Zosterops japonicus 正體中文

System: Terrestrial

Kingdom	Phylum	Class	Order	Family
Animalia	Chordata	Aves	Passeriformes	Zosteropidae

Common name mejiros (English), Japanese white-eye (English)

Synonym

Similar species

Summary Zosterops japonicus (Japanese white-eye) is a small songbird that has been introduced to the Pacific region from Asia. It is an arboreal species that can be found in a wide variety of habitats. It is known to consume the fruit of certain species of invasive plants and aids in their dispersal. There is reason to believe that some competition may occur between Zosterops japonicus and native bird species that inhabit similar ecological niches, but current research has found very little evidence of negative impact.

view this species on IUCN Red List

Species Description
Zosterops japonicus (Japanese white-eye) are small songbirds with a body length of 10-12cm and weight 9.75-12.75g. They have a slightly curved black bill that extends from a yellow forehead. They have been given the common name \"white-eye\" because of a silky white ring found around both eyes, however this is not always present on juveniles. Japanese white-eyes can be a range of colours, from olive to dusky green, with blackish brown outlined in green covering the top of the tail and flight feathers. The underside of the tail and the chin are decidedly yellow. The throat is also yellow with the exception of a single band of smoke-grey. The breast and belly are dull-white, becoming dusky brown on sides and flanks. The feet and legs are black. *Zosterops japonicus* is often seen in flocks of 5 to 20 birds and are often seen displaying various acrobatic skills, such as hanging upside down and in every orientation necessary to search for food (Honolulu Zoo, UNDATED; and McDowell, UNDATED).

Notes
Zosterops japonicus (Japanese white-eye) is a very energetic avian species. The Honolulu Zoo (UNDATED) describes their personality as restless and nervous as they are constantly on the move. Their song can be heard from a great distance except in the nesting season. Their song can be described as a bell like \"tzee\" or \"pseet\". *Z. japonicus* also display shows of teamwork which can often be seen during the daytime when they team up with other small birds to scare off larger birds (Honolulu Zoo, UNDATED).

Lifecycle Stages
The hatching of *Zosterops japonicus* (Japanese white-eye) eggs is generally synchronised. The newborn chicks are altricial, with their eyes closed and no egg-tooth present. Chick mass is usually about 1.1g at hatching and they gain about 1g per day to 7 days of age. Eyes open by 5 days; feather tracks (spinal, femoral, ventral, humeral and wing) visible in skin by second day post-hatching. Young are partially bald or still in pinfeathers on head at fledging. Fledging occurs 10-12 days past hatching. Chicks are usually unable to fly for 1-6 days after leaving the nest. The distinctive white-eye ring is fully developed at 23 days and by 30 days of age the young birds are indistinguishable from adults. Chicks remain with their parents for 15-20 days, after which the parents begin new nests and actively chase brood away from territory. Juveniles form flocks until the following season when they form pairs. Age at first nesting attempt is usually one year. Cooperative breeding has been reported in this species in the wild only occasionally. (McDowell, UNDATED).

Uses
Zosterops japonicus (Japanese white-eye) are easy to tame and their song and sociable nature has made it a favourite for the caged bird market. *Zozterops japonicus* consume large numbers of noxious insects and larvae, helping to keep insect populations in check. *Z. japonicus* also serve as a great cross-pollinator due to its frequent movements from tree to tree in search of food. (Honolulu Zoo, UNDATED).

Habitat Description
Zosterops japonicus (Japanese white-eye) are arboreal (spending most of their time in trees) and are found in the foliage of trees and shrubs searching for food. They can be found from sea level to the tree lines of areas with less than 25cm of annual rainfall and in rainforests with more than 760cm of annual rainfall. They will inhabit open forest, forest edge, mangrove thickets, plantations, gardens and parks in urban areas (ARCBC, UNDATED; Honolulu Zoo, UNDATED; and McDowell, UNDATED).

Reproduction
Zosterops japonicus (Japanese white-eye) form monogamous pairs and become very territorial when nesting. The breeding season ranges from February to December (in the northern hemisphere), but most breeding occurs between July and August. Their nests are found at various heights in trees. Nests are made of different materials, such as grass, plant material, string, tin foil, leaves, mosses and cobwebs or spider cocoons. Their nest is very neat and resembles a woven basket and is attached to the fork of a branch, usually using spider webs. Closer to urban developments, nests are often lined with human hair. *Zosterops japonicus* lay two to five pale blue eggs that take ~11 days to incubate and both the male and female share parental responsibility (Honolulu Zoo, UNDATED).

Nutrition
Zosterops japonicus (Japanese white-eye) search nooks and crannies of trees and shrubs throughout all levels and density of foliage and vegetation. They feed on insects by gleaning over and under leaves and flowers, along with probing bark for larvae and insects. It forages throughout the day for insects ranging from beetle and fly larvae to spiders. This species also consumes nectar and fruit, which is also a source of additional insects. The flesh of ripe persimmon, as well as papaya, avocado, and the Chinese banyan are all consumed (Honolulu Zoo, UNDATED; and McDowell, UNDATED).

General Impacts
In the Hawaii Volcanoes National Park *Zosterops japonicus* (Japanese white-eye) consume the fruit of the invasive nitrogen-fixing tree *Myrica faya* and aids in the dispersal of this exotic (Woodward *et al.* 1990). Because there are no native symbiotic nitrogen-fixers in the very nitrogen-poor volcanic soils of Hawai'i, there is a high likelihood that *M. faya* will facilitate further invasions of other non-indigenous plant species (Simberloff and Holle, 1999).
It is known that the white-eye competes with native honey-creepers for small berries and nectar, but whether or not the competition is serious to the point that it endangers the honey-creepers has not been fully determined, but present studies like those by Kawakami and Higuchi (2003) have initially found very little negative ecological impact on native species (Honolulu Zoo, UNDATED; and Kawakami and Higuchi, 2003).

Principal source: Honolulu Zoo, UNDATED. *Japanese White-Eye*
McDowell, UNDATED *Japanese White-eye, Zosterops japonicus*

Compiler: National Biological Information Infrastructure (NBII) & IUCN/SSC Invasive Species Specialist Group (ISSG)

Review:

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ALIEN RANGE

[1] INDIA
[1] KOREA, REPUBLIC OF
[1] PAKISTAN
[1] SRI LANKA
[1] THAILAND
[1] KOREA, DEMOCRATIC PEOPLE'S REPUBLIC OF
[1] LAO PEOPLE'S DEMOCRATIC REPUBLIC
[1] PHILIPPINES
[1] TAIWAN
[2] UNITED STATES

Red List assessed species 13: CR = 4; EN = 2; VU = 2; NT = 3; LC = 2;

Apalopteron familiare **NT**
Chlorodrepanis virens **LC**
Hemignathus parvus **VU**
Loxops coccineus **EN**
Melamprosops phaeosoma **CR**
Myadestes palmeri **CR**
Vestiaria coccinea **VU**
Chasiempis sandwichensis **NT**
Hemignathus lucidus **CR**
Himatione sanguinea **LC**
Manucerthia mana **EN**
Myadestes obscurus **NT**
Oreomystis bairdi **CR**

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ITIS (Integrated Taxonomic Information System), 2005. Online Database *Zosterops japonicus*

Summary: An online database that provides taxonomic information, common names, synonyms and geographical jurisdiction of a species. In addition links are provided to retrieve biological records and collection information from the Global Biodiversity Information Facility (GBIF) Data Portal and bioscience articles from BioOne journals.

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