**Chapter Two**

**Project Planning And Definition**

**2.1 Task Identification**

PVAMU NAVSEA competition team is objective is to design and fabricate an autonomous underwater vehicle (AUV) for the AUVSI competition that will be held in July in SSC Pacific TRANSDEC, San Diego, California. Our robosub team is made up of: electrical team, mechanical team, computer science team, and our sponsors NAVSEA. Our electrical team is responsible for the electrical hardware assembly, interfacing communication between the on-board systems and vehicle-to-operator and providing power to the robotic vehicle. Mechanical team is responsible for frame work integrity of the vehicle, which includes: waterproofing, frame structure, and buoyancy. Our computer science team is responsible for the software for the vehicle.

**2.2 Timeline**

As part of the electrical team, during the first three milestones of the project we will be doing research, some development of hardware and testing, as the time line shows in figure 2.1.



**Table 2.1** Table Form Gantt chart

During milestones four and five will be for: part purchasing, testing, and simulations of a prototype of the vehicle. We will be working through several layout designs of hardware to possibly avoid if not minimize electromagnetic interference between each of the vehicle system such as hydrophone and CPU. At milestone six of vehicle is fully assembled and ready for competition.

Given below in figure 2.2 is our excel spread sheet of a gantry chart with a complete project schedule from acquiring the task to doing the research to building the AUV and completing the build of the AUV in April.



**Figure 2.1**: Gantt Chart