20.0MM PLAIN TIGHT TIR

Status	Production
Part no.	10003
Drawing no.	60318
Product type	Optic
Туре	TIR
Pieces	1
Diameter	20.0
Height	9.90
Beam	Plain Tight
Flange	Yes
Files	Customer 3D model (.igs) Customer drawing (PDF)



LEDs & Performances	Eff.	FWHM	Cd/Im	Spot	Cross-section	Files
Cree XP-G XLamp® White	87.9%	12.4	16.7			10003_cree_xpg_white_250408.ies
Cree MX-6 XLamp® White	90.2%	15	8.5			10003_cree_MX6_white_250408.ies
SSC Z1 White	87.1%	17.6	6.4	۰		10003_Seoul_Z1_white_250408.ies
Osram Plus W5AM Dragon Cool White	88.2%	7.75	28.7	•		10003_Osram_Dragon_PLus_CoolWhite_250408.ldt 10003_Osram_Dragon_PLus_CoolWhite_250408.ies
SSC P4 Cool White	87.7%	9.5	12.5			10003_Seoul_P4_Cool_White_250408.ies
Osram SSL 80 degree Oslon Ultra White	86.1%	7.2	33.8			10003_Oslon_wht_250408.ies 10003_Oslon_wht_250408.ldt
Nichia NCSL 119-H3 Top Emitting Warm White	88.8%	8.6	27.3	•		10003_Nichia_119_WarmWhite_250408.ies
SSC Z5 Cool White	88.0%	7.8	35.4			10003_Seoul_Z5_white_250408.ies
LedEngin 3W White	86.8%	11.0	10.0			10003_LedEngin_3W_white_250408.ies
LedEngin 5W White	85.7%	11.3	9.9		520	10003_LedEngin_5W_white_250408.ies

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					1	
Luminus Devices SST-50 White	86.0%	18	5.5			10003_Luminus_SST50_White_250408.ies
Everlight Shuen Warm White	87.2%	12	17.5		Γ·Λ_	10003_Shuen_wwht_250408.ies
Everlight Shuen Cool White	87.7%	11.1	16.7	٠	ΪΛ	10003_Shuen_cwht_250408.ies
Avago Jade Cool White	90.1%	11.3	12.0			10003_Avago_Jade_cool white_250408.ies
Lumileds C Luxeon Cool White	86.2%	5.8	58.4	•		10003_Luxeon C_white_250408.ies
SSC P4 Version 7 Cool White	86.2%	12.8	11.4			10003_Seoul_New_P4_Pure_White_250408.ies
Cree XM-L White	87.4%	17.3	8.6			10003_Cree_XM-L_white_31-01-11.ies
Cree XM-L - EZW Warm White	86.9%	15.0	6.4			10003_Cree_XM-L - EZW_warm white_200511.ies
Cree XP-C White	86.3%	5.1	64.0			10003_Cree_XP-C_white_270611.ies
Osram SSL 150 degree Oslon Neutral White	87.0%	7.1	37.4		ANR.	10003_Oslon 150_neutral white_280711.ies
SSC Z5P pure white	85.8%	9.3	27.0		STR.	10003_Z5P_pure white_280911.ies

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Related Holders & LEDs	Jade Cool	Cree MX-6 XLam White	Cree XM-L pt®ZW Warm White	Cree XM-L White	Cree XP-C White	Cree XP-G XLam White	Everli Shuei p©ool White	gEnterli nShue Warm White	ight LedEi n 3W White	ngendE 5W White	Lumil ngi 6 Luxeo Cool White	Devic Devic SST-5 White	Nichia NCSL 119-H Solop Emitt Warm White	^a Osran 3 ^{Plus} W5AM Drago NGool White	Osrar SSL 150 degre Oslor Neutr White	nOsran SSL 80 edegre Oslon aUltra White	n SSC P4 Cool White	SSC P4 Versid 7 Cool White	White	SSC Z5 Cool White	SSC Z5P pure white
10148 20.0mm Circular Black														\checkmark							
10148-TS 20.0mm Self Adhesive (TS) Black														\checkmark							
10149 20.0mm Circular Clear														\checkmark							
10149-TS 20.0mm Self Adhesive (TS) Clear														\checkmark							
10150 20.0mm Circular White														\checkmark							
10150-TS 20.0mm Self Adhesive (TS) White														\checkmark							
10273 50.0mm Triple White																	\checkmark	\checkmark			
10276 50.0mm Triple White														\checkmark							
10283 50.0mm Triple White																	\checkmark	\checkmark			
10286 50.0mm Triple White														\checkmark							
10293 50.0mm Triple Black																	\checkmark	\checkmark			
10296 50.0mm Triple Black														\checkmark							
10303 50.0mm Triple Black																	\checkmark	\checkmark			
10306 50.0mm Circular Black														\checkmark							
10363 20.0mm Circular Black																	\checkmark	\checkmark			
10363-TS 20.0mm Self Adhesive (TS) Black																	\checkmark	\checkmark			
10364 20.0mm Circular White																	\checkmark	\checkmark			
10364-TS 20.0mm Self Adhesive (TS) White																	\checkmark	\checkmark			
10365 20.0mm Circular Clear																	\checkmark	\checkmark			
10365-TS 20.0mm Self Adhesive (TS) Clear																	\checkmark	\checkmark			
10630 20.0mm Universal White																				\checkmark	
10631 20.0mm Universal White	\checkmark								\checkmark				\checkmark								
10632 20.0mm Universal White					\checkmark		\checkmark	\checkmark			\checkmark				\checkmark	\checkmark					\checkmark
10634 20.0mm Universal White						\checkmark															
10637 20.0mm Universal White		\checkmark																			
10650 20.0mm Universal White																				\checkmark	
10651 20.0mm Universal White	\checkmark								\checkmark				\checkmark								
10652 20.0mm Universal White					\checkmark		\checkmark	\checkmark			\checkmark				\checkmark	\checkmark					\checkmark
10654 20.0mm Universal White						\checkmark															
10657 20.0mm Universal White		\checkmark				-															
10670 20.0mm Universal White																				\checkmark	
10671 20.0mm Universal White	\checkmark								\checkmark				\checkmark							-	
10672 20.0mm Universal White	-				\checkmark		\checkmark	\checkmark	-		\checkmark				\checkmark	\checkmark					\checkmark
10674 20.0mm Universal White						\checkmark	-	-			-				-	-					-
10677 20.0mm Universal White		\checkmark																			

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10690 20.0mm Universal Black															\checkmark	
10691 20.0mm Universal Black	\checkmark						\checkmark			\checkmark						
10692 20.0mm Universal Black			\checkmark		\checkmark	\checkmark			\checkmark		\checkmark	\checkmark				\checkmark
10694 20.0mm Universal Black				\checkmark												
10697 20.0mm Universal Black		\checkmark														
10710 20.0mm Universal Black															\checkmark	
10711 20.0mm Universal Black	\checkmark						\checkmark			\checkmark						
10712 20.0mm Universal Black			\checkmark		\checkmark	\checkmark		,	\checkmark		\checkmark	\checkmark				\checkmark
10714 20.0mm Universal Black				\checkmark												
10717 20.0mm Universal Black		\checkmark														
10730 20.0mm Universal Black															\checkmark	
10731 20.0mm Universal Black	\checkmark						\checkmark			\checkmark						
10732 20.0mm Universal Black			\checkmark		\checkmark	\checkmark		,	\checkmark		\checkmark	\checkmark				\checkmark
10734 20.0mm Universal Black				\checkmark												
10737 20.0mm Universal Black		\checkmark														
47.313.5001.80 with 47.313320.80 20.0mm BJB Black													\checkmark	\checkmark		

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General Instruction – Optics & Holders

Handling instructions

- Do not handle or install lenses without wearing gloves, skin oils may damage the lens or the light transmission.
- Clean lenses with a mild soap and water and dry with a clean soft cloth.
- Do not use any commercial solvents on lenses.
- Mount holders with low Odour epoxies and allow time for them to out gas to stop lenses fogging.

Disclaimer & ndash; Optics & Holders

Please note that flow lines, weld lines, surface scratches and small black or white inclusions within the lenses are acceptable if the optical performance of the lens is within the specification described below:

For all optics except Rippled and Frosted;

• FWHM = Datasheet Value +/-10%.

For all Rippled and Frosted Optics;

• FWHM = Datasheet Value +/-20%

For all Optics;

Efficiency = Datasheet Value +infinity / -10%

The yellowing / browning of polycarbonate lenses and holders can occur due to the natural ageing process and exposure to heat and UV and as such is not covered by Carclo's warranty.

General Instruction – Taped Holders

Click here to view the 3M Technical Data Sheet

When assembling the pre-taped holder onto the mating surface, the application must be made straight and square, so that the tape bonds consistently Bond strating spatiation generated holder onto the mating surface, the application must be made straight and square, so that the tape bonds consistently Bond strating spatiation generated holder onto the mating surface beneficial to the straight and square, so that the tape bonds consistently Bond strating spatiation generated holder of the straight and square, so that the tape bonds consistently Bond strating spatiation generated holder of the strain genet densities holder of the strain generated holder of the stra

Some typical surface cleaning solvents are isopropyl alcohol or heptane. * If cleaning of PCB or LED surfaces is required, please follow strictly ldeal tape application temperature range is 70°F to 100°F (21°C to 38°C). Initial tape application temperature range is 70°F to 100°F (21°C to 38°C). Initial tape application temperature range is 70°F to 100°F (21°C to 38°C). Initial tape application temperature range is 70°F to 100°F (21°C to 38°C). Initial tape application temperature range is 70°F to 100°F (21°C to 38°C). Initial tape application temperature range is 70°F to 100°F (21°C to 38°C). Initial tape application temperature range is 70°F to 100°F (21°C to 38°C). Initial tape application temperature range is 70°F to 100°F (21°C to 38°C). Initial tape application temperature range is 70°F to 100°F (21°C to 38°C). Initial tape application temperature range is 70°F to 100°F (21°C to 38°C). Initial tape application temperature range is 70°F to 100°F (21°C to 38°C). Initial tape application temperature range is 70°F to 100°F (21°C to 38°C). Initial tape application temperature range is 70°F to 100°F (21°C to 38°C). Initial tape application temperature range is 70°F to 100°F (21°C to 38°C). Initial tape application temperature range is 70°F to 100°F (21°C to 38°C). Initial tape application temperature range is 70°F to 100°F (21°C to 38°C). Initial tape application temperature range is 70°F to 100°F (21°C to 38°C). Initial tape application temperature range is 70°F to 100°F (21°C to 38°C). Initial tape application temperature range is 70°F to 100°F (21°C to 38°C). Initial tape application temperature range is 70°F to 100°F (21°C to 38°C). Initial tape application temperature range is 70°F to 100°F (21°C to 38°C). Initial tape application temperature range is 70°F to 100°F (21°C to 38°C). Initial tape application temperature range is 70°F to 100°F (21°C to 38°C). Initial tape application temperature range is 70°F to 100°F (21°C to 38°C). Initial tape application temperature range is 70°F to 100°F (21°C

may not be compliant with the rules of certain Air Quality Management During assembly the optic when placed on the PCB should be firmly held for 1-5 seconds to ensure the best possible bond. The tape will reach its final streng in 72 hours, dependent on the material and ambient conditions.

We request that the customer ensures (and fully tests) the suitability and sufficiency of the bond in his product. For example, mechanical stress, vibration and holes on the surface of the circuit board can weaken the strength of the tape.

Disclaimer – Taped Holders

Shelf Life – There is 1 year expected shelf life from the date of purchase direct from Carclo.

All Carclo lenses supplied with tape use the same high strength double-coated tape (unless otherwise mentioned in the datasheet). This tape is specifically selected for this application.

These tapes generally work well together with PCBs and LEDs on the market. The customer must take the necessary measures to ensure complete compatibility with their particular application, product, PCB, LED and/or other components. **Testing and verifying of the adhesives and their combinations is the responsibility of the customer.**

The customer is solely responsible for evaluating the application of double sided tape to Carclo Holders and the adhesion of double sided tape holders to Carclo Technical Plastics 103 Buckingham Ave, Slough, Berkshire, SL1 4PF ENGLAND Tel: +44 (0)1753 575011 Fax: +44 (0)1753 811359

determine whether such double-sided tape is fit for a particular purpose and suitable for the users method of application. The selection of double-sided tape in the adhesion of double sided tape holders is not covered by Carclo's warranty.

Carclo cannot take responsibility for the results obtained by others whose methods we cannot control. It is always the customer's responsibility to determine the adhesive's suitability for their product and to take precautions for protection of property and persons against any hazards that may be involved in the handling and use of adhesives. Carclo disclaims all warranties, including warranties of merchantability or suitability for a particular purpose, arising from use of any adhesive product. Carclo disclaims any liability for consequential or incidental damages of any kind, including lost profits.

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