

The Early Careers of Physics Bachelors

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HIGHLIGHTS

- Five to eight years after graduating, only about one-third of people who earned bachelor's degrees in physics do not have any additional degrees (Figure 1). This report focuses on this group—physics bachelors with no additional degrees who are not primarily students.
- Three-fourths of these physics bachelors work in science-related jobs, including software, engineering, high school teachers, and managers in technical fields. The largest group—about one-fourth—are employed in software jobs (Table 1). These physics bachelors graduated in the early 1990s during the rapid expansion of the IT industry.
- 30% of these physics bachelors are still working in their first career-path job five to eight years after graduation.
- Those who are employed in software jobs are much less likely to use the parts of their education that are exclusive to physics than those employed in engineering, math, and science jobs (Figure 2).
- About 70% of those employed in engineering, math, and science rate their physics preparation highly. However, they did not rate their preparation in terms of scientific research experience, lab skills, and scientific software as highly (Figure 5).
- There are some discrepancies between how much these physics bachelors say they use some skills and how well they felt prepared to use that skill. For example, most say that they spend a lot of time working with co-workers. However, they did not rate their undergraduate preparation in this area very highly (Figure 6).
- 60% of these physics bachelors say they would major in physics again.

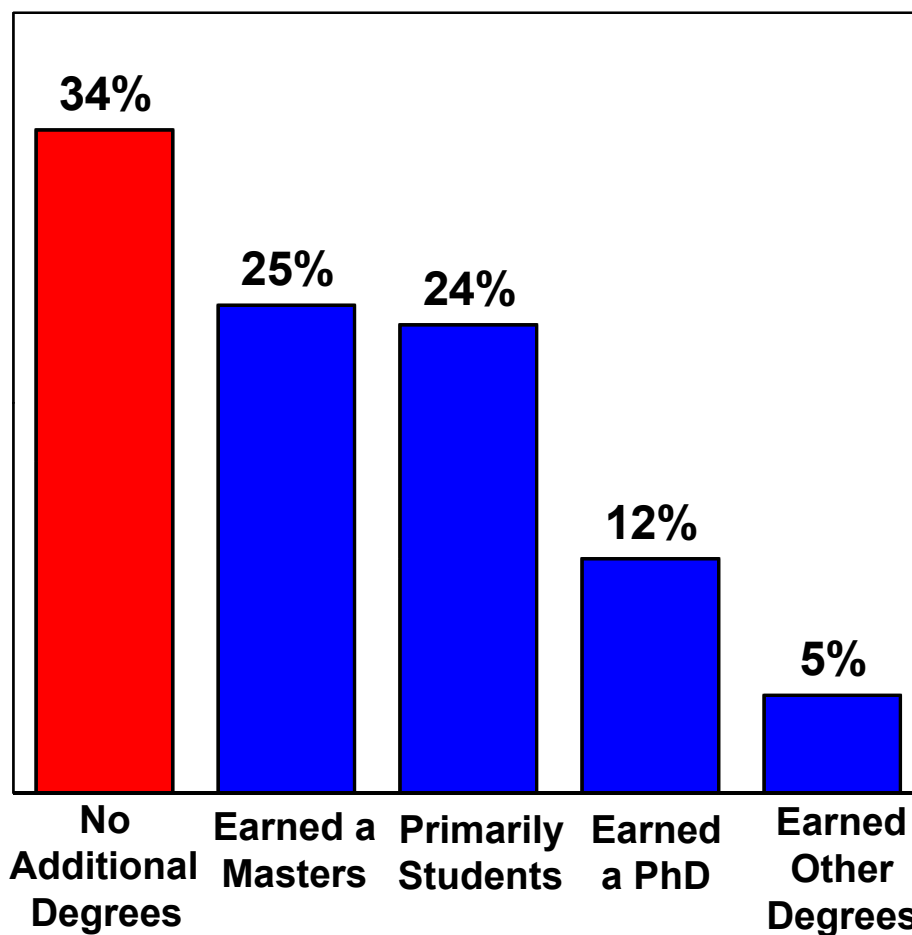
Table 1. Type of employment of physics bachelors 5 to 8 years after graduation.

Type of Job	Percent
Software	24
Engineering	19
Science & Lab Technician	9
Management, Owner & Finance	20
Education	12
Active Military	6
Service and Other Non-Technical	10

Based on physics bachelors with no additional degrees who are not primarily students.

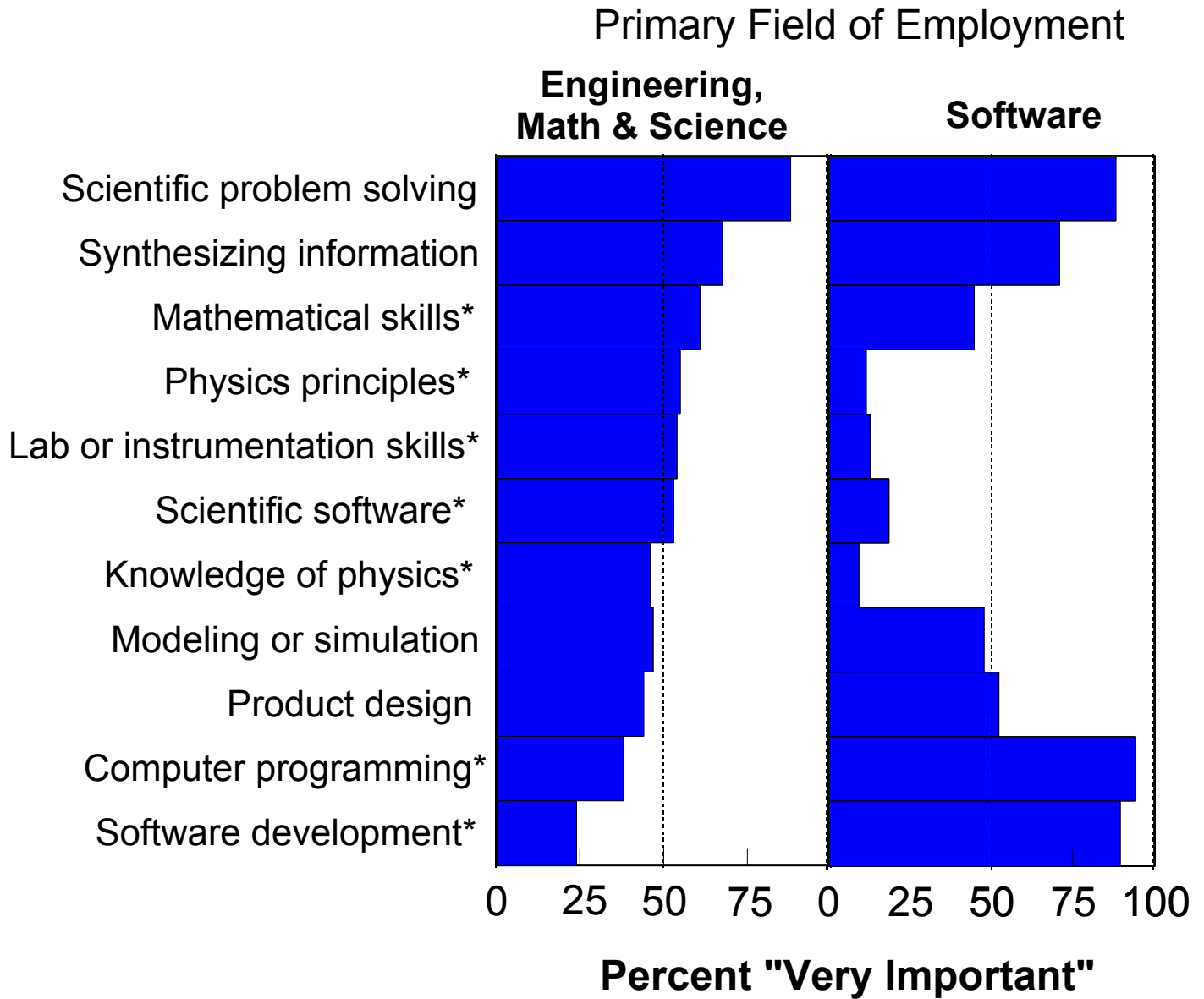
AIP Statistical Research Center, 1998-99 Bachelors Plus Five Study.

Figure 1. Highest degree obtained by physics bachelors 5 to 8 years after graduation.



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Figure 2. Knowledge and skills rated as important by physics bachelors 5 to 8 years after graduation.

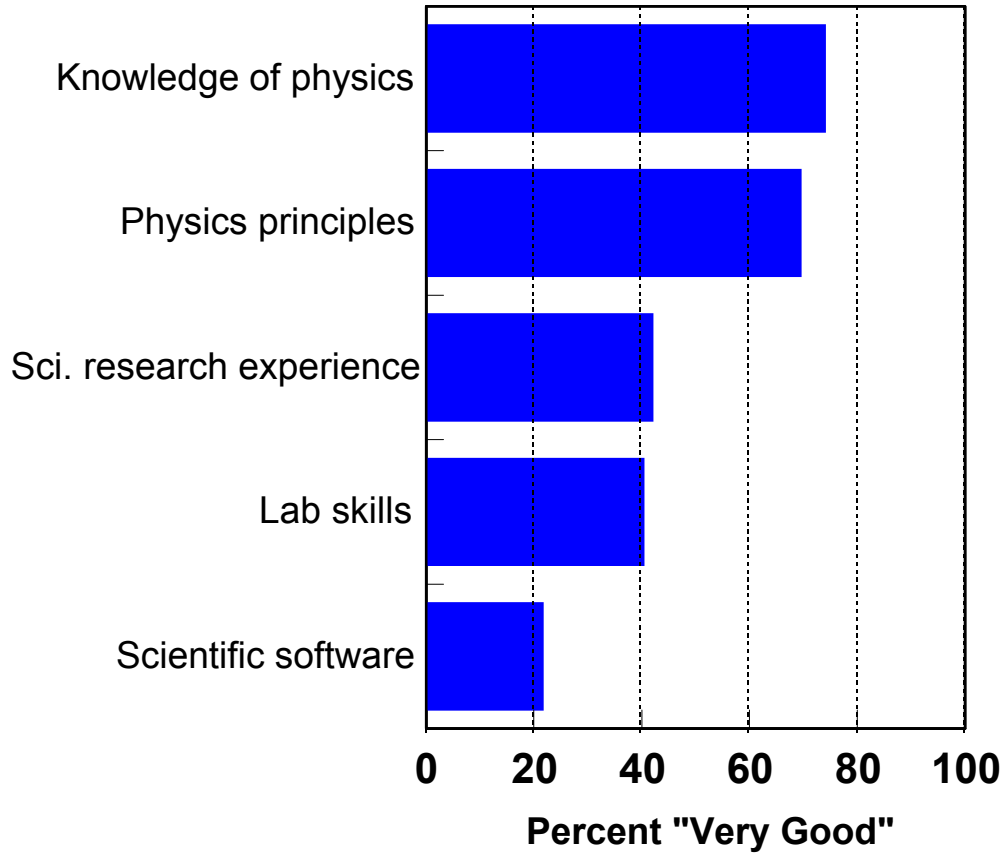


These data reflect the percentage who chose 4 or 5 on a 5-point scale where 1 = completely unimportant and 5 = essential. Based on physics bachelors with no additional degrees who are not teachers or primarily students.

*Differences between the two fields of employment are significant at $\alpha \leq .05$

AIP Statistical Research Center, 1998-99 Bachelors Plus Five Study.

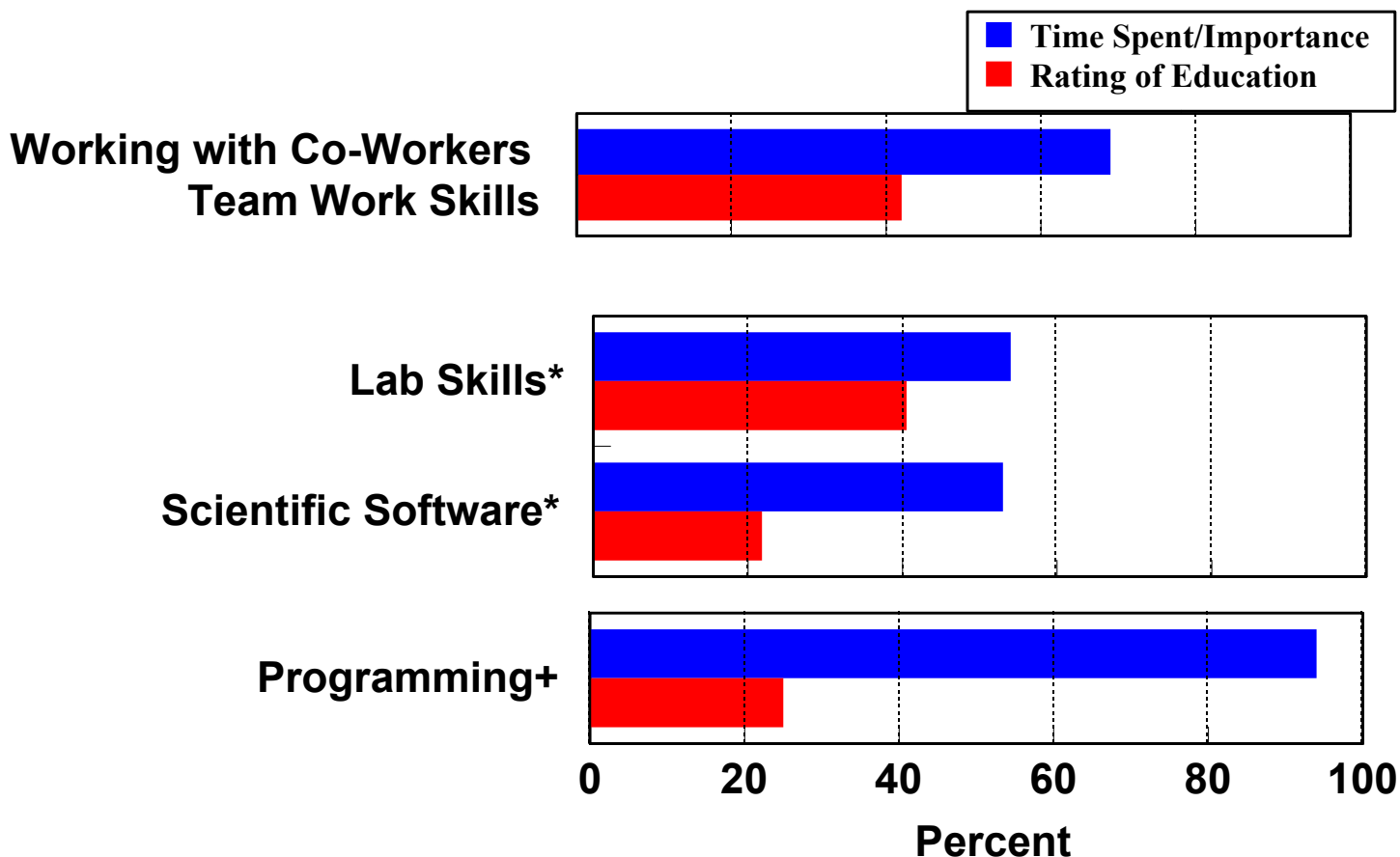
Figure 5. Rating of physics bachelors' education by those who are employed in engineering, math, or science.



The data reflect the percentage who chose 4 or 5 on a 5-point scale where 1 = terrible and 5 = excellent. The respondents are not employed in academics or in software jobs, have no additional degrees, and are not primarily students, 5 to 8 years after graduation.

AIP Statistical Research Center, 1998-99 Bachelors Plus Five Study.

Figure 6. Time spent on or importance of activities compared to rating of physics bachelors' education.



* Engineering, math and science jobs (but not teachers).

+ Software jobs.

These data reflect the percentages who chose 4 or 5 on a 5-point scale. Based on physics bachelors with no additional degrees who are not primarily students, 5 to 8 years after graduation.

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