

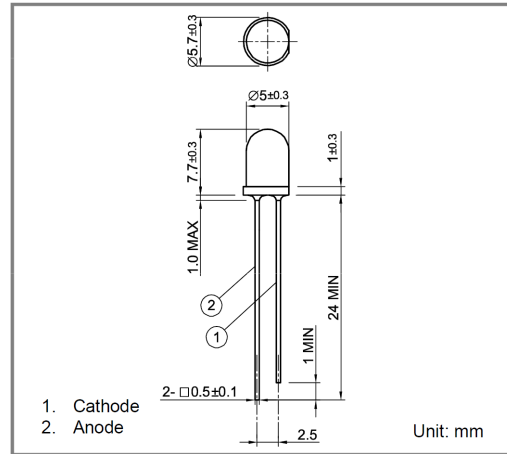
# Plastic Mold Infrared LEDs KEDE1551M51

## Features

- High output power,  $\lambda_p=1550\text{nm}$
- Sharp directivity
- Direct modulation

## Applications

- Optical switches
- Optical instruments



## Specifications

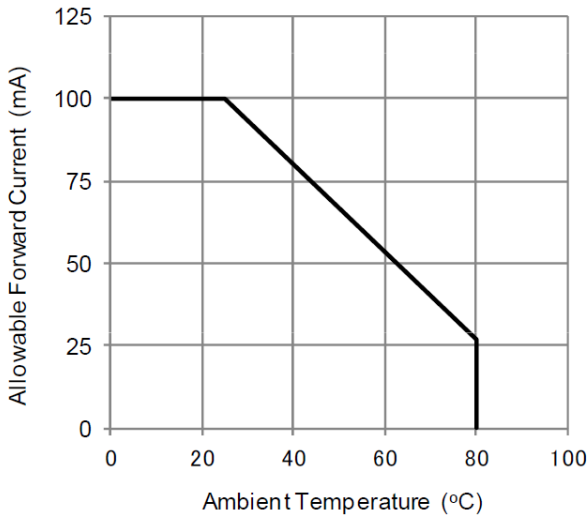
### Absolute Maximum Ratings

Parameter	Symbol	Value	Unit	Conditions
Forward current	$I_F$	100	mA	
Peak forward current	$I_{FP}$	1	A	
Reverse voltage	$V_R$	5	V	
Power dissipation	$P_D$	130	mW	
Operating temperature	$T_{opr}$	-20 to +80		Avoid dew condensation
Storage temperature	$T_{stg}$	-30 to +100		Avoid dew condensation

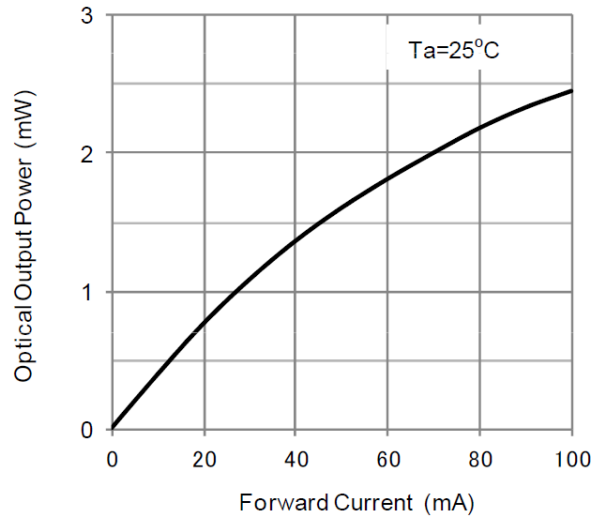
### Electrical and Optical characteristics

Parameter	Symbol	Value			Unit	Conditions
		Min.	Typ.	Max		
Forward voltage	$V_F$		0.75	1.3	V	$I_F=50\text{mA}$
Reverse Current	$I_R$			10	$\mu\text{A}$	$V_R=1\text{V}$
Optical output power	$P_O$		1.6		mW	$I_F=50\text{mA}$
Peak wavelength	$\lambda_p$	1500	1550	1600	nm	$I_F=50\text{mA}$
Spectral width			120		nm	$I_F=50\text{mA}$
Half angle	$2\theta$		50		deg	$I_F=50\text{mA}$

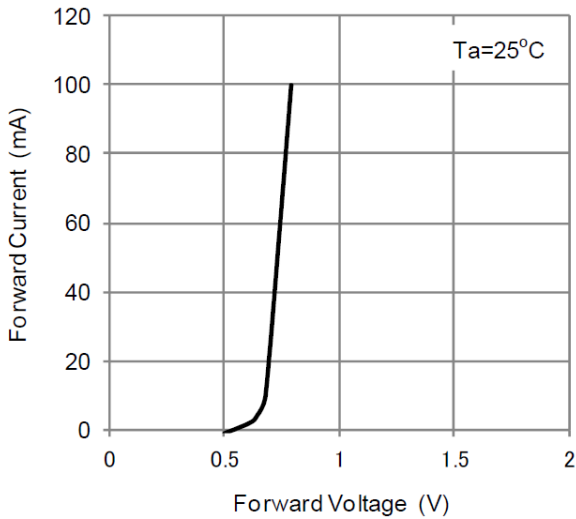
**Allowable Forward Current - Ambient Temperature**



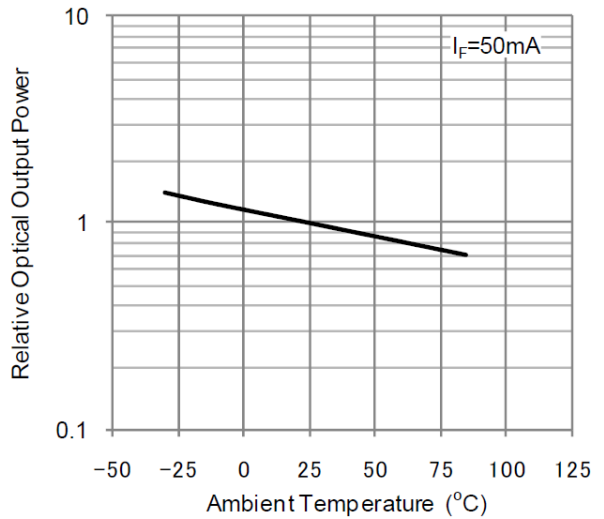
**Optical Output Power - Forward Current**



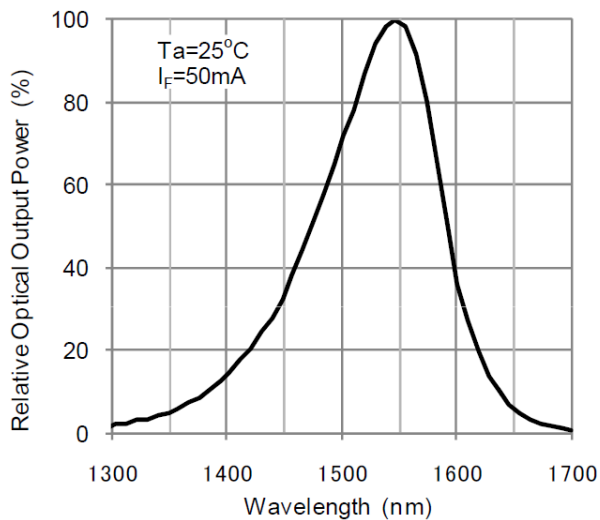
**Forward Current - Forward Voltage**



**Relative Optical Output Power - Ambient Temperature**



**Spectral Distribution**



**Directivity**

