

Volume 3

Number 143

The Spruce Goose II

Lead: With Allied shipping in serious jeopardy due to German submarine attacks during the early years of World War II, military planners turned to aircraft manufacturers. Howard Hughes responded with the Spruce Goose.

Tag: *A Moment in Time* with Dan Roberts.

Content: Metal for the construction of experimental aircraft was scarce in 1942. Therefore, when the designers at Hughes Aircraft began their mock-up of the gigantic new cargo plane, they built their model using Duramold,

lightweight plywood saturated with synthetic glue to make it waterproof and very strong. The basic airframe had no nails, screws or rivets, no metal at all. Skilled woodworkers crafted special joints that were bonded with glue for strength.

For the power plant Hughes selected the most powerful engine available, a Pratt and Whitney monster with 28 cylinders which turned out 3000 horsepower. Eight of them stretched out across the 320 feet of giant wing, 60% wider than a Boeing 747. The plane was designed to carry 700 fully equipped troops or a totally loaded Sherman tank.

The project was five years in the making and from the beginning was charged with controversy. One of the main problems was Hughes' style of leadership. He rarely showed up at the plant and refused to give anyone the final decision-making authority. Repeated delays and funding restrictions kept pushing back the completion of the HFB-1 and much to Hughes' disgust, politicians and the press took to calling the plane the "Spruce Goose" although it was mainly constructed of birch, harvested in the forests of Wisconsin and Michigan.

Finally, on November 1, 1947 more than two years after Japan's surrender, Hughes called in the press

and flooded the dry-dock in which the giant flying boat rested. At the controls himself, he revved the engines through two taxi runs, turned the plane into the wind, and with the bright sun reflecting off its aluminum paint, caused the huge craft to lift, surge and fly. That one mile was the single flight of the Spruce Goose. It remains today on display in Long Beach, California a tribute to innovation and clever design in a period of desperate circumstances, and a vivid memorial to the life of one of the most creative and peculiar players in mid-twentieth American life, Howard Hughes.

At the University of Richmond, this is Dan Roberts.

Resources

Barlett, Donald L. and James B. Steele. *Empire: The Life, Legend, and Madness of Howard Hughes*. New York, NY: W.W. Norton and Company, 1979.

Drosnin, Michael. *Citizen Hughes*. New York, NY: Holt, Rinehart and Winston, 1985.

Nixon, Stuart. "Big Spruce Goose Will Settle Down in a New Nest," *Smithsonian* 11 (9): 107-114.

Copyright by Dan Roberts Enterprises, Inc.