Doctor Roberts began his lecture on Extreme Programming (XP) by discussing the company Profitstar that had hired him for consulting. Profitstar is a company that makes asset liability management software for banks. He said that many of the problems with their software was legacy code, a failing data infrastructure due to hardware limitations brought on by the legacy code, and many bugs. In addition he said that there was a lose of confidence in the development team, and that the team lacked guidance.

After Doctor Roberts made an initial assessment he suggested changes that the company should take. He firstly suggested an environment change. With this change communication needed to be improved, and a “bill pen” was created. Communication seems like an obvious thing that could help any company improve, if it is the right communication change. Stand up Meetings were added to the team's daily tasks. These meeting were held while standing in a circle. Due to the standing the meeting would be kept short. They talked about what they did the previous day, and what they planned to do that day. The customers were also encouraged to be at the stand up meeting, so that they could know what was going on. The stand up meeting is something that helped the meetings to be efficient and get done in a timely manner. The “bull pen” was a large room with a circle of computers where all of the programmers sat. This allowed them to communicate when they ran into problems and provide each other with assistance.

Another communication change that Dr. Roberts suggested was the use of story cards. These cards were made by the customers saying what they needed to have in the program. The programmers then estimated the time it would take to implement each solution on the card. The customers then filled
the time each week with the cards they felt were most needed. Due to there being a set amount of time each week, the programmers never had too many cards at a time, unless something was badly estimated.

Doctor Roberts also suggested a series of culture changes. The culture defines what acceptable behaviors are, and Dr Roberts saw that these needed changing. One large problem that Dr. Roberts saw was that there was not enough testing going on. Dr. Roberts had the programmers write test cases for all of their code that ensured that it worked properly, which meant that the test team had less to do and could better check the software. At the last count the company had around 13,000 tests that they ran each day to ensure that the code worked, before the program testers even got it. Another culture change that occurred was pair programming. Pair programming is a concept that sounds like it would be counter productive. Essentially it is having two people using one computer. One coding and the other looking over the code as it is written. At first thought it sounds like you are waisting a programmer, but this is not the case. The non-programming programmer can catch many errors while the code is being written, saving time later on. It also helps to ensure that people aren't waisting company time on non-company related tasks. One of the biggest benefits is knowledge diffusion, which ensures that everyone has some knowledge of every part of the program.

All of Dr. Robert's changes sound like they were good choices, even though some of them seem like they could be counter productive. Making a bull pen would make it easier to waist time with other people, but it also allows for better communication. Pair programming is something that sounds like it could be a disaster, but it wasn't. In the end the old back end to the program that was causing so many problems was replaced with something newer that supported better hardware and allowed for extendability latter on. The development team estimated it would take 18 months to complete the project, and they hit their mark using Dr. Robert's changes. They are more robust than ever, and have regained respect.

Profitstar's change to Extreme Programming was a very successful change. When you first hear
about the topic it sounds like it will never work, however Profitstar is a great example of what can happen when the proper steps are taken. I am sure Profitstar was hesitant at first, but now that they are doing so well I am certain they are glad of the changes. From all of the changes suggested by Dr. Roberts I saw nothing that seemed like a bad idea. It all sounded like things that, when combined, would yield a great deal of success.

Extreme Programming is something that many companies may not consider due to the negative thoughts about it, but it really can work when implemented correctly. Changing the environment and the culture is all it really takes to make it work. The changes might be bordering on extreme, but so are the results.