

LUNAR LANDING RESEARCH FACILITY, NASA Langley Research Center. This simulator facility, constructed in 1965, was used by Apollo astronauts to practice final descent and touchdown for Moon landings. The airy structure, 400 feet long by 230 feet high, is a steel gantry that straddled a simulated moonscape. Suspended within this framework was the full-size, retrorocket-controlled Lunar Excursion Module Simulator (LEMS). Lunar gravity was achieved by traveling cables supporting five-sixths of the LEMS's earth weight. The remaining one-sixth pull (lunar gravity) allowed the astronaut to "descend" to the surface. Here, on dark nights with an artificial sun, Neil Armstrong - first human on the Moon - trained for that 1969 lunar expedition. Asked what it was like to land on the Moon, Armstrong replied, "Like Langley". The LEMS is on exhibit at the Virginia Air and Space Center in Hampton, while the gantry has been adapted to other research.