

ROADMAX® RX2

Evluma's Next Generation Roadway Luminaire LED ROADWAY LIGHTING

Applications:

Residential streets,
local and major roadways, parking lots,
campuses, industrial parks.

RX2 Wattage Range: 70-220W

RX2 Lumen Range: 7,920-28,000 lumens



RoadMax RX2 delivers high-performance roadway distributions coupled with exceptional glare control. This sleek, utility-grade luminaire is easily configurable to meet a multitude of application requirements. RX2 is one model in the series. See also, RX1 & RX3.

Replaces 150W-400W HID

The RoadMax RX2 is a dual light engine luminaire with a lumen output ranging from 7,920 - 28,000 lumens and wattages ranging from 70 - 220 watts. Lumen output and wattage can be changed in the field through your choice of optional manual or wireless controls.

Construction & Finish

Cast aluminum housing with TGIC-free, polyester powder-coat in a variety of colors. Hinged tool-less access panel for wiring access. The 4-bolt tenon clamp accepts a 2" or 1-1/4" diameter arm. Diecast mounting stop. Step adjustment of +/- 5° tilt plus integral bubble level for luminaire leveling. Removable wildlife guard. Coastal version with enhanced hardware available meeting 3000-hour salt spray.

Thermal Protection

Solid aluminum housing provides excellent passive cooling for all electronics. LED & driver life is ensured by thermal management protection that limits current levels to the LEDs based on temperature. Luminaire is rated for full performance at -40°C min to 50°C max ambient temperature.

Lumen Maintenance

Projected per IES TM-21-21 at 25°C and based on LM80 (10,000 hr testing)
at 25,000 hours L95
at 50,000 hours L91
at 60,000 hours L89

Warranty

Ten-year warranty.



LED & Optical

High-efficacy LEDs with color temperature options of 2700 – 5000 Kelvin and CRI > 70. High-performance Type II, Type III, Type IV and Type V primary borosilicate optics rated at IP66. Factory or field-installable secondary lens available on all optics for managing glare while achieving superior pole spacing. All configurations are Zero Uplight (U0 BUG). Field-installable light trespass shields are available.

Electrical

Driver options: 120-277 VAC 60 Hz or 277-480 VAC 60 Hz. 0-10V ANSI C137.1-2019 (9-Volt).

20kV/10kA surge protection per ANSI C136.2 – 2018
Extreme rating.

Three-position terminal block with optional pigtails.
The separate, enclosed driver compartment is rated IP66.

Controls

Continuously dimmable driver. 0-10V interface standard with 7-pin receptacle option. Dimming minimum to 10% of nominal wattage. Manual wattage control (FAO) with stepped dimming optional.

Custom packages includes Photocontrol FailSafe™ and compatibility with the Bluetooth BLE ConnectLED™ mobile app. Can be combined with Evluma's integrated photocell, 3-pin, or 7-pin receptacles.

ROADMAX RX2

PRODUCT CONFIGURATIONS

SAMPLE NUMBER: RX2-220E3T4G0-S7HGL0-AFBN-PC1

FAMILY ID	WATTS	OUTPUT	CCT (K)	DISTRIBUTION ¹	LENS	PCR / RECEPTACLE / FAILSAFE
RX2 = RoadMax medium	070 = 70 085 = 85 100 = 100 120 = 120 140 = 140 160 = 160 180 = 180 200 = 200 220 = 220	E = high output	7 = 2700 3 = 3000 4 = 4000 5 = 5000	T2 = type II T3 = type III T4 = type IV T5 = type V	G0= none G1= diffused glare control	S3= 3 pin receptacle only S7= 7 pin receptacle only (0-10V) SP= Integrated Photocell F3= S3 pin + Failsafe/CLED F7= S7 pin + Failsafe/CLED FP= Integrated PC + Failsafe/CLED

HOUSING	LEADS	SURGE PROTECTION	Features 1	DRIVER/INPUT (V)	Features 2
HG = standard gray HB = standard black HZ = standard bronze ZG = coastal gray ZB = coastal black ZZ = coastal bronze	L0 = none L6 = 6' L1 = 10' L2 = 20'	A = Surge 20kV/10kA SPD	0 = none F = FAO	B = 120-277VAC D = 277-480VAC ²	0 = none N = NEMA wattage label

¹ Nominal IES Type subject to typical variation. Please review individual IES files
² 277-480VAC is not available for SP, F3, F7, or FP.

LENS

The primary glass RX2 optics are designed to deliver precise, evenly-distributed light with a low veiling luminance for Type II, Type III, Type IV and Type V distributions.

Choose G1 to add a secondary lens made from a specially formulated LED acrylic for exceptional glare control.

PCR/RECEPTACLE/FAILSAFE

All photocell receptacles are rotatable. Wireless photocell not provided.

Integrated Photocell (P)

Evluma's integrated photocell shortens installation time. This UV-resistant, polycarbonate photocell meets FM 4473 impact resistance. Rotatable 360°.

ConnectLED™ (CLED)

Order the RX2 configured for compatibility with Evluma's ConnectLED app.

ConnectLED uses Bluetooth BLE technology to securely control individual luminaires. ConnectLED is available as an Apple or Android app.

Photocontrol

Failsafe™ (Failsafe)

Photocontrol Failsafe eliminates the need to replace failed photocells, saving truck-rolls. Combine this patented technology with S3, S7 receptacles or the P option. Packaged with ConnectLED.

HOUSING

Standard housings are tested to 1000hrs salt/fog. Coastal housings are tested to 3000hrs and include non-corrosive hardware. Recommended for installation within 2000 ft from saltwater. Custom colors available.

Features 1: FAO

Field Adjustable Wattage Selector (FAO) Manually adjust luminaire wattage and lumen output in the field using the FAO. Allows a single sku to be adapted to multiple applications or site specific requirements. Seven output levels. FAO (AF) combined with S3 is not continuously dimmable. Stepped dimming only.

SWITCH POSITION	INPUT WATTS MULTIPLIER	DELIVERED LUMENS MULTIPLIER
A	100%	100%
B	89%	91%
C	77%	84%
D	65%	72%
E	54%	61%
F	43%	50%
G	33%	39%
H	23%	28%

SPECIAL OPTIONS

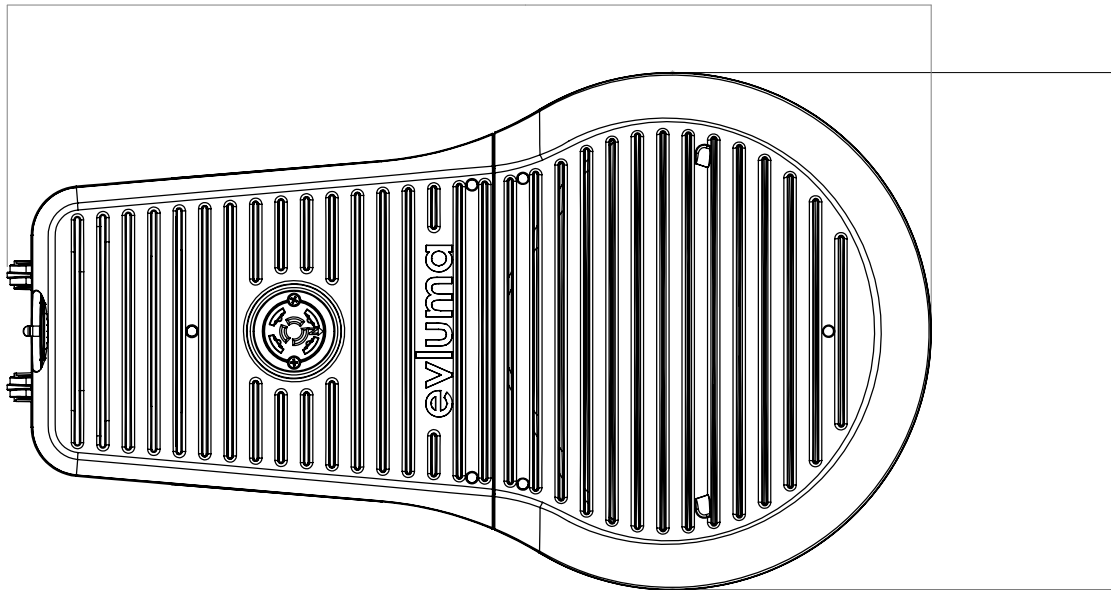
- CAP = shorting cap
- PC1 = long life NEMA photocell 120-277VAC
- PC2 = long life NEMA photocell 480VAC

Multiply the nominal wattage and/or lumens to arrive at reduced values. Typical accuracy is +/- 10%. Select the A position if using with an S7 socket and wireless node.

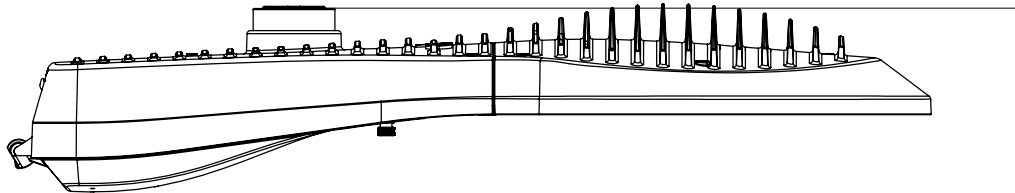


RX2 DIMENSIONS

28.57 in
72.60 cm



16 in
40.60 cm



5.74 in
14.60 cm



Certifications

UL 1598. MET Labs
IEC 60598-1
IP66 Lens
IP54 Enclosure

ANSI C136.31-2018
Level2/3G Vibration

ANSI C136.2-2023
20kV/10kA Extreme

ANSI C78.377-2011

Ratings

Rated electrical life =
100,00 hours

-40°C Min / 50°C Max Temp

THD <20% 120-277 VAC
PF >90% 120-277 VAC
THD <20% 277-480 VAC
PF >90% 277-480 VAC

Effective Projected Area
(EPA) < 0.6 sq ft

Dark Sky Approved

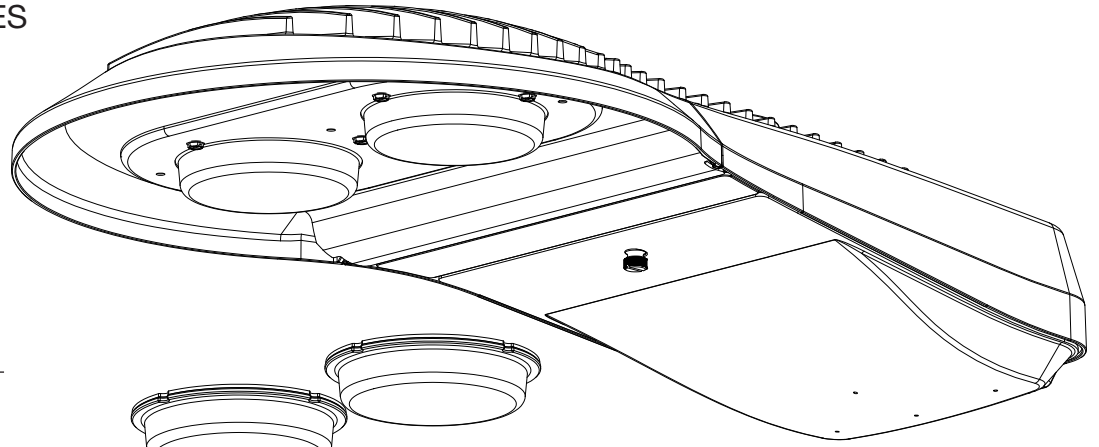
Multiple RX2 models have
received the IDA Dark Sky
Seal of Approval. darksky.org.

Models offered in 3000K
(3) or 2700K (7) are IDA
approved. All RX2 are U0.

Shipping

Single unit Weight = 24lbs
LTL pallet qty 18

RX2 LENS ACCESSORIES



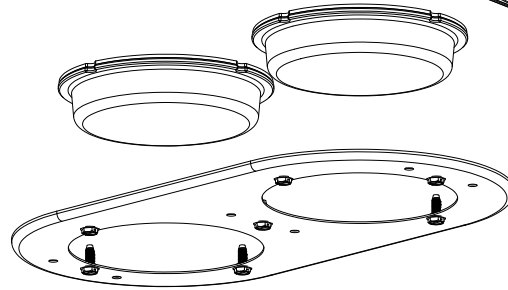
SECONDARY LENS FOR GLARE CONTROL

Push Veiling Luminance even lower while maintaining competitive pole spacing within RP-8 recommendations.

RX2 can be ordered from the factory with a set of secondary lenses installed for additional glare control, or order the set separately for installation in the field at a later date.

Prioritize glare reduction while maintaining high roadway performance.

The glare control lens is made from a specially formulated optical acrylic for use with LEDs. Coastal version available. To order separately see the catalog number below.



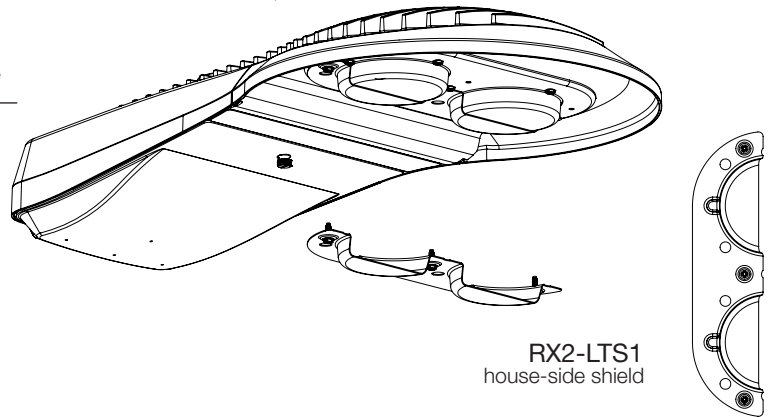
RX2-LENSG1

FAMILY ID	STYLE	COLOR
RX2	LENSG1 = secondary lens for glare control	HG = standard gray HB = standard black HZ = standard bronze ZG = coastal gray ZB = coastal black ZZ = coastal bronze

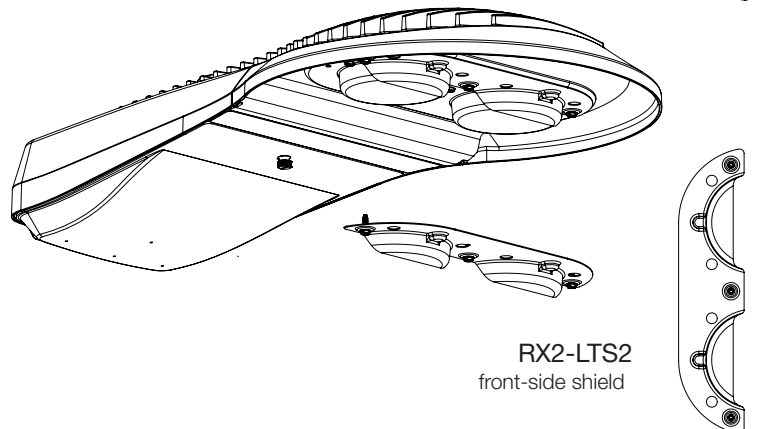
LIGHT TRESPASS SHIELDS

Reduce light trespass and discomfort glare. Field installable shields can be mounted over primary optics or secondary lenses front or back. Shields maintain No Uplight (U0) rating and add no additional EPS. Coastal version available.

FAMILY ID	STYLE	COLOR
RX2	LTS1 = house-side shield (large)	HG = standard gray HB = standard black HZ = standard bronze
	LTS2 = front-side shield (small)	ZG = coastal gray ZB = coastal black ZZ = coastal bronze



RX2-LTS1
house-side shield



RX2-LTS2
front-side shield

RX2 PERFORMANCE

Nominal lumen values reported. Individual fixtures may vary ± 10%.

WATTAGE	DISTRIBUTION Type, Lm/W & BUG	LUMENS (all CCT ≥ 70 CRI)							
		G0 option - primary lens				G1 option - glare control			
		2700K	3000K	4000K	5000K	2700K	3000K	4000K	5000K
70 E Output	II	9070	10110	10390	10460	8060	8990	9240	9300
	Lm/W	130	144	148	149	115	128	132	133
	BUG	B2-U0-G2	B2-U0-G2	B2-U0-G2	B2-U0-G2	B2-U0-G2	B2-U0-G2	B2-U0-G2	B2-U0-G2
	III	9050	10090	10370	10430	8030	8960	9210	9270
	Lm/W	129	144	148	149	115	128	132	132
	BUG	B2-U0-G2	B2-U0-G2	B2-U0-G2	B2-U0-G2	B2-U0-G2	B2-U0-G3	B2-U0-G3	B2-U0-G3
	IV	8980	10030	10290	10350	7920	8840	9070	9120
	Lm/W	128	143	147	148	113	126	130	130
	BUG	B2-U0-G2	B2-U0-G2	B2-U0-G2	B2-U0-G2	B3-U0-G2	B3-U0-G2	B3-U0-G2	B3-U0-G2
85 E Output	V	9810	10940	11240	11310	8750	9760	10030	10090
	Lm/W	140	156	161	162	125	139	143	144
	BUG	B3-U0-G2	B3-U0-G2	B3-U0-G2	B3-U0-G2	B3-U0-G2	B3-U0-G2	B3-U0-G2	B3-U0-G2
	II	10750	11990	12320	12390	9570	10670	10970	11040
	Lm/W	126	141	145	146	113	126	129	130
	BUG	B2-U0-G2	B2-U0-G2	B2-U0-G2	B2-U0-G2	B2-U0-G	B2-U0-G2	B2-U0-G2	B2-U0-G2
	III	10730	11970	12300	12380	9530	10630	10920	10990
	Lm/W	126	141	145	146	112	125	128	129
	BUG	B2-U0-G2	B2-U0-G3	B2-U0-G3	B2-U0-G3	B2-U0-G3	B2-U0-G3	B2-U0-G3	B2-U0-G3
100 E Output	IV	10650	11900	12210	12270	9380	10470	10750	10800
	Lm/W	125	140	144	144	110	123	126	127
	BUG	B2-U0-G2	B2-U0-G3	B2-U0-G3	B2-U0-G3	B3-U0-G2	B3-U0-G2	B3-U0-G2	B3-U0-G2
	V	11630	12970	13340	13420	10380	11580	11900	11970
	Lm/W	137	153	157	158	122	136	140	141
	BUG	B3-U0-G2	B4-U0-G2	B4-U0-G2	B4-U0-U2	B3-U0-G2	B3-U0-G2	B3-U0-G2	B3-U0-G2
	II	12340	13760	14150	14230	10990	12260	12600	12670
	Lm/W	123	138	142	142	110	123	126	127
	BUG	B2-U0-G2	B2-U0-G2	B2-U0-G2	B2-U0-G2	B2-U0-G2	B2-U0-G2	B2-U0-G2	B2-U0-G2
120 E Output	III	12320	13750	14130	14210	10940	12200	12550	12620
	Lm/W	123	138	141	142	109	122	126	126
	BUG	B2-U0-G3	B2-U0-G3	B2-U0-G3	B2-U0-G3	B2-U0-G3	B2-U0-G3	B2-U0-G3	B2-U0-G3
	IV	12240	13670	14030	14100	10750	12010	12320	12390
	Lm/W	122	137	140	141	108	120	123	124
	BUG	B2-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G2	B3-U0-G2	B3-U0-G3	B3-U0-G3
	V	13360	14900	15320	15410	11920	13300	13670	13750
	Lm/W	134	149	153	154	119	133	137	138
	BUG	B4-U0-G2	B4-U0-G2	B4-U0-G2	B4-U0-G2	B3-U0-G2	B3-U0-G2	B3-U0-G2	B3-U0-G2
120 E Output	II	14450	16110	16560	16660	12870	14350	14750	14840
	Lm/W	120	134	138	139	107	120	123	124
	BUG	B2-U0-G2	B3-U0-G2	B3-U0-G2	B3-U0-G2	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3
	III	14430	16090	16540	16640	12810	14290	14690	14780
	Lm/W	120	134	138	139	107	119	122	123
	BUG	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B2-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3
	IV	14320	16000	16410	16500	12580	14050	14420	14490
	Lm/W	119	133	137	137	105	117	120	121
	BUG	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3
120 E Output	V	15640	17440	17930	18040	13960	15570	16000	16100
	Lm/W	130	145	149	150	116	130	133	134
	BUG	B4-U0-G2	B4-U0-G2	B4-U0-G2	B4-U0-G2	B3-U0-G2	B3-U0-G2	B3-U0-G2	B3-U0-G2

WATTAGE	DISTRIBUTION Type, Lm/W & BUG	LUMENS (all CCT ≥ 70 CRI)							
		G0 option - primary lens				G1 option - glare control			
		2700K	3000K	4000K	5000K	2700K	3000K	4000K	5000K
140 E Output	II	16430	18330	18840	18960	14630	16320	16780	16880
	Lm/W	117	131	135	135	105	117	120	121
	BUG	B2-U0-G2	B3-U0-G2	B3-U0-G2	B3-U0-G2	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3
	III	16410	18310	18820	18930	14570	16250	16710	16810
	Lm/W	117	131	134	135	104	116	119	120
	BUG	B2-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3
	IV	16290	18250	18680	18770	14290	16000	16380	16460
	Lm/W	117	130	134	134	102	114	117	118
	BUG	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B4-U0-G3	B4-U0-G3
160 E Output	V	17790	19840	20400	20520	15880	17710	18200	18310
	Lm/W	127	142	146	147	113	127	130	131
	BUG	B4-U0-G2	B4-U0-G2	B4-U0-G2	B4-U0-G2	B3-U0-G2	B3-U0-G2	B3-U0-G2	B3-U0-G2
	II	18340	20450	21020	21150	16120	17980	18480	18590
	Lm/W	115	128	131	132	101	112	116	116
	BUG	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3
	III	18280	20390	20960	21080	16230	18100	18600	18720
	Lm/W	114	127	131	132	101	113	116	117
	BUG	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3
180 E Output	IV	18150	20270	20800	20910	15890	17740	18210	18300
	Lm/W	113	127	130	131	99	111	114	114
	BUG	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B4-U0-G3	B4-U0-G3	B4-U0-G3
	V	19810	22100	22710	22850	17680	19720	20270	20390
	Lm/W	124	138	142	143	111	123	127	127
	BUG	B4-U0-G2	B4-U0-G2	B4-U0-G2	B4-U0-G2	B4-U0-G3	B4-U0-G3	B4-U0-G3	B4-U0-G3
	II	20090	22400	23030	23170	17660	19690	20240	20360
	Lm/W	112	124	128	129	98	109	112	113
	BUG	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3
200 E Output	III	20020	22330	22960	23100	17780	19830	20380	20500
	Lm/W	111	124	128	128	99	110	113	114
	BUG	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G4	B3-U0-G4	B3-U0-G4	B3-U0-G4
	IV	19870	22190	22770	22890	17390	19420	19930	20030
	Lm/W	110	123	127	127	97	108	111	111
	BUG	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B4-U0-G3	B4-U0-G3	B4-U0-G3	B4-U0-G3
	V	21700	24200	24880	25030	19370	21600	22210	22340
	Lm/W	121	134	138	139	108	120	123	124
	BUG	B4-U0-G2	B4-U0-G2	B4-U0-G2	B4-U0-G2	B4-U0-G3	B4-U0-G3	B4-U0-G3	B4-U0-G3
220 E Output	II	21710	24220	24890	25050	19090	21290	21880	22020
	Lm/W	109	121	124	125	95	106	109	110
	BUG	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3
	III	21650	24150	24820	24970	19220	21430	22030	22160
	Lm/W	108	121	124	125	96	107	110	111
	BUG	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G4	B3-U0-G4	B3-U0-G4	B3-U0-G4
	IV	21490	24000	24630	24750	18770	20960	21510	21620
	Lm/W	107	120	123	124	94	105	108	108
	BUG	B3-U0-G3	B3-U0-G3	B3-U0-G4	B3-U0-G4	B4-U0-G3	B4-U0-G3	B4-U0-G3	B4-U0-G3
220 E Output	V	23460	26170	26900	27060	20940	23360	24010	24150
	Lm/W	117	131	135	135	105	117	120	121
	BUG	B4-U0-G2	B4-U0-G2	B4-U0-G2	B4-U0-G2	B4-U0-G3	B4-U0-G3	B4-U0-G3	B4-U0-G3
	II	23220	25900	26630	26790	20420	22770	23410	23550
	Lm/W	106	118	121	122	93	104	106	107
	BUG	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3
	III	23160	25830	26550	26710	20550	22920	23560	23700
	Lm/W	105	117	121	121	93	104	107	108
	BUG	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G4	B3-U0-G4	B3-U0-G4	B3-U0-G4
220 E Output	IV	22990	25670	26350	26480	20030	22370	22960	23080
	Lm/W	105	117	120	120	91	102	104	105
	BUG	B3-U0-G3	B3-U0-G4	B3-U0-G4	B3-U0-G4	B4-U0-G3	B4-U0-G3	B4-U0-G3	B4-U0-G3
	V	25090	27980	28760	28940	22400	24980	25680	25830
	Lm/W	114	127	131	132	102	114	117	117
	BUG	B4-U0-G2	B5-U0-G3	B5-U0-G3	B5-U0-G3	B4-U0-G3	B4-U0-G3	B4-U0-G3	B4-U0-G3