



Washington School Research Center

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# **Thinking About College: Results of the College Awareness Survey Among Achievers High Schools in Washington**

Kari Peterson

Heather Stroh

**The Washington School Research Center (WSRC)** is an independent research and data analysis center within Seattle Pacific University. The Center began in July 2000, funded through a gift from the Bill and Melinda Gates Foundation. Our mission is to conduct sound and objective research on student learning in the public schools, and to make the research findings available for educators, policy makers, and the general public for use in the improvement of schools. We believe that sound data and appropriate data analysis are vital components for the identification of school and classroom practices related to increased student academic achievement.

Washington School Research Center  
3500 188<sup>th</sup> St. S.W., Suite 328  
Lynnwood, WA 98037  
Phone: 425.744.0992  
Fax: 425.744.0821  
Web: [www.spu.edu/wsrc](http://www.spu.edu/wsrc)

**Martin L. Abbott, Ph.D.**  
Executive Director  
Professor of Sociology

**Duane B. Baker, Ed.D.**  
Director -  
School Information Services

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A Technical Report For  
The Washington School Research Center



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# **Thinking About College: Results of the College Awareness Survey Among Achievers High Schools in Washington**

## **Introduction**

In 2001 sixteen high schools serving large populations of low-income students in Washington State were awarded grants as a part of the Bill & Melinda Gates Foundation's Achievers High School Initiative. The Achievers program strives to increase academic achievement and college attendance rates at these schools (Bill & Melinda Gates Foundation, 2001). The College Awareness Survey (CAS) was administered during the 2001-2002 school year to ninth and eleventh grade students in Washington's Achievers High Schools. The CAS was designed by the evaluators of the Achievers High Schools and administered to students in order to understand their initial expectations and plans for college.

The purpose of this Report is to describe the findings of the first round of data collection on college awareness of the student respondents in the Achievers program. Subsequent data collection will be used as a comparison to provide partial insight into the effectiveness of the program.

## Literature Review

Research has indicated that high school students' college expectations are influenced by several factors, including family income (Hass, 1992; Mau, 1995), ethnicity (Kao & Tienda, 1998; Mau, 1995; Mau & Bikos, 2000; Reynolds & Pemberton, 2001), gender (Dortch, 1997; Mau & Bikos, 2000; Mau, Hitchcock, & Calvert, 1998), current academic achievement (Mau, 1995), parents' expectations (Mau, 1995; Mau & Bikos, 2000; Mau, Hitchcock, & Calvert, 1998), counselors' expectations (Mau, Hitchcock, & Calvert, 1998), and peers' expectations (Reynolds & Pemberton, 2001).

Students' family income status is positively associated with college expectations. Briefly, researchers have found that students from low income families are less likely to aspire to a college education than their more economically advantaged peers (Haas, 1992; Mau, 1995). Researchers noted, however, that once family income is taken into account, minority students generally have higher educational expectations and aspirations than White students (Kao & Tienda, 1998). Mau and Bikos (2000) noted that Asian students had consistently higher educational goals than students of other ethnic backgrounds. Native American students are an exception to this: they have been found to consistently report lower educational goals than students of other ethnic backgrounds.

Other researchers noted discrepancies between White and minority students in perceived parental expectations. Overall, students' perceived parental expectations were positively correlated with the students' own aspirations about college (Mau, 1995). Generally, Asian students perceived higher parental expectations for college, while Native American students perceived lower parental expectations for college compared to other students (Mau, 1995). Additionally, female students generally perceived higher expectations for college from parents and others than male students (Mau, 1995; Mau, Hitchcock, & Calvert, 1998). Dortch (1997) also noted girls had increasingly higher expectations for college than boys, and that this trend is reflected in boys' relative decline in college enrollment rates.

Overall, regardless of race or gender, students reported consulting non-school persons (e.g., parents and friends) more often than school persons (e.g., teachers and counselors) about high school programs. Researchers noted that black students,

however, reported being more likely to talk to a counselor, teacher, friends, or relatives to get information about high school programs and jobs or careers than other students. In addition, boys were found to be more likely than girls to ask a teacher or counselor about job or career information (Mau, 1995).

Mau, Hitchcock, and Calvert (1998) examined high school students' post high school plans and their perceptions of counselors' and other influential persons' expectations of them. Results indicated that although over 50% of the 10<sup>th</sup> grade students thought their counselors expected them to go to college, most 10<sup>th</sup> grade students were more likely to perceive college expectations from parents or relatives than from counselors or teachers.

In short, high school students' expectations and perceptions about college are impacted by several factors, including ethnicity, gender, and socioeconomic status. Not surprisingly, students' aspirations about college have been found to be significantly related to their current academic achievements, and positively correlated with perceived parental expectations (Mau, 1995).

## Results

The CAS included questions to assess general student attributes, expectations, perceptions, and plans for college as well as the influence of teachers, counselors, and school curriculum on students' college expectations. Descriptive and frequency analyses were performed on the data.

Table 1 describes the demographics of the students who responded to the CAS. Missing data were due to students leaving a question blank or filling in more than one response. Respondents were more ethnically diverse compared to the demographics for all Washington State students.

**Table 1. Description of 9<sup>th</sup> and 11<sup>th</sup> Grade Student Respondents to the CAS**

		<i>n</i>	%
Grade Level	11th grade	1,077	52
	9th grade	997	48
	Total N	2,074	
Gender	Female	1,047	50
	Male	974	47
	Missing	53	3
	Total N	2,074	
Ethnicity	White	993	48
	Native American	34	2
	Hispanic/Latino	271	13
	Asian/Pacific Islander	291	14
	African American	197	9
	Other/Mixed Ethnicity	205	10
	Missing	83	4
	Total N	2,074	

### Parental Level of Education

Approximately one-third of the student respondents (31%) reported that their father had received a degree from either a technical/community college or a four-year college. More students (37%) reported that their mother had received such a degree.

Almost one-third (28%) of students did not know their father’s level of education and one-fifth (19%) did not know their mother’s level of education.

Results indicated that more students in the 11<sup>th</sup> grade knew their parents’ level of education than students in the 9<sup>th</sup> grade. The correlations between father’s level of education and student’s post high school plans (get a job, attend a 2-year college, attend a 4-year college, enlist in the military, other, don’t know), and mother’s level of education and student’s post high school plans were both statistically significant and represent medium effect sizes (Contingency Coefficient = .235,  $p < .001$  and .199,  $p < .001$ , respectively)<sup>1</sup>. In short, this indicates general correspondence between parental education and students’ post high school plans.

### **Hours Students Worked at a Job and Spent on Homework each Week**

A statistically significant difference was found between the number of hours 11<sup>th</sup> grade students worked at a job compared to 9<sup>th</sup> grade students ( $\chi^2 = 166.44$ ,  $p < .001$ ). Table 2 depicts the percentages for the amount of hours spent working at a job during the week for students in 9<sup>th</sup> and 11<sup>th</sup> grades. Results indicate 19.18% of 11<sup>th</sup> grade students worked 16 hours a week or more compared to 3.82% of 9<sup>th</sup> grade students.

**Table 2. Hours Student Worked Per Week**

“How many hours a week do you currently work after school or weekends at a paying job?”

Number of Hours Student Works per Week	9 <sup>th</sup> Grade %	11 <sup>th</sup> Grade %
0 hours	72.66	57.36
1-5 hours	15.18	9.03
6-10 hours	5.73	6.98
11-15 hours	2.61	7.45
16-20 hours	1.61	11.73
20+ hours	2.21	7.45
Total N	995	1,074

<sup>1</sup> Contingency Coefficient is a correlation measure based upon nominal data.

Although 11<sup>th</sup> grade students reported working more hours per week than 9<sup>th</sup> grade students, students' self-reported GPAs were similar across both grade levels. The possible negative impact on GPA of an increased workload for 11<sup>th</sup> grade students may have been buffered by an increase in studying. Table 3 shows the percentages for the amount of hours that 9<sup>th</sup> grade students spent on homework a week compared to 11<sup>th</sup> grade students. On average, students in the 11<sup>th</sup> grade reported doing more hours of homework a week than students in the 9<sup>th</sup> grade. (Alternatively, this could indicate that students in the 11<sup>th</sup> grade have been assigned more homework than students in the 9<sup>th</sup> grade). Overall, students in the 11<sup>th</sup> grade tend to spend more time working at jobs and on homework than students in the 9<sup>th</sup> grade.

**Table 3. Hours Student Spent on Homework each Week**

“On average, how much time EACH WEEK do you spend doing homework (outside of school)?”

Number of Hours Spent on Homework each Week	9th Grade %	11th Grade %
< 1 hour	24.75	20.35
1-2 hours	35.41	31.04
3-4 hours	20.02	23.05
5-6 hours	10.66	12.08
7-8 hours	4.63	6.13
9+ hours	4.53	7.34
Total N	994	1,076

In a related analysis, a statistically significant gender difference ( $\chi^2 = 62.54, p < .001$ ) indicated that females reported spending more hours on homework each week than males. Over one-half (55.6%) of all students reported 2 hours or less a week on homework.

### **Students' Plans after High School**

Seventy percent of all respondents reported planning to attend either a 2- or 4-year college after high school. As shown in Table 4, 11<sup>th</sup> grade students were slightly more likely to report planning to attend college than 9<sup>th</sup> grade students.

**Table 4. Student Plans after High School**

“What do you plan to do in the year after you graduate from high school?”

Students' Post High School Plans	9th Grade %	11th Grade %
Get a job	11.63	8.73
Attend a 2-year college	12.55	21.97
Attend a 4-year college	55.10	52.02
Enlist in the Military	6.02	4.69
Other	6.12	6.01
Don't Know	8.57	6.57
Total N	980	1,065

**Student Preparedness for College**

Students were asked about whether high school had prepared them to succeed in college. As shown in Table 5, twice the number of respondents agreed or strongly agreed with this statement than those who disagreed or strongly disagreed.

**Table 5. How high school has prepared student for college.**

“I think my high school has prepared me to succeed in college.”

	%
Strongly Disagree	7.53
Disagree	13.01
Neutral	35.27
Agree	33.86
Strongly Agree	10.32
Total N	2,044

Eighty-four percent of all students agreed or strongly agreed that a college degree was important for them in obtaining a successful job (Table 6).

**Table 6. *College degree is important for successful job.***

“A college degree is important for me to obtain a successful job.”

	%
Strongly Disagree	3.02
Disagree	3.06
Neutral	9.34
Agree	26.12
Strongly Agree	58.46
Total N	2,056

Similar results were found when students were asked whether their future career depended on going to college. Most students agreed or strongly agreed that their future career depended on going to college (see Table 7).

**Table 7. *Future Career Depends on going to College.***

“My future career depends on going to college.”

	%
Strongly Disagree	3.26
Disagree	4.96
Neutral	15.27
Agree	26.12
Strongly Agree	50.39
Total N	2,056

The results from Tables 5, 6 and 7 are compared in Table 8. Although 76% of students agreed or strongly agreed that their future career depends on going to college, and 84% agreed or strongly agreed that a college degree is important for them to obtain a successful job, only 44% of students believe that their high school has prepared them to succeed in college. These results probably have multiple explanations. While it is possible that high school really has not prepared these students for college, another explanation is that students may not know how well their high school has prepared them for college until they actually matriculate.

**Table 8. High School has Prepared Student for College Compared to College Degree being Important in Obtaining a Successful Job and a Future Career**

Prepared: "I think my high school has prepared me to succeed in college."

Job: "A college degree is important for me to obtain a successful job."

Career: "My future career depends a lot on going to college."

	Prepared %	Job %	Career %
Strongly Disagree	7.53	3.02	3.26
Disagree	13.01	3.06	4.96
Neutral	35.27	9.34	15.27
Agree	33.86	26.12	26.12
Strongly Agree	10.32	58.46	50.39
Total N	2,044	2,056	2,056

**How often Counselors and Teachers Spoke with Students about College**

Students were asked how often counselors and teachers had discussed college plans with them. Students in the 11<sup>th</sup> grade reported that teachers and counselors discussed college plans with them more frequently than students in the 9<sup>th</sup> grade (Table 9). This finding was statistically significant for teachers ( $\chi^2 = 41.93, p < .001$ ), and for counselors ( $\chi^2 = 71.71, p < .001$ ).

**Table 9. How Often Teachers and Counselors Discussed College Plans With Student**

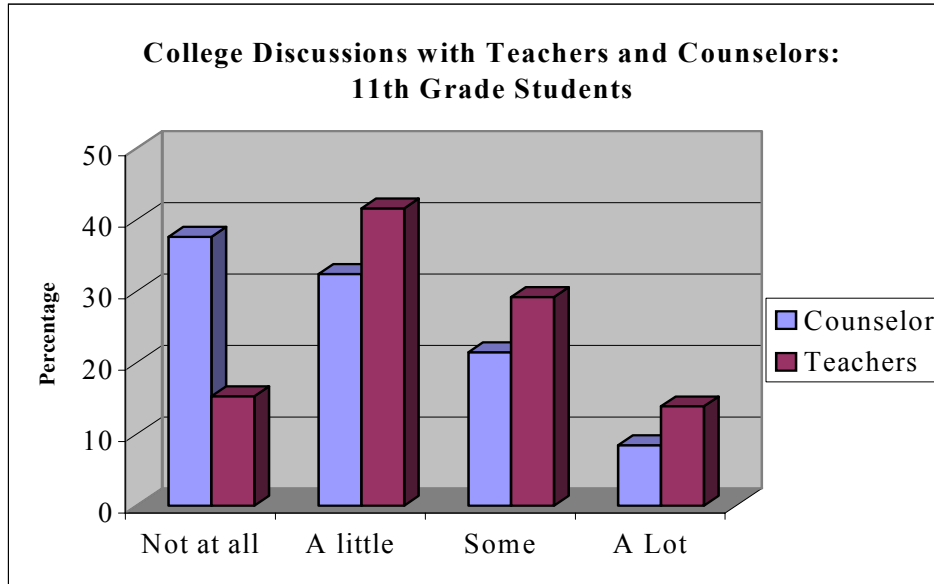
"How often has your high school counselor discussed college plans with you?"

"How often have your high school teachers discussed college plans with you?"

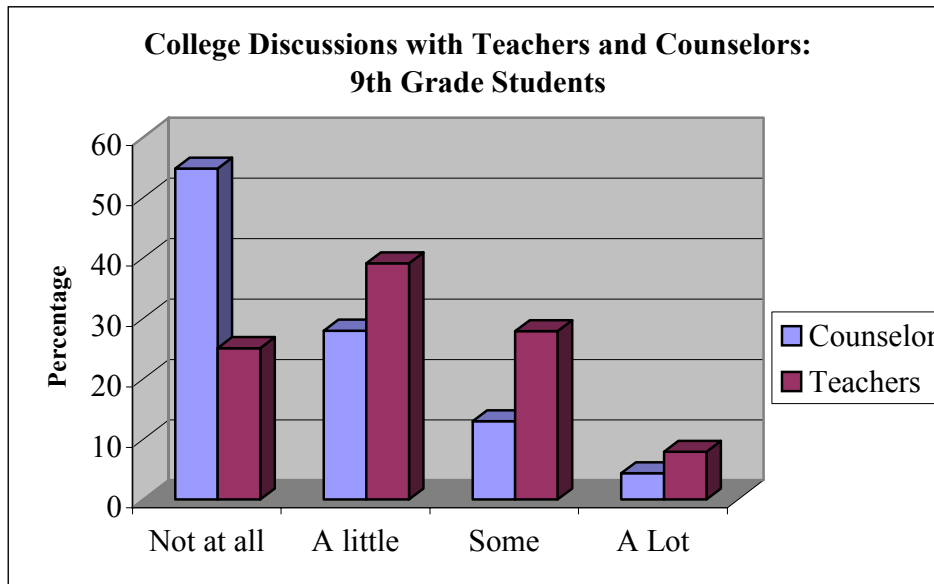
	9th Grade		11 <sup>th</sup> Grade	
	Teachers %	Counselors %	Teachers %	Counselors %
Not at all	25.05	54.77	15.30	37.64
A little	39.09	27.94	41.60	32.43
Some	27.88	12.96	29.20	21.47
A Lot	7.88	4.32	13.90	8.46
Total N	990	995	1,072	1,076

Figures 1 and 2 display the amount of time that 9<sup>th</sup> and 11<sup>th</sup> grade students reported discussing college plans with counselors and teachers. These figures show that the majority of students reported that school counselors and teachers had discussed college plans with them either “not at all” or “a little.” Students also indicated that teachers discussed college plans with students more than counselors.

**Figure 1**



**Figure 2**



## Helpful Ways Students Learned about College

Students were asked about the most helpful ways they learned about college. Over half of the students (54%) responded that parents, teachers, or school counselors had been the most helpful (Table 10). This is an interesting finding considering the majority of respondents noted that discussions about college plans with counselors and teachers had been infrequent.

**Table 10. *The Most Helpful Way Student Has Learned About College***

“Which of the following has been THE MOST helpful in learning about college?”

	%
Parents/guardians	19.31
Other relatives	6.70
Teachers	20.74
School Counselor	13.60
Friends	9.06
The Internet	10.39
TV and Movies	4.24
Other	10.54
None	5.42
Total N	2,074

## Helpfulness of Discussions with Counselors and Teachers About College Plans

Student respondents also provided information on the helpfulness of the discussions about college plans with counselors and teachers. Approximately 27% of all students agreed or strongly agreed that discussions with school counselors were helpful, while 40% agreed or strongly agreed that discussions with teachers were helpful (Table 11). Basically, this indicates that even though discussions about college with school counselors and teachers were the most helpful ways to learn about college, the discussions were not particularly helpful for the majority of students.

**Table 11. Helpfulness of Discussions about College with Counselors and Teachers**

“Discussions about college plans with my school counselor have been helpful.”

“Discussions about college plans with my teachers have been helpful.”

	Counselors	Teachers
	%	%
Strongly Disagree	21.85	11.25
Disagree	17.40	13.20
Neutral	34.12	35.31
Agree	19.99	29.42
Strongly Agree	6.65	10.81
Total N	2,046	2,053

**Students’ Plans and Teachers’ and Parents’ Expectations**

Students were asked about their plans after completing high school. Table 12 compares students’ post high school plans to their perceptions of teachers’ and parents’ post high school expectations for them. These comparisons are important because they indicate whether students’ plans are similar to what they believe to be their parents and teachers expectations. Almost 72% of students said that they believe their parents expect them to attend a 2- or 4-year college and almost 70% reported that they believe their teachers expect them to attend a 2- or-4 year college.

**Table 12. Post High School Plans and Expectations**

Students: “What do you plan to do in the year after you graduate from high school?”

Parents: “What do your parents expect you to do in the year after you graduate from high school?”

Teachers: “What do you think most of your teachers expect you to do in the year after you graduate from high school?”

	Students' Plans %	Parents' Expectations %	Teachers' Expectations %
Don't Know	7.53	11.56	23.33
Other	6.06	4.85	2.72
Enlist in the Military	5.33	4.16	1.12
Attend a 4-year college	53.50	57.79	60.62
Attend a 2-year college	17.46	13.71	9.14
Get a job	10.12	7.93	3.06
Total N	2,045	2,042	2,057

Correlations between students' plans, perceptions of parents' expectations, teachers' expectations, and friends' post high school plans were computed using Contingency Coefficients. The correlations for these expectations were all statistically significant (see Table 13).

**Table 13. Contingency Coefficients for Plans and Expectations**

	1	2	3	4
Students' Plans				
Parents' Expectations	.71			
Teachers' Expectations	.42	.50		
Friends' Plans	.53	.45	.38	

Contingency Coefficients  $p < .001$

All correlations represent large effect sizes, indicating that students' plans were highly related to student-report of parents' and teachers' expectations and friends' plans.

## Summary

Consistent with the literature, parental level of education was correlated with students' post high school plans for these respondents. In addition, students' perceptions of parents' and teachers' expectations for them after high school were very similar to students' post high school plans. Contrary to previous research, no gender or ethnicity differences were found in students' college expectations. The only statistically significant gender difference found in this study was that females, on average, did more homework per week than males. The results also indicated that 55% of students in this sample spent less than 2 hours on homework each week. Students in the 11<sup>th</sup> grade spent more time working at paying jobs outside of school and on homework than 9<sup>th</sup> grade students.

The majority of student respondents in this sample reported that completing a college degree was important for obtaining a successful job and for their future career. However, less than half of the respondent reported that high school had prepared them to succeed in college. Students' perceptions of parents' and teachers' expectations of what they would do after high school were very similar to their own plans. Even though students reported that counselors, teachers, and parents were the most helpful in learning about college, the majority of students reported that their counselor and teachers had talked with them very little about their college plans. Additionally, the majority of respondents did not report that discussions with counselors and teachers had been helpful.

Future research in this area should investigate whether student-report of helpfulness of college discussions with counselors and teachers change over time as the Achievers Program continues. This would enable a more thorough assessment of the program. Additionally, further exploration of why counselor and teacher discussions were not reported as helpful should be investigated. These school professionals are in a strategic position of influence with students, so there should be a greater scrutiny for how students' plans for college are nurtured. Finally, an examination should be performed to determine why many students did not think that their high school has

prepared them to succeed in college. These investigations will help pave the way for greater understanding of students' awareness of and plans for college.

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Washington School Research Center  
Seattle Pacific University  
3500 188<sup>th</sup> St. S.W., Suite 328  
Lynnwood, WA 98037  
Phone: 425-744-0992  
Fax: 425-744-0821  
Web: [www.spu.edu/wsrc](http://www.spu.edu/wsrc)

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