Riester

The familiar way

ALL PUPIL II

Instructions

CE

All Pupil II

As part of our policy for continued product improvement we reserve the right to amend specifications at any time without prior notice.

Description of the Product

Headband

A Headband Size Adjuster

B Headband Height Adjuster

C Cushioned Padded Liners

D Optics Hinge Adjuster

E Brow Bar

F Brow Bar Adjuster

Optics

G Aperture Control Lever

H Filter Selector Bar

I Mirror Height Alignment Control

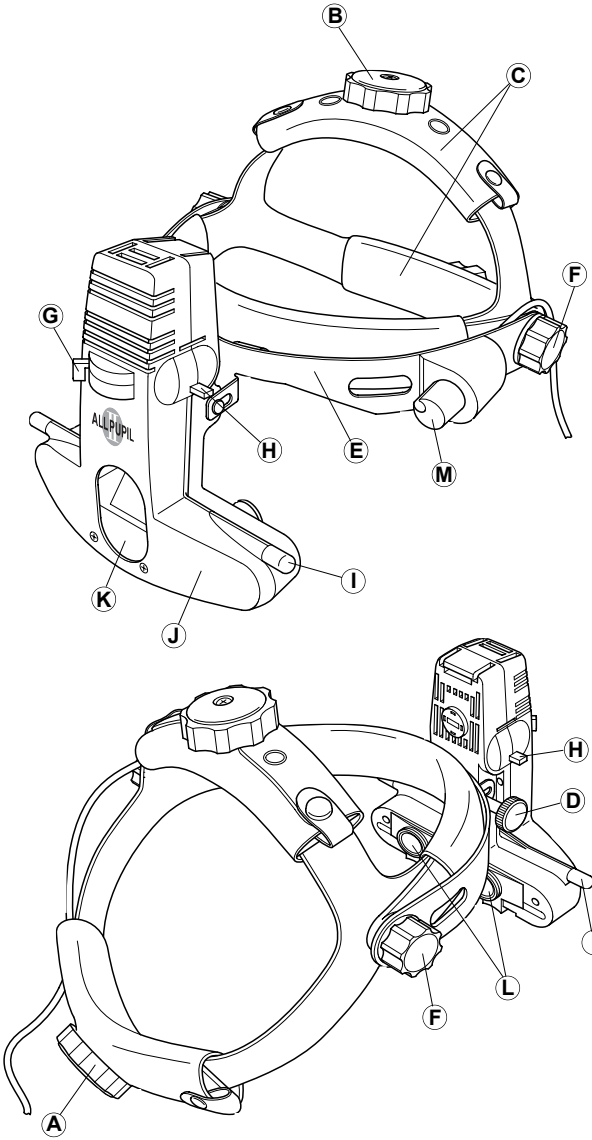
J Viewing Box

K Front Window

L Interpupillary Distance Adjusters

M Headband Rheostat

Description of the Product



Using the All Pupil II

Ensure correct and comfortable headband fit

Adjust the top and back adjusters (A&B) so that the indirect is supported comfortably, as shown in fig 1&2.

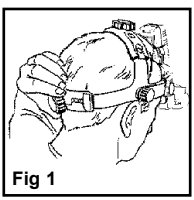


Fig 1

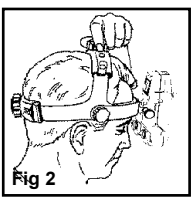


Fig 2

Position the brow bar (E) such that the viewing box is set on the optical axis.

The brow bar may be correctly positioned by loosening (F) the brow bar adjusters. When in the correct position secure by tightening (F) as shown in fig 3.

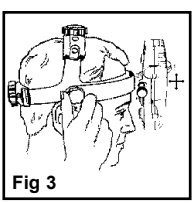


Fig 3

Position the All Pupil II as close to the eyes as possible for maximum field as shown in fig 4. by using the hinge adjuster (D) as shown in fig 5.

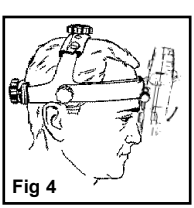


Fig 4

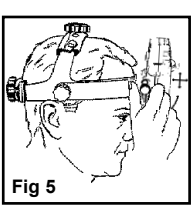


Fig 5

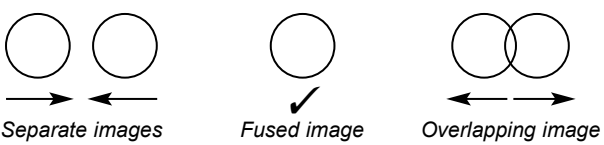
Using the All Pupil II

Interpupillary Distance Adjusters

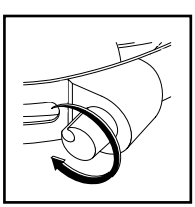
Because the eyes are dissociated, particular care must be taken to ensure the optics are set properly in front of each eye. Always set the aperture selector to the largest patch of light. The interpupillary distance adjusters are located directly beneath the viewing box. They are adjusted independently of each other. Place an object, perhaps the thumb, approximately 40cm from the face and centre it horizontally in the light patch. Then close one eye. Using the thumb and forefinger of the opposite hand, slide the P.D. control of the open eye (located directly under each eyepiece) so that your object moves into the centre of the field. Keeping the object in the centre of the light patch, repeat for the other eye.

Obtaining a Fused Image

*Ensure that a single, **fused image** is obtained as follows:-*



Separate images *Fused image* *Overlapping image*



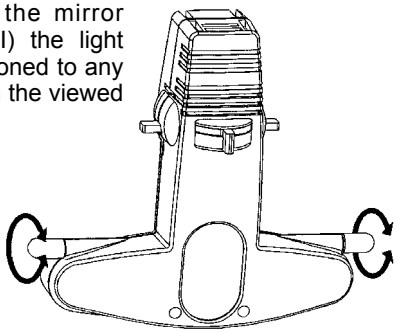
Headband Rheostat

To operate your headband dimmer turn the rheostat to the illumination required.

Using the All Pupil II

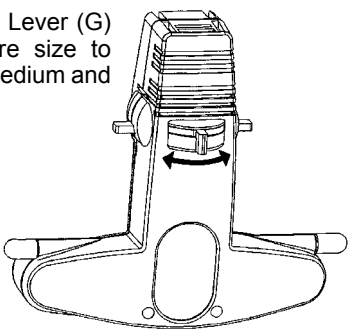
Adjustment for Mirror Height

By adjustment of the mirror alignment control (I) the light beam may be positioned to any vertical height within the viewed area.



Select Aperture Control Lever

The Aperture Control Lever (G) changes the aperture size to view through large, medium and small pupils.



Select either large, medium or small aperture by adjusting lever from left to right - small - medium - large.

Large Aperture - Suitable for routine examinations through fully dilated pupils

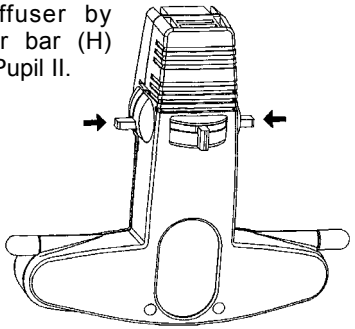
Medium Aperture - Reduces reflections when entering a partially or poorly dilated pupil (3mm). It is also ideal for closer inspection of particular fundal areas.

Small Aperture - Ideal for small, undilated pupils

Using the All Pupil II

Built in Filters

Select filter or diffuser by sliding filter selector bar (H) either side of the All Pupil II.



Red Free Filter - This filter reduces red light, so blood will appear black, silhouetted against a dark background

Diffuser - Providing extra wide beams of light that can be used with all aperture sizes.

The instrument provides protection from UV/IR.

Accessories

Teaching Mirror

The teaching mirror is fitted as follows:-

A. Remove the screws from the panel beneath the front window with the screwdriver supplied. (fig 6)

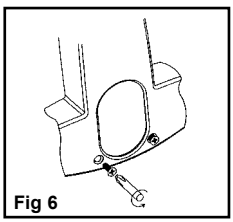


Fig 6

1. Fit the mounting bar with the pin pointing to the right and secure with screws removed in step (A) (fig 7). Slide the teaching mirror onto the pin on the mounting bar. The teaching mirror can now be swivelled up and down.

2. To remove, slide the teaching mirror to the right of the pin and return to its case leaving mounting bar in position

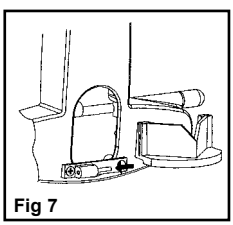


Fig 7

B. To make the teaching mirror Non-Removable for security purposes proceed as follows.

1. Remove the screws as in fig 6 above. Position the mounting bar and replace the screw on left side only. Fit the teaching mirror as in fig 7.

2. Fold the Teaching Mirror down and slide it to the right to reveal fixing hole. Then secure the mounting bar with the special washer and pan head screw provided. (fig 8)

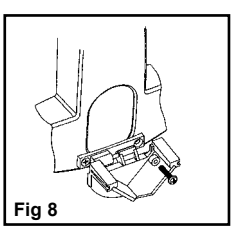
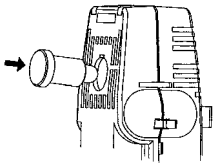


Fig 8

3. Return the teaching mirror to its central position.

4. The teaching mirror can now be demounted only by removing the screw. Retain the screwdriver for future use.

Changing the Bulb



CAUTION: The Bulb may get very hot after prolonged use. Disconnect the instrument from electricity supply and wait for the bulb to cool. Remove the bulb from the back of the instrument and insert the new bulb, ensuring the bulb's key is aligned with the aperture and securely pushed in.

Use only Riester bulb number 12783

CAUTION - DO NOT REMOVE BULB WHILST HOT

Cleaning Instructions

Disconnect the unit by unplugging the connector from the system power source. You can clean your All Pupil II optics and front window with the Riester cleaning cloth provided. Do not Immerse the instrument in water. The instrument can be cleaned with a damp cloth if preferred.

Servicing

There are no user serviceable parts on the instrument. Please contact your authorised Riester distributor or return your instrument to Riester.

Connecting to a Power Supply

We recommend that you use a Riester Power Supply. Alternatively, output voltage must not exceed a maximum of 6.8 Volts and a minimum of 1.6 Amps.

Instructions for operating power sources are included with the Power Supply Units.

Safety & Standards

DO NOT IMMERSE IN WATER

DO NOT COVER VENTILATION SLOTS

DO NOT USE INSTRUMENT IF CABLE OR INSTRUMENT IS VISIBLY DAMAGED

TAKE SUITABLE PRECAUTIONS WITH CABLE ROUTING TO PREVENT TRIP OR FALLING HAZARD

SEE CONNECTING TO POWER SUPPLIES

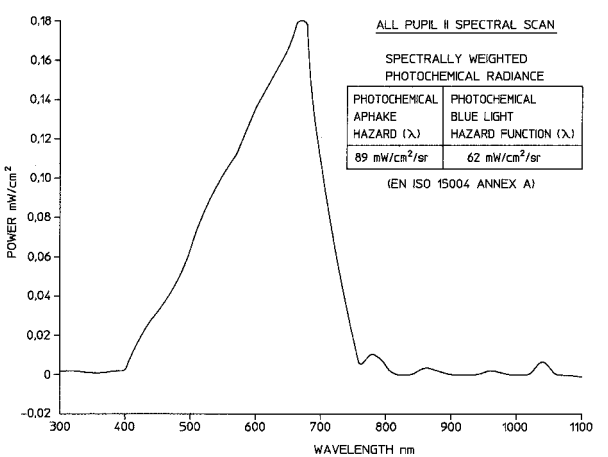
EN ISO 15004 :1997

It is well established that exposure of the eye to intense light sources for extended periods of time poses a risk of retinal photic injury. Many ophthalmic instruments illuminate the eye with intense light. The decision about the intensity of light level to use in any procedure must be made on a case by case basis. In each case, the clinician must take a risk benefit judgement about the intensity of light to be used. Use of insufficient intensity may result in inadequate visualization and in adverse effects more serious than a retinal photic injury. Further, despite all efforts taken to minimize the risk of retinal damage, damage may still occur. Retinal photic injury is a possible complication of the need to use bright light to clearly visualize ocular structures during delicate ophthalmic surgical procedures.

While no visible retinal photic lesions have been identified for ophthalmic instruments, it is recommended that illumination levels be set to the minimum level necessary to perform the diagnostic function. Young children and persons with diseased eyes may be at a higher risk. The risk may also be increased if the person being examined has had any exposure with the same instrument or any other ophthalmic instrument using an intense visible light source during the previous 24 hours. This will apply particularly if the eye has been exposed to retinal photography.

The time to reach a potential optical radiation hazard for this device is 3 minutes when the instrument is being operated at maximum intensity and maximum aperture. This time is for a cumalative exposure in a day. It should be noted that there is a safety factor of about 10 built into the safety guidelines. Hence, for a source with continuous light output, if the exposure time is 100s, photoretinitis might be expected for an exposure time of 10 x 100s = 1000s (about 17 minutes).

Complies with EN ISO 15004: 1997
Ophthalmic Instruments - Fundamental Requirements and Test Methods



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Die detaillierten Beschreibungen der Produkte finden Sie unter der jeweiligen Rubrik im Gesamtkatalog (Best. Nr. 51231-50). Oder gehen Sie online unter www.riester.de.

Riester offers a large selection of products in the areas of

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Detailed descriptions of the products can be found in the respective sections of the omnibus edition catalogue (Order No. 51232-50).
Or online under www.riester.de.

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99331 Rev. 0 2009-05 · Änderungen vorbehalten · Subject to alterations · Sous réserve de modifications · Sujeto a modificaciones