



EUROBATS Projects Initiative

“*Nyctalus lasiopterus* in the Eastern Europe: inventory of current status, proposals to revise the species status in IUCN Red List and conservation. Hungary, Ukraine, Russia”

Rufford Small Grants for Nature Conservation Project number: 12176-2

“*Nyctalus lasiopterus* in the Eastern Europe: inventory of current status, proposals to revise the species status in IUCN Red List and conservation”

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Final Report

Abstract. In July 2014 international team of bat researcher from Ukraine and Hungary did bat observation in Bükk Mountains, the Bükk National Park (Hungary), with focus of *N. lasiopterus*. The radiotelemetry field training was managed too. The main line of development of the project and international co-operation for 2015-2016 has been planned. The focus species was not recorded in Hungary expedition.

Expedition to Hungary activity of 2014 year



Our team in Hungary, from left to right: Dr. Peter Estok, Krisztina Szoke, Dr. Anton Vlaschenko, Kseniia Kravchenko (the Bükk Mountains area)

The field activity of 2014 year was target to get experience in bat research in international team. We got a good chance to work together with Dr. Peter Estok who is the best specialist on *N. lasiopterus* in the Central Europe. We worked together for 8 days (16-24 July) in Bükk Mountains it is in area where the *N. lasiopterus* was captured at first for Hungary (in 1950th) and was recorded in past decades. We did mistnetting, studied techniques of acoustic lure and got the radiotelemetry skills.

Totally we caught 30 individuals of 5 species (*M. daubentonii*, *M. brandtii*, *M. alcahoae*, *N. leisleri*, *N. noctula*, *P. pipistrellus* and *P. pygmaeus*). Unfortunately it is not very lucky with the weather; it was very rainy and coldly from 20 to 24 of July.

The bad weather did not prevent the conduct of training on telemetry. Within a few days we were trained to use the receiver; looking transmitters placed in different places (houses, trees, random places) and at different distances. During the search, move, we move on foot and by car.



Left: Peter Estok put together acoustic lure system for attracting of *N. lasiopterus*. Photo by Anton Vlaschenko. Right: Acoustic lure system was working near a mistnet. Photo by Anton Vlaschenko



Left: Two types of the receivers were available. Photo by Anton Vlaschenko. Right: Preparing the equipment for training. Photo by Anton Vlaschenko

The important next steps, looking ahead, intermediate results

On the current moment (the end of 2014) the main aim of the project has not been achieved. The IUCN species status has not changed. The last step divides us from to reviewing all the material collected and presented both the paper and report for IUCN. During 2014 we contacted and met bat experts from different countries who have agreed to help us complete this review. Here they are Dr. Peter Estok (Central Europe), Dr. Suren Gazaryan (Russia, Caucasus), Dr. Serbulent Paksuz (Turkey) and Dragos Mantoiu (Romania). We are planning to finish the review for the end of March 2015.



After the preparation of the review of *N. lasiopterus* distribution we are planning to construction of a model of the species distribution (which should include data on climate, altitudes, composition of tree stands and square of forest areas etc.). On the basis of this modeling, we plan to evaluate potential forest areas or regions where this species can inhabit yet. Is possible that *N. lasiopterus* dwelling place may be in Romania, Ukrainian Carpathian and Belarus at that. This part of the work is planned for mid-late 2015. These terms will be the formation of new applications for funding of future field work (2016-2017). When we wish to apply experience and skills in telemetry in Chernobyl Exclusion Zone.

It should be noted that due to realization of this project came the first change in viewing on the East range of *N. lasiopterus*. In an earlier edition of the Bats of Europe (Dietz et al., 2009) European bat range of the species in the East (Ukraine, Russia and South-east Belarus) presented a solid color. In the book published this year (Dietz and Kiefer, 2014) *N. lasiopterus* range in Ukraine and European Russia shows taking into account the data in our article (Vlaschenko et al., 2010) and Reports on the results of the Second part of the project (Vlaschenko, 2013) (www.m.kosmos.de/11560/t42). Dietz and Kiefer (2014) also took into account our estimates of population size and type of threats for this species.

In 2014 we have achieved the goals that were not achieved in 2013. Equipment for radiotelemetry was tested and we got the necessary experience for future work by our team self.

Literature

Dietz C., von Helversen O. & Nill D. (2009). Greater Noctula Bat, *Nyctalus lasiopterus* (Schreber 1780). In: Bats of Britain, Europe & Northwest Africa (English edition). P. 273-276, A & C Black Publishers Ltd, London.

Dietz C., Kiefer A. (2014). Riesenabendsegler, *Nyctalus lasiopterus* (Schreber 1780) Greater Noctula Bat. In: Die Fledermäuse Europas (kennen, bestimmen, schützen). P. 298-301, Kosmos.

Vlaschenko A., Gashchak S., Gukasova A. & Naglov A. (2010). New record and current status of *Nyctalus lasiopterus* in Ukraine (Chiroptera: Vespertilionidae). *Lynx, n. s. (Praha)*. **41**, 209-216.



Vlaschenko A. (2013). *Nyctalus lasiopterus* in the Eastern Europe: inventory of current status, proposals to revise the species status in IUCN Red List, and conservation. – Report for Rufford Small Grants for Nature Conservation Project number 12176–2, 8 p.