

The order for the metro-liners was given to the Budd Co. in late May 1966. The cars have been completely built in less than 24 months after the award of the order. They must, however, go through further testing before they can go into operation.

Equipment and roadway facilities to provide improved performance are attainable under present technology, but do not now exist in this country. Hence, an important consequence of the demonstration will be the testing in actual revenue service, under severe operating conditions of advanced designs and components of railroad equipment. This will contribute significantly to the research and development aspect of the HSGT program.

Improvements such as automatic doors and gas turbine propulsion have been considered in the selection of equipment for the demonstration because they promise to cut operating costs while enhancing, rather than diminishing, service standards. At the same time, equipment specifications must look toward high reliability of operating performance and minimum of down time so that the primary purpose of the demonstrations—determination of public reaction to improved service—will be satisfied.

## Washington-New York demonstration

A demonstration between New York and Washington on the Penn Central will measure public response to a wide range of substantial improvements in service. The rout selected has the largest existing intercity rail passenger volume in the country. It is well located with regard to station access and will sustain increased speeds and frequency with the least new outlay. It serves a greater population than any rail of similar length in the United States.

A completed operating contract between the Government and the Penn Central Railroad specifies all identifiable elements of the demonstration service, including penalties for schedule failures. Under its provisions the railroad has prepared its fixed property to meet service standards, including substantial improvement of roadway and station facilities. The contract establishes four consecutive operating phases, in each of which the mix of variable service elements—such as food service, seating arrangements and crew complements, fares, frequencies, etc.—can be modified.

Among the special contractual obligations the railroad is required to meet throughout the two-year demonstration are: