

Disproportionate Impact Study of MATH Placement Test

This disproportionate impact study was conducted in accordance with Title 5 and Matriculation regulations to monitor whether the use of the MATH placement test unfairly places any particular group by ethnicity, gender, age, or disability of the tested population into lower level math remedial courses. To assess the extent of disproportionate impact, the recommended 80% guideline established by the EEOC's *Uniform Guidelines for Selection Procedures* was adopted. The following sections present the demographic description of Mt. San Antonio College MATH tested students, the placement by MATH, the assessment of disproportionate impact, and the success rates of students in placed courses.

It has been recommended to collect data on the Disproportionate Impact of a placement test within the most recent three year period prior the submission of requesting renewal approval. A total of 21,247 students who took the MATH placement test between 09/10/2003 (date of main cut scores change) to 08/28/2006 (before Fall semester 2006) and their initial test scores and placements were used for this Disproportionate Impact study. The ethnic background of these tested students is compared with that of the general credit enrollment of Fall 2006. The table below shows some differences in the percentage breakdown on several ethnic groups between these two populations. Comparing to the general enrollment percentages, higher percentage of Latino and African American students and lower percentage of Asian and White students had chosen to take the MATH placement test during our study period.

Comparison of MATH Testers and General Enrollment by Ethnicity	MTSAC MATH Tested (9/10/2003– 8/28/2006)		MTSAC Fall 2006 Credit Enrollment	
	Count	Percent	Count	Percent
African American/Non-Hispanic	1,811	8.52%	1,420	5.8%
American Indian/Alaskan Native	99	0.47%	110	0.4%
Asian	1,822	8.58%	4,740	19.2%
Declined to State	416	1.96%	203	0.8%
Filipino	954	4.49%	1,420	5.8%
Latino	1,1776	55.42%	10,949	44.5%
Other Non-White	579	2.73%	680	2.8%
Pacific Islander	141	0.66%	179	0.7%
Unknown	76	0.36%	134	0.5%
White	3573	16.82%	4,790	19.5%
Grand Total	2,1247	100.00%	24,625	100.0%

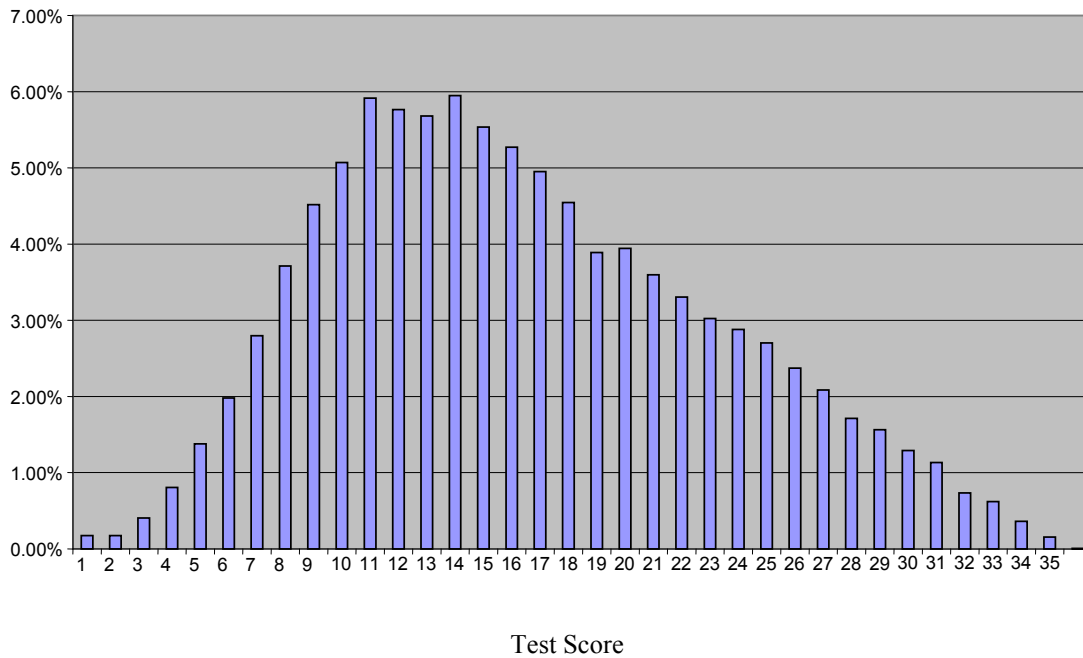
Majority of students who took the MATH Placement Test were placed into either LERN49 or MATH50.

Course Eligibility	Test Cut Scores	Course Title	Student Count	Percent
LERN48	<=8.00	Basic Math Skills Review	2,429	11.43%
LERN49	9.00 - 17.00	MATH Skills Review	10,337	48.65%
MATH50	18.00 - 26.00	Pre-Algebra	6,424	30.23%
MATH51	27.00 - 35.00	Elementary Algebra	2,057	9.68%
		Total	21,247	100.00%

Beginning October 10, 2004, students who scored at the border line for the lower three placement courses have the option to move up one placement if they can provide additional information for multiple measures. For example, students who scored at 16 or 17 in the LERN49 placement and students who scored at 25 or 26 in the MATH50 placement are eligible to place into the next higher course given additional information is provided.

Test Score Distribution

MATH Test Scores (9/10/2003 to 8/28/2006) Distribution



MATH Test Mean Scores by Ethnicity, Age Group, Gender, and Disability

MATH Test is the lowest available test that covers general pre-Algebra materials in high school. The following tables compare the MATH tested students' Mean test scores by ethnicity, age group, gender and disability. As evidenced from the tables, there is more variation in mean scores within ethnicity and disability than within age groups and gender. For example, White students have the highest mean test score, followed by Native Americans. African American, Asian, Pacific Islander, and Latino groups all have lower than average mean scores. Similarly, students with no disability have a much higher mean test score than students who have a disability.

Test Mean Scores and Standard Deviation

MATH Test Score by Ethnicity	Count	Percent	Mean	Standard Deviation
African American/Non-Hispanic	1,811	8.52%	14.06	6.22
American Indian/Alaskan Native	99	0.47%	15.40	6.94
Asian	1,822	8.58%	21.29	7.60
Declined to State	416	1.96%	16.45	7.09
Filipino	954	4.49%	18.74	6.91
Hispanic	11,776	55.42%	15.38	6.34
Other Non-White	579	2.73%	16.60	6.94
Pacific Islander	141	0.66%	15.95	6.70
Unknown	76	0.36%	15.83	7.28
White	3,573	16.82%	18.04	6.79
Grand Total	21,247	100.00%	16.43	6.87

MATH Test Score by Gender	Count	Percent	Mean	Standard Deviation
Female	11,217	52.79%	15.63	6.77
Male	10,005	47.09%	17.33	6.88
Unknown	25	0.12%	16.84	8.85
Grand Total	21,247	100.00%	16.43	6.87

MATH Test Score by Disability	Count	Percent	Mean	Standard Deviation
No Disability	20,514	96.55%	16.56	6.86
With Disability	733	3.45%	12.72	6.18
Grand Total	21,247	100.00%	16.43	6.87

MATH Test Score by Age	Count	Percent	Mean	Standard
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Group				Deviation
Under 20	11,582	54.51%	17.43	6.65
20-24	4,951	23.30%	15.94	6.81
25-29	1,851	8.71%	14.95	6.93
30-39	1,684	7.93%	14.52	6.86
40-49	855	4.02%	13.37	7.13
50 and Over	287	1.35%	14.51	7.59
Unknown	37	0.17%	16.51	6.72
Grand Total	21,247	100.00%	16.43	6.87

Assessment of Disproportionate Impact

The MATH placement test is used to place tested students into four different levels of math developmental courses (LERN48, LERN49, MATH50, and Math51) based on their test scores.

Effective Date	Score Range	Placement Code	Course Eligibility
From 10/05/2004	<=6.00	ZMSG27	LERN48
	7.00 - 8.00	ZMSG27 TMM01	LERN48 MM
	9.00 - 15.00	MA02	LERN49
	16.00 - 17.00	MA02 MTMM01	LERN49 MM
	18.00 - 24.00	MA16	MATH50
	25.00 - 26.00	MA16 MTMM01	MATH50 MM
	27.00 - 35.00	MA18	MATH51
From 09/10/2003 to 10/04/2004	<=8.00	ZMSG27	LERN48
	9.00 - 17.00	MA02	LERN49
	18.00 - 26.00	MA16	MATH50
	27.00 - 35.00	MA18	MATH51
From 07/01/2000 to 09/09/2003	<=12.00	MA02	LERN49 (LERN 86)
	13.0 - 22.0	MA16	MATH50
	23.00- 35.00	MA18	MATH51

Test Score Range	Course Eligibility	Description	Level
8 and below	LERN48	Basic Math Skills Review	Pre-collegiate
9-15	LERN49	MATH Skills Review	Pre-collegiate
16-17	Multiple Measure	LERN 49. With additional information, student may be eligible for a higher placement.	
18-24	MATH50	Pre-Algebra	Pre-collegiate
25-26	Multiple	Math 50. With additional	

	Measure	information, student may be eligible for a higher placement.	
27-35	MATH51	Elementary Algebra	Degree Appropriate (Associate of Science)

Message:

Please bring High School Transcripts, College Transcripts, SAT scores and/or any other information that will assist us in evaluating your readiness for a higher level course and visit one of the following:

Dean or Associate Dean, Natural Sciences (Building 11A - Room 2)

Math Department Chair (Building 26A - Room 212K)

Counselor (Student Services Center - Building 9B, Counseling Office)

Dean, Counseling (Student Services Center - Building 9B, Counseling Office)

Director, Assessment and Matriculation (Student Services Center - Building 9B, Assessment Center)

In the following sections, LERN48 and LERN49 will be referred to as lower level math courses while MATH50 and MATH51 as higher level math courses. By nature, one would think all students prefer to be placed into higher level courses to speed up the attainment of their educational goals. Therefore, the assessment of disproportionate impact will focus on the placement into the two highest level courses by MATH placement test.

Monitoring Disproportionate Impact by Ethnicity

Course Placement by Ethnicity		LERN48	LERN49	MATH50	MATH51	LERN48
African American	Count	347	987	406	71	1811
	Percent	19.16%	54.50%	22.42%	3.92%	100.00%
American Indian/Alaskan Native	Count	19	45	27	8	99
	Percent	19.19%	45.45%	27.27%	8.08%	100.00%
Asian	Count	89	524	663	546	1822
	Percent	4.88%	28.76%	36.39%	29.97%	100.00%
Filipino	Count	59	356	380	159	954
	Percent	6.18%	37.32%	39.83%	16.67%	100.00%
Latino	Count	1520	6306	3254	696	11776
	Percent	12.91%	53.55%	27.63%	5.91%	100.00%

Other Non-White	Count	67	268	184	60	579
	Percent	11.57%	46.29%	31.78%	10.36%	100.00%
Pacific Islander	Count	12	81	32	16	141
	Percent	8.51%	57.45%	22.70%	11.35%	100.00%
Unknown	Count	62	232	148	50	492
	Percent	12.60%	47.15%	30.08%	10.16%	100.00%
White	Count	254	1538	1330	451	3573
	Percent	7.11%	43.05%	37.22%	12.62%	100.00%
Grand Total	Count	2429	10337	6424	2057	21247
	Percent	11.43%	48.65%	30.23%	9.68%	100.00%
80% Index of White students		5.69%	34.44%	29.78%	10.10%	

Disproportionate Impact 80% calculation on the White ethnic group:

80% of 37.22%=29.78% in MATH50

80% of 12.62%=10.10% in MATH51

With the exception of Asian and Filipino students, all other ethnic groups fall below the 80% index with the higher math course placement. It suggests a potential disproportionate impact on these ethnic groups of students.

Monitoring Disproportionate Impact by Age Group

Course Placement by Age Group		LERN48	LERN49	MATH50	MATH51	Grand Total
Under 20	Count	838	5453	4042	1249	11582
	Percent	7.24%	47.08%	34.90%	10.78%	100.00%
20-24	Count	652	2452	1407	440	4951
	Percent	13.17%	49.53%	28.42%	8.89%	100.00%
25-29	Count	328	948	432	143	1851
	Percent	17.72%	51.22%	23.34%	7.73%	100.00%
30-49	Count	547	1325	478	189	2539
	Percent	21.54%	52.19%	18.83%	7.44%	100.00%
50 and Over	Count	62	139	55	31	287
	Percent	21.60%	48.43%	19.16%	10.80%	100.00%
Unknown	Count	2	20	10	5	37
	Percent	5.41%	54.05%	27.03%	13.51%	100.00%
Grand Total	Count	2429	10337	6424	2057	21247
	Percent	11.43%	48.65%	30.23%	9.68%	100.00%
80% Index of Age Under 20		5.79%	37.66%	27.92%	8.62%	

Disproportionate Impact 80% calculation on the Under 20 age group:

80% of 34.90%=27.92% in MATH50

80% of 10.78%=8.62% in MATH51

Most age groups, especially those of age 25 and older, were placed below the 80% index indicating a potential disproportionate impact on students of older age in placing into the two higher level math courses. It is understandable that older students who had left school for certain period of time might not retain the math skills tested by the MATH placement test.

Monitoring Disproportionate Impact by Gender

Course Placement by Gender		LERN48	LERN49	MATH50	MATH51	Grand Total
Female	Count	1541	5747	3045	884	11217
	Percent	13.74%	51.23%	27.15%	7.88%	100.00%
Male	Count	884	4581	3372	1168	10005
	Percent	8.84%	45.79%	33.70%	11.67%	100.00%
Unknown	Count	4	9	7	5	25
	Percent	16.00%	36.00%	28.00%	20.00%	100.00%
Grand Total	Count	2429	10337	6424	2057	21247
	Percent	11.43%	48.65%	30.23%	9.68%	100.00%
80% Index of Male		7.07%	36.63%	26.96%	9.34%	

Disproportionate Impact 80% calculation on the Male group:

80% of 33.70%=26.96% in MATH50

80% of 11.67%=9.34% in MATH51

Females were placed higher than the 80% index in MATH50 (27.15%) but lower in MATH51(7.88%), it suggests that there is a potential **Disproportionate Impact on Female gender group.**

Monitoring Disproportionate Impact by Disability

Course Placement by Disability		LERN48	LERN49	MATH50	MATH51	Grand Total
No Disability	Count	2238	9934	6308	2034	20514
	Percent	10.91%	48.43%	30.75%	9.92%	100.00%
With Disability	Count	191	403	116	23	733
	Percent	26.06%	54.98%	15.83%	3.14%	100.00%
Grand Total	Count	2429	10337	6424	2057	21247
	Percent	11.43%	48.65%	30.23%	9.68%	100.00%
80% Index of No Disability		8.73%	38.74%	24.60%	7.94%	

Disproportionate Impact 80% calculation on the No Disability group:

80% of 30.75%=24.60% in MATH50

80% of 9.92%=7.94% in MATH51

As shown from the table, students with disability were placed much lower than the 80% index in both MATH50 (24.60%) and MATH51 (7.94%) courses, it indicates a potential **Disproportionate Impact on students with disability**.

Further Investigation

The Disproportionate impact study on the Math placement indicate that many of our incoming students of different race, gender, age group, and disability were not able to score into the higher level math courses, even for the pre-collegiate level. This makes one suspect that majority of students taking the MATH placement test did not go through a rigorous curriculum that prepared them for the college education. Such phenomenon is well reflected in the 2000 National Assessment of Educational Progress (NAEP) math performance results that 83 percent of 12th-grade students were below the proficient level in math skills on the NAEP. With data further breaking down by ethnicity, 97 percent of African-American students and 96 percent of Hispanics were below the proficient level. The gap between White and African American and between White and Hispanics remain large with no evidence of narrowing.

The Nation's Report Card: Mathematics 2000 (August 2001)

Authors: James S. Braswell, Anthony D. Lutkus, Wendy S. Grigg, Shari L. Santapau, Brenda Tay-Lim, and Matthew Johnson

High School Background of MATH Tested Students

An investigation into Mt. SAC's MATH tested students' high school backgrounds has provided some evidence suggesting low academic performance of attended high schools and low socio-economic status might be part of the contributing factors to the lower placement rates of some students into higher level math courses. The following two tables list and compare the top 20 high schools attended by Mt. SAC MATH tested students and the top 20 high schools attended by **Latino** students with references of the API ranking, Free Meals percentage, their proficient levels in CST Algebra1, Geometry, Algebra2 and the MATH placement rates at Mt. Sac. API ranking is a system to rate public school based on the yearly State Standardized Tests. The rating system provides ranking from 1 to 10 with 1 as the lowest 10% out of the total state schools of same type. Percent of Free Meals Index represents the percentage of total enrolled students who receive free meals at school based on the eligibility for a free NSLP meal if their family income is 130 percent of the federal poverty level or below. Based of the top 20 high schools listed, it is evidenced that

students who came from high API ranking high schools had better proficient level percentage in the California Standardized Test in math and are more likely to be placed into high level reading courses. Within equal API ranking high schools, students who came from lower economic status areas high schools (higher percent in Free Meals) tend to be less likely to score into higher level Reading courses.

[insert table here]

To demonstrate further with one of the most impacted ethnic groups, we looked at **Latino** MATH tested students' top 20 high schools of origin separately and found that most schools from this top 20 list had low API rankings and high Free Meals percentages. It indicates that MATH tested **Latino** students are more likely to come from high schools of lower academic performance and from lower socio-economic areas; therefore, they are more likely to be under-prepared in some basic skills and less likely to score into higher level Reading courses. Within the same high schools, Latino students did less as well to reach the proficient level on the SCT math tests as the overall group.

[insert table here]

*Top 20 High Schools MATH Testers were from	2005-06 Enrollment	2004-05 API Ranking	2005-06 Free Meal %	2006 CST Algebra I % of Proficient and Above		2006 CST Geometry % of Proficient and Above		2006 CST Algebra II % of Proficient and Above		Mt. SAC MATH High Level Placement	Mt. SAC MATH Low Level Placement	Mt. SAC MATH Number Tested
				# Tested	% Proficient & Above	# Tested	% Proficient & Above	# Tested	% Proficient & Above			
NOGALES HIGH SCHOOL	2462	3	52.52%	703	4%	474	6%	361	12%	40.98%	59.02%	632
WEST COVINA HIGH SCHOOL	2825	7	45.13%	568	9%	670	28%	291	27%	43.11%	56.89%	566
GAREY HIGH SCHOOL	2326	1	81.90%	549	10%	599	9%	299	9%	31.14%	68.86%	562
RUBEN S AYALA SR HIGH SCHOOL	2763	9	4.38%	494	33%	435	39%	393	44%	55.22%	44.78%	498
WALNUT HIGH SCHOOL	2844	10	8.47%	377	33%	449	53%	449	58%	55.94%	44.06%	429
POMONA HIGH SCHOOL	1777	2	71.69%	407	7%	450	6%	235	3%	28.67%	71.33%	429
JOHN A ROWLAND HIGH SCHOOL	2510	9	27.57%	473	10%	447	22%	445	34%	48.36%	51.64%	426
GANESHA HIGH SCHOOL	1634	2	81.46%	352	3%	369	3%	412	11%	19.71%	80.29%	421
LA PUENTE HIGH SCHOOL	1859	2	51.05%	532	5%	467	7%	256	9%	28.75%	71.25%	393
DON LUGO HIGH SCHOOL	2385	3	28.26%	564	12%	340	17%	255	14%	39.04%	60.96%	374
MONTCLAIR HIGH SCHOOL	3055	4	39.84%	1379	10%	420	11%	272	14%	34.58%	65.42%	373
CHINO HIGH SCHOOL	2862	3	24.60%	780	8%	548	16%	251	18%	46.43%	53.57%	364
BASSETT HIGH SCHOOL	1433	2	68.53%	529	3%	285	21%	164	24%	33.43%	66.57%	362
WORKMAN HIGH SCHOOL	1381	2	49.89%	381	8%	224	6%	258	2%	26.53%	73.47%	343
BALDWIN PARK HIGH SCHOOL	2331	2	65.94%	842	2%	481	7%	246	10%	32.84%	67.16%	341
DIAMOND BAR HIGH SCHOOL	3314	10	5.52%	275	41%	466	42%	732	43%	53.57%	46.43%	336
SOUTH HILLS HIGH SCHOOL	1969	8	24.17%	457	8%	448	14%	304	24%	45.60%	54.40%	318
SIERRA VISTA HIGH SCHOOL	2099	2	67.08%	784	4%	409	5%	253	3%	37.18%	62.82%	312
UPLAND HIGH SCHOOL	3674	7	21.23%	712	35%	460	46%	337	51%	54.15%	45.85%	301
LOS ALTOS HIGH SCHOOL	2080	8	28.27%	477	6%	649	15%	290	39%	48.33%	51.67%	300

*The list excludes these unknown groups: Foreign High School, Default High School, CA Unknown.

*Top 20 High Schools <u>LATINO</u> MATH Testers were from	2005-06 Enrollment	2004-05 API Ranking	2005-06 Free Meal %	2006 CST Algebra I % of Proficient and Above		2006 CST Geometry % of Proficient and Above		2006 CST Algebra II % of Proficient and Above		Mt. SAC MATH High Level Placement	Mt. SAC MATH Low Level Placement	Mt. SAC MATH Number Tested
				# Tested	% Proficient & Above	# Tested	% Proficient & Above	# Tested	% Proficient & Above			
GAREY HIGH SCHOOL	2326	1	81.90%	503	8%	526	8%	253	7%	31.39%	68.61%	462
NOGALES HIGH SCHOOL	2462	3	52.52%	595	3%	387	4%	237	8%	38.72%	61.28%	421
WEST COVINA HIGH SCHOOL	2825	7	45.13%	432	7%	413	22%	142	19%	37.83%	62.17%	378
LA PUENTE HIGH SCHOOL	1859	2	51.05%	503	5%	429	6%	233	9%	27.67%	72.33%	347
GANESHA HIGH SCHOOL	1634	2	81.46%	321	3%	330	3%	378	11%	20.93%	79.07%	344
BASSETT HIGH SCHOOL	1433	2	68.53%	505	3%	265	18%	147	20%	33.94%	66.06%	330
POMONA HIGH SCHOOL	777	2	71.69%	326	7%	359	6%	189	2%	28.20%	71.80%	305
BALDWIN PARK HIGH SCHOOL	2331	2	65.94%	787	2%	444	6%	202	5%	32.19%	67.81%	292
WORKMAN HIGH SCHOOL	1381	2	49.89%	343	7%	196	5%	227	1%	25.81%	74.19%	279
MONTCLAIR HIGH SCHOOL	3055	4	39.84%	1163	9%	333	11%	199	12%	34.19%	65.81%	272
SIERRA VISTA HIGH SCHOOL	2099	2	67.08%	746	4%	350	4%	214	2%	33.85%	66.15%	260
DON LUGO HIGH SCHOOL	2385	3	28.26%	342	12%	181	14%	126	10%	32.13%	67.87%	221
LOS ALTOS HIGH SCHOOL	2080	8	28.27%	380	5%	447	10%	115	17%	44.34%	55.66%	221
JOHN A ROWLAND HIGH SCHOOL	2510	9	27.57%	275	3%	151	9%	93	23%	34.33%	65.67%	201
CHINO HIGH SCHOOL	2862	3	24.60%	513	7%	332	14%	123	13%	44.10%	55.90%	195
RUBEN S AYALA SR HIGH SCHOOL	2763	9	4.38%	129	30%	87	11%	42	19%	49.74%	50.26%	193
CHAFFEY HIGH SCHOOL	3354	4	33.66%	1467	11%	242	27%	128	20%	35.42%	64.58%	192
WALNUT HIGH SCHOOL	2844	10	8.47%	125	19%	98	35%	49	47%	43.09%	56.91%	181
SOUTH HILLS HIGH SCHOOL	1969	8	24.17%	284	7%	251	10%	121	18%	39.52%	60.48%	167
GLEN A WILSON HIGH SCHOOL	1922	9	22.63%	250	6%	203	15%	52	23%	32.92%	67.08%	161

*The list excludes these unknown groups: Foreign High School, Default High School, CA Unknown.

MATH Placement Satisfaction Survey - Students and Faculty's views on the MATH Course Placement

A survey was used to collect opinions from students and faculty in the MATH Courses on the appropriateness of the placement in the 6th week of Fall 2006. A total of 2,438 students from all four levels of math courses were surveyed. However, only surveys from 1,042 students who have been placed in the course by their initial placement results are included for this study.

Survey choices for faculty were:

- This student is not prepared and should have been advised to enroll in a lower level course.
- This student is prepared and belongs in this course.
- This student is prepared to enroll in a higher level course.

Survey choices for students were:

- I should have been advised to enroll in a lower level course.
- I belong in this course.
- I should have been advised to enroll in a higher level course.

From the overall ratings by the survey questions, faculty were at least 75% satisfied with the placement of students in all four math level courses while students had a much lower satisfactory ratings on the placement, especially in MATH 50 and MATH 51. The recommended satisfaction rating is 75% or higher to support the cut scores. Such large discrepancy is puzzling to such discrepancy may be students were not realistic about their ratings

Fall 2006 Satisfaction Survey		Faculty				Student			
		LERN48	LERN49	MATH50	MATH51	LERN48	LERN49	MATH50	MATH51
Should be placed lower	#	3	37	24	4		8	2	
	%	6.3%	7.3%	5.9%	5.0%		1.6%	0.49%	
Belongs	#	36	433	354	64	40	367	243	53
	%	75.0%	85.4%	86.3%	80.0%	83.3%	72.4%	59.3%	66.3%
Should be placed higher	#	9	37	32	12	8	132	162	27
	%	18.7%	7.3%	7.8%	15.0%	16.7%	26.0%	39.5%	33.7%

All Courses

Faculty Responses

Lower Level	68	6.5%
Student Belongs	884	84.8%
Higher Level	90	8.6%
Total	1042	

LERN48

Faculty Responses

Lower Level	3	6.3%
Student Belongs	36	75.0%
Higher Level	9	18.8%
Total	48	

LERN49

Faculty Responses

Lower Level	37	7.3%
Student Belongs	433	85.4%
Higher Level	37	7.3%
Total	507	

MATH50

Faculty Responses

Lower Level	24	5.9%
Student Belongs	351	86.2%
Higher Level	32	7.9%
Total	407	

MATH51

Faculty Responses

Lower Level	4	5.0%
Student Belongs	64	80.0%
Higher Level	12	15.0%
Total	80	

Student Responses

Lower Level	10	1.0%
Belong	703	67.5%
Higher Level	329	31.6%
Total	1042	

LERN48

Student Responses

Lower Level	0	0.0%
Belong	40	83.3%
Higher Level	8	16.7%
Total	48	

LERN49

Student Responses

Lower Level	8	1.6%
Belong	367	72.4%
Higher Level	132	26.0%
Total	507	

MATH50

Student Responses

Lower Level	2	0.5%
Belong	243	59.7%
Higher Level	162	39.8%
Total	407	

MATH51

Student Responses

Lower Level	0	0.0%
Belong	53	66.3%
Higher Level	27	33.8%
Total	80	

The following tables show ratings by **placed** students and ratings by faculty on those placed students in all four math level courses, broken down by ethnicity, gender, age group, and by disability status.

Ethnicity

Six sessions of course LERN48 were surveyed in Fall 2006. A total of 48 students who were placed into the course by initial test result are being used for this study. The data shows, either by self rating or by faculty, that overall majority of students are being placed appropriately. Due to the small total surveys for this course, the number becomes even smaller when broke down by ethnicity, too many cells have number less than 30 which makes it difficult to provide enough data for conclusion and therefore can only be used as reference purpose. The College will continue to collect data and monitor the progress in this regard.

Student Satisfactory Survey on LERN48 Placement				
By Ethnicity	I should have been advised to enroll in a LOWER LEVEL course.	I BELONG in this course	I should have been advised to enroll in a HIGHER LEVEL course.	Total Number of Placed Students
African American		2 66.7%	1 33.3%	3 100.0%
Asian		1 50.0%	1 50.0%	2 100.0%
Hispanic		33 86.8%	5 13.2%	38 100.0%
Other Non-White		1 50.0%	1 50.0%	2 100.0%
White		3 100.0%		3 100.0%
Grand Total		40 83.3%	8 16.7%	48 100.0%

Faculty Survey on LERN48 Placement				
By Ethnicity	This student is not prepared and should have been advised to enroll in a LOWER LEVEL course.	This student is prepared and BELONGS in this course	This student is prepared to enroll in a HIGHER LEVEL course.	Total Number of Placed Students
African American		3 100.0%		3 100.0%
Asian		1 50.0%	1 50.0%	2 100.0%
Hispanic	3 7.9%	30 78.9%	5 13.2%	38 100.0%
Other Non-White		2 100.0%		2 100.0%
White			3 100.0%	3 100.0%
Grand Total	3 6.3%	36 75.0%	9 18.8%	48 100.0%

In LERN49 course, faculty and placed students have quite different view on the appropriateness of the course placement. While faculty believed 90% of students being surveyed were placed properly, only 72% of students thought the same way. Almost 18% less of students placed in this course rated that the placement has been appropriate than the faculty. At least one out of four students believed they did not belong in the course. Ratings from both students and faculty of the African American students show that 2 (28.6%) of the total seven students should be placed in higher level course. Faculty also rated that 2(40%) of the total 5 Other Non-White group students should be placed in lower level course. Again, the total numbers of these ethnic groups are too small to draw conclusion but the data is still valuable and will be included as part of the data collection process for future discussion and evaluation on the cut scores.

Student Satisfactory Survey on LERN49 Placement				
By Ethnicity	I should have been advised to enroll in a LOWER LEVEL course.	I BELONG in this course	I should have been advised to enroll in a HIGHER LEVEL course.	Total Number of Placed Students in this course
African American/Non-Hispanic	1 2.5%	33 82.5%	6 15.0%	40 100.0%
Asian		12 57.1%	9 42.9%	21 100.0%
Filipino		12 60.0%	8 40.0%	20 100.0%
Hispanic	6 1.9%	233 73.7%	77 24.4%	316 100.0%
Other Non-White		12 75.0%	4 25.0%	16 100.0%
Pacific Islander		1 100.0%		1 100.0%
White	1 1.2%	60 70.6%	24 28.2%	85 100.0%
Unknown		4 50.0%	4 50.0%	8 100.0%
Grand Total	8 1.6%	367 72.4%	132 26.0%	507 100.0%

Faculty Survey on LERN49 Placement				
By Ethnicity	This student is not prepared and should have been advised to enroll in a LOWER LEVEL course.	This student is prepared and BELONGS in this course	This student is prepared to enroll in a HIGHER LEVEL course.	Total Number of Placed Students in this course
African American/Non-Hispanic	7 17.5%	32 80.0%	1 2.5%	40 100.0%
Asian	1	19	1	21

	4.8%	90.5%	4.8%	100.0%
Filipino	2 10.0%	16 80.0%	2 10.0%	20 100.0%
Hispanic	18 5.7%	275 87.0%	23 7.3%	316 100.0%
Other Non-White		15 93.8%	1 6.3%	16 100.0%
Pacific Islander		1 100.0%		1 100.0%
White	8 9.4%	69 81.2%	8 9.4%	85 100.0%
Unknown	1 12.5%	6 75.0%	1 12.5%	8 100.0%
Grand Total	37 7.3%	433 85.4%	37 7.3%	507 100.0%

In READ90, the agreement on the overall placement from both students and faculty is high. Slightly more students thought they should be placed in higher course while a few more students were rated by faculty as should be placed in lower course. About 27% of Asian students in READ90 thought they have not been placed correctly. Again, the total number of this Asian ethnic group is small.

Student Satisfactory Survey on MATH50 Placement				
By Ethnicity	I should have been advised to enroll in a LOWER LEVEL course.	I BELONG in this course	I should have been advised to enroll in a HIGHER LEVEL course.	Total Number of Placed Students in this course
African American/Non-Hispanic		12 54.5%	10 45.5%	22 100.0%
American Indian/Alaskan Native		2 100.0%		2 100.0%
Asian		24 51.1%	23 48.9%	47 100.0%
Filipino		11 57.9%	8 42.1%	19 100.0%
Hispanic	2 0.9%	131 59.8%	86 39.3%	219 100.0%
Other Non-White		6 85.7%	1 14.3%	7 100.0%
White		56 65.1%	30 34.9%	86 100.0%
Unknown		1 20.0%	4 80.0%	5 100.0%
Grand Total	2 0.5%	243 59.7%	162 39.8%	407 100.0%

Faculty Survey MATH50 Placement
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By Ethnicity	This student is not prepared and should have been advised to enroll in a LOWER LEVEL course.	This student is prepared and BELONGS in this course	This student is prepared to enroll in a HIGHER LEVEL course.	Total Number of Placed Students in this course
African American/Non-Hispanic	6 27.3%	15 68.2%	1 4.5%	22 100.0%
American Indian/Alaskan Native		2 100.0%		2 100.0%
Asian	2 4.3%	39 83.0%	6 12.8%	47 100.0%
Filipino		18 94.7%	1 5.3%	19 100.0%
Hispanic	11 5.0%	195 89.0%	13 5.9%	219 100.0%
Other Non-White	1 14.3%	5 71.4%	1 14.3%	7 100.0%
White	4 4.7%	73 84.9%	9 10.5%	86 100.0%
Unknown		4 80.0%	1 20.0%	5 100.0%
Grand Total	24 5.9%	352 86.2%	32 7.9%	407 100.0%

In READ100, faculty has totally agreed with the placement while 15% of the students from the course thought they were not in the right course. Again, two out of the total seven Asian students in READ100 thought they were not placed appropriately.

Student Satisfactory Survey on MATH51 Placement				
By Ethnicity	I should have been advised to enroll in a LOWER LEVEL course.	I BELONG in this course	I should have been advised to enroll in a HIGHER LEVEL course.	Total Number of Placed Students in this course
African American/Non-Hispanic		1 33.3%	2 66.7%	3 100.0%
Asian		14 82.4%	3 17.6%	17 100.0%
Filipino		3 75.0%	1 25.0%	4 100.0%
Hispanic		22 61.1%	14 38.9%	36 100.0%
Other Non-White		1 100.0%		1 100.0%
Pacific Islander		1 100.0%		1 100.0%
White		10 58.8%	7 41.2%	17 100.0%

Unknown		1 100.0%		1 100.0%
Grand Total		53 66.3%	27 33.8%	80 100.0%

Faculty Survey on MATH51 Placement				
By Ethnicity	This student is not prepared and should have been advised to enroll in a LOWER LEVEL course.	This student is prepared and BELONGS in this course	This student is prepared to enroll in a HIGHER LEVEL course.	Total Number of Placed Students in this course
African American/Non-Hispanic	1 33.3%	1 33.3%	1 33.3%	3 100.0%
Asian		13 76.5%	4 23.5%	17 100.0%
Filipino	1 25.0%	1 25.0%	2 50.0%	4 100.0%
Hispanic	1 2.8%	32 88.9%	3 8.3%	36 100.0%
Other Non-White		1 100.0%		1 100.0%
Pacific Islander	1 100.0%			1 100.0%
White		15 88.2%	2 11.8%	17 100.0%
Unknown		1 100.0%		1 100.0%
Grand Total	4 5.0%	64 80.0%	12 15.0%	80 100.0%

Disability

A total number of 15 students identified with disability enrolled in Reading courses during our survey period. Although the number is too small, the data is included for reference of the data collection process. One of the two disabled students enrolled in READ70 thought the placement was incorrect while faculty believed the placement is appropriate. All 9 disabled students in READ80 rated that they are in the right course but faculty indicated that two disabled students should have been placed in higher Reading course. All placements of disabled students in READ90 are thought to be appropriate by both students themselves and by faculty. No disabled students enrolled in placed READ100 course.

Student Satisfactory Survey on LERN48 Placement
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By Disability	I should have been advised to enroll in a LOWER LEVEL course.	I BELONG in this course	I should have been advised to enroll in a HIGHER LEVEL course.	Total Number of Placed Students in this Course
No Disability		39 83.0%	8 17.0%	47 100.0%
With Disability		1 100.0%		1 100.0%
Total		40 83.3%	8 16.7%	48 100.0%

Faculty Survey on LERN48 Placement				
By Disability	This student is not prepared and should have been advised to enroll in a LOWER LEVEL course.	This student is prepared and BELONGS in this course	This student is prepared to enroll in a HIGHER LEVEL course.	Total Number of Placed Students in this Course
No Disability	3 6.4%	36 76.6%	8 17.0%	47 100.0%
With Disability			1 100.0%	1 100.0%
Total	3 6.3%	36 75.0%	9 18.8%	48 100.0%

Student Satisfactory Survey on LERN49 Placement				
By Disability	I should have been advised to enroll in a LOWER LEVEL course.	I BELONG in this course	I should have been advised to enroll in a HIGHER LEVEL course.	Total Number of Placed Students in this Course
No Disability	8 1.6%	358 72.6%	127 25.8%	493 100.0%
With Disability		9 64.3%	5 35.7%	14 100.0%
Total	8 1.6%	367 72.4%	132 26.0%	507 100.0%

Faculty Survey on LERN49 Placement				
By Disability	This student is not prepared and should have been advised to enroll in a LOWER LEVEL course.	This student is prepared and BELONGS in this course	This student is prepared to enroll in a HIGHER LEVEL course.	Total Number of Placed Students in this Course
No Disability	33 6.7%	423 85.8%	37 7.5%	493 100.0%
With Disability	4	10		14

	28.6%	71.4%		100.0%
Total	37 7.3%	433 85.4%	37 7.3%	507 100.0%

Student Satisfactory Survey on MATH50 Placement				
By Disability	I should have been advised to enroll in a LOWER LEVEL course.	I BELONG in this course	I should have been advised to enroll in a HIGHER LEVEL course.	Total Number of Placed Students in this Course
No Disability	2 0.5%	241 59.7%	161 39.9%	404 100.0%
With Disability		2 66.7%	1 33.3%	3 100.0%
Total	2 0.5%	243 59.7%	162 39.8%	407 100.0%

Faculty Survey on MATH50 Placement				
By Disability	This student is not prepared and should have been advised to enroll in a LOWER LEVEL course.	This student is prepared and BELONGS in this course	This student is prepared to enroll in a HIGHER LEVEL course.	Total Number of Placed Students in this Course
No Disability	24 5.9%	349 86.4%	31 7.7%	404 100.0%
With Disability		2 66.7%	1 33.3%	3 100.0%
Total	24 5.9%	351 86.2%	32 7.9%	407 100.0%

Student Satisfactory Survey on MATH51 Placement				
By Disability	I should have been advised to enroll in a LOWER LEVEL course.	I BELONG in this course	I should have been advised to enroll in a HIGHER LEVEL course.	Total Number of Placed Students in this Course
No Disability		52 65.8%	27 34.2%	79 100.0%
With Disability		1 100.0%		1 100.0%
Total		53 66.3%	27 33.8%	80 100.0%

Faculty Survey on MATH51 Placement				
By Disability	This student is not prepared and should have been advised to enroll in a LOWER LEVEL course.	This student is prepared and BELONGS in this course	This student is prepared to enroll in a HIGHER LEVEL course.	Total Number of Placed Students in this Course
No Disability	4	63	12	79

	5.1%	79.7%	15.2%	100.0%
With Disability		1 100.0%		1 100.0%
Total	4 5.0%	64 80.0%	12 15.0%	80 100.0%

Overall, looking at the survey data by ethnicity and by disability status, the result reveals that both students and faculty have rated the placement by DRP as in most cases (over 75%).

GENDER

Student Satisfaction Survey on LERN48 Placement				
By Gender	I should have been advised to enroll in a LOWER LEVEL course.	I BELONG in this course	I should have been advised to enroll in a HIGHER LEVEL course.	Total Number of Placed Students in this Course
Female		26 86.7%	4 13.3%	30 100.0%
Male		14 77.8%	4 22.2%	18 100.0%
Total		40 83.3%	8 16.7%	48 100.0%

Faculty Survey on LERN48 Placement				
By Gender	This student is not prepared and should have been advised to enroll in a LOWER LEVEL course.	This student is prepared and BELONGS in this course	This student is prepared to enroll in a HIGHER LEVEL course.	Total Number of Placed Students in this Course
Female	1 3.3%	22 73.3%	7 23.3%	30 100.0%
Male	2 11.1%	14 77.8%	2 11.1%	18 100.0%
Total	3 6.3%	36 75.0%	9 18.8%	48 100.0%

Student Satisfaction Survey on LERN49 Placement				
By Gender	I should have been advised to enroll in a LOWER LEVEL course.	I BELONG in this course	I should have been advised to enroll in a HIGHER LEVEL course.	Total Number of Placed Students in this Course
Female	4 1.3%	223 74.8%	71 23.8%	298 100.0%
Male	4 1.9%	143 69.1%	60 29.0%	207 100.0%

Unknown		1 50.0%	1 50.0%	2 100.0%
Total	8 1.6%	367 72.4%	132 26.0%	507 100.0%

Faculty Survey on LERN49 Placement				
By Gender	This student is not prepared and should have been advised to enroll in a LOWER LEVEL course.	This student is prepared and BELONGS in this course	This student is prepared to enroll in a HIGHER LEVEL course.	Total Number of Placed Students in this Course
Female	13 4.4%	261 87.6%	24 8.1%	298 100.0%
Male	24 11.6%	171 82.6%	12 5.8%	207 100.0%
Unknown		1 50.0%	1 50.0%	2 100.0%
Total	37 7.3%	433 85.4%	37 7.3%	507 100.0%

Student Satisfactory Survey on MATH50 Placement				
By Gender	I should have been advised to enroll in a LOWER LEVEL course.	I BELONG in this course	I should have been advised to enroll in a HIGHER LEVEL course.	Total Number of Placed Students in this Course
Female	2 1.0%	137 65.6%	70 33.5%	209 100.0%
Male		106 53.5%	92 46.5%	198 100.0%
Total	2 0.5%	243 59.7%	162 39.8%	407 100.0%

Faculty Survey on MATH50 Placement				
By Gender	This student is not prepared and should have been advised to enroll in a LOWER LEVEL course.	This student is prepared and BELONGS in this course	This student is prepared to enroll in a HIGHER LEVEL course.	Total Number of Placed Students in this Course
Female	11 5.3%	184 88.0%	14 6.7%	209 100.0%
Male	13 6.6%	167 84.3%	18 9.1%	198 100.0%
Total	24 5.9%	351 86.2%	32 7.9%	407 100.0%

Student Satisfactory Survey on MATH51 Placement				
By Gender	I should have been advised to enroll in a LOWER LEVEL course.	I BELONG in this course	I should have been advised to enroll in a HIGHER LEVEL course.	Total Number of Placed Students in this Course

Female		24 82.8%	5 17.2%	29 100.0%
Male		29 56.9%	22 43.1%	51 100.0%
Total		53 66.3%	27 33.8%	80 100.0%

Faculty Survey on MATH51 Placement				
By Gender	This student is not prepared and should have been advised to enroll in a LOWER LEVEL course.	This student is prepared and BELONGS in this course	This student is prepared to enroll in a HIGHER LEVEL course.	Total Number of Placed Students in this Course
Female	1 3.4%	24 82.8%	4 13.8%	29 100.0%
Male	3 5.9%	40 78.4%	8 15.7%	51 100.0%
Total	4 5.0%	64 80.0%	12 15.0%	80 100.0%

AGE GROUP

Student Satisfactory Survey on LERN48 Placement				
By Age Group	I should have been advised to enroll in a LOWER LEVEL course.	I BELONG in this course	I should have been advised to enroll in a HIGHER LEVEL course.	Total Number of Placed Students
Under 20		21 87.5%	3 12.5%	24 100.0%
20-24		6 60.0%	4 40.0%	10 100.0%
25-29		4 100.0%		4 100.0%
30-39		5 83.3%	1 16.7%	6 100.0%
40-49		3 100.0%		3 100.0%
50 and Over		1 100.0%		1 100.0%
Grand Total		40 83.3%	8 16.7%	48 100.0%

Faculty Survey on LERN48 Placement

By Age Group	This student is not prepared and should have been advised to enroll in a LOWER LEVEL course.	This student is prepared and BELONGS in this course	This student is prepared to enroll in a HIGHER LEVEL course.	Total Number of Placed Students
				24
Under 20	1 4.2%	19 79.2%	4 16.7%	100.0%
20-24	2 20.0%	7 70.0%	1 10.0%	10 100.0%
25-29		3 75.0%	1 25.0%	4 100.0%
30-39		3 50.0%	3 50.0%	6 100.0%
40-49		3 100.0%		3 100.0%
50 and Over		1 100.0%		1 100.0%
Grand Total	3 6.3%	36 75.0%	9 18.8%	48 100.0%

Student Satisfactory Survey on LERN49 Placement				
By Age Group	I should have been advised to enroll in a LOWER LEVEL course.	I BELONG in this course	I should have been advised to enroll in a HIGHER LEVEL course.	Total Number of Placed Students
Under 20	5 1.4%	240 67.2%	112 31.4%	357 100.0%
20-24		58 78.4%	16 21.6%	74 100.0%
25-29	1 3.7%	25 92.6%	1 3.7%	27 100.0%
30-39	1 3.0%	30 90.9%	2 6.1%	33 100.0%
40-49	1 8.3%	10 83.3%	1 8.3%	12 100.0%
50 and Over		4 100.0%		4 100.0%
Grand Total	8 1.6%	367 72.4%	132 26.0%	507 100.0%

Faculty Survey on LERN49 Placement				
By Age Group	This student is not prepared and should have been advised to enroll in a LOWER LEVEL course.	This student is prepared and BELONGS in this course	This student is prepared to enroll in a HIGHER LEVEL course.	Total Number of Placed Students

Under 20	29 8.1%	309 86.6%	19 5.3%	357 100.0%
20-24	4 5.4%	62 83.8%	8 10.8%	74 100.0%
25-29	1 3.7%	22 81.5%	4 14.8%	27 100.0%
30-39	1 3.0%	28 84.8%	4 12.1%	33 100.0%
40-49	1 8.3%	9 75.0%	2 16.7%	12 100.0%
50 and Over	1 25.0%	3 75.0%		4 100.0%
Grand Total	37 7.3%	433 85.4%	37 7.3%	507 100.0%

Student Satisfactory Survey on MATH50 Placement				
By Age Group	I should have been advised to enroll in a LOWER LEVEL course.	I BELONG in this course	I should have been advised to enroll in a HIGHER LEVEL course.	Total Number of Placed Students
Under 20	2 0.6%	174 55.2%	139 44.1%	315 100.0%
20-24		37 67.3%	18 32.7%	55 100.0%
25-29		16 88.9%	2 11.1%	18 100.0%
30-39		8 72.7%	3 27.3%	11 100.0%
40-49		3 100.0%		3 100.0%
50 and Over		5 100.0%		5 100.0%
Grand Total	2 0.5%	243 59.7%	162 39.8%	407 100.0%

Faculty Survey on MATH50 Placement				
By Age Group	This student is not prepared and should have been advised to enroll in a LOWER LEVEL course.	This student is prepared and BELONGS in this course	This student is prepared to enroll in a HIGHER LEVEL course.	Total Number of Placed Students
Under 20	18 5.7%	275 87.3%	22 7.0%	315 100.0%
20-24	3 5.5%	48 87.3%	4 7.3%	55 100.0%
25-29	1 5.6%	14 77.8%	3 16.7%	18 100.0%
30-39		9	2	11

		81.8%	18.2%	100.0%
40-49	1 33.3%	2 66.7%		3 100.0%
50 and Over	1 20.0%	3 60.0%	1 20.0%	5 100.0%
Grand Total	24 5.9%	351 86.2%	32 7.9%	407 100.0%

Student Satisfactory Survey on MATH51 Placement				
By Age Group	I should have been advised to enroll in a LOWER LEVEL course.	I BELONG in this course	I should have been advised to enroll in a HIGHER LEVEL course.	Total Number of Placed Students
Under 20		33 61.1%	21 38.9%	54 100.0%
20-24		11 73.3%	4 26.7%	15 100.0%
25-29		5 71.4%	2 28.6%	7 100.0%
30-39		1 100.0%		1 100.0%
40-49		1 100.0%		1 100.0%
50 and Over		2 100.0%		2 100.0%
Grand Total		53 66.3%	27 33.8%	80 100.0%

Faculty Survey on MATH51 Placement				
By Age Group	This student is not prepared and should have been advised to enroll in a LOWER LEVEL course.	This student is prepared and BELONGS in this course	This student is prepared to enroll in a HIGHER LEVEL course.	Total Number of Placed Students
Under 20	4 7.4%	40 74.1%	10 18.5%	54 100.0%
20-24		14 93.3%	1 6.7%	15 100.0%
25-29		6 85.7%	1 14.3%	7 100.0%
30-39		1 100.0%		1 100.0%
40-49		1 100.0%		1 100.0%
50 and Over		2 100.0%		2 100.0%
Grand Total	4	64	12	80

	5.0%	80.0%	15.0%	100.0%
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Placement Survey	Student Rating										Grand Total
	LERN48		LERN49			MATH50			MATH51		
Faculty Rating	2	3	1	2	3	1	2	3	2	3	
I should have been advised to enroll in a LOWER LEVEL course.	3		1	27	9		19	5	4		68 6.5%
I BELONG in this course	30	6	7	318	108	2	209	140	46	18	884 84.8%
I should have been advised to enroll in a HIGHER LEVEL course.	7	2		22	15		15	17	3	9	90 8.6%
Grand Total	40 83.3%	8 16.7%	8 1.6%	367 72.4%	132 26.0%	2 0.5%	243 59.7%	162 39.8%	53 66.3%	27 33.7%	1042 100.0%

Placement Survey	Faculty Rating												Grand Total
	LERN48			LERN49			MATH50			MATH51			
Student Rating	1	2	3	1	2	3	1	2	3	1	2	3	
I should have been advised to enroll in a LOWER LEVEL course.				1	7			2					10 1.0%
I BELONG in this course	3	30	7	27	318	22	19	209	15	4	46	3	703 67.5%
I should have been advised to enroll in a HIGHER LEVEL course.		6	2	9	108	15	5	140	17		18	9	329 31.6%
Grand Total	3 6.3%	36 75.0%	9 18.8%	37 7.3%	433 85.4%	37 7.3%	24 5.9%	351 86.3%	32 7.8%	4 5.0%	64 80.0%	12 15.0%	1042 100.0%

Success Rates of Placed Reading Courses

This section displays how successful DRP tested students are when they enroll in the placed course for the first time. A total of 4008 students enrolled in placed reading courses during our study period. The number is much smaller than the tested population

because reading courses were not part of the graduation requirement until recently. The following tables compare DRP tested students' success rates in first placed reading courses by ethnicity, gender, age group, and disability. The courses are broken down into two levels: higher and lower levels.

Success rates of higher level reading courses by ethnicity show that DRP tested students are quite successful with at least a 60% pass rate, regardless of ethnicity (not counting those ethnic groups with number lower than 10). African American students have lower pass rates in the lower level reading courses than in the higher level ones.

MATH Target Courses overall campus-wide success rates by term by Course

Success	1						
Count of STUDENT_ID	CRS_ID						
EFF_TRM	LERN48	LERN49	MATH50	MATH51	MATH51A	MATH51B	Grand Total
20033	60.95%	54.53%	52.54%	47.25%	57.20%	50.00%	52.29%
20041	60.61%	68.93%	73.55%	62.31%	N/A	100.00%	68.98%
20042	55.75%	55.40%	56.34%	48.86%	49.80%	64.65%	53.75%
20043	43.38%	52.32%	51.69%	52.21%	63.38%	59.82%	52.20%
20051	64.58%	71.29%	75.27%	69.50%	N/A	90.91%	72.47%
20052	51.01%	52.37%	56.93%	52.29%	52.11%	46.03%	53.72%
20053	47.99%	49.33%	51.22%	46.74%	60.58%	45.35%	49.33%
20061	76.74%	77.46%	78.74%	58.31%	N/A	75.00%	71.78%
20062	50.00%	47.29%	59.91%	46.65%	43.72%	57.89%	51.30%
Grand Total	53.69%	54.52%	57.81%	50.90%	54.12%	60.36%	54.60%

Average Success Rate of Placed Math Courses		Not Passed		Passed		Grand Total	
Course Level	Ethnicity	Count	Percent	Count	Percent	Count	Percent
High (MATH 50 & MATH51)	African American/Non-Hispanic	102	44.54%	127	55.46%	229	100.00%
	American Indian/Alaskan Native	7	38.89%	11	61.11%	18	100.00%
	Asian	132	25.29%	390	74.71%	522	100.00%
	Declined to State	4	30.77%	9	69.23%	13	100.00%
	Filipino	74	26.33%	207	73.67%	281	100.00%
	Hispanic	697	33.05%	1412	66.95%	2109	100.00%
	Other Non-White	36	31.03%	80	68.97%	116	100.00%
	Pacific Islander	9	37.50%	15	62.50%	24	100.00%

	Unknown	3	33.33%	6	66.67%	9	100.00%
	White	246	26.48%	683	73.52%	929	100.00%
High Total		1310	30.82%	2940	69.18%	4250	100.00%
Low (LERN48 & LERN49)	African American/Non- Hispanic	242	51.93%	224	48.07%	466	100.00%
	American Indian/Alaskan Native	8	38.10%	13	61.90%	21	100.00%
	Asian	86	40.19%	128	59.81%	214	100.00%
	Declined to State	5	55.56%	4	44.44%	9	100.00%
	Filipino	69	38.33%	111	61.67%	180	100.00%
	Hispanic	1345	41.09%	1928	58.91%	3273	100.00%
	Other Non-White	45	34.35%	86	65.65%	131	100.00%
	Pacific Islander	10	38.46%	16	61.54%	26	100.00%
	Unknown	5	62.50%	3	37.50%	8	100.00%
	White	236	33.15%	476	66.85%	712	100.00%
Low Total		2051	40.69%	2989	59.31%	5040	100.00%
Grand Total		3361	36.18%	5929	63.82%	9290	100.00%

Average Success Rate of Placed Math Courses		Not Passed		Passed		Grand Total	
Course Level	Gender	Count	Percent	Count	Percent	Count	Percent
High (MATH 50 & MATH51)	Female	525	25.50%	1534	74.50%	2059	100.00%
	Male	784	35.83%	1404	64.17%	2188	100.00%
	Unknown	1	33.33%	2	66.67%	3	100.00%
High Total		1310	30.82%	2940	69.18%	4250	100.00%
Low (LERN48 & LERN49)	Female	1124	36.79%	1931	63.21%	3055	100.00%
	Male	927	46.77%	1055	53.23%	1982	100.00%
	Unknown		0.00%	3	100.00%	3	100.00%
Low Total		2051	40.69%	2989	59.31%	5040	100.00%
Grand Total		3361	36.18%	5929	63.82%	9290	100.00%

Average Success Rate of Placed Math Courses		Not Passed		Passed		Grand Total	
Course Level	Disability	Count	Percent	Count	Percent	Count	Percent
High (MATH 50 & MATH51)	No Disability	1285	30.93%	2870	69.07%	4155	100.00%
	With Disability	25	26.32%	70	73.68%	95	100.00%
High Total		1310	30.82%	2940	69.18%	4250	100.00%
Low (LERN48 & LERN49)	No Disability	1888	40.18%	2811	59.82%	4699	100.00%
	With Disability	163	47.80%	178	52.20%	341	100.00%
Low Total		2051	40.69%	2989	59.31%	5040	100.00%
Grand Total		3361	36.18%	5929	63.82%	9290	100.00%

Average Success Rate of Placed Math Courses		Not Passed		Passed		Grand Total	
Course Level	Age Group	Count	Percent	Count	Percent	Count	Percent
High (MATH 50 & MATH51)	Under 20	973	33.77%	1908	66.23%	2881	100.00%
	20-24	249	29.36%	599	70.64%	848	100.00%
	25-29	45	18.83%	194	81.17%	239	100.00%
	30-39	31	17.71%	144	82.29%	175	100.00%
	40-49	8	12.12%	58	87.88%	66	100.00%
	50 and Over	3	7.50%	37	92.50%	40	100.00%
	Unknown	1	100.00%		0.00%	1	100.00%
High Total		1310	30.82%	2940	69.18%	4250	100.00%
Low (LERN48 & LERN49)	Under 20	1321	46.66%	1510	53.34%	2831	100.00%
	20-24	428	41.11%	613	58.89%	1041	100.00%
	25-29	142	30.41%	325	69.59%	467	100.00%
	30-39	100	23.31%	329	76.69%	429	100.00%
	40-49	48	22.02%	170	77.98%	218	100.00%
	50 and Over	12	22.22%	42	77.78%	54	100.00%
	Low Total		2051	40.69%	2989	59.31%	5040
Grand Total		3361	36.18%	5929	63.82%	9290	100.00%

Conclusion

No disproportionate impact was found for age and gender in this study. Disability group had some evidence showing potential disproportionate impact placing into higher level Reading courses and had lower success rates in the placed courses. Mt. SAC Assessment Center will continue to work with DSPS, faculty, and students to make sure all appropriate accommodations are being offered to disabled students. Possible disproportionate impact was also found on some ethnic groups by DRP placement. Further investigation on DRP tested students' high school backgrounds suggest factors such as low academic performance of attended high schools and low economic status might be contributing to the lower placement rates into higher level Reading courses for some ethnic group students. Analysis of faculty and students' perceptions on the appropriateness of DRP placement support the overall placement by DRP. In addition, more than 75% of students from impacted ethnic groups and of students with disability in the survey felt that the placement has been appropriate. Except for students with disability, average success rates of Reading courses are acceptable (above 60%) by

ethnicity, gender and age group where enough data are available. Mt. San Antonio College will continue to collect data and monitor the disproportionate impact, and to collaborate with faculty, all sectors of Student Services, and basic skills enhancement programs to understand the needs of disadvantaged students and to provide proper assistance to help them achieve.