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Why go to graduate school?

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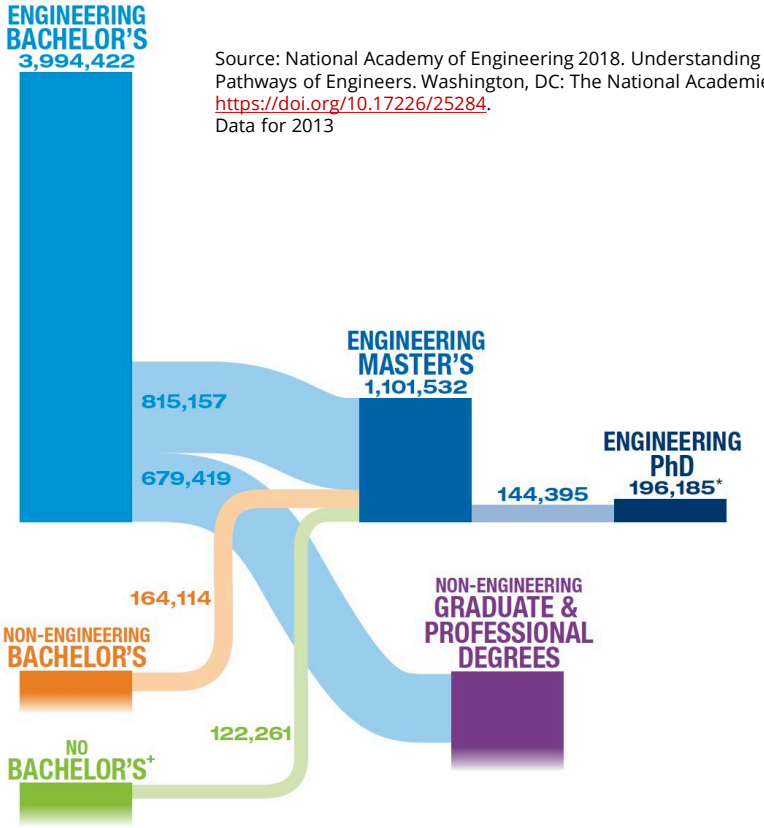
There are different pathways to a graduate degree in engineering



Source: National Academy of Engineering 2018. Understanding the Educational and Career Pathways of Engineers. Washington, DC: The National Academies Press. https://doi.org/10.17226/25284.
Data for 2013

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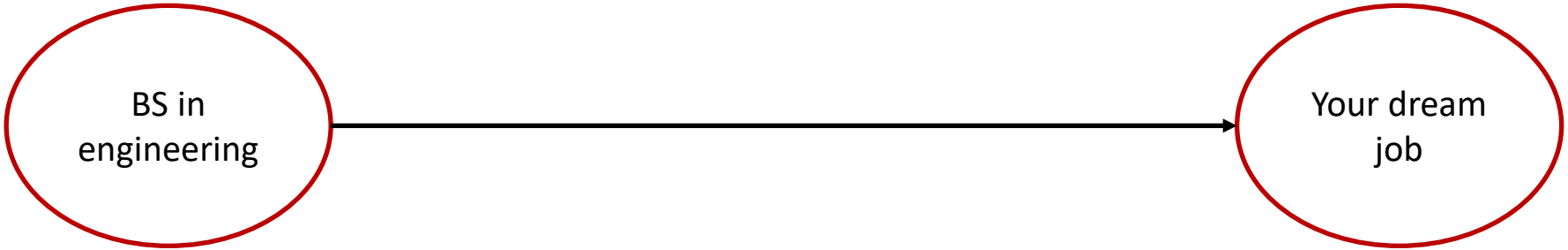
There is a difference between MS and Ph.D. degrees

Professional MS degree	Research MS degree	Ph.D.
• Builds upon the principles and practices students learn in their undergraduate program • Typically course-only and do not require a thesis • Most common • ~1 year	• Requires the student complete a thesis that requires original research • Increasingly rare • ~2 years	• Research-focused terminal degree • Requires students complete a dissertation • 4+ years

You have a BS in engineering, now what?



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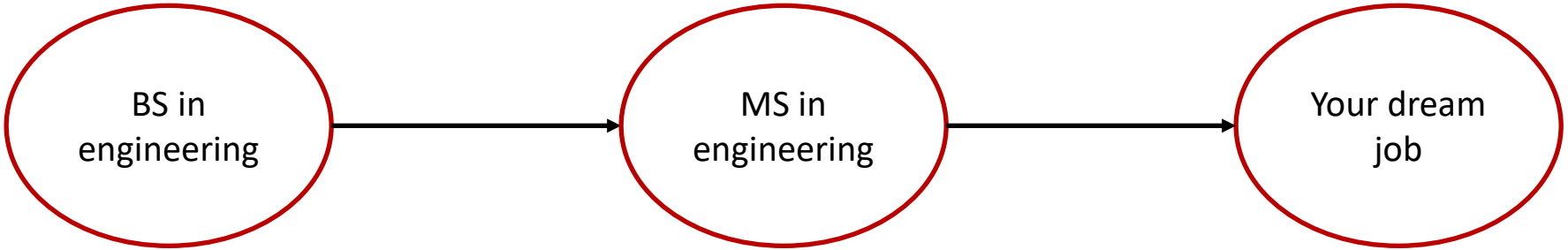

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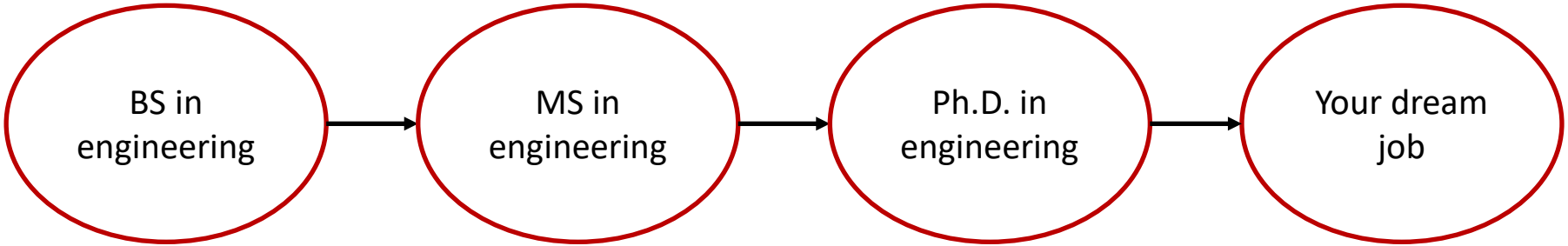

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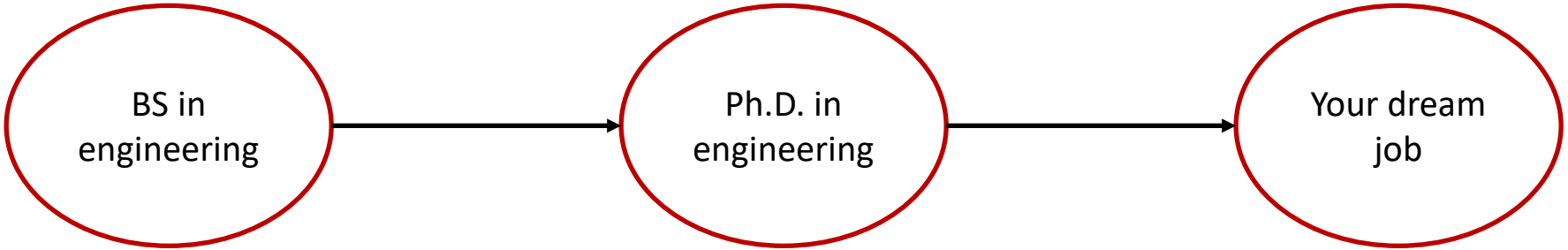
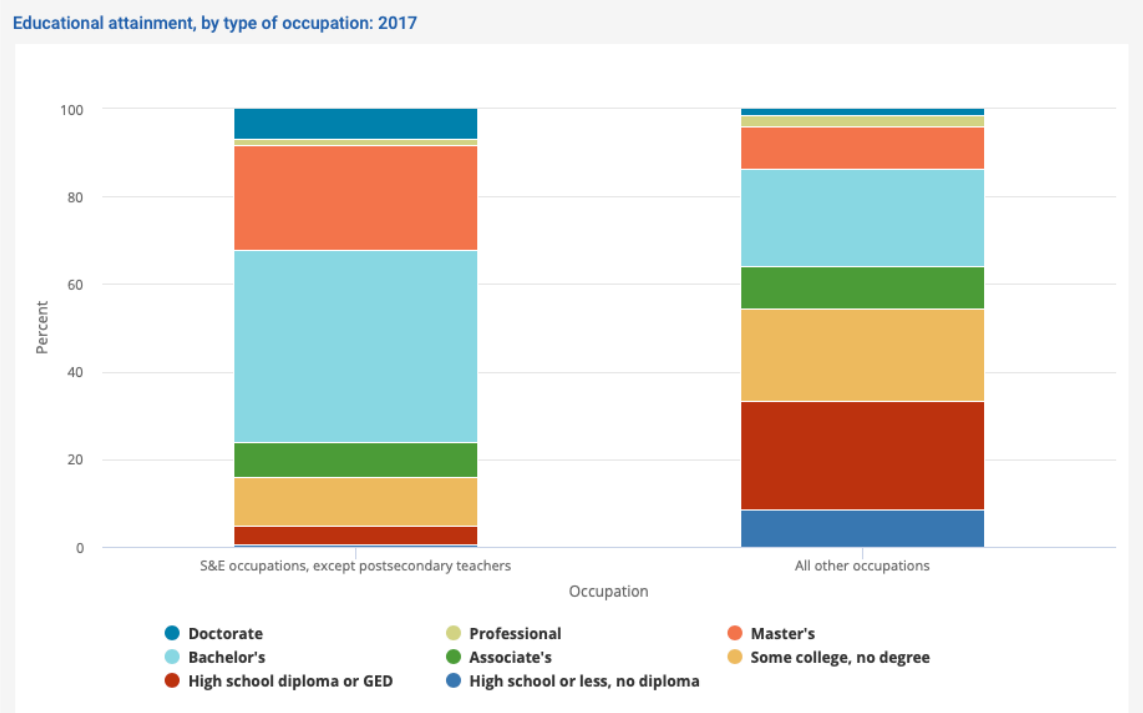


So, why should you consider going to graduate school in engineering?

Graduate degrees are increasingly important in STEM fields



National Science Board, National Science Foundation. 2019. Science and Engineering Indicators 2020: Science and Engineering Labor Force. Science and Engineering Indicators 2020. NSB-2019-8. Alexandria, VA. Available at https://ncses.nsf.gov/pubs/nsb20198/.

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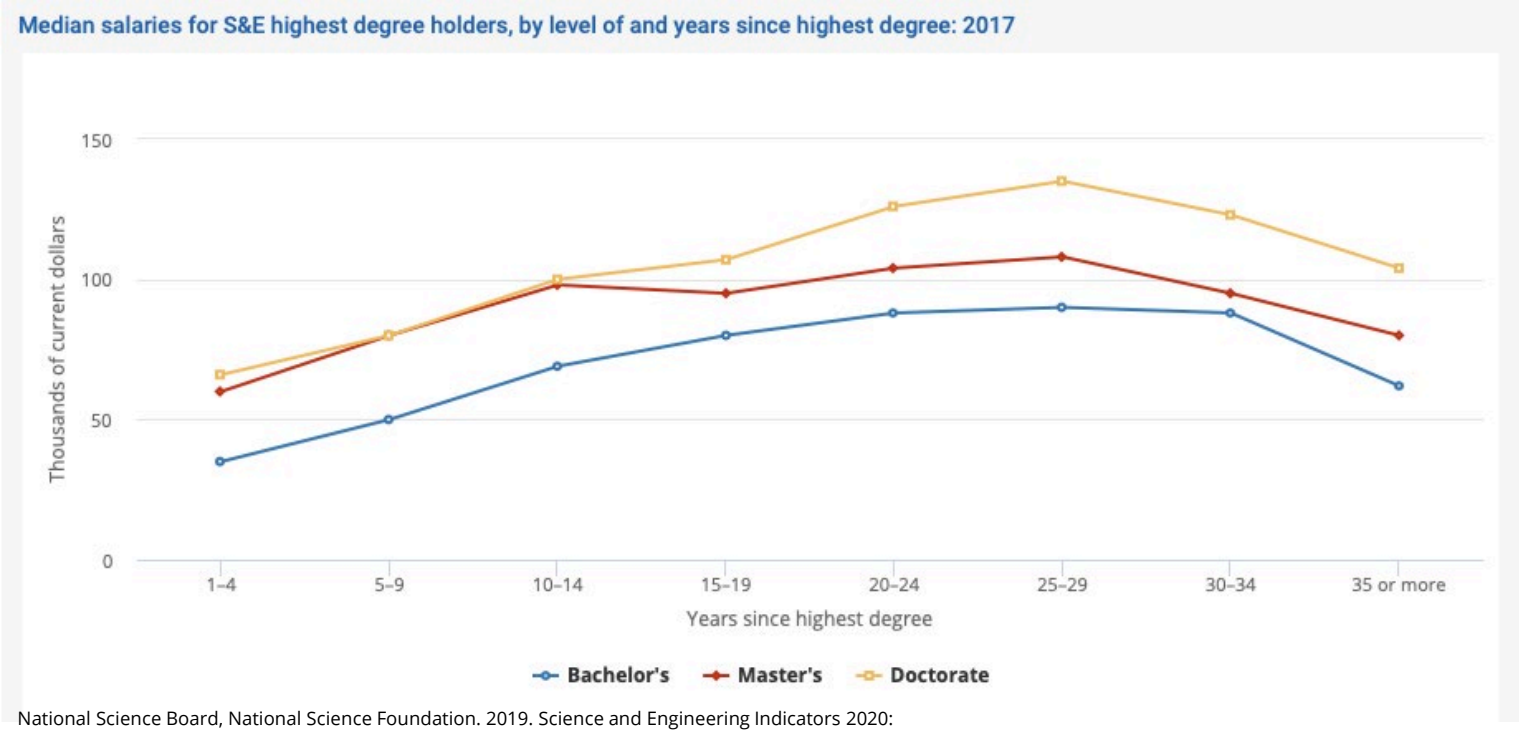
Engineers with a graduate degree have higher mean salaries



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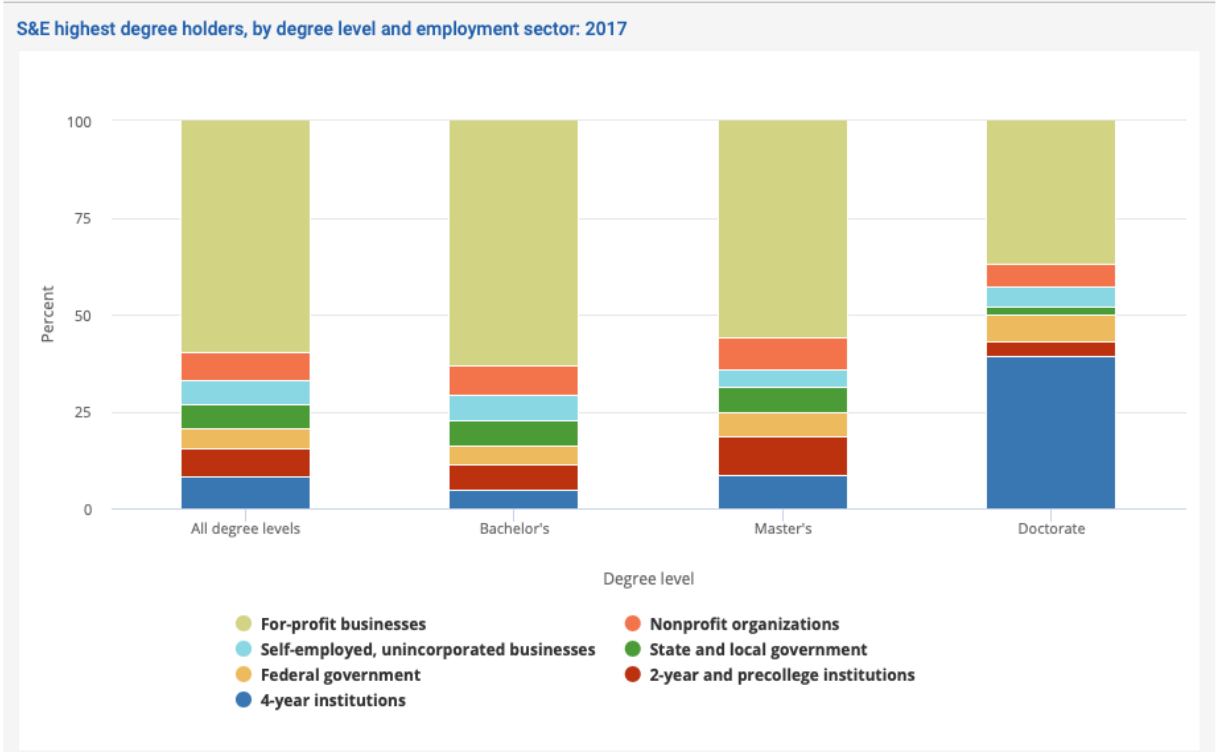
Engineers with graduate degrees participate in all employment sectors



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If you are thinking about pursuing a Ph.D., here are some things to keep in mind

If you enjoy constantly learning and doing research, a Ph.D. may be for you

It is a myth that a Ph.D. is only good if you want to be a professor

Some jobs require that you have a Ph.D.

- Academia and National Laboratories
- Advanced technology companies

Your research advisor matters more than the name of the institution

Your current area of study does not dictate what you have to do in your Ph.D.

The research you do for your Ph.D. thesis does not dictate what you do for the rest of your life. In a Ph.D. you “learn to learn”

You should not pay “out of pocket” for a Ph.D.

Getting a Ph.D. is hard. There is an opportunity cost, and it can be emotionally exhausting. But, it can also be extremely rewarding.

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