

L. V. MIRZOYAN

**THE BURAKAN
ASTROPHYSICAL
OBSERVATORY**

1958

ACADEMY OF SCIENCES OF THE USSR

ACADEMY OF SCIENCES OF THE ARMENIAN SSR

L. V. MIRZOYAN

THE BURAKAN
ASTROPHYSICAL
OBSERVATORY

1958

ON THE OCCASION OF THE X GENERAL ASSEMBLY OF
THE INTERNATIONAL ASTRONOMICAL UNION, MOSCOW

12—20 August 1958

Edited by

P. G. KULIKOVSKY

The Burakan Astrophysical Observatory of the Academy of Sciences of the Armenian SSR, is one of the youngest in the Soviet Union (fig. 1). Its construction was begun in 1946. This was the time when the scientific activity of the Observatory has commenced.

The past ten years have witnessed the completion of the first part of the construction, the installation of several instruments, the organization of scientific laboratories and the consolidation of the scientific staff. Papers written by the members of the Observatory staff are being published in the «Communications of the Burakan Observatory», issued since 1946, and in other publications of the Academies of Sciences of the USSR and the Armenian SSR. The main works carried out at the Observatory were of great value for astronomy and attracted the attention of scientists in different countries.

A brief description of the Burakan Astrophysical Observatory and some of the scientific results are given below.

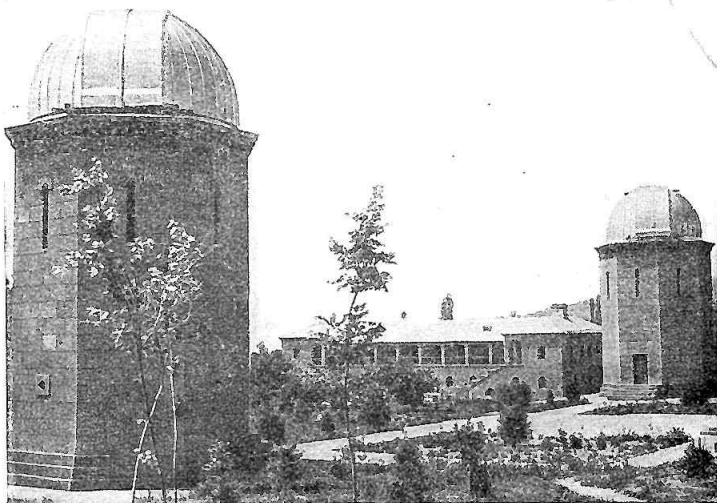


Fig. 1. The Burakan Astrophysical Observatory. The domes and the hotel

CONSTRUCTION OF THE OBSERVATORY AND THE INSTALLATION OF INSTRUMENTS

An astronomical observatory, mainly for educational purposes, was established at the Erevan State University in 1933—1934. Some scientific observations of the Sun, meteorites and variable stars, as well as works on the history of astronomy in Armenia were being dealt with. A 9-inch visual telescope, which belonged to the Leningrad University, was the only instrument of the Observatory. The telescope was equipped with two cameras and was employed for photographic observations.

In May 1940, after the incorporation with the Armenian branch of the Academy of Sciences of the USSR, Professor V. A. Ambartsumian was appointed scientific adviser

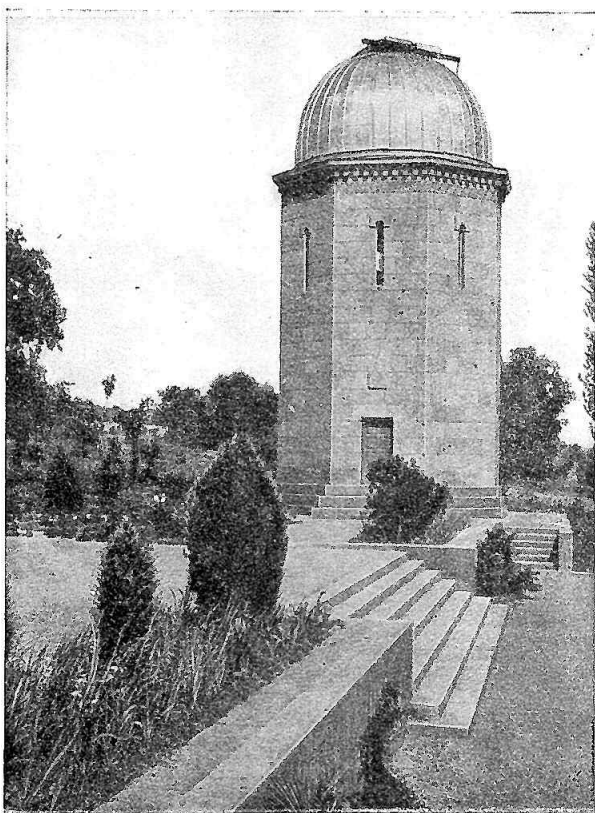


Fig. 2. The dome of the 8-12-inch Schmidt telescope

Under the supervision of V. A. Ambartsumian the Observatory has studied mainly astrophysics. In connection with this the construction of a new astrophysical observatory outside the city with atmospheric conditions favourable for astrophysical observations became indispensable. Such a site was found near the Burakan village (1500 m above sea level, $2^{\text{h}}57^{\text{m}}10^{\text{s}}$ E and $40^{\circ}20'7''$ N). The construction

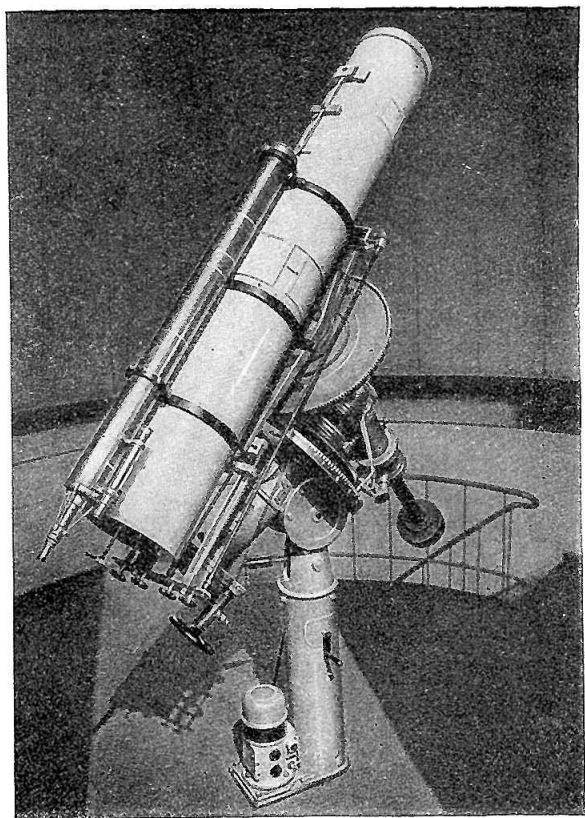


Fig. 3. 8-12-inch Schmidt telescope

at the site was begun in 1946. At the same time the training of young armenian scientists was underway.

The first telescope installed in Burakan in 1946 was a 5-inch double astrograph with «Ernostar» objectives ($f=240$ mm) and with an effective field of approximately 300 square degrees. It was used for two-colour photogra-