

PROJECT	_____
TYPE	_____
SPECIFIER	_____
QUANTITY	_____
DATE	_____

PI2 STANDARD SUSPENSION

A300110-

base number	LED Dimming	Color Temperature	Finishes (Diamond)	Finishes (Triangle)	Diffuser Options	Cable Length
-------------	-------------	-------------------	--------------------	---------------------	------------------	--------------

- To build a product code in our configurator select the specify button on the base model # product page
- To build a manual product code on this datasheet choose from the options listed below in blue font and add the suffix to the base model #

GENERAL

Series: Pi2
Subseries: Pi2 Standard
Brand: Prolicht
Division: Architectural
Mounting Type: Suspension
Mounting Location: Ceiling
Subcategory: Ambient

PHYSICAL

Shape: Square
Length (mm): 600
Length (in): 23 5/8
Width (mm): 600
Width (in): 23 5/8
Height (mm): 60
Height (in): 2 3/8
Light Distribution: Direct
Weight (kg): 9.9
Weight (lbs): 21.83
Diffuser: PMMA - Opal or Micro-Prism
Fixture Finish: SSR / BKV / CWI / CRY / HAB / UFT / ITA / RUA / FTG / MYG / LOD / PUS / FRO / FUP / KIA / POP / BLS / SPG / MEY / GOH / GUM / CHC / COM / ABZ / JAG / OBR / MOS / ROR
Fixture Material: Aluminum
Cable Details: 2000mm or 6000mm

ELECTRICAL

Lamp Type: LED (Zhaga Standard)
Input Wattage (W): 55
Total Output Wattage (W): 50
Dimming: Tri-Mode (Non-Dimming and Phase Dimming (120Vac only) and 0-10V Dimming)
Driver Included: Yes
Driver Location: Integrated
Driver Type: Constant Current - Universal
Driver Class: Class 2
Input Voltage (V): 120 - 277
Constant Current (MA): 350

LED

Color Temperature (°K): 3000 / 4000
Max. Delivered Lumen (lm): 5710 / 5802 / 5920
Nominal Lumen (lm): 6680 / 6782 / 6920
CRI: >80 CRI
Lamp Life (hrs): 50000

OPTICAL

RATINGS AND CERTIFICATIONS

Certified By: Certified for North American Standards
IP rating: IP20



PI2 STANDARD SUSPENSION

A300110-

PROJECT _____

TYPE _____

SPECIFIER _____

QUANTITY _____

DATE _____



PROJECT
TYPE
SPECIFIER
QUANTITY
DATE

PI2 STANDARD SURFACE

A32332-

base number	LED Dimming	Color Temperature	Finishes	Diffuser Options
-------------	-------------	-------------------	----------	------------------

- To build a product code in our configurator select the specify button on the base model # product page
- To build a manual product code on this datasheet choose from the options listed below in blue font and add the suffix to the base model #

GENERAL

Series: Pi2
Subseries: Pi2 Standard
Brand: Prolicht
Division: Architectural
Mounting Type: Surface
Mounting Location: Ceiling
Subcategory: Ambient

PHYSICAL

Shape: Square
Length (mm): 370
Length (in): 14 9/16
Width (mm): 60
Width (in): 2 3/8
Height (mm): 370
Depth (mm): 60
Height (in): 14 9/16
Depth (in): 2 3/8
Light Distribution: Direct
Weight (kg): 3.41
Weight (lbs): 7.50
Diffuser: PMMA - Opal or Micro-Prism
Fixture Finish: SSR / BKV / CWI / CRY / HAB / UFT / ITA / RUA / FTG / MYG / LOD / PUS / FRO / FUP / KIA / POP / BLS / SPG / MEY / GOH / GUM / CHC / COM / ABZ / JAG / OBR / MOS / ROR

ELECTRICAL

Lamp Type: LED (Zhaga Standard)
Input Wattage (W): 13.2
Total Output Wattage (W): 12
Dimming: Tri-Mode (Non-Dimming and Phase Dimming (120Vac only) and 0-10V Dimming)
Driver Included: Yes
Driver Location: Integrated
Driver Type: Constant Current - Universal
Driver Class: Class 2
Input Voltage (V): 120 - 277
Constant Current (MA): 350

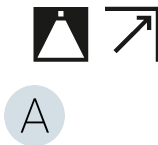
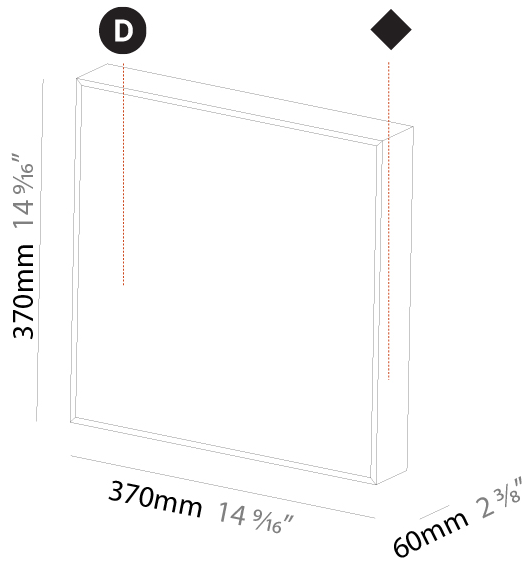
LED

Color Temperature (°K): 3000 / 3500 / 4000
Max. Delivered Lumen (lm): 1140 / 1156 / 1180
CRI: >80 CRI
Efficiency (%): 65
Lamp Life (hrs): 50000

OPTICAL

RATINGS AND CERTIFICATIONS

Certified By: Certified for North American Standards
IP rating: IP20



A32332-

PROJECT

TYPE

SPECIFIER

QUANTITY

DATE



PI2 STANDARD TRIMLESS

A36389- -

base number LED Dimming Color Temperature

- To build a product code in our configurator select the specify button on the base model # product page
- To build a manual product code on this datasheet choose from the options listed below in blue font and add the suffix to the base model #

GENERAL

Series: Pi2
 Subseries: Pi2 Standard
 Brand: Prolicht
 Division: Architectural
 Mounting Type: Trimless
 Mounting Location: Ceiling
 Subcategory: Ambient

PHYSICAL

Shape: Square
 Length (mm): 600
 Length (in): 23 5/8
 Width (mm): 600
 Width (in): 23 5/8
 Height (mm): 150
 Height (in): 5 7/8
 Ceiling Thickness (mm): 10 / 12.5 / 15 / 25 / 30
 Ceiling Thickness (in): 3/8 or 1/2 or 9/16 or 1 or 1 3/16
 Min. Recessing Depth (mm): 180
 Min. Recessing Depth (in): 7 1/16
 Light Distribution: Direct
 Diffuser: PMMA - Opal
 Fixture Finish: SSR / BKV / CWI / CRY / HAB / UFT / ITA / RUA / FTG / MYG / LOD / PUS / FRO / FUP / KIA / POP / BLS / SPG / MEY / GOH / GUM / CHC / COM / ABZ / JAG / OBR / MOS / ROR
 Fixture Material: Aluminum
 Cut-out Measurements: 635mm / 25" x 635mm / 25"
 Upon Request: Unique Sizes Unique Ceiling Thickness Unique Mounting Depth Spot Inserts

ELECTRICAL

Lamp Type: LED (Zhaga Standard)
 Input Wattage (W): 55
 Total Output Wattage (W): 46
 Dimming: Tri-Mode (Non-Dimming and Phase Dimming (120Vac only) and 0-10V Dimming)
 Driver Included: Yes
 Driver Location: Integrated
 Driver Type: Constant Current - Universal
 Driver Class: Class 2
 Input Voltage (V): 120 - 277
 Constant Current (MA): 350

LED

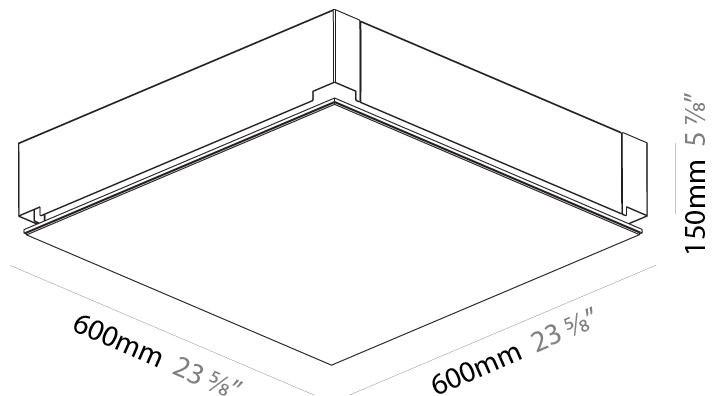
Color Temperature (°K): 3000 / 3500 / 4000
 Max. Delivered Lumen (lm): 4350 / 4410 / 4500
 CRI: >80 CRI
 Efficiency (%): 65% (5mm Perspex)|65.10%
 Lamp Life (hrs): 50000
 Upon Request: RGB-W Tunable White Special Color Temperature CRI90

OPTICAL

RATINGS AND CERTIFICATIONS

Certified By: Certified for North American Standards
 IP rating: IP20

PROJECT
TYPE
SPECIFIER
QUANTITY
DATE



PI2 STANDARD TRIMLESS

A36389-

PROJECT

TYPE

SPECIFIER

QUANTITY

DATE



PI2 STANDARD TRIMLESS

A36809- -

base number LED Dimming Color Temperature

- To build a product code in our configurator select the specify button on the base model # product page
- To build a manual product code on this datasheet choose from the options listed below in blue font and add the suffix to the base model #

GENERAL

Series: Pi2
 Subseries: Pi2 Standard
 Brand: Prolicht
 Division: Architectural
 Mounting Type: Trimless
 Mounting Location: Ceiling
 Subcategory: Ambient

PHYSICAL

Shape: Square
 Length (mm): 370
 Length (in): 14 9/16
 Width (mm): 370
 Width (in): 14 9/16
 Height (mm): 180
 Height (in): 7 1/16
 Ceiling Thickness (mm): 10 / 12.5 / 15 / 25 / 30
 Ceiling Thickness (in): 3/8 or 1/2 or 9/16 or 1 or 1 3/16
 Min. Recessing Depth (mm): 200
 Min. Recessing Depth (in): 7 7/8
 Light Distribution: Direct
 Diffuser: PMMA - Opal
 Fixture Finish: SSR / BKV / CWI / CRY / HAB / UFT / ITA / RUA / FTG / MYG / LOD / PUS / FRO / FUP / KIA / POP / BLS / SPG / MEY / GOH / GUM / CHC / COM / ABZ / JAG / OBR / MOS / ROR
 Fixture Material: Extruded Aluminum / Steel
 Cable Details: 405mm 15 15/16" x 405mm / 15 15/16"
 Upon Request: Unique Sizes Unique Ceiling Thickness Unique Mounting Depth Spot Inserts

ELECTRICAL

Lamp Type: LED (Zhaga Standard)
 Input Wattage (W): 12.4
 Total Output Wattage (W): 10.8
 Dimming: Tri-Mode (Non-Dimming and Phase Dimming (120Vac only) and 0-10V Dimming)
 Driver Included: Yes
 Driver Location: Integrated
 Driver Type: Constant Current - Universal
 Driver Class: Class 2
 Input Voltage (V): 120 - 277
 Constant Current (MA): 350

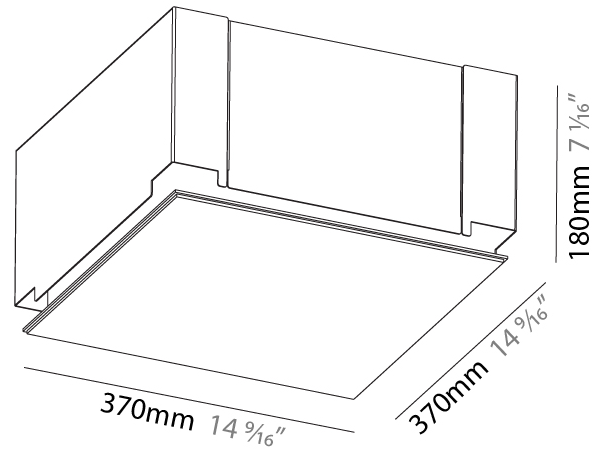
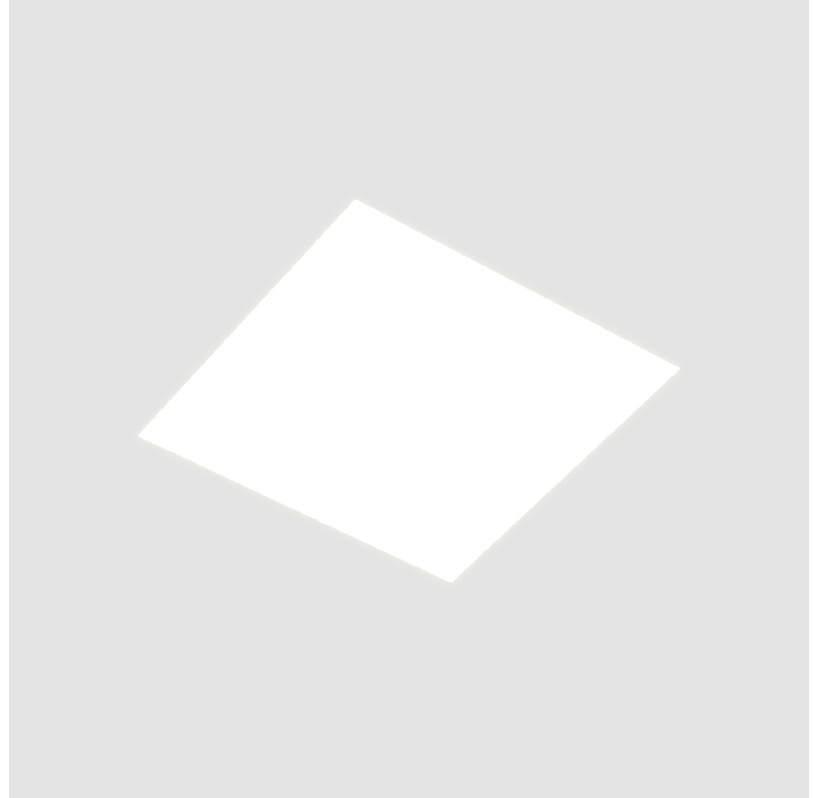
LED

Color Temperature (°K): 3000 / 3500 / 4000
 Max. Delivered Lumen (lm): 1090 / 1107 / 1130
 CRI: >80 CRI
 Efficiency (%): 0.651
 Lamp Life (hrs): 50000
 Upon Request: RGB-W Tunable White Special Color Temperature CRI90

OPTICAL

RATINGS AND CERTIFICATIONS

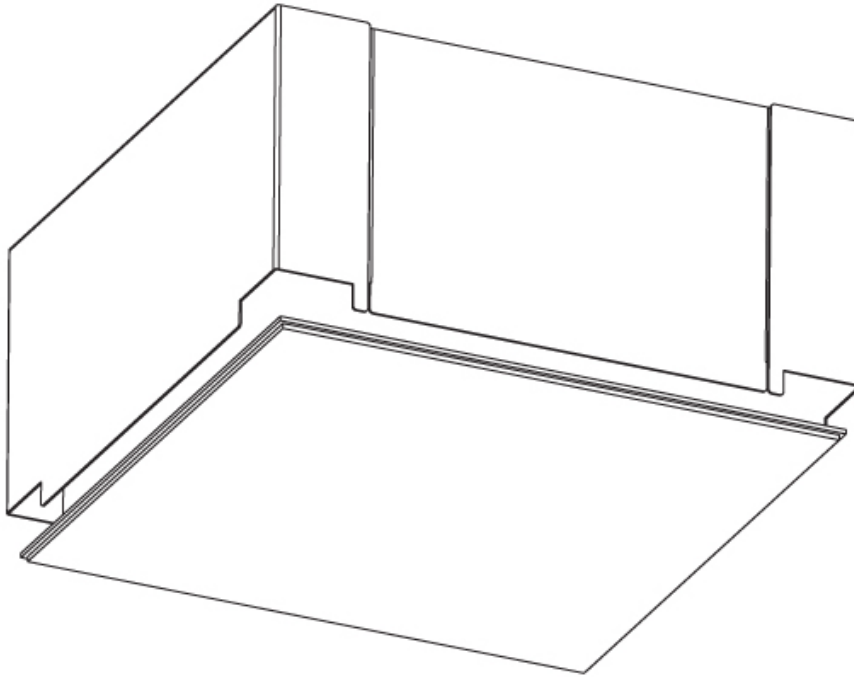
Certified By: Certified for North American Standards
 IP rating: IP20



PI2 STANDARD TRIMLESS

A36809-

PROJECT	_____
TYPE	_____
SPECIFIER	_____
QUANTITY	_____
DATE	_____



PROJECT	
TYPE	
SPECIFIER	
QUANTITY	
DATE	

PI2 STANDARD RECESSED

A37130-

base number	LED Dimming	Color Temperature	Finishes (Diamond)	Diffuser Options
-------------	----------------	----------------------	-----------------------	---------------------

- To build a product code in our configurator select the specify button on the base model # product page
- To build a manual product code on this datasheet choose from the options listed below in blue font and add the suffix to the base model #

GENERAL

Series: Pi2
Subseries: Pi2 Standard
Brand: Prolicht
Division: Architectural
Mounting Type: Recessed
Mounting Location: Ceiling
Subcategory: Ambient

PHYSICAL

Shape: Square
Length (mm): 410
Length (in): 16 1/8
Width (mm): 410
Width (in): 16 1/8
Height (mm): 150
Height (in): 5 7/8
Ceiling Thickness (mm): 10 / 12.5 / 15 / 25 / 30
Ceiling Thickness (in): 3/8 or 1/2 or 9/16 or 1 or 1 3/16
Min. Recessing Depth (mm): 160
Min. Recessing Depth (in): 6 5/16
Light Distribution: Direct
Diffuser: PMMA - Opal or Micro-Prism
Fixture Finish: SSR / BKV / CWI / CRY / HAB / UFT / ITA / RUA / FTG / MYG / LOD / PUS / FRO / FUP / KIA / POP / BLS / SPG / MEY / GOH / GUM / CHC / COM / ABZ / JAG / OBR / MOS / ROR
Fixture Material: Aluminum

ELECTRICAL

Lamp Type: LED (Zhaga Standard)
Input Wattage (W): 12.4
Total Output Wattage (W): 10.8
Dimming: Tri-Mode (Non-Dimming and Phase Dimming (120Vac only) and 0-10V Dimming)
Driver Included: Yes
Driver Location: Integrated
Driver Type: Constant Current - Universal
Driver Class: Class 2
Input Voltage (V): 120 - 277
Constant Current (MA): 350

LED

Color Temperature (°K): 3000 / 3500 / 4000
Max. Delivered Lumen (lm): 1140 / 1156 / 1180
CRI: >80 CRI
Efficiency (%): 0.65
Lamp Life (hrs): 50000

OPTICAL

RATINGS AND CERTIFICATIONS

Certified By: Certified for North American Standards
IP rating: IP20



PI2 STANDARD RECESSED

A37130-

PROJECT	_____
TYPE	_____
SPECIFIER	_____
QUANTITY	_____
DATE	_____



PI2 STANDARD TRIMLESS

A37640- -

base number LED Color
Dimming Temperature

PROJECT
TYPE
SPECIFIER
QUANTITY
DATE

- To build a product code in our configurator select the specify button on the base model # product page
- To build a manual product code on this datasheet choose from the options listed below in blue font and add the suffix to the base model #

GENERAL

Series: Pi2
Subseries: Pi2 Standard
Brand: Prolicht
Division: Architectural
Mounting Type: Trimless
Mounting Location: Ceiling
Subcategory: Ambient

PHYSICAL

Shape: Square
Length (mm): 300
Length (in): 11 ¹³/₁₆"
Width (mm): 300
Width (in): 11 ¹³/₁₆"
Height (mm): 180
Height (in): 7 ¹/₁₆"
Ceiling Thickness (mm): 10 / 12.5 / 15 / 25 / 30
Ceiling Thickness (in): 3/8 or 1/2 or 9/16 or 1 or 1 3/16
Min. Recessing Depth (mm): 200
Min. Recessing Depth (in): 7 ⁷/₈"
Light Distribution: Direct
Diffuser: PMMA - Opal
Fixture Finish: SSR / BKV / CWI / CRY / HAB / UFT / ITA / RUA / FTG / MYG / LOD / PUS / FRO / FUP / KIA / POP / BLS / SPG / MEY / GOH / GUM / CHC / COM / ABZ / JAG / OBR / MOS / ROR
Fixture Material: Extruded Aluminum / Steel
Cut-out Measurements: 335mm 13 3/16" x 335mm / 13 3/16"
Upon Request: Unique Sizes Unique Ceiling Thickness Unique Mounting Depth Spot Inserts

ELECTRICAL

Lamp Type: LED (Zhaga Standard)
Input Wattage (W): 12.4
Total Output Wattage (W): 10.8
Dimming: [Tri-Mode \(Non-Dimming and Phase Dimming \(120Vac only\) and 0-10V Dimming\)](#)
Driver Included: Yes
Driver Location: Integrated
Driver Type: Constant Current - Universal
Driver Class: Class 2
Input Voltage (V): 120 - 277
Constant Current (MA): 350

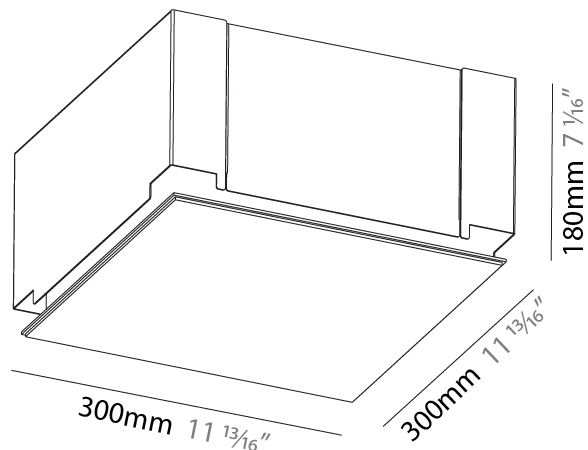
LED

Color Temperature (°K): [3000 / 3500 / 4000](#)
Max. Delivered Lumen (lm): 850 / 902 / 920
CRI: >80 CRI
Efficiency (%): 65% (5mm Perspex)
Lamp Life (hrs): 50000
Upon Request: RGB-W Tunable White Special Color Temperature CRI90

OPTICAL

RATINGS AND CERTIFICATIONS

Certified By: Certified for North American Standards
IP rating: IP20



PI2 STANDARD TRIMLESS

A37640-

PROJECT

TYPE

SPECIFIER

QUANTITY

DATE



PI2 STANDARD TRIMLESS

A37644- -

base number LED Dimming Color Temperature

- To build a product code in our configurator select the specify button on the base model # product page
- To build a manual product code on this datasheet choose from the options listed below in blue font and add the suffix to the base model #

GENERAL

Series: Pi2
 Subseries: Pi2 Standard
 Brand: Prolicht
 Division: Architectural
 Mounting Type: Trimless
 Mounting Location: Ceiling
 Subcategory: Ambient

PHYSICAL

Shape: Square
 Length (mm): 200
 Length (in): 7 7/8
 Width (mm): 200
 Width (in): 7 7/8
 Height (mm): 180
 Height (in): 7 1/16
 Ceiling Thickness (mm): 10 / 12.5 / 15 / 25 / 30
 Ceiling Thickness (in): 3/8 or 1/2 or 9/16 or 1 or 1 3/16
 Min. Recessing Depth (mm): 200
 Min. Recessing Depth (in): 7 7/8
 Light Distribution: Direct
 Diffuser: PMMA - Opal
 Fixture Finish: SSR / BKV / CWI / CRY / HAB / UFT / ITA / RUA / FTG / MYG / LOD / PUS / FRO / FUP / KIA / POP / BLS / SPG / MEY / GOH / GUM / CHC / COM / ABZ / JAG / OBR / MOS / ROR
 Fixture Material: Extruded Aluminum / Steel
 Cut-out Measurements: 235mm / 9 1/4" x 235mm / 9 1/4"
 Upon Request: Unique Sizes Unique Ceiling Thickness Unique Mounting Depth Spot Inserts

ELECTRICAL

Lamp Type: LED (Zhaga Standard)
 Input Wattage (W): 12.4
 Total Output Wattage (W): 10.8
 Dimming: Tri-Mode (Non-Dimming and Phase Dimming (120Vac only) and 0-10V Dimming)
 Driver Included: Yes
 Driver Location: Integrated
 Driver Type: Constant Current - Universal
 Driver Class: Class 2
 Input Voltage (V): 120 - 277
 Constant Current (MA): 350

LED

Color Temperature (°K): 3000 / 3500 / 4000
 Max. Delivered Lumen (lm): 880 / 880 / 880
 Nominal Lumen (lm): 1360 / 1360 / 1360
 CRI: >80 CRI
 Efficiency (%): 65 (5mm Perspex) / 65.10
 Lamp Life (hrs): 50000
 Upon Request: RGB-W Tunable White Special Color Temperature CRI90

OPTICAL

RATINGS AND CERTIFICATIONS

Certified By: Certified for North American Standards
 IP rating: IP20

PROJECT
TYPE
SPECIFIER
QUANTITY
DATE



PI2 STANDARD TRIMLESS

A37644-

PROJECT

TYPE

SPECIFIER

QUANTITY

DATE



PROJECT	_____
TYPE	_____
SPECIFIER	_____
QUANTITY	_____
DATE	_____

PI2 STANDARD RECESSED

A37741-

base number	LED Dimming	Color Temperature	Finishes (Diamond)	Diffuser Options
-------------	----------------	----------------------	-----------------------	---------------------

- To build a product code in our configurator select the specify button on the base model # product page
- To build a manual product code on this datasheet choose from the options listed below in blue font and add the suffix to the base model #

GENERAL

Series: Pi2
Subseries: Pi2 Standard
Brand: Prolicht
Division: Architectural
Mounting Type: Recessed
Mounting Location: Ceiling
Subcategory: Ambient

PHYSICAL

Shape: Square
Length (mm): 340
Length (in): 13 3/8
Width (mm): 340
Width (in): 13 3/8
Height (mm): 150
Height (in): 5 7/8
Ceiling Thickness (mm): 10 / 12.5 / 15 / 25 / 30
Ceiling Thickness (in): 3/8 or 1/2 or 9/16 or 1 or 1 3/16
Min. Recessing Depth (mm): 160
Min. Recessing Depth (in): 6 5/16
Light Distribution: Direct
Diffuser: PMMA - Opal or Micro-Prism
Fixture Finish: SSR / BKV / CWI / CRY / HAB / UFT / ITA / RUA / FTG / MYG / LOD / PUS / FRO / FUP / KIA / POP / BLS / SPG / MEY / GOH / GUM / CHC / COM / ABZ / JAG / OBR / MOS / ROR
Fixture Material: Aluminum

ELECTRICAL

Lamp Type: LED (Zhaga Standard)
Input Wattage (W): 12.4
Total Output Wattage (W): 10.8
Dimming: Tri-Mode (Non-Dimming and Phase Dimming (120Vac only) and 0-10V Dimming)
Driver Included: Yes
Driver Location: Integrated
Driver Type: Constant Current - Universal
Driver Class: Class 2
Input Voltage (V): 120 - 277
Constant Current (MA): 350

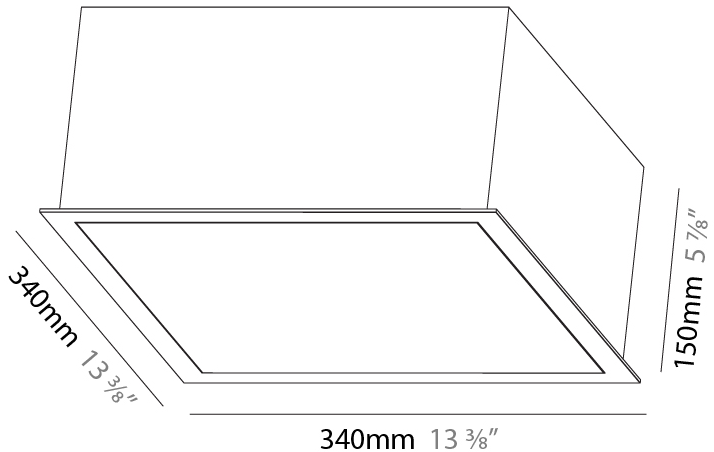
LED

Color Temperature (°K): 3000 / 3500 / 4000
Max. Delivered Lumen (lm): 880 / 950 / 970
CRI: >80 CRI
Efficiency (%): 0.65
Lamp Life (hrs): 50000

OPTICAL

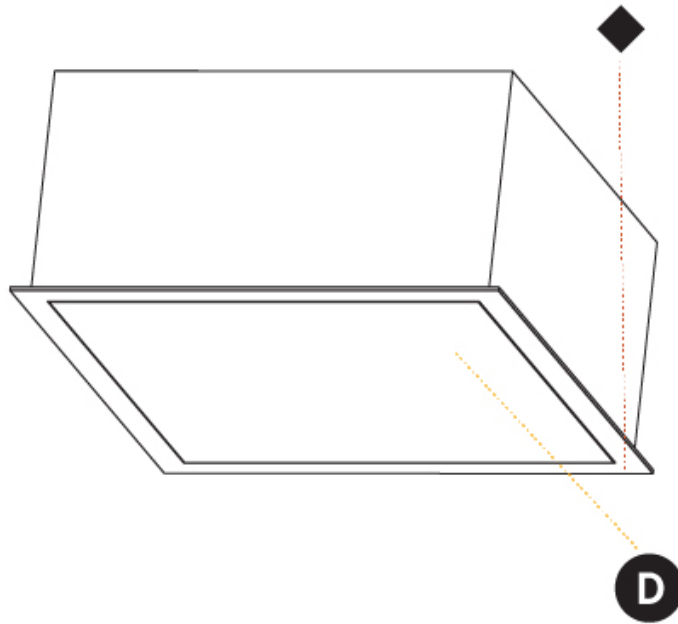
RATINGS AND CERTIFICATIONS

Certified By: Certified for North American Standards
IP rating: IP20



A37741-

PROJECT	_____
TYPE	_____
SPECIFIER	_____
QUANTITY	_____
DATE	_____



A

PROJECT
TYPE
SPECIFIER
QUANTITY
DATE

PI2 COLOR FINISH CHART

Fixture Finish



Digital: Not all screens are calibrated the same, and therefore, colors will appear differently between screens.

Physical: When texture is involved, there will be variations in color, character and tone within a product series and between product families.

Gun Metal: No Gun Metal finish is alike. It combines a mixture of transparent and black color particles which ensures a highly individual effect and no luminaire being identical.

Champagne Cream, Copper Mine, Ancient Bronze + Jazz Gold: These finishes have slight fading from specific powder coating production. Each luminaire will slightly vary.



PROJECT	
TYPE	
SPECIFIER	
QUANTITY	
DATE	

LEGEND

floor-mounted	pivotal	special LED (upon request) RGB, RGBW, tunable, gold+, meat+, art+, fashion+
wall and ceiling: recessed and surface mounted	rotating	warm dim / natural dimming LED
ceiling-mounted and wall-mounted	illuminate tilted	rechargeable battery powered
wall-mounted	color of suspension cable	fixture with natural vivid LED (upon request)
omni-directional light distribution	length of suspension cable	color rendering index
direct light distribution	reflector degree selection	color temperature
direct/indirect light distribution	super spot	lumen (luminous flux)
indirect light distribution	lens	efficacy (lumens per watt)
asymmetric light distribution	lens pack	Unified Glare Rating (UGR) range from 5-40
aura light distribution	shine ring	marine grade (AISI 316 stainless steel)
round wall or ceiling cut-out	integrated shine ring with diffuser	walk on
square wall or ceiling cut-out	free individual colors 01-29	drive on
the supplied jig specifies the cutout dimensions	individual colors: 00 (free of charge), 01-25 (extra charge)	Dark Sky Compliance
minimum distance (meters) lamp - object	luminaire part to be colored (F1)	Americans with Disabilities Act (less than 4" off the wall located between 27"-84" from floor)
recessed depth	luminaire part to be colored (F2)	lamp protected against explosion
ceiling thickness in mm	luminaire part to be colored (F3)	blown glass using traditional methods by master glass blower
ceiling thickness selection	luminaire part to be colored (F4)	acoustic material
dimmable DP (phase), DV (0-10V), DD (dali), DS (step-dim)	luminaire part to be colored (F5)	protection class I, protection insulation
included or excluded LED driver/transformer/control gear	color of 3-circuit adaptor	protection class II, protection insulation
separately switchable	indirect diffuser	ETL Certified to UL and CSA Standards
sensor	direct diffuser	UL Certified to UL and CSA Standards
remote control	ball-proof (upon request)	CSA Certified to UL and CSA Standards
available upon request	accessory	Certified for North American Standards

IP RATING

IP20	protected against ingress of solid bodies greater than 12.5mm (finger)
IP33	protected against ingress of solid bodies greater than 2.5mm protected against sprays of water up to 60 degrees from the vertical (rain)
IP40	protected against ingress of solid bodies greater than 1mm (wire) no protection against the ingress of moisture
IP43	protected against ingress of solid bodies greater than 1mm (wire) protected against sprays of water up to 60 degrees from the vertical (rain)
IP44	protected against ingress of solid bodies greater than 1mm (wire) protected against water splashed from all directions
IP54	protected against limited ingress of dust (wet rooms/covered outdoor areas) protected against water splashed from all directions
IP65	protected against ingress of dust protected against jets of water
IP66	protected against ingress of dust protected against powerful jets of water or heavy seas
IP67	protected against ingress of dust protected against immersion of water between 15cm - 1m for 30 minutes
IP68	protected against ingress of dust protected against immersion of water under pressure for long periods

IK RATING

IK01	protected against 0.14 joules impact (equivalent to 0.25kg mass dropped from 56mm above the surface)
IK02	protected against 0.2 joules impact (equivalent to 0.25kg mass dropped from 80mm above the surface)
IK03	protected against 0.35 joules impact (equivalent to 0.25kg mass dropped from 140mm above the surface)
IK04	protected against 0.5 joules impact (equivalent to 0.25kg mass dropped from 200mm above the surface)
IK05	protected against 0.7 joules impact (equivalent to 0.25kg mass dropped from 280mm above the surface)
IK06	protected against 1 joules impact (equivalent to 0.25kg mass dropped from 400mm above the surface)
IK07	protected against 2 joules impact (equivalent to 0.5kg mass dropped from 400mm above the surface)
IK08	protected against 5 joules impact (equivalent to 1.7kg mass dropped from 300mm above the surface)
IK09	protected against 10 joules impact (equivalent to 5.0kg mass dropped from 200mm above the surface)
IK10	protected against 20 joules impact (equivalent to 5.0kg mass dropped from 400mm above the surface)