



DATA ON GEOGRAPHICAL DISTRIBUTION AND HABITATS OF THE MARGINATED TORTOISE (*Testudo marginata* Schoepff, 1792) IN ALBANIA

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SYNOPSIS

Key words:
tortoise,
brushy habitat,
inter-boundary zones,
endangered species.

The biggest tortoise of our country is found in brushy habitats mainly of the Southeastern part of Albania. It is also called the tortoise of mountain since it is mostly spread in the hilly and mountainous parts of the respective zones. It is *Testudo marginata* and in Balkan it is found mainly in Albania and Greece. In Albania it is mostly found in Saranda and Delvina where it is spread to the coast and hills of (Cape of Stilo, Ksamil, Saranda, Kakome, etc.). This species is also found in the neighboring zones of Northwestern Greece. The expeditions held during July – August 2009 in Nemërçka Mountain (Gjirokastra region) have revealed the presence of it in the latitude of 1100 m, which signals a new spreading area for Albania. The present endangered status of species is VU.

INTRODUCTION

Testudo marginata is a third *Testudo* species found in Albania. It is mainly spread in the Southwestern part, across the border with Greece (Bruno, 1989; Haxhiu, 1979). It is found in the bushy areas and pastures of Saranda and Delvina and to the latitude of 1100 m in the mountain of Nemërçka. The limited circle of spreading, the lack of continuous monitoring, the few research on the respective matter and the continuous damage of the habitats are accompanied by the fact that this kind is hardly found. *Testudo marginata* or the tortoise of mountain in the Balkan Peninsula is commonly found with the sub-species *Testudo marginata* subs. *marginata* which is one of the two subspecies of the *Testudo* genus. The other subspecies is *Testudo marginata* subs. *sarda*, located in Italy) (Gasc et al., 1997). The real status of this species need more observation and a long monitoring period in order to undertake necessary protective and effective measures.

MATERIAL AND METHODS

This research is based on: the data gathered during the individual expeditions for a period of 25 years, the results coming from the expeditions in the frame of monitoring and conservation projects of biodiversity in the respective zones and the outdoors expeditions with the students of Biology and Chemistry branch of the University of Gjirokastra. The collected and conserved material is deposited in the zoology labs of the University of Gjirokastra, Albania (Haxhiu, 1979; Haxhiu & Oruçi, 2001b).

RESULTS AND DISCUSSION

THE TYPICAL HABITATS OF *TESTUDO MARGINATA*.

Testudo marginata is dominant in biotopes of warm climate, shrubby vegetation, typically for Mediterranean region (Haxhiu & Oruçi, 2001a). These habitats are found 1500 – 1600 m above the sea level in Saranda and Delvina as well as in the hilly and mountainous zones of Gjirokastra. *Testudo marginata* can be found in the latitude of 1600 m (Gasc et al., 1997). During our expeditions we have noticed the presence of it in the latitude of 1100 m in the highlands of Gjirokastra and in the latitude of 1200 – 1300 m in the mountainous zones of Saranda and Delvina; it may be related to the rough climate of the mountainous zones of the region of Gjirokastra. These habitats provide the vegetation for the nutritive diet of *Testudo marginata* thanks to the rainfall and the optimal temperatures.

THE REDUCTION AND DESTRUCTION OF *TESTUDO MARGINATA* HABITAT

During our expeditions we have noticed a reduction in the number of the population of the tortoise of mountain in the region of Saranda and Delvina (Haxhiu, 1995; Oruçi, 2008, 2009). This is the case in the mountainous zone of Gjirokastra and it may be related to the small number of expeditions and the rough climate of the region (new areas of spreading of the tortoise of the mountain). Some of the reasons for the reduction of *Testudo marginata* might be:

- The destruction of the habitats because of pasturing, burning or overpasturing.
- Fissuring of the habitats because of infrastructure.
- The intensification of the environmental stress from the gathering of the medical plants and lumbering.
- The gathering of the *Testudo* tortoise as nutrition for the poultry etc.
- The accidental or non-accidental damage done with the working devices.
- The gathering for merchandise and the usage of tortoise as domestic animals.

- The tillering of the soil has destroyed the lies and nests and has reduced the surfaces where *Testudo marginata* can be found.

CONCLUSIONS

Albania is the north border of the spreading of *Testudo marginata*. *Testudo marginata* is near endemic or sub endemic species for Albania. The actual status of the kind according to the The Red Book of the Albanian Fauna (Group of Authors, 2006) is but the monitoring for the population of this species has been insufficient and the present status is estimated as Vulnerable (VU), which need re-evaluation (Group of Authors, 2006).

It is required the rising of the awareness of the local population for the importance of *Testudo marginata* through programmes of environmental education. The compiling of study plans joint monitoring with neighboring countries where *Testudo marginata* is found.

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Original research article
Received: 1 August 2010.