

L6895-10



## High-power LED with miniature package

L6895-10 is a high-power LED molded into a miniature, clear plastic package that emits infrared light at a peak emission wavelength of 940 nm. An optical encoder resistant to tough environmental conditions can be configured by combining L6895-10 with S7610-10 (made by Hamamatsu).

### Features

- Pd plated leads
- Miniature package with lens
- Peak emission wavelength: 940 nm

### Applications

- Rotary encoders, etc.

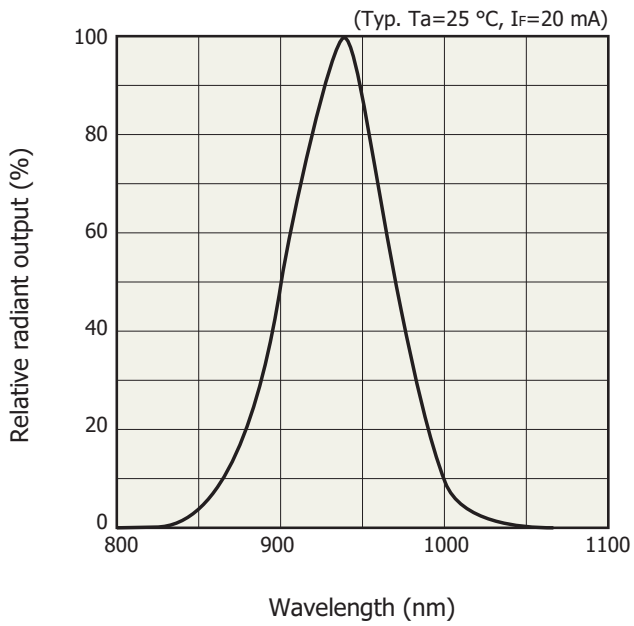
### Absolute maximum ratings (Ta=25 °C)

Parameter	Symbol	Condition	Value	Unit
Forward current	I <sub>F</sub>		60	mA
Reverse voltage	V <sub>R Max.</sub>		5	V
Pulse forward current	I <sub>FP</sub>	Pulse width: 100 μs Duty ratio: 1 %	1.0	A
Power dissipation	P		90	mW
Operating temperature	T <sub>opr</sub>		-30 to +85	°C
Storage temperature	T <sub>stg</sub>		-30 to +85	°C
Soldering	-		260 °C, 3 s at least 2.5 mm away from package surface	-

### Electrical and optical characteristics (Ta=25 °C)

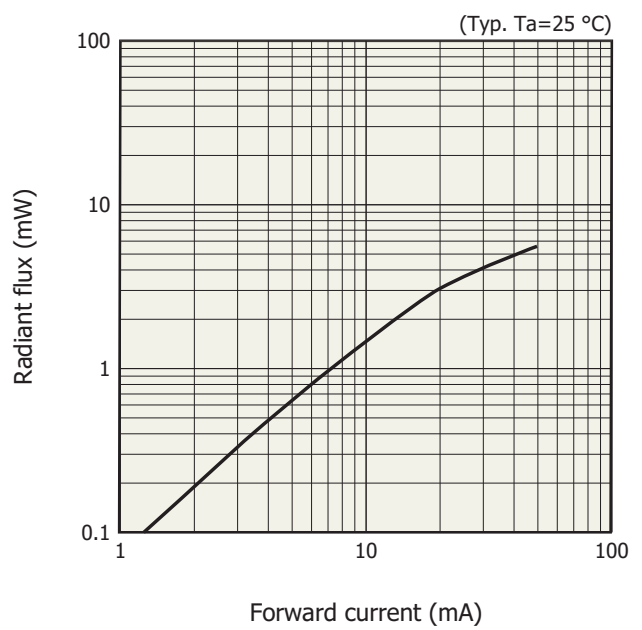
Parameter	Symbol	Condition	Min.	Typ.	Max.	Unit
Peak emission wavelength	λ <sub>p</sub>	I <sub>F</sub> =20 mA	-	940	-	nm
Spectral half width	Δλ	I <sub>F</sub> =20 mA	-	60	-	nm
Forward voltage	V <sub>F</sub>	I <sub>F</sub> =20 mA	-	1.25	1.45	V
Reverse current	I <sub>R</sub>	V <sub>R</sub> =5 V	-	-	10	μA
Radiant flux	φ <sub>e</sub>	I <sub>F</sub> =20 mA	1.2	-	-	mW
Terminal capacitance	C <sub>t</sub>	V <sub>R</sub> =0 V, f=1 MHz	-	20	-	pF

**Emission spectrum**



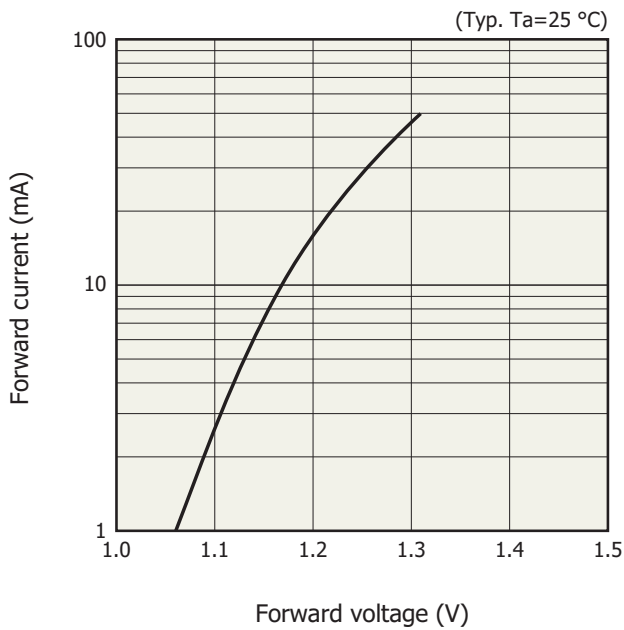
KLEDB0286EA

**Radiant flux vs. forward current**



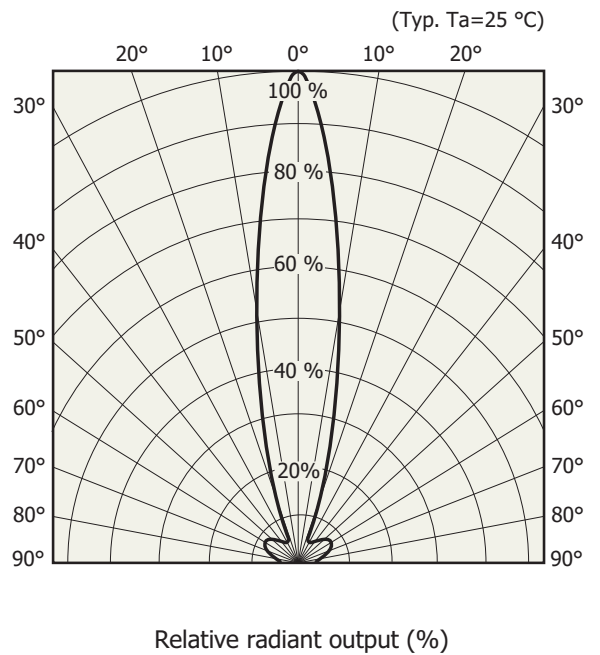
KLEDB0294EA

**Forward current vs. forward voltage**



KLEDB0295EA

**Directivity**



KLEDB0115EA



## Related information

[www.hamamatsu.com/sp/ssd/doc\\_en.html](http://www.hamamatsu.com/sp/ssd/doc_en.html)

### ■ Precautions

- Disclaimer
- Metal, ceramic, plastic packages

### ■ Technical information

- LED

Information described in this material is current as of September 2017.

Product specifications are subject to change without prior notice due to improvements or other reasons. This document has been carefully prepared and the information contained is believed to be accurate. In rare cases, however, there may be inaccuracies such as text errors. Before using these products, always contact us for the delivery specification sheet to check the latest specifications.

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# HAMAMATSU

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