In order to first implement an Agile method we utilized four primary roles the Scrum Master, which is my role since I am putting together the sprint review and retrospective, a product owner, Testers, and Developers. As Scrum Master I also put together Scrum meetings and acted as an arbitrator as all of members of my team communicated with each other. Communication was one of the most important factors in regard to making the Agile method work effectively. The Product Owner created a back log that prioritized and detailed user stories. Our Developers and Testers looked at the backlog and came to an estimation of which stories they could get done within the allotted period of time for the sprint, which we set at about 4 weeks.

The major difference between the Waterfall method and the Agile Method is how the life cycle is broken down in smaller bits with the Agile method, in both you have the Requirement Analysis stage than design, develop, testing, and deployment. With the Waterfall method this is pretty much a straight shot over the entire project, but in Agile we have sprints which at the end of the sprint like the one we just finished. The Scrum Master will review how the process went and we would proceed with a new requirement analysis, which the Product Owner would look at the back log and make any necessary changes. The Product Owner and I had to meet with SHNU Travel clients to rework some of our user stories, which meant that the Tester had to create new test cases for the stories.

The Agile process allowed us to finish what we started within a sprint, but than we were able to take a look at the overall picture and change course where needed such when we had to meet with our clients from SHNU and they wanted added features, or if we were to come into certain obstacles, we could adjust at the end of the sprint to be more efficient. For the Developer and the Tester because the sprints allow for blocks the full product in the form of the user stories, we can tackle small projects at a time that allows for easier estimation. This took some time to get practice on, however but I believe that moving forward we will be able to implement much more accurate estimations of times that will take to complete stories. The key here was to finish the sprint no matter what than take a look at which direction we should head during this review. This allowed us to focus fire which meant that every member of the team was on the same page the whole time and no one was waiting for someone to finish a different block of the code.

As stated previously communication is very important to efficacy of this method. One of the best tools to help with this is the Daily Scrum meeting event. Which, as a team we get together and each member of the team takes turns voicing what they were able to accomplish the previous day and what they think they can achieve in the current day. The members were also encouraged to discuss any difficulties that they had as well as things they were proud of that they over came. This allowed them to take more full responsibility over their own work because they had more pride in the work that they were doing. This was very noticeable in performance, they were more willing to learn and it helped everyone learn better.

The various organizational tools and Scrum-Agile principles that were used in this process that were helpful were the Scrum Events, the Principles of Agile, and estimation techniques of Agile. At the beginning of the sprint we had a larger meeting, where we went over the back log that the Product Owner had put together, we than used a poking planner technique as we were all new to this process, to help figure out story points for estimation. That is to say we took one of the smaller stories that was estimated to be about 15 minutes of work, we all voted on it, and we called that 5 points of Story. From there we had the testers and developers select user stories based on priority and what they thought they were capable of and we voted on story points for each of those user stories.

The other Scrum event used were the daily Scrum meetings, which were essential for communication between the members of the team. We encouraged asking questions outside of the Scrum meetings too, however though we wanted to make sure if there were questions about obstacles that they tried to make sure they put in a solid effort at trying to overcome those problems themselves first.

Because the first principle of Agile is to satisfy the customer, this is much more easily achievable with Agile because after sprints the Scrum Master and the Product Manager can meet with customers and make changes as needed. With open communication and allowing individual members to come up with their own ideas of how to proceed and giving their own estimates allows them to take responsibility for their own work, which is another principle of the Agile process. This review and retrospective is also a very important Scrum event that aligns with the reflection principle of Agile, as it helps to see the flaws of our team and correct and get better with each new sprint. As journaling as an individual trying to complete new habits, it helps to see what you are doing wrong so you can see how to correct the problems.

The Scrum-Agile process has a lot of good qualities, but is not flawless. The biggest pro to this method is the small teams. The small teams allow for much better communication and this allows to cut through a lot of bureaucratic red tape when it comes to paper work and procedures to get through to get actual work done. It puts power into the individuals hands, which in turn gives a return in ability to learn and productivity on each team member. The sprints allow for quick turn around of new features based on client needs and any problems that arise during the sprint. The biggest part that has both pros and cons is the design process, because we only designed the process for a small block of user stories we can easily course correct and change things, however we don’t delve too far into the big picture, which could lead to some issues later on in the development process. Another con is that the team is so small, if anything happens to one of the team that they can’t work on the development of a project, that may cause issues since they would be specialized with particular projects, but because they are specialized and they share each others code often that can be a pro. The other con is the learning curve of switching over, at first it may take awhile to get use to principles and estimation processes, but if you think of this as a time investment I believe it will pay of in the end.

With all of this in mind, I believe that it would benefit the SHNU Travel project to continue utilizing the Agile method. It would also benefit are company to have this tool under our belts for future project as well, depending on how complex and bit the project is. Like most big and complex problems, the best way to solve them is to compartmentalize segments and focus each part individually than connect all of the parts together.