

# Lesser Yellowlegs

*Tringa flavipes*

Class: Aves  
Order: Charadriiformes

**Review Status:** Peer-reviewed

**Version Date:** 21 February 2019

## Conservation Status

NatureServe:

Agency:

G Rank: G5

ADF&G: Species of Greatest Conservation Need

IUCN: Least Concern

Audubon AK: Red

S Rank: S5B

USFWS: Bird of Conservation Concern

BLM:

Final Rank		
Conservation category: <b>II. Red</b>		
high status and either high biological vulnerability or high action need		
Category	Range	Score
Status	-20 to 20	10
Biological	-50 to 50	-36
Action	-40 to 40	4
<b>Higher numerical scores denote greater concern</b>		

**Status** - variables measure the trend in a taxon's population status or distribution. Higher status scores denote taxa with known declining trends. Status scores range from -20 (increasing) to 20 (decreasing).

**Score**

*Population Trend in Alaska (-10 to 10)*

10

Although data are limited, significant short- and long-term declines have been noted in Alaska (Handel and Sauer 2017; Sauer et al. 2017) and across its North American range (Morrison et al. 2006; Andres et al. 2012a). Data from Breeding Bird Surveys (BBS) from 1966 to 2011 estimated a range-wide population decline of 5.3% annually (Sauer et al. 2013).

*Distribution Trend in Alaska (-10 to 10)*

0

Unknown.

Status Total: 10

**Biological** - variables measure aspects of a taxon's distribution, abundance and life history. Higher biological scores suggest greater vulnerability to extirpation. Biological scores range from -50 (least vulnerable) to 50 (most vulnerable).

**Score**

*Population Size in Alaska (-10 to 10)*

-10

Uncertain. The global population is estimated to be between 400,000 (Morrison et al. 2006) and 660,000 individuals (ASG 2019). 24% of the population (~100,000 individuals) is thought to breed in Alaska (ASG 2019).

*Range Size in Alaska (-10 to 10)*

-10

Breeds across boreal forests of northern North America, from Ontario, CAN to Alaska, USA. In Alaska, its distribution follows the distribution of treeline: lesser yellowlegs breed throughout

southcentral, southcoastal, and the northern tip of southeast Alaska, north to the Brooks Range and west to the Kobuk River and Lake Clark National Park (Tibbitts and Moskoff 2014). Overwinters in South and Central America (Tibbitts and Moskoff 2014). Estimated range in Alaska is >400,000 sq. km.

*Population Concentration in Alaska (-10 to 10)*

-10

During migration, travels in small flocks (Tibbitts and Moskoff 2014). For example, hundreds have been observed on Middleton Island during fall migration (Tibbitts and Moskoff 2014). Other important concentration areas have not been identified. It is uncommon for birds to spend a long period of time resting in Alaska during autumn migration, but those who have remained in coastal habitats (L. McDuffie, USFWS, pers. comm.). Since only small groups have been reported in Alaska, especially relative to its population size, we estimate that concentration sites exceed 250 sites.

*Reproductive Potential in Alaska*

Age of First Reproduction (-5 to 5)

-3

Unknown, but most individuals likely breed between 3 and 4 years of age. Less than 1/3 of banded individuals were seen on breeding grounds as yearlings or as 2-year olds, with some of these individuals confirmed to have bred (Tibbitts and Moskoff 2014).

Number of Young (-5 to 5)

1

Lays 3 to 4 eggs per clutch per year (Tibbitts and Moskoff 2014, L. McDuffie, USFWS, pers. comm.). Replacement clutches are possible if the first one fails (Tibbitts and Moskoff 2014).

*Ecological Specialization in Alaska*

Dietary (-5 to 5)

1

Limited data for Alaska, though they have been observed eating a variety of insects, especially midges and shoreflies (Tibbitts and Moskoff 2014). In Anchorage, AK, breeding adults have been observed feeding on freshwater leeches in early season (L. McDuffie, USFWS, pers. comm.). Elsewhere in their range, they have a varied diet comprised mostly of aquatic and terrestrial invertebrates; however, there is evidence that some prey are preferentially selected (Tibbitts and Moskoff 2014).

Habitat (-5 to 5)

-5

During breeding season, inhabit boreal forests and forest-tundra ecotones. Within this biome, they forage along the shores of freshwater or coastal waterbodies (Tibbitts and Moskoff 2014) and use a variety of habitat types for nesting. In Anchorage, nests have been observed in dense coniferous forests, open mixed forests, and black spruce bogs (L. McDuffie, USFWS, pers. comm.). Also nest successfully in habitats influenced by human activities such as utility line clearings and clear-cuts. During migration, use coastal habitats before moving inland to reach stop-over locations in the Canadian prairies (L. McDuffie, USFWS, pers. comm.).

Biological Total: -36

**Action** - variables measure current state of knowledge or extent of conservation efforts directed toward a given taxon. Higher action scores denote greater information needs due of lack of knowledge or conservation action. Action scores range from -40 (lower needs) to 40 (greater needs).

**Score**

*Management Plans and Regulations in Alaska (-10 to 10)*

-10

Protected under the Migratory Bird Treaty Act (MBTA 1918). In Alaska, subsistence harvest is permitted at certain times of the year (AMBCC 2018). Although outside the scope of this question, it is important to note that there is unregulated harvest that occurs in the Caribbean and in northeastern South America. Lesser yellowlegs are one of the most widely harvested shorebirds in some areas (Ottema and Spaans 2008; Wege et al. 2014; Taylor 2016).

*Knowledge of Distribution and Habitat in Alaska (-10 to 10)* 2

General habitat associations and distribution are known from multi-species bird surveys (e.g. ALMS and BBS; Tibbitts et al. 2006; Savage and Payne 2012; Handel and Sauer 2017; Amundson et al. 2018; references in Habitat section above). However, the remote, forested nature of its nesting habitat means its breeding distribution is not well-understood. Data on migration and staging locations are also sparse, though recent tracking efforts are addressing these questions (DeCicco et al. 2016; Christie et al. 2018). Ongoing research projects are investigating habitat use during breeding and autumn migration, and migratory movements including locations of important staging areas in Alaska (L. McDuffie, USFWS, pers. comm.).

*Knowledge of Population Trends in Alaska (-10 to 10)* 2

Monitored in parts of its Alaskan range through the Breeding Bird Survey (BBS) and other multi-species surveys (Handel and Sauer 2017). Data can be used to determine short-term and long-term population trends (Handel and Sauer 2017), though BBS data have some deficiencies (Sauer et al. 2013; Sauer et al. 2017). This species is not monitored across most of its range in Alaska.

*Knowledge of Factors Limiting Populations in Alaska (-10 to 10)* 10

Very little is known about the ecology of this species and the factors that limit its population dynamics in Alaska. Hunting on wintering grounds is limiting. Strong harvest pressure occurs in the Caribbean and in northeastern South America (Ottema and Spaans 2008; Wege et al. 2014; Watts et al. 2015; Taylor 2016; Reed et al. 2018a) and some of the hunted birds originated on breeding grounds in Alaska (Reed et al. 2018a). Harvest data are limited in Alaska and do not differentiate Lesser Yellowlegs from 23 other species of small shorebirds (Naves 2015). Nevertheless, combined estimates suggest low rates of harvest, especially in interior Alaska (Naves 2015). Other factors that limit this population have not been investigated. In the 1990s, hatching success was high in southern Alaska, while fledging success ranged from 27% to 34%, but no further data are available (Tibbitts and Moskoff 2014). Importantly, additional research is needed to determine the impacts of drying wetlands on habitat and food availability (Riordan et al. 2006; ASG 2019). Lesser yellowlegs are dependent upon wetlands remaining wet for the full breeding season and population numbers may fluctuate depending on water levels dictated by the previous season's snowfall or the manipulation of water levels by humans.

Action Total: 4

**Supplemental Information** - variables do not receive numerical scores. Instead, they are used to sort taxa to answer specific biological or management questions.

<b>Harvest:</b>	Substantial, regulations
<b>Seasonal Occurrence:</b>	Breeding
<b>Taxonomic Significance:</b>	Monotypic species
<b>% Global Range in Alaska:</b>	>10%
<b>% Global Population in Alaska:</b>	25-74%
<b>Peripheral:</b>	No

## References

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- Amundson, C. L., C. M. Handel, D. R. Ruthrauff, T. L. Tibbitts, and R. E. Gill. 2018. Montane-breeding bird distribution and abundance across national parks of southwestern Alaska. *Journal of Fish and Wildlife Management* 9(1):180–207. DOI: 10.3996/062017-JFWM-050
- Andres, B. A., P. A. Smith, R. G. Morrison, C. L. Gratto-Trevor, S. C. Brown, and C. A. Friis. 2012a. Population estimates of North American shorebirds, 2012. *Wader Study Group Bulletin* 119(3):178-194.

- Alaska Shorebird Group (ASG). 2019. Alaska Shorebird Conservation Plan, Version III. Alaska Shorebird Group, Anchorage, AK, USA. Available online: <https://www.fws.gov/alaska/mbsp/mbm/shorebirds/plans.htm>
- Christie, K., J. Johnson, L. McDuffie, and A. Taylor. 2018. Migratory connectivity of lesser yellowlegs (*Tringa flavipes*). Pages 45-47 in Kennedy, L., ed. Annual summary compilation: New or ongoing studies of Alaska shorebirds. Alaska Shorebird Group, Anchorage, AK, USA. Available online: [https://www.fws.gov/alaska/mbsp/mbm/shorebirds/working\\_group.htm](https://www.fws.gov/alaska/mbsp/mbm/shorebirds/working_group.htm)
- DeCicco, L. H., J. A. Johnson, L. McDuffie, and R. Lanctot. 2016. Migratory connectivity of lesser yellowlegs (*Tringa flavipes*) and solitary sandpipers (*Tringa solitaria*) breeding in south-central Alaska. Pages 36-37 in Jochum, K., ed. Annual summary compilation: new or ongoing studies of Alaska shorebirds. Alaska Shorebird Group, Anchorage, AK, USA. Available online: [https://www.fws.gov/alaska/mbsp/mbm/shorebirds/working\\_group.htm](https://www.fws.gov/alaska/mbsp/mbm/shorebirds/working_group.htm)
- Handel, C. M. and Sauer, J. R. 2017. Combined analysis of roadside and off-road breeding bird survey data to assess population change in Alaska. *The Condor* 119(3):557-575. DOI: 10.1650/CONDOR-17-67.1
- Migratory Bird Treaty Act (MBTA). 1918. U.S. Code Title 16 §§ 703-712 Migratory Bird Treaty Act.
- Morrison, R. I. G., B. J. McCaffery, R. E. Gill, S. K. Skagen, S. L. Jones, G. W. Page, C. L. Gratto-Trevor, and B. A. Andres. 2006. Population estimates of North American shorebirds, 2006. *Wader Study Group Bulletin* 111:27-85.
- Naves, L. C. 2015. Alaska subsistence bird harvest, 2004-2014 data book. Special Publication No. 2015-05, Alaska Department of Fish and Game, Division of Subsistence, Anchorage, AK, USA.
- Ottema, O. H., and A. L. Spaans. 2008. Challenges and advances in shorebird conservation in the Guianas, with a focus on Suriname. *Ornitologia Neotropical* 19(Suppl):339-346.
- Reed, E. T., K. J. Kardynal, J. A. Horrocks, and K. A. Hobson. 2018a. Shorebird hunting in Barbados: Using stable isotopes to link the harvest at a migratory stopover site with sources of production. *The Condor* 120(2):357-370. DOI: 10.1650/CONDOR-17-127.1
- Riordan, B., D. Verbyla, and A. D. McGuire. 2006. Shrinking ponds in subarctic Alaska based on 1950-2002 remotely sensed images. *Journal of Geophysical Research* 111:G04002. DOI: 10.1029/2005JG000150
- Sauer, J. R., W. A. Link, J. E. Fallon, K. L. Pardieck, and D. J. Ziolkowski. 2013. The North American Breeding Bird Survey 1966-2011: Summary analysis and species accounts. *North American Fauna* 79:1-32. DOI: 10.3996/nafa.79.0001
- Sauer, J. R., D. K. Niven, K. L. Pardieck, D. J. Ziolkowski, and W. A. Link. 2017. Expanding the North American Breeding Bird Survey analysis to include additional species and regions. *Journal of Fish and Wildlife Management* 8(1):154-172. DOI: 10.3996/102015-JFWM-109
- Savage, S. E., and K. J. Payne. 2012. Alaska landbird monitoring survey activities at the Alaska Peninsula/Becharof National Wildlife Refuge, Alaska Peninsula, Alaska. U.S. Fish and Wildlife Service, Alaska Peninsula/Becharof NWR Complex, King Salmon, AK, USA.
- Taylor, A. R. 2016. Final report: Hunter surveys in the Mana Ricefields, French Guiana. University of Alaska, Anchorage, AK, USA.
- Tibbitts, T. L. and W. Moskoff. 2014. Lesser Yellowlegs (*Tringa flavipes*), version 2.0. In Poole, A. F., ed. *The Birds of North America*, Cornell Lab of Ornithology, Ithaca, NY, USA. DOI: 10.2173/bna.427
- Tibbitts, T. L., D. R. Ruthrauff, R. E. Gill, Jr., and C. M. Handel. 2006. Inventory of montane-nesting birds in the Arctic Network of National Parks, Alaska. Report NPS/AKARC/NRTR-2006/02/, Arctic Network Inventory and Monitoring Program, National Park Service, Alaska Region, Fairbanks, AK, USA.
- Watts, B. D., E. T. Reed, and C. Turrin. 2015. Estimating sustainable mortality limits for shorebirds using the Western Atlantic Flyway. *Wader Study* 122(1):37-53. DOI: 10.18194/ws.00005
- Wege, D. C., W. Burke, and E. T. Reed. 2014. *Migratory shorebirds in Barbados: Hunting, management and conservation*. BirdLife International, Cambridge, UK.