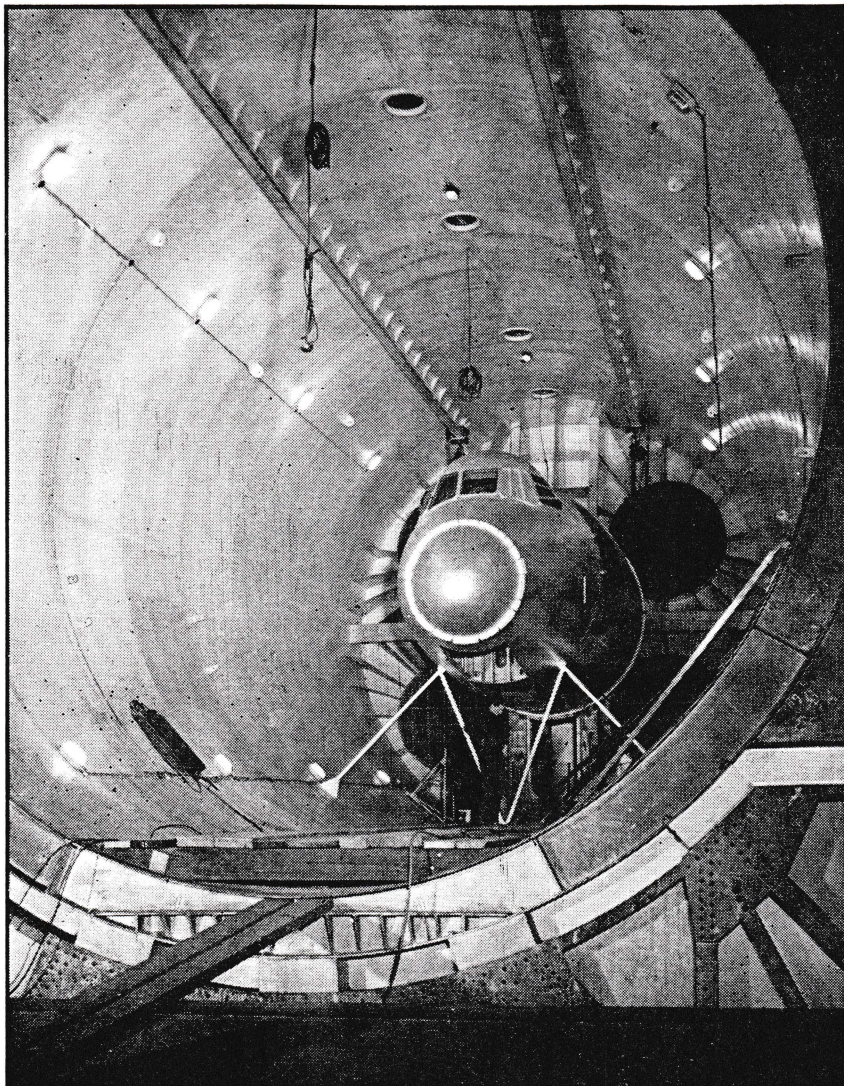
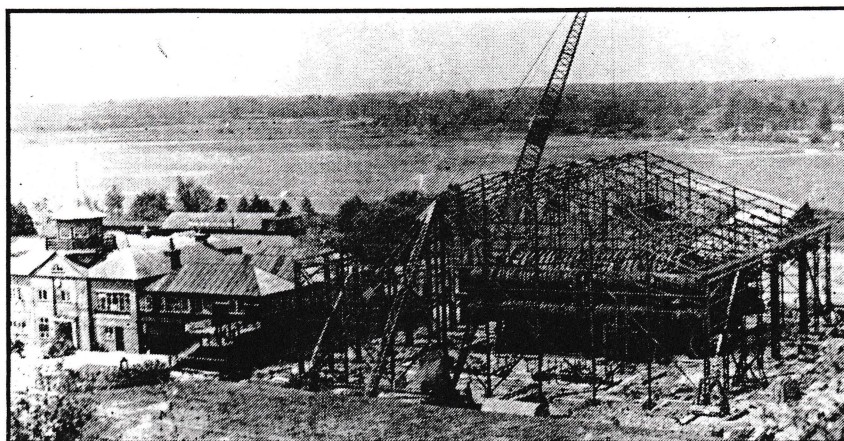


High Flight at Ground Level



A Viscount fuselage section is shown above in the working section of the test chamber. Air is ducted through the four circular openings visible at rear. The whole end of the pressure chamber nearest camera is sealed off by a "great door"; the other end has two air lock doors for passage of personnel. The chamber is housed in a building (below, during construction) which has 12 inches of insulation over walls and roof.



NOT SO MANY years ago, the name of Brooklands was one well-calculated to bring a delicious thrill to the heart of auto-racing fans the world over. In recent times it has gained a new measure of fame as the site of the Weybridge Works of Vickers-Armstrongs Limited (here, also, A. V. Roe made his first flights).

Reminders of the recent past are common and in fact large portions of the racing track are still intact about the perimeter of the flying field. The stalls where the cars were tuned to racing pitch still stand, and nearby is the track clubhouse, in which is now located Vickers aeronautical research & development section. Alongside the clubhouse is a large, plain structure, which is of comparatively recent construction. This is one building that has no links with the past, it never has and it never will. All its ties must always be with the future.

Housed in this building is the Vickers-Armstrongs' stratosphere chamber for high altitude simulation, the largest such device in the British Commonwealth and certainly among the largest in the world. It is by no means new, having been first erected at Brooklands in 1947, after fabrication elsewhere by the Vickers shipbuilding division. It has been fully operational since 1951, but only recently has Vickers released details on some of the tests that have been undertaken with the chamber.

During a recent visit to the U.K., *Aircraft* was able to inspect the big chamber. Designed as a large cylinder in which conditions of low temperature, low pressure and low humidity can be maintained almost indefinitely, the chamber's main object is to provide high altitude simulation for the testing of aircraft components and equipment. Altitudes of up to 50,000 feet can be reproduced and temperatures as low as -65°C .

Working section of the test chamber is 50 ft. long and 25 ft. in diameter. It is made of half-inch steel plates which are externally stiffened with rings, placed two feet apart.