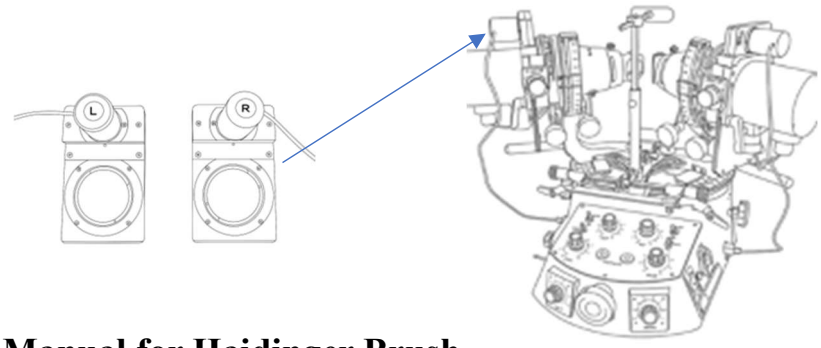
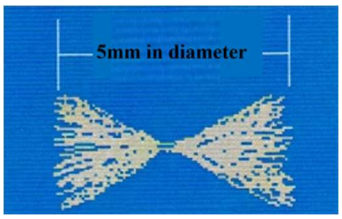


User Manual for Haidinger Brush

<What is Haidinger Brush?>

It is an entopic phenomenon(something you see that originates within your visual system) which appears as a faint, hourglass-shaped pattern in the center of your vision through a blue polarizing filter of the device.

The center(fovea) has much xanthophyll(yellow pigment) which creates best eyesight.



<The purpose of examination>

*Retinal Correspondence evaluation test (NRC or ARC) and training

➡Introduce After Image Test with H.B.

*Detection of eccentric fixation (reference, should be evaluated with other tests)

<Equipment Preparation>

1. Haidinger brush devices
2. Slide for after-image 1 set (For After Image Test)

<Patient Set Up>

1. Fix the patient's head firmly on the head rest.
2. Adjust the head rest so that the brush can be seen on the eye fovea.

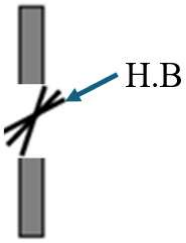
<Procedure>

1. Set a vertical bar image of after-image slide on the fixed eye.
2. Set Haidinger Brush device on the examined eye.(no light now)
3. Switch on HB brush, Adjust the light intensity to high volume on the fixed eye.
4. Create the after-image. Ask the patient to see the center(red point) of the vertical bar firmly for 10 to 20 seconds.
5. Switch off HB, and the slide light and switch on HB for the examined eye to start rotating to see if the after image of the vertical bar and Haidinger brush image is overlapped

at the center of the bar.

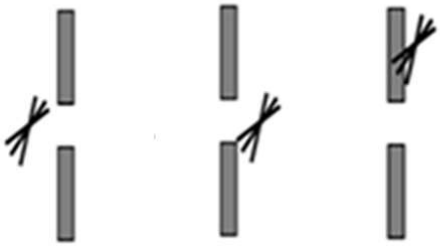
<Evaluation>

NRC(Normal Retinal Correspondence)



H.B can be seen at the center of the after-image vertical bar.

ARC(Ab-normal Retinal Correspondence)



H.B can be seen off-centered of the after-image vertical bar.

<Training for ARC>

***Put Haidinger brushes on both eyes(fixed eye and examined eye), switch on the light, and rotate them on the reverse phase.**

***Ask the patient to try to look at the center of the brush with both eyes.**

***If the brushes are not overlapped, the patient has abnormal retinal correspondence and need to ask him/her to look at the center firmly.**

For details, please go to the link :