Light bars are boring, underpowered, and offer you limited options. They are also inherently mis-engineered thermally and optically due to their form factors and use of low-cost manufacturing techniques. The market is oversaturated with all sorts of lightbars, one brand copying another.

DuraBrite is synonymous to Originality and Engineering Rigor. We therefore created the Stack, redefining the high output outdoor linear luminaire segment in the industry.

The Stack is a modular linear luminaire system that is based on the *Red Dot Winner – Nano Sport*. It is easily customizable by end users in terms of length, light output, color, and beam angle. Each creation offers the same unyielding performance attributes one has come to expect from *DuraBrite*.

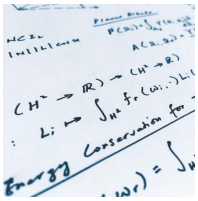
As for optical performance, even though the Nano is phenomenal by itself, the *total is definitely greater than the sum of its parts.* Stacking Nanos side by side amplifies the optical effect. Modularity and the available dimming on each Nano also empower users to have the capability to dial in to their exact requirements.

Each Stack comes with a pair of sturdy end brackets that are precision CNC machined from a thick slab of aerospace grade aluminum. Special provisions are given such that bolt heads will be hidden from sight once installed. That also serves an important purpose – to help reduce aerodynamics drag, working hand-in-hand with the expertly engineered front cover shape of each Nano module. Lockable fine angle adjustments are also made possible by a set of stainless steel rosette gears.

At DuraBrite, we never compromise. Let's get Stacking !!

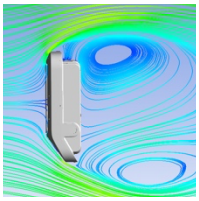
reddot winner
lighting design

Prestigious Design Award



Light Shaping Technology

High Performance Materials



Aerodynamic Design

Best-in-Class Thermal Management

Designed & Assembled In USA

Optical & Electrical Characteristics (All ratings are at 25°C unless otherwise specified)

LED Color, CCT	Typical = 5000K (Neutral white) Lower limit = 4700K; Upper limit = 5300K
Brightness, raw	Double (2) 14k lm Triple (3) 21k lm Quad (4) 28k lm Penta (5) 35k lm Hexa (6) 42k lm Hepta (7) 49k lm Octa (8) 56k lm Nona (9) 63k lm Constant regardless of input voltage
Beam Angle	20 deg (Spot) 80 deg (Flood) for a single Nano
Operating Voltage	Double to Quad: 12VDC – 32VDC Penta to Hexa: 24VDC – 32VDC Recommended Hepta to Nona: 24VDC – 32VDC Mandatory* * Will void warranty if operating voltage is less than 24VDC. Unit may not operate properly due to voltage drop.
Current Draw @ 24VDC	Double (2) 3.4A Triple (3) 5.2A Quad (4) 7.1A Penta (5) 9.1A Hexa (6) 11.2A Hepta (7) 13.4A Octa (8) 15.7A Nona (9) 17.8A
Total Power Consumption	Double (2) 82W Triple (3) 125W Quad (4) 170W Penta (5) 218W Hexa (6) 269W Hepta (7) 322W Octa (8) 377W Nona (9) 430W
AC Adapter Choices	Double to Triple: Mini AC Adapter Quad to Hexa: Standard AC Adapter Hepta to Nona: Pro AC Adapter

Mechanical Characteristics

Water Resistance	IP67
Temperature Range	-40°C to 55°C
Vibration Resistance	MIL-STD-202G (TM201A 4 Cycles)

Warranty Terms

We stand behind our products. This product is covered by DuraBrite's 5 Year Limited Warranty against material and manufacturing defects. However, it does not cover application and conditions that are outside of the product design parameters, abuse, wear-and-tear, and damages due to excessive salt build up at the power sockets. Further details can be found on our website at: https//durabritelights.com/pages/warranty

Wiring Instruction:

If you have a DC Power Source

1. This is a DC light, meaning you should only power it directly using a DC source. You probably either have 12VDC or 24VDC. The light will auto detect the DC voltage. Look up the input voltage recommendation based on your Stack length. For longer stacks, 24VDC or higher is mandatory.
2. Remove the rubber caps from the power socket at the back of each light module (lower right corner).
3. Plug in the power bus connector at each power socket location until you hear and feel the "click", which means the power plug is correctly engaged for IP67 waterproofness. If you are uncertain, remove the power plug and repeat until you get the "click".
4. Connect:
    a. Positive (wire with marking) to Positive
    b. Negative to Negative
5. All wire connections **MUST BE** protected from water intrusion. Otherwise, damages due to water ingress because of unprotected wire connections will not be covered by our warranty.

If you have an AC Power Source

1. STOP NOW !
2. Look up the spec table for recommendation regarding which AC Adapter you need to buy, based on your Stack length. They are available on our website.
3. Once the AC adapter arrives, connect:
    a. Positive (wire with marking) to Positive (see marking on adapter)
    b. Negative to Negative (see marking on adapter)
    c. If you use the Pro Adapter, you must combine the two positive wires from the Output side of the adapter with the power bus wire from the light as one connection. Do the same for the negative. Using only one set of positive and negative from the Pro adapter will NOT provide sufficient power.
4. Make connection on the Input side of the adapter according to the National Electrical Code or equivalent in your country. The adapter can be powered by either 110VAC and 220VAC.

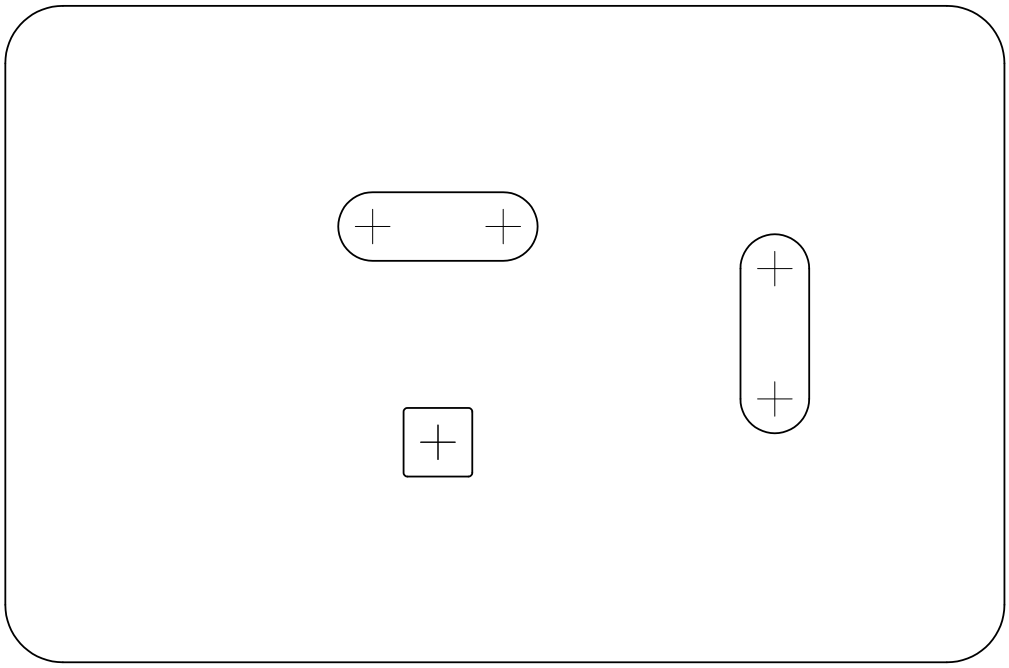
Mechanical Installation:

Mounting slots are sized for either M8 or 5/16 carriage bolts so you can use a locknut to fasten from the bottom side of the assembly (e.g. rollbar sheet metal). See next page for mounting locations available. Print without scaling to achieve a 1:1 template for drilling assist.

It is highly recommended you use a nylon washer to isolate between your stainless steel hardware and the aluminum bracket mounting surfaces. This will prevent scratches of the black anodize finish and will minimize corrosion of your hardware over the years.

Print without Scaling for a 1:1 Template to Assist Hole Drilling & Installation

Left Mounting Bracket



Right Mounting Bracket