of high school graduates declined significantly during this period, the total number of students enrolled in credit courses increased by 2%.

With respect to the impact that changes in the number of recent high school graduates may have on total attendance or student workload, as measured by the number of attempted credits hours, data in Table 23 show that the impact of these changes could be significant. The data show that by the end of the fall term, recent high school graduates have on average a cumulative credit load of four units higher (more than 30%) than that for other students. Thus, significant changes in the number of recent high school graduate who take at least one placement test during the outreach season will likely result in similar changes in the number of these who register in the following academic year, which will impact total attendance or student workload.

Table 22. Student Headcount for California Residents Enrolled in the Summer or Fall Term by College, Academic Year and High School Graduation Year Status

High School Graduation Year Status	Academic Year (Summer & Fall)				2013-14 to 2017-18 Change	
	2014-15	2015-16	2016-17	2017-18	Count	Percent
De Anza College						
Recent HS Grad	3,359	3,198	2,899	2,531	(828)	-25%
Other	20,387	18,973	18,708	18,382	(2,005)	-10%
Total	23,746	22,171	21,607	20,913	(2,833)	-12%
Recent HS Grad Percent	14%	14%	13%	12%		
Foothill College						
Recent HS Grad	1,256	1,207	1,117	1,123	(133)	-11%
Other	17,274	17,533	17,883	17,022	(252)	-1%
Total	18,530	18,740	19,000	18,145	(385)	-2%
Recent HS Grad Percent	7%	6%	6%	6%		

Notes

Data for students enrolled in at least one credit course by census date in the summer or fall term of the academic year. Data extracted on December 14, 2017.

Recent HS Grad: Student who graduated from high school the same calendar year as the one for the beginning of the academic year.

Figure 22. Student Headcount for California Residents Enrolled in the Summer or Fall Term by College, Academic Year and High School Graduation Year Status

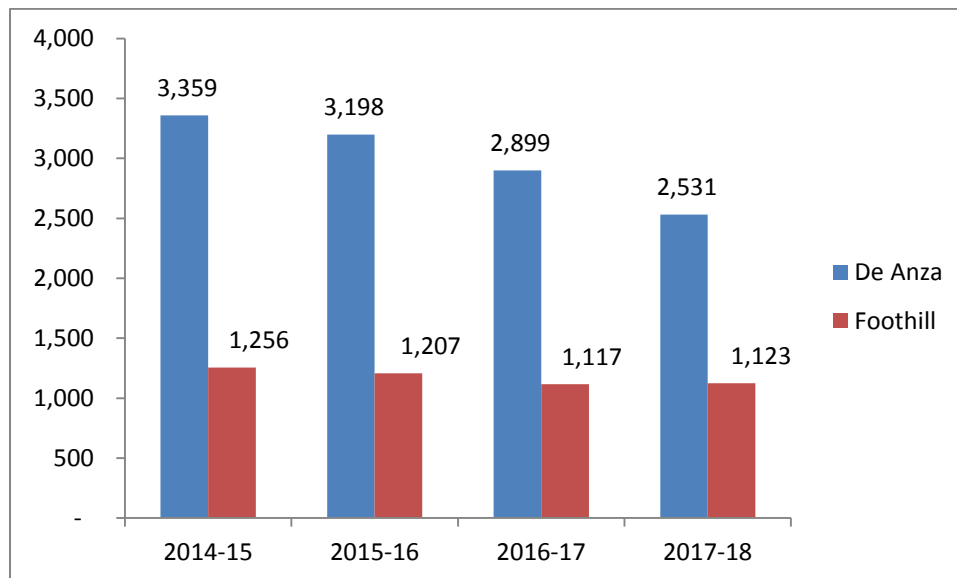


Table 23. Average Number of Credit Units for California Residents Enrolled in the Summer or Fall Term by College, Academic Year and High School Graduation Year Status

Academic Year	Recent HS Grad			Other		
	Count	Total Credit Units	Average Credit Units	Count	Total Credit Units	Average Credit Units
De Anza						
2014-15	3,359	46,032	13.70	20,387	213,009	10.45
2015-16	3,198	44,476	13.91	18,973	201,941	10.64
2016-17	2,899	39,955	13.78	18,708	202,382	10.82
2017-18	2,531	36,016	14.23	18,382	195,924	10.66
Foothill						
2014-15	1,256	16,417	13.07	17,274	155,156	8.98
2015-16	1,207	15,696	13.00	17,533	158,695	9.05
2016-17	1,117	14,212	12.72	17,883	157,430	8.80
2017-18	1,123	14,511	12.92	17,022	147,263	8.65

Notes

Data for students enrolled in at least one credit course by census date in the summer or fall term of the academic year. Data extracted on December 14, 2017.

Recent HS Grad: Student who graduated from high school the same calendar year as the one for the beginning of the academic year.

Recommendations

The main goal of exploratory studies is to provide guidance on further research or evaluation projects. Based on the results of this study, it is recommended that the Student Services divisions at De Anza College and Foothill College conduct a thorough evaluation of the following:

- Effectiveness of outreach activities that target high schools seniors, including placement test related activities.
- The impact that changes in the summer course schedule may have had on motivating first-time students to register during this term and continue in the fall, with special emphasis on courses that provide orientation or counseling services.
- Impact of registration priority changes during the last years and their impact on promoting passive or less competitive outreach activities.
- Specific to De Anza College: Events in 2014 and 2015 that were no longer in place in 2016 and 2017 and that may explain significant declines in headcounts for the months of April and May, as shown in Table 5 and Figure 5.
- Specific to Foothill College: Assess historically low headcounts for recent high school graduates who enroll; in particular, assess whether headcount increases are limited by “environmental” constraints (e.g., limited number of prospective students from feeder high school districts) versus the continuous use of ineffective marketing or outreach strategies.

Appendix A

De Anza College, First-Time Students, Assessment for Course Placement: Headcount by Outreach Season and High School

High School	District	Recruitment Season				2014 to 2017 Change	
		2014	2015	2016	2017	Count	Percent
Cupertino High	Fremont Union High	149	121	120	140	-9	-6%
Fremont High	Fremont Union High	149	120	121	119	-30	-20%
Homestead High	Fremont Union High	142	131	107	104	-38	-27%
Independence High	East Side Union High	194	152	116	100	-94	-48%
Evergreen Valley High	East Side Union High	125	126	127	96	-29	-23%
Milpitas High	Milpitas Unified	128	151	124	93	-35	-27%
Silver Creek High	East Side Union High	128	133	101	84	-44	-34%
Abraham Lincoln High	San Jose Unified	113	91	82	83	-30	-27%
Monta Vista High	Fremont Union High	97	108	87	82	-15	-15%
Pioneer High	San Jose Unified	80	46	73	74	-6	-8%
Piedmont Hills High	East Side Union High	118	132	89	71	-47	-40%
Santa Clara High	Santa Clara Unified	119	82	99	67	-52	-44%
Andrew P. Hill High	East Side Union High	116	121	71	62	-54	-47%
Yerba Buena High	East Side Union High	67	72	63	61	-6	-9%
Prospect High	Campbell Union High	59	49	61	61	2	3%
Lynbrook High	Fremont Union High	70	52	60	59	-11	-16%
Westmont High	Campbell Union High	66	68	47	55	-11	-17%
Oak Grove High	East Side Union High	105	96	66	54	-51	-49%
Gunderson High	San Jose Unified	57	57	54	54	-3	-5%
Willow Glen High	San Jose Unified	73	67	78	53	-20	-27%
Santa Teresa High	East Side Union High	88	95	73	52	-36	-41%
Leigh High	Campbell Union High	58	57	47	52	-6	-10%
Adrian Wilcox High	Santa Clara Unified	81	90	84	50	-31	-38%
Del Mar High	Campbell Union High	38	58	52	50	12	32%
Leland High	San Jose Unified	62	34	56	38	-24	-39%
William C. Overfelt High	East Side Union High	45	54	58	37	-8	-18%
San Jose High	San Jose Unified	44	28	34	35	-9	-20%
Branham High	Campbell Union High	62	56	44	34	-28	-45%

De Anza College, First-Time Students, Assessment for Course Placement: Headcount by Outreach Season and High School

High School	District	Recruitment Season				2014 to 2017 Change	
		2014	2015	2016	2017	Count	Percent
Mt. Pleasant High	East Side Union High	67	67	59	32	-35	-52%
Saratoga High	Los Gatos-Saratoga Joint Union High	38	29	26	30	-8	-21%
Ann Sobrato High	Morgan Hill Unified	44	31	27	28	-16	-36%
Los Gatos High	Los Gatos-Saratoga Joint Union High	31	26	17	28	-3	-10%
James Lick High	East Side Union High	52	38	42	26	-26	-50%
Mountain View High	Mountain View-Los Altos Union High	24	30	29	17	-7	-29%

Notes

Data only include high schools in the Santa Clara or San Mateo county for which there were at least 99 students with placement test activity during outreach season.

Appendix B

Foothill College, First-Time Students, Assessment for Course Placement: Headcount by Outreach Season and High School

High School	District	Recruitment Season				2014 to 2017 Change	
		2014	2015	2016	2017	Count	Percent
Los Altos High	Mountain View-Los Altos Union High	84	88	106	89	5	6%
Mountain View High	Mountain View-Los Altos Union High	85	79	84	83	-2	-2%
Henry M. Gunn High	Palo Alto Unified	76	74	61	50	-26	-34%
Palo Alto High	Palo Alto Unified	67	66	57	50	-17	-25%
Menlo-Atherton High	Sequoia Union High	51	33	29	39	-12	-24%
Woodside High	Sequoia Union High	50	34	45	39	-11	-22%
Fremont High	Fremont Union High	28	29	38	34	6	21%
Homestead High	Fremont Union High	36	40	61	32	-4	-11%
Milpitas High	Milpitas Unified	16	33	32	32	16	100%
Sequoia High	Sequoia Union High	25	23	36	31	6	24%
Evergreen Valley High	East Side Union High	27	42	28	23	-4	-15%
Piedmont Hills High	East Side Union High	39	23	33	20	-19	-49%

Notes

Data only include high schools in the Santa Clara or San Mateo county for which there were at least 99 students with placement test activity during outreach season.