

Results from the Longitudinal Study of Astronomy Graduate Students

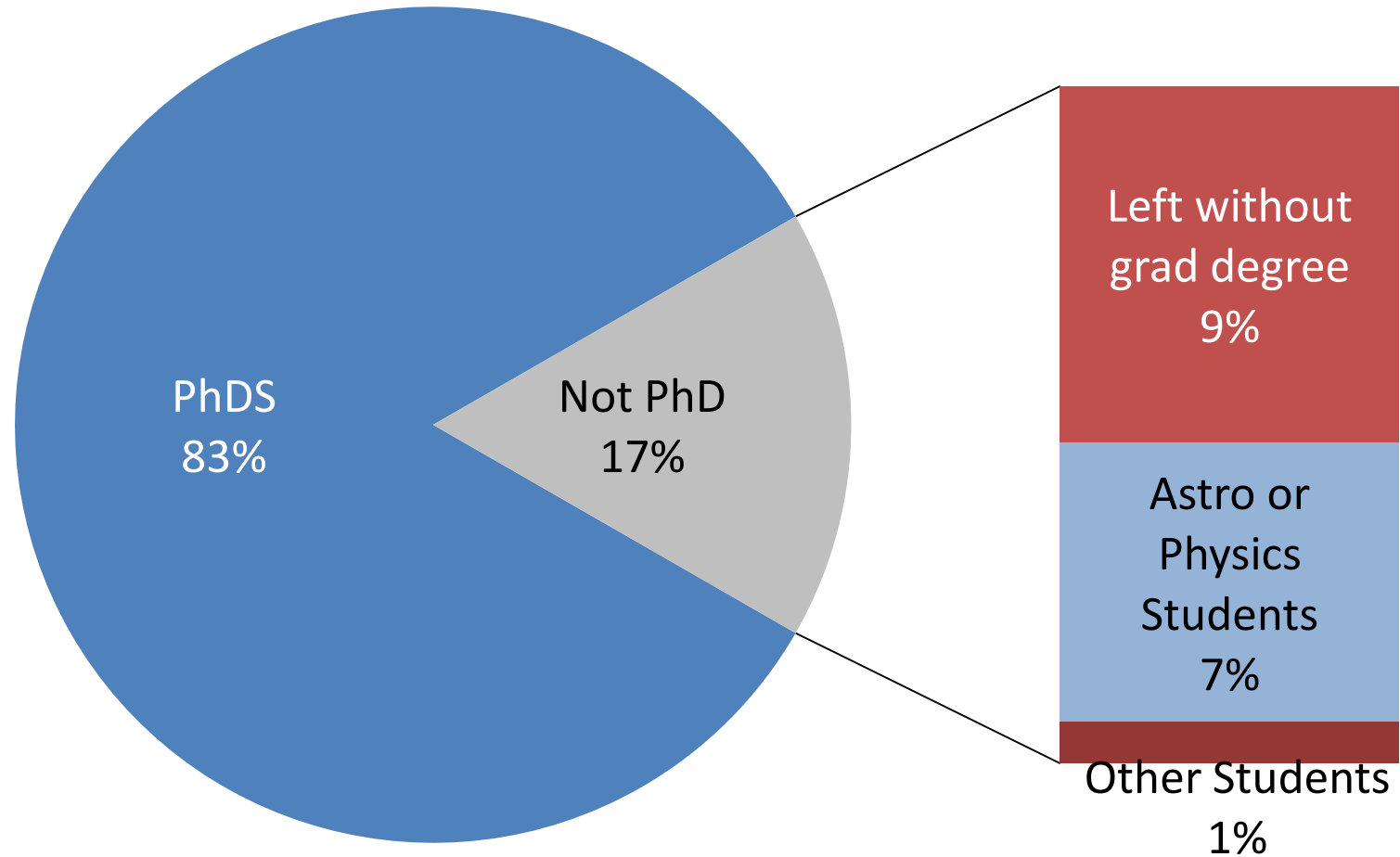
Rachel Ivie

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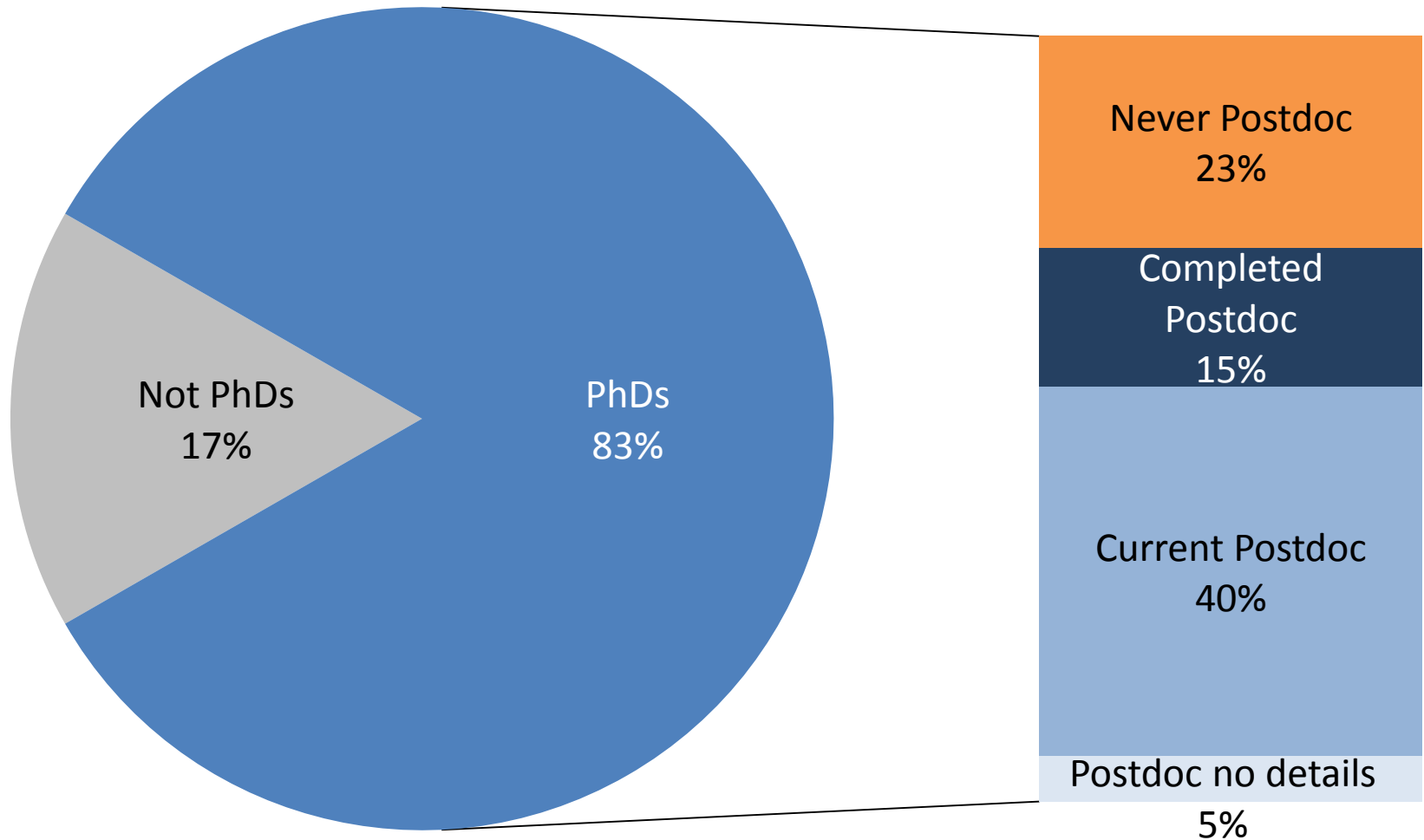
Background

- All respondents were graduate students in astronomy or astrophysics during the 2006-2007 academic year.
- First survey data collected 2007-2008.
- Second survey data collected 2012-13.

Outcomes of Those Without PhDs



Outcomes of Those With PhDs



Comparing Those Who Did Not Take Postdocs to Those Who Completed Postdocs

- Completed postdocs:
 - Median degree year is 2008.
 - Most (73%) had one postdoc.
- Took no postdoc:
 - Median degree year is 2010.

Employment Sectors

	Never Postdoc	Completed Postdoc
University	47%	61%
Federal agency (not lab)	4%	10%
Observatory	3%	9%
National lab	4%	8%
For profit	19%	6%
Non-profit	4%	2%
UARI	4%	1%
Government contractor	5%	1%
Two-year College	5%	0%
Other	4%	3%
	100%	100%

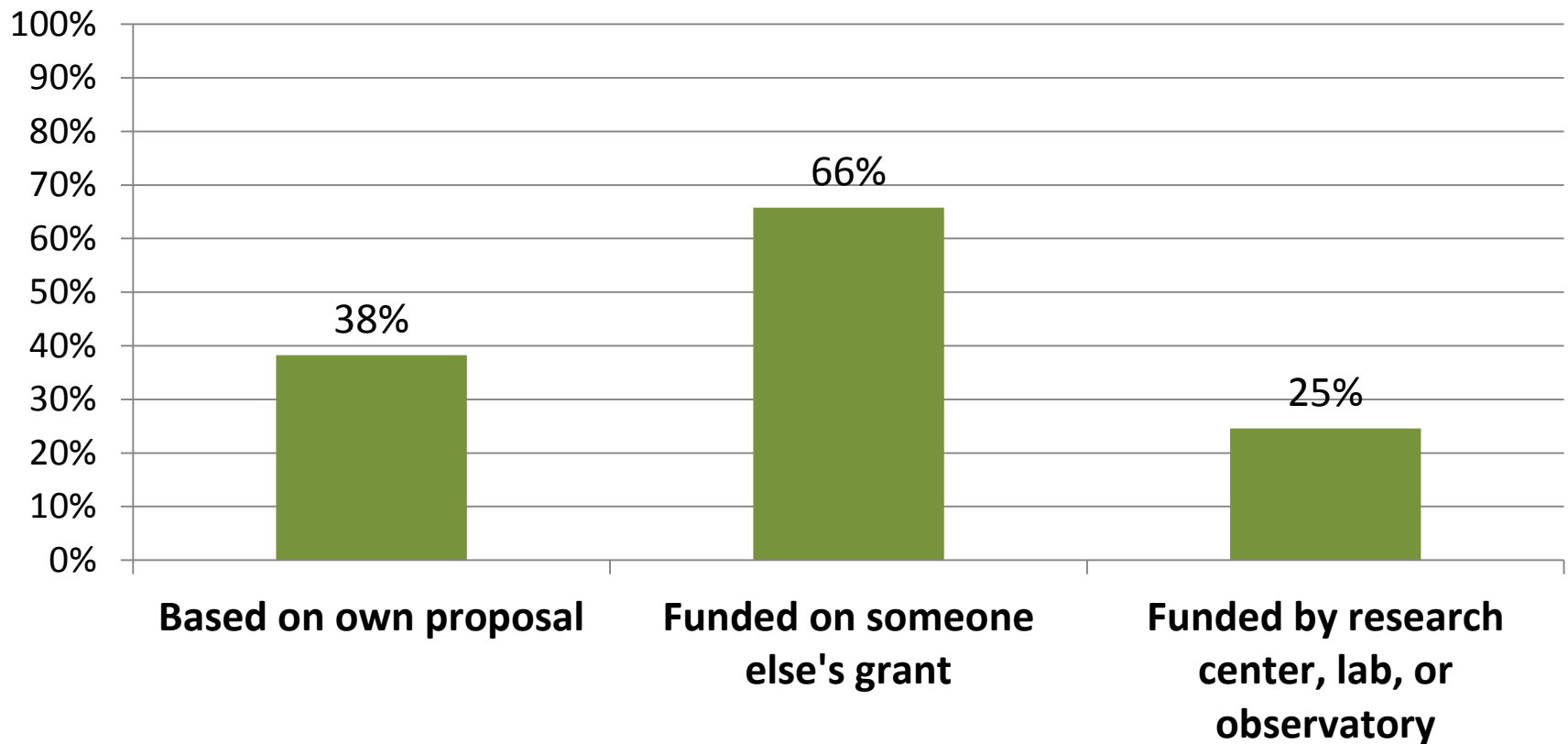
Field of Employment

	Never Postdoc	Completed Postdoc
Astronomy	38%	70%
Physics	18%	11%
Medical or Health	8%	5%
Hardware	7%	4%
Engineering	2%	4%
Earth Science or Geology	8%	4%
Business and Finance	9%	2%
Education, formal and informal	2%	2%
Software	7%	0%
Other	2%	0%
	100%	100%

Current Postdocs

- Median degree year is 2010.
- Most (61%) are in first postdoc.
- 35% are in second postdoc.

Postdoc funding sources for current and completed postdocs

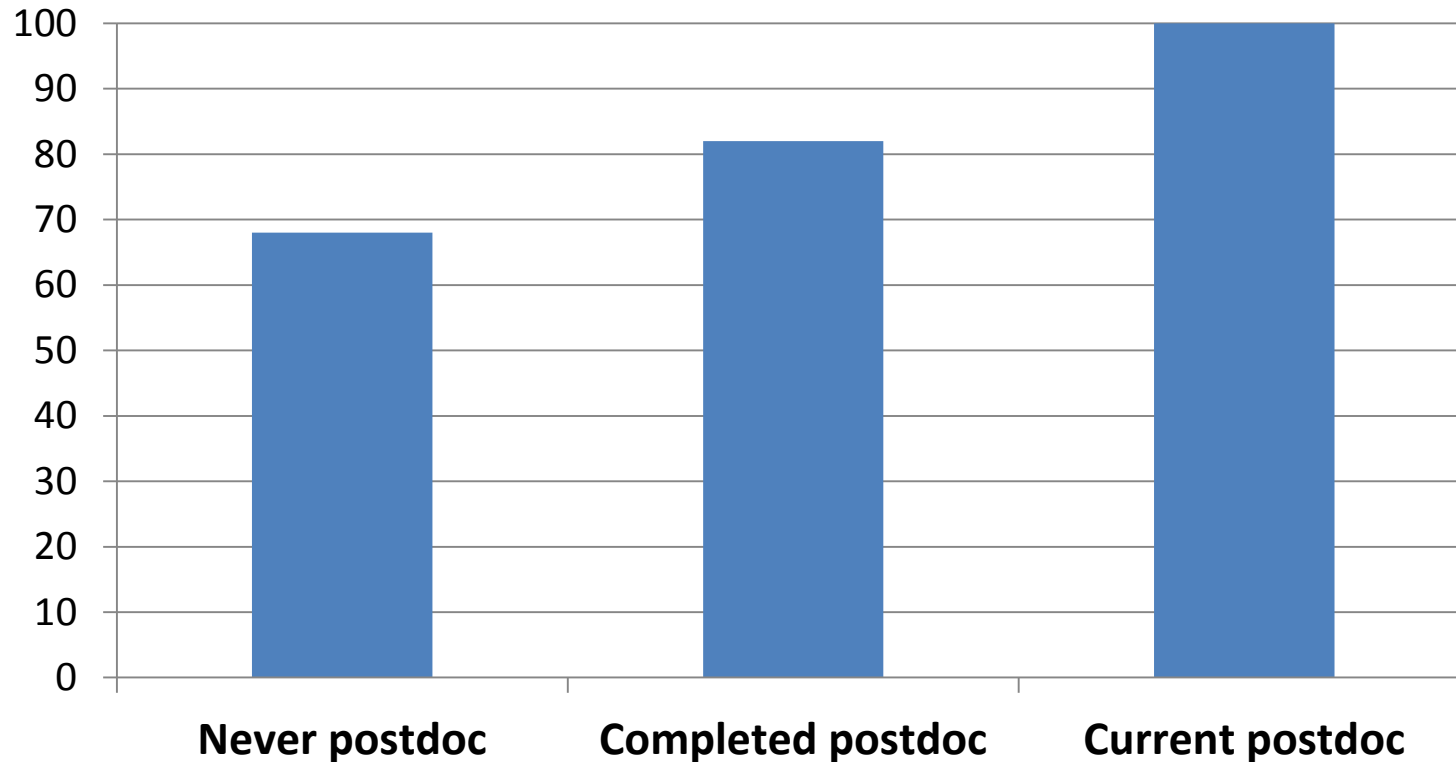


Percentages add to more than 100% because respondents could have more than one answer.

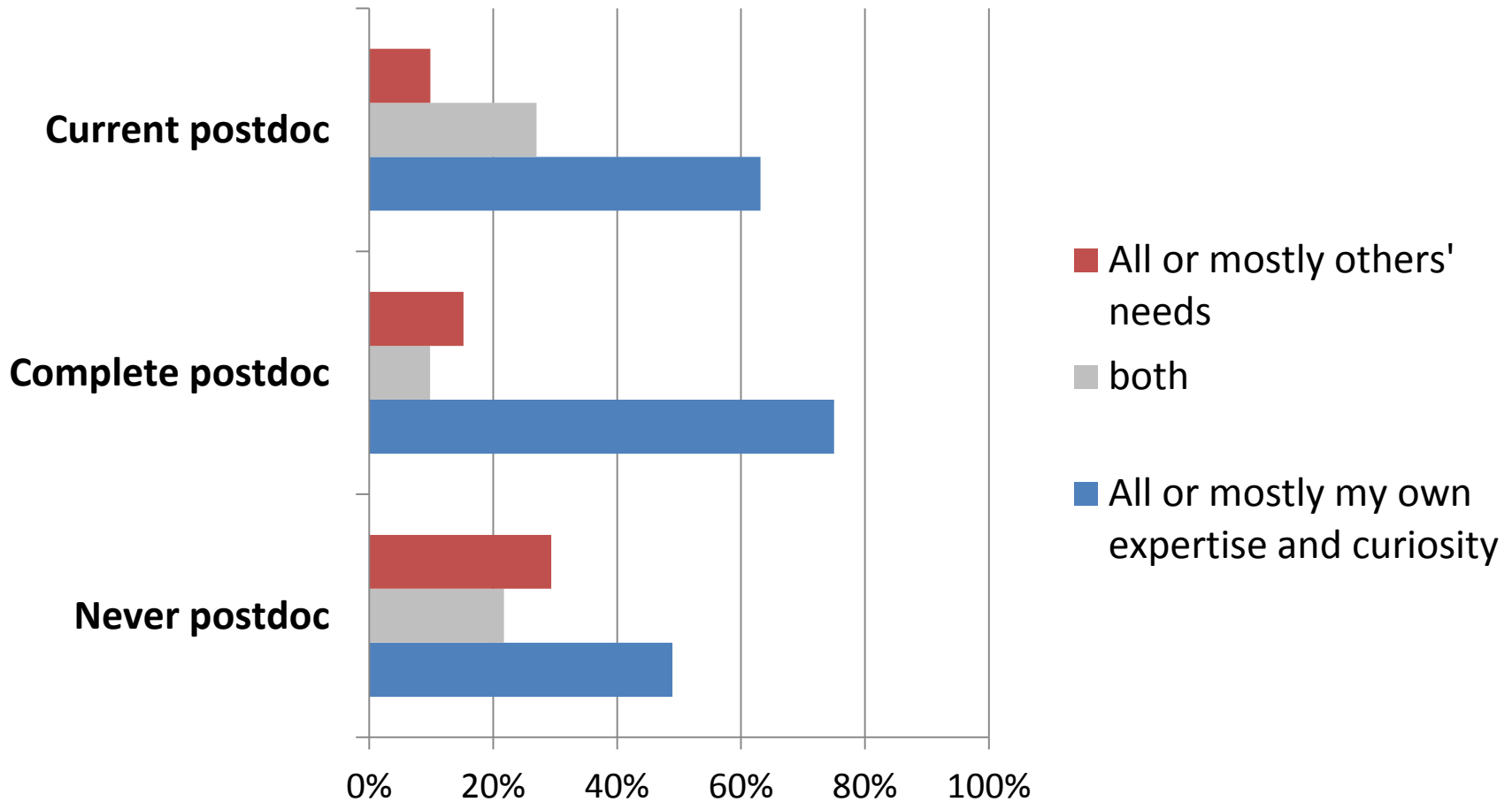
Different job experiences

- Never took a postdoc
- Completed a postdoc
- Currently a postdoc

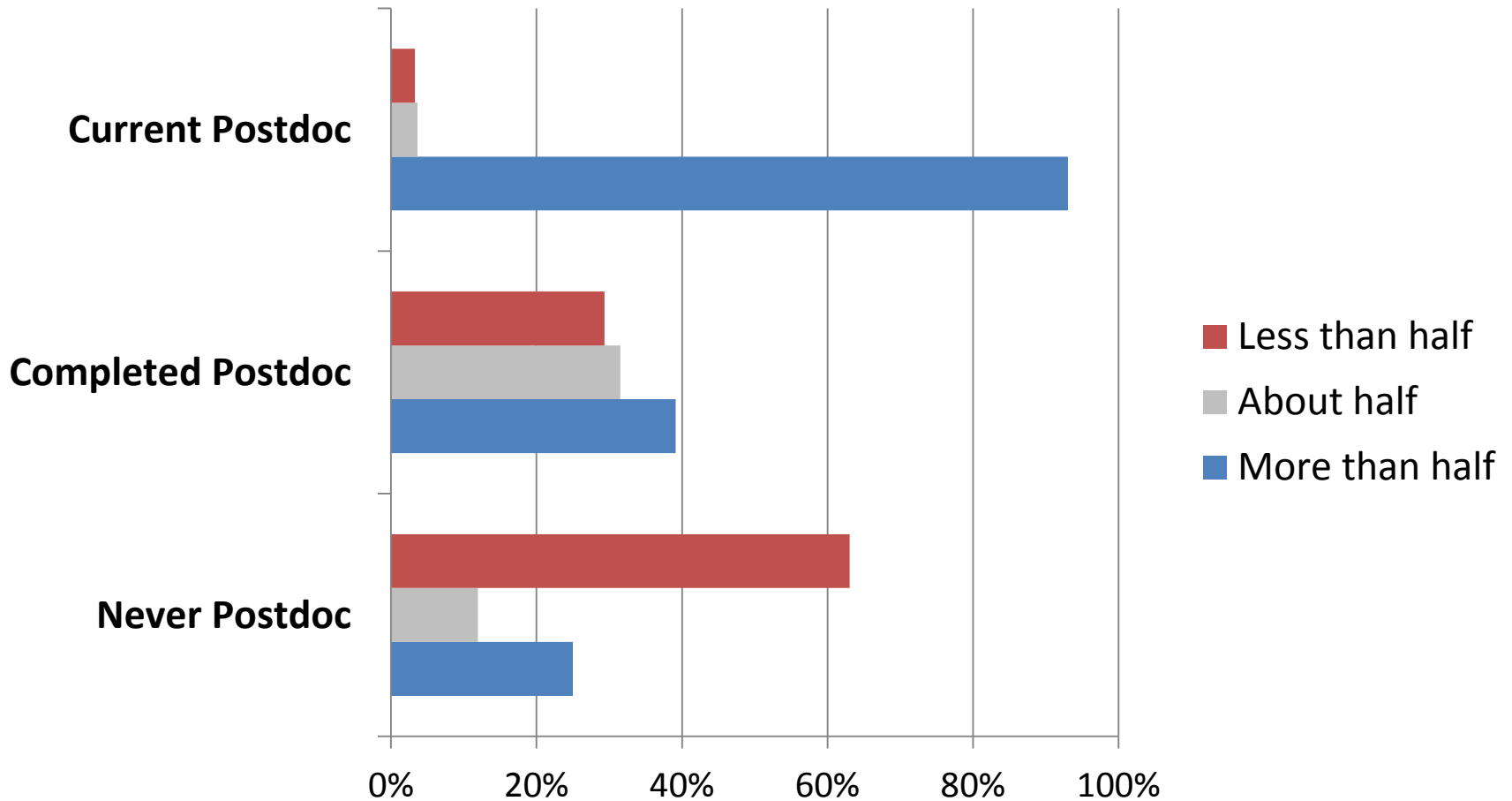
Percentage who do research in primary position



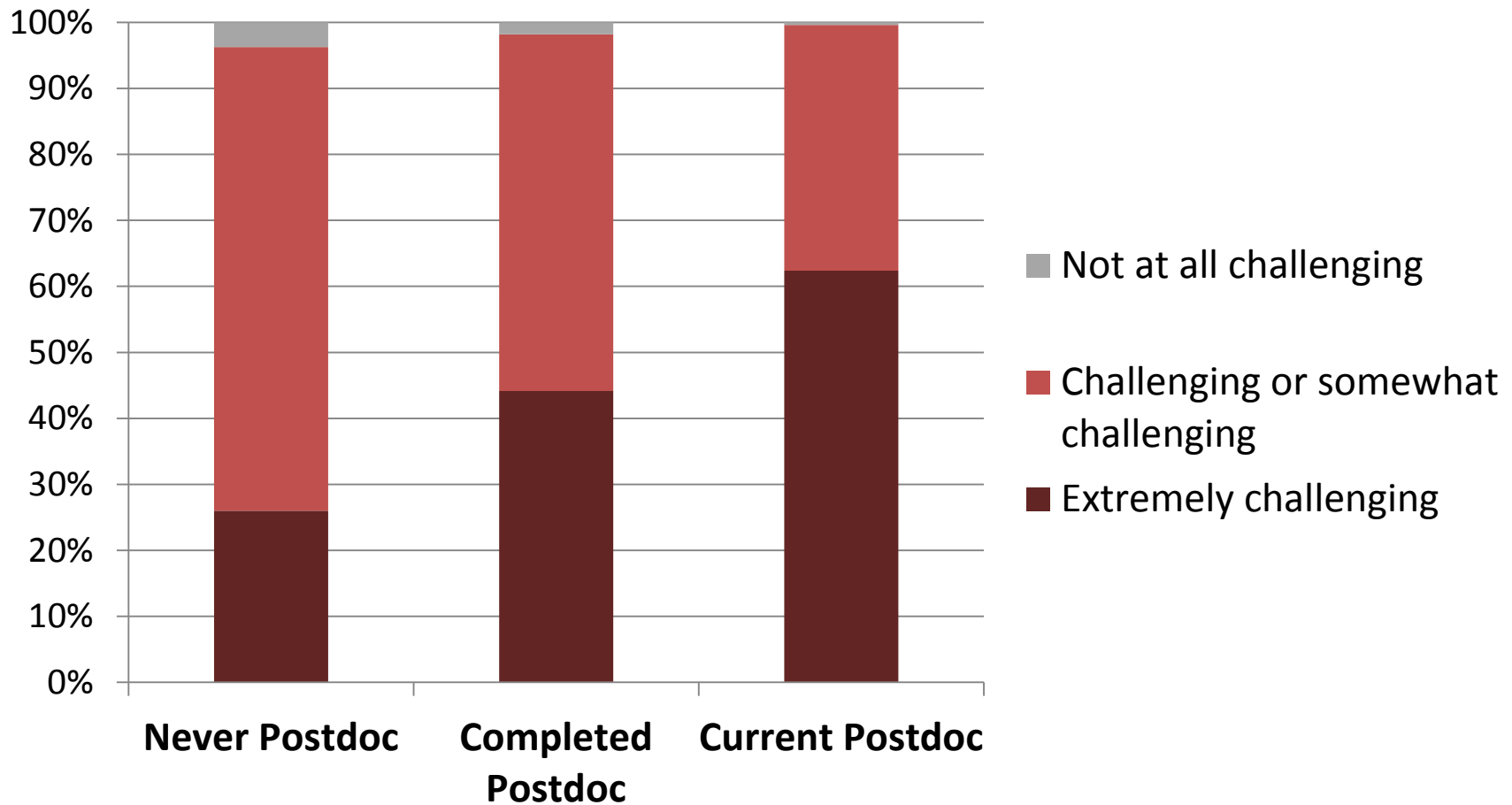
What determines research agenda?



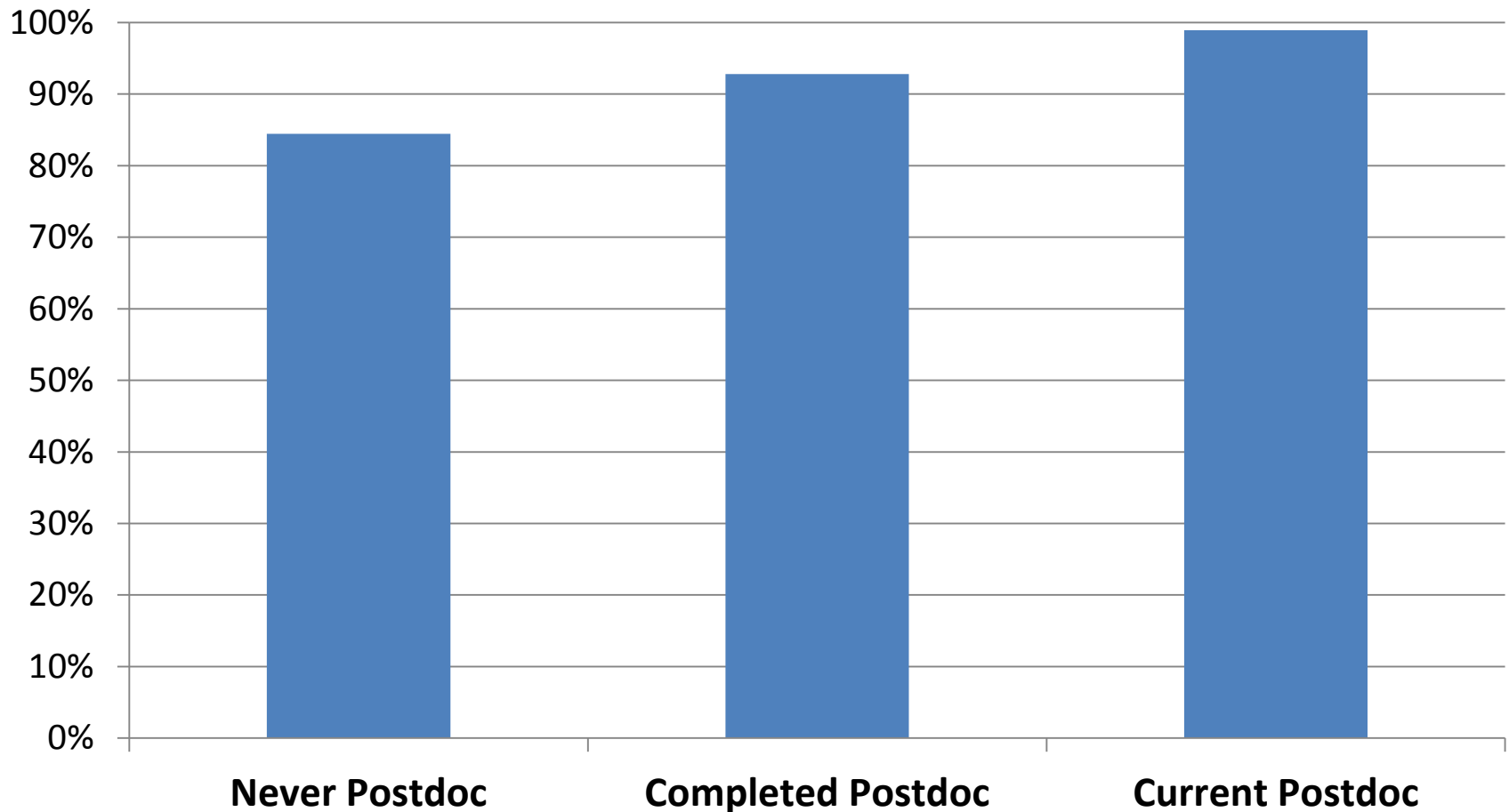
Time available for research



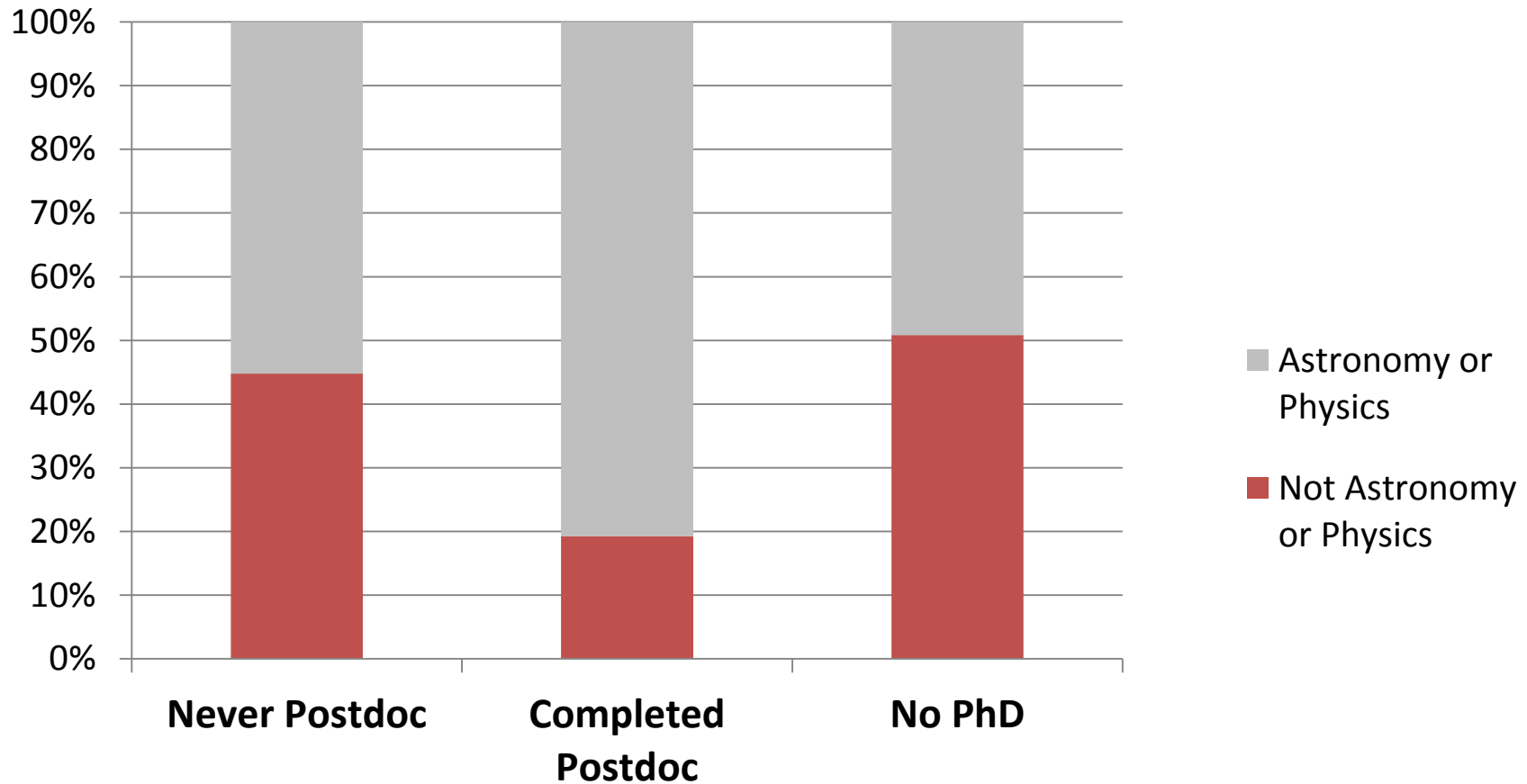
How intellectually challenging is current job?



Astronomy graduate degree is appropriate background for primary position



Working Outside Astronomy



Next Steps: Factors Contributing to Leaving Astronomy

- Examine attrition rates for women and men
- Look for effects of
 - Mentoring
 - The imposter syndrome
 - Access to career opportunities and resources
 - Funding, such as “soft money”
 - Factors such as intellectually challenging work
 - Discrimination
 - “Two-body” problem

Thanks to my colleagues Susan White and Raymond Y. Chu

For more information

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