



■ Absolute Maximum Ratings

Ta = 25°C

		Red	Green	Orange	Unit
		NAR / NKR	NAG / NKG	NAA / NKA	
Power Dissipation	Pb	40	48	48	mW
Forward Current	IF	20	20	20	mA
Peak Forward Current	IFM	80	80	80	mA
Reverse Voltage	VR	4	4	4	V
Operating Temp.	Topr	-30~+85	-30~+85	-30~+85	°C
Storage Temp.	Tstg	-30~+85	-30~+85	-30~+85	°C
Derating *	ΔIF	0.33	0.33	0.33	mA/°C

* The current derating for operation applies when temperature is above 25°C.

• IFM Condition : tw ≤ 1msec, Duty ≤ 1/20

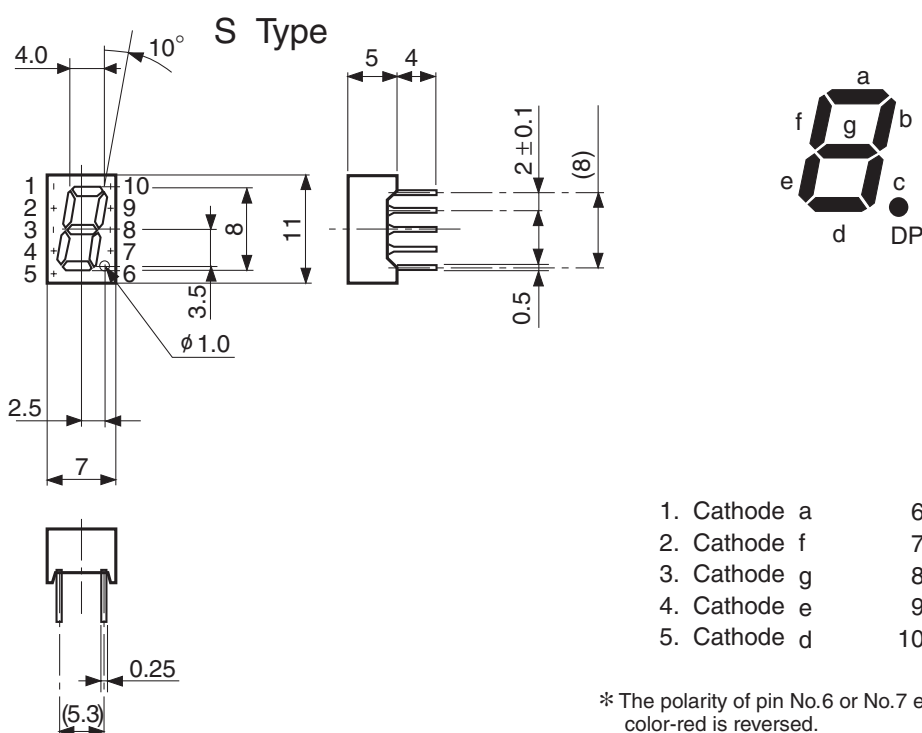
■ Electro-Optical Characteristics

Ta = 25°C

Part No.		Case Color	Chip		Lumminous Intensity I _v					Wavelength λ _p		Forward Voltage V _F			Reverse Current I _R	
Anode Common	Cathode Common				Rank B		Rank C		I _F	TYP	I _F	TYP	MAX	I _F	MAX	V _R
			Material	Emitted Color	MIN	TYP	MIN	TYP								
NAR131S	NKR131S	Black	GaAlAs	Red	1.4	2.8	2.8	5.6	10	660	10	1.7	2.0	10	100	4
NAR133S	NKR133S	Gray														
NAG131SP	NKG131SP	Black	GaP	Green	1	2	—	—	10	565	10	2.0	2.4	20	100	4
NAG133SP	NKG133SP	Gray														
NAA131S	NKA131S	Black	GaAsP	Orange	0.6	1.2	—	—	10	605	10	2.0	2.4	10	100	4
NAA133S	NKA133S	Gray														
Units					mcd	mcd	mcd	mcd	mA	nm	mA	V	V	mA	μA	V

■ Package Dimensions

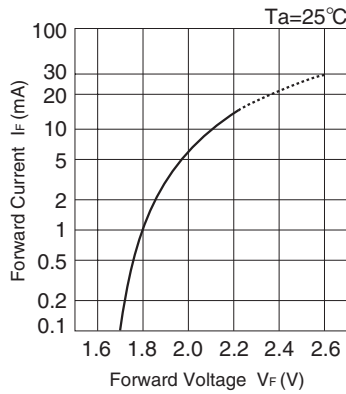
Unit : mm



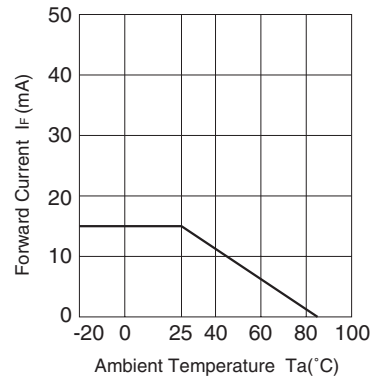
* The polarity of pin No.6 or No.7 except for the emitted color-red is reversed.

Tolerance : ± 0.25mm

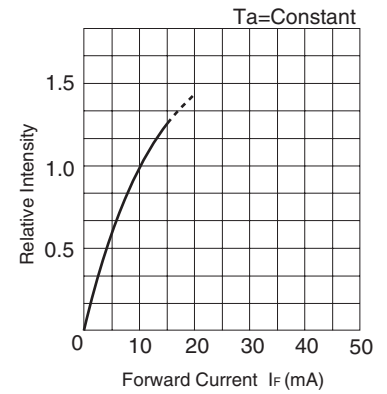
■ Forward Voltage vs. Forward Current



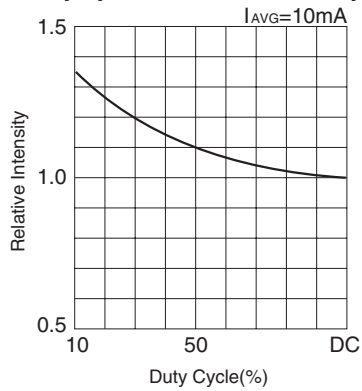
■ Ambient Temperature vs. Maximum Forward Current



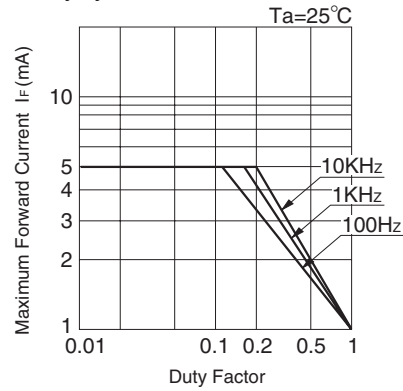
■ Forward Current vs. Relative Intensity



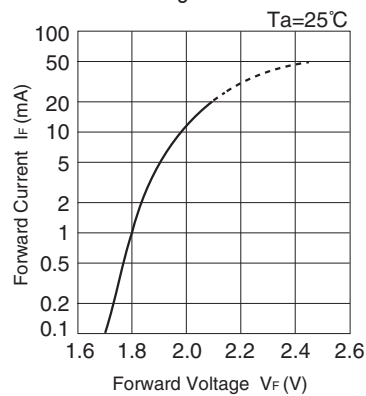
■ Duty Cycle vs. Relative Intensity



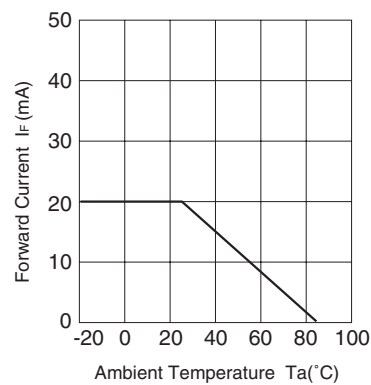
■ Duty Cycle vs. Maximum Forward Current



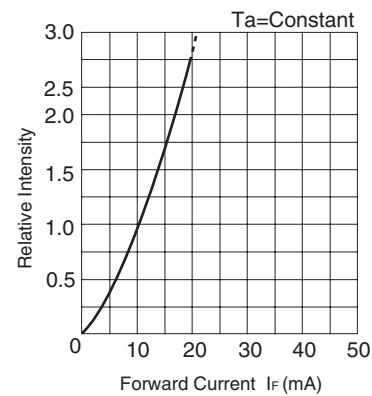
■ Forward Voltage vs. Forward Current



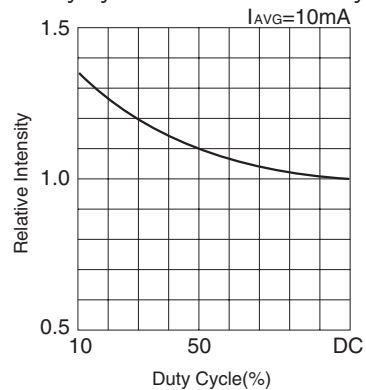
■ Ambient Temperature vs. Maximum Forward Current



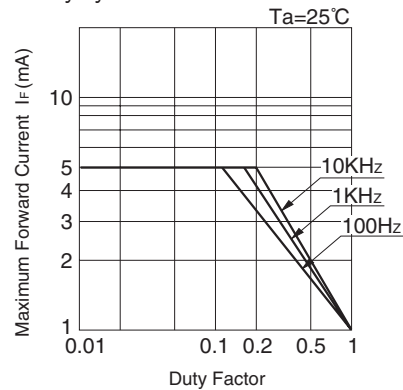
■ Forward Current vs. Relative Intensity



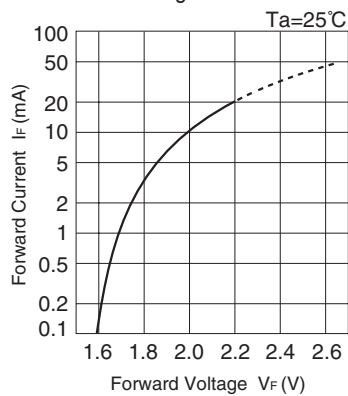
■ Duty Cycle vs. Relative Intensity



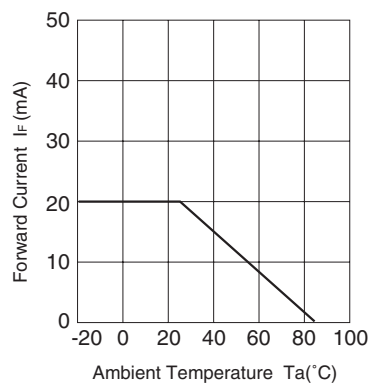
■ Duty Cycle vs. Maximum Forward Current



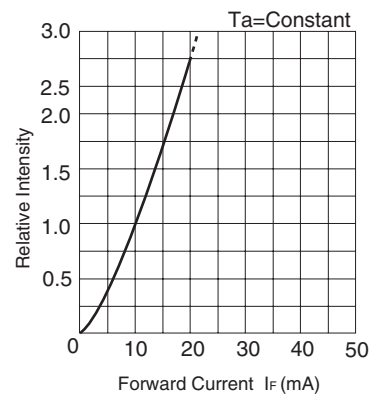
■ Forward Voltage vs. Forward Current



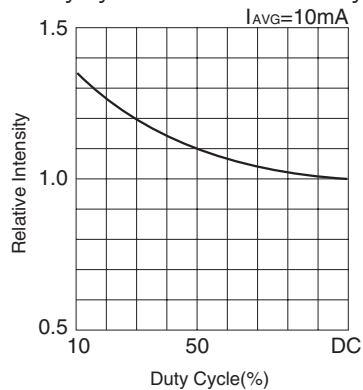
■ Ambient Temperature vs. Maximum Forward Current



■ Forward Current vs. Relative Intensity



■ Duty Cycle vs. Relative Intensity



■ Duty Cycle vs. Maximum Forward Current

