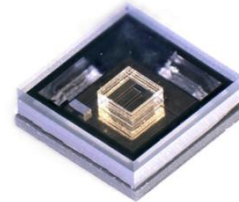
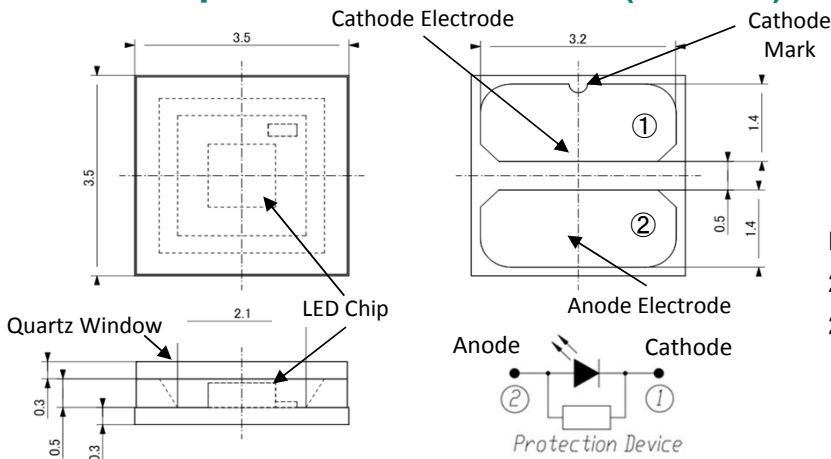


Developing High-power SMD package

MODEL xFxZV-0F001

3.5 x 3.5mm SMD Flat Top Type

Mechanical Specifications and Materials (Unit: mm)



Product ID
275nm: DF7ZV-0F001
280nm: DF8ZV-0F001

Typical Optical-Electrical Characteristics

IF=350mA, Ts=25°C

| Item | Symbol | Unit | DF7ZV | | | DF8ZV | | |
|----------------------------|----------|------|-------|-----------|-----|-------|-----------|-----|
| | | | Min | Typ | Max | Min | Typ | Max |
| Peak Wavelength(*) | ρ | nm | 270 | 275 | 280 | 275 | 280 | 285 |
| Radiant Flux(**) | P_o | mW | - | 40 | - | - | 40 | - |
| Full Width at Half Maximum | Δ | nm | - | 11 | - | - | 11 | - |
| Forward Voltage | V_F | V | - | 6.1 | - | - | 6.1 | - |

IF=800mA, Ts=25°C

| Item | Symbol | Unit | DF7ZV | | | DF8ZV | | |
|----------------------------|----------|------|-------|-------------|-----|-------|-------------|-----|
| | | | Min | Typ | Max | Min | Typ | Max |
| Peak Wavelength(*) | ρ | nm | - | (275) | - | - | (280) | - |
| Radiant Flux(**) | P_o | mW | - | (75) | - | - | (75) | - |
| Full Width at Half Maximum | Δ | nm | - | (11) | - | - | (11) | - |
| Forward Voltage | V_F | V | - | (6.9) | - | - | (6.9) | - |

(*)Peak Wavelength Measurement tolerance is ± 3 nm.

(**)Radiant Flux Measurement tolerance is $\pm 10\%$.

Specification and dimension are subject to change for improvement without notice.

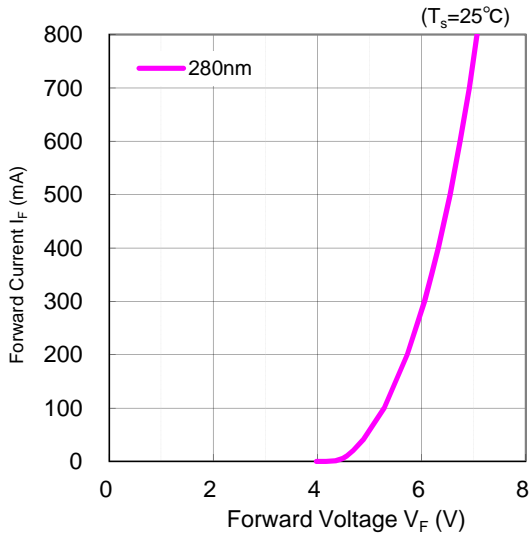
| | |
|--|--|
| | WARNING |
| | <ul style="list-style-type: none"> • LEDs emit very strong UV radiation. • Do not look at the LED light with the naked eye or irradiate the skin. UV radiation can harm your eyes and skin. • To prevent UV radiation exposure, wear protective eyewear and protective equipment. • If LEDs are embedded in devices, please indicate warning labels against the UV light LED used. • Keep out of reach of children. |

Developing High-power SMD package

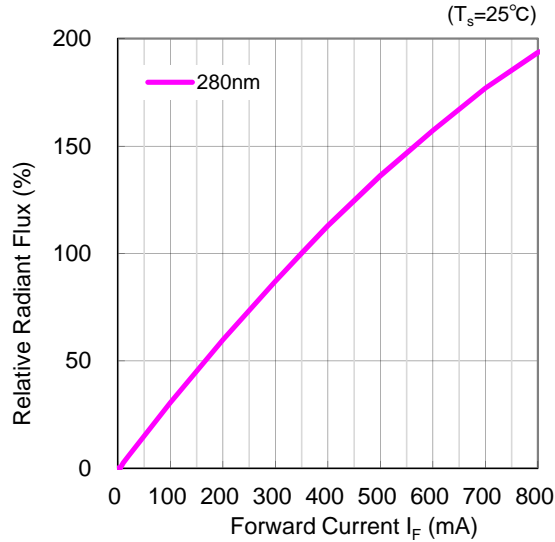
MODEL xFxZV-0F001

3.5 x 3.5mm SMD Flat Top Type

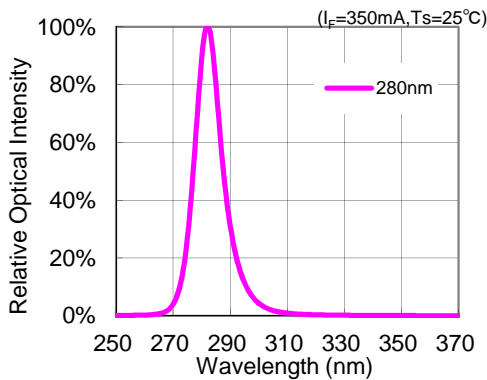
Forward Voltage vs Forward Current



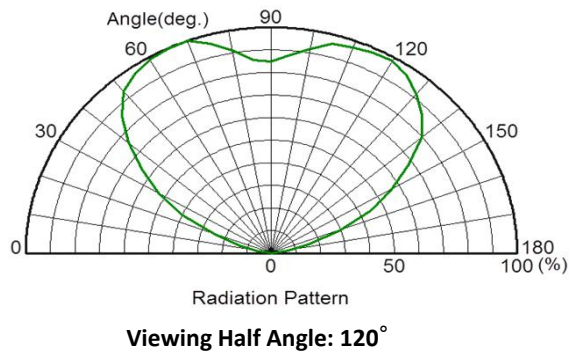
Forward Current vs Radiant Flux



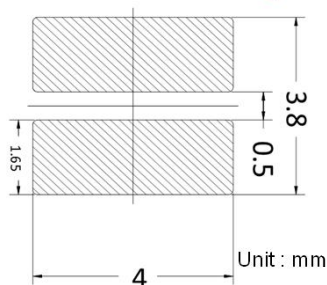
Spectrum



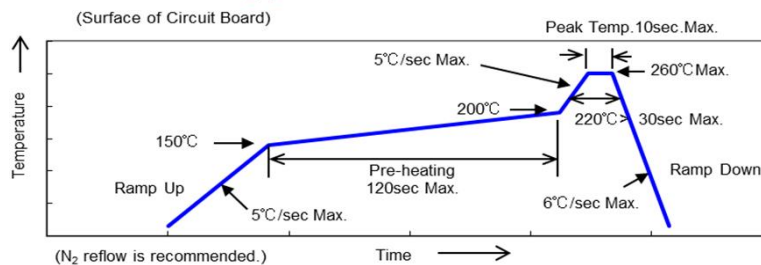
Radiation Pattern



Recommended solder pad



Reflow soldering profile



[Japan] DOWA Electronics Materials Co., Ltd
 Akihabara UDX Bldg. 4-14-1 Sotokanda, Chiyoda-ku, Tokyo 101-0021, Japan / Phone: +81-3-6847-1253

[USA] DOWA International Corp. San Jose office
 4320 Stevens Creek Blvd. Suite 125, San Jose CA 95129, USA / Phone: +1-408-236-7560

[EU] DOWA HD Europe GmbH
 Ostendstrasse 196, D-90482, Nurnberg, Germany / Phone: +49-911-56989-320