### **Contrast Glaretester**

CGT-2000

## Advanced Performance from Pursuit of "Quality"

The CGT-2000 detects even the subtle changes in visual function that would be missed by visual acuity tests.



- ★ The CGT-1000, which had been well received by many practices and medical facilities including university hospitals, has evolved into an advanced model, the CGT-2000 incorporating various customers' feedback.
- ★ The CGT-2000 is particularly useful and effective in pre-/post-cataract surgery diagnosis and follow-up observations subsequent to refractive surgery.

#### Specifications

Test Distance	30cm, 60cm, 1m, 5m			
Light Conditions (Luminance of Test Target Background)	Day, Twilight, Night, or Examiner Specified			
Glare	Three settings: Low (L), Medium (M), and High (H)			
Structure of Test Target	Multiple structure with dual concentric circles			
Visual Angle of Test Target	6.3, 4, 2.5, 1.6, 1, 0.64 degrees			
Contrast Value of Test Target	14 levels between 0.0071 and 0.64			
Presentation Duration of Test Target	0.2, 0.4, 0.8, 1.6 seconds			
Presentation Interval of Test Target	1, 2, 3 seconds			
Power Supply	AC100 – 230V, 50/60Hz			
Power Consumption	200VA			
Fuse	5A			
External Dimensions	498mm (H) x 442mm (W) x 470mm (D)			
Weight	22kg			

#### Dimensions





• Design and specifications are subject to change as improvements are made to the product.

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# Contrast Glaretester CGT-2000

## Aiming at new levels in quality



#### **Binocular Testing Capability**

While monocular testing provides assessment of each eye, it does not reflect how well patients actually see objects in everyday life. As the CGT-2000 can test patients with both eyes open, it provides assessment of their visual function close to real-world conditions.



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#### Variable Test Distance

Test distance can now be selected from the following four settings: 30cm, 60cm, 1m, or 5m, allowing measurement of contrast sensitivity at a near, intermediate or far point. This will provide detailed assessment of patient's 'quality of vision' for more precise diagnosis. This function is also useful in measuring contrast sensitivity in patients with multifocal intraocular lens.

#### **Testing under Various Light Conditions** (Luminance Levels of Test Target Background)

Testing can now be done under various light conditions: day, twilight, night, or examiner specified.

This will provide assessment of patient's functional vision under conditions close to their everyday environment.

#### **Database Storage**

By simply entering a patient ID and a date of birth (or age group), the patient's data will be stored in the device.

Selected sets of data are instantly converted into graphs, contributing to ease of examination and diagnosis including for pre-/postcataract surgery comparisons and post-refractive surgery follow-up observations.



#### **Pupil Monitoring**

Testing can now be performed as you monitor patient's pupils, which improves test quality, facilitating more precise diagnosis and examinations.



#### Customizing

Test items can be customized to suit each practice or hospital. This can be done with ease as once entered, the test setting will be stored in the instrument's internal memory; there is no need to repeat this procedure. Multiple test settings to suite a number of specific conditions and cases can be stored.

ld Standard Test	H DA	stance Englithess Target	IBG Test Field	Eye	Glare
0 Default 1	0	5 m Day		-Right	OFF
1 Default 2	1	5 m Day		-Left	OFF
2 Default 1+2	2	5 m Day		- Right	ON
		5 m Day		-Left	ON
		5 mTrillght		- Right	ON
	5	5 m Trillight		-Left	ON
				a 1.a	2



## Easier Paper Loading

With the new "drop-in" paper loading system, all the examiner has to do is drop in a paper roll, and close the cover. No cumbersome paper feeding or threading through a slot is involved, reducing the examiner's burden.

#### Testing



Normal state

• Testing the degree of visual disturbance from glare





Normal state







• Testing how much contrast a patient can distinguish in objects of varying sizes (Contrast sensitivity testing)



Reduced ability to distinguish contrast

lower contrast to those patients whose expected ability to distinguish contrast is high. On the other hand, present targets with higher contrast where patient's expected ability to distinguish contrast is low. Patient's responses are graphed, which provides sensitivity evaluation across the wide range of sizes and contrasts.

Present test targets with

The degree of visual disturbance from glare can be assessed by using glare lamps during contrast sensitivity testina.





[deg] Visual angle

) Large  $\rightarrow$  Small  $\odot$ 

This sensitivity curve was created for demonstration purposes only, and not based on actual test results.

0.32

0.45

0.64

Sex: Female,

Glare: Off

The size of the test target is largest on the far left, and smallest on the far right

1.0 0.64

[deg]

#### Examples of Test Readings

Affected by glare