



Mid-IR Products

Product Line Overview

Mid-Infrared Light Emitting Diodes and Photodiodes

We offer:

- Standard LEDs
- Flip-Chip bounded LEDs
- Multi Chip LEDs
- PDs
- LED drivers and PD amplifiers

Standard LEDs

LED chips with circular or ring top contact

Product series	Peak wavelength
LED18	1.85 – 1.88 μm
LED19	1.95 μm
LED20	2.05 μm
LED21	2.15 – 2.18 μm
LED22	2.20 – 2.27 μm
LED23	2.31 – 2.35 μm
LED29	2.84 μm
LED34	3.40 μm

Product series	Peak wavelength
LED35	3.55 μm
LED36	3.65 μm
LED38	3.75 μm
LED39	3.90 μm
LED41	4.05 μm
LED43	4.15 μm
LED46	4.45 μm

Flip-Chip bounded LEDs

LED chip top surface is free of contacts

Product series	Peak wavelength
LED16FC	1.65 μm
LED17FC	1.75 μm
LED18FC	1.85 μm
LED19FC	1.95 μm
LED20FC	2.05 μm

Product series	Peak wavelength
LED21FC	2.15 μm
LED22FC	2.25 μm
LED23FC	2.35 μm
LED34FC	3.40 μm
LED37FC	3.75 μm

Multi Chip LEDs

A number of similar or different LED-chips mounted in a single compact package and driven together or independently.

Flip-Chip bounded LEDs

LED chip top surface is free of contacts






Product series	Peak wavelength
LED16FC	1.65 μm
LED17FC	1.75 μm

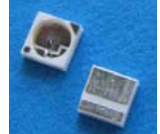


Product series	Peak wavelength
LED21FC	2.15 μm
LED22FC	2.25 μm



Packages

We are offering a range of standard and customized packages for those Mid-IR LEDs and PDs

TO Packages	TO-18	TO-18 with PR	TO-5	TO-5 with PR	TO-8
	with/without window		with/without thermoelectronic module		
					
applied to	LED, PD		LED, PD, Multi Chip LED		Multi Chip LED

SMD Packages	3x3 mm	5x5 mm	5x5 mm with microreflector	5x5 mm for 3 chip array
				
applied to	LED			Multi Chip LED

LED drivers and PD amplifiers

- LED mini-drivers
 - **mD-1c**: provides LED operation in QCW mode at fixed current and frequency
 - **mD-1p**: provides LED operation in pulse mode at fixed current, frequency and pulse duration
- LED drivers
 - **D-31**: provides LED operation in QCW and pulse modes at several frequencies and variable pulse durations and currents
 - **DLT-27**: provides operation and temperature stabilization of LED with built-in thermocooler in QCW and pulse modes at fixed frequency and pulse duration and variable currents
 - **DLT-37**: provides operation and temperature stabilization of LED with built-in thermocooler in QCW and pulse modes at several frequencies, variable pulse durations and currents
- PD Amplifiers
 - **AM-07**: converts the output current signal of a PD into a voltage output with amplification
 - **AMT-07**: provides temperature stabilization and converts the output current signal of a PD with built-in thermocooler into a voltage output with amplification