

# Faculty Survey about General Education Requirements in Science and Math at DePauw



What could be improved?

Response  
Count

35

answered question

35

skipped question

6



**Page 2, Q1. What could be improved?**

1	Number of required science and math courses and areas of exposure. Given that 99.99999+% of the universe is non-human (at least based on our current knowledge), students should have some fundamental idea of what the natural world/universe is made of, and, how the natural (non-human) world/universe works (in addition to exposure to other fundamental areas of scientific understanding).	Nov 7, 2013 10:11 PM
2	I think these courses, especially the lab component, need to more closely model how scientists actually work. Also, for the purpose of general education, the courses need to be more closely tied to students' life experiences so they can better connect the concepts they are learning to things that matter to them.	Nov 7, 2013 11:24 AM
3	It should be more prescriptive, such that there it is more clear what the students are getting from the experience (science literacy, etc.).	Nov 7, 2013 10:59 AM
4	It may be beneficial to offer a class specifically for nonmajors where bigger picture topics and approaches can be employed to cover topics relevant to their interests.	Nov 7, 2013 10:25 AM
5	I would like some sort of system that guarantees all students are exposed to the scientific method. Now they can complete the requirement by taking Math, Computer Science, Logic, or Anthropology and I'm not sure how much these courses stress the scientific method or scientific literacy. I certainly feel that those are also important courses, so I'd like to see the requirement expanded. In an ideal world, I'd like to see all of our students taking a math course, a course emphasizing the scientific method and literacy and ideally a science lab.	Nov 5, 2013 9:49 AM
6	Short of requiring a science in at least two departments (I'm not saying a math course shouldn't be required) I'm not sure what could be improved. It might be interesting to see what could be done with science across the disciplines. In a writing course or a communications course for instance we might be able to work with faculty to get them to use a science topic or two that addresses what we might consider to be a central concept or topic.	Nov 5, 2013 8:31 AM
7	Few, if any, of the classes were designed for scientific literacy.	Nov 4, 2013 1:03 PM
8	Nothing.	Nov 4, 2013 11:17 AM
9	I would recommend requiring that one of the courses be a lab course and that one of the courses be a natural science (non-human).	Nov 4, 2013 10:42 AM
10	Consistency in what we want the students from an introductory course to walk away with. Even if they end up not liking the subject there should be some take away message that sticks.	Nov 4, 2013 10:37 AM
11	I'm in favor of integrated intro courses- that is, courses that have a mix of science and non-science majors. It's what we do now, but I suspect many of our intro courses are not designed with the non-major in mind. I truly believe that teaching an intro course with the idea that it may be the only science course your students have will make it a good class for both groups of students. We need to talk about that as a group, for starters.	Nov 4, 2013 9:01 AM
12	Perhaps a more general kind of science class that would meet the reqs for non	Nov 4, 2013 8:55 AM

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	majors would be better.	
13	I think our system is pretty good, frankly. I would hate to see a top-down approach telling faculty what they need to include in their classes for students. However, I do think it would be great to have faculty development support for more discussion on S&M classes and how to teach it. There may be some common goals we could discuss that people might subscribe to.	Nov 4, 2013 8:22 AM
14	We need a lab course requirement. Doing science is very important.	Nov 4, 2013 7:00 AM
15	We should publicize more: I don't know what the courses are. Do non-science advisers know? Of course, more courses. I'm currently really unhappy with students with really poor Q preparation who were placed by summer registration people in my CS1 or whose advisers signed off on their choosing the class. We are setting FY up to fail! We want FY to learn something about science -- something they can use in their lives -- and not sit in our classes in frustration and failure.	Nov 3, 2013 11:38 PM
16	I am unsure, but possibly a brainstorm regarding what it is we want know about science and/or how science is used by those who are a part of the science field and maybe more importantly how science is used amongst those who are not a part of the science field (i.e. within our society).	Nov 3, 2013 11:11 AM
17	I would consider adding one or more interdisciplinary or multi-disciplinary courses that could count toward the requirement. For example a course that explore an issue such as global warming from several (science and math) perspectives would be fine with me and probably more interesting to some students.	Nov 2, 2013 8:43 AM
18	Not all current S&M should be considered S&M courses,	Oct 31, 2013 6:42 PM
19	The rationale for requiring two courses. Without a clear sense of why we believe students should know something about science and math, it is hard to know how many courses and what type of courses/experiences matter. The same is true, of course, for AH and SS courses, and for QWS courses.	Oct 31, 2013 4:51 PM
20	The skills and more importantly, the attitude of students towards education in general and science in particular	Oct 31, 2013 12:51 PM
21	I think we should focus on having specific courses that are crafted to teach non-majors about the scientific method. These courses would also be a good place for students who know they want to be science majors to hone basic knowledge about science. I would like to have as some of the outcomes that students would be able to access claims about science in the popular press and also that would be able to make good decisions about medical treatments.	Oct 31, 2013 11:42 AM
22	It would be nice if there were some way to know that all students have some common SM background, regardless of what courses they take.	Oct 31, 2013 10:36 AM
23	Given the nature of science I really find it a loss that one of those two doesn't have to include a laboratory component. Also, if I had my druthers I'd strengthen the requirement and require two science classes with lab plus a math and/or computer science. Given how technical our world is and how many decisions	Oct 31, 2013 9:26 AM

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	everyone makes daily that depends on an understanding of science and big data having strong exposure to both science and math I think is important.	
24	Obviously, I think the more science a student has, the better. However, I don't see how we could require more science courses without requiring more AH, SS, and LA courses as well. And I don't want to add that many more requirements.	Oct 31, 2013 9:18 AM
25	the number of non-major offerings in our department	Oct 31, 2013 9:16 AM
26	There is no intentionality to our science/math requirement. We hope that -- by taking two courses that are hopefully of interest to the student, but may sometimes just be out of convenience or the easiest option -- students will gain specific disciplinary knowledge and also gain some kind of broader scientific perspective that transfers across disciplines. But, as a division, we have no coordination that ensures (or even encourages) development of a common set of skills or perspectives, so I think most students -- especially non-majors -- don't make meaningful connections that will facilitate their becoming informed citizens.	Oct 31, 2013 9:10 AM
27	I don't think students should be required to do a lab. This makes science scarier for many students and they aren't taught in a comfortable way across the disciplines so I prefer that we have classes that stress the nature of acquiring scientific knowledge than labs that make students hate science. General course that teaches general science concepts and methods could be good.	Oct 31, 2013 9:07 AM
28	Adding a laboratory experience for all students, or requiring that one of the courses taken has an experimental lab	Oct 31, 2013 8:59 AM
29	Its intent is unclear. Courses that count should meet certain well-defined science literacy objectives. (I'm aware that developing these will involve consensus-building and compromise, but even an imperfect vision is vastly preferable to the present system with no standards whatsoever.) We should be at least as particular about what "counts" as is the writing program in their stipulations concerning FYS and W courses. It's also problematic that math/science/computer science are all lumped. It might even be better to develop a multidisciplinary science course with a strong science literacy focus and make it mandatory for all students, with the second course of the requirement a semi-free elective. As it stands, I understand many students find our requirement vastly weaker than our peer institutions to the point that it's a drawing card for prospective students seeking to avoid science requirements. That is an embarrassment.	Oct 31, 2013 8:48 AM
30	An investigatory/lab component. Going to a model more like languages-requiring a "second semester" proficiency. Better standards about what the requirement should mean in terms of skills and content	Oct 31, 2013 8:27 AM
31	No guaranteed laboratory experience. Taking calculus after you've had it in high school doesn't seem like a good way to meet the requirement.	Oct 31, 2013 8:21 AM
32	I would like to see courses designed for the LA major; application courses showing practical applications of important concepts.	Oct 31, 2013 8:18 AM
33	I can't think of anything	Oct 31, 2013 8:16 AM

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34	Realisitcally, nothing.	Oct 31, 2013 8:12 AM
35	I actually think the SM courses that count for the distribution should have some substantial and intentional numeracy and/or scientific literacy component, involving data interpretation and systematic reasoning, etc.	Oct 31, 2013 7:55 AM