

# LIMBUS

CONTROL YOUR LIGHT

BY  *TD Lighting Solutions*



## TLS01NI Single Series

FAMILY DATASHEET

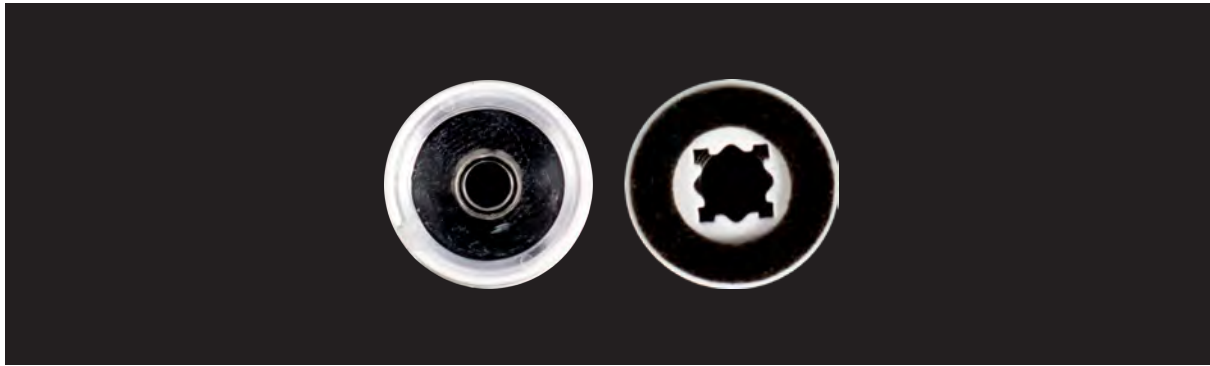
# TLS01NI-D12-12-Tape

LED OPTIC DATASHEET

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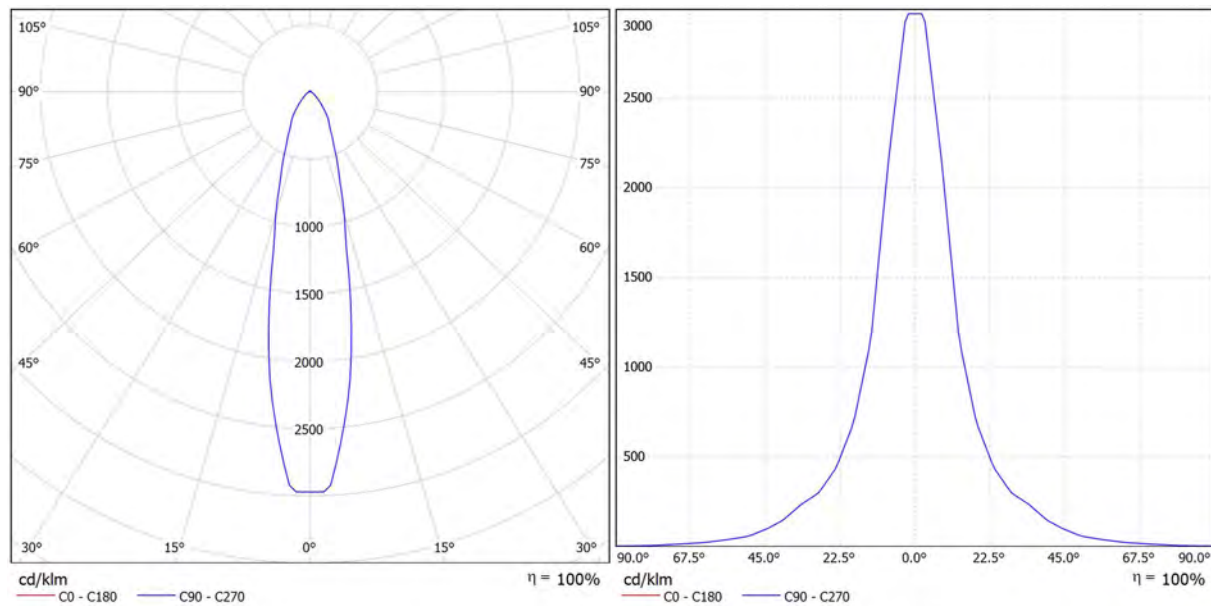
PRODUCT PICTURE



GENERAL SPECIFICATIONS

<b>Product Code</b>	TLS01NI-D12-12-Tape
<b>Description</b>	Flood Lighting
<b>Degree (FWHM)</b>	12°
<b>Efficiency</b>	90%
<b>Size (mm) D x H</b>	Ø 13 x H 6,9 mm
<b>Material</b>	Lens: PMMA Holder: PC
<b>Fastening</b>	Tape
<b>Box Size (mm) WxLxH</b>	630x260x300
<b>Box Quantity</b>	17920 pcs
<b>Box Weight (g)</b>	18000
<b>Rohs Complaint</b>	Yes
<b>Operating Temperature</b>	-40 °C ~ +90 °C max
<b>Storage Temperature</b>	0 °C ~ 40 °C max

PHOTOMETRIC SPECIFICATIONS



APPLICATION NOTES

#### Directions for use

- Please use some soft paper or pure water to clean lens ( reflector)
- Don't use any industrial solvent to clean lens surface , such as alcohol
- Storage environment : Temperature 0°C ~ +40°C , Humidity 30% ~ 95%
- This kind of lens can make the lighting more concentrated, and it's made from transparent material, so please do not open the packages until you use them, in case of the dust and other pollutions.

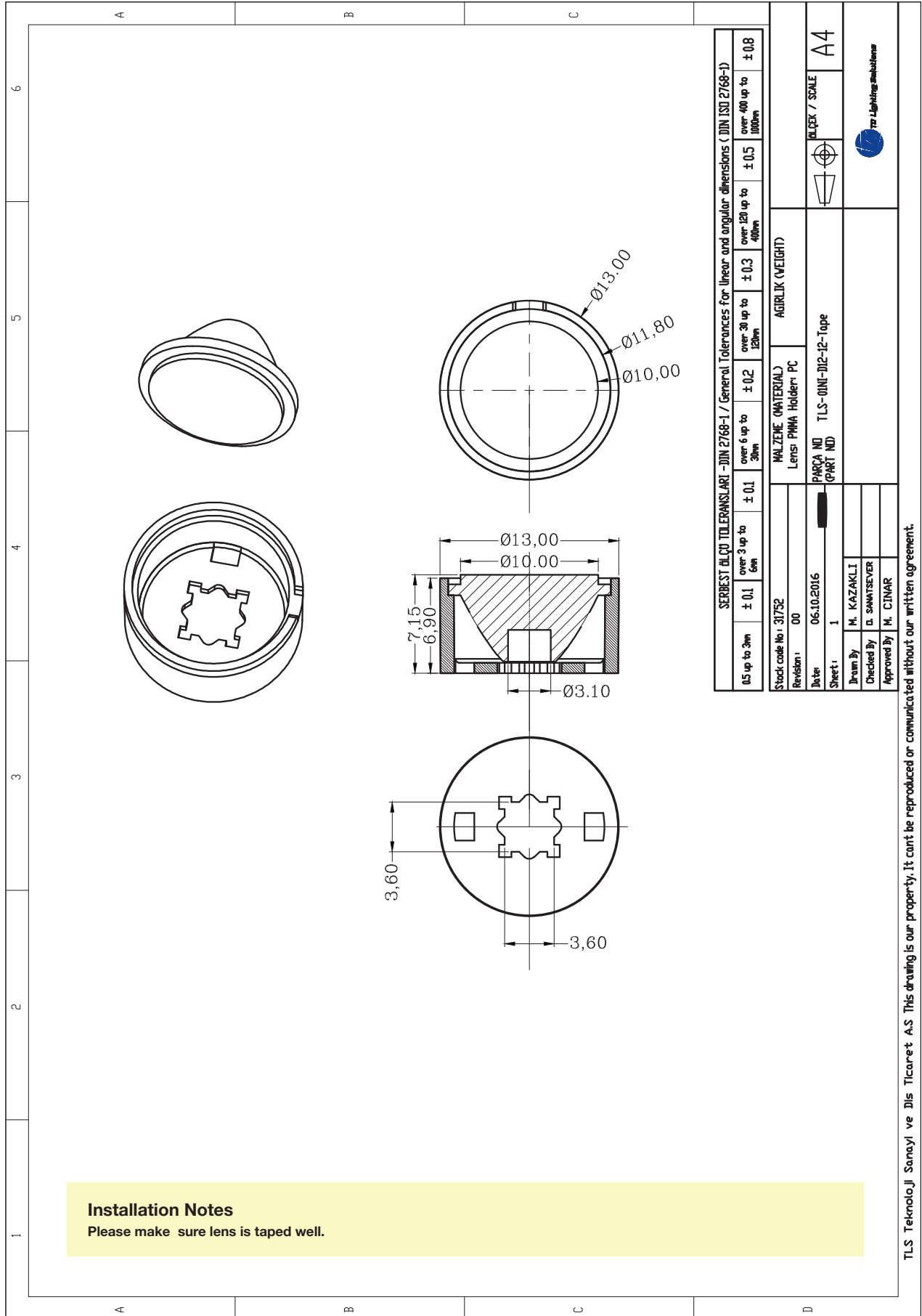
# TLS01NI-D12-12-Tape

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MECHANICAL DRAWINGS



**Installation Notes**  
Please make sure lens is taped well.

SERBEST BİLÇÜ TOLERANSLARI - DIN 2768-1 / General Tolerances for linear and angular dimensions (DIN ISO 2768-1)					
0.5 up to 3mm	± 0.1	over 3 up to 6mm	± 0.1	over 6 up to 30mm	± 0.2
				over 30 up to 120mm	± 0.3
				over 120 up to 400mm	± 0.5
				over 400 up to 1000mm	± 0.8

Stock code No: 31752	MALZEME (MATERIAL)	AGIRLIK (WEIGHT)
Revision: 00	Lens: PMMA Holder: PC	
Date: 06.10.2016	PARÇA NO (PART NO)	
Sheet: 1	TLS-01NI-D12-12-Tape	
Drawn By: M. KAZAKLI		
Checked By: G. SAMATSEVER		
Approved By: M. CINAR		



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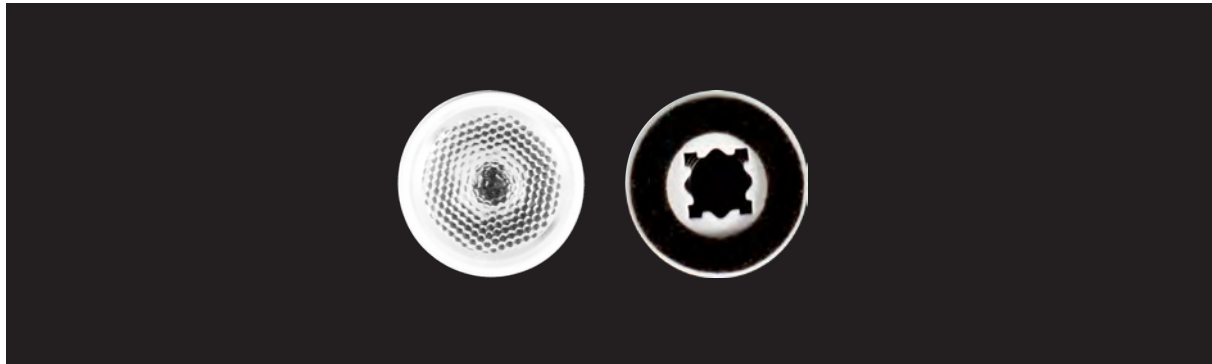
# TLS01NI-D12-30-Tape

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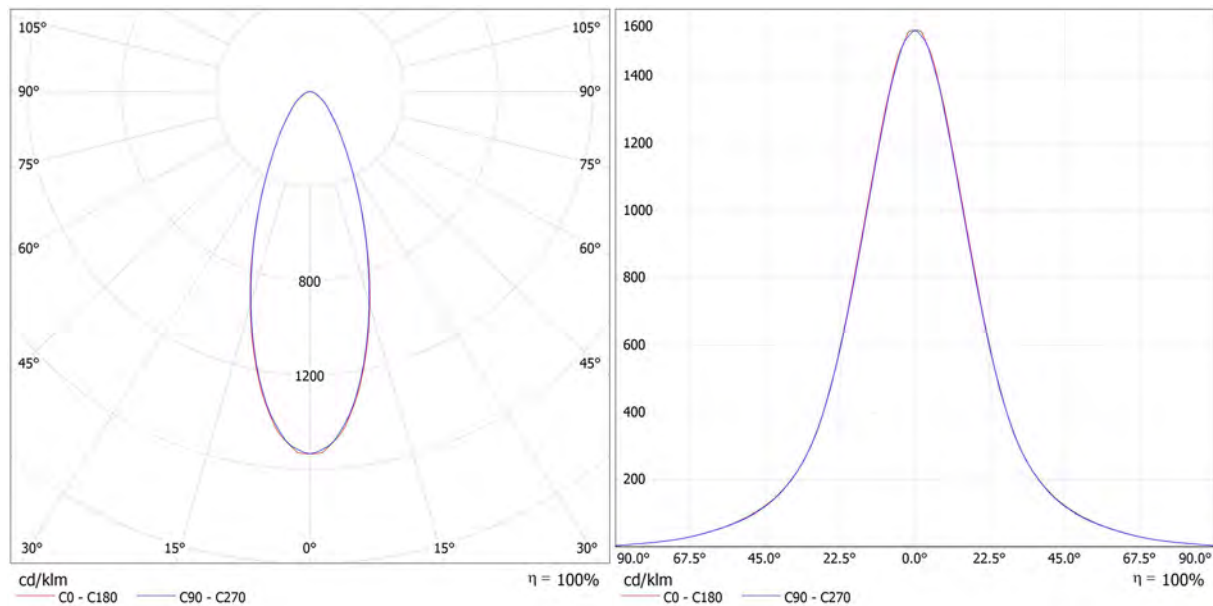
PRODUCT PICTURE



GENERAL SPECIFICATIONS

<b>Product Code</b>	TLS01NI-D12-30-Tape
<b>Description</b>	Flood Lighting
<b>Degree (FWHM)</b>	38°
<b>Efficiency</b>	88%
<b>Size (mm) D x H</b>	Ø 13 x H 6,9 mm
<b>Material</b>	Lens: PMMA Holder: PC
<b>Fastening</b>	Tape
<b>Box Size (mm) WxLxH</b>	630x260x300
<b>Box Quantity</b>	17920 pcs
<b>Box Weight (g)</b>	18000
<b>Rohs Compliant</b>	Yes
<b>Operating Temperature</b>	-40 ° C ~ + 90 ° C max
<b>Storage Temperature</b>	0 ° C ~ 40 ° C max

PHOTOMETRIC SPECIFICATIONS



APPLICATION NOTES

#### Directions for use

- Please use some soft paper or pure water to clean lens ( reflector)
- Don't use any industrial solvent to clean lens surface , such as alcohol
- Storage environment : Temperature 0°C ~ +40°C , Humidity 30 %~ 95%
- This kind of lens can make the lighting more concentrated, and it's made from transparent material, so please do not open the packages until you use them, in case of the dust and other pollutions.

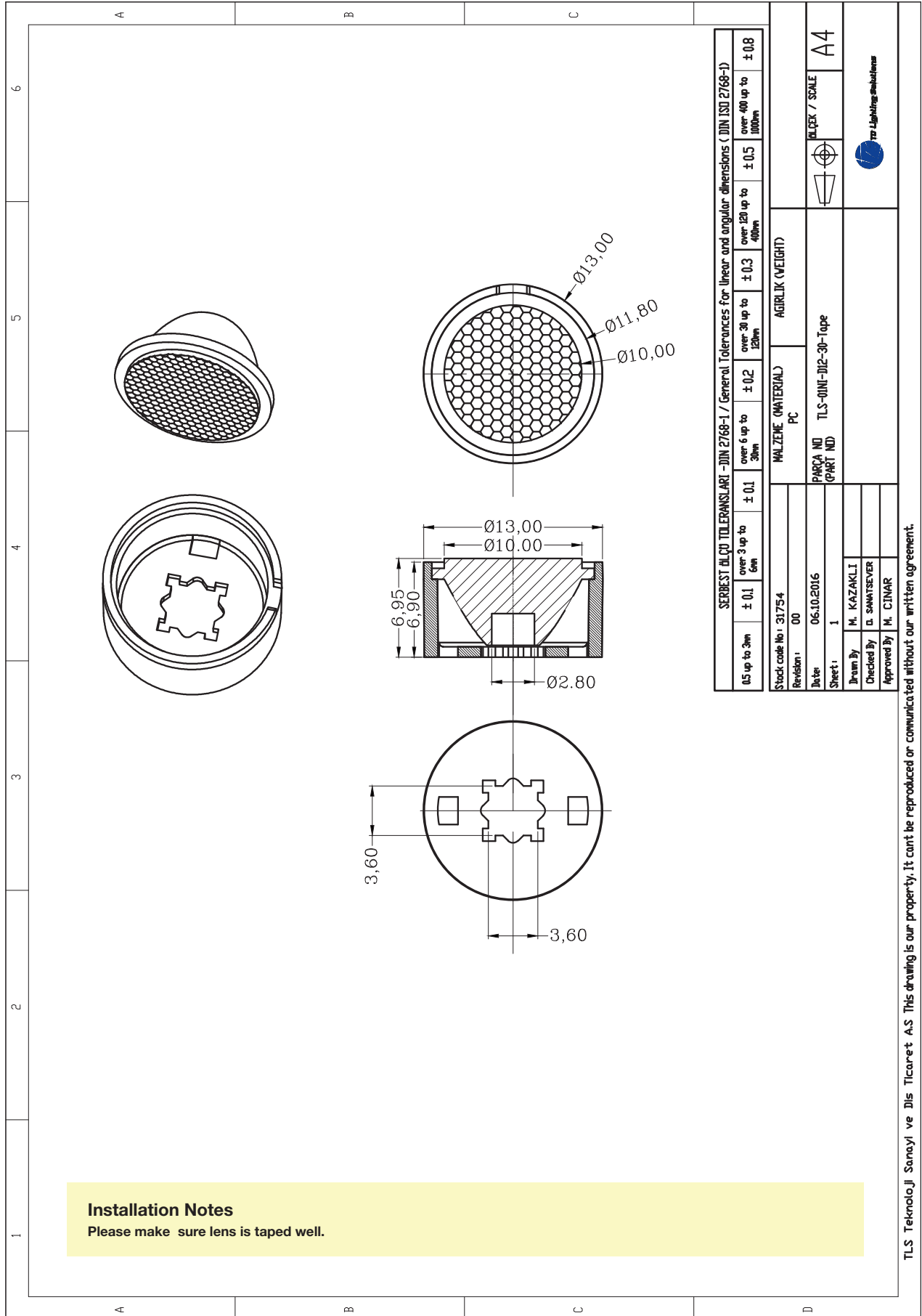
# TLS01NI-D12-30-Tape

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MECHANICAL DRAWINGS



SERBEST BİLÇÜ TOLERANSLARI - DIN 2768-1 / General Tolerances for linear and angular dimensions (DIN ISO 2768-1)					
0,5 up to 3mm	± 0,1	over 3 up to 6mm	± 0,1	over 6 up to 30mm	± 0,2
				over 30 up to 120mm	± 0,3
				over 120 up to 400mm	± 0,5
				over 400 up to 1000mm	± 0,8

Stock code No : 31754	MALZEME (MATERIAL)	AGIRLIK (WEIGHT)
Revision : 00	PC	
Date : 06.10.2016	PARÇA NO (PART NO)	TLS-01NI-D12-30-Tape
Sheet : 1		
Drawn By : M. KAZAKLI		
Checked By : G. SAMATSEVER		
Approved By : M. CINAR		



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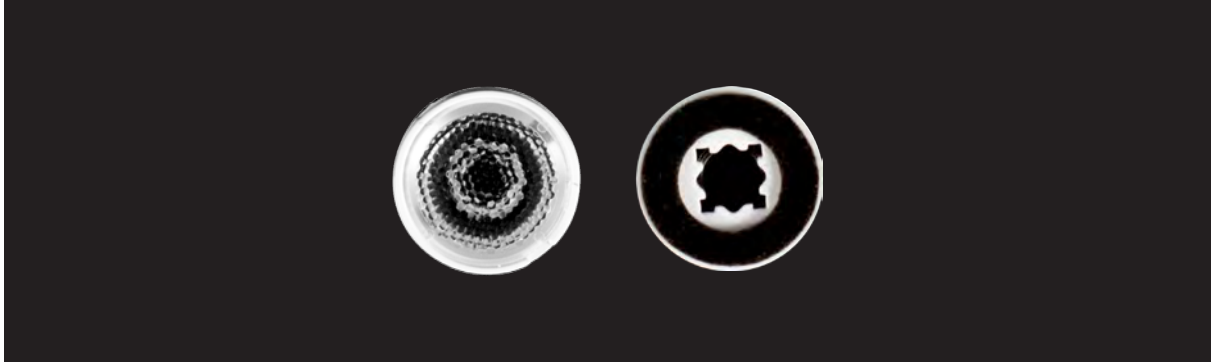
# TLS01NI-D12-45-Tape

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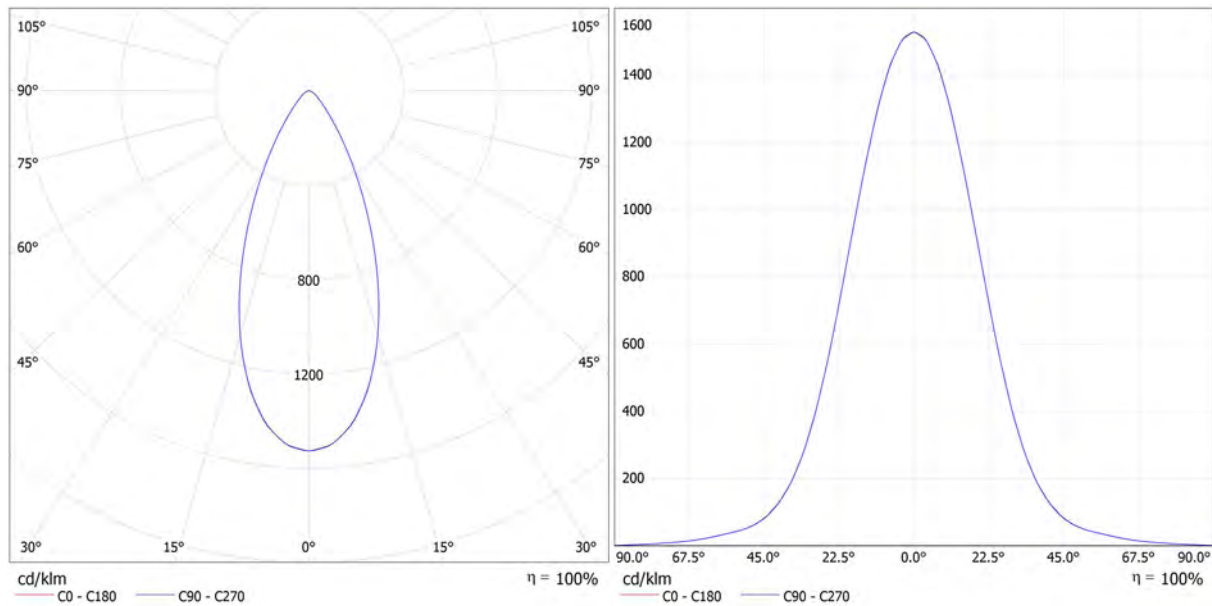
PRODUCT PICTURE



GENERAL SPECIFICATIONS

<b>Product Code</b>	TLS01NI-D12-45-Tape
<b>Description</b>	Flood Lighting
<b>Degree (FWHM)</b>	44°
<b>Efficiency</b>	88%
<b>Size (mm) D x H</b>	Ø 13 x H 6,9 mm
<b>Material</b>	Lens: PMMA Holder: PC
<b>Fastening</b>	Tape
<b>Box Size (mm) WxLxH</b>	630x260x300
<b>Box Quantity</b>	17920 pcs
<b>Box Weight (g)</b>	18000
<b>Rohs Compliant</b>	Yes
<b>Operating Temperature</b>	-40 ° C ~ + 90 ° C max
<b>Storage Temperature</b>	0 ° C ~ 40 ° C max

PHOTOMETRIC SPECIFICATIONS



APPLICATION NOTES

#### Direction for use

- Please use some soft paper or pure water to clean lens ( reflector)
- Don't use any industrial solvent to clean lens surface , such as alcohol
- Storage environment : Temperature 0°C ~ +40°C , Humidity 30% ~ 95%
- This kind of lens can make the lighting more concentrated, and it's made from transparent material, so please do not open the packages until you use them, in case of the dust and other pollutions.

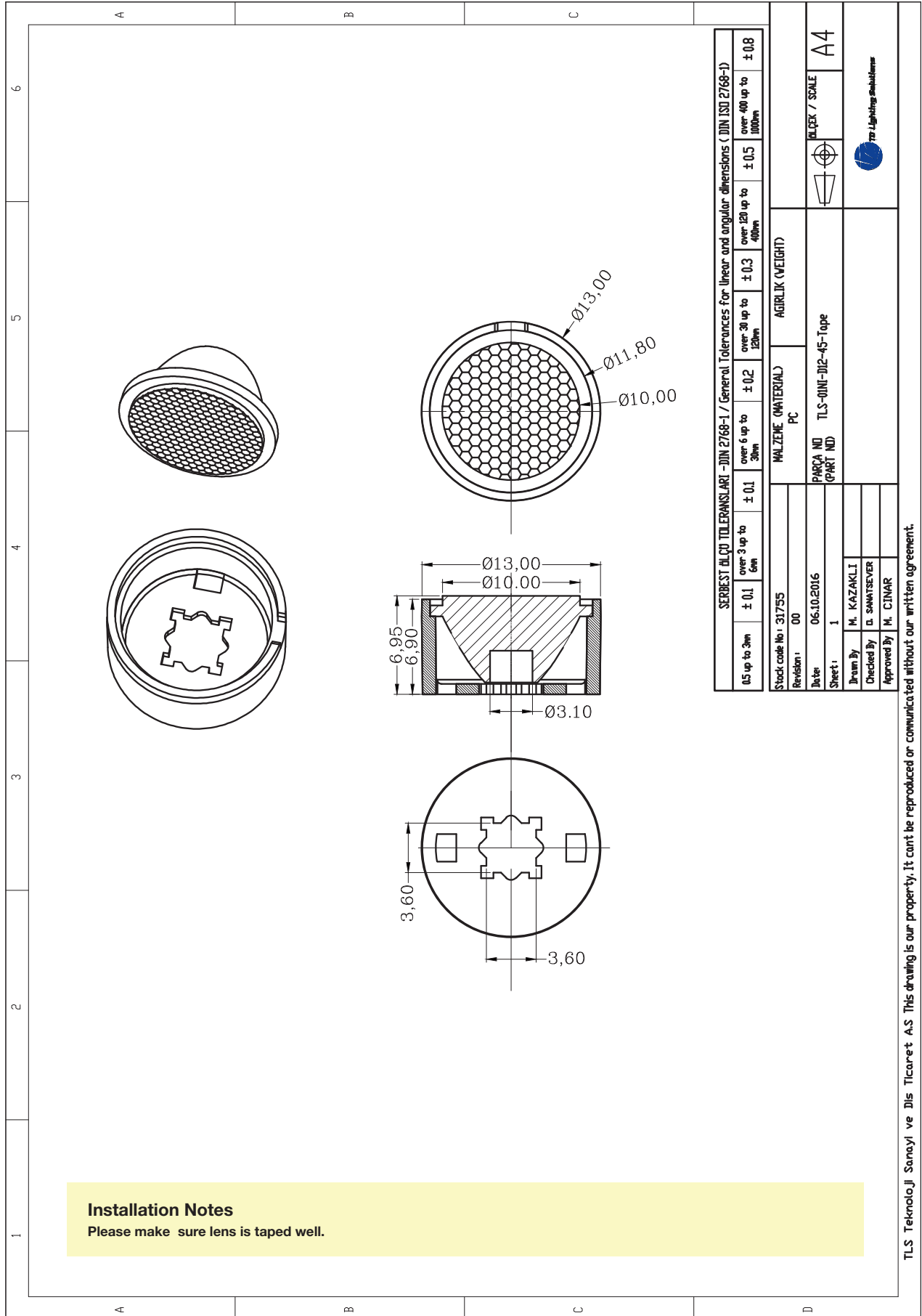
# TLS01NI-D12-45-Tape

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MECHANICAL DRAWINGS



**Installation Notes**  
Please make sure lens is taped well.

SERBEST BİLÇÜ TOLERANSLARI - DIN 2768-1 / General Tolerances for linear and angular dimensions (DIN ISO 2768-1)					
0,5 up to 3mm	± 0,1	over 3 up to 6mm	± 0,1	over 6 up to 30mm	± 0,2
				over 30 up to 120mm	± 0,3
				over 120 up to 400mm	± 0,5
				over 400 up to 1000mm	± 0,8

Stock code No : 31755	MALZEME (MATERIAL)	AGIRLIK (WEIGHT)
Revision : 00	PC	
Date : 06.10.2016	PARÇA NO (PART NO)	
Sheet : 1	TLS-01NI-D12-45-Tape	
Drawn By : M. KAZAKLI		
Checked By : G. SAMATSEVER		
Approved By : M. CINAR		



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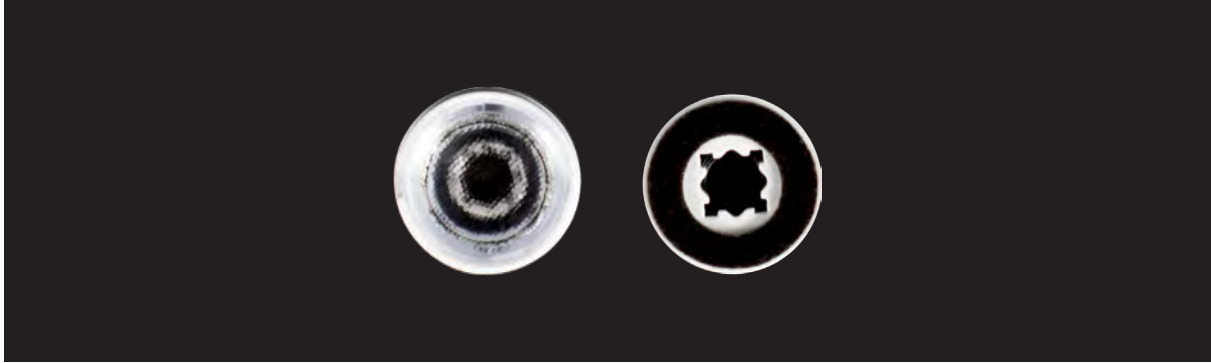
# TLS01NI-D12-60-Tape

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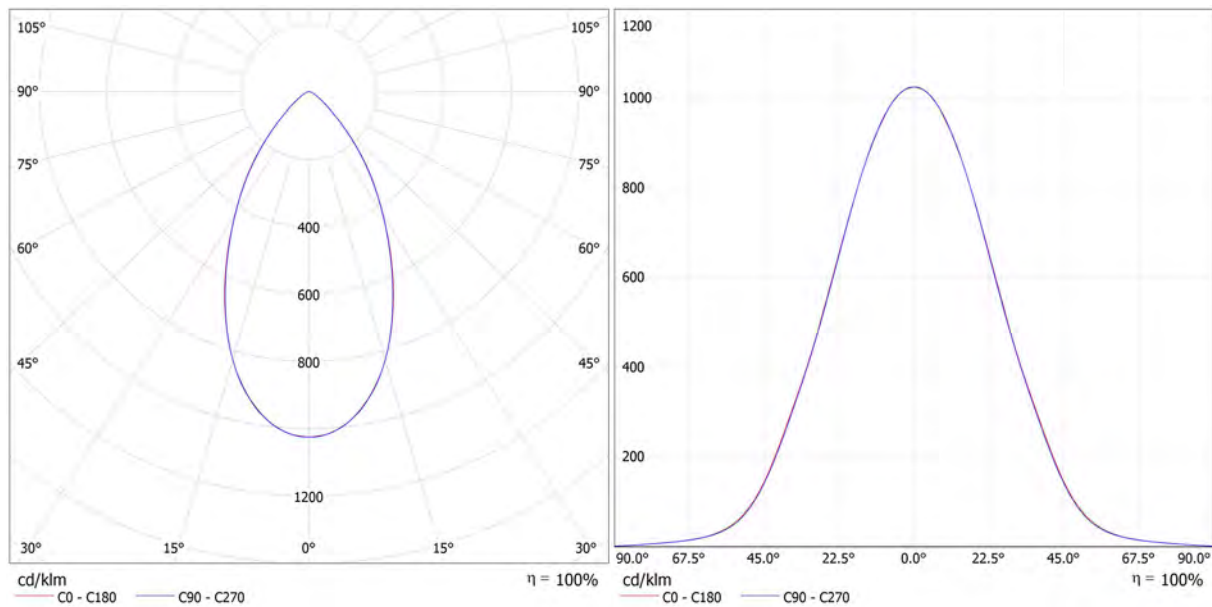
PRODUCT PICTURE



GENERAL SPECIFICATIONS

<b>Product Code</b>	TLS01NI-D12-60-Tape
<b>Description</b>	Flood Lighting
<b>Degree (FWHM)</b>	56°
<b>Efficiency</b>	88%
<b>Size (mm) D x H</b>	Ø 13 x H 6,9 mm
<b>Material</b>	Lens: PMMA Holder: PC
<b>Fastening</b>	Tape
<b>Box Size (mm) WxLxH</b>	630x260x300
<b>Box Quantity</b>	17920 pcs
<b>Box Weight (g)</b>	18000
<b>Rohs Compliant</b>	Yes
<b>Operating Temperature</b>	-40 °C ~ +90 °C max
<b>Storage Temperature</b>	0 °C ~ 40 °C max

PHOTOMETRIC SPECIFICATIONS



APPLICATION NOTES

#### Direction for use

- Please use some soft paper or pure water to clean lens ( reflector)
- Don't use any industrial solvent to clean lens surface , such as alcohol
- Storage environment : Temperature 0°C ~ +40°C , Humidity 30%~95%
- This kind of lens can make the lighting more concentrated, and it's made from transparent material, so please do not open the packages until you use them, in case of the dust and other pollutions.



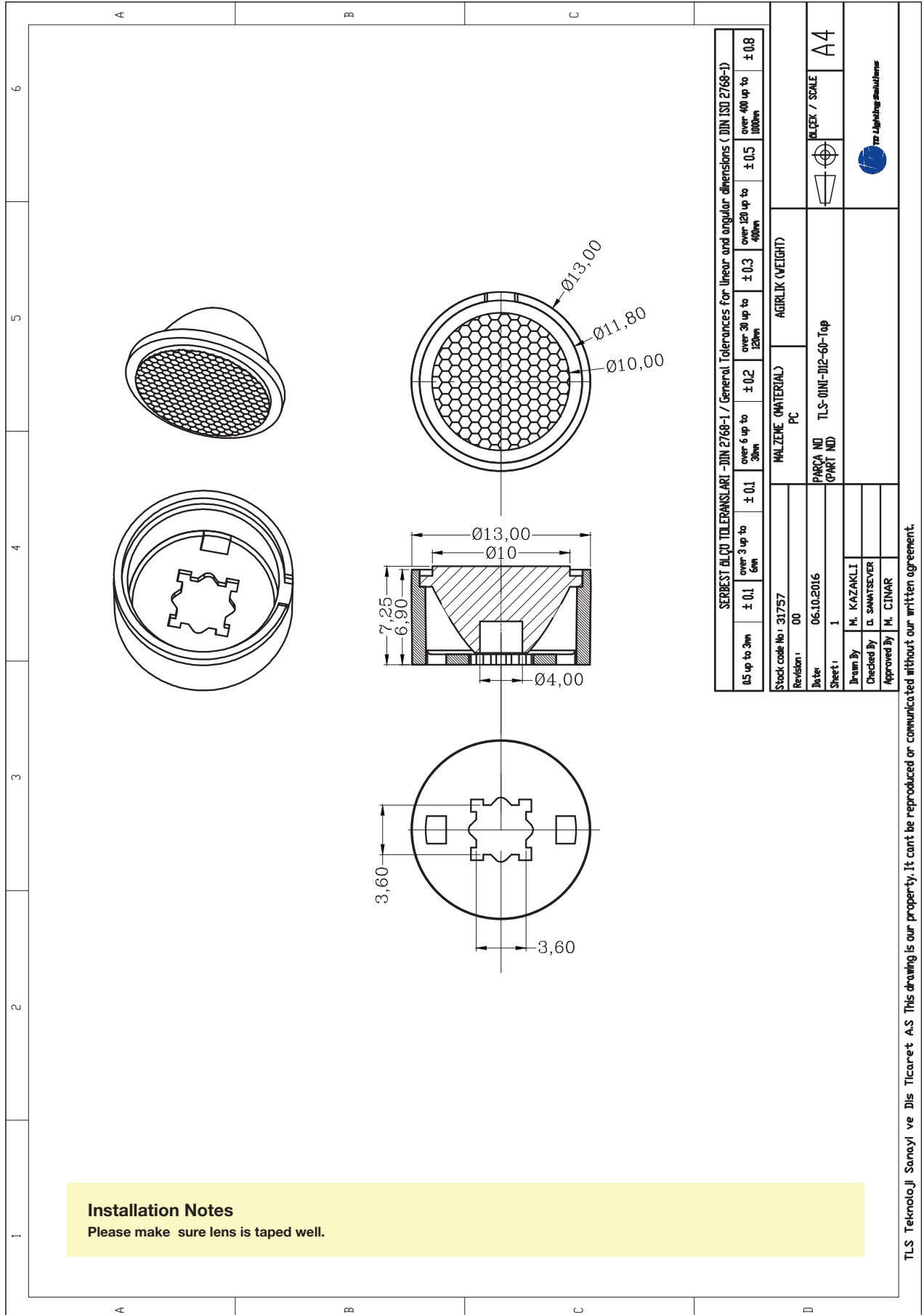
# TLS01NI-D12-60-Tape

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MECHANICAL DRAWINGS



SERBEST BİLÇÜ TOLERANSLARI - DIN 2768-1 / General Tolerances for linear and angular dimensions (DIN ISO 2768-1)					
0,5 up to 3mm	± 0,1	over 3 up to 6mm	± 0,1	over 6 up to 30mm	± 0,2
				over 30 up to 120mm	± 0,3
				over 120 up to 400mm	± 0,5
				over 400 up to 1000mm	± 0,8

Stock code No : 31757	MALZEME (MATERIAL)	AGIRLIK (WEIGHT)		
Revision : 00	PC			
Date : 06.10.2016	PARÇA NO (PART NO)	TLS-01NI-D12-60-Top		
Sheet : 1				
Drawn By : M. KAZAKLI				
Checked By : G. SAMATSEVER				
Approved By : M. CINAR				

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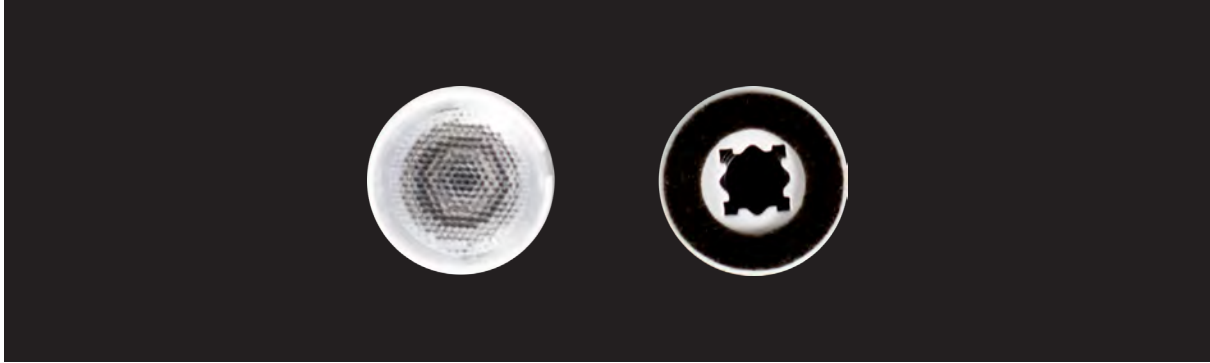
# TLS01NI-D12-90-Tape

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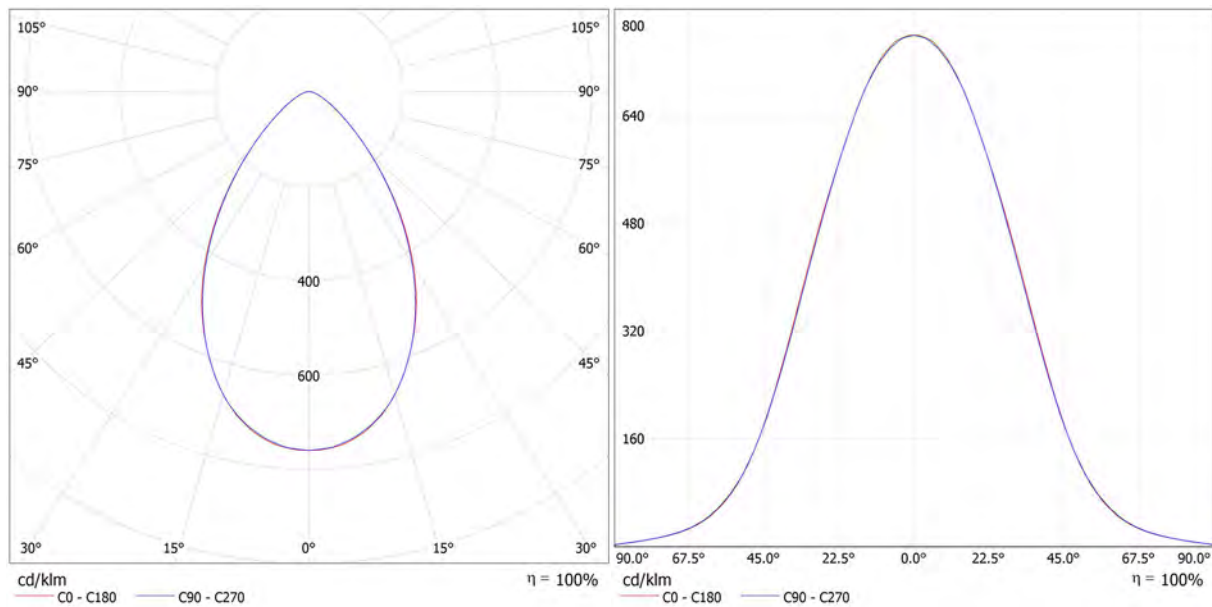
PRODUCT PICTURE



GENERAL SPECIFICATIONS

<b>Product Code</b>	TLS01NI-D12-90-Tape
<b>Description</b>	Flood Lighting
<b>Degree (FWHM)</b>	67°
<b>Efficiency</b>	88%
<b>Size (mm) D x H</b>	Ø 13 x H 6,9 mm
<b>Material</b>	Lens: PMMA Holder: PC
<b>Fastening</b>	Tape
<b>Box Size (mm) WxLxH</b>	630x2600x300
<b>Box Quantity</b>	17920 pcs
<b>Box Weight (g)</b>	18000
<b>Rohs Complaint</b>	Yes
<b>Operating Temperature</b>	-40 ° C ~ + 90 ° C max
<b>Storage Temperature</b>	0 ° C ~ 40 ° C max

PHOTOMETRIC SPECIFICATIONS



APPLICATION NOTES

## Direction for use

- Please use some soft paper or pure water to clean lens ( reflector)
- Don't use any industrial solvent to clean lens surface , such as alcohol
- Storage environment : Temperature 0°C ~ +40°C , Humidity 30% ~ 95%
- This kind of lens can make the lighting more concentrated, and it's made from transparent material, so please do not open the packages until you use them, in case of the dust and other pollutions.

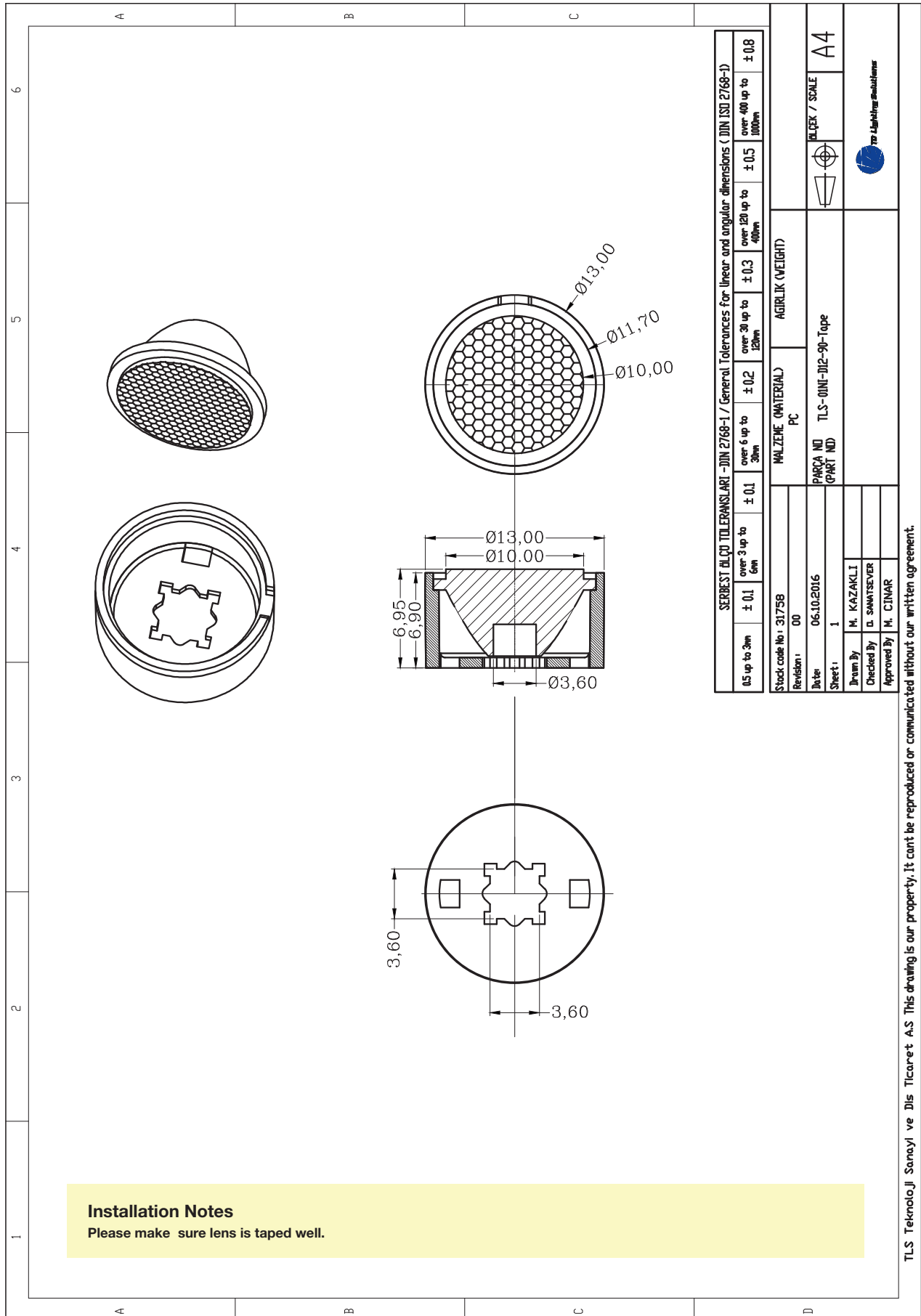
# TLS01NI-D12-90-Tape

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MECHANICAL DRAWINGS



### Installation Notes

Please make sure lens is taped well.

SERBEST BİLÇÜ TOLERANSLARI - DIN 2768-1 / General Tolerances for linear and angular dimensions (DIN ISO 2768-1)					
0,5 up to 3mm	$\pm 0,1$	over 3 up to 6mm	$\pm 0,1$	over 6 up to 30mm	$\pm 0,2$
over 30 up to 120mm	$\pm 0,3$	over 120 up to 400mm	$\pm 0,5$	over 400 up to 1000mm	$\pm 0,8$

Stock code No.:	3175B	MALZEME (MATERIAL):	PC	AGIRLIK (WEIGHT):	
Revision:	00	PARÇA NO (PART NO):	TLS-01NI-D12-90-Tape	ÖLÇEK / SCALE:	A4
Date:	06.10.2016	Drawn By:	M. KAZAKLI		
Sheet:	1	Checked By:	G. SAMATSEVER		
Approved By:	M. CINAR				

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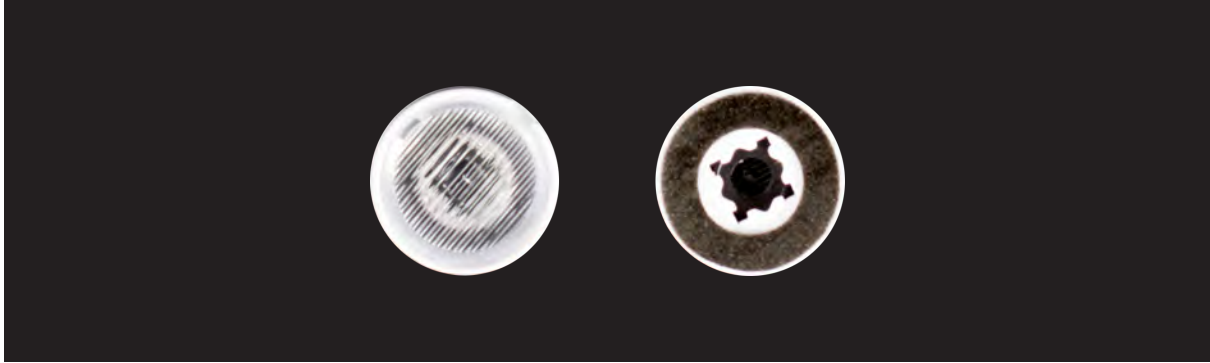
# TLS01NI-D12-2550-Tape

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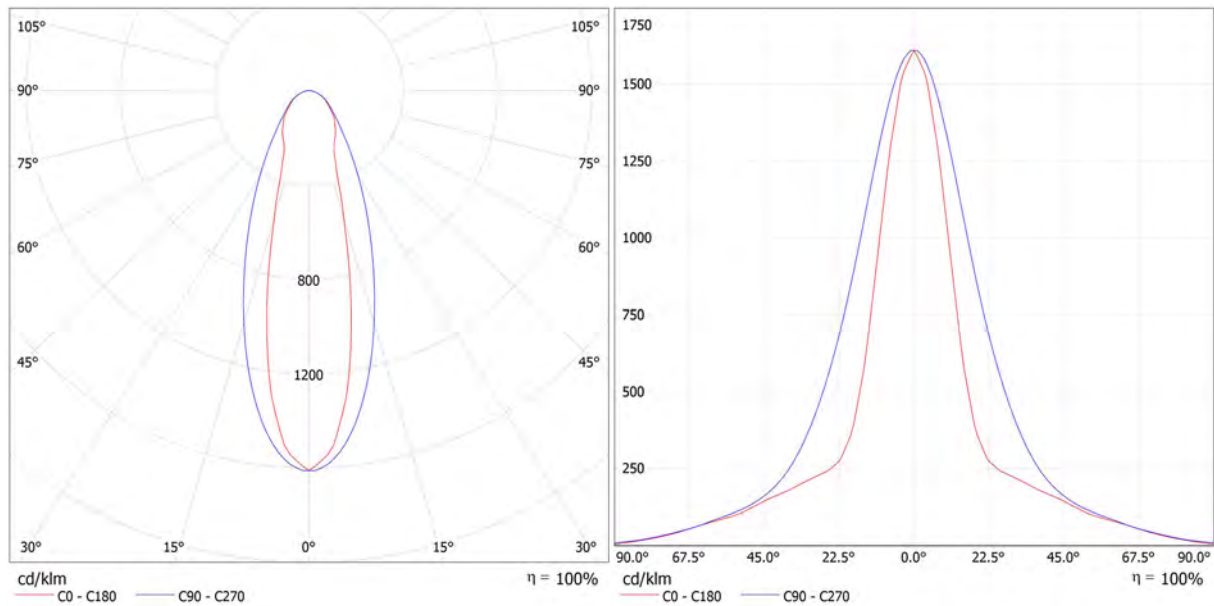
PRODUCT PICTURE



GENERAL SPECIFICATIONS

<b>Product Code</b>	TLS01NI-D12-2550-Tape
<b>Description</b>	Flood Lighting
<b>Degree (FWHM)</b>	Elipitical 19° - 34°
<b>Efficiency</b>	90%
<b>Size (mm) D x H</b>	Ø 13 x H 6,9 mm
<b>Material</b>	Lens: PMMA Holder: PC
<b>Fastening</b>	Tape
<b>Box Size (mm) WxLxH</b>	630x260x300
<b>Box Quantity</b>	17920 pcs
<b>Box Weight (g)</b>	18000
<b>Rohs Compliant</b>	Yes
<b>Operating Temperature</b>	-40 °C ~ + 90 °C max
<b>Storage Temperature</b>	0 °C ~ 40 °C max

PHOTOMETRIC SPECIFICATIONS



APPLICATION NOTES

### Direction for use

- Please use some soft paper or pure water to clean lens ( reflector)
- Don't use any industrial solvent to clean lens surface , such as alcohol
- Storage environment : Temperature 0°C ~ +40°C , Humidity 30% ~ 95%
- This kind of lens can make the lighting more concentrated, and it's made from transparent material, so please do not open the packages until you use them, in case of the dust and other pollutions.

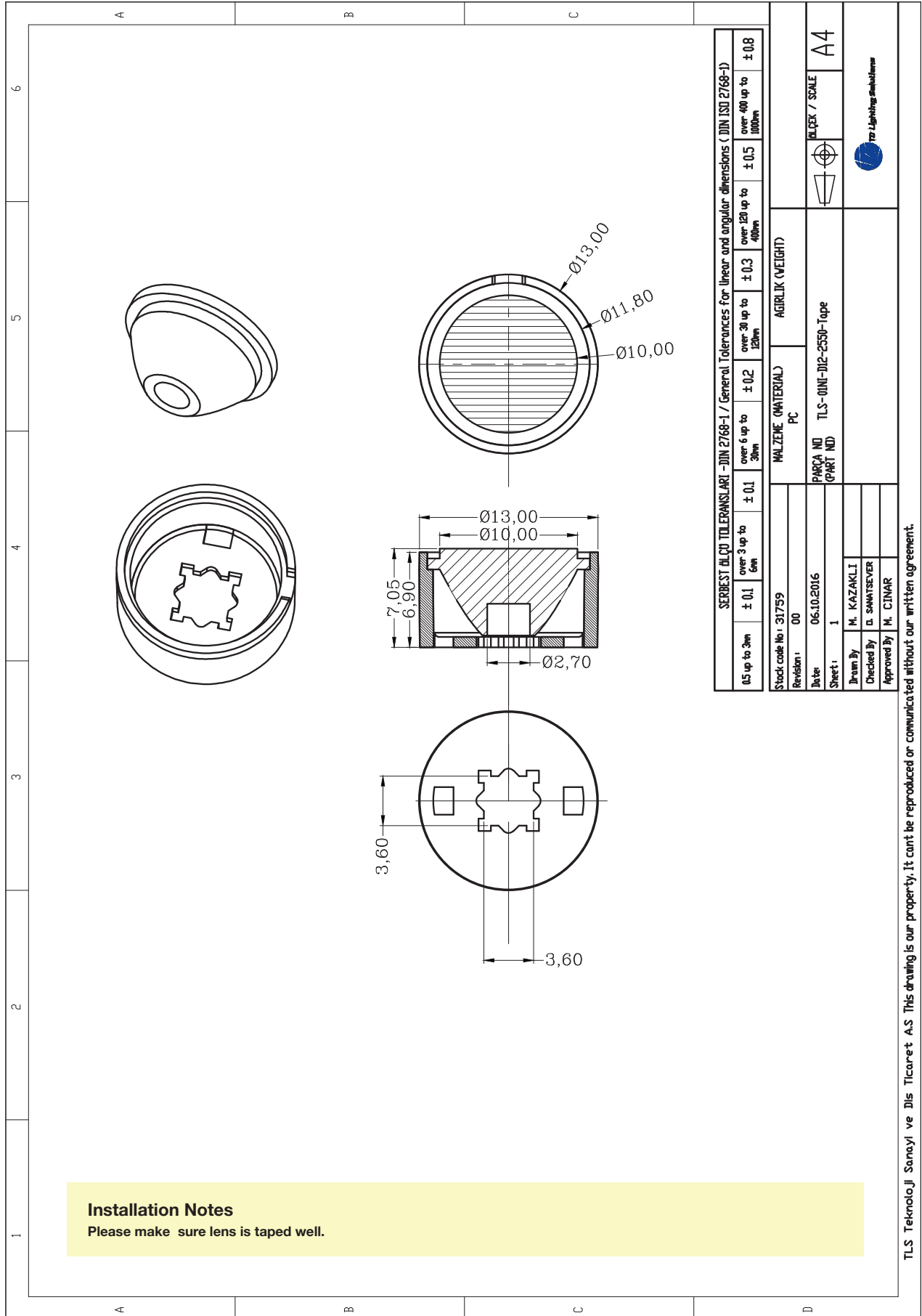
# TLS01NI-D12-2550-Tape

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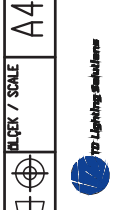
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MECHANICAL DRAWINGS



SERBEST BİLÇÜ TOLERANSLARI - DIN 2768-1 / General Tolerances for linear and angular dimensions (DIN ISO 2768-1)					
0,5 up to 3mm	± 0,1	over 3 up to 6mm	± 0,1	over 6 up to 30mm	± 0,2
				over 30 up to 120mm	± 0,3
				over 120 up to 400mm	± 0,5
				over 400 up to 1000mm	± 0,8

Stock code No : 31759	MALZEME (MATERIAL)	AGIRLIK (WEIGHT)
Revision : 00	PC	
Date : 06.10.2016	PARÇA NO (PART NO)	
Sheet : 1	TLS-01NI-D12-2550-Tape	
Drawn By : M. KAZAKLI		
Checked By : G. SAMATSEVER		
Approved By : M. CINAR		



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# TLS01NI-D15-15-Tape

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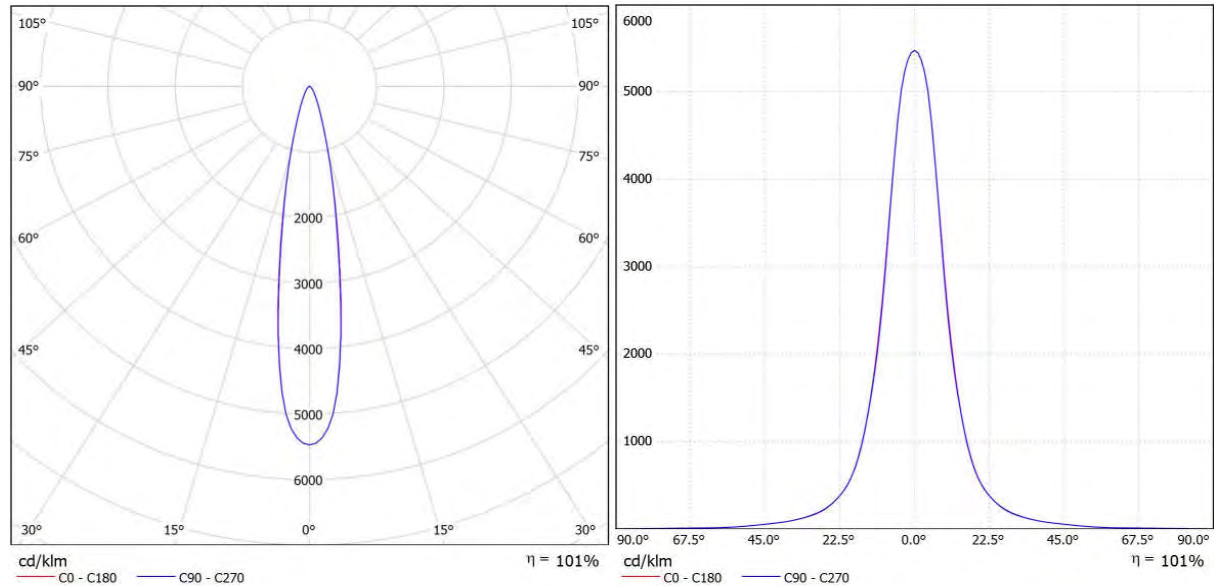
PRODUCT PICTURE



GENERAL SPECIFICATIONS

Product Code	TLS01NI-D15-15-TAPE
Description	High Bay Lighting
Degree (FWHM)	17,1
Efficiency	94%
Type	Single Lens
Size (mm) W x L x H	Ø 15,2 x H 9,06
Material	Lens: PMMA Holder: PC
Fastening	Tape
Box Size (mm) WxLxH	630x260x300
Box Quantity	17920 pcs
Box Weight (g)	18000
Rohs Complaint	Yes
Operating Temperature	-40 ° C ~ + 80 ° C max
Storage Temperature	0 ° C ~ 40 ° C max
Compatible LED MODULE	X-ML17300NC-x19x-12

PHOTOMETRIC SPECIFICATIONS



APPLICATION NOTES

- Please use a little water and soft fabric (air-laid paper) to clean the lens & reflector if necessary.
- Forbid to use industrial solvent to clean the lens, such as alcohol.
- Storage environment temperature is 0°C~40°C, humidity is 30%~95%.
- Optic Lens has the function to change the ray of light, it is made of optical material, the effect shall be influenced once pollute. Please do not open the packing before use it, to avoid the dust pollution.
- Protect the product from the sun and other ultraviolet ray, as these will lead to aging, change color, crack, etc.
- Please wear gloves once install the lens, avoid to abrasion the lens surface.
- Forbid to use acidic or alkaline solution touch the product, avoid to generate the chemical reactions.

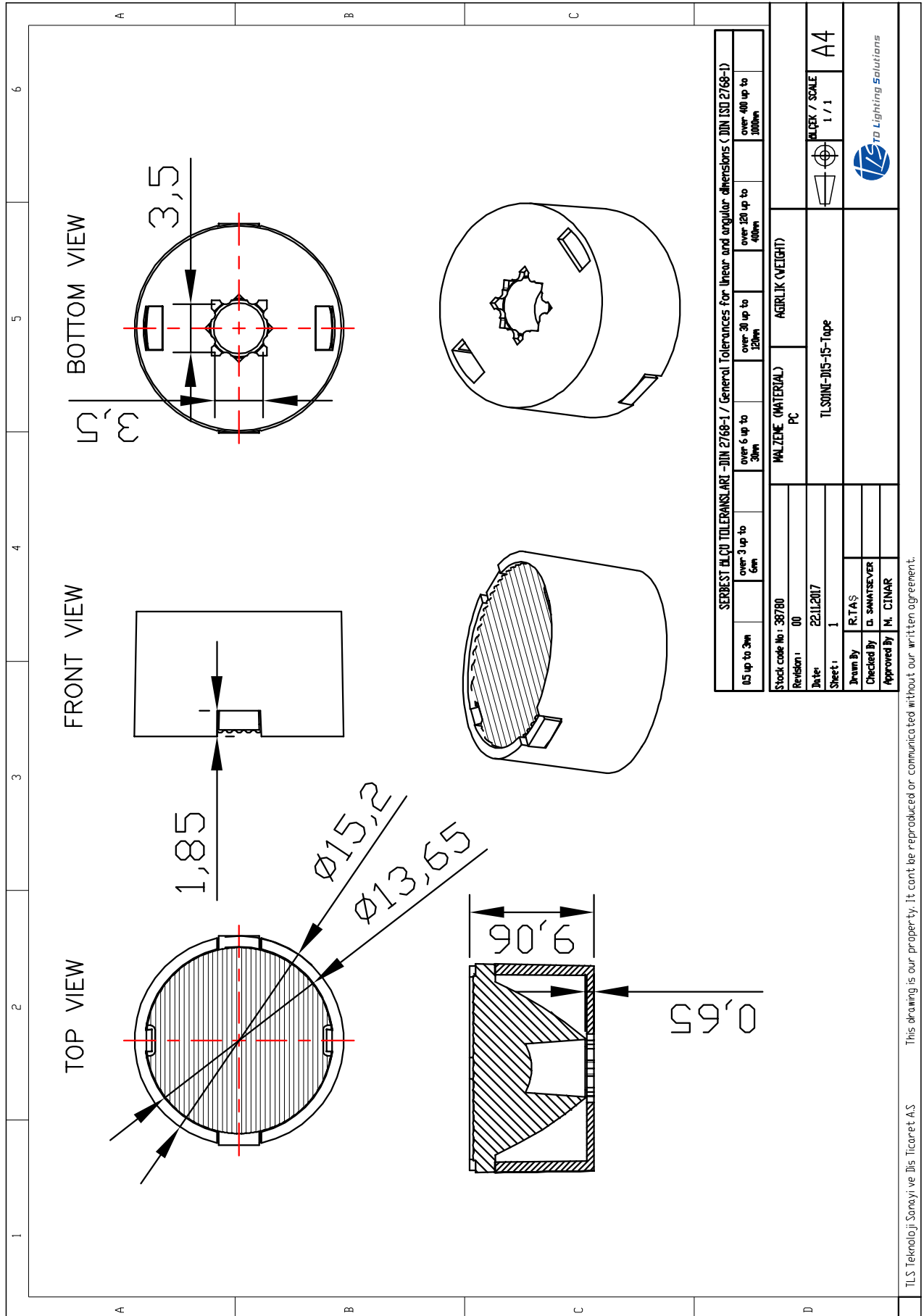
# TLS01NI-D15-15-Tape

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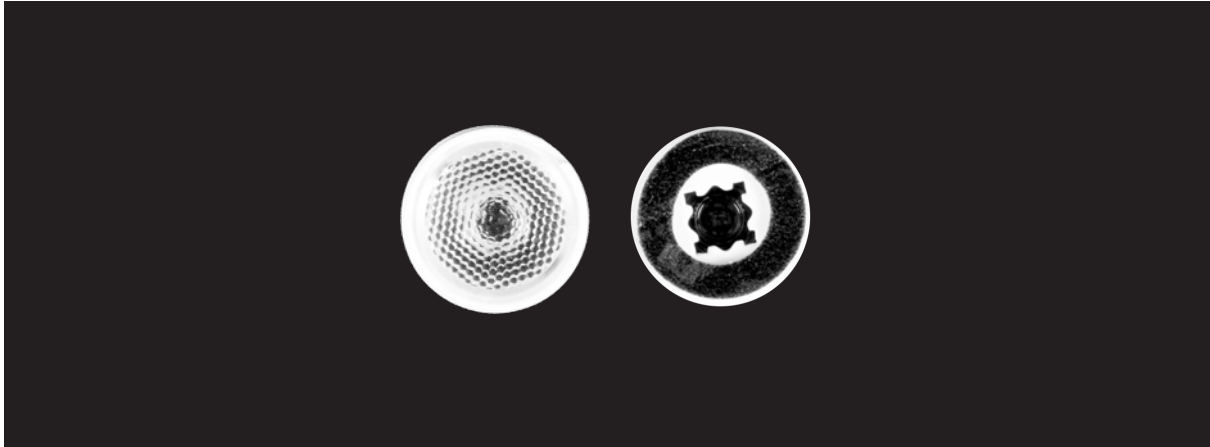
# TLS01NI-D15-40-Tape

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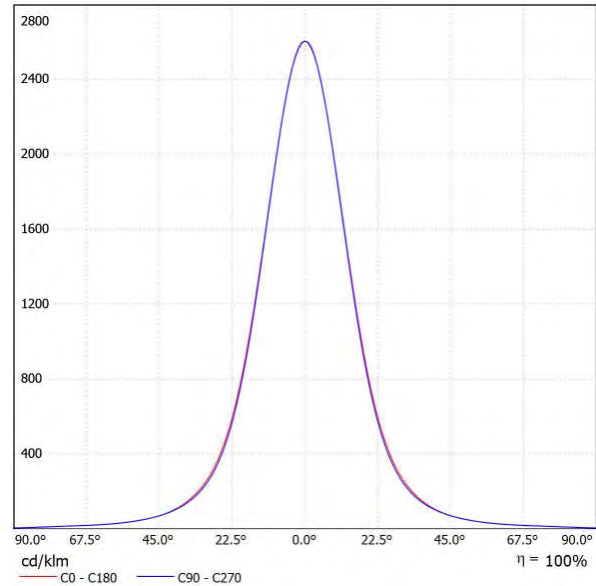
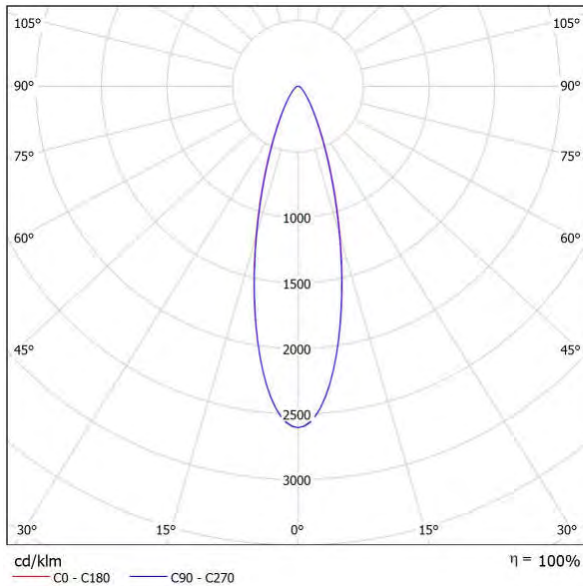
PRODUCT PICTURE



GENERAL SPECIFICATIONS

Product Code	TLS01NI-D15-40-TAPE
Description	High Bay Lighting
Degree (FWHM)	26,1
Efficiency	93%
Type	Single Lens
Size (mm) W x L x H	Ø 15,2 x H 9,06
Material	Lens: PMMA Holder: PC
Fastening	Tape
Box Size (mm) WxLxH	630x260x300
Box Quantity	17920 pcs
Box Weight (g)	18000
Rohs Complaint	Yes
Operating Temperature	-40 ° C ~ + 80 ° C max
Storage Temperature	0 ° C ~ 40 ° C max
Compatible LED MODULE	X-ML17300NC-x19x-12

PHOTOMETRIC SPECIFICATIONS



APPLICATION NOTES

- Please use a litter water and soft fabric (air-laid paper) to clean the lens & reflector if necessary.
- Forbid to use industrial solvent to clean the lens, such as alcohol.
- Storage environment temperature is 0°C~40°C, humidity is 30%~95%.
- Optic Lens has the function to change the ray of light, it is made of optical material, the effect shall be influenced once pollute. Please do not open the packing before use it, to avoid the dust pollution.
- Protect the product from the sun and other ultraviolet ray, as these will lead to aging, change color, crack, etc.
- Please ware gloves once install the lens, avoid to abrasion the lens surface.
- Forbid to use acidic or alkaline solution touch the product, avoid to generate the chemical reactions.



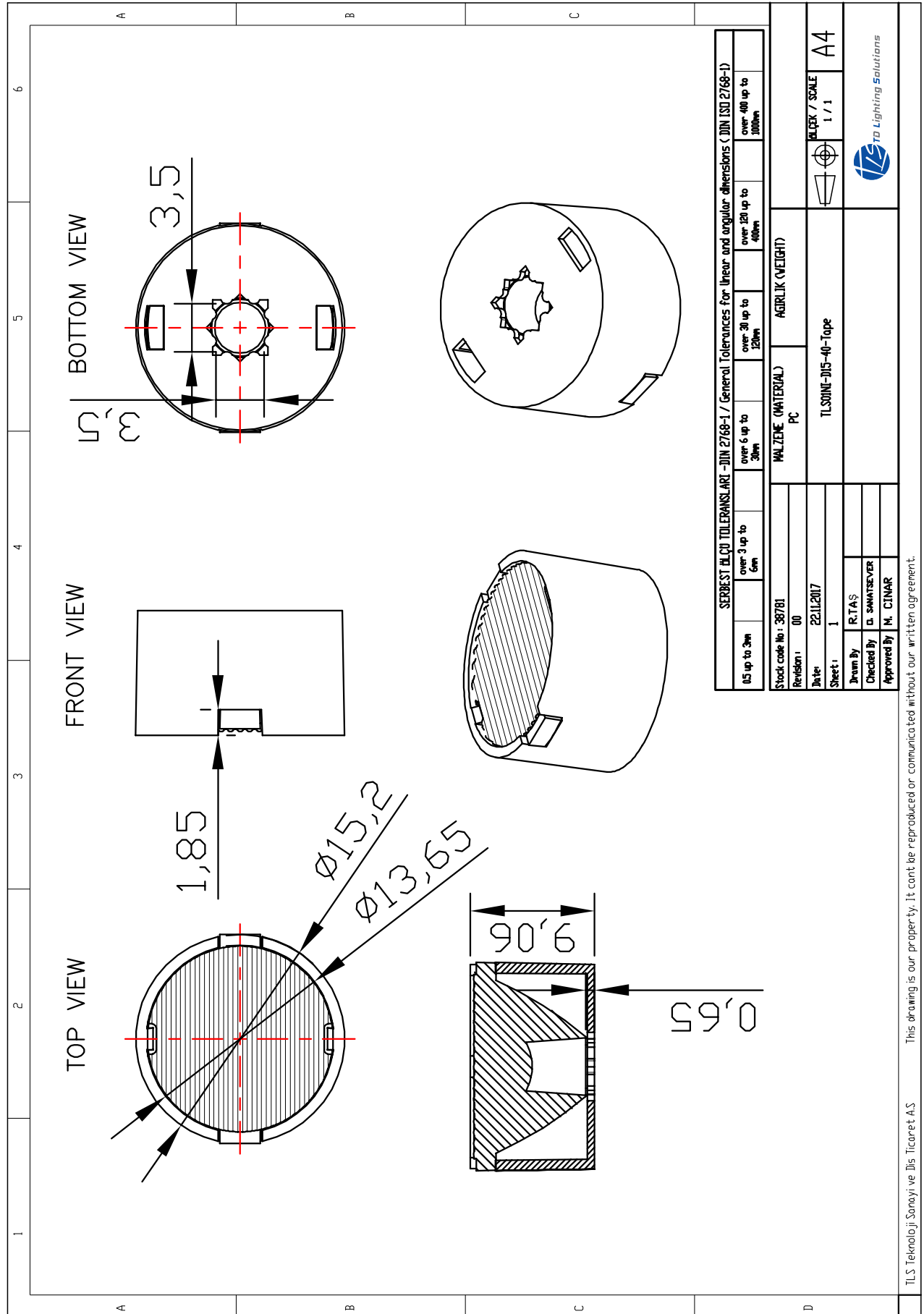
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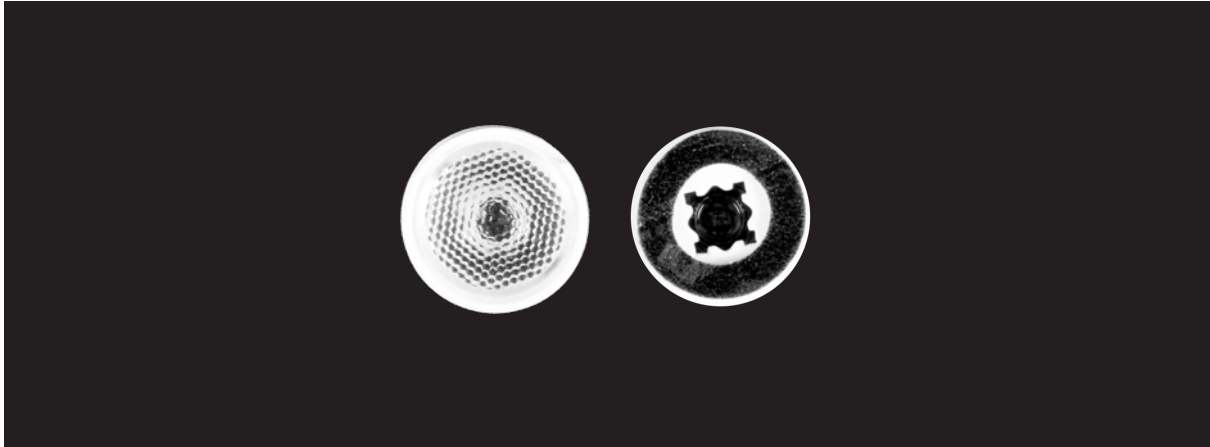
# TLS01NI-D15-60-Tape

LED OPTIC DATASHEET

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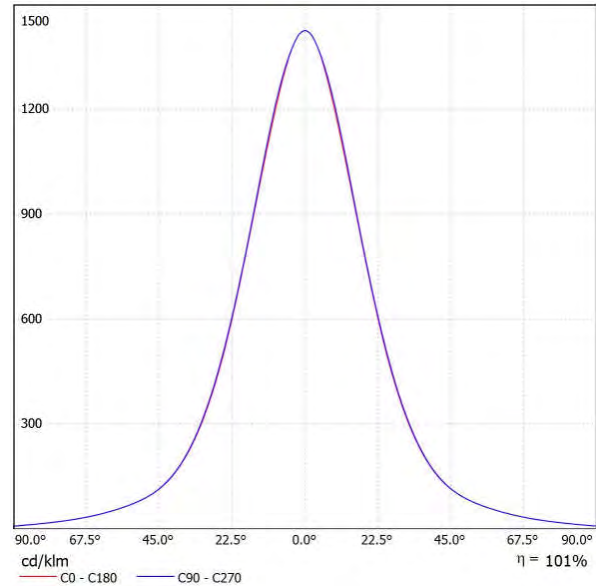
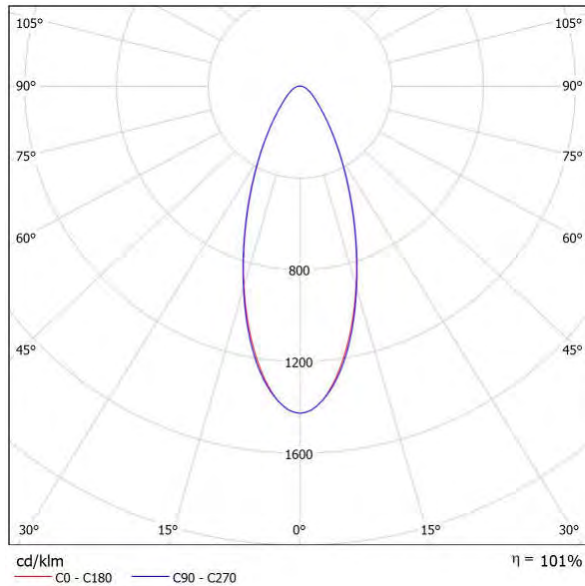
PRODUCT PICTURE



GENERAL SPECIFICATIONS

Product Code	TLS01NI-D15-60-TAPE
Description	High Bay Lighting
Degree (FWHM)	49
Efficiency	92%
Type	Single Lens
Size (mm) W x L x H	Ø 15,2 x H 9,06
Material	Lens: PMMA Holder: PC
Fastening	Tape
Box Size (mm) WxLxH	630x260x300
Box Quantity	17920 pcs
Box Weight (g)	18000
Rohs Complaint	Yes
Operating Temperature	-40 ° C ~ + 80 ° C max
Storage Temperature	0 ° C ~ 40 ° C max
Compatible LED MODULE	X-ML17300NC-x19x-12

PHOTOMETRIC SPECIFICATIONS



APPLICATION NOTES

- Please use a little water and soft fabric (air-laid paper) to clean the lens & reflector if necessary.
- Forbid to use industrial solvent to clean the lens, such as alcohol.
- Storage environment temperature is 0°C~40°C, humidity is 30%~95%.
- Optic Lens has the function to change the ray of light, it is made of optical material, the effect shall be influenced once pollute. Please do not open the packing before use it, to avoid the dust pollution.
- Protect the product from the sun and other ultraviolet ray, as these will lead to aging, change color, crack, etc.
- Please wear gloves once install the lens, avoid to abrasion the lens surface.
- Forbid to use acidic or alkaline solution touch the product, avoid to generate the chemical reactions.

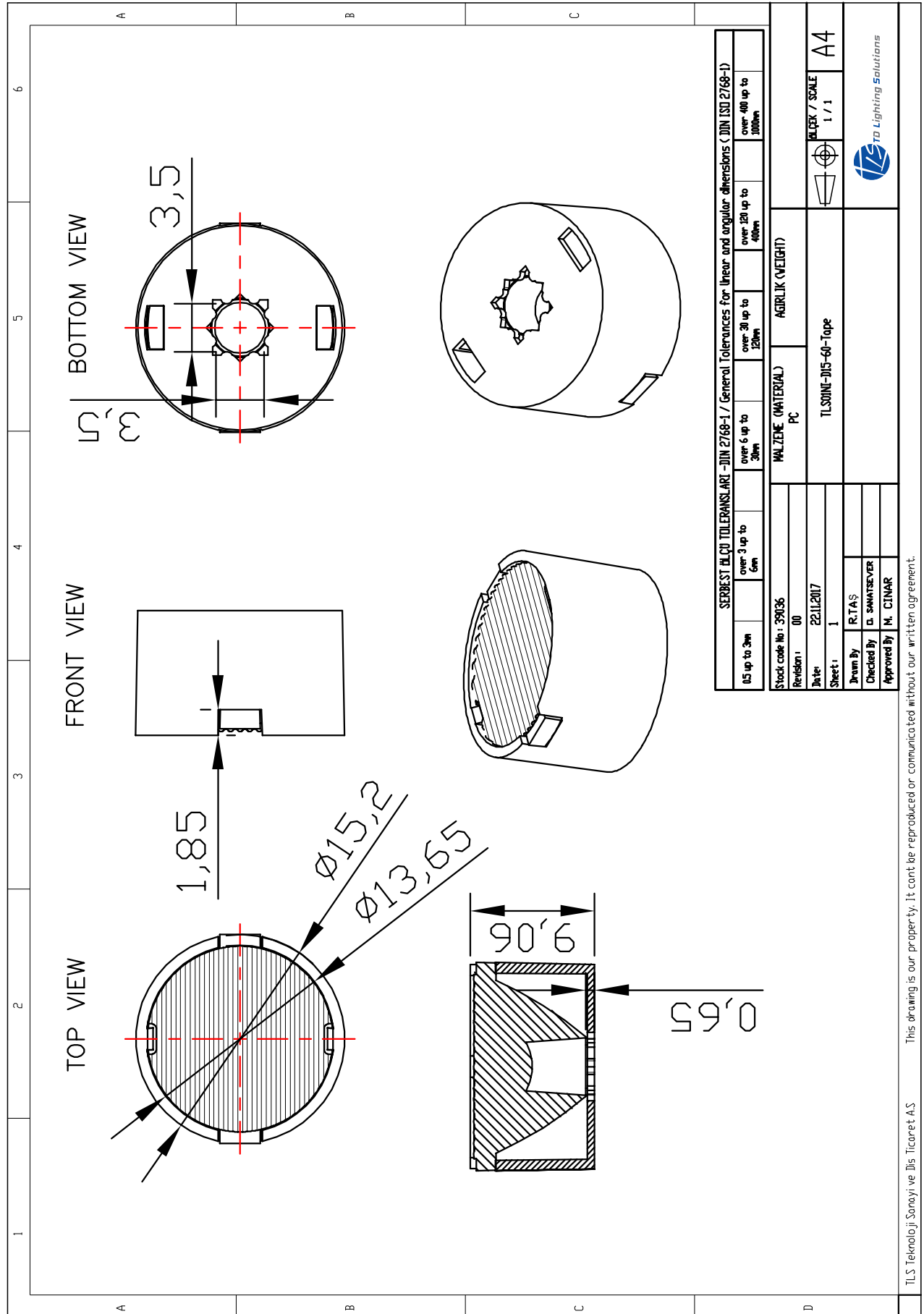
# TLS01NI-D15-60-Tape

LED OPTIC DATASHEET

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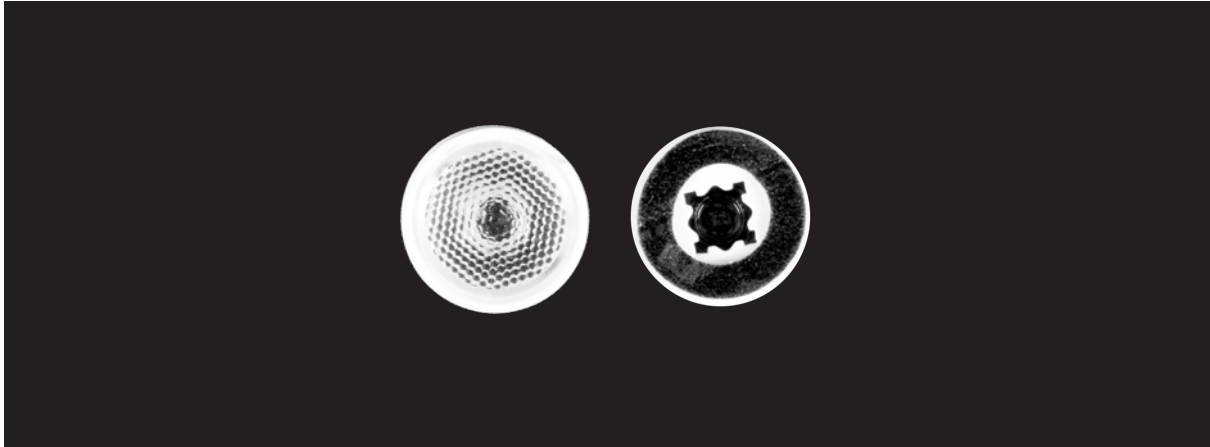
# TLS01NI-D15-90-Tape

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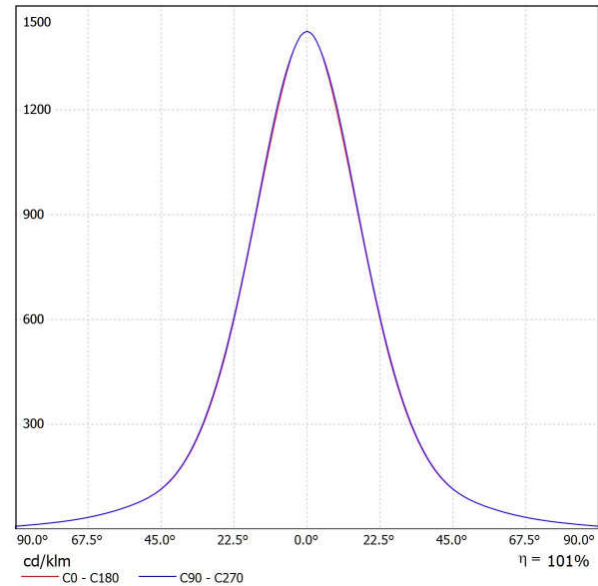
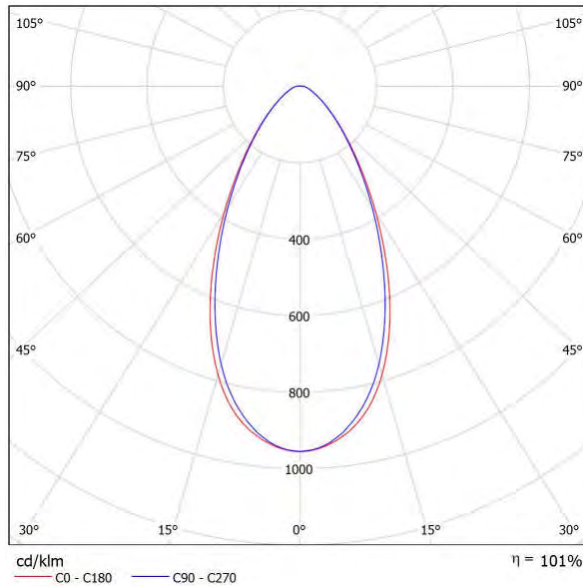
PRODUCT PICTURE



GENERAL SPECIFICATIONS

Product Code	TLS01NI-D15-90-TAPE
Description	High Bay Lighting
Degree (FWHM)	46,5
Efficiency	92%
Type	Single Lens
Size (mm) W x L x H	Ø 15,2 x H 9,06
Material	Lens: PMMA Holder: PC
Fastening	Tape
Box Size (mm) WxLxH	630x260x300
Box Quantity	17920 pcs
Box Weight (g)	18000
Rohs Complaint	Yes
Operating Temperature	-40 ° C ~ + 80 ° C max
Storage Temperature	0 ° C ~ 40 ° C max
Compatible LED MODULE	X-ML17300NC-x19x-12

PHOTOMETRIC SPECIFICATIONS



APPLICATION NOTES

- Please use a litter water and soft fabric (air-laid paper) to clean the lens & reflector if necessary.
- Forbid to use industrial solvent to clean the lens, such as alcohol.
- Storage environment temperature is 0°C~40°C, humidity is 30%~95%.
- Optic Lens has the function to change the ray of light, it is made of optical material, the effect shall be influenced once pollute. Please do not open the packing before use it, to avoid the dust pollution.
- Protect the product from the sun and other ultraviolet ray, as these will lead to aging, change color, crack, etc.
- Please ware gloves once install the lens, avoid to abrasion the lens surface.
- Forbid to use acidic or alkaline solution touch the product, avoid to generate the chemical reactions.

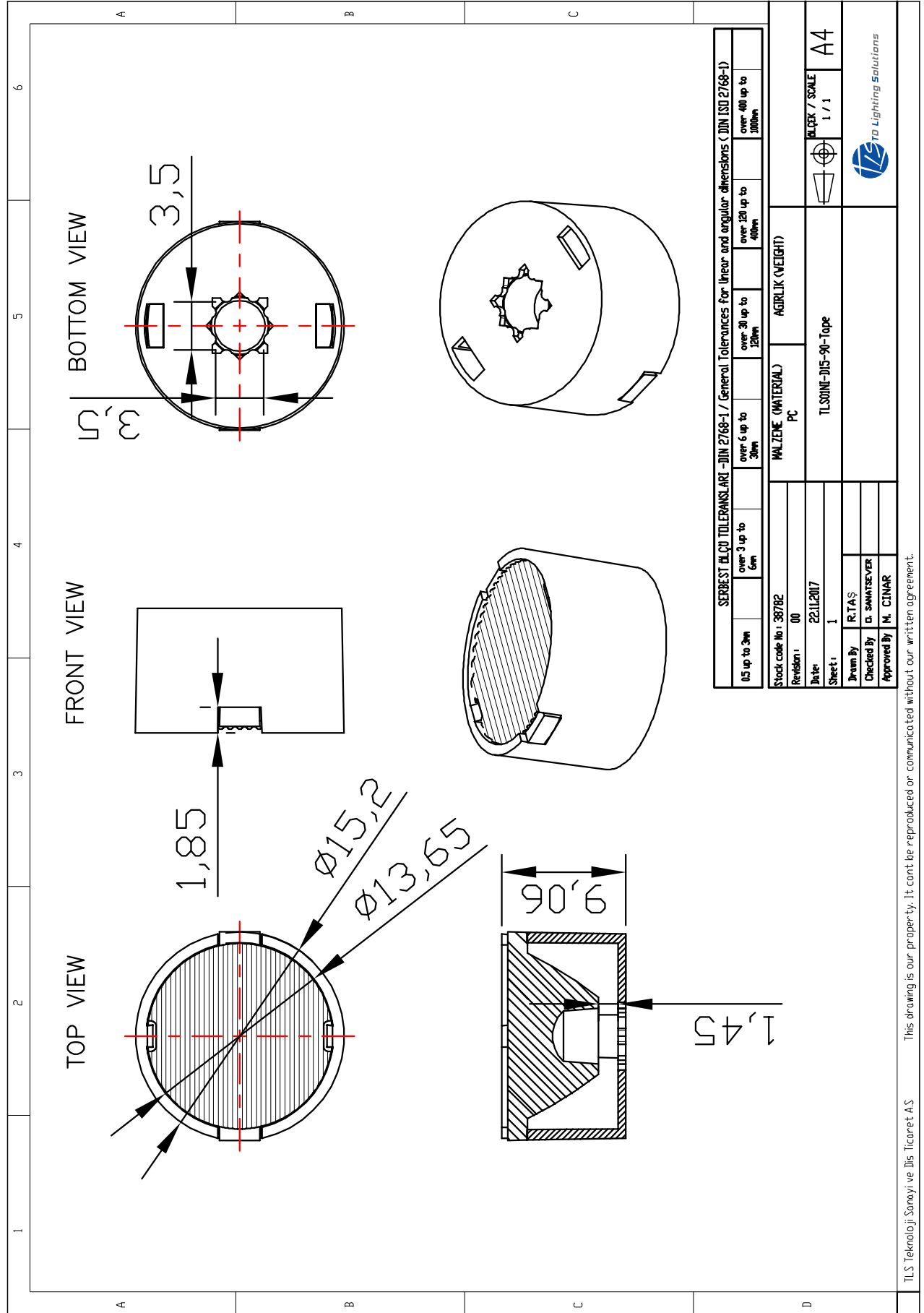
# TLS01NI-D15-90-Tape

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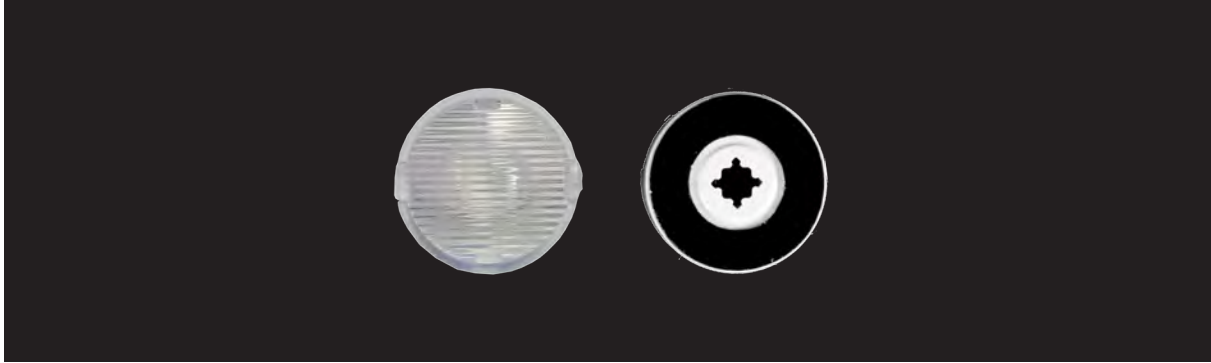
# TLS01NI-D15-1065-Tape

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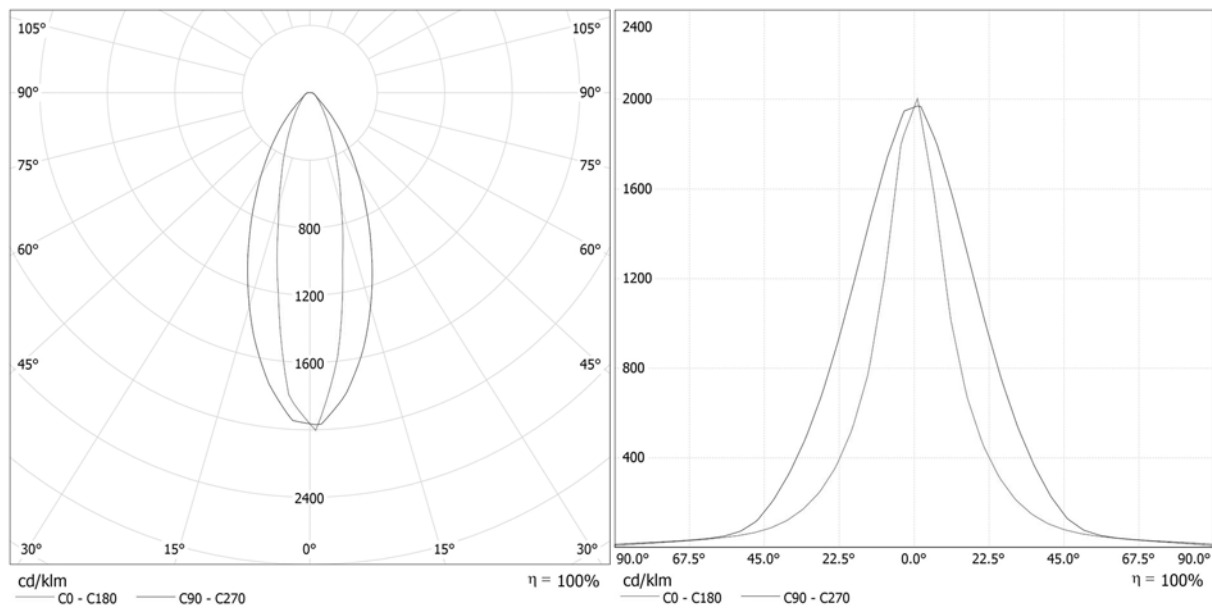
PRODUCT PICTURE



GENERAL SPECIFICATIONS

<b>Product Code</b>	TLS01NI-D15-1065-Tape
<b>Description</b>	Flood Lighting
<b>Degree (FWHM)</b>	Elliptical 22° - 43°
<b>Efficiency</b>	94%
<b>Size (mm) D x H</b>	Ø 15,2 x H 9,06
<b>Material</b>	Lens: PMMA Holder: PC
<b>Fastening</b>	Tape
<b>Box Size (mm) WxLxH</b>	630x260x300
<b>Box Quantity</b>	17920 pcs
<b>Box Weight (g)</b>	18000
<b>Rohs Complaint</b>	Yes
<b>Operating Temperature</b>	-40 °C ~ + 90 °C max
<b>Storage Temperature</b>	0 °C ~ 40 °C max

PHOTOMETRIC SPECIFICATIONS



APPLICATION NOTES

#### Direction for use

- Please use some soft paper or pure water to clean lens ( reflector)
- Don't use any industrial solvent to clean lens surface , such as alcohol
- Storage environment : Temperature 0°C ~ +40°C , Humidity 30% ~ 95%
- This kind of lens can make the lighting more concentrated, and it's made from transparent material, so please do not open the packages until you use them, in case of the dust and other pollutions.

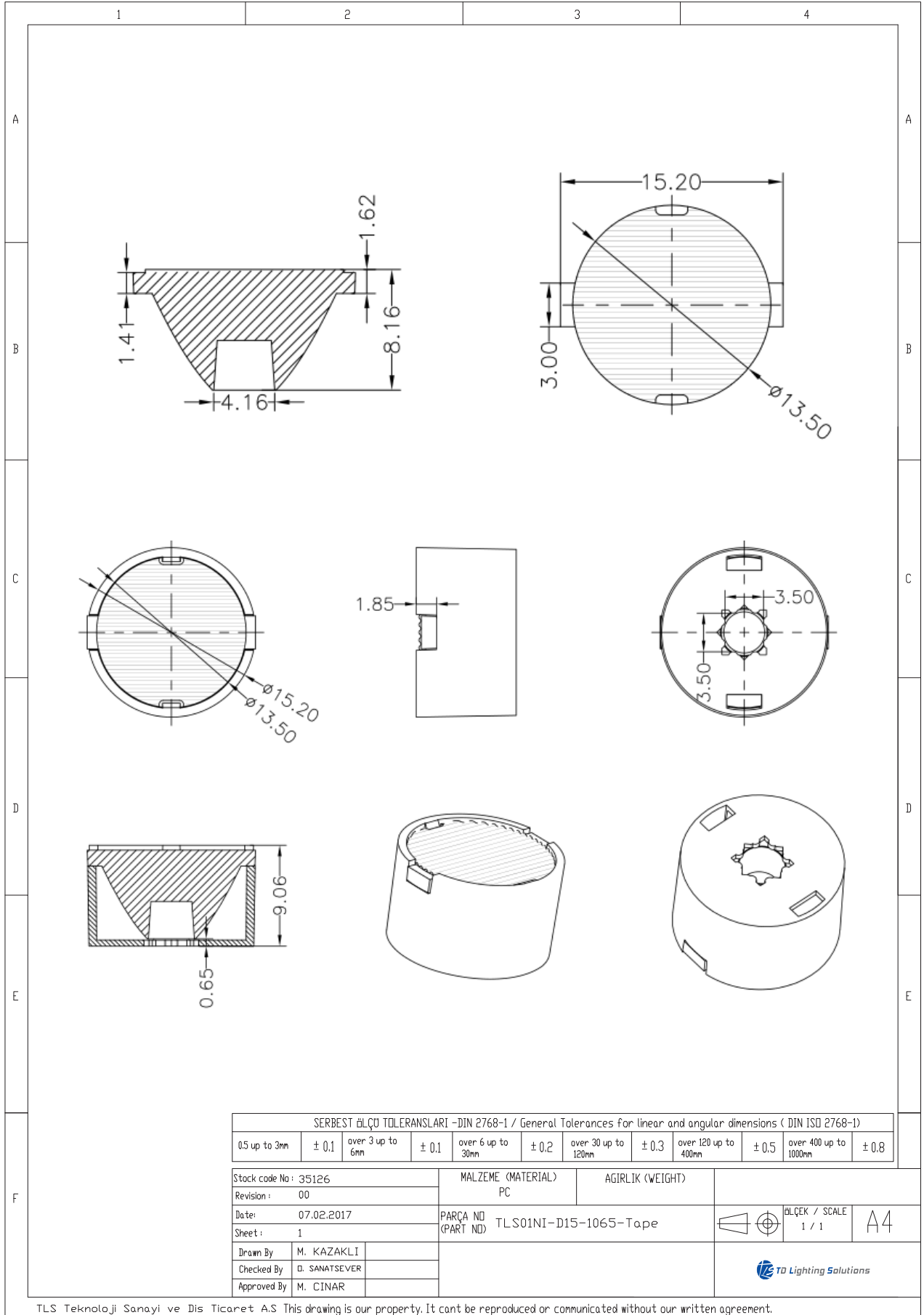
# TLS01NI-D15-1065-Tape

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MECHANICAL DRAWINGS



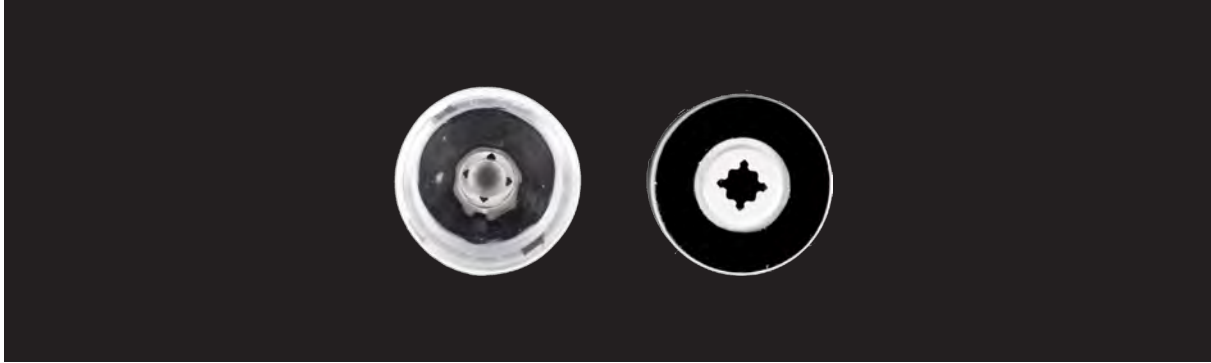
# TLS01NI-D20-8-Tape

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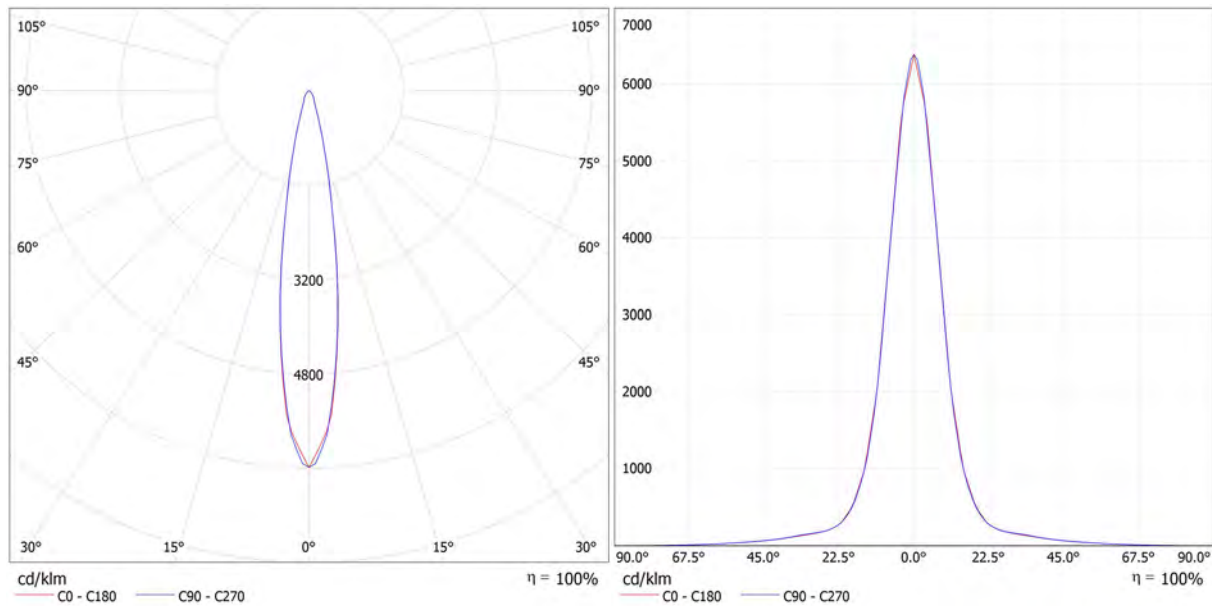
PRODUCT PICTURE



GENERAL SPECIFICATIONS

<b>Product Code</b>	TLS01NI-D20-8-Tape
<b>Description</b>	Flood Lighting
<b>Degree (FWHM)</b>	17°
<b>Efficiency</b>	92%
<b>Size (mm) D x H</b>	Ø 21.5 x H 11.5 mm
<b>Material</b>	Lens: PMMA Holder: PC
<b>Fastening</b>	Tape
<b>Box Size (mm) WxLxH</b>	630x260x300
<b>Box Quantity</b>	5000 pcs
<b>Box Weight (g)</b>	19000
<b>Rohs Compliant</b>	Yes
<b>Operating Temperature</b>	-40 °C ~ + 90 °C max
<b>Storage Temperature</b>	0 °C ~ 40 °C max

PHOTOMETRIC SPECIFICATIONS



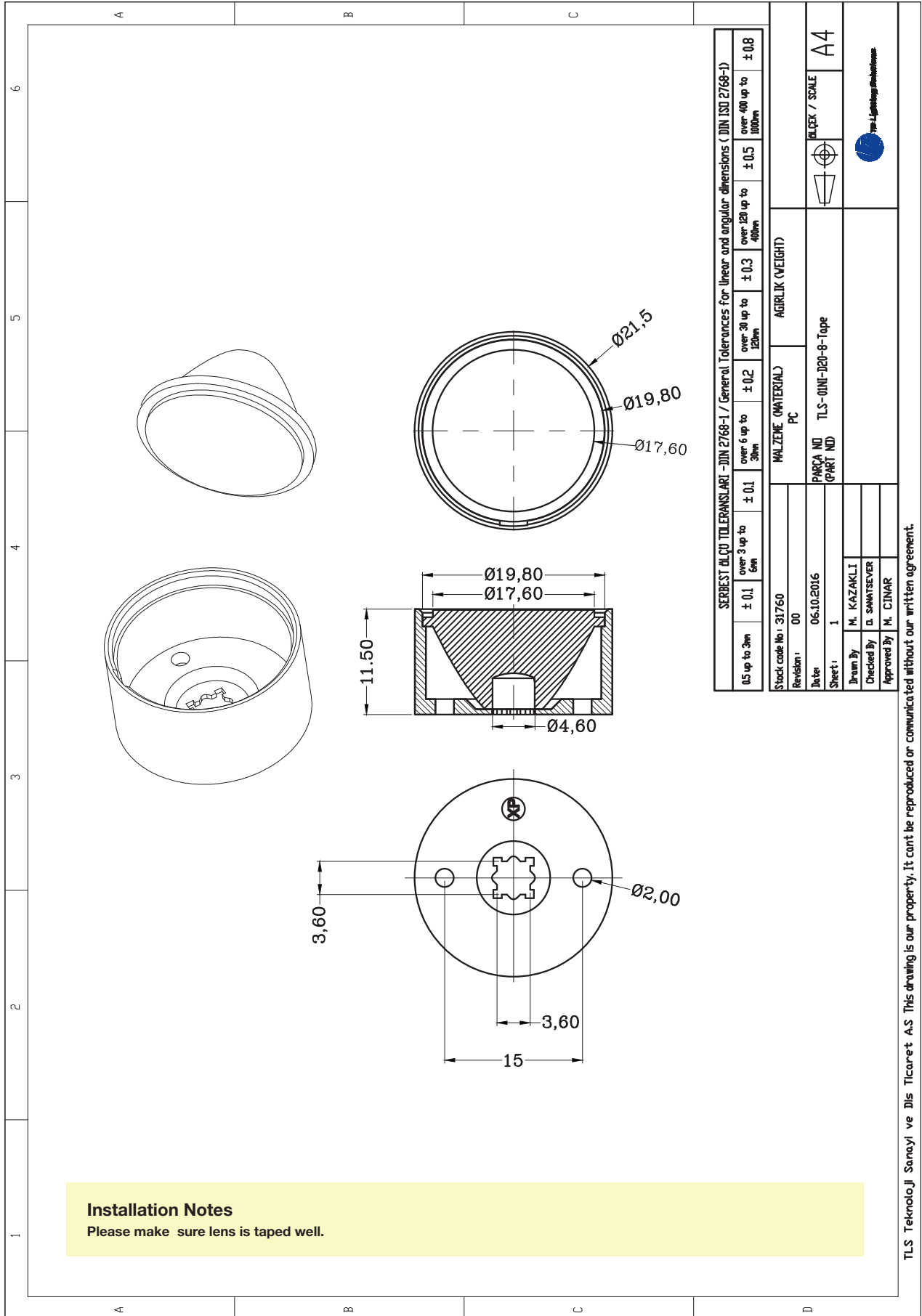
APPLICATION NOTES

#### Direction for use

- Please use some soft paper or pure water to clean lens ( reflector)
- Don't use any industrial solvent to clean lens surface , such as alcohol
- Storage environment : Temperature 0°C ~ +40°C , Humidity 30% ~ 95%
- This kind of lens can make the lighting more concentrated, and it's made from transparent material, so please do not open the packages until you use them, in case of the dust and other pollutions.



MECHANICAL DRAWINGS



**Installation Notes**  
Please make sure lens is taped well.

SERBEST BİLGİ TOLERANSLARI - DIN 2768-1 / General Tolerances for linear and angular dimensions (DIN ISO 2768-1)					
0.5 up to 3mm	± 0.1	over 3 up to 6mm	± 0.1	over 6 up to 30mm	± 0.2
				over 30 up to 120mm	± 0.3
				over 120 up to 400mm	± 0.5
				over 400 up to 1000mm	± 0.8
Stock code No.:	31760		MALZEME (MATERIAL)		
Revision:	00		PC		
Date:	06.10.2016		PARÇA NO (PART NO)		
Sheet:	1		TLS-01NI-D20-8-Tape		
Drawn By:	M. KAZAKLI		AGIRLIK (WEIGHT)		
Checked By:	G. SAMATSEVER				
Approved By:	M. CINAR				
			BELGE / SCALE		
			A4		

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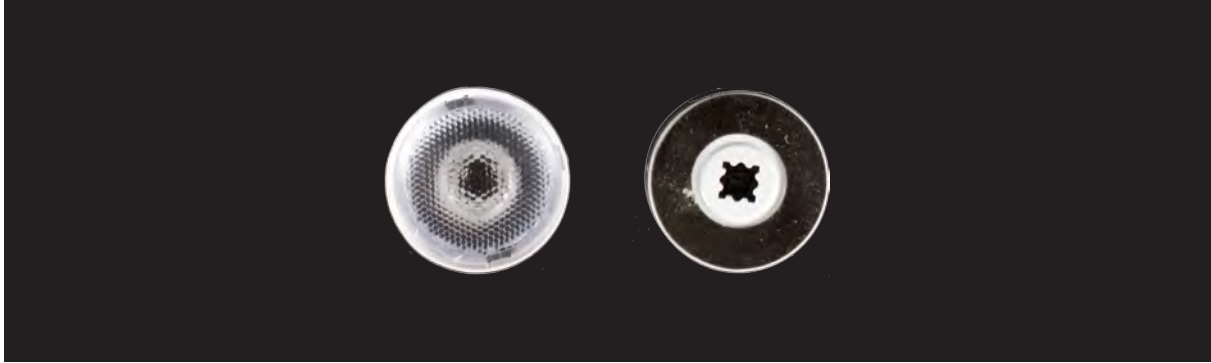
# TLS01NI-D20-25-Tape

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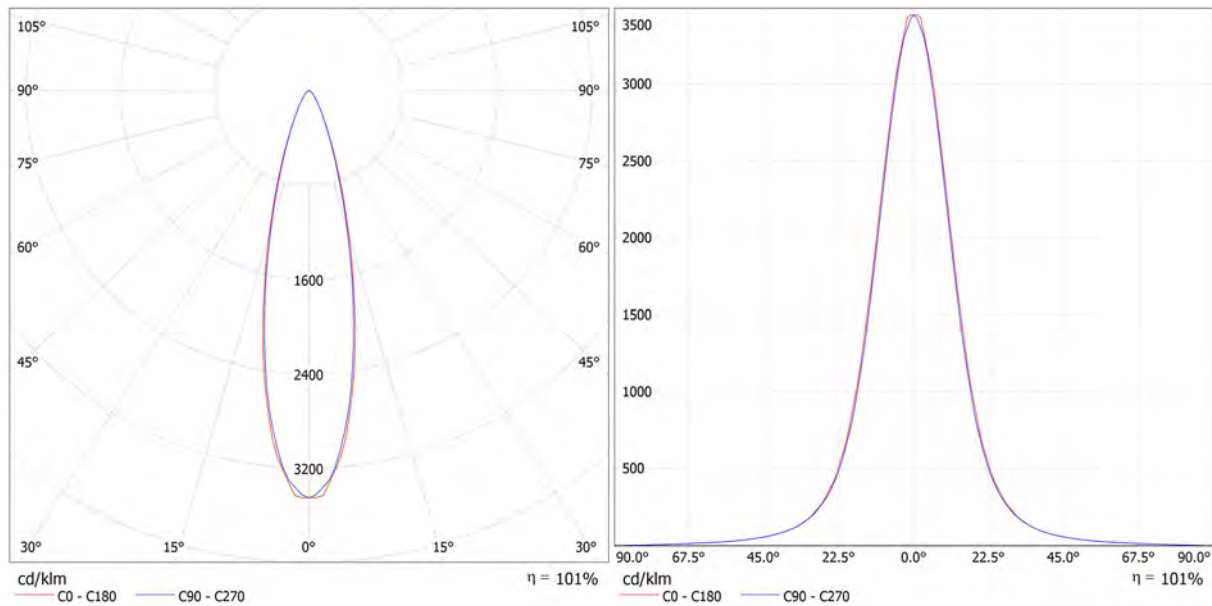
PRODUCT PICTURE



GENERAL SPECIFICATIONS

<b>Product Code</b>	TLS01NI-D20-25-Tape
<b>Description</b>	Flood Lighting
<b>Degree (FWHM)</b>	25°
<b>Efficiency</b>	90%
<b>Size (mm) D x H</b>	Ø 21.5 x H 11.5 mm
<b>Material</b>	Lens: PMMA Holder: PC
<b>Fastening</b>	Tape
<b>Box Size (mm) WxLxH</b>	630x260x300
<b>Box Quantity</b>	5000 pcs
<b>Box Weight (g)</b>	19000
<b>Rohs Compliant</b>	Yes
<b>Operating Temperature</b>	-40 ° C ~ + 90 ° C max
<b>Storage Temperature</b>	0 ° C ~ 40 ° C max

PHOTOMETRIC SPECIFICATIONS

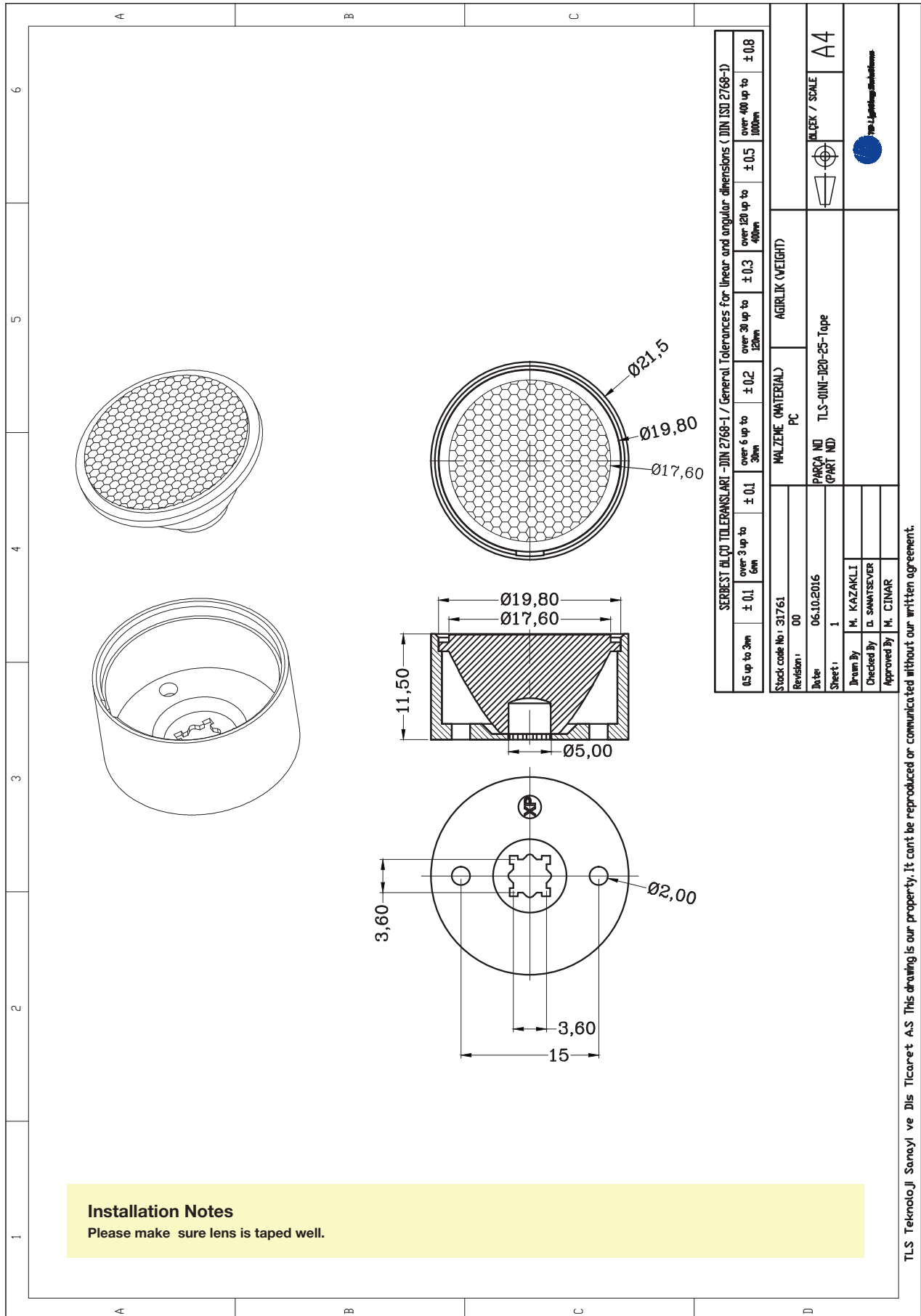


APPLICATION NOTES

#### Direction for use

- Please use some soft paper or pure water to clean lens ( reflector)
- Don't use any industrial solvent to clean lens surface , such as alcohol
- Storage environment : Temperature 0°C ~ +40°C , Humidity 30% ~ 95%
- This kind of lens can make the lighting more concentrated, and it's made from transparent material, so please do not open the packages until you use them, in case of the dust and other pollutions.

MECHANICAL DRAWINGS



**Installation Notes**

Please make sure lens is taped well.

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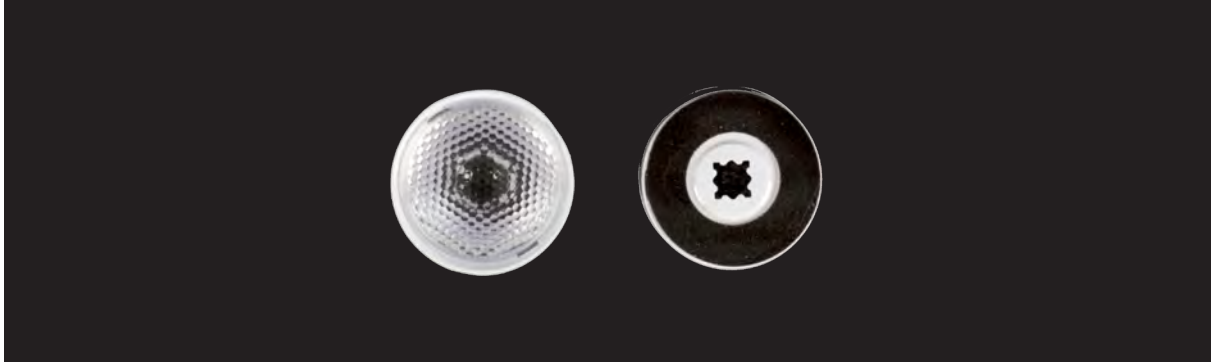
# TLS01NI-D20-40-Tape

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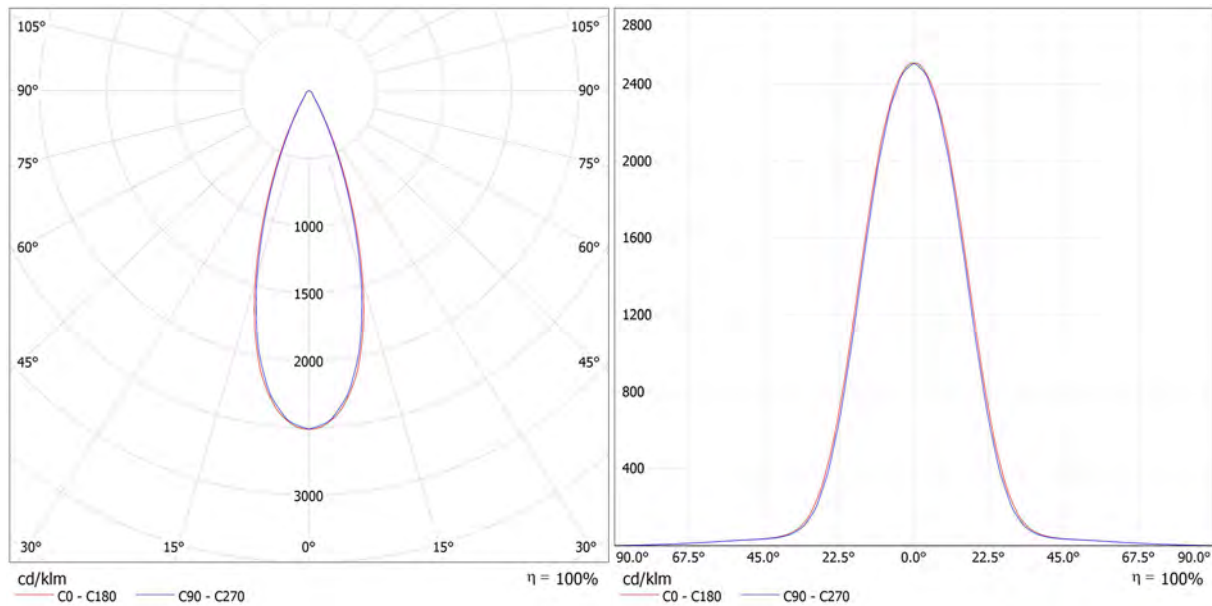
PRODUCT PICTURE



GENERAL SPECIFICATIONS

<b>Product Code</b>	TLS01NI-D20-40-Tape
<b>Description</b>	Flood Lighting
<b>Degree (FWHM)</b>	35°
<b>Efficiency</b>	90%
<b>Size (mm) D x H</b>	Ø 21.5 x H 11.5 mm
<b>Material</b>	Lens: PMMA Holder: PC
<b>Fastening</b>	Tape
<b>Box Size (mm) WxLxH</b>	630x260x300
<b>Box Quantity</b>	5000 pcs
<b>Box Weight (g)</b>	19000
<b>Rohs Compliant</b>	Yes
<b>Operating Temperature</b>	-40 ° C ~ + 90 ° C max
<b>Storage Temperature</b>	0 ° C ~ 40 ° C max

PHOTOMETRIC SPECIFICATIONS



APPLICATION NOTES

#### Direction for use

- Please use some soft paper or pure water to clean lens ( reflector)
- Don't use any industrial solvent to clean lens surface , such as alcohol
- Storage environment : Temperature 0°C ~ +40°C , Humidity 30% ~ 95%
- This kind of lens can make the lighting more concentrated, and it's made from transparent material, so please do not open the packages until you use them, in case of the dust and other pollutions.

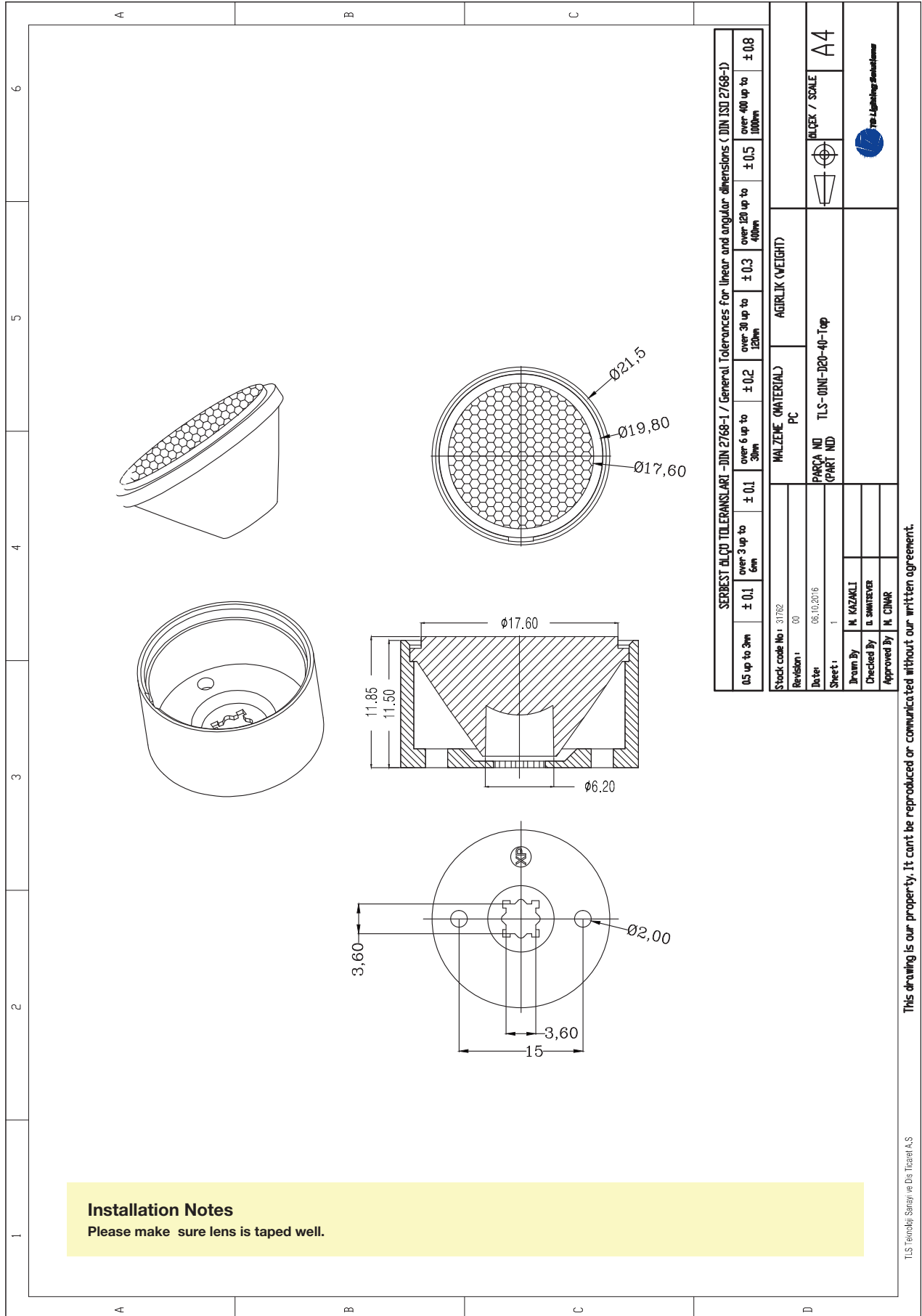
# TLS01NI-D20-40-Tape

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MECHANICAL DRAWINGS



**Installation Notes**  
Please make sure lens is taped well.

SERBEST ÖLÇÜ TOLERANSLARI -DIN 2768-1 / General Tolerances for linear and angular dimensions (DIN ISO 2768-1)					
0.5 up to 3mm	± 0.1	over 3 up to 6mm	± 0.1	over 6 up to 30mm	± 0.2
over 30 up to 120mm	± 0.3	over 120 up to 400mm	± 0.5	over 400 up to 1000mm	± 0.8
Stock code No.:	31702				
Revision:	00				
Date:	06.10.2016				
Sheet:	1				
Drawn By:	M. KAZAKLI				
Checked By:	a. samsurcu				
Approved By:	M. Cinar				
MALZEME (MATERIAL)	PC				
AGIRLIK (WEIGHT)					
PARÇA NO (PART NO)	TLS-01NI-D20-40-Top				
					A4

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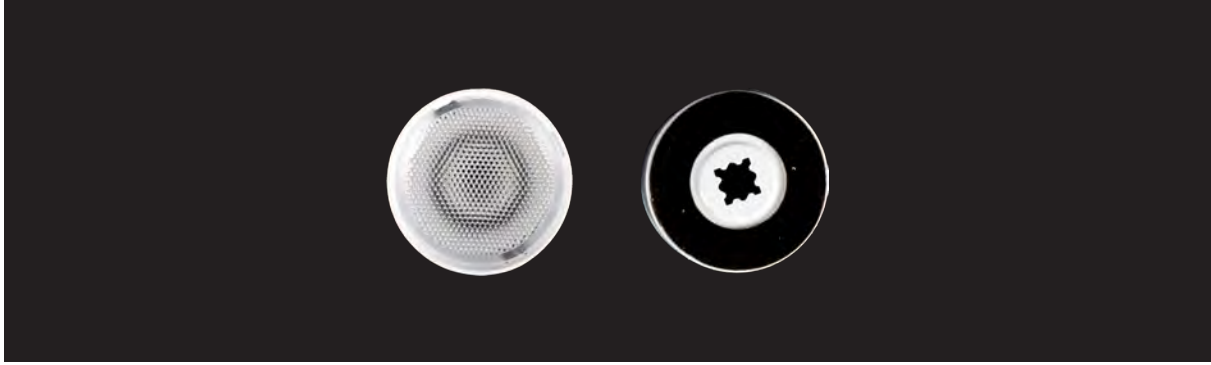
# TLS01NI-D20-60-Tape

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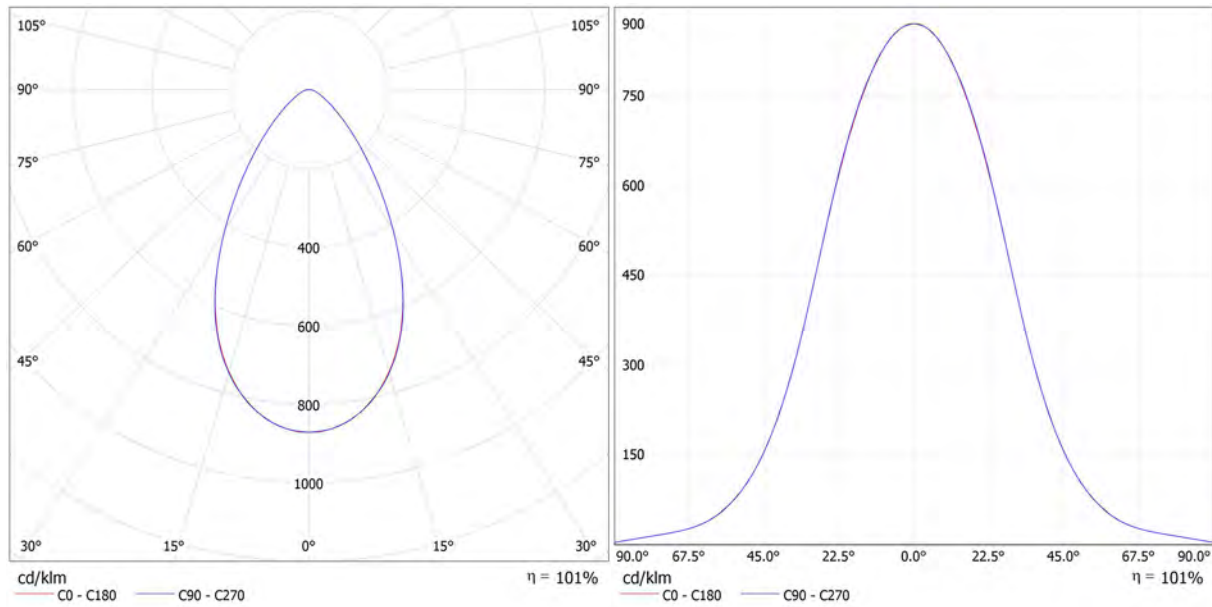
PRODUCT PICTURE



GENERAL SPECIFICATIONS

<b>Product Code</b>	TLS-01NI-D20-60-Tape
<b>Description</b>	Flood Lighting
<b>Degree (FWHM)</b>	60°
<b>Efficiency</b>	90%
<b>Size (mm) D x H</b>	Ø 21.5 x H 11.5 mm
<b>Material</b>	Lens: PMMA Holder: PC
<b>Fastening</b>	Tape
<b>Box Size (mm) WxLxH</b>	630x260x300
<b>Box Quantity</b>	5000 pcs
<b>Box Weight (g)</b>	19000
<b>Rohs Complaint</b>	Yes
<b>Operating Temperature</b>	-40 ° C ~ + 90 ° C max
<b>Storage Temperature</b>	0 ° C ~ 40 ° C max

PHOTOMETRIC SPECIFICATIONS



APPLICATION NOTES

#### Direction for use

- Please use some soft paper or pure water to clean lens ( reflector)
- Don't use any industrial solvent to clean lens surface , such as alcohol
- Storage environment : Temperature 0°C ~ +40°C , Humidity 30%~95%
- This kind of lens can make the lighting more concentrated, and it's made from transparent material, so please do not open the packages until you use them, in case of the dust and other pollutions.

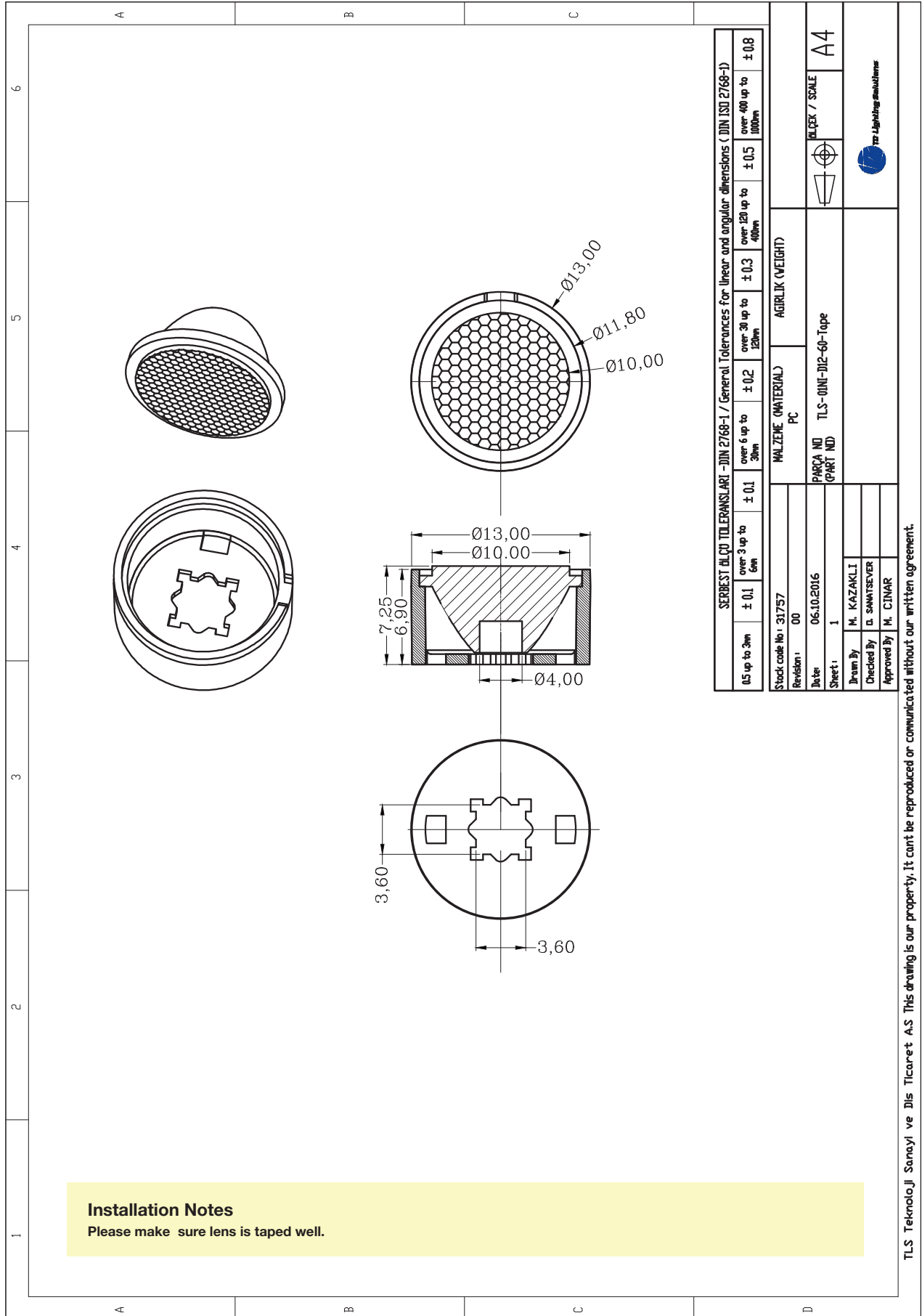
# TLS01NI-D20-60-Tape

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MECHANICAL DRAWINGS



**Installation Notes**  
Please make sure lens is taped well.

SERBEST BİLÇÜ TOLERANSLARI - DIN 2768-1 / General Tolerances for linear and angular dimensions (DIN ISO 2768-1)					
0,5 up to 3mm	± 0,1	over 3 up to 6mm	± 0,1	over 6 up to 30mm	± 0,2
				over 30 up to 120mm	± 0,3
				over 120 up to 400mm	± 0,5
				over 400 up to 1000mm	± 0,8

Stock code No : 31757	MALZEME (MATERIAL)	AGIRLIK (WEIGHT)
Revision : 00	PC	
Date : 06.10.2016	PARÇA NO (PART NO)	
Sheet : 1	TLS-01NI-DI2-60-Tape	
Drawn By : M. KAZAKLI		
Checked By : G. SAMATSEVER		
Approved By : M. CINAR		



BLÖK / SCALE  
A4



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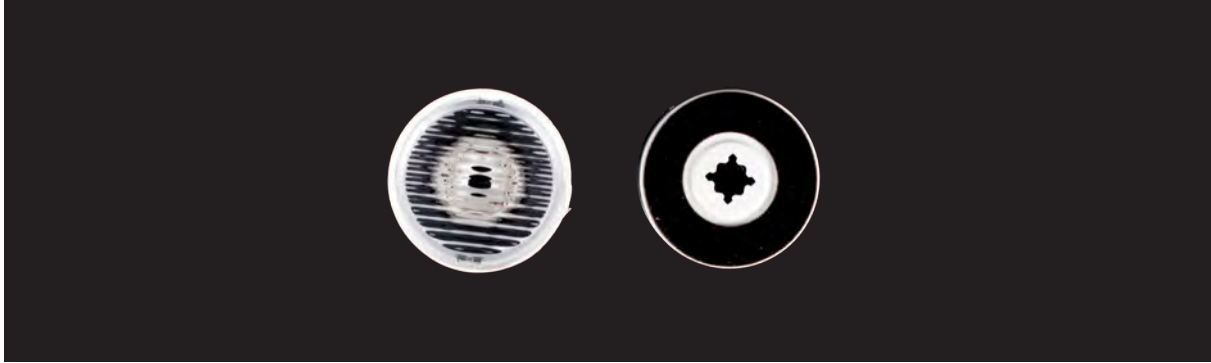
# TLS01NI-D20-1045-Tape

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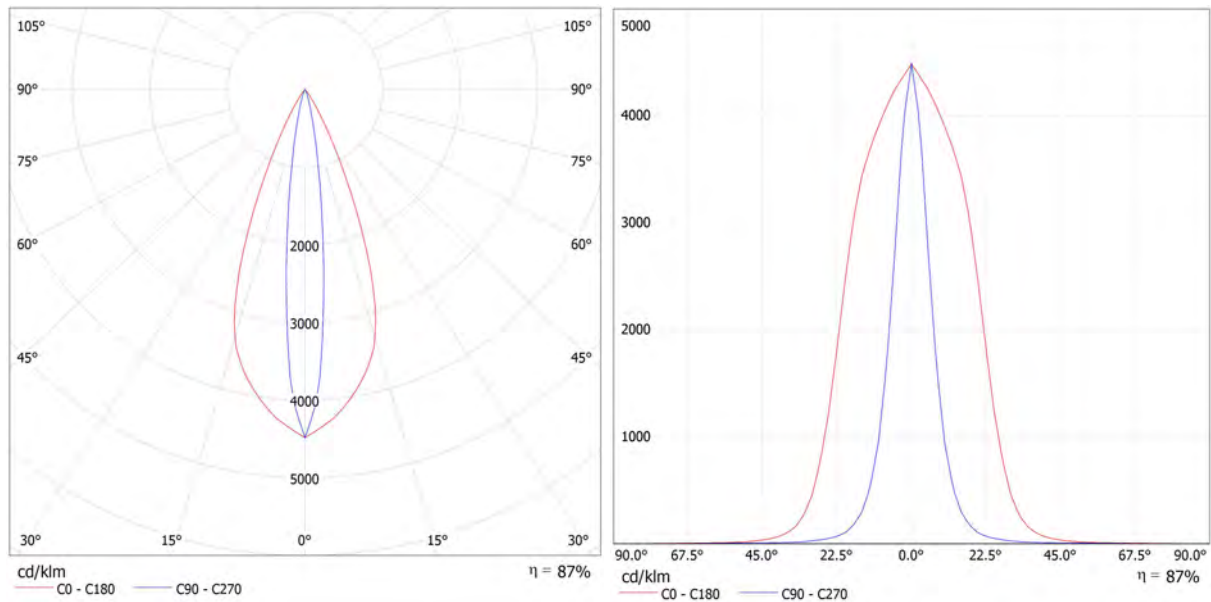
PRODUCT PICTURE



GENERAL SPECIFICATIONS

<b>Product Code</b>	TLS01NI-D20-1045-Tape
<b>Description</b>	Flood Lighting
<b>Degree (FWHM)</b>	Eliptical 10° - 25°
<b>Efficiency</b>	90%
<b>Size (mm) D x H</b>	Ø 21.5 x H 11.5 mm
<b>Material</b>	Lens: PMMA Holder: PC
<b>Fastening</b>	Tape
<b>Box Size (mm) WxLxH</b>	630x260x300
<b>Box Quantity</b>	5000 pcs
<b>Box Weight (g)</b>	19000
<b>Rohs Compliant</b>	Yes
<b>Operating Temperature</b>	-40 ° C ~ + 90 ° C max
<b>Storage Temperature</b>	0 ° C ~ 40 ° C max

PHOTOMETRIC SPECIFICATIONS



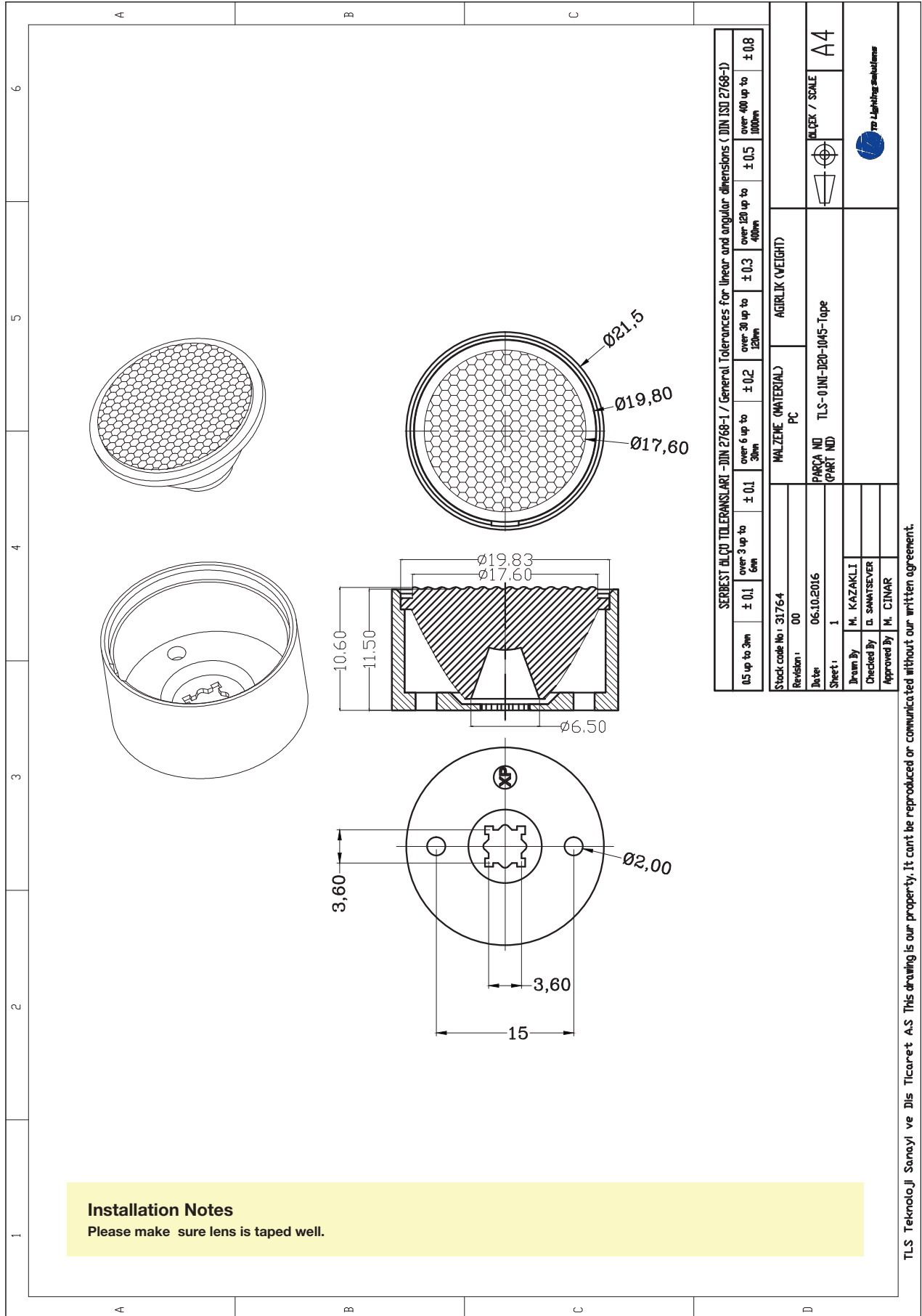
APPLICATION NOTES

### Direction for use

- Please use some soft paper or pure water to clean lens ( reflector)
- Don't use any industrial solvent to clean lens surface , such as alcohol
- Storage environment : Temperature 0°C ~ +40°C , Humidity 30% ~ 95%
- This kind of lens can make the lighting more concentrated, and it's made from transparent material, so please do not open the packages until you use them, in case of the dust and other pollutions.



MECHANICAL DRAWINGS



**Installation Notes**  
Please make sure lens is taped well.

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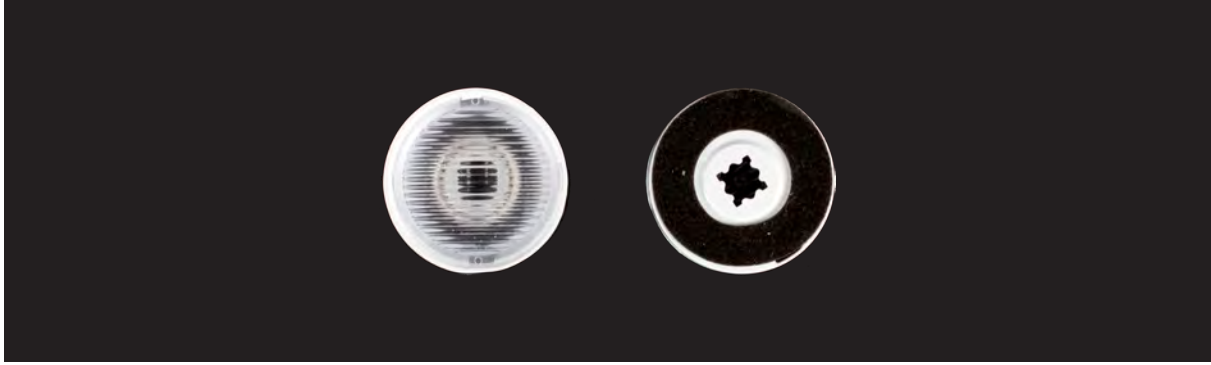
# TLS01NI-D20-3060-Tape

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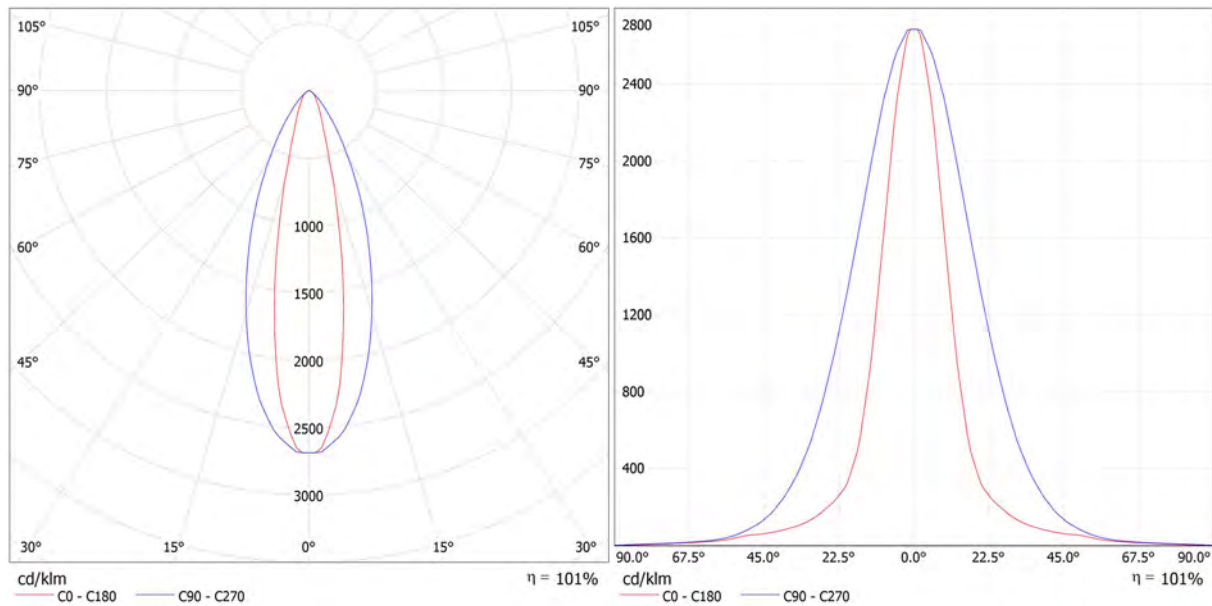
PRODUCT PICTURE



GENERAL SPECIFICATIONS

<b>Product Code</b>	TLS01NI-D20-3060-Tape
<b>Description</b>	Flood Lighting
<b>Degree (FWHM)</b>	Elliptical 15° - 32°
<b>Efficiency</b>	90%
<b>Size (mm) D x H</b>	Ø 21.5 x H 11.5 mm
<b>Material</b>	Lens: PMMA Holder: PC
<b>Fastening</b>	Tape
<b>Box Size (mm) WxLxH</b>	630x260x300
<b>Box Quantity</b>	5000 pcs
<b>Box Weight (g)</b>	19000
<b>Rohs Compliant</b>	Yes
<b>Operating Temperature</b>	-40 ° C ~ + 90 ° C max
<b>Storage Temperature</b>	0 ° C ~ 40 ° C max

PHOTOMETRIC SPECIFICATIONS



APPLICATION NOTES

## Direction for use

- Please use some soft paper or pure water to clean lens ( reflector)
- Don't use any industrial solvent to clean lens surface , such as alcohol
- Storage environment : Temperature 0°C ~ +40°C , Humidity 30% ~ 95%
- This kind of lens can make the lighting more concentrated, and it's made from transparent material, so please do not open the packages until you use them, in case of the dust and other pollutions.

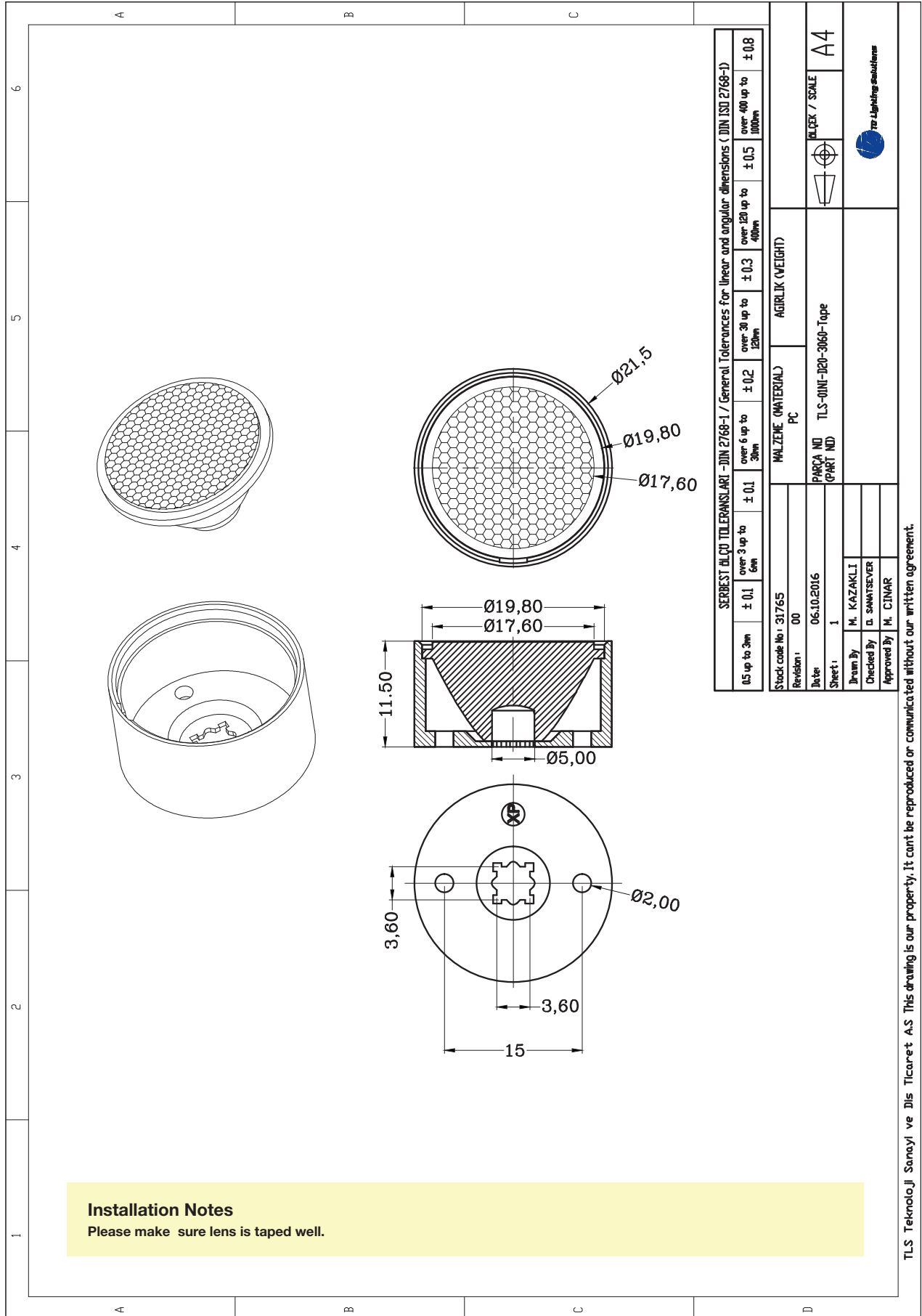
# TLS01NI-D20-3060-Tape

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MECHANICAL DRAWINGS



**Installation Notes**  
Please make sure lens is taped well.

SERBEST BİLGİ TOLERANSLARI - DIN 2768-1 / General Tolerances for linear and angular dimensions ( DIN ISO 2768-1)			
0.5 up to 3mm	± 0.1	over 3 up to 6mm	± 0.1
		over 6 up to 30mm	± 0.2
		over 30 up to 120mm	± 0.3
		over 120 up to 400mm	± 0.5
		over 400 up to 1000mm	± 0.8

MALZEME (MATERIAL)		AGIRLIK (WEIGHT)	
Stock code No :	31765		
Revision :	00		
Date :	06.10.2016		
Sheet :	1		
Drawn By :	M. KAZAKLI		
Checked By :	G. SAMATSEVER		
Approved By :	M. CINAR		

PARÇA NO (PART NO)		AGIRLIK / SCALE	
	TLS-01NI-D20-3060-Tape		A4

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