imall

Chipsmall Limited consists of a professional team with an average of over 10 year of expertise in the distribution of electronic components. Based in Hongkong, we have already established firm and mutual-benefit business relationships with customers from, Europe, America and south Asia, supplying obsolete and hard-to-find components to meet their specific needs.

With the principle of "Quality Parts, Customers Priority, Honest Operation, and Considerate Service", our business mainly focus on the distribution of electronic components. Line cards we deal with include Microchip, ALPS, ROHM, Xilinx, Pulse, ON, Everlight and Freescale. Main products comprise IC, Modules, Potentiometer, IC Socket, Relay, Connector. Our parts cover such applications as commercial, industrial, and automotives areas.

We are looking forward to setting up business relationship with you and hope to provide you with the best service and solution. Let us make a better world for our industry!



Contact us

Tel: +86-755-8981 8866 Fax: +86-755-8427 6832 Email & Skype: info@chipsmall.com Web: www.chipsmall.com Address: A1208, Overseas Decoration Building, #122 Zhenhua RD., Futian, Shenzhen, China





BARBARA-WW-PF

 ${\sim}60^\circ$ wide beam

TECHNICAL SPECIFICATIONS:

Dimensions	Ø 70 mm
Height	41.7 mm
Fastening	socket
Colour	metal
Box size	480 x 280 x 300 mm
Box weight	6.3 kg
Quantity in Box	288 pcs
ROHS compliant	yes 🛈

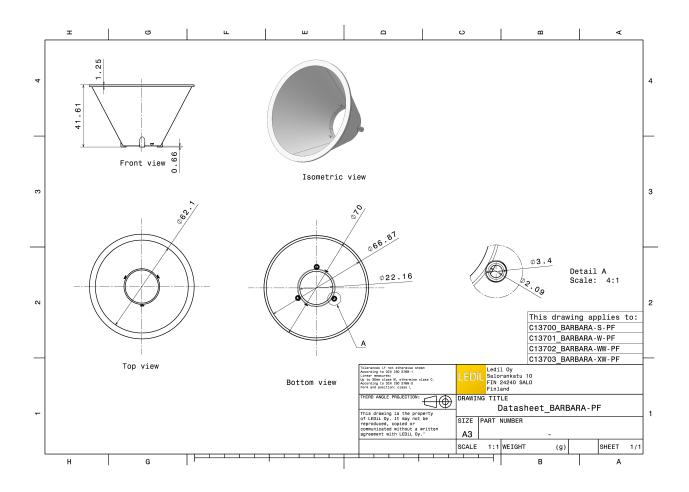


PRODUCT DATASHEET F13702_BARBARA-WW-PF

MATERIAL SPECIFICATIONS:

Component
BARBARA-WW-PF

Type Reflector Material PC **Colour** metal Coating HMDS PRODUCT DATASHEET F13702_BARBARA-WW-PF





PHOTOMETRIC DATA (MEASURED):

bridgelux.		
LED	V15 Gen6	
FWHM	51.0°	
Efficiency	86 %	
Peak intensity	1.390 cd/lm	
Required comp		
C13709_PF-	SOCKET-VERO13-18	
Bender Wirth	: 456 Typ L2	
bridgelux.		50°
LED	VERO10	75
FWHM	49.0°	400
Efficiency	89 %	50°
Peak intensity	1.500 cd/lm	
Required comp		
C13708_PF-	SOCKET-VERO10	
		36° 35° 35° 35°
bridgelux.		90 ⁴ 90 ⁶
LED	VERO13	75
FWHM	51.0°	
Efficiency	90 %	601 60.
Peak intensity	1.400 cd/lm	
Required comp	onents:	g* œ
C13709_PF-	SOCKET-VERO13-18	
		1230
		30° 0° 30°
bridgelux.		90 ⁴
LED	VERO18	75'
FWHM	58.0°	
Efficiency	91 %	60° - 400
Peak intensity	1.170 cd/lm	
Required comp		5°
C13709_PF-	SOCKET-VERO13-18	
		30 ⁶ 1220
1		

PRODUCT DATASHEET



PHOTOMETRIC DATA (MEASURED):

bridgelux. LED FWHM Efficiency Peak intensity Required comp C13709_PF		27
bridgelux.		90* 90*
LED FWHM Efficiency Peak intensity Required comp		21- 21- 21- 21- 21- 21- 21- 21-
CITIZE	N	90° 90°
LED FWHM Efficiency Peak intensity Required comp C13709_PF Bender Wirth	CLL02x/CLU02x (LES10) 43.0° 88 % 1.600 cd/lm ponents: SOCKET-VERO13-18 h: 434 Typ L1	27 00 29 00 20 00 20 00 00 00 00 00 00 00 00 00
CITIZE	Ν	90° 90°
		30°

PRODUCT DATASHEET



CITIZE	E N	90 ⁴ 92 ⁴
LED FWHM Efficiency Peak intensity Required com C13709_PF	CLU700/701 28.0° 88 % 2.100 cd/lm	
CITIZE		90 ⁴ 90 ⁴
	ponents: -SOCKET-VERO13-18 h: 433 Typ L1	
FWHM Efficiency Peak intensity Required com	40.0° 89 % 1.800 cd/lm	
Required com C13709_PF	CXA/B 15xx 41.0° 87 % 1.700 cd/lm	



CREE ÷		80° 80'
LED	CXA/B 15xx	75
FWHM	51.0°	
Efficiency	85 %	99 ⁴ / / ***
Peak intensity	1.200 cd/lm	
Required com	ponents:	e2+ e2
C13083_PF	SOCKET	
C14658_BA	RBARA-RZ-LENS	
		30° 120 30
CREE -	v n	90*90
LED	CXA/B 1816 & CXA/B 1820 & CXA 1850	75
FWHM	46.0°	400
Efficiency	90 %	69°
Peak intensity	1.600 cd/lm	
Required com	ponents:	or o
C14115_PF	-SOCKET-CXA15-18	1230
		30° 1000 0° 100 36
CREE -		90* 90
LED	CXA/B 1816 & CXA/B 1820 & CXA 1850	
FWHM	46.0°	
Efficiency	86 %	eos es
Peak intensity		
Required com		
-	- SOCKET-VERO13-18	
Bender Wirt	h: 437 Typ L1	
		30-
	EDS	33 ⁵ <u>3⁶0</u> 15 ⁵
LED	LUXEON CoB 1202/1203	
FWHM	39.0°	737
Efficiency	88 %	601 601
Peak intensity		
Required com		5°
	-SOCKET-VERO13-18	
	h: 438 Typ L1	
		15° 0° 15° 30



		90* 90*
LED FWHM	COB J-Type 51.0°	64 400 80°
Efficiency	86 %	
Peak intensity		g
Required comp	SOCKET-VERO13-18	
Bender Wirth		
Dender With	+00 Typ L2	200 20 ⁴ 15 ⁵ 0 ⁴ 15 ⁴
		90 ⁴
LED	COB J-Type	75
FWHM	55.0°	
Efficiency	90 %	
Peak intensity		
Required comp		a
C14037_PF-	NSX-SOCKET	
		30 ⁴ 12 ³ 0 ⁴ 15 ³
Ø NICHI∧		50° 50°
LED	COB L-Type (LES 11)	77
FWHM	51.0°	
Efficiency	90 %	60 ¹
Peak intensity	1.330 cd/lm	
Required comp	oonents:	9 ⁴ 800 57
C14037_PF-	NSX-SOCKET	
		1230
		30 ⁴ 30 ⁵ 0 ⁴ 15 ⁵
		50* 50*
LED	COB L-Type (LES 11)	75
FWHM	46.0°	
Efficiency	87 %	
Peak intensity		
Required comp		
	SOCKET-VERO13-18	
Bender Wirth	i: 438 Typ L1	
		36° 35° 36°



WICHIA ** LED COB L-Type (LES 9) FWHM 41.0°	
	90*
	7
	400
Efficiency 89 %	
Peak intensity 1.700 cd/lm	
Required components:	
C13709_PF-SOCKET-VERO13-18	
Bender Wirth: 438 Typ L1	1630
36	15° 0° 35° 30°
₩ NICHIA	50*
LED COB L-Type (LES 9)	
FWHM 47.0°	400-00
Efficiency 91 %	
Peak intensity 1.500 cd/lm	
Required components:	
C14037_PF-NSX-SOCKET	1230
yé.	150 30° 15° 0° 15°
OSRAM Opto Semiconductors	39*
Opto Semiconductors	
LED Soleriq P13	600
LED Soleriq P13 FWHM 48.0°	- 60 - 62
LEDSoleriq P13FWHM48.0°Efficiency88 %	400
LEDSoleriq P13FWHM48.0°Efficiency88 %Peak intensity1.370 cd/lm	60 62
LEDSoleriq P13FWHM48.0°Efficiency88 %Peak intensity1.370 cd/lmRequired components:***	60
LEDSoleriq P13FWHM48.0°Efficiency88 %Peak intensity1.370 cd/lmRequired components:***	220 220 220 220 220 220 220 220
LEDSoleriq P13FWHM48.0°Efficiency88 %Peak intensity1.370 cd/lmRequired components:***	120 120 100 100 100 100 100 100
LED Soleriq P13 FWHM 48.0° Efficiency 88 % Peak intensity 1.370 cd/lm Required components: C14115_PF-SOCKET-CXA15-18	
LED Soleriq P13 FWHM 48.0° Efficiency 88 % Peak intensity 1.370 cd/lm Required components: C14115_PF-SOCKET-CXA15-18	
LED Soleriq P13 FWHM 48.0° Efficiency 88 % Peak intensity 1.370 cd/lm Required components: C14115_PF-SOCKET-CXA15-18 CI4115_PF-SOCKET-CXA15-18 CSRAM LED Soleriq P13 FWHM 48.0° Efficiency 88 %	
LED Soleriq P13 FWHM 48.0° Efficiency 88 % Peak intensity 1.370 cd/lm Required components: C14115_PF-SOCKET-CXA15-18 COSRAM Cyto Semiconductors LED Soleriq P13 FWHM 48.0° Efficiency 88 % Peak intensity 1.400 cd/lm	
LED Soleriq P13 FWHM 48.0° Efficiency 88 % Peak intensity 1.370 cd/lm Required components: C14115_PF-SOCKET-CXA15-18 CSRAM Cyto Semiconductors LED Soleriq P13 FWHM 48.0° Efficiency 88 % Peak intensity 1.400 cd/lm Required components:	
LED Soleriq P13 FWHM 48.0° Efficiency 88 % Peak intensity 1.370 cd/lm Required components: C14115_PF-SOCKET-CXA15-18 COSRAM Vere Semiconductors LED Soleriq P13 FWHM 48.0° Efficiency 88 % Peak intensity 1.400 cd/lm Required components: C13709_PF-SOCKET-VERO13-18	
LED Soleriq P13 FWHM 48.0° Efficiency 88 % Peak intensity 1.370 cd/lm Required components: C14115_PF-SOCKET-CXA15-18 CSRAM Cyto Semiconductors LED Soleriq P13 FWHM 48.0° Efficiency 88 % Peak intensity 1.400 cd/lm Required components:	



PHOTOMETRIC DATA (MEASURED):

OSRAM Opto Semiconductors		90 ⁴ 90 ⁴
LED	Soleriq P9	75.
FWHM	43.0°	40
Efficiency	90 %	69 ⁴ 00 ⁴
Peak intensity	1.700 cd/lm	
Required com		45°
C13709_PF	-SOCKET-VERO13-18	
Bender Wirth	h: 461 Typ L1	
		30° 35° 0° 35°
OSRAM Opto Semiconductors		50* 50*
LED	Soleriq P9	75
FWHM	50.0°	
Efficiency	90 %	60°
Peak intensity	1.400 cd/lm	
Required com	ponents:	
C13761_PF	-SOCKET-CXA15	
		1220
		30* 0* 35* 36*
OSRAM Opto Semiconductors		90°
LED	Soleriq S13	75
FWHM	47.0°	400
Efficiency	87 %	60 ¹ 60 ¹
Peak intensity	1.400 cd/lm	
Required comp	ponents:	
C13709_PF	-SOCKET-VERO13-18	
Bender Wirth	h: 437 Typ L1	
		3)* 35° 0 ⁺ 35°
SAMSI	UNG	90 ³ 90 ⁴
LED	LC026B / 033B / 040B	75. 75'
FWHM	55.0°	
Efficiency	86 %	60* 60*
Peak intensity	1.100 cd/lm	
Required comp	ponents:	á. (2.
C13709_PF	-SOCKET-VERO13-18	
Bender Wirtl	h: 450 Typ L2	
		304
		15° 0° 15°

PRODUCT DATASHEET



TRIDON		
LED FWHM Efficiency Peak intensity Required comp	SLE G5 LES11 43.0° 89 % 1.600 cd/lm ponents: SOCKET-VERO13-18	
XICATC LED FWHM Efficiency Peak intensity Required comp C14636_XTM	XTM - 19mm LES 55.0° 84 % 1.100 cd/lm	
XICATC LED FWHM Efficiency Peak intensity Required comp C14636_XTM	XTM - 9mm LES 42.0° 87 % 1.700 cd/lm	



PHOTOMETRIC DATA (SIMULATED):

LED VER010 FWHM 66.0° Efficiency % Peak intensity cd/m Required components:		
FWHM 66.0° Efficiency % Peak intensity od/m Required components: Projeck LED VERO13 FWHM 67.0° Efficiency % Peak intensity od/m Required components: Projeck LED VERO13 FWHM 68.0° Efficiency % Peak intensity od/m Required components: Peak intensity od/m Required components: Efficiency % Peak intensity od/m Required components: Efficiency % Peak intensity od/m Required components: Efficiency 86 % Peak intensity 1.300 cd/m Required components: C13709_PF-SOCKET-VERO13-18	bridgelux.	
Efficiency % Peak intensity od/m Required components:		
Peak intensity od/m Required components: LED VER013 FWHM 67.0° Efficiency % Peak intensity od/m Required components: FUTGER LED VER018 FWHM 68.0° Efficiency % Peak intensity od/m Required components: Efficiency solution Required components: ED CXM-14 FWHM 50.0° Efficiency 86 % Peak intensity 1.300 cd/m Required components: Efficiency 86 % Peak intensity 1.300 cd/m Required components: C13709_PF-SUCKET-VER013-18		
Required components: LED VERO13 FWHM 67.0° Efficiency % Peak intensity cd/lm Required components: FVFMM 68.0° Efficiency % Peak intensity cd/lm Required components:		
EVEROIS EVFINI 67.0° Efficiency % Peak intensity cd/lm Required components:		
LED VER013 FWHM 67.0° Efficiency % Peak intensity cd/lm Required components brogetw LED VER018 FWHM 68.0° Efficiency % Peak intensity cd/lm Required components FWENNUSSES Efficiency % Peak intensity 1.000 cd/lm Required components LED CXM-14 FWHM 50.0° Efficiency 86 % Peak intensity 1.300 cd/lm Required components	Required compor	nents:
LED VER013 FWHM 67.0° Efficiency % Peak intensity cd/lm Required components brogetw LED VER018 FWHM 68.0° Efficiency % Peak intensity cd/lm Required components FWENNUSSES Efficiency % Peak intensity 1.000 cd/lm Required components LED CXM-14 FWHM 50.0° Efficiency 86 % Peak intensity 1.300 cd/lm Required components		
LED VER013 FWHM 67.0° Efficiency % Peak intensity cd/lm Required components brogetw LED VER018 FWHM 68.0° Efficiency % Peak intensity cd/lm Required components FWENNUSSES Efficiency % Peak intensity 1.000 cd/lm Required components LED CXM-14 FWHM 50.0° Efficiency 86 % Peak intensity 1.300 cd/lm Required components		
LED VER013 FWHM 67.0° Efficiency % Peak intensity cd/lm Required components brogetw LED VER018 FWHM 68.0° Efficiency % Peak intensity cd/lm Required components FWENNUSSES Efficiency % Peak intensity 1.000 cd/lm Required components LED CXM-14 FWHM 50.0° Efficiency 86 % Peak intensity 1.300 cd/lm Required components		
FWHM 67.0° Efficiency % Peak intensity cd/lm Required components:	bridgelux.	
Efficiency % Peak intensity cd/m Required components:	LED	VERO13
Peak intensity od/lm Required components: brigetw LED VERO18 FWHM 68.0° Efficiency % Peak intensity od/lm Required components: EVENTINUS LED CXM-14 FWHM 50.0° Efficiency 86 % Peak intensity 1.300 cd/lm Required components: C13709_PF-S∪CKET-VERO13-18	FWHM	67.0°
Required components: LED VERO18 FWHM 68.0° Efficiency % Peak intensity cd/lm Required components:	Efficiency	%
brocket LED VERO18 FWHM 68.0° Efficiency % Peak intensity cd/m Required components:	Peak intensity	cd/lm
LED VER018 FWHM 68.0° Efficiency % Peak intensity cd/lm Required components EED CXM-14 FWHM 50.0° Efficiency 86 % Peak intensity 1.300 cd/lm Required components C13709_PF-S∪KT-VER013-18	Required compo	nents:
LED VER018 FWHM 68.0° Efficiency % Peak intensity cd/lm Required components EED CXM-14 FWHM 50.0° Efficiency 86 % Peak intensity 1.300 cd/lm Required components C13709_PF-S∪KT-VER013-18		
LED VER018 FWHM 68.0° Efficiency % Peak intensity cd/lm Required components EED CXM-14 FWHM 50.0° Efficiency 86 % Peak intensity 1.300 cd/lm Required components C13709_PF-S∪KT-VER013-18		
LED VER018 FWHM 68.0° Efficiency % Peak intensity cd/lm Required components EED CXM-14 FWHM 50.0° Efficiency 86 % Peak intensity 1.300 cd/lm Required components C13709_PF-S∪KT-VER013-18		
LED VER018 FWHM 68.0° Efficiency % Peak intensity cd/lm Required components: EED CXM-14 FWHM 50.0° Efficiency 86 % Peak intensity 1.300 cd/lm Required components: C13709_PF-S∪KT-VER013-18	bridgelux.	
FWHM 68.0° Efficiency % Peak intensity cd/lm Required components Image: Second colspan="2">Image: Second colspan="2" Image: Second colspan="2"		VERO18
Efficiency % Peak intensity cd/lm Required components: Image: Component state s		
Peak intensity cd/lm Required components:		
Required components: Image: Components: LED CXM-14 FWHM 50.0° Efficiency 86 % Peak intensity 1.300 cd/lm Required components: C13709_PF-SUCKET-VERO13-18		
LED CXM-14 FWHM 50.0° Efficiency 86 % Peak intensity 1.300 cd/lm Required components: C13709_PF-SOUKET-VERO13-18		
LEDCXM-14FWHM50.0°Efficiency86 %Peak intensity1.300 cd/lmRequired components:C13709_PF-SUCKET-VERO13-18		
LEDCXM-14FWHM50.0°Efficiency86 %Peak intensity1.300 cd/lmRequired components:C13709_PF-SUCKET-VERO13-18		
LEDCXM-14FWHM50.0°Efficiency86 %Peak intensity1.300 cd/lmRequired components:C13709_PF-SUCKET-VERO13-18		
LEDCXM-14FWHM50.0°Efficiency86 %Peak intensity1.300 cd/lmRequired components:C13709_PF-SUCKET-VERO13-18		NUS
FWHM 50.0° Efficiency 86 % Peak intensity 1.300 cd/lm Required components: C13709_PF-SUCKET-VER013-18		
Efficiency86 %Peak intensity1.300 cd/lmRequired components: C13709_PF-SOCKET-VERO13-18		
Peak intensity 1.300 cd/lm Required components: C13709_PF-SOCKET-VERO13-18		
Required components: C13709_PF-SOCKET-VERO13-18		
C13709_PF-SOCKET-VERO13-18		

PRODUCT DATASHEET F13702_BARBARA-WW-PF



PHOTOMETRIC DATA (SIMULATED):

LED	CXM-9	
FWHM	43.0°	
Efficiency	88 %	
Peak intensity	1.600 cd/lm	
Required compo		
C13709_PF-S	OCKET-VERO13-18	
Bender Wirth:	434 Typ L1	
OSRAM Opto Semiconductors		90 ⁴
LED	Soleriq S15	72
FWHM	73.0°	
Efficiency	90 %	695-
Peak intensity	0.770 cd/lm	
Required compo	nents:	
C13709_PF-S	OCKET-VERO13-18	
Bender Wirth:	433 Typ L1	
		30
SEOUL		20° 20°
SEOUL SEMICONDUCTOR	ZC12/18	
FWHM	50.0°	
	86 %	
Efficiency Peak intensity	1.300 cd/lm	
-		
Required compo	OCKET-VERO13-18	
Bender Wirth:		
	433 TYP L1	
SEOUL		
LED	ZC4/6	
FWHM	43.0°	
Efficiency	88 %	
Peak intensity	1.600 cd/lm	
Required compo		
	OCKET-VERO13-18	
Bender Wirth:		
	<i>,</i> ,	

PRODUCT DATASHEET



GENERAL INFORMATION:

NOTE: The typical beam angle will be changed by different color, chip size and chip position tolerance. The typical total beam angle is the full angle measured where the luminous intensity is half of the peak value.

Due to use of high power COB's with this product, special attention to proper thermal design is highly recommended. LEDiL has no liability for direct, indirect or consecutive damages arising from the LEDiL products being used outside of the recommended temperature range.

MATERIALS:

As part of our continuous research and improvement processes, and to ensure the best possible quality and availability of our products, LEDiL reserves the right to change material grades without notice.

PRODUCT DATA USER AGREEMENT AND DISCLAIMER:

The measured data in the provided downloadable LEDiL Product Datasheets and Mechanical 2D-Drawings is rounded and provided as reference for planning. LEDiL Oy's optical specifications have been verified by conducting performance testing of the products in accordance with the company's quality system. The reported data are averaged results of multiple measurements with typical variation. LEDiL Oy reserves the right to without prior notification make changes and improvements to its products.

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LEDiL Oy

Joensuunkatu 13 FI-24240 SALO Finland

LEDiL Inc.

228 West Page Street Suite D Sycamore IL 60178 USA

Local sales and technical support www.ledil.com/ where_to_buy

Shipping locations Salo, Finland Hong Kong, China

Distribution Partners www.ledil.com/

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