The German Museum of Science and Technology.

THE new building of the Deutsches Museum at Munich is to be opened on May 7, which is the seventieth birthday of its founder, Dr. Oscar von Miller. A short account of this great museum will therefore be of general interest.

In NATURE of September 17, 1908, there appeared an account of the conception and foundation of the Museum, with a description of the collections then housed provisionally in the old National Museum building in Maximilian-strasse. Only five years before this, Dr. Oscar von Miller had laid his plan for a great national science museum before a small circle of men of science, technologists, and representatives of the German Government and of the city of Munich. The idea was taken up with enthusiasm, and very fine collections were quickly brought together and arranged in the above building, which was opened to the public on November 13, 1906. On the same day the foundation stone of the permanent new building was laid by the German Emperor, the Prince Regent, and Prince Ludwig of Bavaria. The site for this building had been granted by the city of Munich, and on October 20, 1906, the design of the architect Prof. Gabriel von Seidl had been selected from the thirty-one competitive designs which had been submitted. This site, an island in the river Isar, is shown in Fig. 1.

The rapid increase in the number of acquisitions to the collections soon made it necessary to seek accommodation additional to that provided by the old National Museum. For this purpose the rooms of the old dragoon barracks on the north-west bank of the Isar were utilised, and these were opened to the public on January 1, 1909.

The new building, in accordance with the scheme laid down by the museum directorate, was planned in two main groups, as shown in Fig. 1, namely, the Exhibition building, and the Library building. The former was to house the unique exhibits already acquired, and to be on a scale sufficiently large to allow for ample expansion and development of the collections. The latter was to contain the collections of early and modern scientific and technical books, manuscripts, drawings, etc., as well as to provide workshops, laboratories, lecture-rooms, conference halls, etc.

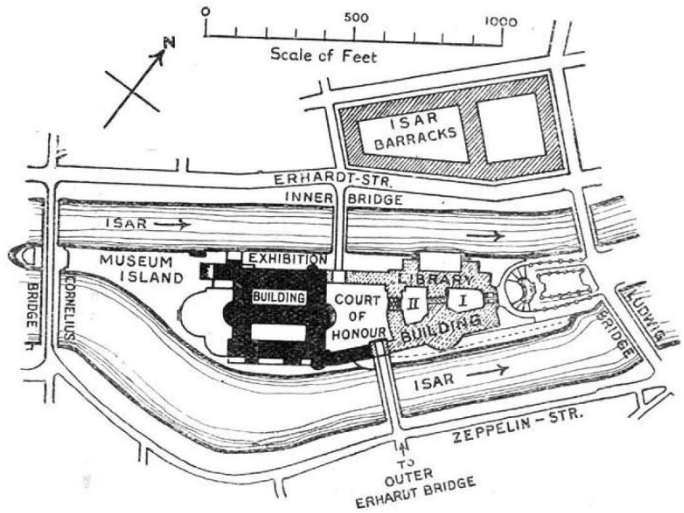

FIG. 1.—Sketch plan of the Deutsches Museum, Munich. The portion completed and occupied is blackened in. The old National Museum is less than half a mile to the north.

By the summer of 1914 the skeleton of the exhibition portion of the museum building had been completed, and it was then anticipated that the building would be open to the public by 1916. Building operations, however, were protracted by the War, but in spite of many difficulties, progress, though slow, has since been maintained steadily, and this portion of the Museum (shown in Fig. 2) is now ready to be opened. In September 1914, the old Isar barracks being required for war purposes, the collections therein had to be stored away. By September 1922 certain of the rooms in the old National Museum were closed, and the work of transferring the collections to the new building was commenced. On September 18, 1923, the whole of the old building was closed to allow of the systematic transference of the rest of the collections.

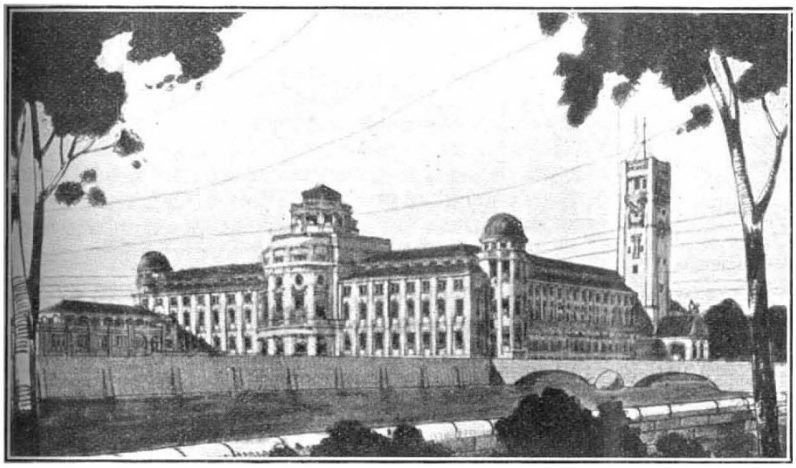

FIG. 2.—The Deutsches Museum, Munich. The exhibition building completed: view looking south.

The characteristics and attractiveness of the collections, even when housed in their temporary buildings, were referred to in NATURE in 1908. These features rested not only in the valuable exhibits themselves, but in the unique method of presentation, which aimed at giving the whole nation, student and layman alike, but particularly the young, an insight into and review of scientific and technical conceptions and inventions, with the human aspect carefully interwoven. The provision of this magnificent new Museum has allowed these

features to be developed in an enhanced degree, and the result is one of which the German nation may well feel proud.

With regard to the library building, the construction of which has still to be carried out, the original design of Prof. G. von Seidl was at an early stage found to be quite inadequate. The number of bequests and promises of books, drawings, plans, films, phonograms etc., so exceeded original expectations that proper accommodation could be met only by a complete modification of the building programme. New plans were accordingly prepared by Prof. Emanuel von Seidl, who took over the work on the death of his brother. As indicated in the plan (Fig. 1), two long wings follow the lie of the land towards the north-east, where they are connected by a frontage facing a monumental approach leading from the Ludwig bridge. These wings are further connected with each other by two transverse buildings. From the approach court a passage leads to Court I., another to Court II., and a third leads to a large impressive Court of Honour, on the opposite side of which is the chief entrance to the exhibition building. This Court is also directly accessible from both sides of the river by means of the Erhardt bridges. The library building will be provided with four floors above the ground-floor and basement, except in the two low wings by which it is connected to the exhibition building.

Amongst the many objects specially designed or acquired for the new building are the two giant planetaria, one of which was described in NATURE of December 27, 1924.

Obituary.

DR. CARL ULRICH.

BY the death of Dr. Carl Ulrich on February 9, Austria has lost one of its foremost chemists, and radio-chemistry one of its pioneers.

After completing his course at the University, Dr. Ulrich was appointed assistant to Hofrat Lieben in the Chemical Institute of the University of Vienna. Later, he took up a post in the Auer works at Atzgersdorf, where, in conjunction with Dr. Haitinger, he made a study of the working up of pitchblende on a large scale. He was largely responsible for the organisation and equipment of the radium works at Joachimstal in Bohemia, the management of which he took over in 1910. Here he laboured until the close of the War, when the radium works passed into the hands of the Czecho-Slovakian Government, and Dr. Ulrich, being of Austro-German nationality, had to resign his post. During the next few years he acted as adviser to the Ministry of Trade in Vienna, but was pensioned off two years ago. Since 1918 he had been engaged on radio-active work in the Vienna Radium Institute.

Dr. Ulrich always showed a keen and active interest in the work of the Radium Institute, and he was ever ready to give it the benefit of his ripe experience in the varied chemical problems that arose from time to time. Many of the tertiary radium standards to be found in various parts of the world are primarily the work of his hands, and they provide an appropriate memorial to his labours. He died of sarcoma of the lungs, which, in the opinion of his medical advisers, was a direct result of his long-continued manipulation of large quantities of radium. It is a significant fact, however, that Dr. Ulrich had not worked with radium in quantity since he left Joachimsthal in 1918.

Dr. Ulrich was keenly interested in the development of the science of isotopy, and some of the earliest work on the isotopes of lead and thorium was performed with material supplied or rendered accessible by his intervention. To the world of science in general, and to his Austrian colleagues and friends in particular, the death of Dr. Ulrich means a great loss.

ROBERT W. LAWSON.

THE death occurred on December 19 last of Prof. H. L. Wells, and we are indebted to the *American Journal of Science* for the following details of his life and scientific career. Horace Lemuel Wells was born on October 5, 1855, in New Britain, Connecticut, and went to Yale University in 1884 as instructor in analytical chemistry in the Sheffield Scientific School, and eventually was appointed professor of analytical chemistry and metallurgy. This post he held from 1893 until 1923, when he was made professor emeritus. Prof. Wells devoted much attention to the analysis of minerals; he determined the composition of a number of minerals from Branchville, described with E. S. Dana the new mineral beryllonite, and analysed a new platinum mineral which he called sperrylite. In 1891 he obtained a supply of the rare mineral pollucite from which a quantity of cæsium salts, hitherto only known in small quantities, was extracted. This furnished material for a series of investigations on cæsium compounds which covered more than thirty years. About one-half of his published work relates to these substances. Beginning with the perhalides of cæsium, he investigated systematically the double salts of this element, and later discovered a series of triple salts, notably triple thiocyanates. In 1897 Prof. Wells translated Fresenius's "Qualitative Analysis," and he also published works on chemical calculations. In 1904 he became an associate-editor of the *American Journal of Science*. He was elected a member of the National Academy of Sciences in 1903.

WE regret to announce the following deaths:

Mr. S. R. O. Dudfield, hon. foreign secretary, Royal Statistical Society, past president of the Harveian Society, London, and for thirty years medical officer of health for Paddington, on April 19, aged sixty-four.

Sir Rickman John Godlee, Bart., K.C.V.O., hon. surgeon in ordinary to the King and a past president of the Royal College of Surgeons, on April 20, aged seventy-six.

Sir David Lionel Goldsmid-Stern-Salomons, Bart., vice-president and treasurer for many years of the Institution of Electrical Engineers, on April 19, aged seventy-three.