

## TURBO PUMP SITE

Research programs on liquid hydrogen turbo pumps and pump inducers are performed at this site.

The turbo pump is connected to portable 6000 gallon liquid hydrogen trailers thru a vacuum-jacketed stainless steel piping system. The drive turbine is powered by high-pressure hydrogen gas.

The pump inducer rig is submerged in a 2500 gallon vacuum-jacketed stainless steel liquid hydrogen tank. The inducer is driven by an air turbine which is located on the outside of the tank. A shaft through the bottom of the tank connects the turbine to the inducer.

One of the projects being investigated is the development of a pump that will operate efficiently in boiling hydrogen. This data is needed to design efficient pumps for nuclear rocket applications.

## 8 TURBO PUMP SITE

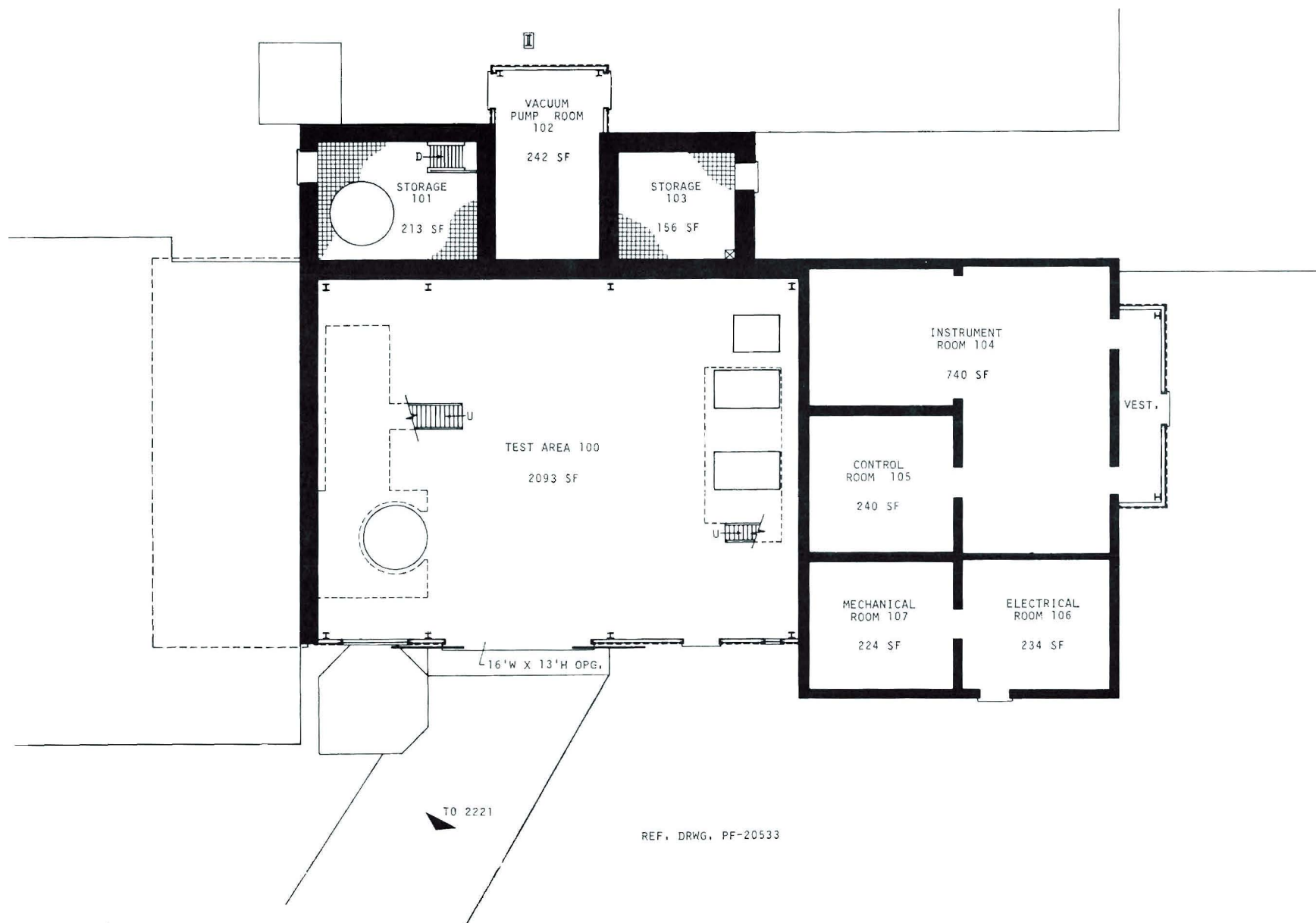
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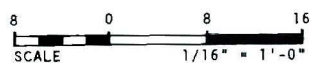
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C SITE TEST BUILDING

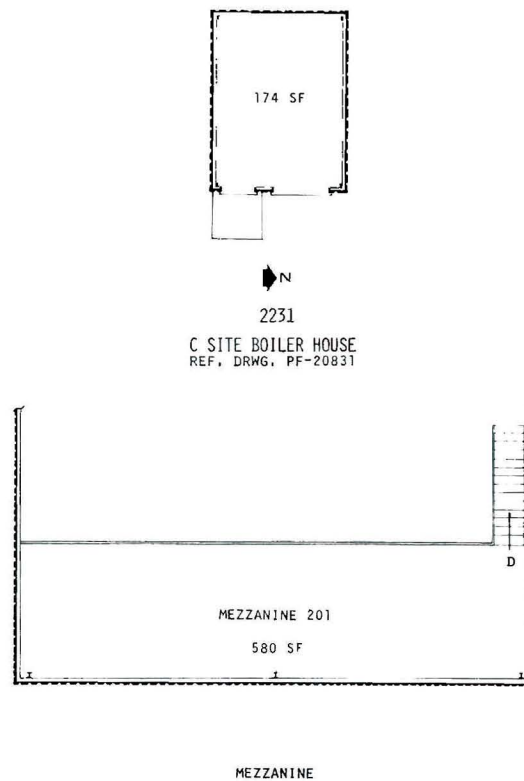
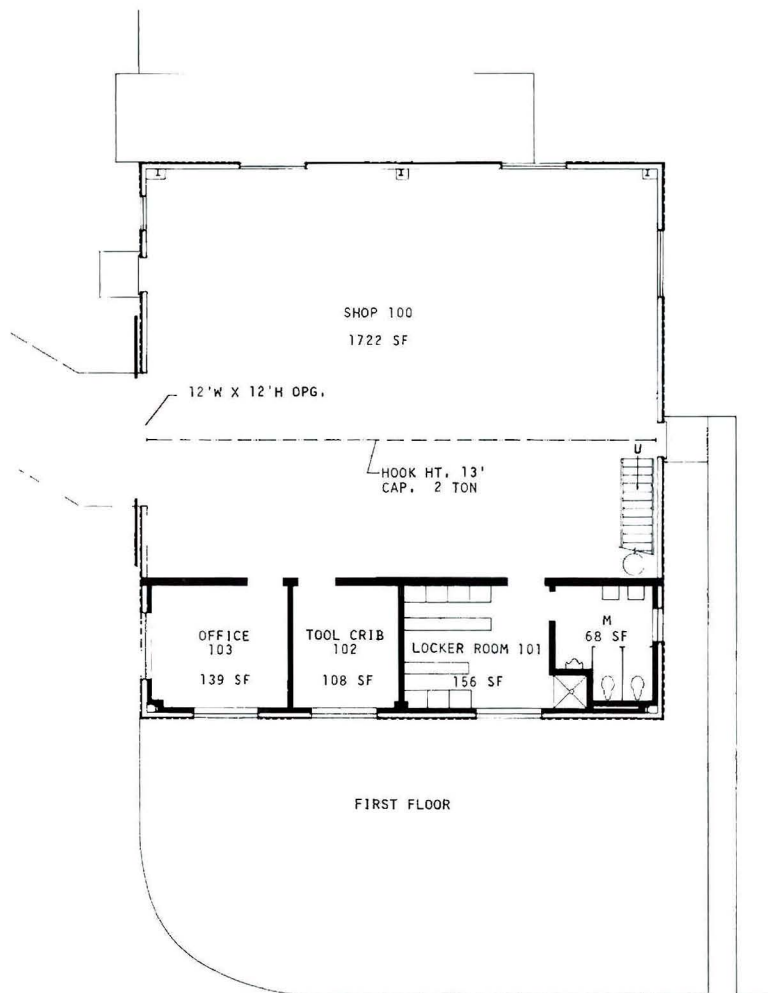
BUILDING NO.  
2211



JANUARY, 1969

NASA LEWIS RESEARCH CENTER - PLUM BROOK STATION  
SANDUSKY, OHIO

4.05  
2221 & 2231



2221

C SITE SHOP BUILDING  
REF. DRWG. PF-20923

C SITE SHOP BUILDING AND BOILER HOUSE

BUILDING NO. & STRUCTURE NO.  
2221 & 2231

8 0 8 16  
SCALE 1/16" = 1'-0"