AIP American Institute of Physics

focus on

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Physics Bachelor's One Year Later

Data from the degree recipient follow-up survey for the classes of 2009 and 2010 combined

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REPORTS ON PHYSICS BACHELOR'S:

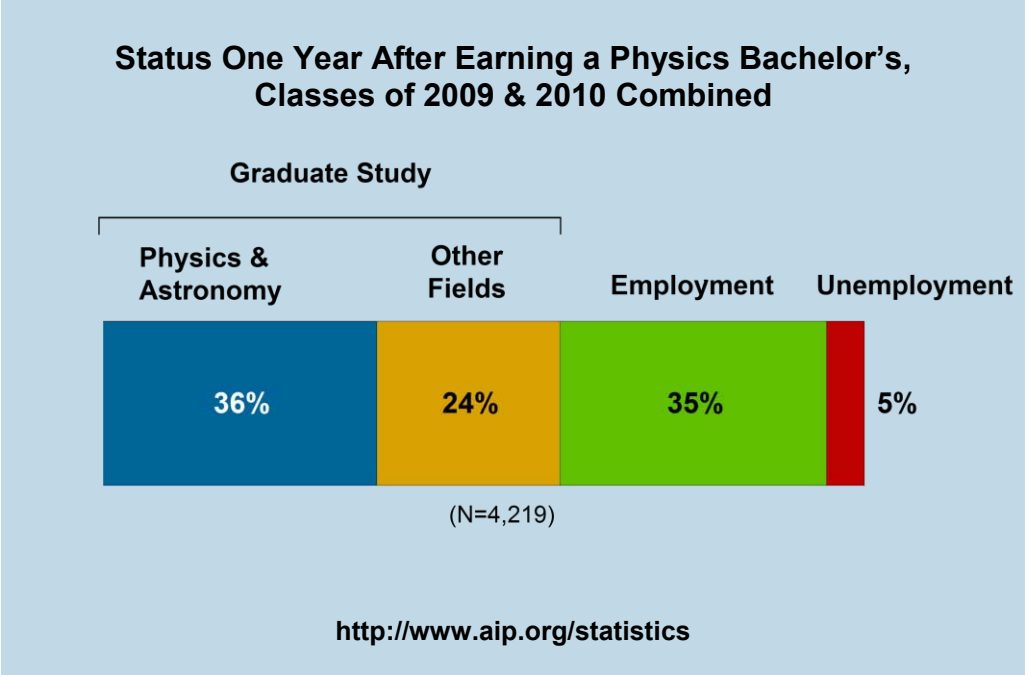
Physics Bachelor's, One Year Later (June 2012)

Physics Bachelor's, Initial Employment (*forthcoming*)

Physics Bachelor's, Demographic Profiles (*forthcoming*)

After receiving a bachelor's in physics, most new graduates either continue on to graduate school or enter the workforce in the year following their degree. Sixty percent of the new graduates from the classes of 2009 and 2010 combined chose to enroll in a graduate program. Of this group, the majority chose to study physics or astronomy.

Figure 1



THE 2009 AND 2010 FOLLOW-UP SURVEYS OF PHYSICS BACHELOR'S

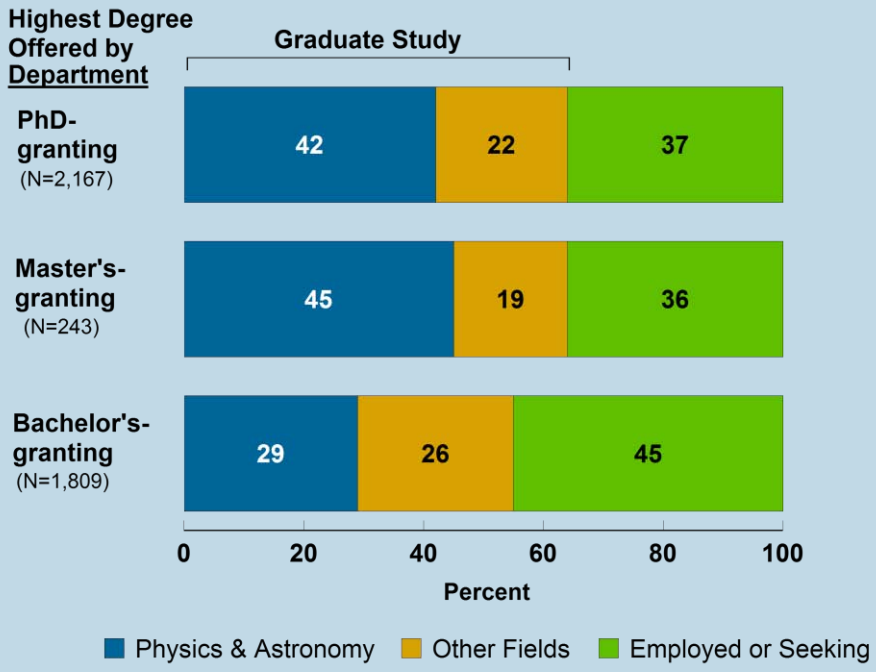
Physics bachelor's are contacted in the winter following the academic year in which they receive their degree. They are asked to share their employment or graduate school experiences. These reports describe our findings.

Enrollment in physics bachelor's programs has increased dramatically over the last decade, and the class of 2010 represented a record high for the number of bachelor's degrees conferred. For more about enrollment and degree trends for physics bachelor's, see our enrollments and degrees report series.

Physics bachelor's receiving their degrees from departments where the bachelor's was the highest degree offered were more likely to enter the workforce or pursue graduate study in fields other than physics than bachelor's from departments that offer graduate-level degrees.

Figure 2

Status One Year After Earning a Physics Bachelor's by Type of Department Attended, Classes of 2009 & 2010 Combined



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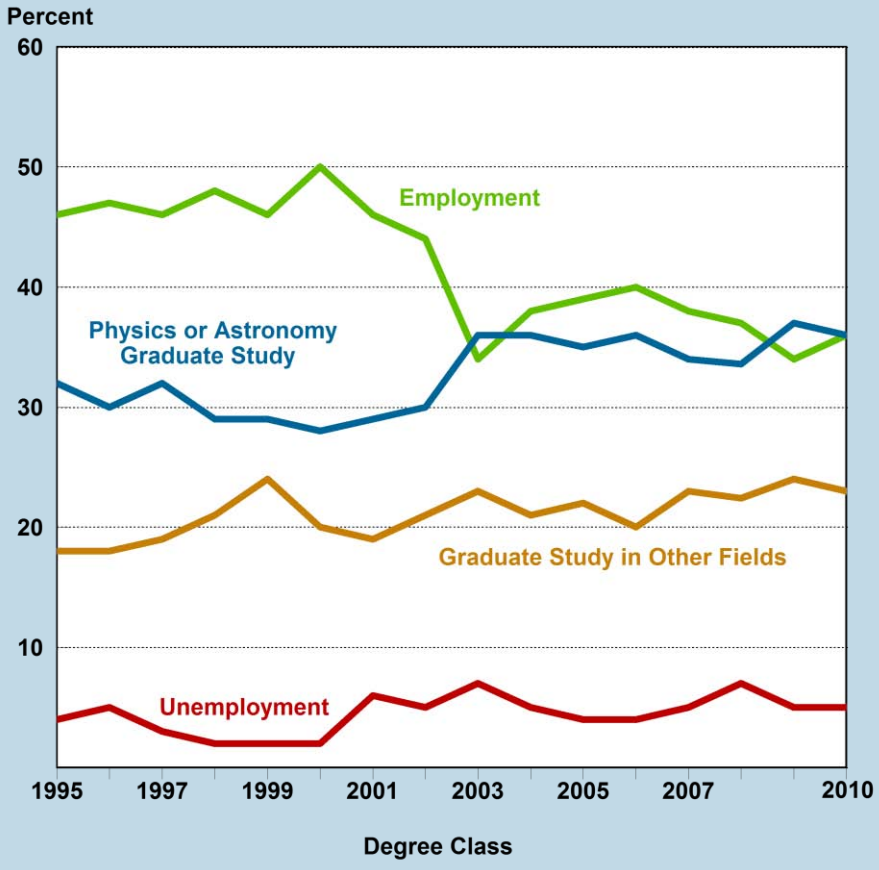
Although the distribution of initial post-degree paths chosen by physics bachelor's has changed little in recent years, there has been a shift in outcomes over the long term. Since 2003, the proportion of new bachelor's choosing to enroll in a physics graduate program has averaged about 36% and is greater than what was seen in the period 1995 through 2002 when about 30% pursued physics graduate study.

Figure 3

Trends in Status One Year After Earning a Physics Bachelor's, Classes 1995 through 2010



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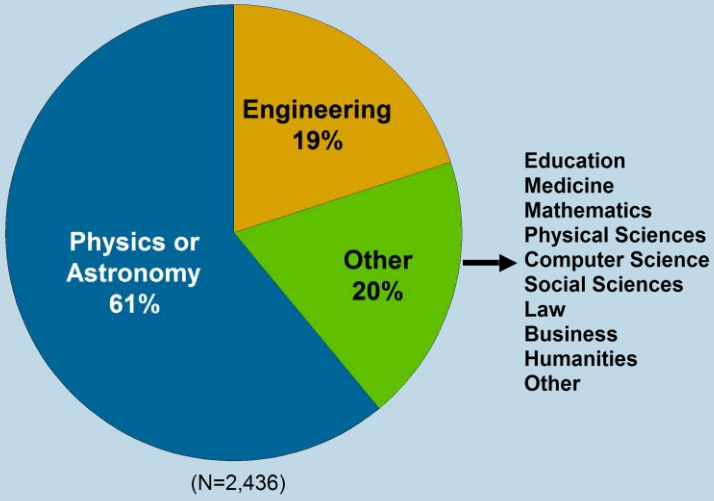
For the class of 2010, the proportion of new bachelor's accepting employment was the same as the proportion enrolling in a graduate physics program.

Details concerning the initial employment of physics bachelor's from the classes of 2009 and 2010 will be explored in the next report in this *focus on* series.

The majority of physics bachelor's who chose to continue their education in the year following their degree enrolled in a physics or astronomy program.

Figure 4

Fields of Study for Physics Bachelor's Continuing Directly Onto Graduate Study, Classes of 2009 & 2010 Combined



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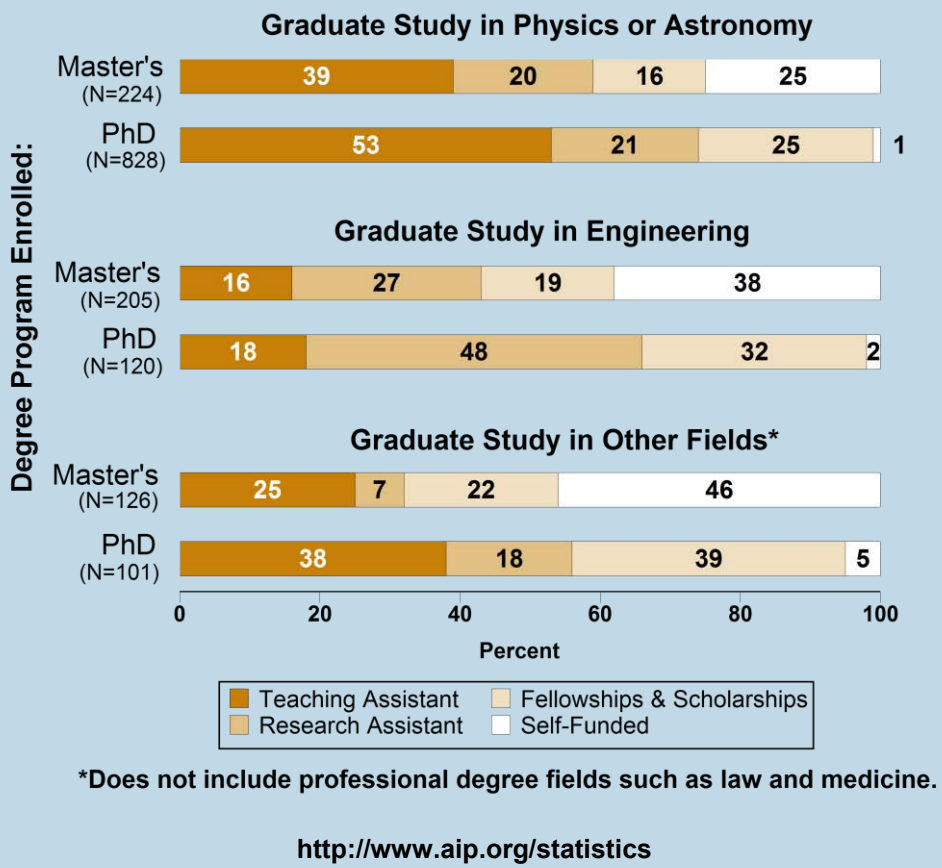
About three-fifths of the combined classes of 2009 & 2010 pursued graduate studies in the year following their bachelor's. The majority (61%) enrolled in physics or astronomy graduate programs, with 19% enrolling in engineering programs. The remainder was spread across a variety of fields. Eighty-five percent of the physics bachelor's enrolled in physics or astronomy graduate programs aspire to obtain a PhD in the field. This compares to 50% of the engineering students and 34% of the students enrolled in other fields.

Physics bachelor's continuing their education can enroll in a program that leads to a master's degree, a PhD, or a professional degree such as medicine or law. For students in master's programs, the master's may be the highest degree offered by the department, the intended highest degree from a department that also offers a PhD, or an interim degree on the way to a PhD in the same department. Although one's final degree is not determined by the type of program in which he or she first enrolls, there are clear differences in the types of funding that graduate students receive based on program enrollment. Physics bachelor's enrolled in a physics master's program are significantly more likely to be supported than students enrolled in master's programs in other fields. Students enrolled in professional degree programs are, for the most part, self-funded.

Figure 5



Virtually all physics bachelor's enrolled in a PhD program are financially supported, regardless of field.

Survey Methodology

Each fall, the Statistical Research Center conducts its "Survey of Enrollments and Degrees" which asks physics and astronomy departments to provide information concerning the number of students they have enrolled and counts of recent degree recipients. In connection with this survey, we ask for the names and contact information for their recent degree recipients. This degree recipient information is used to conduct our follow-up survey in the winter following the academic year in which they received their degrees.

Recent degree recipients can be very difficult to reach because they tend to move after receiving their degrees. Often, the department does not have accurate contact information for their alumni. To assist us in determining outcome information and to help obtain updated contact information, we contact the advisors of non-responding degree recipients.

The follow-up surveys for the classes of 2009 and 2010 were conducted using a web-based form. Up to three e-mail invitations were sent to degree recipients. An invitation was also sent by postal mail to individuals who did not respond to previous invitations.

The physics classes of 2009 and 2010 consisted of 5,908 and 6,017 bachelor's respectively. We received post-degree information on 41% of these degree recipients with less than a quarter of the information coming from the student's advisor. Four percent of the respondents were pursuing employment or graduate study outside the US and were not included in the analysis.

In this report the notation "N" represents the number of individuals about whom we received data.

We thank the many physics and astronomy departments, degree recipients, and faculty advisors who made this publication possible.