REDSISKIN INITIATIVE

Work plan for **Red Siskin** Conservation

Has anyone seen a Red Siskin?

Venezuelan 20.000 bolívares note

Red Siskin Initiative, 2017

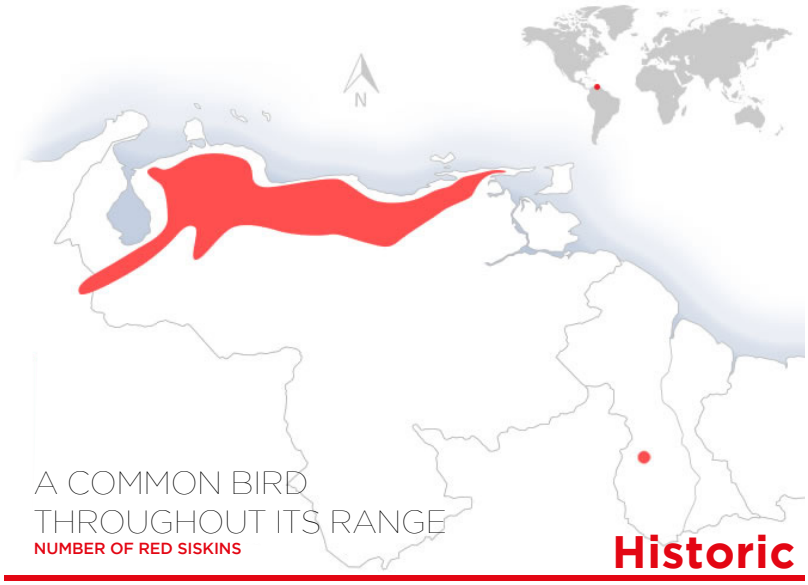
Historically, **the Red** or **Hooded Siskin** *(Spinus cucullatus)* lived in premontane humid and dry ecosystems across much of northern Venezuela, with small populations in eastern Colombia and the island of Trinidad and Tobago. Also, a population of between 1000 to 3000 Red Siskins was discovered almost 1000 km away in southern Guyana in 2000 and a few small colonies may persist on the island of Puerto Rico. However, it is unclear whether this species has a natural origin in either of these locations or was introduced by humans. What had been the majority population in Venezuela has been reduced to only a few, small and fragmented groups today.

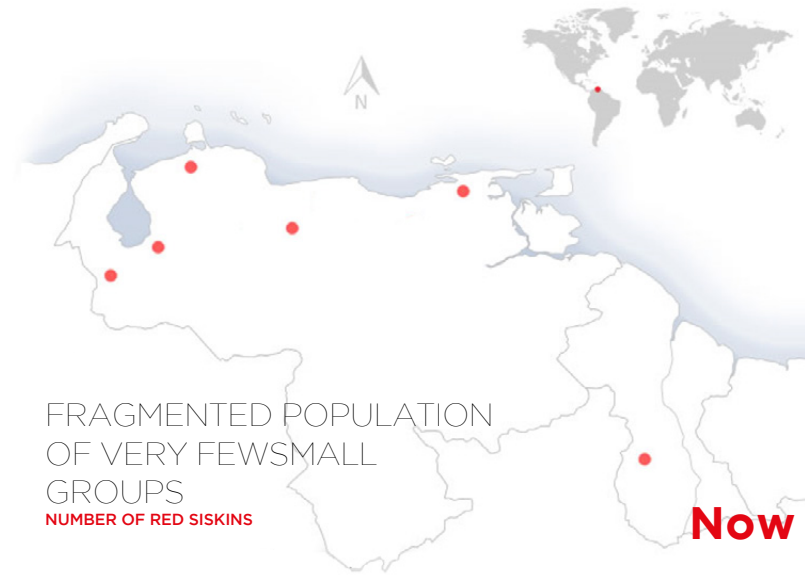
The most recent estimate, from 2015, suggests the population continues to decline and is now below 3000 individuals and possibly as low as only a few hundred birds. This decline has been caused mainly by trapping for the illegal pet trade, both regionally and internationally, and loss of habitat due to conversion for agriculture and land development.

The pride of Venezuela is near extinction

There is a special relationship between the Venezuelan people and the Red Siskin, which may be crucial to its survival and recovery. This beautiful bird has been an inspiration for many singers, poets, and painters. It is celebrated on the highest denomination of Venezuelan currency and on the cover of Venezuela's Red Book of Threatened Fauna. It is also the official bird of Lara state, as well as mascot of multiple sports teams across the country.

In the near future, the Red Siskin could be the first Venezuelan bird driven to **extinction** in the wild by overexploitation. With the Red Siskin's extinction, we would lose more than a beautiful bird – we lose part of our national identity, our local folklore, and a vital piece of our cultural heritage. On the contrary, saving the Red Siskin and the habitats it needs would also help many other species across its wide historical range as well as preserve important landscape and cultural elements. Thus, the Red Siskin serves as an important umbrella species for protecting species and ecosystems in one of the world's most megadiverse countries.



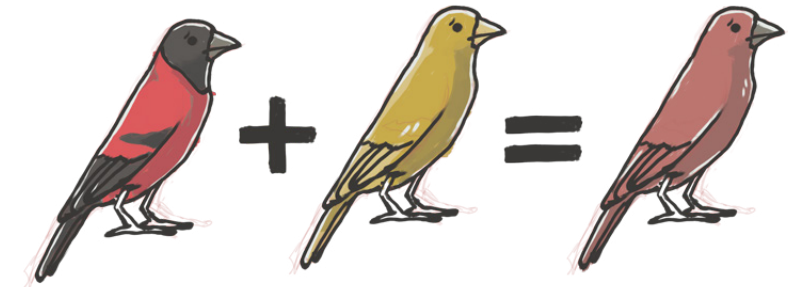


Has anyone seen a Red Siskin?

Threats and causes of extinction

Trafficking

Although the Red Siskin is protected worldwide by the Convention on the International Trade in Endangered Species (CITES) Appendix I, in the United States by the Endangered Species Act, and in Venezuela and Guyana by national legislation, it remains threatened by trafficking for the illegal pet trade. Such trade has been a threat since the 19th century, when it was sought after for feathers as a fashion accessory and as a pet. However, the most dramatic declines occurred in just two decades in the early 20th century, when it became very popular among aviculturalists from the northern hemisphere to try to produce red canaries through hybridization.



Red Siskin + Regular Canary = Red Canary

There are few formal data on seizures of illegally trafficked Red Siskins. We know through the internet and informal sources that Red Siskins are in high demand, both legally and illegally, costing up to $500 per pair. Some specialized aviculturalists also continue to hybridize Red Siskins with canaries and other species. Unlike other species, Red Siskins are trafficked in secret; they are not sold in pet shops or on the streets. Traffic seems furtive, apparently driven by close interpersonal relationships and through the internet. Anecdotal reports indicate that international traffic moves mainly through Trinidad.

Continued demand for wild Red Siskins seems to be driven in part, if not mainly, by the desire to reinvigorate captive lineages that have suffered harmful effects from inbreeding due to poor record keeping and breeding mismanagment. There is also a myth that red canary strains aren't stable or that they lose their vigor over time.

At present, in many parts of the world Red Siskins are being raised for commercial purposes. Even more, red canaries can be obtained with Red Siskins legally reproduced in captivity without the need to continue the plundering of wild populations. However, many popular myths continue to generate demand in the world of poultry farming.

Connections among Red Siskin threats

Need for agricultural and urban expansion

Demand for land for agricultural and urban development

Need for higher income

Desire to keep Red Siskins as pets

Demand of Red Siskins as pets

Desire for red canaries

Demand of Red Siskins to breed hybrid red canaries

Higher price for the Red Siskin

Loss of Red Siskin's habitat

Illegal hunting of adult male Red Siskin

Corruption in public institutions and impunity

Drop in wild Red Siskin Populations

Loss of genetic diversity

EXTINCTION OF RED SISKIN IN THE WILD

Habitat Loss

The tropical dry forests that are important habitat to Red Siskins are one of the most threatened ecosystems in the world. They are endangered in Venezuela due to human overexploitation for urban and agricultural land uses. However, some human activities appear to be compatible with the Red Siskin, such as coffee that is grown in the traditional way, under the forest canopy. Venezuela is famous for traditionally grown coffee farms which still comprise many thousands of acres of land and Red Siskins are known to live and nest in such farms. However, coffee products that are not specialty certified are subject to severe government price controls that make farming unprofitable. As a result more and more farmers have been cutting down their trees and removing coffee to plant non-price controlled sun crops, such as eggplants and peppers, which allow farmers to care for their families. This offers an opportunity for innovative market-based conservation approaches that not only benefit important stakeholders economically but also engage them as agents and messengers for conservation.

Native Species Interactions

Interactions with native species have in recent years become a leading conservation concern for endangered species, especially due to the affect of climate change on shifting species distributions and changes in habitat. Natural recovery of small isolated populations may be constrained by asymmetrical competition with other species that have expanded their distribution or increased their numbers in areas formerly occupied by Red Siskin. In Venezuela, the lesser Goldfinch, *Spinus psaltria*, a common congener of the Red Siskin, exhibits aggressive vocalizations in response to audio playback of Red Siskin only in areas where the Red Siskin is present suggesting potential competition. In Guyana, there is some evidence of hybridization with the closely related Hooded Siskin, *Spinus magellanicus*, which is nearly identical to the Red Siskin except that it has yellow instead of red plumage. Excessive genetic introgression from the Hooded into the Red Siskin population could have deleterious genetic consequences or lead to loss of species genetic identity.

The Red Siskin Initiative (RSI)

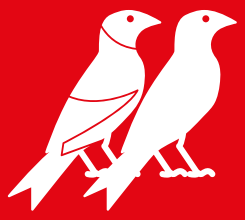
We are an international partnership of public and private institutions, communities, and individuals working to help understand, protect, and restore self-sustaining populations of the Red Siskin across its natural historic range. Leveraging the iconic status of this species, we are working to broaden conservation impact of the RSI to benefit other resident and migratory species and large areas of threatened habitat.

Through our efforts we also aim to strengthen Venezuela's commitment to the preservation of its natural heritage, to inspire more conservation actions. RSI Initiative core partners include: **the Smithsonian Institution**, USA *(National Museum of Natural History; National Zoological Park; Conservation Biology Institute; Center for Conservation and Ecological Genetics, Center for Species Survival, Migratory Bird Center)*; **Provita, a conservation NGO** in Caracas, VE; the **Instituto Venezolano de Investigaciones Científicas (IVIC)**, a government research institute in Caracas, VE; **Parque Zoológico y Botánico Bararida**, a zoo in Barquisimeto Venezuela; **Expanzoo**, a zoo in Caracas, VE; **Colección Ornitológica W.H. Phelps**, a museum in Caracas VE; and **South Rupunini Conservation Society**, a conservation NGO in southern Guyana (Appendix A).

Actions to save the Red Siskin

The complex task of rescuing a species at the brink of extinction is a challenge that requires the multidisciplinary participation of different stakeholders, as well as the execution of joint actions to achieve effective and long-lasting improvements over time. Toward this end, the Red Siskin Initiative has developed the following action plan:

Understanding the Red Siskin



Rescuing, raising, and reintroducing more Red Siskins

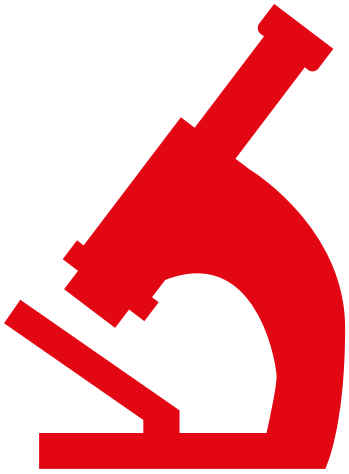
Connecting with people

Ensuring safer habitats

Halting illegal trafficking

Understanding the Red Siskin:

The Red Siskin has not been well studied in the wild. We need ecologists and ornithologists in the field generating knowledge to guide effective and efficient conservation actions. To recover Red Siskins' populations in a sustainable way the following lines of research are essential:



a) Field work

I. Understanding the natural history of the Red Siskin: diet, habitat use, reproduction, and sources of mortality.

II. Modeling the Red Siskin's historical and current distribution of habitats and identifying areas for protection and restoration.

III. Understanding daily, seasonal, and annual movements of the Red Siskin.

IV. Estimating population size and distribution: monitoring of extinction risk through time.

V. Understanding the illegal wildlife trafficking chain: stakeholders, connections, and institutions.

VI. Techniques for restoring the premontane ecosystems of northern Venezuela: applied ecology of tropical dry and wet forests, montane savannahs, and ecotones.

b) Genomics

I. Genome characterization and development of a genomic toolkit: a dense map of species-specific genetic markers to use for *ex situ* and in situ management and monitoring.

II. Phylogeography, genetic structure and demographic change of Red Siskin wild populations.

III. Understanding hybrid ancestry in Red Siskins in captivity and the wild.

IV. Inbreeding, loss of adaptive variation and domestication in captive populations of Red Siskins.

V. Evaluating whether populations in Guyana and the Caribbean have a natural or anthropogenic origin.

VI. Investigating past and contemporary patterns of trade.

c) Captive studies

I. Diets to support the entire Red Siskin life cycle.

II. Understanding social structure and reproduction for group management.

III. Applications to the study of wild populations: vocalizations, video, and sensor technologies.

IV. Optimize pre-release conditioning protocols to adapt birds for living in natural environments.

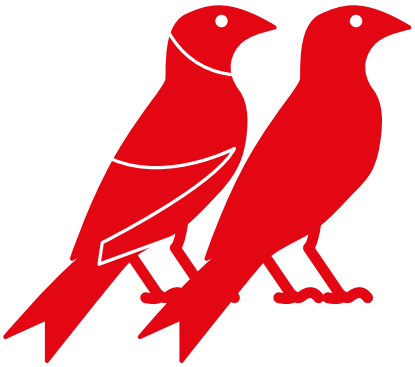
d) Population ecology

I. Multi-stakeholder matrix projection models to understand threats and extinction risk in captive and wild populations.

II. Sensitivity analyses of pan-situ Red Siskin Populations to assess past and future management options: A "OnePlan" action plan for the Red Siskin.

Rescuing, raising, and reintroducing more Red Siskins:

Concurrent with threat reduction and habitat protection efforts, we will release Red Siskins across the species' historical range in Venezuela. The Red Siskin has some features that make it a perfect candidate for conservation breeding activities such as: small size, straightforward reproduction, simple captive requirements, multi-season reproduction and high productivity, and a large number currently in captivity. Captive populations will serve as long-term insurance against extinction, but also as places for rescue and rehabilitation of confiscated birds, education, research, outreach, fundraising, and production for reintroduction:



a) Integrated Conservation and Education Center at Parque Zoológico y Botánico Bararida, Barquisimeto, Venezuela.

b) Integrated Conservation and Education Center at Expanzoo, Caracas Venezuela.

c) Reintroduction facilities in Venezuela.

d) A research Red Siskin colony at the Smithsonian Conservation Biology Institute (Front Royal-VA, USA).

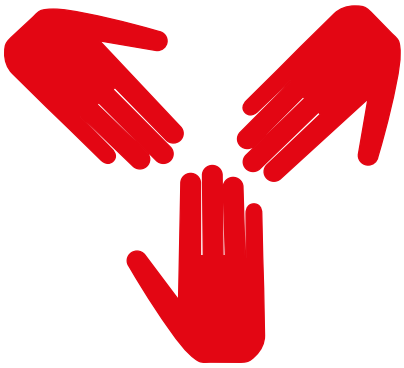
e) Coordinated group management program among private breeders, especially in Europe and Australia.

f) Public outreach and fundraising with captive Red Siskins at the National Zoological Park, Washington DC.

g) Research, outreach, and fundraising with captive Red Siskins in Zoo Miami, Florida USA, and other Association of Zoos and Aquariums (AZA) certified institutions.

Connecting with people:

Human overexploitation is the main problem for Red Siskins and people are also the main solution. Key actions include education, communication, and outreach programs aimed at diverse key stakeholders such as schools, local residents, decision-makers, law enforcement, aviculturalists, and the general public. We will empower each of these stakeholders and give them useful tools to change human behaviors, with their individual and collective actions. We will generate and strengthen the sense of belonging and attachment to this species as a national symbol. Additionally, we will leverage this campaign and the emblematic status of the Red Siskin for the broader benefit of other species and habitats across the region.



a) Reduction of illegal trade in Red Siskins through awareness-raising, education, and effective communication with important stakeholders.

I. Training programs for public servants (National Guard, environmental prosecutors, park rangers) to reduce illegal wildlife trafficking: wildlife identification and enforcement.

II. Training programs in monitoring and reporting for wildlife personnel.

III. Mass communication to reduce illegal wildlife purchases and increase reporting of illicit wildlife trafficking events: radio, TV, press, and social media.

IV. Outreach to and in partnership with the avicultural community to reduce wildlife consumption: captive husbandry and propagation, responsible pet choices, and new directions in aviculture.

b) Increasing secure habitats for Red Siskins through education, awareness-raising, and communication with important stakeholders: reducing destruction and encouraging restoration.

I. Training programs for farmers in Bird-friendly™ farming practices and certification.

II. Incentivizing forest restoration and land sparing agreements.

III. Mass communication to reduce habitat destruction: radio, TV, press, and social media.

c) Communication of RSI actions:

I. To the international public.

II. To schools.

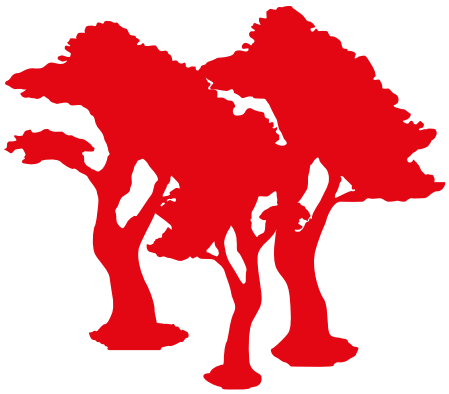
III. To the Venezuelan and Guyanan public and key local stakeholders.

IV. To the scientific community, funders, and international public.

V. To politicians and elected officials.

Ensuring safer habitats:

Red siskins are losing tropical dry forest and other habitats to agriculture and urban development, but some human uses are compatible with thriving wild Red Siskin populations. Coffee farms with the "Bird-Friendly™" habitats Smithsonian certification become "gourmet" foods in Venezuela that are exempt from price controls allowing farmers to earn profit at market prices that are almost 20X higher. Areas with ecotourism activities can generate incomes that benefit the local economy while supporting conservation. Furthermore, such areas if embedded in tropical dry forest contexts could have greater anti-poaching surveillance and thus be potential locations for Red Siskin reintroduction into the wild. These economic activities depend primarily on the health and maintenance of local biodiversity; and at the same time, they could be a way to educate communities where Red Siskins live or will be reintroduced and to directly involve local residents in sustainable activities. In Guyana, Important Bird and Biodiversity Areas (IBAs) are safe habitats for the Red Siskin and many other species.



a) Expansion of Smithsonian certification of "Bird-Friendly™" coffee in the Cordillera de la Costa to preserve and restore threatened habitat for the Red Siskin.

I. Pilot and evaluate project in the rural community *"Piedra de Cachimbo"*, Greater Caracas montane area, Venezuela.

II. Extend the program to other rural communities and coffee farming associations within the historical distribution of the Red Siskin, up to 20.000 hectares.

III. Expansion of the agroforestry program to communities in South Rupununi, Guyana.

b) Declaration of a wildlife refuge for the Red Siskin and other threatened wildlife in South Rupununi, Guyana.

c) Restoration of dry forest ecosystems with other biodiversity-friendly agriculture in the Greater Caracas region: cacao, plantains, citrus, nuts, and other tree crops.

Halting illegal trafficking:

Beyond research and education, additional collaborative work with government agencies and park rangers involved in trafficking is essential for reducing illegal trade, through monitoring and increased effective law enforcement.

a) Improvement of law enforcement using digital tools.

I. Design a digital application (mobile app) for citizens to report information about wildlife trafficking. Market the app using a social media campaign.

b) Lobbying public institutions to improve anti-trafficking legal framework for wildlife.

c) Monitoring for long-term sustainability: setting up a multi-layered system able to detect changes in and improve management of the trafficking threat.

Since 2012, we have raised more than *450,000 USD* to support all activities and project coordination through grant applications and individual donations. These funds have enabled us to establish a firm foundation for success, build an international dream team, and accomplish essential field, genomic, and in situ research. However, our work is far from over. Our mission is to save the entire species from extinction and recover self-sustaining populations to historic levels.

On the following pages we present a summary budget for future activities:

The Project Budget

Project Component	ANNUAL COST
1. PROJECT COORDINATION (Annual)	
• **Inter-country project coordination**	$80.000
• **Coordinator in the United States**	$80.000
• **Coordinator in Guyana**	$12.000
• **Coordinator in Venezuela**	$15.000
2. UNDERSTANDING THE RED SISKIN	
• **Fieldwork**	
• Natural history.	$6.000
• Historical and current habitats to support reintroductions.	$5.500
• Daily, seasonal, and annual movements.	$25.000
• Population size and distribution monitoring.	$18.000
• Illegal trafficking.	$6.500
• Tropical dry forest restoration.	$7.000
• **Genomics**	
• Characterize genome and develop molecular tools.	$35.000
• Phylogeography and genetic structure.	$25.000
• Understanding hybrid ancestry.	$15.000
• Inbreeding, loss of variation, and domestication in captive populations.	$15.000
• Evaluating whether populations in Guyana and the Caribbean have a natural or anthropogenic origin.	$26.000
• Investigating past and contemporary patterns of trade.	$9.000
• **Captive studies**	
• Diets.	$5.000
• Social structure and reproduction.	$5.000
• Wild monitoring support: vocalizations, video, and sensors.	$6.000
• Optimize pre-release conditioning protocols to adapt birds for living in natural environments.	$22.000
• **Population ecology**	
• Multi-stakeholder matrix projection models: estimating risk.	$6.000
• Sensitivity analyses to assess management actions and options.	$1.000
3. RESCUING, RAISING, and REINTRODUCING MORE RED SISKINS	
• **Integrated Conservation and Education Center at Parque Zoológico y Botánico Bararida, Venezuela**	
• Construct CICE-PZBB.	$360.000
• Hire animal keeper and cover operational costs.	$12.000
• Implement and evaluate training and education programs.	$2.000
• **Integrated Conservation and Education Center at Expanzoo, Venezuela**	

• Construct ICEC-Expanzoo.	$32.000
• Hire animal keeper and cover operational costs.	$6.000
• Implement and evaluate training and education programs.	$1.500
• Reintroduction in Venezuela	
• Construct in situ "soft release" facilities.	$45.000
• Develop protocols for Red Siskin reintroduction.	$25.000
• Reintroduce birds, evaluate success.	$12.000
• Coordinated group management program among private breeders, especially in Europe and Australia	$23.000
• Smithsonian Conservation Biology Institute	
• Research colony at Front Royal.	$23.000
• Public exhibit at National Zoological Park (NZP).	-
• Research, outreach, and fundraising center at ZooMiami, US.	-

4. CONNECTING WITH PEOPLE

• Reduction of illegal trade through awareness-raising, education, and effective communication with important stakeholders	
• Training public servants in wildlife ID and enforcement.	$3.500
• Training public servants in monitoring and reporting.	$3.500
• Develop, implement, and evaluate mass communication/ outreach that positively influences the behavior of trappers, consumers / aviculturists, schoolchildren, etc.	$25.000
• Apply an educational strategy that encourages bird breeders to participate and communicate with their communities.	$15.000
• Increasing secure habitats through awareness-raising, education, and effective communication with important stakeholders	
• Training programs for farmers in *Bird-friendly* ® farming practices.	$4.000
• Incentivizing forest restoration and land sparing agreements.	$18.000
• Mass communication to reduce habitat destruction.	$30.000
• Communication of RSI work	
• To the international community.	$17.000
• To schools.	$5.500
• To the Venezuelan and Guyanan public and stakeholders.	$29.500
• To the scientific community, funders, and international public.	$12.000
• To politicians and elected officials.	$12.000

5. ENSURING SAFER HABITATS

• Expansion of Smithsonian certification of "*Bird-friendly* ® *Coffee*" in Venezuela	
• Pilot and evaluate project in the rural community *"Piedra de Cachimbo"*, Venezuela.	$36.000
• Extend the program to other rural communities within the historical distribution of the Red Siskin.	$130.000

• Study the South Rupununi agroforestry program for "*Bird-friendly ® Coffee*" certification.	$5.000
• Evaluate the potential of private and public areas as reservations for the protection of Red Siskin populations.	$17.000
• Declaration of a wildlife refuge for the Red Siskin in South Rupununi, Guyana.	$30.000
• Restoration of dry forest ecosystems with other biodiversity-friendly agriculture in the Greater Caracas region: cacao, plantains, citrus nuts, and other tree crops.	$37.000

6. HALTING ILLEGAL TRAFFICKING

• Improvement of law enforcement using digital tools	
• Design digital application *(mobile app)* for citizens to report information about wildlife trafficking.	$5.000
• Market the app using a social media campaign.	$7.000
• Evaluate success.	$2.000
• Lobbying of public institutions to improve the anti-trafficking legal framework for wildlife.	$4.000
• Monitoring for long-term sustainability to detect changes in the trafficking threat.	$20.000

7. ECONOMIC RESOURCES FOR RED SISKIN CONSERVATION

• Fundraising	$2.500
• Crowdfunding	$2.000
• Private financing	$4.000
• Programs for volunteers and interns	$2.000
• Direct income	$2.000

Total amount to rescue Red Siskins from extinction* **$2.600.000**

*Some expenses are permanent through the year, for example: field work and coordinators' salaries.

More Red Siskins, more life

The Red Siskin Initiative seeks much more than to save a single species in isolation. Instead, it seeks to leverage Red Siskin conservation efforts and success to benefit other species and ecosystems as well. These additional benefits include:

· Fieldwork allows simultaneously gathering of scientific information about other threatened species and ecosystems.

· Facilities and human capabilities may be used in the future for the in situ and *ex situ* conservation of other species.

· Educational campaigns may create awareness and love of nature in the broadest sense.

· Thousands of hectares of safe habitat for the Red Siskin will protect tropical dry forests as well as traditional Venezuelan shade-grown coffee plantations, preserving local heritage and critical habitat for many resident species and migratory birds.

· Trained public servants monitoring and combating illegal wildlife trafficking will prevent thousands of other animals and plants from being victims of trafficking.

Instituto Venezolano de Investigaciones Científicas (IVIC): Has a mission of generating, publishing, and providing advice regarding new knowledge obtained through scientific research, technological advancement, and higher education. IVIC has extensive experience in ecological research on this species thanks to previous and ongoing projects funded by the National Fund for Science and Technology (FONACIT, for its initials in Spanish). See: www.ivic.gob.ve

South Rupunini Conservation Society (SRCS): Is a conservation organization based in south Guyana, founded in 2003 to monitor and protect local populations of the endangered Red Siskin, following its discovery there by the Smithsonian Institution and others in 2001. The SRCS is mainly committed to local conservation in the communities where Red Siskins are found, along with other bird habitats and natural heritage important to the region. The Society conducts field research, training and educational activities, environmental education in schools and villages, and it develops sustainable practices and approaches for community participation in biodiversity conservation. See: http://www.srcs.gy/

Parque Zoológico y Botánico Barárida and Expanzoo: Are zoos located in the cities of Barquisimeto (in western Venezuela) and Caracas (the capital city of Venezuela). They are government and private institutions respectively; dedicated to education, wildlife conservation and research, as well as visitors and recreation. Their facilities will be the home base for rescue and rehabilitation of Red Siskins confiscated from the illegal wildlife trade, as well as conservation breeding and reintroduction. Also, their extensive contact with the communities where they are located, two of the largest hubs for illegal wildlife trade in Venezuela, place them perfectly to conduct educational campaigns targeted at trappers, sellers, aviculturalists, policy-makers, law enforcement, and the general public.

Colección Ornitológica W. H. Phelps: It is an ornithological collection founded by William H. Phelps in 1938. It is one of the greatest ornithological collections in Latin America. It has more than 80.000 individuals and 1.500 skeletons that represent 1417 bird species in Venezuela. The collection is also an investigation center that provides support to scientists, especially for those who work in the taxonomy field. The research work of this institution has allowed the identification of 246 new species and subspecies for Venezuela. Its ornithology library is the largest in the country with more than 6,000 books available.

Therefore, by returning the Red Siskin into the forests from which they never should have disappeared, we are intrinsically helping many other species and ecosystems.

Take action now!

There are two main reasons why the actions outlined above are not only important and necessary, but **urgent**. **First**, the present situation in Venezuela may worsen dramatically, and traffickers will likely take advantage of the deterioration in political and economic stability to increase captures and engage in foreign exchange, as has occurred in the past and in other countries.

Second, this political and economic decline is likely to put more pressures on tropical dry forests and fuel their deforestation. Together, this combination could cause Red Siskin extinction directly, while indirectly it may increase inbreeding, disease risks, and other allee effects that cause extinction.

The longer the Red Siskin remains in small numbers, the greater the risk of entering this *"extinction vortex"* -- and Red Siskin has been considered scarce in Venezuela already for more than 60 years, or at least 10 generations of birds. Together, these facts and the cultural importance of this species make the Red Siskin one of the Venezuelan birds in greatest need of conservation intervention.

The future of this unique species is in our hands. It is up to us to assume the responsibility for this species' survival, but this can be done starting today **if you:**

1) Search for, and especially share information about the Red Siskin with our family, friends, and community.

2) Volunteer to help us with any of the activities outlined above.

3) Realize that wild animals, like the Red Siskin, are not good pets: do not buy wild animals for pets or have them at home, and tell us about trafficking when you see it. Choose pets responsibly.

4) Know that your food, transportation, and energy choices affect the species and ecosystems both near us and far away: learn how to make good choices.

5) Donate! With your valuable support, you can save this iconic species and allow future generations of Venezuelans to see it flying free. Your donation can range from the symbolic "adoption" of an individual that has been rescued, being a part of the **Initiative** as a "Corporative Member" or directly financing some of our projects, making you and your organization part of this great achievement.

For more information about how to help, please contact us:

Take action now!

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REDSISKIN INITIATIVE

Appendix A- Institutional project partners

The Smithsonian Institution: Is the world's largest museum and research institution. Over the past decade, the Smithsonian has had a central mission of "Understanding and Sustaining a Biodiverse Planet". The Red Siskin Initiative is a showcase example of their multidisciplinary approach, involving more than a dozen Smithsonian and others. For the proposed work, Smithsonian partners will work closely with Venezuelan partners scientists including geneticists, field ecologists, ornithologists, zoo curators, breeding experts on program coordination and fund administration, to leverage all funding in order to sustain project support into the future.
See: www.si.edu/

Provita: Founded in 1987, Provita is a Venezuelan non-governmental organization and nonprofit whose mission is to conserve the environment in its broadest sense, with an emphasis on threatened species and environments. Provita combines the knowledge and methods of the natural and social sciences in the search for solutions to conservation problems. Currently, Provita is considered one of the strongest and most reliable environmental organizations in Venezuela. They are the only Venezuelan NGO with a proven track record of mitigating threats other endangered bird species, including the Margarita Island Parrot (*Amazona barbadensis*), and they have produced important publications, including the Venezuelan Red Lists of Fauna, of Flora and of Ecosystems. Provita is the institutional leader for the Red Siskin Initiative in Venezuela. See: www.provitaonline.org

Instituto Venezolano de Investigaciones Científicas (IVIC): Has a mission of generating, publishing, and providing advice regarding new knowledge obtained through scientific research, technological advancement, and higher education. IVIC has extensive experience in ecological research on this species thanks to previous and ongoing projects funded by the National Fund for Science and Technology (FONACIT, for its initials in Spanish). See: www.ivic.gob.ve

South Rupunini Conservation Society (SRCS): Is a conservation organization based in south Guyana, founded in 2003 to monitor and protect local populations of the endangered Red Siskin, following its discovery there by the Smithsonian Institution and others in 2001. The SRCS is mainly committed to local conservation in the communities where Red Siskins are found, along with other bird habitats and natural heritage important to the region. The Society conducts field research, training and educational activities, environmental education in schools and villages, and it develops sustainable practices and approaches for community participation in biodiversity conservation. See: http://www.srcs.gy/

Parque Zoológico y Botánico Bararida and Expanzoo: Are zoos located in the cities of Barquisimeto (in western Venezuela) and Caracas (the capital city of Venezuela). They are government and private institutions respectively; dedicated to education, wildlife conservation and research, as well as visitors and recreation. Their facilities will be the home base for rescue and rehabilitation of Red Siskins confiscated from the illegal wildlife trade, as well as conservation breeding and reintroduction. Also, their extensive contact with the communities where they are located, two of the largest hubs for illegal wildlife trade in Venezuela, place them perfectly to conduct educational campaigns targeted at trappers, sellers, aviculturalists, policy-makers, law enforcement, and the general public.

Colección Ornitológica W. H. Phelps: It is an ornithological collection founded by William H. Phelps in 1938. It is one of the greatest ornithological collections in Latin America. It has more than 80.000 individuals and 1.500 skeletons that represent 1417 bird species in Venezuela. The collection is also an investigation center that provides support to scientists, especially for those who work in the taxonomy field. The research work of this institution has allowed the identification of 246 new species and subspecies for Venezuela. Its ornithology library is the largest in the country with more than 6,000 books available.