

Katma Award 2016, to Muhammad Asghar, Dennis Hasselquist, Bengt Hansson, Pavel Zehndjiev, Helena Westerdahl, and Staffan Bensch

Source: The Condor, 118(4) : 872

Published By: American Ornithological Society

URL: <https://doi.org/10.1650/CONDOR-16-126.1>

BioOne Complete (complete.BioOne.org) is a full-text database of 200 subscribed and open-access titles in the biological, ecological, and environmental sciences published by nonprofit societies, associations, museums, institutions, and presses.

Your use of this PDF, the BioOne Complete website, and all posted and associated content indicates your acceptance of BioOne's Terms of Use, available at www.bioone.org/terms-of-use.

Usage of BioOne Complete content is strictly limited to personal, educational, and non-commercial use. Commercial inquiries or rights and permissions requests should be directed to the individual publisher as copyright holder.

BioOne sees sustainable scholarly publishing as an inherently collaborative enterprise connecting authors, nonprofit publishers, academic institutions, research libraries, and research funders in the common goal of maximizing access to critical research.



SOCIETY AWARD

Katma Award 2016, to Muhammad Asghar, Dennis Hasselquist, Bengt Hansson, Pavel Zehtindjiev, Helena Westerdahl, and Staffan Bensch

Published November 2, 2016

The Katma Award of the Cooper Ornithological Society is intended to encourage the formulation of new ideas that could change the course of thinking about the biology of birds. This award, proposed and sponsored by Dr. Robert W. Storer, is to be given to the author(s) of an outstanding paper related to ornithology that offers unconventional ideas or innovative approaches, backed by a well-reasoned argument.

The Cooper Ornithological Society is pleased to present the 2016 Katma Award to Dr. Muhammad Asghar, Infectious Disease Unit, Department of Medicine Solna, Karolinska Institute, Stockholm, Sweden; Dr. Dennis Hasselquist, Department of Biology, Lund University, Lund, Sweden; Dr. Bengt Hansson, Department of Biology, Lund University; Dr. Pavel Zehtindjiev, Institute of Biodiversity and Ecosystem Research, Bulgarian Academy of Sciences, Sofia, Bulgaria; Dr. Helena Westerdahl, Department of Biology, Lund University; and Dr. Staffan Bensch, Department of Biology, Lund University, for their paper "Hidden costs of infection: Chronic malaria accelerates telomere degradation and senescence in wild birds," which appeared in 2015 in *Science* (347:436–438).

For decades, ornithologists have recognized that parasites and the diseases they cause are an important evolutionary force. For instance, the bright feather coloration of birds is proposed to evolve in response to parasites, and parasites can shape the ranges of birds. With so much focus on avian disease and such a broad foundation of knowledge regarding how parasites interact with birds, the data and insights presented by Asghar, Hasselquist, Hansson, Zehtindjiev, Westerdahl, and Bensch are startling in their novelty and implications. These authors analyzed life-history data from a long-term study of Great Reed Warblers (*Acrocephalus arundinaceus*) in Sweden, including in particular the fitness costs of malaria infection by the protozoan parasites *Plasmodium* spp. and *Haemoproteus* spp. A large proportion of bird populations on Earth deal with malaria infections, so the implications of such a study are potentially far-reaching. The results reported by Asghar and colleagues challenge conventional thinking that low-level, chronic malarial infections in birds have no fitness consequences. They found that low-level infection by malarial parasites caused significant negative effects on reproduction and longevity. Moreover, they presented data showing that the mechanism

by which malarial infection influenced survival and reproduction was through negative effects on telomeres, the nucleoprotein structures that cap the ends of chromosomes. The 2016 Katma Award is bestowed upon Asghar and colleagues for the novel approaches they took in the study of subtle effects of avian malaria on songbirds. Their study challenges conventional thinking regarding the fitness consequences of low-level parasite infections, with large implications for avian life-history theory.

The Katma Award, sponsored by Dr. Robert W. Storer, is intended to encourage the formulation of new ideas that could change the course of thinking about the biology of birds. It is given to the author(s) of research articles, short communications, or commentaries (e.g., editorials, reviews) of any length, published in any scientific venue, that offer unconventional ideas or innovative approaches, backed by a well-reasoned argument. The Katma Award is given only when it is merited, and no more than once a year. The award consists of approximately \$2,500 plus a certificate and is given at the annual meeting of the Cooper Ornithological Society. Katma funds also may be used for activities that are consistent with the award, such as plenary lectures, symposia, and support of publication. A full explanation of the Katma Award was published in *The Condor* (105:843) in 2003.



Katma Award 2016 winners: (left to right) Muhammad Asghar, Dennis Hasselquist, Bengt Hansson, Pavel Zehtindjiev, Helena Westerdahl, and Staffan Bensch.