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# Your Shetland Sheepdog

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Caring for Your Faithful Companion



## Shetland Sheepdogs: What a Unique Breed!

Your dog is special! She's your best friend, companion, and a source of unconditional love. Chances are that you chose her because you like Shelties and you expected her to have certain traits that would fit your lifestyle:

- Loyal and loving companion
- Good with kids and other pets
- Vigilant watchdog with a ready bark
- Sweet, gentle, and sensitive
- Above-average intelligence and trainability when positive reinforcement training methods are used
- Agile, sturdy, and muscular

However, no dog is perfect! You may have also noticed these characteristics:

- Suspicious of strangers
- Easily bored if not given something to do, which may lead to barking and chewing
- Strong herding instinct can lead to chasing cars and small animals
- Needs daily exercise
- Prone to quite a few health problems
- Prone to separation anxiety

Is it all worth it? Of course! She's full of personality, and you love her for it! There's a lot going on behind those sparkling almond eyes—intuitive and bright, Shelties make great family pets!

Shetland Sheepdogs originated in Scotland and are descendants of the Collie. Shelties have held many jobs including herding, protecting, and tracking. They are well known for their intelligence and their seemingly human understanding of their companions. Shelties thrive in competition and love to be useful. The Sheltie's double coat requires a considerable amount of grooming, but her beauty is worth the care.

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### PET MEDICAL CENTER

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## General Health Information for your Shetland Sheepdog

### *Dental Disease*

Dental disease is the most common chronic problem in pets, affecting 80% of all dogs by age two. Unfortunately, your Shetland Sheepdog is more likely than other dogs to have problems with her teeth. Dental disease starts with tartar build-up on the teeth and progresses to infection of the gums and roots of the teeth. If we don't prevent or treat dental disease, your buddy may lose her teeth and be in danger of damage to her kidneys, liver, heart, and joints. In fact, your Sheltie's life span may even be cut short by one to three years! We'll clean your dog's teeth regularly and let you know what you can do at home to keep those pearly whites clean.

### *Infections*

Shetland Sheepdogs are susceptible to bacterial and viral infections — the same ones that all dogs can get — such as parvo, rabies, and distemper. Many of these infections are preventable through vaccination, which we will recommend based on her age, the diseases we see in our area, and other factors.

### *Obesity*

Obesity can be a significant health problem in Shetland Sheepdogs. It is a serious disease that may cause or worsen joint problems, metabolic and digestive disorders, back pain, and heart disease. Though it's tempting to give your pal food when she looks at you with those soulful eyes, you can "love her to death" with leftover people food and doggie treats. Instead, give her a hug, brush her fur or teeth, play a game with her, or perhaps take her for a walk. She'll feel better, and so will you!

### *Parasites*

All kinds of worms and bugs can invade your Sheltie's body, inside and out. Everything from fleas and ticks to ear mites can infest her skin and ears. Hookworms, roundworms, heartworms, and whipworms can get into her system in a number of ways: drinking unclean water, walking on contaminated soil, or being bitten by an infected mosquito. Some of these parasites can be transmitted to you or a family member and are a serious concern for everyone. For your canine friend, these parasites can cause pain, discomfort, and even death, so it's important that we test for them on a regular basis. We'll also recommend preventive medication as necessary to keep her healthy.

### *Spay or Neuter*

One of the best things you can do for your Sheltie is to have her spayed (neutered for males). In females, this means we surgically remove the ovaries and usually the uterus, and in males, it means we surgically remove the testicles. Spaying or neutering decreases the likelihood of certain types of cancers and eliminates the possibility of your pet becoming pregnant or fathering unwanted puppies. Performing this surgery also gives us a chance, while your pet is under anesthesia, to identify and address some of the diseases your dog is likely to develop. For

## Your Shetland Sheepdog's Health

We know that because you care so much about your dog, you want to take good care of her. That is why we have summarized the health concerns we will be discussing with you over the life of your Sheltie. By knowing about health concerns specific to Shetland Sheepdogs, we can tailor a preventive health plan to watch for and hopefully prevent some predictable risks.

Many diseases and health conditions are genetic, meaning they are related to your pet's breed. There is a general consensus among canine genetic researchers and veterinary practitioners that the conditions we've described herein have a significant rate of incidence and/or impact in this breed. That does not mean your dog will have these problems; it just means that she is more at risk than other dogs. We will describe the most common issues seen in Shetland Sheepdogs to give you an idea of what may come up in her future. Of course, we can't cover every possibility here, so always check with us if you notice any unusual signs or symptoms.

This guide contains general health information important to all canines as well as the most important genetic predispositions for Shetland Sheepdogs. This information helps you and us together plan for your pet's unique medical needs. At the end of the booklet, we have also included a description of what you can do at home to keep your Sheltie looking and feeling her best. You will know what to watch for, and we will all feel better knowing that we're taking the best possible care of your pal.

example, if your pet needs hip X-rays or a puppy tooth extracted, this would be a good time—it's more convenient for you and easier on your friend too. Routine blood testing prior to surgery also helps us to identify and take precautions against common problems that increase anesthetic or surgical risk. Don't worry; we'll discuss the specific problems we will be looking for when the time arrives.

## Genetic Predispositions for Shetland Sheepdogs

### *Multidrug Resistance*

Multidrug resistance is a genetic defect in a gene called MDR1. If your Shetland Sheepdog has this mutation, it can affect the way his body processes different drugs, including substances commonly used to treat parasites, diarrhea, and even cancer. For years, veterinarians simply avoided using ivermectin in herding breeds, but now there is a DNA test that can specifically identify dogs who are at risk for side effects from certain medications. Testing your pet early in life can prevent drug-related toxicity.

### *Heart Disease*

Shelties are susceptible to a condition called patent ductus arteriosus, or PDA, in which a small vessel that carries blood between two parts of the heart does not close as it should shortly after birth. This results in too much blood being carried to the lungs, causing fluid build-up and strain on the heart. Outward signs may be mild or severe, including coughing, fatigue during exercise, weight loss, shortness of breath, and weakness in the hind limbs. We listen for a specific type of heart murmur to diagnose this problem during your pet's examinations. If your pal has this condition, we may recommend surgery to close the problematic vessel.

### *Bleeding Disorders*

There are several types of inherited bleeding disorders that occur in dogs. They range in severity from very mild to very severe. Many times a pet seems normal until a serious injury occurs or surgery is performed, and then severe bleeding can result. Shelties are particularly prone to some relatively rare diseases of the blood.

- Hemolytic anemia and thrombocytopenia occur when the immune system goes haywire and starts attacking the pet's own red blood cells or platelets. If the immune system destroys red blood cells, your dog quickly becomes anemic, weak, and lethargic. His gums will look whitish or yellow instead of a normal bright pink color. If the immune system destroys platelets, his blood won't clot properly and he'll have bruises or abnormal bleeding. We'll perform diagnostic testing for blood clotting to check for these problems before we perform any surgeries. To slow or stop the immune system's destruction of cells, we'll prescribe steroids and other immune-suppressive drugs. Sometimes an emergency transfusion of red blood cells or platelets is needed.
- Von Willebrand's disease is a blood clotting disorder frequently found in Shetland Sheepdogs. We'll conduct



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There is no cure for lupus, but medications can help manage symptoms. Sunlight can cause flare-ups, so avoiding sunlight exposure and using a dog-safe sunscreen on sensitive parts like ears and noses can help.

### *Epilepsy*

There are three types of seizures in dogs: reactive, secondary, and primary. Reactive seizures are caused by the brain's reaction to a metabolic problem like low blood sugar, organ failure, or a toxin. Secondary seizures are the result of a brain tumor, stroke, or trauma. If no other cause can be found, the disease is called primary or idiopathic epilepsy. This problem is often an inherited condition, and Shetland Sheepdogs are commonly afflicted. If your friend is prone to seizures, episodes will usually begin between six months and three years of age. An initial diagnostic workup may help find the cause. Lifelong medication is usually necessary to help keep seizures under control with periodic blood testing required to monitor side effects and efficacy. If your dog has a seizure, carefully



prevent him from injuring himself, but don't try to control his mouth or tongue. It won't help him, and he may bite you accidentally! Note the length of the seizure, and call us or an emergency hospital.

### *Bone and Joint Problems*

A number of different musculoskeletal problems have been reported in Shetland Sheepdogs. While it may seem overwhelming, each condition can be diagnosed and treated to prevent undue pain and suffering. With diligent observation at home and knowledge about the diseases that may affect your friend's bones, joints, or muscles, you will be able to take great care of him throughout his life.

- Both hips and elbows are at risk for dysplasia, an inherited disease that causes the joints to develop improperly and results in arthritis. Stiffness in your Sheltie's elbows or hips may become a problem for him, especially as he matures. You may notice that he begins to show lameness in his legs or has difficulty getting up from lying down. We can treat the arthritis—the sooner the better—to minimize discomfort and pain. We'll take X-rays of your dog's bones to identify issues as early as possible. Surgery is also sometimes a good option in severe and life-limiting cases. And keep in mind that overweight dogs may develop arthritis years earlier than those of normal weight, causing undue pain and suffering!
- Sometimes your Sheltie's kneecap (patella) may slip out of place. This is called patellar luxation. You might notice that your pet, while running, suddenly picks up a back leg or skips and hops for a few strides. He might then kick his leg out sideways to pop the kneecap back in place. These are common signs of patellar luxation. If the problem is mild and involves only one leg, your friend may not require much treatment beyond arthritis medication. When symptoms are severe, surgery may be needed to realign the kneecap to keep it from luxating further.

### *Allergies*

In humans, allergies to pollen, mold, or dust make people sneeze. In dogs, rather than sneezing, allergies make their skin itchy. We call this skin allergy "atopy", and Shelties often have

it. The feet, belly, folds of the skin, and ears are most commonly affected. Symptoms typically start between the ages of one and three and can get worse every year. Licking the paws, rubbing the face, and frequent ear infections are the most common signs of allergies. The good news is that there are many treatment options available for these conditions.

### *Dermatomyositis*

Dermatomyositis is an inflammatory condition of the skin and muscles seen in young Shetland Sheepdogs. It appears to be caused by a defect in the immune system passed genetically as an autosomal dominant trait, meaning that if one parent is affected, all the puppies will be susceptible to the disorder, but some may be affected more than others. Medications can help alleviate symptoms, but affected dogs should not be used for breeding.

### *Cancer*

Cancer is a leading cause of death in older dogs. Your Sheltie, however, is a bit more prone to certain kinds of cancer that can appear at a younger age. Many cancers are cured by surgical removal, and some types are treatable with chemotherapy, but for all types, early detection is critical! We'll do periodic blood tests and look for lumps and bumps on your pet at each exam.

### *Thyroid Problems*

Shelties are prone to a common condition called hypothyroidism in which the body doesn't make enough thyroid hormone. Signs can include dry skin and coat, hair loss, susceptibility to other skin diseases, weight gain, fearfulness, aggression, and other behavioral changes. We'll conduct a blood test annually to screen for this disease. Treatment is usually as simple as replacement hormones given in the form of a pill.

### *Kidney Disorder*

Fanconi syndrome is a disorder of the kidneys that allows vital blood nutrients to escape into the urine. Because these nutrients are so important, affected Shelties can experience excessive urination and thirst, weight loss, and weakness due to abnormal electrolyte levels. Symptoms usually appear between two and six years of age. The severity and course of the disease vary from dog to dog; some pets remain stable for years while others may develop fatal kidney failure. Routine urine screening can help to diagnose Fanconi syndrome in its early stages, and prompt treatment can greatly extend both your pet's lifespan and his quality of life.

### *Hemorrhagic Gastroenteritis*

Most commonly seen in small and toy breeds like your Sheltie, hemorrhagic gastroenteritis, or HGE, is a serious and sometimes fatal disease in dogs that is characterized by bloody diarrhea, vomiting, and severe dehydration. Extensive treatment may be necessary for dogs suffering from hemorrhagic gastroenteritis, and some dogs may not survive the disease, particularly if they are not promptly treated. There are many causes of gastrointestinal disease in dogs, but any dog with these symptoms should be seen by a veterinarian as soon as possible.

## Taking Care of Your Shetland Sheepdog at Home

Much of what you can do to keep your dog happy and healthy is common sense, just like it is for people. Watch her diet, make sure she gets plenty of exercise, regularly brush her teeth and coat, and call us or a pet emergency hospital when something seems unusual (see “What to Watch For” below). Be sure to adhere to the schedule of examinations and vaccinations that we recommend for her. This is when we’ll give her the necessary “check-ups” and test for diseases and conditions that are common in Shelties. Another very important step in caring for your pet is signing up for pet health insurance. There will certainly be medical tests and procedures she will need throughout her life and pet health insurance will help you cover those costs.

### *Routine Care, Diet, and Exercise*

Build her routine care into your schedule to help your Sheltie live longer, stay healthier, and be happier during her lifetime. We cannot overemphasize the importance of a proper diet and exercise routine.

- ✓ Supervise your pet as you would a toddler. Keep doors closed, pick up after yourself, and block off rooms as necessary. This will keep her out of trouble and away from objects she shouldn’t put in her mouth.
- ✓ Brush her coat as needed, at least weekly.
- ✓ Shetland Sheepdogs often have serious problems with their teeth, so you’ll need to brush them at least three times a week!
- ✓ Clean her ears weekly, even as a puppy. Don’t worry—we’ll show you how!
- ✓ She is well suited to apartment life as long as she is given a daily walk and frequent play sessions.
- ✓ She is an athletic dog that excels at dog sports like agility, obedience, and herding.
- ✓ She has a strong chase instinct, so she needs to be leash walked and a fenced yard is a must.
- ✓ Keep your dog’s diet consistent and don’t give her people food.
- ✓ Feed a high-quality diet appropriate for her age.
- ✓ Exercise your dog regularly, but don’t overdo it at first.

### *What to Watch For*

Any abnormal symptom could be a sign of serious disease or it could just be a minor or temporary problem. The important thing is to be able to tell when to seek veterinary help and how urgently. Many diseases cause dogs to have a characteristic combination of symptoms, which together can be a clear signal that your Shetland Sheepdog needs help.

### Office calls

Give us a call for an appointment if you notice any of these types of signs:

- ✓ Change in appetite or water consumption
- ✓ Tartar build-up, bad breath, red gums, or broken teeth
- ✓ Itchy skin (scratching, chewing, or licking); hair loss
- ✓ Lethargy, mental dullness, or excessive sleeping
- ✓ Fearfulness, aggression, or other behavioral changes
- ✓ Dull coat, hair loss; sluggish, weight gain
- ✓ Lumps or bumps – regardless of size

### Emergencies

Seek medical care immediately if you notice any of these types of signs:

- ✓ Scratching or shaking the head, tender ears, or ear discharge
- ✓ Inability or straining to urinate; discolored urine
- ✓ Cloudiness, redness, itching, or any other abnormality involving the eyes
- ✓ Fatigue during exercise, coughing, or shortness of breath
- ✓ Gums that are a color other than bright pink
- ✓ Any abnormal shaking, trembling, or excessive involuntary tremors
- ✓ Leg stiffness; reluctance to rise, sit, use stairs, run, or jump; “bunny hopping”

## Genetic/DNA Testing



DNA analysis is a rapidly advancing field in healthcare for people and pets. Luckily, technologies exist to screen for hundreds of inherited diseases in pets, just like in people. By screening each pet for as many genetic diseases as possible, we will be better prepared to care for your pet throughout life. This is an important step in caring for your pet because it's always better to know your pal is at risk for a genetic disease before the problem is untreatable.

In an effort to screen for as many genetically linked diseases as possible, we may recommend the **K9Genetics™ Disease Screen** to screen for more than 150 genetic mutations that cause disease.

Each **K9Genetics™ Disease Screen** Screens for

- ✓ Over 30 Musculoskeletal Problems
- ✓ Over 30 Metabolic Conditions
- ✓ Over 30 Eye Conditions
- ✓ Over 25 Blood and Clotting Disorders
- ✓ Over 10 Immune System Diseases
- ✓ Over 10 Urinary Tract Problems
- ✓ 10 Skin and Hair Conditions
- ✓ Cancer
- ✓ Dental Disease
- ✓ Drug Metabolism
- ✓ Heart Problems
- ✓ Hormonal Conditions
- ✓ Liver/Gastrointestinal Diseases
- ✓ Midline Defect
- ✓ Neuromuscular Diseases
- ✓ Reproduction Problems
- ✓ Respiratory Conditions

This one-time test is one of the best decisions you can make for your Shetland Sheepdog's medical care. With less than a few drops of blood, we'll have a lifetime of information to assist us in providing the very best care of your friend's unique and individual needs throughout her life!

For more information about genetic testing, visit <http://www.k9genetics.com>

Your Sheltie counts on you to take good care of her, and we look forward to working with you to ensure that she lives a long and healthy life. Our goal is to provide the best health care possible: health care that's based on her breed, lifestyle, and age. Please contact us when you have questions or concerns:

**Pet Medical Center**  
**254-690-6769**

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# Puppy to Adolescent Health Care Recommendations

<b>How We'll Keep Your Shetland Sheepdog Healthy</b> <i>Puppy to Adolescent: Infant to 17 in People Years</i>		Age	Services We'll Provide	Shetland Sheepdog-Specific Problems We're Looking For
			8-9 weeks	Head-to-tail physical examination  Eye disease screen Heart health check Blood disorder evaluation Parasite detection/prevention Vaccinations Discuss socialization and at-home puppy care
○	10-13 weeks	Head-to-tail physical examination Eye disease screen Heart health check Skin and coat exam Blood disorder evaluation Parasite detection/prevention Vaccinations Discuss caring for your dog's teeth and ears at home	Breed-specific physical abnormalities plus Cataracts, Distichiasis, and Collie eye anomaly Patent ductus arteriosus (PDA) Dermatomyositis von Willebrand's disease (vWD)	
○	14-16 weeks	Head-to-tail physical examination Eye disease screen Heart health check Skin and coat exam Blood disorder evaluation Parasite prevention Vaccinations Schedule spay/neuter surgery Discuss obedience and grooming	Breed-specific physical abnormalities plus Cataracts, Distichiasis, and Collie eye anomaly Patent ductus arteriosus (PDA) Dermatomyositis von Willebrand's disease (vWD)	
○	4-6 months	Head-to-tail physical examination Eye disease screen Heart health check Skin and coat exam Bone and joint exam Blood disorder evaluation Pre-surgical diagnostics Spay/neuter surgery Discuss microchipping and Multi-drug resistant gene (MDR1)	Breed-specific physical abnormalities plus Cataracts, Distichiasis, and Collie eye anomaly Patent ductus arteriosus (PDA) Dermatomyositis Hip dysplasia von Willebrand's disease (vWD)	
○	6 months through 1 year	Head-to-tail physical examination Eye disease screen Heart health check Skin and coat exam Bone and joint exam Neurological assessment Blood disorder evaluation Parasite prevention Vaccinations Discuss lifetime genetic considerations	Breed-specific physical abnormalities plus Cataracts, Distichiasis, and Collie eye anomaly Patent ductus arteriosus (PDA) Dermatomyositis and Allergies Hip dysplasia, Patellar luxation, and Elbow dysplasia Epilepsy von Willebrand's disease (vWD)  All major diseases important in the breed with diagnostic plan	

## Adult to Golden Years Health Care Recommendations

How We'll Keep Your Shetland Sheepdog Healthy	Healthy		Age	Services We'll Provide	Shetland Sheepdog-Specific Problems We're Looking For
	Adult: 18 to 39 in People Years	✓	2 years through 7 years	Head-to-tail physical examination Eye disease screen Skin and coat exam Internal organ health evaluation Endocrine screening Bone and joint exam Neurological assessment Blood disorder evaluation  Parasite prevention Vaccinations Discuss behavior and nutrition	Breed-specific physical abnormalities plus Cataracts Allergies Fanconi syndrome and Hemorrhagic gastroenteritis (HGE) Systemic lupus erythematosus and Hypothyroidism Hip dysplasia, Patellar luxation, and Elbow dysplasia Epilepsy von Willebrand's disease (vWD) and Immune-mediated hemolytic anemia and immune-mediated thrombocytopenia (IMHA/ITP)
		○	8 years through 10 years	Head-to-tail physical examination Eye disease screen Skin and coat exam Internal organ health evaluation Endocrine screening Bone and joint exam Neurological assessment Cancer Screen Blood disorder evaluation  Parasite prevention Vaccinations Discuss behavior and nutrition	Breed-specific physical abnormalities plus Cataracts Allergies Fanconi syndrome and Hemorrhagic gastroenteritis (HGE) Systemic lupus erythematosus and Hypothyroidism Hip dysplasia, Patellar luxation, and Elbow dysplasia Epilepsy Transitional cell carcinoma Immune-mediated hemolytic anemia and immune-mediated thrombocytopenia (IMHA/ITP)
		○	11 years and older	Head-to-tail physical examination Eye disease screen Skin and coat exam Internal organ health evaluation Endocrine screening Bone and joint exam Neurological assessment Cancer screen Blood disorder evaluation  Parasite prevention Vaccinations Discuss mental and physical well-being	Breed-specific physical abnormalities plus Cataracts Allergies Fanconi syndrome and Hemorrhagic gastroenteritis (HGE) Systemic lupus erythematosus and Hypothyroidism Hip dysplasia, Patellar luxation, and Elbow dysplasia Epilepsy Transitional cell carcinoma Immune-mediated hemolytic anemia and immune-mediated thrombocytopenia (IMHA/ITP)
Golden Years: 60+ in People Years					

Note: We recommend twice-a-year examinations so that we may diagnose problems sooner. This approach also gives you the budget-friendly option of spreading preventive testing over two visits rather than one.