

false ceiling, thus combining flat and concave effects. An effective system of ventilation has been added. The habitat groups now appear as openings in the walls of the gallery instead of as individual protruding boxes. The effect is a pleasing continuity. Reflections on the glass are eliminated by interior case lighting. Labels by Curator O. E. Jennings contain explanatory transparencies in color photography that enable the visitor to identify individual plants and the occasional animal forms introduced into the settings. Full-sized groups installed are the Florida group, the Pennsylvania bog, the spring flora of Pennsylvania, Mount Rainier and Arizona. Three additional full-sized groups are proposed, and the space left for these is now occupied by miniature dioramas showing Arctic tundra, the slope of Pennsylvania Laurel Ridge Mountain and Presque Isle Peninsula on Lake Erie. Other exhibits in the room include enlarged models of flowers and maps showing vegetational regions. An octagonal block of benches occupies the center. Plans are ready for two gallery floors and await only the necessary funds for work to begin. Frank A. Linder developed the plans and supervised construction of the Botanical Hall, which was a WPA project. Roy B. Ambrose, of the building staff, helped in the technical problems. Ottmar F. von Fuehrer, staff artist, created the exhibits with the help of Mrs. Fuehrer and Carl Beato, under the general direction of Mr. Jennings. For the Arizona group alone Mrs. von Fuehrer and Mr. Beato fashioned some 12,600 separate pieces.

THE HALL OF NORTH AMERICAN MAMMALS OF THE AMERICAN MUSEUM OF NATURAL HISTORY

AFTER six years of construction and preparation, the new hall of North American mammals in the American Museum of Natural History will be opened to the public on April 9. The first completed habitat groups (ten in number) of what is eventually expected to be the world's finest representation of North American animals housed in one exhibition hall, will be dedicated by officials of New York City and trustees of the museum on April 8.

The new hall is a panorama of wildlife throughout the entire continent, extending from Ellesmere Land, near the North Pole, to Mexico; and from New York State to the west coast of Alaska. As in the Akeley African Hall on the floor above, the animals are mounted in realistic life settings of their native plains, forests, swamps, mountains and deserts.

More than eighteen years ago, Dr. Harold E. Anthony, curator of the department of mammals, outlined plans for a new and modern hall of North American mammals to replace the old interpretation and "stuffed animal" appearance of exhibitions shown in the old mammal hall, built in 1890.

Realizing also that in many instances America's wildlife is still continuing to disappear before the advance of civilization as well as through changing climatic conditions governing the native habitats of these animals, F. Trubee Davison, president of the museum, since the summer of 1935 has directed its expedition program principally to the North American continent for extensive collections of our existing animals.

In 1937 Mr. Davison enlisted the active support of officials of New York City and those who wished to see American mammals preserved in life-like settings for future generations that may not have the opportunity of knowing the living animals.

Without funds contributed by the City of New York for the construction of cases, obtained through the efforts of Mayor Fiorello LaGuardia, Commissioner Joseph T. McGoldrick and Commissioner Robert Moses, the new hall could not have been built. Under the leadership of the Trustees' Committee of North American Mammals eighteen expeditions have collected for the ten habitat groups now completed and eight to be opened in the near future.

The designs, preparation and presentation of the groups were carried out by Dr. James L. Clark, head of the Department of Arts and Preparation, assisted by Albert E. Butler and under the scientific direction of Dr. Harold E. Anthony. Engineering and construction were in charge of Rex Johnson, general superintendent, assisted by Victor Ronfeldt, mechanical superintendent, and Wilson L. Todd, power plant engineer.

The animals were mounted by sculptor-taxidermists, Robert H. Rockwell, Gardell D. Christensen, George Adams and Waddy McFall. Artists who painted the background scenes, in most cases made from their own expedition field-paintings, were Belmore Browne, Charles S. Chapman, Carl Rungius, James Perry Wilson, Francis Lee Jaques, Joseph M. Guerrey and Frederick Scherer.

Those who participated in the making of flora and foreground accessories were: Albert E. Butler, George E. Petersen, Raymond H. De Lucia, G. Frederick Mason, Ralph Mendez, Robert Scherer, Charles Tornell, Robert Sewell, Bernard Chapman, Rudolph Freund and James Carmel.

THE NATIONAL RESEARCH COUNCIL'S COMMITTEE ON THE APPLICATIONS OF THE ELECTRON MICROSCOPE

THE electron microscope has opened up for investigation a new order of submicroscope dimensions. Within this range are minute structures of interest in most, if not all, fields of natural science. Interpretation of electron micrographs involves new problems; these arise primarily from the complexities of