

The Rufford Small Grants Foundation

Final Report

Congratulations on the completion of your project that was supported by The Rufford Small Grants Foundation.

We ask all grant recipients to complete a Final Report Form that helps us to gauge the success of our grant giving. We understand that projects often do not follow the predicted course but knowledge of your experiences is valuable to us and others who may be undertaking similar work. Please be as honest as you can in answering the questions – remember that negative experiences are just as valuable as positive ones if they help others to learn from them.

Please complete the form in English and be as clear and concise as you can. We will ask for further information if required. If you have any other materials produced by the project, particularly a few relevant photographs, please send these to us separately.

Please submit your final report to jane@rufford.org.

Thank you for your help.

Josh Cole Grants Director

Grant Recipient Details

Your name	Laurentiu Rozylowicz
Project title	Securing the future of Hermann's tortoise (<i>Testudo hermanni</i> subsp. <i>boettgeri</i>) in SW Romania
RSG reference	49.01.08
Reporting period	01.05.2008 – 01.06.2009
Amount of grant	£11950
Your email address	rozylowicz@gmail.com
Date of this report	10.06.2009

1. Please indicate the level of achievement of the project's original objectives and include any relevant comments on factors affecting this.

Objective	Not achieved	Partially achieved	Fully achieved	Comments
Assessing the threat level according to IUCN and NatureServe			✓	Assessment has been made using the knowledge generated during all 3 grants that we have obtained. Standard used software packages were used (RAMAS RedList Professional and NatureServe Rank Calculator 2.0). The results were disseminated through media (for the wide public) or scientific conferences and peer-review journals (for the scientific community).
Assessing the habitats occupancy area			✓	We were the first to use miniaturised GPS devices for this species with the aim of estimating the habitats use and connectivity. Thus, one the most frequent threats (habitats loss) is now understood, concrete measures for conservation being formulated.
Establishing quarantine area and reintroduction of tortoise individuals			✓	A protocol for abandoned tortoise reintroduction was established, including: online information materials (webpage), collection system from the public through telephone lines, open-air quarantine, reintroduction in their natural habitat.
Educational materials			✓	500 pieces of the "Hermann's tortoise needs your help" CD-ROM were designed and multiplied and 500 postcards "Tortoise need your help - tortoise is not a pet"
School meetings			✓	Education activities focused on hosting meetings with pupils and teachers and had as main theme The Hermann's Tortoise (life history, threats and conservation). Meetings were held in Drobeta Turnu Severin (2 schools), Orsova (2 schools), Eselnita, Sisesti, Hinova, Ciresu, Svinita, Dubova, Divici, Lescovita, Bahna, Gura Vaii, Pojejena, Cernatesti, Garnita.

2. Please explain any unforeseen difficulties that arose during the project and how these were tackled (if relevant).

No difficulties occurred during the project implementation.

3. Briefly describe the three most important outcomes of your project.

Outcome 1: *Assessing the threat level of Hermann's tortoise at regional level considering the IUCN criteria 3.1 (2001, 2003) and NatureServe Conservation Status Assessment 2.0 (NatureServe 2009).*

The assessment was performed using the RAMAS Red List Professional software for IUCN vulnerability categories and NatureServe Rank Calculator 2.0 for NatureServe conservation status. The analysis was based on the range data (area of occupancy and convex hull), population size in the past, actual and in the future, population structure and threats. The data were obtained through field assessment of habitats and populations (the fieldwork campaigns were performed during the tortoise activity periods), literature reference data and from the local natural history museums, and meetings and interviews of the local inhabitants. The obtained data were sent to the IUCN Species Survival Commission for assessment. The data were synthesized in a scientific paper, accepted for publication in a peer-reviewed journal *North-Western Journal of Zoology* (<http://herp-or.uv.ro/nwjz/aim.html>). The threat status was disseminated to the wide public through: 2 articles on a web-based environmental magazine (www.ecomagazin.ro), 1 article in the national media (Libertatea, 12.02.2009 - www.libertatea.ro), 2 news in television (ProTV and National TV). Hermann's tortoise met the following threat categories:

NatureServe conservation status

- **N3 Vulnerable** – Vulnerable in the jurisdiction due to a restricted range, relatively few populations or occurrences, recent and widespread declines, or other factors making it vulnerable to extirpation.

IUCN regional evaluation

- **EN B1ab(i, ii, iii, v)** – Endangered due the geographic range in the form extent of occurrence, (a) small number of locations, (b) continuing decline of (i) extent of occurrence (ii) area of occupancy, (iii) area, extent and/or quality of habitat, and (v) number of mature individuals.

Outcome 2: *Assessing the patterns of territory usage by tortoise, using high end GPS technology*

These fieldwork-oriented activities were performed for completing the information on the tortoise lifestyle in Romania, especially the appreciation of the habitat occupancy for determining the variables that increase the species vulnerability.

It is the first time when the miniaturised GPS devices (very light and very efficient) have been used for this species (<http://www.telemetrysolutions.com/customer-testimonials.php>). Data on the individual's movements, air temperature, body temperature, interactions with other individuals were obtained. The data has been used in order to assess the threat level (quantitative data on threats estimations and for the conservation measures) and within the educational activities.

Outcome 3: *Establishing an effective system for the protection of the tortoises found by people outside their home range*

- *Abandoned tortoise reintroduction.* One of the main threats is tortoise collection as pets, mainly by the tourists. In order to reduce this threat, we have established a system for the tortoise voluntary reintroduction. Subsequently of collecting the tortoise from its natural habitat, although this is against the law, the tourists are searching for information related to the ways to take care of it. We created a detailed webpage (www.portiledefier.ro/carapax), containing information related to Hermann's tortoise. The explicit message of the webpage is that the tortoise is not a pet and it belongs to nature, in the area from south-western part of the country. Also, information on the legal protection system is available. The webpage includes a system for species visual determination (using their morphological characteristics). Nevertheless, the website publishes the procedure (see annex) that we follow when reintroducing a tortoise. From May 2008 to May 2009, we have recovered 14 mature tortoises (8 males and 6 females) from Bucharest, Craiova and Timisoara. The tortoises were transferred to the Centre for Habitats Monitoring from Eselnita, Mehedinti County, where their health state was assessed. Prior of being reintroduced in their habitats, the tortoises were quarantined for a period of time between 2 weeks and 2 months. A quarantine enclosure was created in Eselnita, divided in 4 different-size divisions, imitating the habitat they will be reintroduced in.
- *Working with the local communities.* The educational activities focused on meeting the pupils and teachers in order to debate the theme Hermann's tortoise (life history, threats and conservation). The meetings took place in the following localities: Drobeta Turnu Severin (2 schools), Orsova (2 schools), Eselnita, Sisesti, Hinova, Ciresu, Svinita, Dubova, Divici, Lescovita, Bahna, Gura Vaii, Pojejena, Cernatesti, Garnita. A CD-ROM entitled "Hermann's tortoise needs your help" was produced and distributed in schools. It includes information about the tortoises (area, morphology, reproduction, threats, legal framework for tortoise protection, and information on ways to protect it). A postcard was created and distributed, with the message "Tortoise needs your help". These were sent to the schools within the project area in order to be distributed to pupils.

4. Briefly describe the involvement of local communities and how they have benefitted from the project (if relevant).

Local community was a priority during the project period of time, being the beneficiary and actively involved in its implementation. Thus, tortoise monitoring was performed with the support of 2 local people, meetings were organised in 17 schools from the tortoise area, not to mention the materials distributed to the local people – CD-ROM, postcard. The quarantine enclosure for tortoise reintroduction has also an educational role, being frequently visited by the pupils from Eselnita School and kindergarten. The project increased the level of knowledge regarding the threats, required conservation measures and level of protection for the Hermann's tortoise.

5. Are there any plans to continue this work?

An infrastructure has been created within the project framework that might support future conservation measures. As future priority activities we have identified the following:

- Strengthening the infrastructure for tortoise reintroduction through the establishment of a hibernation room with appropriate infrastructure – hibernation tables, temperature control facilities (constant 4 °C) – high priority!

- Studying tortoise mortality as a consequence of the roads presence and measures to reduce this threat;
- Establishing information materials for the border police in order to stop the transboundary tortoise trade – high priority!

6. How do you plan to share the results of your work with others?

Project results were already disseminated through various ways: **scientific conferences** (Society for Conservation Biology 2008 Annual Meeting, Chattanooga, Tennessee, USA, 13-17 July 2008: Poster - Present and predicted distribution area of Hermann's tortoise (*Testudo hermanni*) from Romania: implications for conservation). The travel costs were covered by University of Bucharest not from this project; **scientific papers** (Assessment of threatened status of *Testudo hermanni boettgeri* Mojsisovics, 1889 (Reptilia: Testudines: Testudinidae) population from Romania", submitted for *North-Western Journal of Zoology*); **articles in the media** (www.ecomagazin.ro; www.ccmesi.ro; www.libertatea.ro). In the future, we aim to disseminate the information related to habitat occupancy and to actively collaborate with the protected areas managers for the establishment of effective conservation measures. Furthermore, we have replied to all the questions of potential beneficiaries of RSG grants in Romania that requested the support of our team.

7. Timescale: Over what period was the RSG used? How does this compare to the anticipated or actual length of the project?

The project was implemented in the initially agreed period, with a 2 months extension for Outcome 2. Thus, Outcome 1 was developed between May 2008 and December 2008; Outcome 2 between May 2008 – October 2008 and March 2009 – April 2009; Outcome 3 between October 2008 – May 2009.

8. Budget: Please provide a breakdown of budgeted versus actual expenditure and the reasons for any differences. All figures should be in £ sterling, indicating the local exchange rate used.

Item	Budgeted Amount	Actual Amount	Difference	Comments
Transportation	1650	1650		- train tickets for travelling in the project area - bus tickets for travelling in the project area - fuel for car for travelling in project area
Subsistence	3000	3000		- per diem for field trips for assessing the evaluation of conservation status; - per diem field trips for determining the occupancy area - per diem for organising the meeting - per diem for raising awareness campaign
Consumable materials	800	850	+50	- cartridge – for printing reports and materials - General office supplies (paper, folders, envelopes, notes for field observations, ball point pens) - Batteries - Permanent markers - other consumables

Equipments	4900	4850	-50	- glue on GPS transmitters for tortoises - works for creating a tortoise quarantine area in Eselnita village (a surface with 120 sq. m with grass split in 4 squares, basking site, boxes etc)
Publishing costs	1100	1100		- CD-Rom printed in 500 exemplars (matrix, CD-Rom, labels, case) - printings 1000 postal cards with message Tortoise need your help (will be distributed in IGNP area)
Communications	500	500		- Phone - E-mail, Internet - postal costs - project web page hosting
TOTAL	11950	11950		

9. Looking ahead, what do you feel are the important next steps?

As for future perspective, we need to strengthen the abandoned tortoise reintroduction action and to produce a reliable assessment of the road traffic-generated mortality, especially considering the development of the existing roads network subsequently to EU integration. The project team should be involved in other projects related to species and habitats conservation, in order to maintain the knowledge and expertise gained within the RSG project.

10. Did you use the RSGF logo in any materials produced in relation to this project? Did the RSGF receive any publicity during the course of your work?

- scientific paper: (Assessment of threatened status of *Testudo hermanni boettgeri* Mojsisovics, 1889 (Reptilia: Testudines: Testudinidae) population from Romania", submitted for *North-Western Journal of Zoology*);
- Scientific conferences (Society for Conservation Biology 2008 Annual Meeting, Chattanooga, Tennessee, USA, 13-17 July 2008: Present and predicted distribution area of Hermann's tortoise (*Testudo hermanni*) from Romania: implications for conservation)
- website: www.portiledefier.ro/carapax
- CD-Rom "Hermann's tortoise needs your help"
- Book "Metode de analiza a distributiei areal-geografice a testoasei lui Hermann (*Testudo hermanni* Gmelin, 1789) in Romania. Case study: Parcul Natural Portile de Fier", University of Bucharest Publishing House (see <http://www.portiledefier.ro/ccmesi/carti.html>)
- postcard: "Tortoise need your help"
- articles in websites www.ecomagazin.ro; www.ccmesi.ro; www.libertatea.ro