

SUMMARY

The daily life cycle and behavior of the marmot *Marmota marmota latirostris* (Kratochvil, 1961)

The studies were conducted in the High Tatra, in the area of the Tatra National Park in Poland. There, *Marmota marmota latirostris* has its natural homerange and is the highly endangered species. Its daily life cycle includes the time of rest in the burrow through the night and the time outside the burrow through the day during the summer activity period.

During the period of summer activity the daily life cycle was changing. The time spent outside burrows was the shortest immediately after the hibernation,. It was undoubtedly caused by the weather conditions, also. Its length approached about 100 minutes on the second half of May. So, the animals stayed through a very short time outside the burrows. The time of out-of-burrow-activities gradually raised in June, approaching more than 10 hours in the middle of a month and about 13 hours at the beginning of July. The daily activity time was the longest in July and August. It reached 13 hours and for some individuals up to 14 hours maximally. The constriction of the out-of-burrow- activities time was noticed at the beginning of September. Then, it approached 12 hours and was gradually decreasing until it reached 6-7 hours between September and October.

From the beginning of July to the first days of September leaving the burrows occurred before the local sunrise. Comeback to the burrows was always before the local sunset (Fig. 2).

There are several distinctive activities that consist on the behavior of the marmot: foraging, which is grazing on plants; guarding, which is resting, warming up on sun and watching against a danger; staying in a burrow during the day; gathering and storing winter supplies; burrow digging, which is enlarging the old and creating new ones; playing of the two or more individuals; cleaning the body and moving. The marmots spent about 44 % of time on foraging and about 40 % on guarding during the period of summer activity. The rest studied types of behavior constituted about 16 % of the time all together (Tab.1).