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- **Indicates items included in the teacher’s manual.**
- **Indicates items available online.**

SECTION I: PROGRAM ESSENTIALS

- Welcome Letter
Read first to get oriented and learn where your partner class for the year is located.
- Program Guidelines
**** Important updates and details on how to participate in the program.*
- Map of the Americas
Photocopy as needed. Students are to use this map to identify their migratory bird and show its breeding and wintering range. A required component to send to your partner class.
- “Tell Your Partner Class about Yourselves” form
Required form to be completed and returned with materials to send to your partner class. See Program Guidelines for instructions.
- “About Me/*Sobre Mi*” form
Optional form for individual students to complete and send to partner class. See Program Guidelines for instructions.

SECTION II: BIRD BASICS

A. Why Birds are Important

- Teacher Background: Why Birds are Important
- If There Were No Birds... (Grades 1-7)
By imagining what the world would be like without birds, students will identify ways that birds are beneficial.

B. Physical Adaptations and Anatomy

- Teacher Background: What Makes a Bird a Bird?
- Diagram of the Internal Organs of a Bird
- Prime Parts (Grades 2-6)
Simple demonstrations that highlight the unique features of birds.
- Pass the Part (Grades 2-6)
A relay game that reinforces knowledge of unique bird characteristics.
- Fill the Bill (Grades 2-6)
A hands-on activity demonstrating how different bird beaks are adaptations for feeding on different kinds of food.
- How do they do it? (Grades 6-8)
A hands-on activity demonstrating how different bird beaks are adaptations for feeding on different kinds of food.
- Feet Are Neat (Grades 1-3)
Students mold bird feet out of clay and learn how different types of feet help birds survive in their particular habitat.

- How Do You Measure Up? (Grades 1-6)
Students make comparisons between human traits and abilities and those of birds.

C. Physics of Flight

- Birds and Bernoulli (Grades 2-8)
By making models and observing the effects of air pressure, students learn how the shape of a bird's wing enables it to fly.
- Flight School (Grades 7-12)
Through simple demonstrations, students see how the shape of birds' wings and feathers relates to flight.

D. Behavioral Adaptations

- Dawn Chorus (Grades 1-6)
By imitating sounds that different birds make, students learn that each bird species has its own unique song and calls which are a means of communication for the birds and a means for people to identify them by ear.
- Bird Memory Phrases
A list of select birds and the mnemonic phrases commonly used by people to help them remember the unique songs of each.
- Birds in the Nest (Grades 3-6)
A game that simulates the demanding task parent birds have of feeding a nestful of young birds.
- Bird Behavior Bingo (Grades 1-4)
Gets kids outside observing birds and learning about different bird behaviors.
- The Master Moocher (Grades 1-5)
Through a puppet play, students learn about nest parasitism by the Brown-headed Cowbird.
- What About Those Cowbirds? (Grades 1-5)
Students read a biased article about cowbirds and discuss what's fact versus opinion.
- Teacher Background: *Brown-headed Cowbirds: From Buffalo Birds to Modern Scourge*

E. Bird Identification

- Bird Identification 101 (Grades 2-7)
Students describe some of the physical characteristics of birds, identify birds based on these descriptions, and contrast different kinds of birds.

SECTION III: BIRD MIGRATION

A. Background Information and Resources for Teachers

- Finding the Way: Exploring the Wonder of Migration
- Fact sheets:
 - Neotropical Migratory Bird Basics*
 - Have Wings, Will Travel: Avian Adaptations for Migration*
 - Travel Alert for Migratory Birds: Stopover Sites in Decline*
 - The Baltimore Oriole*
- "Birds Over Troubled Forests" (booklet found in pocket of manual binder)
- List of migratory birds that breed in Maryland, Virginia, and/or Washington, DC and winter in your partner class' country

- Laminated photos of birds on the above list (*found in pocket of manual binder*)
- Useful Spanish/English Vocabulary
- Profiles of 26 migratory bird species (*facts, range maps, and illustrations*)
- Printable outline drawings of select migratory birds

B. Lesson Plans and Activities

- Ideas for Exploring the World of Migratory Birds
- Flute’s Journey (Grades 1-5)
 - Students use information in the book “Flute’s Journey” to create a concept map, compare and contrast Maryland and Costa Rica, and identify actions children can take to help migratory birds.*
- Feathered Travelers: Neotropical Migratory Birds of the Americas (Grades 3-5)
 - Using a coloring book with text in Spanish and English (included with your manual), students learn what kinds of birds migrate and why, about important habitat types birds depend on, and about some of the places birds go in their travels across the Americas.*
- How Do Birds Find their Way? (Grades 1-5)
 - Learn about how and why birds migrate using the book “How do Birds Find Their Way?” by Roma Gans.*
- Chip the Champ (Grades 3-7)
 - Students use math to solve problems presented in a script about hummingbirds.*
- Avian Olympics (Grades 6-8)
 - Students use math to solve problems relating to migration and birds’ energy requirements.*
- Geography is for the Birds (Grades 4-8)
 - With the help of an atlas, students read descriptions of hypothetical migration routes and plot them on a map worksheet.*
- Migration Adventures (Grades 1-5)
 - Students plot migration routes on a map and create a puppet play that dramatizes the experiences of migrating birds.*
- Mapping Raptor Migration (Grades 5-12)
 - Students map the migration of a Swainson’s hawk using latitude and longitude coordinates.*
- Tracking Peregrine Falcons from Space (Grades 3-7)
 - Article for students about the use of satellite transmitters to track migrating birds.*
- Southward Bound (Grades 1-5)
 - A play script written by Michele Cleland of Virginia Beach Friends School. Available in both English and Spanish.*

SECTION IV: BIRD CONSERVATION

A. Background Information for Teachers

- When Songbirds Sing the Blues
- Fact Sheets:
 - Why Migratory Birds are Crazy for Coffee*
 - FAQ’s about Bird-Friendly Coffee*
 - When it Comes to Pesticides, Birds are Sitting Ducks*
- Planting Habitat for Birds in Trouble

B. Classroom Lesson Plans and Activities

- Soaring into Action (Grades 1-5)
Students plan and carry out an action project to help birds.
- Save our Songbirds (Grades 1-6)
Students read and analyze an environmental action story about a fourth grade class that created habitat for birds on their school grounds.
- Conservation Dilemmas: What Would You Do? (Grades 4-8)
Students learn about the characteristics of birds of prey, and analyze and propose solutions to problems involving conflicts between humans and wildlife.
- Home is Where the Forest Is (Grades 3-8)
Students define the concepts of habitat and carrying capacity, and identify some of the factors that regulate the number of birds an area can support.
- I'm For the Bird's Pledge Card (Grades 1-5)
Students illustrate a way they can pledge to help birds.
- Ranger Rick story for kids about the importance of shade grown coffee. (Grades 2-5)

SECTION V: INTRODUCTORY INFORMATION ABOUT YOUR PARTNER CLASS' COUNTRY

Contents of this section differ according to the country. Refer to the contents list at the start of this section in your binder to see what is provided.

- Links to online children's story books about life in Latin America. (Grades 2-7)

SUPPLEMENTARY MATERIALS

The following materials are included with you manual:

A. Children's Books and Magazines:

- Feathered Travelers (Grades 1-5)
A coloring book on bird migration with text in Spanish and English.
- International Migratory Bird Day magazines (Grades 3-7):
Collisions: Clearing the Way for Birds
Exploring Habitats: Special Places for Birds
Birds in a Changing Climate
Tundra to Tropics
Exploring the Boreal Forest
Birds and Culture
- Jr. Birder Program magazine

B. Posters

- Bird Migration in the Americas (National Geographic)
- International Migratory Bird Day posters from 2002, 2005, 2007, 2008, 2009
- Bird-Friendly Coffee
- Songbird Connection: temperate deciduous forest and tropical evergreen forest

C. Additional Teacher Background Information and Other Resources

- Birds Over Troubled Forests
Overview of the natural history and conservation of migratory birds.

- 2009 International Migratory Bird Day catalog
- Large, self addressed envelope

Use in November to mail in materials to have sent to your partner class.

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