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Reflection on AI Assisted Development

Using AI to make the comment system was one of the more challenging activities I have done with AI in the past few months. I felt like it wasn't very creative and as a result, originally gave me a lot of code that I wasn't comfortable with understanding how it worked. One time where I saw AI trying to help me understand the topic instead of just providing the answer was when I asked it to explain the purpose of a segment of code or instruction with this assignment. If you ask AI to elaborate on what the instructions meant, it typically provides plenty of information that helps understanding of the topic. One scenario where AI generated code didn't make sense was within the actual commentsubs.php file. I feel like in some of the code that it gave me; it used functions that I wasn't aware of or used before. As a result of this, I had to do a large amount of research on this code before I could understand what its purpose was and learn how to use it correctly. I think that AI should 110% be used as a tool rather than banning it because it helps increase productivity, organization, structure, among other things that are incredibly useful.

I ensured that I understood specific AI-generated code in this assignment by doing research on the code that I put in. For example, I was having trouble formatting the name and email entry. AI provided me with some code to help with designing the clean_input function. However, I made sure I understood what each line within this function accomplished. As a result, AI helped clear the clutter around the name email and comments by removing leading and trailing whitespace, while also removing html and php tags to clean up outputs in the form. One thing I saw pretty frequently with AI was the input of unnecessary lines of code that could cause issues. One of these lines had to do with the feature suggestion, where I didn't have it implemented in my code, but AI still wrote some code on it. This is a significant issue of AI usage as I only noticed the line after looking over the code that I was provided with, making it a possible issue for other individuals who do not check their code in depth. I don't believe that learning about and using AI has made me lazy, but instead, I had to reallocate my ideas somewhere else instead of using resources on brainstorming and planning. I feel that AI helps with those entry level things a lot better than the in-depth problem solving and critical thinking, which is where I was able to use to my advantage. For example, instead of spending time on format of PHPMyAdmin databases, which AI helped deal with, I was instead able to focus on understanding and creating a working platform that made sense. If AI tools weren't available in this scenario, I think my final comment form would look significantly less polished and thought

out, which just shows what I was able to allocate more of my focus too while doing this assignment.

I think AI tools will reshape what it means to be a good programmer, by emphasizing efficiency, depth of understanding, and strong problem-solving skills. I don't think in the future being a good programmer will rely on organization or absolute knowledge of a subject, but instead of how you use the materials around you to come up with a cohesive product. I think the skills that will become more important in this new era of programming will be ability to critically think on the fly, be able to be good at understanding and asking questions, ability to debug, and cooperation or teamwork. These are the skills that will become more important as you need to be able to excel at cooperation, question asking, and critical thinking along with debugging ability because those are all things that you need to do when prompting AI in many scenarios. As for skills that may become less important, I could see organization, version control, and testing to become less valuable as those are all things I feel that AI is already far along in understanding, and it will only get consistently better with time.