Apollo 11 Essay, Research Paper

Apollo 11: 1969

On July 20, 1969, the human race accomplished its single greatest technological achievement of all time when a man first set foot on the moon. We entered a new era, no longer bound by the circles of the earth that had held us so jealously so close to its surface for so long. “That’s one small step for a man, one giant leap for mankind.” With those words, on July 20, 1969, United States astronaut Neil A. Armstrong stepped from the lunar landing vehicle “Eagle” onto the surface of the moon. Minutes later he was joined by Edwin E. Aldrin, Jr. “Houston, Tranquility Base here. The Eagle has landed.” These words ushered in a new era of human exploration at 4:18 PM EDT on July 20, as the first manned flight to the Moon touched down. “Magnificent desolation”, Aldrin called it. They were the first men to land on the moon. As he left the LM, Aldrin said, “Now I want to partially close the hatch, making sure not to lock it on my way out.” “A good thought.” replied Armstrong. A third astronaut, Michael Collins, remained in orbit above them in the command module “Columbia” of the Apollo 11 spacecraft.

Moving with unexpected ease over the lunar surface, Armstrong and Aldrin took pictures, set up experiments, and collected samples of moon soil and rock. After 21 hours and 42 minutes on the lunar surface, they rejoined Collins for a safe return to Earth.

The epic journey of Apollo 11 and the other manned space flights of the 1960s were a climax to centuries of speculation and study and to decades of work on the practical problems of space exploration. They were a prelude to longer voyages of the

future, which will carry men to Mars and other planets and ultimately, perhaps, beyond the solar system.

Their liftoff from the surface of the moon was (partially) captured on a TV camera they left behind. The moon walkers left behind a plaque on the lunar surface that read: “Here Men From Planet Earth First Set Foot Upon The Moon. July 1969 A.D. We Came In Peace for All Mankind.”

Their mission objective was to perform manned lunar landing and return mission safely. It was obviously achieved.

The footprints left by the astronauts in the Sea of Tranquility are more permanent than many solid structures on Earth. Barring a chance meteorite impact, these impressions in the lunar soil will probably last for millions of years.

In the few hours that Aldrin and Armstrong were on the Moon, there was little time to set up scientific experiments, but a small package (the EASEP, or Early Apollo Scientific Experiments Package) was deployed.

The astronauts returned to the Lunar Module after 2 hours and 32 minutes on the surface (2:15 for Aldrin). The flag had been difficult to set up, and was actually knocked over when the LM took off from the Moon 21 hours after landing.

After lifting off from the lunar surface, the LM made its rendezvous with the Command Module. The Eagle docked with the Command Module, and the lunar samples were brought aboard. The LM was left behind in lunar orbit while the 3 astronauts returned in the Columbia to the blue planet in the background.

The final phase of Kennedy’s challenge was completed at 12:50 p.m. EDT on July 24, 1969, when the Columbia splashed down about 812 nautical miles southwest of Hawaii, returning the 3 astronauts safely to Earth. All four men were wearing biological isolation garments, awaiting helicopter pickup and transport to the U.S.S. Hornet. The day before splashdown, Aldrin said, “We feel this stands as a symbol of the insatiable curiosity of all mankind to explore the unknown.” The total mission duration time was 195 hours, 18 minutes, and 35 seconds.

The first samples from another planetary body were from Apollo 11. These first samples were basalts, dark-colored igneous rocks, and they were about 3.7 billion years old. So, all in all, the space flight of Apollo 11 was a huge success.

The backup crew was James A. Lovell, commander; William A. Anders, command module pilot; and Fred W. Haise, lunar module pilot.