



TEST RESULTS

Information

Report No.眼委20190768

Page 1 of 4

Report No.	眼委20190768
Commission No.	4006799
Testing Laboratory	Guangdong Inspection & Testing Laboratory for Ophthalmic Optics Products
Address	No.19 Jiantashan Road, GZ Science City, Guangzhou, China
Applicant	HK HONGYU OPTICAL CO., LIMITED
Address	FLAT/RM 1907 19/F LEE GARDEN ONE 33 HYSAN AVENUE CAUSEWAY BAY HK
Information of samples	
Product	solar eclipse glasses
Brand name	/
Model No.	PL0011-10
Colour	/
Manufacturer / Vendor	SHENZHEN HONY OPTICAL CO., LIMITED
Address	4th Floor, Building A, No.7 Jinlaiwang Science Park, Jiayi Industrial Zone, Daping community Guanlan, LongHua new district, shenzhen, China 518110
Quantity submitted	1 pcs.
Date	
Date of receipt	2019-04-28
Period of testing	2019-05-06 to 2019-05-10
Date of issue	2019-05-15
Environmental condition	
Temperature	21.0 °C
Relative humidity	55 %
Test requested	ISO 12312-2:2015
Test method	ISO 12312-2:2015
Results	Please refer to the following pages.
Conclusion	Based on the test results given in this report, the specimens meet the requirements of ISO 12312-2:2015.



主管: 张洁

审核: 曹文才

主检: 莫世巧






TEST RESULTS

Information

Report No. 眼委20190768

Page 2 of 4

Description of samples	Photo of samples
<p>GG116 GOGGLE <u>Type:</u> unmounted filter <u>Model:</u> COPPER <u>Filter material:</u> PET <u>Frame material:</u> ABS+ <u>Quantity submitted:</u> 1 pcs.</p>	




Comment:


ISO 12312-2:2015
Eye and face protection — Sunglasses and related eyewear —
Part 2: Filters for direct observation of the sun

Clause	Requirement	Result
4.1	<u>Transmittance</u>	
4.1.1	General (solar infrared transmittance)	Pass
4.2	<u>Material and surface quality</u>	Pass
4.3	<u>Mounting</u>	
4.3.1	General	Pass
4.3.2	Dimensions	Pass
4.3.3	Material quality	Pass
5	<u>Labelling</u>	Pass

—see next page—

主管:  张洁

审核:  曹文才

主检:  吴淑巧

TEST RESULTS

ISO 12312-2:2015
**Eye and face protection — Sunglasses and related eyewear —
 Part 2: Filters for direct observation of the sun**

Report No. 眼委20190768

Page 3 of 4

4.1 Transmittance

4.1.1 General

Test results of the submitted samples are showed as Table 1.

The transmittance requirements of filters are given in Table 2.

Table 1. Test results of the transmittance

Sample	Solar infrared transmittance (τ_{SIR})	Result (Pass/Fail)
Sample 1	R	0.005317%
	L	0.005290%

Note: #2 "R" means the right lens of the glasses and "L" means the left lens of the glasses.

Table 2. Transmittance requirements for filters for the direct observation of the sun

Maximum solar infrared transmittance (T_{SIR})	3%
--	----

Result: Pass.

4.2 Material and surface quality

Except in a marginal area 5 mm wide, filters are free from defects likely to impair vision in use, such as bubbles, scratches, inclusions, dull spots, pitting, scouring, pocking, scaling, and undulations. Metal coated filter materials do not exhibit more than one pinhole defect not greater than 200 μm in average diameter within any 5 mm diameter circular zone.

Result: Pass.

4.3 Mounting

4.3.1 General

Filters are held securely so that it cannot be dislodged by normal handling or by gusts of wind.


Mountings are shaped in the form of spectacles to be worn on the face in front of any corrective (spectacle or contact) lenses worn by the user.

Result: Pass.

----see next page----

主管:  张洁

审核:  曹文才

主检:  吴淑巧





TEST RESULTS

ISO 12312-2:2015

Eye and face protection — Sunglasses and related eyewear — Part 2: Filters for direct observation of the sun

Report No. 眼委20190768

Page 4 of 4

4.3.2 Dimensions

Test results of the submitted samples are showed as Table 4.

The filters and mounting assembly shall be of a size sufficient to cover both eyes of the user simultaneously and in no case shall have overall dimensions less than 115 mm in width and 35 mm in depth in the plane parallel to the facial plane. Spectacle shaped mountings may have a triangular cut-away area to accommodate the crest of the nose, not to exceed 15 mm in apical height and 35 mm width at the base and may have separate filters, one for each eye, provided that the overall dimensions are satisfied.

Table 4. Test results of the dimensions

Sample	Overall dimensions		Triangular cut-away area		Result (Pass/Fail)
	Width	Depth	Apical height	Width	
Sample 1	145.04mm	35.83mm	13.66mm	29.37mm	Pass

Result: Pass.

4.3.3 Material quality

The filter and mounting are free from roughness, sharp edges, projections, or other defects which could cause discomfort or injury during use. No part of the filter or mounting which is in contact with the wearer is made of materials which are known to cause any skin irritation.

Result: Pass.

5 Labelling


The filter and its packaging show the following informations:


- name and address of manufacturer of the product;
- instructions for use in looking at the sun or a solar eclipse;
- warnings that viewing the sun without an appropriate filter can result in permanent eye injury;
- warnings that filters that are damaged or separated from their mountings should be discarded;

Result: Pass.

----End of the report----

主管:  张洁

审核:  曹文才

主检:  吴淑巧

