

Science

Genre

Nonfiction Articles present facts about real people, living things, places, or events.



Text Feature

Charts organize information and make it easy to read.

Content Vocabulary

relays

retrieve

characteristics

stamina

DOGGONE WORK

by Lori Marquez

In January 1925 many of the children in Nome, Alaska, were very ill with a serious disease called diphtheria. Their only hope was a serum used to cure the disease.

The serum was nearly a thousand miles away in Anchorage, Alaska. It was the middle of winter and blizzards had brought heavy snows, making it impossible for planes to land. Dogsleds were the only way to get the medicine from Anchorage to Nome.

Balto at the lead
of a dog team



Dog teams and their drivers began a series of dangerous journeys. The teams worked in **relays**, one team handing the serum off to the next team. Balto was the lead dog of the twentieth team. Strong and smart, Balto led the team safely across icy paths. His team reached Nome with the serum and the children were saved.

Why could Balto and the other dog teams make this journey? Different dogs have changed or adapted over centuries for different functions. Sled dogs like Balto have **characteristics** that help them pull sleds. They move their feet quickly and have remarkable strength for their size. Their double coat of fur protects them from cold, snow, and ice. These



Sledder Gunnar Kasson hugs his famous dog Balto


dogs have great **stamina** and keep going no matter what the conditions are. Also, they know how to find the safest way to travel. These qualities make them well adapted to pulling a sled in the worst winter weather.



Reading a Chart

This chart helps you organize information about dog breeds, their adaptations, and the work that each breed does.

DOG ADAPTATIONS

	Breed	Adaptation	Job
	Husky	Strong; fast; thick fur	Pulling sleds
	Collie	Instinct for herding other animals; good eyesight	Tending sheep and cattle
	Bloodhound	Excellent sense of smell	Searching and rescuing

SAR DOGS

Sled dogs are not the only dogs who work for a living. For example, Bronte is a search-and-rescue dog, or a SAR dog. Bronte is a rottweiler who helps find missing people. In 1995, after an explosion in a building in Oklahoma City, Oklahoma, Bronte was brought in to search through the rubble. When she began to scratch and sniff in one place, her handler knew that she had found someone. Rescuers dug quickly and found a 15-year-old girl who was alive under the debris.

What makes a good SAR dog? First, SAR dogs need an especially good sense of smell. Dogs use their whiskers to help them smell. Whiskers help dogs know the direction of the wind so they can tell where a scent is coming from. SAR dogs use scents in the air to find a person in a

certain area. They can also sniff an item of human clothing and then track the scent of the person who wore it.

It takes about a year to train a SAR dog. These dogs are likely to be friendly, eager to please, and happy to **retrieve** things. Trainers use different forms of the game hide-and-seek to teach SAR dogs. The trainer hides an object. When the dog finds the hidden item, it drags the object back to the trainer. This training along with the dog's natural characteristics make it perfectly suited for search-and-rescue missions.

A rescue dog named Tracer picks up the scent of a diver in ten feet of water.



SERVICE DOGS

Other dogs have other jobs. Service dogs provide people with different types of services, depending on their needs. If you visit a sheep farm, you might see dogs herding sheep. Sheep dogs help move sheep from field to field or into holding pens. Some dogs help people. These dogs are trained to cross streets, open doors, and even make beds! You might even see an agriculture dog working at an airport. These dogs smell suitcases and packages, looking for harmful insects that might be hiding in food.



This service dog helps a blind woman cross the street.

Connect and Compare



1. Look at the dog adaptations chart on page 135. What characteristics do dogs that tend sheep have? **Reading a Chart**
2. If your family decided to adopt a dog, what characteristics would you look for? **Evaluate**
3. Think about “Doggone Work” and *Pipiolo and the Roof Dogs*. What characteristics do Pipiolo and a SAR dog have in common? **Reading/Writing Across Texts**



Science Activity

Research three other dog breeds. Make a chart listing the work the dogs do and the characteristics that help each dog do that work.



Find out more about dogs at www.macmillanmh.com

Write About an Experience with an Animal

Writer's Craft

Unimportant Details

Delete **unimportant details** that do not tell about your topic. Also delete details that may tell something about your topic but are not really important.



Monday, October 3

My teacher encourages us to keep a journal. Here are details about last night.

I decided I should give descriptive details about African gray parrots.

I've had my African gray parrot for about three years. His name is Frank. He's about a foot tall, with gray feathers all over, except for his brilliant red tail. His eyes are yellow.

I've been talking to Frank for three years, but in all this time he's only squawked back at me.

Last night all of that changed. I was reading in bed. All of a sudden I heard, "Hi, Bao!" I glanced over, and Frank was staring at me. Then he said it again, "Hi, Bao!" I couldn't believe it! Not only was Frank talking to me, but he was using my name! I answered him: "Hi, Frank!" He was quiet. I reached over to turn off my bedside lamp. Just then I heard Frank's voice again. "Goodnight!" he said. "Goodnight, Frank!" I replied.

Your Turn

Write a journal entry about an encounter you have had with an animal. The animal could be a pet, one you saw at the zoo, or a wild animal. Use lots of details so that the reader can understand your experience. Use the writer's checklist to check your writing.



Writer's Checklist

- Ideas and Content:** Did I delete **unimportant details** that do not help the reader to understand my ideas?
- Organization:** Do my ideas flow together in a logical way?
- Voice:** Does my journal entry sound like something I would say?
- Word Choice:** Did I use strong and colorful words?
- Sentence Fluency:** When I read my journal entry aloud, does it sound pleasing?
- Conventions:** Are all of my sentences complete? Did I check my spelling?