

## HANDLING PROCEDURES AND PRECAUTIONS

### PROTECTING AND CLEANING THE LENS:

Use a blower, compressed air, or a soft hairbrush to remove dust or other substances. Gently clean the lens with a light circular motion with an optics cleaning cloth, gauze or cleaning paper (available from your specialist dealer).

### ATTENTION:

Commercial lens cleaners can leave a film on the lens surface. Use only the smallest possible amounts.

### CLEANING THE SPOTTING SCOPE

Use a blower to remove dust and dirt and wipe with a clean, soft cloth. Do not use solvents such as acetone, benzene, thinner, or products that contain these solvents. Such substances can dis-colour the surface and possibly even deform it. Use a soft brush to gently remove dirt and debris from the focus wheel, the sun-visor, and others moving parts.

### STORING THE SPOTTING SCOPE

Storing a spotting scope without first cleaning it can lead to stains on the surface and the formation of mold. It is particularly important to clean after use in dusty, damp conditions, or after use in or out of the rain near to the coast.

After cleaning the spotting scope, dry it thoroughly indoors at room temperature.  
Remove the lens cap to store the spotting scope in a dry place.

When storing for long periods of time, place the spotting scope in an airtight container with desiccant.

### Warranty and repair

If there is a need to return your spotting scope to the manufacturer for repair or maintenance, please contact your Kowa dealer.



## WARNING



Never look directly at the sun or other strong light sources with your spotting scope. This can lead to serious eye damage or even loss of vision.

Keep small parts such as packaging materials, eyepiece covers, etc. away from small children. If these items are swallowed, serious injury, asphyxiation, or even death can result.

Do not attempt to disassemble, repair, or modify the spotting scope. In this case the guarantee is void and it may also lead to injuries.

Do not place the spotting scope in an unstable place. If it falls or tips, injury or damage could result.

Do not leave the spotting scope in the car or near a heat source. This can cause damage to the spotting scope or even cause a fire.

Regularly check the condition of the accessories such as the bag, shoulder strap or protective cover, as wear can occur after a prolonged time span.

Prolonged contact with rubber parts can cause inflammation or irritation of the skin. Should this occur please consult a doctor.

When using the spotting scope in an urban environment, please make sure that you do not disturb the privacy of others.

Kowa is not responsible for damage caused by improper handling and or natural disasters such as fire, earthquake, Floods etc.

Kowa is not responsible for damage caused by an unauthorized repair shop.

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## SPOTTING SCOPES

# TSN-99 Series

TSN-99A | TSN-99S

## OPERATING INSTRUCTIONS



# PROMINAR

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Thank you for choosing the KOWA spotting scope series. Please carefully read these operating instructions before using the product to ensure proper use and proper maintenance.

## NOMENCLATURE

### TSN-99A PROMINAR

### TSN-99S PROMINAR



#### Angled Type

1. Objective lens
2. Focus Knob
3. Tripod mount



#### Straight Type

4. Release button
5. Accessory collar
6. Eyepiece

## MAIN BODY SPECIFICATIONS

	TSN-99A	TSN-99S
<i>Objective Lens Effective Diameter:</i>	99mm	99mm
<i>Objective Lens Material:</i>	Fluorite crystal	Fluorite crystal
<i>Minimum Focusing Distance:</i>	6m	6m
<i>Length:</i>	378mm	364mm
<i>Weight:</i>	1810g	1835g
<i>Filter thread:</i>	105mm	105mm

- Observation with the hand-held spotting scope is difficult because of image blurring. Use a stable tripod for observation.
- Specifications and appearance of the product are subject to change without prior notice.

## INSERTING EYEPIECE



Align the red dot on the eyepiece and the red dot on the spotting scope bayonet mount.



Insert the eyepiece and twist clockwise until the eyepiece clicks in to the locked position.

## REMOVING EYEPIECE



Press and hold in the quick release button and turn the eyepiece anti-clockwise until it is released from the scope body.

## FUNCTIONS & USE

### SLIDING HOOD WITH ALIGNMENT SITE

Slide the hood away from the body to protect the lens from exposure to rain or to keep direct sunlight from entering the spotting scope.

When the object you wish to view is difficult to find, the sight built into the lens hood can be used to find the object.



### TRIPOD SCREW

The tripod mount has a removable screw that allows the spotting scope to be attached to either 1/4 and 3/8 inch tripod heads. With the tripod screw inserted the mount can be used on 1/4 inch tripods.

Removing the screw allows the scope to be attached to 3/8 inch tripods.



### FILTER THREAD

The filter threads in front of the objective lens allow various types of filters to be attached to the spotting scope.



### FOCUS KNOB

The focus knob of the spotting scope has a two-step mechanism; one for fine focusing and one for quick focusing.

This system allows a smooth transition from quick focusing to fine adjustment.



### FOCUSING

When the object is substantially out of focus, use the quick focus knob, to bring the object into focus 3 times faster than when using the fine focus knob. The quick focus knob can focus from 6m to infinity in only two revolutions. The fine focus is convenient for fine focusing and slight adjustments.

\* Do not turn the focus knob beyond its turning range, as it will damage the focusing mechanism.



### ACCESSORY MOUNT

There is a protective ring that is attached to the accessory mount threads. This protective ring must be removed before attaching any accessories and can only be removed when an eyepiece is not attached to the spotting scope. Turn the accessory ring counter-clockwise to unscrew it.

