

Alumni Survey Comments

2007 Survey

BSYear

1999

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Please rate the ChBE Program's effectiveness in preparing you to apply chemical engineering fundamentals.

I think they did an excellent job, however my first 5 years didn't use it. Now that I can use Chemical Engineering, I need to remember it all. The principles are still there (chemical reactions, mass balances, thermo, etc) but the application of equations is missing.

Please rate the ChBE Program's effectiveness in preparing you to be a proactive problem solver.

Many classes at MSU taught me to think "out of the box". We had a problem with a pump that required me to learn all about that type of pump and solve it (even though we didn't spend much time on chemical pumps). The problem was solved and everyone is happy.

Please rate the ChBE Program's effectiveness in preparing you to pursue lifelong learning.

My Master's degree program taught me to learn. I feel I'm constantly learning new stuff. Right now I'm learning about water purification.

Please rate the ChBE Program's effectiveness in preparing you to be an effective communicator.

I feel I do a fair job of communicating. I don't know if the school is what taught it to me. I do remember our speaking class and I still apply some principles from it. I remember also the many writing assignments we did. My job is writing so it prepared me in that aspect.

Please rate the ChBE Program's effectiveness in preparing you to be effective team members.

I believe most of my team work experiences have been learned on the job. The assignments we had as a team at MSU felt different. I believe I learn things from those experiences, but I don't know if what I learned helped me with experiences I face today. It could be that every work environment is different and communicate different so team membership is different in each location.

Please rate the ChBE Program's effectiveness in preparing you to be a highly ethical engineering professional.

I believe I was taught the basic requirements. I don't believe you can be taught to be ethical though. That is something I decide.

BSYear

2002

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Please rate the ChBE Program's effectiveness in preparing you to apply chemical engineering fundamentals.

My first engineering position was involved in relatively simple bulk chemical synthesis - all covered quite well in the ChBE program. One minor shortcoming - we used chemcad in school, which I have not used since. It took me a while to become proficient with some of the other process simulation software.

My second position dealt with plasma reactions in the semiconductor industry, which was touched upon but not thoroughly explained in this program.

Please rate the ChBE Program's effectiveness in preparing you to be a proactive problem solver.

I have proven to be an excellent problem solver in my career. Most of my duties at Micron Technology involved monitoring for process deviations, and then troubleshooting and repairing the complex process equipment used in CVD.

Please rate the ChBE Program's effectiveness in preparing you to pursue lifelong learning.

Please rate the ChBE Program's effectiveness in preparing you to be an effective communicator.

Most would say I am an introvert and not a natural communicator. However, I have never had any difficulties choosing the most appropriate format for professional communication and using it effectively.

Please rate the ChBE Program's effectiveness in preparing you to be effective team members.

Please rate the ChBE Program's effectiveness in preparing you to be a highly ethical engineering professional.

I have never felt that my personal code of ethics has been threatened or compromised in the course of my career.

Please rate the ChBE Program's effectiveness in preparing you to apply chemical engineering fundamentals.

The chemical engineering program did an excellent job of giving me the book smarts of chemical engineering fundamentals, such as using standard chemical engineering formulas and performing mass balances. However, hands-on experience and training were limited in the department. The department was very helpful and encouraging in obtaining internships to gain experience, but in the chemical engineering classes, the professors could have put more emphasis on and taught us more about the documents, tools, and materials we would encounter in the workplace, for example, P&IDs, MSDSs, and piping components.

Please rate the ChBE Program's effectiveness in preparing you to be a proactive problem solver.

In almost all of the chemical engineering courses, we were taught how to solve various problems and to logically think through the problems. This has been one of the most important skills I learned from the ChE program.

Please rate the ChBE Program's effectiveness in preparing you to pursue lifelong learning.

While being a student in the chemical engineering program, I worked at the Center for Biofilm Engineering as a student researcher. The CBE taught me about how continued learning and research are extremely important for the individual as well as for making advances in science. I was very fortunate that the CBE works closely with the chemical engineering department.

Please rate the ChBE Program's effectiveness in preparing you to be an effective communicator.

The chemical engineering department required us to take a communications course within the department. My only suggestion for improvement would have been to use a professor better versed in the skills of communication. When I took the course, the professor needed to work on his own communications skills rather than teach us. The assistant professor was much more knowledgeable in this area.

Other chemical engineering courses, such as senior design, also required giving presentations, which was very helpful. This gave me the opportunity to hone my communications skills and feel comfortable communicating with my professors, employers, and peers.

Please rate the ChBE Program's effectiveness in preparing you to be effective team members.

We were given many opportunities in classes to work as a team. The department worked hard to give us a variety of teamwork opportunities, for example working with our peers to write a senior design paper, give presentations, and work in the engineering lab. The ChE department did a great job preparing us to be successful team members. As my job often involves working in a team, this skill was very helpful.

Please rate the ChBE Program's effectiveness in preparing you to be a highly ethical engineering professional.

The department always expected us to be ethical and discussed the importance of ethics in the engineering workplace.

Please rate the ChBE Program's effectiveness in preparing you to apply chemical engineering fundamentals.

I really could have used a more rigorous analytical mathematics background to prepare me for graduate school.

Please rate the ChBE Program's effectiveness in preparing you to be a proactive problem solver.

Please rate the ChBE Program's effectiveness in preparing you to pursue lifelong learning.

I am currently in graduate school pursuing a Ph.D. in Chemical Engineering and Material Science.

Please rate the ChBE Program's effectiveness in preparing you to be an effective communicator.

I still refer to the basics that I learned during the public speaking course when preparing professional presentations.

Please rate the ChBE Program's effectiveness in preparing you to be effective team members.

Please rate the ChBE Program's effectiveness in preparing you to be a highly ethical engineering professional.

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Please rate the ChBE Program's effectiveness in preparing you to apply chemical engineering fundamentals.

The thermodynamics and unit operations were directly relevant to my job position. The energy/mass balance fundamentals learned in ChE directly translate to daily analysis of the plants boilers, heat exchange network, compressors and pumps.

Please rate the ChBE Program's effectiveness in preparing you to be a proactive problem solver.

The largest difference between academic and professional has been the focus on finding multiple solutions to the same problem. For many of my undergraduate courses, the problem solving structure is directed towards finding "the" correct answer. When doing capital expenditure analysis and proposals in my current position, I am required to provide at least three options and cost evaluations before moving forward.

Please rate the ChBE Program's effectiveness in preparing you to pursue lifelong learning.

I feel that I am equally prepared to pursue graduate work or a P.E. certification, and I believe that MSU's good core foundation is a primary contributor to this.

Please rate the ChBE Program's effectiveness in preparing you to be an effective communicator.

By far and large, communication skills are one of the least emphasized in engineering. In particular, things that would directly affect my job would have been: contract negotiations, customer focus mentality and supervision (manager/employee relationship).

Please rate the ChBE Program's effectiveness in preparing you to be effective team members.

I think that many of the problems provided through classwork fit well in a team environment. The inter department senior project (incorporating ChE's and ME's) was probably the most worthwhile team oriented academic venture I've ever worked on.

Please rate the ChBE Program's effectiveness in preparing you to be a highly ethical engineering professional.

I think that the engineering code of ethics deserves it's own course, but it would need to be marked as a fine arts credit in the philosophy field. I believe that we could always use more ethical case studies.

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Please rate the ChBE Program's effectiveness in preparing you to apply chemical engineering fundamentals.

Unit Operations lab and senior design class were excellent classes in which we needed to apply chemical engineering fundamentals in order to succeed.

Please rate the ChBE Program's effectiveness in preparing you to be a proactive problem solver.

In chemical reactions class we were taught the basics of chemical reaction engineering and were expected to apply the basics to solve difficult multistep problems.

Please rate the ChBE Program's effectiveness in preparing you to pursue lifelong learning.

Please rate the ChBE Program's effectiveness in preparing you to be an effective communicator.

Many of the ChBE major classes include orally presenting a project each term. Unit operations lab focused on writing comprehensive lab reports.

Please rate the ChBE Program's effectiveness in preparing you to be effective team members.

Many times we were encouraged and assigned to work in teams to complete projects and assignments.

Please rate the ChBE Program's effectiveness in preparing you to be a highly ethical engineering professional.

The societal impacts class during the 2nd year not only focused on giving effective presentations, but also acted as an ethics discussion group.

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Please rate the ChBE Program's effectiveness in preparing you to apply chemical engineering fundamentals.

I think the ChBE program provided me with an excellent grasp of fundamentals - especially unit ops, mass transfer, and material balances.

The use of these skills is extensive in my industry: refining. I deal with heat exchangers, columns and towers of all sorts, furnaces, tanks, pumps, vessels, separators, etc. on a daily basis. Although my position does not involve chemical or process engineering calculations, having a solid knowledge of what is happening inside the pipes and equipment is invaluable. I truly feel it gives me a competitive advantage over many of my colleagues.

Please rate the ChBE Program's effectiveness in preparing you to be a proactive problem solver.

Aside from fundamentals, the best skills I learned at MSU were in design and lab classes (which were very frustrating at the time!). It was in those classes when we had to deal with problems and situations that had no clear-cut solution. I would say that 90% of my daily activities follow that trend.

Please rate the ChBE Program's effectiveness in preparing you to pursue lifelong learning.

Please rate the ChBE Program's effectiveness in preparing you to be an effective communicator.

Please rate the ChBE Program's effectiveness in preparing you to be effective team members.

Please rate the ChBE Program's effectiveness in preparing you to be a highly ethical engineering professional.

BSYear

2007

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Please rate the ChBE Program's effectiveness in preparing you to apply chemical engineering fundamentals.

More emphasis on programming and economics would be really helpful.

Please rate the ChBE Program's effectiveness in preparing you to be a proactive problem solver.

Please rate the ChBE Program's effectiveness in preparing you to pursue lifelong learning.

Requiring completion of EIT exam is a big plus. I will definitely be pursuing my PE license.

Please rate the ChBE Program's effectiveness in preparing you to be an effective communicator.

I would say excellent for senior year with good for freshman through junior years. More presentations early on would really help with the senior design presentations, etc.

Please rate the ChBE Program's effectiveness in preparing you to be effective team members.

Group homework and experiments were constructed very well and did an amazing job at preparing me for working with other people.

Please rate the ChBE Program's effectiveness in preparing you to be a highly ethical engineering professional.

BSYear

MS- 2003

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Please rate the ChBE Program's effectiveness in preparing you to apply chemical engineering fundamentals.

Please rate the ChBE Program's effectiveness in preparing you to be a proactive problem solver.

Please rate the ChBE Program's effectiveness in preparing you to pursue lifelong learning.

I continue to take courses and involve myself in conferences to enhance my engineering skills. The ChBE dept emphasizes a love of science and engineering.

Please rate the ChBE Program's effectiveness in preparing you to be an effective communicator.

I feel comfortable giving seminars and workshops to our industrial associates after the presentations involved in all of the course work in ChBE.

Please rate the ChBE Program's effectiveness in preparing you to be effective team members.

Please rate the ChBE Program's effectiveness in preparing you to be a highly ethical engineering professional.