



■ Features :

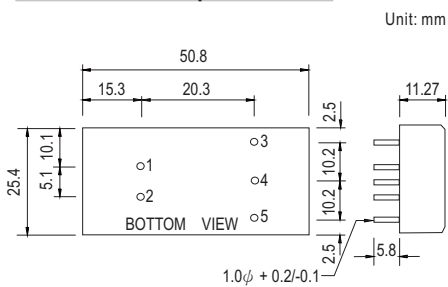
- 2:1 wide input range
- 4:1 wide input range(option)
- 1000VDC I/O isolation
- 3000VDC I/O isolation(option)
- Built-in EMI filter
- Protections: Short circuit / Overload
- Cooling by free air convection
- Six-sided shield metal case
- 100% burn-in test
- Low cost / High reliability
- Approvals: FCC / CE
- 2 years warranty



**SPECIFICATION**

| ORDER NO.            |                              | DKE10A-05  | DKE10B-05 | DKE10C-05 | DKE10A-12    | DKE10B-12 | DKE10C-12 | DKE10A-15      | DKE10B-15 | DKE10C-15 | DKE10A-24    | DKE10B-24 | DKE10C-24 |
|----------------------|------------------------------|--|-----------|-----------|--------------|-----------|-----------|----------------|-----------|-----------|--------------|-----------|-----------|
| OUTPUT               | DC VOLTAGE                   | ±5V  |           |           | ±12V         |           |           | ±15V           |           |           | ±24V         |           |           |
|                      | CURRENT RANGE                | ±100 ~ ±1000mA   |           |           | ±42 ~ ±420mA |           |           | ±33.3 ~ ±333mA |           |           | ±21 ~ ±210mA |           |           |
|                      | RATED POWER                  | 10W  |           |           |              |           |           |                |           |           |              |           |           |
|                      | RIPPLE & NOISE (max.) Note.2 | 50mVp-p  |           |           | 60mVp-p      |           |           | 60mVp-p        |           |           | 80mVp-p      |           |           |
|                      | LINE REGULATION Note.3       | ±0.3%  |           |           |              |           |           |                |           |           |              |           |           |
|                      | LOAD REGULATION Note.4       | ±0.5%  |           |           |              |           |           |                |           |           |              |           |           |
|                      | VOLTAGE ACCURACY             | ±2.0%  |           |           |              |           |           |                |           |           |              |           |           |
|                      | SWITCHING FREQUENCY          | 250KHz min.  |           |           |              |           |           |                |           |           |              |           |           |
| INPUT                | VOLTAGE RANGE                | A: 9 ~ 18VDC B: 18 ~ 36VDC C: 36 ~ 72VDC   |           |           |              |           |           |                |           |           |              |           |           |
|                      | EFFICIENCY (Typ.)            | 78%  | 81%       | 82%       | 80%          | 80%       | 83%       | 80%            | 80%       | 82%       | 82%          | 81%       | 85%       |
|                      | DC CURRENT                   | Full load: A: 1100mA B: 530mA C: 270mA<br>No load: A: 30mA B: 16mA C: 8mA  |           |           |              |           |           |                |           |           |              |           |           |
|                      | FILTER                       | Pi network   |           |           |              |           |           |                |           |           |              |           |           |
|                      | PROTECTION                   | Fuse recommended   |           |           |              |           |           |                |           |           |              |           |           |
| PROTECTION (Note. 5) | OVER CURRENT                 | 160% ~ 250% rated output power<br>Protection type : Hiccup mode, recovers automatically after fault condition is removed         |           |           |              |           |           |                |           |           |              |           |           |
|                      | SHORT CIRCUIT                | All output equipped with short circuit<br>Protection type : Hiccup mode, recovers automatically after fault condition is removed |           |           |              |           |           |                |           |           |              |           |           |
| ENVIRONMENT          | WORKING TEMP.                | -25 ~ +71°C (Refer to "Derating Curve")  |           |           |              |           |           |                |           |           |              |           |           |
|                      | WORKING HUMIDITY             | 20% ~ 90% RH non-condensing  |           |           |              |           |           |                |           |           |              |           |           |
|                      | STORAGE TEMP., HUMIDITY      | -25 ~ +105°C, 10 ~ 95% RH  |           |           |              |           |           |                |           |           |              |           |           |
|                      | TEMP. COEFFICIENT            | ±0.03% / °C (0 ~ 50°C)   |           |           |              |           |           |                |           |           |              |           |           |
|                      | VIBRATION                    | 10 ~ 500Hz, 2G 10min./1cycle, period for 60min. each along X, Y, Z axes  |           |           |              |           |           |                |           |           |              |           |           |
| SAFETY & EMC         | WITHSTAND VOLTAGE            | I/P-O/P:1KVDC  |           |           |              |           |           |                |           |           |              |           |           |
|                      | ISOLATION RESISTANCE         | I/P-O/P: 100M Ohms / 500VDC / 25°C / 70% RH  |           |           |              |           |           |                |           |           |              |           |           |
|                      | EMC EMISSION                 | Compliance to EN55032 Class A, FCC part 15 Class A   |           |           |              |           |           |                |           |           |              |           |           |
|                      | EMC IMMUNITY                 | Compliance to EN61000-4-2,3,4,5,6,8, light industry level, criteria A  |           |           |              |           |           |                |           |           |              |           |           |
| OTHERS               | MTBF                         | 500Khrs min. MIL-HDBK-217F(25°C)   |           |           |              |           |           |                |           |           |              |           |           |
|                      | DIMENSION                    | 50.8*25.4*11.2mm or 2**1**0.44" inch (L*W*H)   |           |           |              |           |           |                |           |           |              |           |           |
|                      | WEIGHT                       | 32g  |           |           |              |           |           |                |           |           |              |           |           |

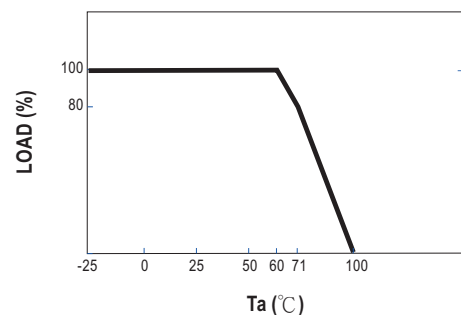
■ Mechanical Specification



■ Pin Configuration

| Pin No. | Output |
|---------|--------|
| 1       | +Vin   |
| 2       | -Vin   |
| 3       | +Vout  |
| 4       | COM    |
| 5       | -Vout  |

■ Derating Curve



**NOTE**

- 1.All parameters are specified at normal input, rated load, 25°C 70% RH ambient.
- 2.Ripple & noise are measured at 20MHz by using a 12" twisted pair terminated with a 0.1uf & 47uf capacitor.
- 3.Line regulation is measured from low line to high line at rated load.
- 4.Load regulation is measured from 10% to 100% rated load.
- 5.Please prevent the converter from operating in overload or short circuit condition for more than 30 seconds.