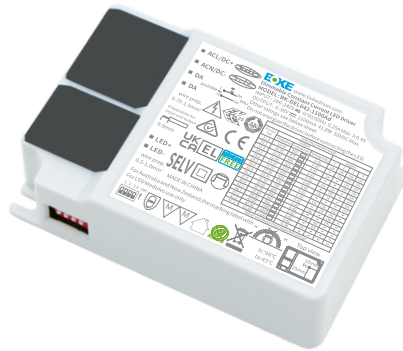


**Constant current independent dimmable driver**  
**DEL Series suffix d(DALI-2+pushDIIM)**



**Features**

- Support DALI-2+pushDIM dimming mode
- 16-level current output can be realized through external DIP-switch, easier to adjust the luminaire power
- Soft dimming and flicker-free at any brightness, meets the new requirements of ErP certification
- Using HPC patented technology at any dimming level, the brightness of the lights is the same
- Dimming range 1%~100%, output current accuracy 2%
- Standby power input<0.5W, meets the ErP requirements of new certification
- High PF, high efficiency, low THD
- Screw-free and pressing type strain relief, easier install
- Independent input and output strain relief, stronger wiring
- Supports 0.75-1.5mm<sup>2</sup> input wires, stronger wiring
- Intelligent LED hot-plug protection function
- SELV and Class II design, suitable for use inside of the light
- Passed CE,ENEC,UKCA,RCM,CCC,DALI-2 and other certifications
- IP20 protection grade, indoor use
- Nominal life-time up to 100,000 h
- 5-year guarantee

**Interfaces**

- DALI-2(DALI-2 DT6)
- PUSH(pushDIM)

**Functions**

- Support central emergency application (dimming normal in DC input)
- Support self-contained emergency application
- Protective features (short-circuit, overload,no-load, hot plug-in protection )

**Suitable for lights**

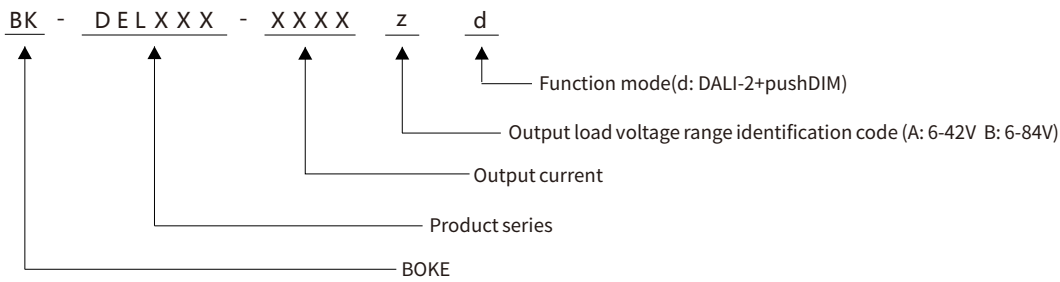
- Suitable for lights with independent drivers such as downlights, spotlights, panel lights, etc
- Not suitable for lights with built-in drivers

**Typical applications**

- LED indoor lighting
- LED office lighting
- LED commercial lighting



### Model coding rules of DEL series



### Function list

Model	suffix	Wired dimming		Advanced functions
		DALI-2	pushDIM	EL
BK-DEL010 BK-DEL022 BK-DEL028 BK-DEL030 BK-DEL042 BK-DEL060	<b>d</b>	√	√	√

\* The description in this specification is only applicable to the products with the suffix d and the model are DEL030,DEL042 and DEL060 .

### Model list

Model	Input voltage	Output power	Output voltage	Output current	Dimension	Certifications
BK-DEL010-0350Ad	200-240VAC	10W	6-30/36/40/42VDC	0.10-0.35A	L117*W45.5*H24mm	CE, ENEC, UKCA, RCM, CCC, EL, DALI-2
BK-DEL022-0600Ad	200-240VAC	22W	6-38/42VDC	0.225-0.60A	L117*W45.5*H29mm	CE, ENEC, UKCA, RCM, CCC, EL, DALI-2
BK-DEL028-0750Ad	200-240VAC	28W	6-38/40/42VDC	0.30-0.75A	L117*W45.5*H29mm	CE, ENEC, UKCA, RCM, CCC, EL, DALI-2
BK-DEL030-0800Ad	200-240VAC	30W	6-38/40/42VDC	0.25-0.80A	L103*W68.5*H30.5mm	CE, ENEC, UKCA, RCM, CCC, EL, DALI-2
BK-DEL042-0800Bd	200-240VAC	42W	6-52/54/60/64/70/76/84VDC	0.25-0.80A	L103*W68.5*H30.5mm	CE, ENEC, UKCA, RCM, CCC, EL, DALI-2
BK-DEL042-1100Ad	200-240VAC	42W	6-38/40/42VDC	0.45-1.10A	L103*W68.5*H30.5mm	CE, ENEC, UKCA, RCM, CCC, EL, DALI-2
BK-DEL060-2000Ad	200-240VAC	60W	6-30/32/34/36/38/40/42VDC	0.80-2.00A	L123.5*W79.5*H31mm	CE, ENEC, UKCA, RCM, CCC, EL, DALI-2

\* The description in this specification is only applicable to the products with the suffix d and the model are DEL030,DEL042 and DEL060 .

## Technical data

Product model	BK-DEL030-0800Ad
<b>Output parameters</b>	
Regulation method	Constant Current
Rated output current	0.25-0.8A
Rated output voltage	6V - 38V/40V/42V
Rated output power	30.4W Max
Output current adjustment	DIP S.W(16 levels)
Output current ripple LF	±2%
Output current accuracy	±2%
Linear regulation	±1%
Load regulation	±1%
No load output voltage	50V
Flicker-free(typical)	Modulation depth =0.1% , Pst LM = 0.001, SVM = 0.004,(The above parameters are obtained from testing the panel lights)
<b>Input parameters</b>	
Rated input voltage	200-240VAC 200-240VDC
Rated input voltage	180-264VAC 200-264VDC
Input voltage shock	<380 V AC, 1 h
Input current	<0.18A (AC input)
Input frequency	0/50/60Hz
Input power factor	0.95 (230V AC & Full load)
Input THD	7% (230V AC & Full load)
Efficiency(typical)	87% (230V AC & Full load)
In-rush current	3.95A peak ,180us duration(50 % Ipeak), see the description below for details
Start/Switchover/Turn off	<0.6s(AC start),<0.6s(DC start),<0.3s(AC/DC switchover),<0.5s(Turn off )
Switching cycles	> 50,000 switching cycles
Power consumption	Full load(Pmax):30.4W, No load(Pno): N/A, On stand-by(Psb) : <0.5W, Network stand-by(Pnet) : N/A
<b>Safety</b>	
Withstand voltage	I/P-O/P:3750V AC, I/P-DALI: 1500V AC, O/P-DALI: 1500V AC.
Mains surge capability	L-N:2KV
Leakage current	<0.7mA (230V AC & Full load)
Isolation resistance	I/P-O/P:100MΩ/500Vdc/25°C/70% RH
<b>Control interface</b>	
DALI dimming port	Voltage range: 9.5-22.5V, typical 16V, interface current consumption: 1.8mA
pushDIM dimming port	Voltage range: 180-264V 47/63Hz
1-10V 3in1 dimming port	N/A
Auxiliary power supply	N/A
Dimming range	1%-100%
Dimming drive mode	AM(amplitude modulation)
<b>Emergency support</b>	
Central emergency system	Supported(dimming normal in DC input)
Self-contained emergency	Supported
<b>Environment &amp; Life time</b>	
Operating temperature	Ta=-20-45°C
Case temperature	Tc=90°C
Operating humidity	5-85% RH, not condensed
Storage temp./humidity	-40-80°C, 5-85% RH, not condensed
IP grade	IP20
MTBF	500,000H,MIL-HDBK-217F(25°C)
Life-time	Nominal life-time up to 100,000 h, see the description below for details
Vibration resistant	10~500Hz,5G 12min./1cycle,period for 72min. each along X,Y,Z axes
Acoustic Noise	<25dB(30cm, Full load)
Environmental protection	RoHS
<b>Certifications and standards</b>	
Certified	CE, ENEC, UKCA, RCM, CCC, EL, DALI-2
Safety	EN61347-1, EN61347-2-13, EN62384
EMC	EN55015, EN61000-3-2 , EN61000-3-3, EN61000-4-2,3,4,5,6,8,11, EN61547
DALI-2	IEC 62386-101(DALI-2), IEC 62386-102(DALI-2), IEC 62386-207(DALI-2)
EL	Compatible IEC 61347-2- 13 Annex J , compatible with EN 60598-2-22 and EN 50172
RF	N/A

## Remarks

- 1.By default, all parameter are measured at 230VAC input, full load and 25°C of ambient temperature.
- 2.The driver can not be installed inside the light. when the driver is used with the light, the EMC of the whole light needs to be tested.

**Technical data**

Product model	BK-DEL042-0800Bd
<b>Output parameters</b>	
Regulation method	Constant Current
Rated output current	0.25-0.8A
Rated output voltage	6V - 52V/54V/60V/64V/70V/76V/84V
Rated output power	41.6W Max
Output current adjustment	DIP S.W(16 levels)
Output current ripple LF	±2%
Output current accuracy	±2%
Linear regulation	±1%
Load regulation	±1%
No load output voltage	100V
Flicker-free(typical)	Modulation depth =0.1% , Pst LM = 0.001, SVM = 0.001,(The above parameters are obtained from testing the panel lights)
<b>Input parameters</b>	
Rated input voltage	200-240VAC 200-240VDC
Rated input voltage	180-264VAC 200-264VDC
Input voltage shock	<380 V AC, 1 h
Input current	<0.25A (AC input)
Input frequency	0/50/60Hz
Input power factor	0.95 (230V AC & Full load)
Input THD	7% (230V AC & Full load)
Efficiency(typical)	89% (230V AC & Full load)
In-rush current	8A peak ,296us duration(50 % Ipeak), see the description below for details
Start/Switchover/Turn off	<0.6s(AC start),<0.6s(DC start),<0.3s(AC/DC switchover),<0.5s(Turn off )
Switching cycles	> 50,000 switching cycles
Power consumption	Full load(Pmax):41.6W, No load(Pno): N/A, On stand-by(Psb) : <0.5W, Network stand-by(Pnet) : N/A
<b>Safety</b>	
Withstand voltage	I/P-O/P:3750V AC, I/P-DALI: 1500V AC, O/P-DALI: 1500V AC.
Mains surge capability	L-N:2KV
Leakage current	<0.7mA (230V AC & Full load)
Isolation resistance	I/P-O/P:100MΩ/500Vdc/25°C/70% RH
<b>Control interface</b>	
DALI dimming port	Voltage range: 9.5-22.5V, typical 16V, interface current consumption: 1.8mA
pushDIM dimming port	Voltage range: 180-264V 47/63Hz
1-10V 3in1 dimming port	N/A
Auxiliary power supply	N/A
Dimming range	1%-100%
Dimming drive mode	AM(amplitude modulation)
<b>Emergency support</b>	
Central emergency system	Supported(dimming normal in DC input)
Self-contained emergency	Supported
<b>Environment &amp; Life time</b>	
Operating temperature	Ta=-20-45°C
Case temperature	Tc=90°C
Operating humidity	5-85% RH, not condensed
Storage temp./humidity	-40-80°C, 5-85% RH, not condensed
IP grade	IP20
MTBF	500,000H,MIL-HDBK-217F(25°C)
Life-time	Nominal life-time up to 100,000 h, see the description below for details
Vibration resistant	10~500Hz,5G 12min./1cycle,period for 72min. each along X,Y,Z axes
Acoustic Noise	<25dB(30cm, Full load)
Environmental protection	RoHS
<b>Certifications and standards</b>	
Certified	CE, ENEC, UKCA, RCM, CCC, EL, DALI-2
Safety	EN61347-1, EN61347-2-13, EN62384
EMC	EN55015, EN61000-3-2 , EN61000-3-3, EN61000-4-2,3,4,5,6,8,11, EN61547
DALI-2	IEC 62386-101(DALI-2), IEC 62386-102(DALI-2), IEC 62386-207(DALI-2)
EL	Compatible IEC 61347-2- 13 Annex J , compatible with EN 60598-2-22 and EN 50172
RF	N/A

**Remarks**

- 1.By default, all parameter are measured at 230VAC input, full load and 25°C of ambient temperature.
- 2.The driver can not be installed inside the light. when the driver is used with the light, the EMC of the whole light needs to be tested.

## Technical data

Product model	BK-DEL042-1100Ad
<b>Output parameters</b>	
Regulation method	Constant Current
Rated output current	0.45-1.1A
Rated output voltage	6V - 38V/40V/42V
Rated output power	41.8W Max
Output current adjustment	DIP S.W(16 levels)
Output current ripple LF	±2%
Output current accuracy	±2%
Linear regulation	±1%
Load regulation	±1%
No load output voltage	50V
Flicker-free(typical)	Modulation depth =0.1% , Pst LM = 0.003, SVM = 0.005,(The above parameters are obtained from testing the panel lights)
<b>Input parameters</b>	
Rated input voltage	200-240VAC 200-240VDC
Rated input voltage	180-264VAC 200-264VDC
Input voltage shock	<380 V AC, 1 h
Input current	<0.25A (AC input)
Input frequency	0/50/60Hz
Input power factor	0.95 (230V AC & Full load)
Input THD	7% (230V AC & Full load)
Efficiency(typical)	88% (230V AC & Full load)
In-rush current	7.9A peak ,304us duration(50 % Ipeak), see the description below for details
Start/Switchover/Turn off	<0.6s(AC start),<0.6s(DC start),<0.3s(AC/DC switchover),<0.5s(Turn off )
Switching cycles	> 50,000 switching cycles
Power consumption	Full load(Pmax):41.8W, No load(Pno): N/A, On stand-by(Psb) : <0.5W, Network stand-by(Pnet) : N/A
<b>Safety</b>	
Withstand voltage	I/P-O/P:3750V AC, I/P-DALI: 1500V AC, O/P-DALI: 1500V AC.
Mains surge capability	L-N:2KV
Leakage current	<0.7mA (230V AC & Full load)
Isolation resistance	I/P-O/P:100MΩ/500Vdc/25°C/70% RH
<b>Control interface</b>	
DALI dimming port	Voltage range: 9.5-22.5V, typical 16V, interface current consumption: 1.8mA
pushDIM dimming port	Voltage range: 180-264V 47/63Hz
1-10V 3in1 dimming port	N/A
Auxiliary power supply	N/A
Dimming range	1%-100%
Dimming drive mode	AM(amplitude modulation)
<b>Emergency support</b>	
Central emergency system	Supported(dimming normal in DC input)
Self-contained emergency	Supported
<b>Environment &amp; Life time</b>	
Operating temperature	Ta=-20-45°C
Case temperature	Tc=90°C
Operating humidity	5-85% RH, not condensed
Storage temp./humidity	-40-80°C, 5-85% RH, not condensed
IP grade	IP20
MTBF	500,000H,MIL-HDBK-217F(25°C)
Life-time	Nominal life-time up to 100,000 h, see the description below for details
Vibration resistant	10~500Hz,5G 12min./1cycle,period for 72min. each along X,Y,Z axes
Acoustic Noise	<25dB(30cm, Full load)
Environmental protection	RoHS
<b>Certifications and standards</b>	
Certified	CE, ENEC, UKCA, RCM, CCC, EL, DALI-2
Safety	EN61347-1, EN61347-2-13, EN62384
EMC	EN55015, EN61000-3-2 , EN61000-3-3, EN61000-4-2,3,4,5,6,8,11, EN61547
DALI-2	IEC 62386-101(DALI-2), IEC 62386-102(DALI-2), IEC 62386-207(DALI-2)
EL	Compatible IEC 61347-2- 13 Annex J , compatible with EN 60598-2-22 and EN 50172
RF	N/A

## Remarks

- 1.By default, all parameter are measured at 230VAC input, full load and 25°C of ambient temperature.
- 2.The driver can not be installed inside the light. when the driver is used with the light, the EMC of the whole light needs to be tested.

**Technical data**

Product model	BK-DEL060-2000Ad
<b>Output parameters</b>	
Regulation method	Constant Current
Rated output current	0.8-2.0A
Rated output voltage	6V - 30V/32V/34V/36V/38V/40V/42V
Rated output power	60W Max
Output current adjustment	DIP S.W(16 levels)
Output current ripple LF	±2%
Output current accuracy	±2%
Linear regulation	±1%
Load regulation	±1%
No load output voltage	50V
Flicker-free(typical)	Modulation depth =0.1% , Pst LM = 0.011, SVM = 0.006,(The above parameters are obtained from testing the panel lights)
<b>Input parameters</b>	
Rated input voltage	200-240VAC 200-240VDC
Rated input voltage	180-264VAC 200-264VDC
Input voltage shock	<380 V AC, 1 h
Input current	<0.36A (AC input)
Input frequency	0/50/60Hz
Input power factor	0.95 (230V AC & Full load)
Input THD	7% (230V AC & Full load)
Efficiency(typical)	89% (230V AC & Full load)
In-rush current	9.1A peak ,174us duration(50 % Ipeak), see the description below for details
Start/Switchover/Turn off	<0.6s(AC start),<0.6s(DC start),<0.3s(AC/DC switchover),<0.5s(Turn off )
Switching cycles	> 50,000 switching cycles
Power consumption	Full load(Pmax):60W, No load(Pno): N/A, On stand-by(Psb) : <0.5W, Network stand-by(Pnet) : N/A
<b>Safety</b>	
Withstand voltage	I/P-O/P:3750V AC, I/P-DALI: 1500V AC, O/P-DALI: 1500V AC.
Mains surge capability	L-N:2KV
Leakage current	<0.7mA (230V AC & Full load)
Isolation resistance	I/P-O/P:100MΩ/500Vdc/25°C/70% RH
<b>Control interface</b>	
DALI dimming port	Voltage range: 9.5-22.5V, typical 16V, interface current consumption: 1.8mA
pushDIM dimming port	Voltage range: 180-264V 47/63Hz
1-10V 3in1 dimming port	N/A
Auxiliary power supply	N/A
Dimming range	1%-100%
Dimming drive mode	AM(amplitude modulation)
<b>Emergency support</b>	
Central emergency system	Supported(dimming normal in DC input)
Self-contained emergency	Supported
<b>Environment &amp; Life time</b>	
Operating temperature	Ta=-20-45°C
Case temperature	Tc=90°C
Operating humidity	5-85% RH, not condensed
Storage temp./humidity	-40-80°C, 5-85% RH, not condensed
IP grade	IP20
MTBF	500,000H,MIL-HDBK-217F(25°C)
Life-time	Nominal life-time up to 100,000 h, see the description below for details
Vibration resistant	10~500Hz,5G 12min./1cycle,period for 72min. each along X,Y,Z axes
Acoustic Noise	<25dB(30cm, Full load)
Environmental protection	RoHS
<b>Certifications and standards</b>	
Certified	CE, ENEC, UKCA, RCM, CCC, EL, DALI-2
Safety	EN61347-1, EN61347-2-13, EN62384
EMC	EN55015, EN61000-3-2 , EN61000-3-3, EN61000-4-2,3,4,5,6,8,11, EN61547
DALI-2	EN 62386-101(DALI-2), EN 62386-102(DALI-2), EN 62386-207(DALI-2)
EL	Compatible IEC 61347-2- 13 Annex J , compatible with EN 60598-2-22 and EN 50172
RF	N/A

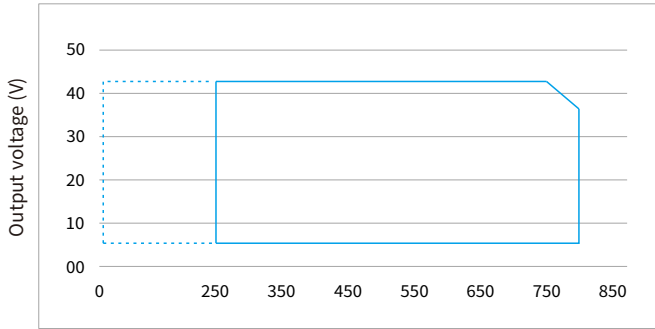
**Remarks**

- 1.By default, all parameter are measured at 230VAC input, full load and 25°C of ambient temperature.
- 2.The driver can not be installed inside the light. when the driver is used with the light, the EMC of the whole light needs to be tested.

Electrical values

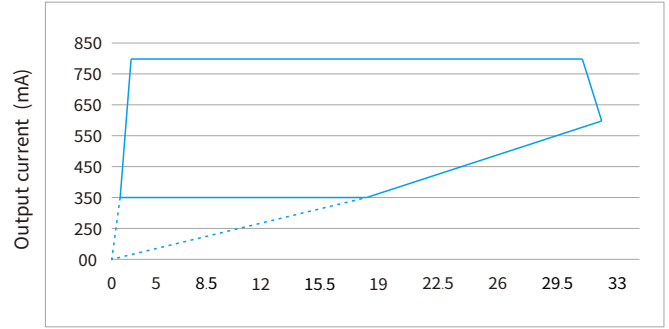
**BK-DEL030-0800Ad**

Operating window



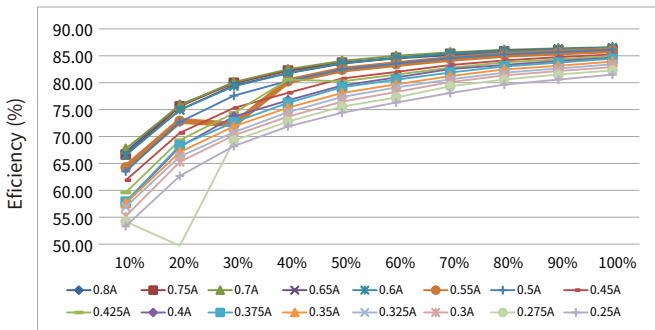
Output current(mA) — Operating window 100 %  
 ..... Operating window dimmed

Operating window



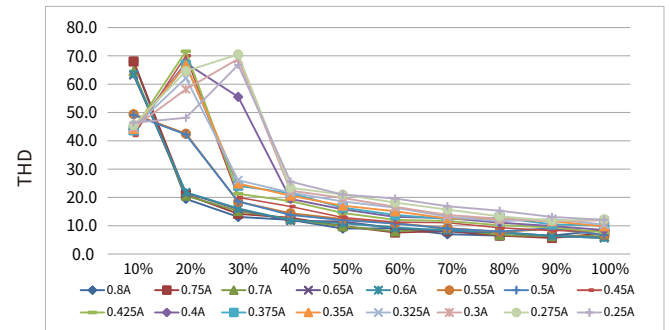
Output power(W) — Operating window 100 %  
 ..... Operating window dimmed

Efficiency vs load



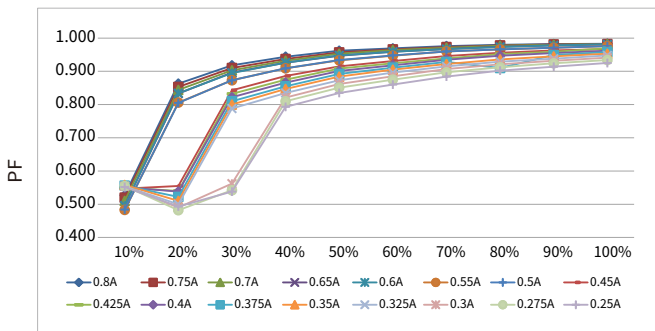
Load(%)

THD vs. Load



Load(%)

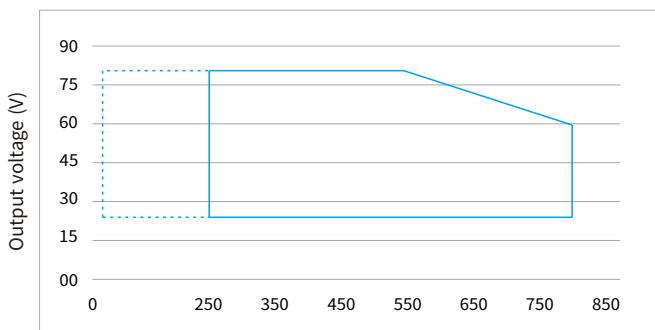
Power factor vs. Load



Load(%)

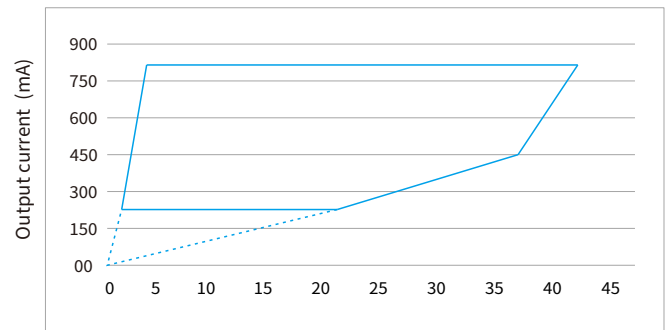
**BK-DEL042-0800Bd**

Operating window



Output current(mA) — Operating window 100 %  
 ..... Operating window dimmed

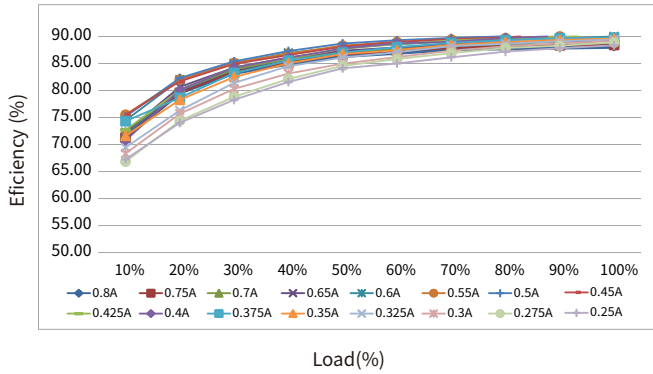
Operating window



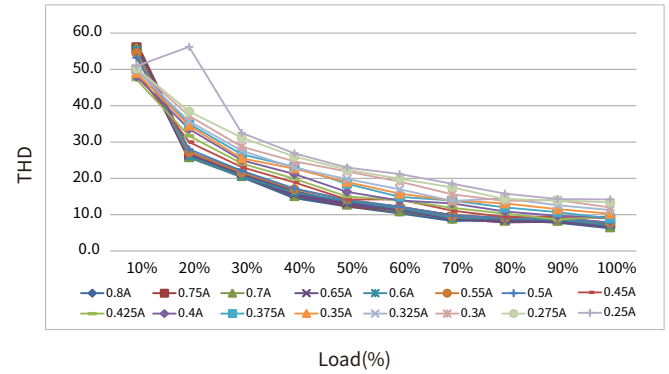
Output power(W) — Operating window 100 %  
 ..... Operating window dimmed

**BK-DEL042-0800Bd(Continue)**

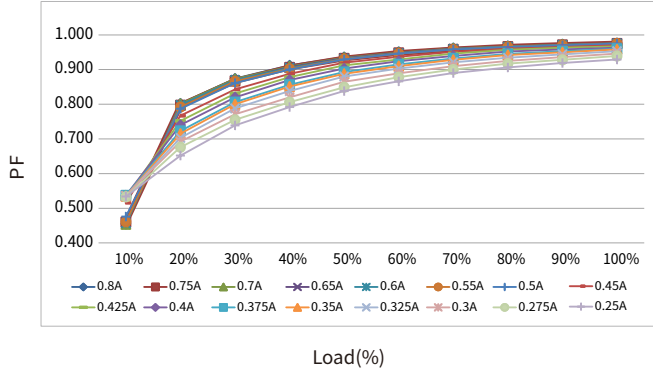
Efficiency vs load



THD vs. Load

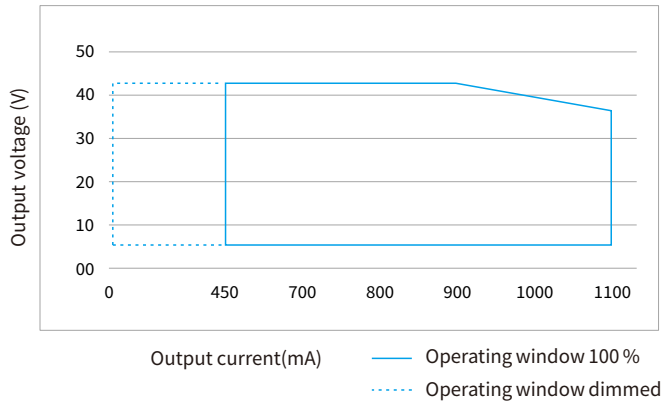


Power factor vs. Load

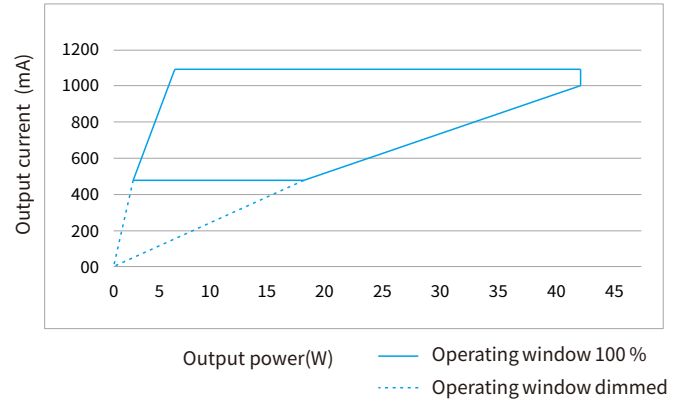


**BK-DEL042-1100Ad**

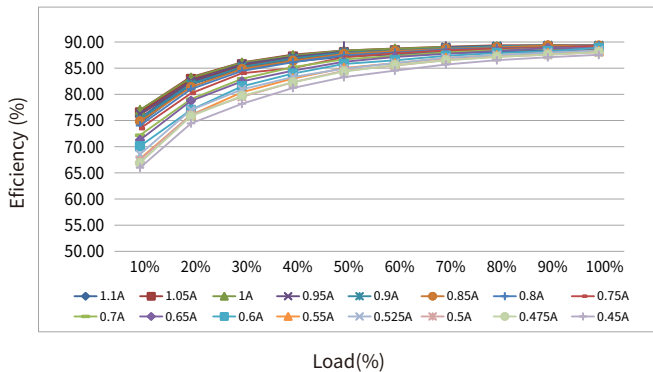
Operating window



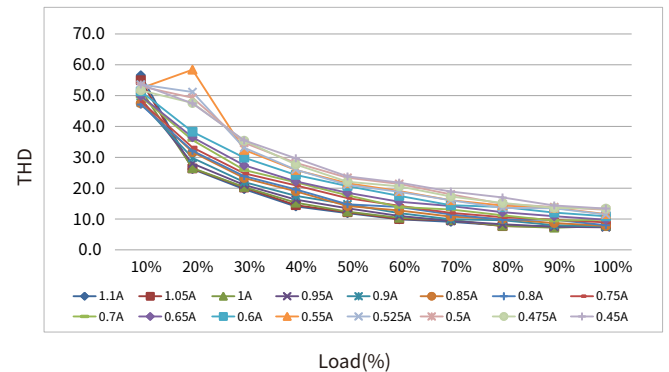
Operating window



Efficiency vs load



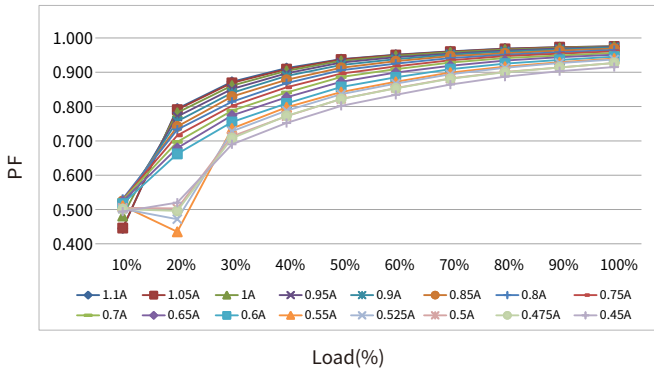
THD vs. Load





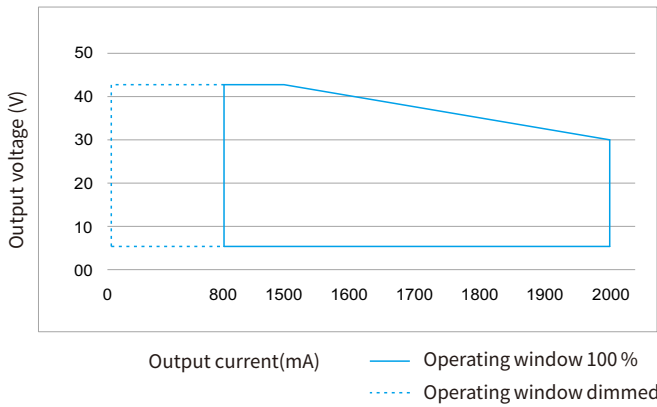
**BK-DEL042-1100Ad(Continue)**

Power factor vs. Load

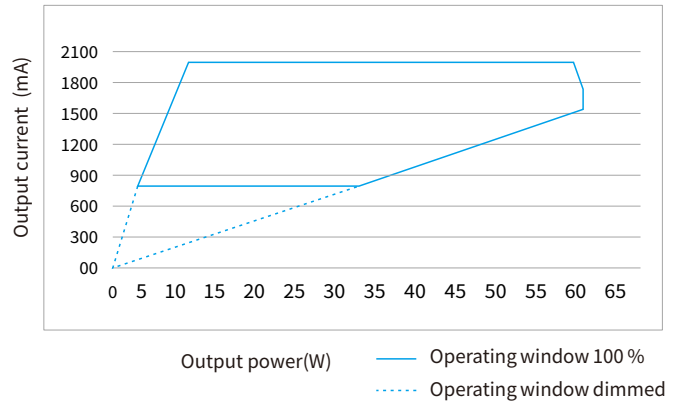


**BK-DEL060-2000Ad**

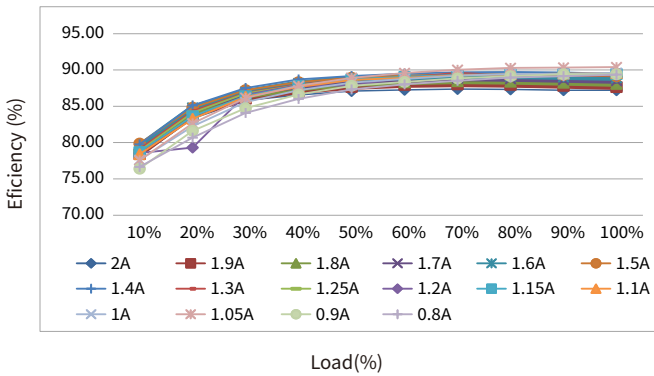
Operating window



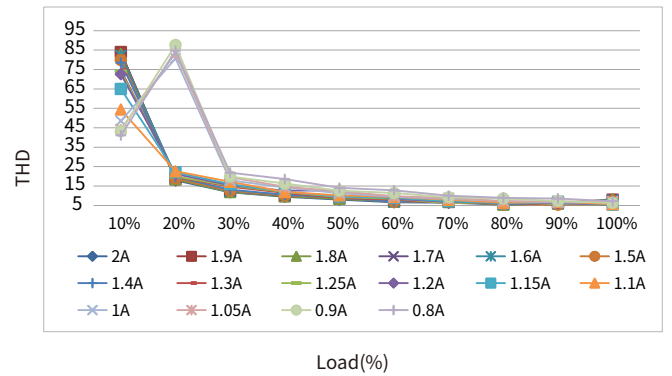
Operating window



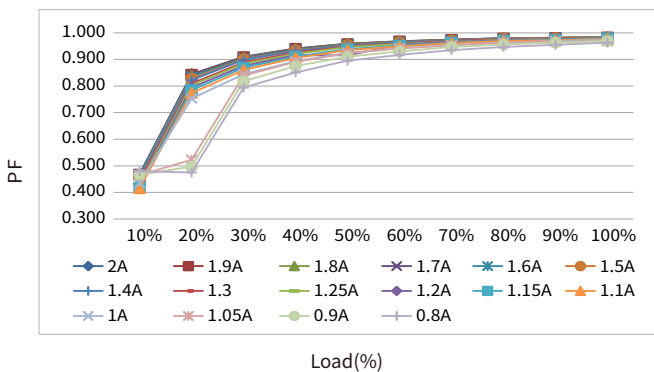
Efficiency vs load



THD vs. Load



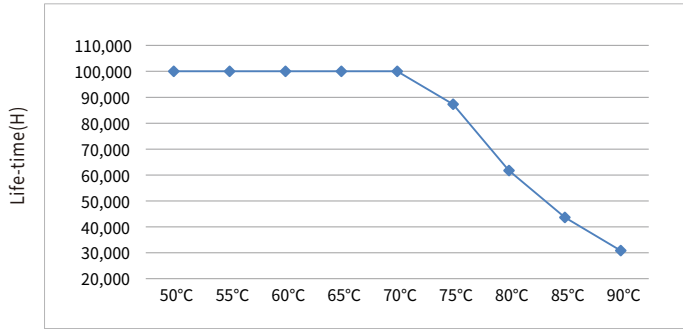
Power factor vs. Load



**Expected life-time**

**BK-DEL030-0800Ad**

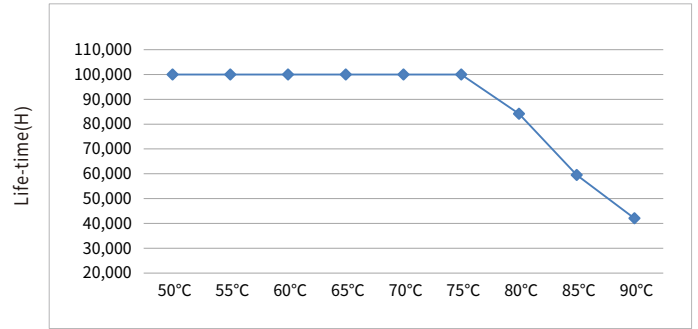
Life-time vs. case temperature



Case temperature(Tc)

**BK-DEL042-0800Bd**

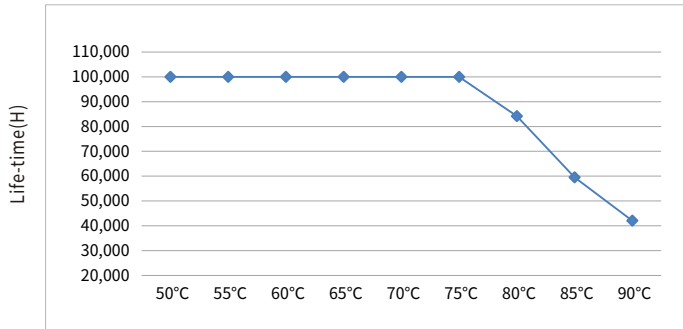
Life-time vs. case temperature



Case temperature(Tc)

**BK-DEL042-1100Ad**

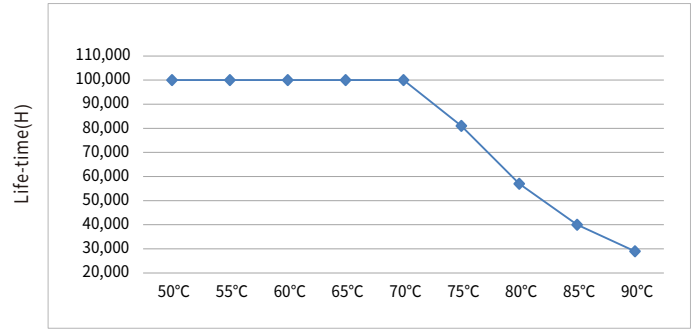
Life-time vs. case temperature



Case temperature(Tc)

**BK-DEL060-2000Ad**

Life-time vs. case temperature



Case temperature(Tc)

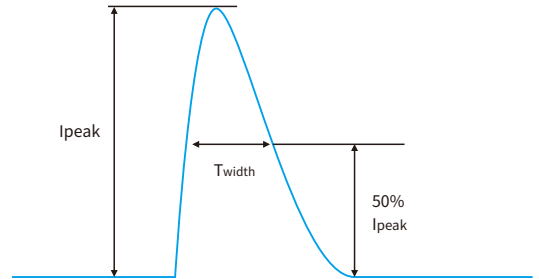
- The life-time of the LED driver is shown in the figure above (calculated based on the 90% survival rate).
- The relation of tc to ta temperature depends also on the luminaire design.

**Surge**

Model	I <sub>peak</sub>	T <sub>width</sub>	Condition	Relative number of MCB														
				B10	B13	B16	B20	B25	C10	C13	C16	C20	C25	D10	D13	D16	D20	D25
BK-DEL030-0800Ad	3.95A	180us	AC 230V, Full load, Cold start, T <sub>a</sub> ≤ 30°C, MCB is not installed side by side	46pcs	60pcs	73pcs	92pcs	114pcs	46pcs	60pcs	73pcs	92pcs	114pcs	46pcs	60pcs	73pcs	92pcs	114pcs
BK-DEL042-0800Bd	8A	296us		24pcs	31pcs	39pcs	48pcs	60pcs	34pcs	44pcs	54pcs	67pcs	84pcs	34pcs	44pcs	54pcs	67pcs	84pcs
BK-DEL042-1100Ad	7.9A	304us		24pcs	31pcs	38pcs	48pcs	60pcs	34pcs	44pcs	54pcs	67pcs	84pcs	34pcs	44pcs	54pcs	67pcs	84pcs
BK-DEL060-2000Ad	9.1A	174us		23pcs	29pcs	36pcs	45pcs	57pcs	23pcs	29pcs	36pcs	45pcs	57pcs	23pcs	29pcs	36pcs	45pcs	57pcs

**Remarks**

- The number of drives mounted under different MCBs in the table is the maximum value. Please do not exceed this number during installation.
- Calculation uses typical values from ABB series S200 as a reference.
- Different brands and models of miniature circuit breakers, the number of drives mounted will be slightly different.
- If the ambient temperature of the MCB installation exceeds 30°C or multiple MCBs are installed side by side, the number of drives mounted will be reduced and the calculation needs to be recalculated.
- Electrician's usually consider Type B for household lighting and Type C for commercial lighting application.



**Functions**

**Output short-circuit behaviour**

- In case of a short-circuit at the LED output ,the LED output is switched off.
- After restart of the LED driver ,the output will be activated again.

**Output no-load operation**

- The LED driver will not be damaged in no-load operation.
- The output will be deactivated and is therefore free of voltage.
- If a LED load is connected , the device has to be restarted before the output will be activated again.

**Output overload protection**

- If the output voltage range is exceeded the LED driver turns off the LED output.
- After restart of the LED driver the output will be activated again.

**Output hot plug-in**

In the following two cases,the LED driver will automatically turn off the output to protect the LED

- When the driver is powered on first and the LED is connected later.
- When the driver is powered on,disconnected and conneced again.
- After restart of the LED driver the output will be activated again.

**Driver restart method**

There are two ways to restart the device:

- Through the AC input portr:disconnect the AC of the driver and power it again.
- Through dimming interface.

DALI:send "OFF" command first,then send "MAX" command.

Label

ACL/DC+ DALI BOKE www.bokedriver.com  
ACN/DC- PUSH  
DA pushDIM  
DA

**Dimmable Constant Current LED Driver**  
MODEL: BK-DEL030-0800Ad  
INPUT: 200-240V ≈ 0/50/60Hz 0.18A Max λ:0.95  
OUTPUT: 6-38V ≈ 800mA 30.4W 50VDC Max.  
Other ratings see below sheet  
Do not energize the driver before connecting the LED.

Switching selection sheet

Pin(w) typ.	Output				Switch		
	Prated(w)	Irated(mA)	Voltage(Vdc)	1 2 3 4			
12.6	10.50	250	6-42	ON	ON	ON	ON
13.9	11.55	275	6-42	--	ON	ON	ON
14.9	12.60	300	6-42	ON	--	ON	ON
16.0	13.65	325	6-42	--	ON	ON	ON
17.2	14.70	350	6-42	ON	ON	--	ON
18.3	15.75	375	6-42	--	ON	ON	ON
19.5	16.80	400	6-42	ON	--	ON	ON
20.7	17.85	425	6-42	--	ON	ON	ON
21.9	18.90	450	6-42	ON	ON	--	ON
24.2	21.00	500	6-42	--	ON	ON	--
26.5	23.10	550	6-42	ON	--	ON	--
28.9	25.20	600	6-42	--	ON	ON	--
31.3	27.30	650	6-42	ON	--	ON	--
33.7	29.40	700	6-42	--	ON	ON	--
34.4	30.00	750	6-40	ON	--	ON	--
35.1	30.40	800	6-38	--	--	--	--

Before use,always check dipswitch settings!

For Australia and New Zealand,the marking label with “ ” Top view  
For LED Modules use only

ACL/DC+ DALI BOKE www.bokedriver.com  
ACN/DC- PUSH  
DA pushDIM  
DA

**Dimmable Constant Current LED Driver**  
MODEL: BK-DEL042-0800Bd  
INPUT: 200-240V ≈ 0/50/60Hz 0.25A Max λ:0.95  
OUTPUT: 6-52V ≈ 800mA 41.6W 100VDC Max.  
Other ratings see below sheet  
Do not energize the driver before connecting the LED.

Switching selection sheet

Pin(w) typ.	Output				Switch		
	Prated(w)	Irated(mA)	Voltage(Vdc)	1 2 3 4			
23.6	21.00	250	6-84	ON	ON	ON	ON
25.9	23.10	275	6-84	--	ON	ON	ON
28.1	25.20	300	6-84	ON	--	ON	ON
30.4	27.30	325	6-84	--	ON	ON	ON
32.7	29.40	350	6-84	ON	ON	--	ON
35.0	31.50	375	6-84	--	ON	ON	ON
37.2	33.60	400	6-84	ON	--	ON	ON
39.6	35.70	425	6-84	--	ON	ON	ON
41.9	37.80	450	6-84	ON	ON	--	ON
46.5	42.00	500	6-84	--	ON	ON	ON
46.4	41.80	550	6-76	ON	--	ON	ON
46.8	42.00	600	6-70	--	ON	ON	ON
46.6	41.60	650	6-64	ON	ON	--	ON
47.2	42.00	700	6-56	--	ON	ON	ON
47.5	42.00	750	6-56	ON	--	ON	ON
47.1	41.60	800	6-52	--	--	--	--

Before use,always check dipswitch settings!

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For LED Modules use only

ACL/DC+ DALI BOKE www.bokedriver.com  
ACN/DC- PUSH  
DA pushDIM  
DA

**Dimmable Constant Current LED Driver**  
MODEL: BK-DEL042-1100Ad  
INPUT: 200-240V ≈ 0/50/60Hz 0.25A Max λ:0.95  
OUTPUT: 6-38V ≈ 1100mA 41.8W 50VDC Max.  
Other ratings see below sheet  
Do not energize the driver before connecting the LED.

Switching selection sheet

Pin(w) typ.	Output				Switch		
	Prated(w)	Irated(mA)	Voltage(Vdc)	1 2 3 4			
21.4	18.90	450	6-42	ON	ON	ON	ON
22.5	19.95	475	6-42	--	ON	ON	ON
23.6	21.00	500	6-42	ON	--	ON	ON
24.8	22.05	525	6-42	--	ON	ON	ON
26.0	23.10	550	6-42	ON	ON	--	ON
28.2	25.20	600	6-42	--	ON	ON	ON
30.6	27.30	650	6-42	ON	--	ON	ON
32.9	29.40	700	6-42	--	ON	ON	ON
35.2	31.50	750	6-42	ON	ON	--	ON
37.6	33.60	800	6-42	--	ON	ON	ON
39.9	35.70	850	6-42	ON	--	ON	ON
42.3	37.80	900	6-42	--	ON	ON	ON
44.7	39.90	950	6-42	ON	ON	--	ON
47.1	42.00	1000	6-42	--	ON	ON	ON
47.3	42.00	1050	6-40	ON	--	ON	ON
47.3	41.80	1100	6-38	--	--	--	--

Before use,always check dipswitch settings!

For Australia and New Zealand,the marking label with “ ” Top view  
For LED Modules use only

ACL/DC+ DALI BOKE www.bokedriver.com  
ACN/DC- PUSH  
DA pushDIM  
DA

**Dimmable Constant Current LED Driver**  
MODEL: BK-DEL060-2000Ad  
INPUT: 200-240V ≈ 0/50/60Hz 0.36A Max λ:0.95  
OUTPUT: 6-30V ≈ 2000mA 60W 50VDC Max.  
Other ratings see below sheet  
Do not energize the driver before connecting the LED.

Switching selection sheet

Pin(w) typ.	Output				Switch		
	Prated(w)	Irated(mA)	Voltage(Vdc)	1 2 3 4			
37.4	33.6	800	6-42	ON	ON	ON	ON
42.0	37.8	900	6-42	--	ON	ON	ON
46.7	42.0	1000	6-42	ON	ON	--	ON
49.1	44.1	1050	6-42	--	ON	ON	ON
51.5	46.2	1100	6-42	ON	ON	--	ON
53.8	48.3	1150	6-42	--	ON	ON	ON
56.1	50.4	1200	6-42	ON	--	ON	ON
58.3	52.5	1250	6-42	--	ON	ON	ON
60.8	54.6	1300	6-42	ON	ON	--	ON
65.5	58.8	1400	6-42	--	ON	ON	ON
67.1	60.0	1500	6-40	ON	--	ON	ON
68.2	60.8	1600	6-38	--	ON	ON	ON
68.9	61.2	1700	6-36	ON	ON	--	ON
69.2	61.2	1800	6-34	--	ON	ON	ON
69.1	60.8	1900	6-32	ON	--	ON	ON
68.6	60.0	2000	6-30	--	--	--	--

Before use,always check dipswitch settings!

For Australia and New Zealand,the marking label with “ ” Top view  
For LED Modules use only

DIP-switch & output current

BK-DEL030-0800Ad

Pin(W) typ.	Output			1	2	3	4
	Prated(w)	Irated(mA)	Voltage(Vdc)				
12.6	10.50	250	6-42	ON	ON	ON	ON
13.9	11.55	275	6-42	--	ON	ON	ON
14.9	12.60	300	6-42	ON	--	ON	ON
16.0	13.65	325	6-42	--	--	ON	ON
17.2	14.70	350	6-42	ON	ON	--	ON
18.3	15.75	375	6-42	--	ON	--	ON
19.5	16.80	400	6-42	ON	--	--	ON
20.7	17.85	425	6-42	--	--	--	ON
21.9	18.90	450	6-42	ON	ON	ON	--
24.2	21.00	500	6-42	--	ON	ON	--
26.5	23.10	550	6-42	ON	--	ON	--
28.9	25.20	600	6-42	--	--	ON	--
31.3	27.30	650	6-42	ON	ON	--	--
33.7	29.40	700	6-42	--	ON	--	--
34.4	30.00	750	6-40	ON	--	--	--
35.1	30.40	800	6-38	--	--	--	--

BK-DEL042-0800Bd

Pin(W) typ.	Output				1	2	3	4
	Prated(w)	Irated(mA)	Voltage(Vdc)					
23.6	21.00	250	6-84	ON	ON	ON	ON	
25.9	23.10	275	6-84	--	ON	ON	ON	
28.1	25.20	300	6-84	ON	--	ON	ON	
30.4	27.30	325	6-84	--	--	ON	ON	
32.7	29.40	350	6-84	ON	ON	--	ON	
35.0	31.50	375	6-84	--	ON	--	ON	
37.2	33.60	400	6-84	ON	--	--	ON	
39.6	35.70	425	6-84	--	--	--	ON	
41.9	37.80	450	6-84	ON	ON	ON	--	
46.5	42.00	500	6-84	--	ON	ON	--	
46.4	41.80	550	6-76	ON	--	ON	--	
46.8	42.00	600	6-70	--	ON	ON	--	
46.6	41.60	650	6-64	ON	ON	--	--	
47.2	42.00	700	6-56	--	ON	--	--	
47.5	42.00	750	6-56	ON	--	--	--	
47.1	41.60	800	6-52	--	--	--	--	

BK-DEL042-1100Ad

Pin(W) typ.	Output				1	2	3	4
	Prated(w)	Irated(mA)	Voltage(Vdc)					
21.4	18.90	450	6-42	ON	ON	ON	ON	
22.5	19.95	475	6-42	--	ON	ON	ON	
23.6	21.00	500	6-42	ON	--	ON	ON	
24.8	22.05	525	6-42	--	--	ON	ON	
25.9	23.10	550	6-42	ON	ON	--	ON	
28.2	25.20	600	6-42	--	ON	--	ON	
30.6	27.30	650	6-42	ON	--	--	ON	
32.9	29.40	700	6-42	--	--	--	ON	
35.2	31.50	750	6-42	ON	ON	ON	--	
37.6	33.60	800	6-42	--	ON	ON	--	
39.9	35.70	850	6-42	ON	--	ON	--	
42.3	37.80	900	6-42	--	ON	ON	--	
44.7	39.90	950	6-42	ON	ON	--	--	
47.1	42.00	1000	6-42	--	ON	--	--	
47.3	42.00	1050	6-40	ON	--	--	--	
47.3	41.80	1100	6-38	--	--	--	--	

BK-DEL060-2000Ad

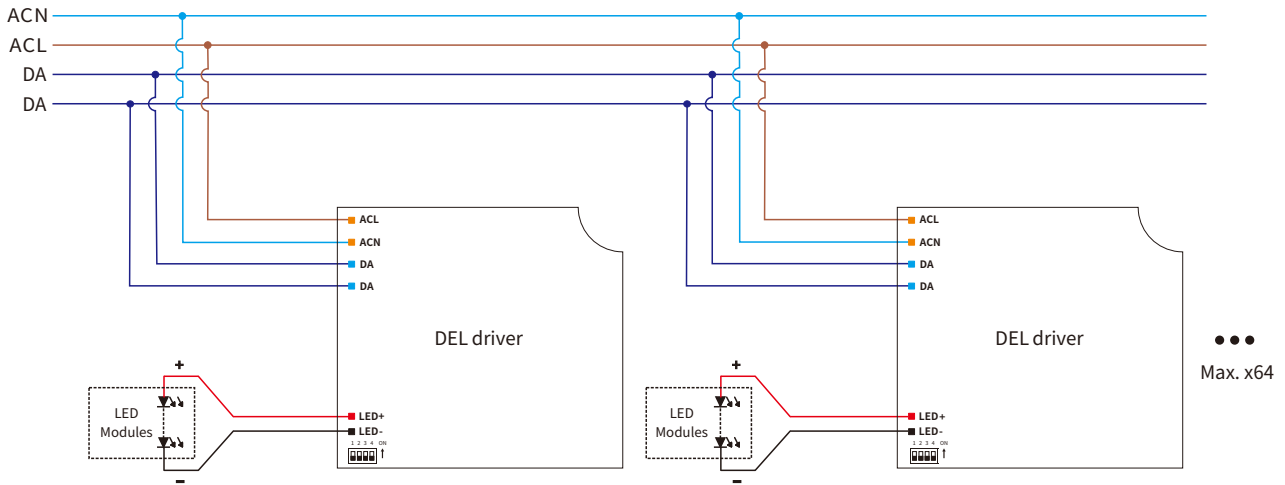
Pin(W) typ.	Output				1	2	3	4
	Prated(w)	Irated(mA)	Voltage(Vdc)					
37.4	33.6	800	6-42	ON	ON	ON	ON	
42.0	37.8	900	6-42	--	ON	ON	ON	
46.7	42.0	1000	6-42	ON	--	ON	ON	
49.1	44.1	1050	6-42	--	--	ON	ON	
51.5	46.2	1100	6-42	ON	ON	--	ON	
53.8	48.3	1150	6-42	--	ON	--	ON	
56.1	50.4	1200	6-42	ON	--	--	ON	
58.3	52.5	1250	6-42	--	ON	ON	--	
60.8	54.6	1300	6-42	ON	ON	ON	--	
65.5	58.8	1400	6-42	--	ON	ON	--	
67.1	60.0	1500	6-40	ON	--	ON	--	
68.2	60.8	1600	6-38	--	--	ON	--	
68.9	61.2	1700	6-36	ON	ON	--	--	
69.2	61.2	1800	6-34	--	ON	--	--	
69.1	60.8	1900	6-32	ON	--	--	--	
68.6	60.0	2000	6-30	--	--	--	--	

Remarks:

- 1. ★ It means that this item is the factory default current.
- 2. -- It means that this channel is OFF.

## DALI dimming application

### Wiring diagram



### Activating DALI dimming mode

- After installation according to the wiring diagram of DALI dimming application, the driver will automatically switch to the DALI control mode after receiving any DALI command.

#### Remarks:

- Standard DALI control line voltage range: 9.5V to 22.5V, type 16V.
- The two DALI control lines polarity-reversible.
- Max. 64 DALI drivers per DALI control line.
- The maximum distance length of the DALI control line is 300m at  $2 \times 1.5\text{mm}^2$ .
- DALI bus can be wired together with any mains voltage cables, but separate wiring is recommended.
- The configuration parameters of the driver can be set through the DALI configuration tool or DALI application controller during installation, such as setting device address, group address, power-on level, bus-failure level, scene level, fade time, dimming curve, etc.

Please refer to the table below

Cable size	Distance
$2 \times 0.50\text{mm}^2$	max.100m
$2 \times 0.75\text{mm}^2$	max.150m
$2 \times 1.00\text{mm}^2$	max.200m
$\geq 2 \times 1.50\text{mm}^2$	max.300m

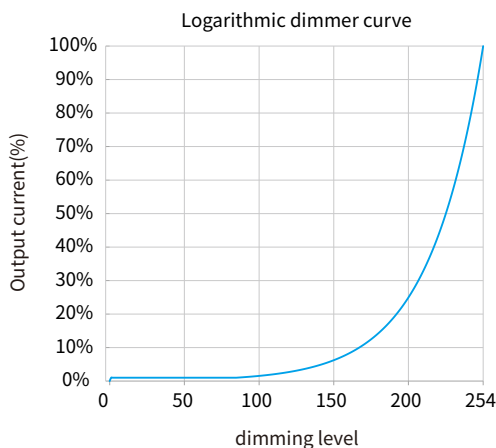
#### Power-on level :

When the driver is in DALI-2 dimming mode, the factory default level after each power-on is the brightest.

The power-on level can be set through the DALI configuration tool or DALI application controller during installation, and can be set to memory or fixed any brightness (such as off, darkest, 50%, etc.).

Note: The recommended setting for the default factory power-on level of the DALI-2 driver is the brightest in the DALI-2 standard.

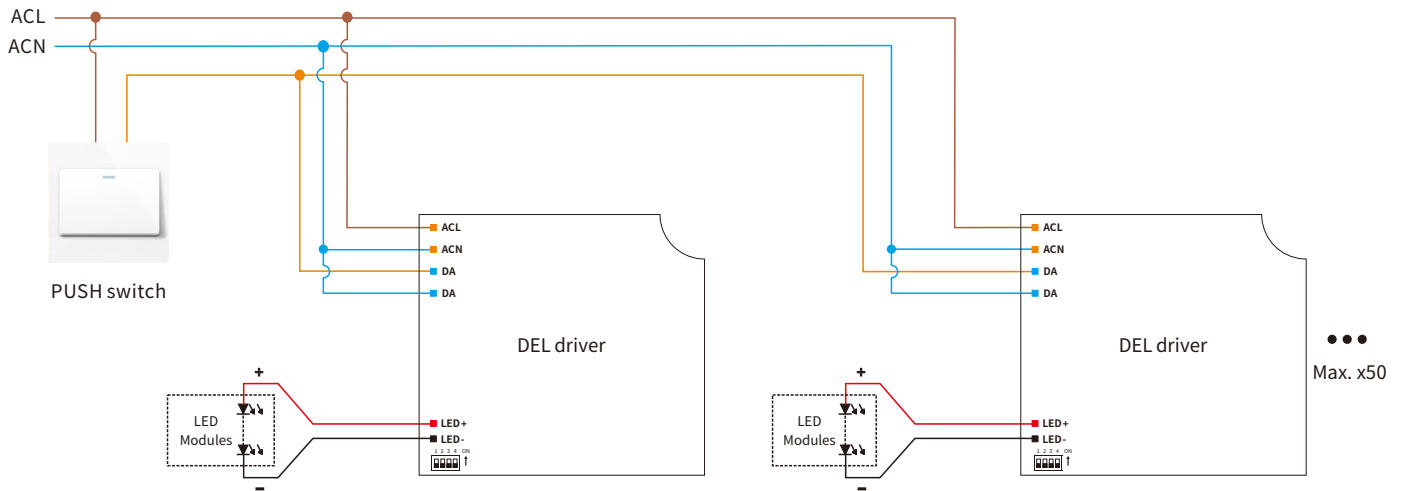
### Dimming curve



Remarks: The dimming curve can be selected by DALI configuration. The default is logarithmic dimming curve.

**pushDIM dimming application**

**Wiring diagram**



**Activating pushDIM dimming mode**

- After installation according to the wiring diagram of PUSH dimming application, short press the pushbutton 1 times, the driver will automatically switch to pushDIM dimming mode.

**Remarks:**

Max. 50 drivers per pushDIM control line.

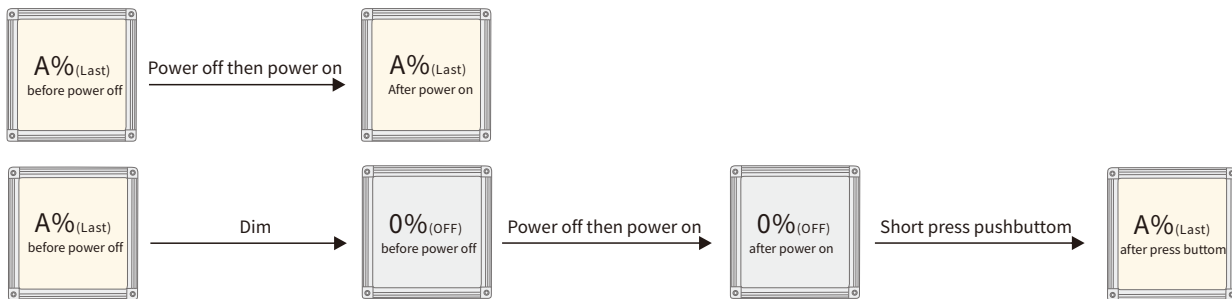
Turn on or turn off: short press pushbutton for 0.2-1s.

Dimming: long press pushbutton for 1-5s.

Power on status: after power on, the light state will be the same as the lighting on state.

If the light is on before power off, the light will be on after power on again, brightness will be the same as the last lighting on brightness.

If the light is off before power off, the light will be off after power on again, short press the pushbutton, then the light will be on, the brightness will be the same as the last brightness.



**Multiple lights synchronize control operation**

method 1:

Step 1: long press the pushbutton, confirm each light is on.

Step 2: short press the pushbutton, confirm each light is off.

Step 3: long press the pushbutton, confirm each light is from darkest to brightest and all the lights are synchronous.

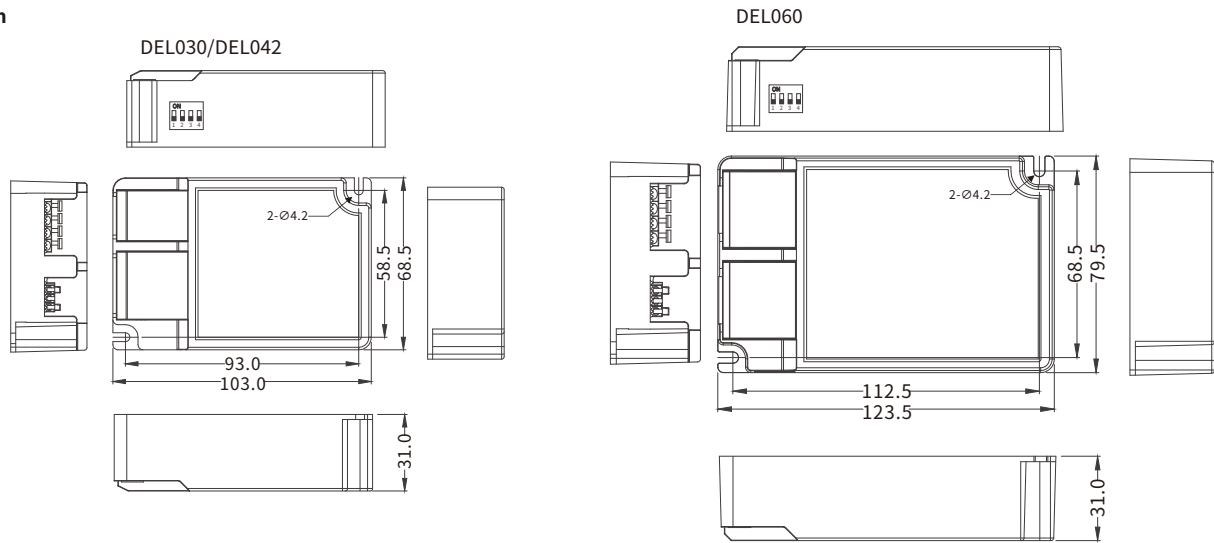
method 2:

- Long press the pushbutton 15s, all lights output to the brightest state.

## Installation

### Mechanical dimensions

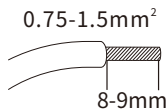
Unit:mm



#### INPUT

Numbering	function	colour
1	ACL/DC+	orange
2	ACN/DC-	orange
3	DA	blue
4	DA	blue

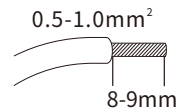
#### Input wire



#### OUTPUT

Numbering	function	colour
1	LED+	red
2	LED-	black

#### Output wire



### Installation note

#### Hot plug-in

- Hot plug-in is not supported due to residual output voltage of > 0 V.
- If a LED load is connected the device has to be restarted.
- Restart can be achieved by re-powering the driver or executing a on/off command (action) through the control interface (DALI, pushDIM)

#### Wiring guidelines

- All connections must be kept as short as possible to ensure good EMI behaviour.
- Mains leads should be kept apart from LED Driver and other leads (ideally 5 – 10 cm distance)
- Max. length of output wires is 2 m.
- Incorrect wiring can damage LED modules.

#### Mounting screw specifications and torque

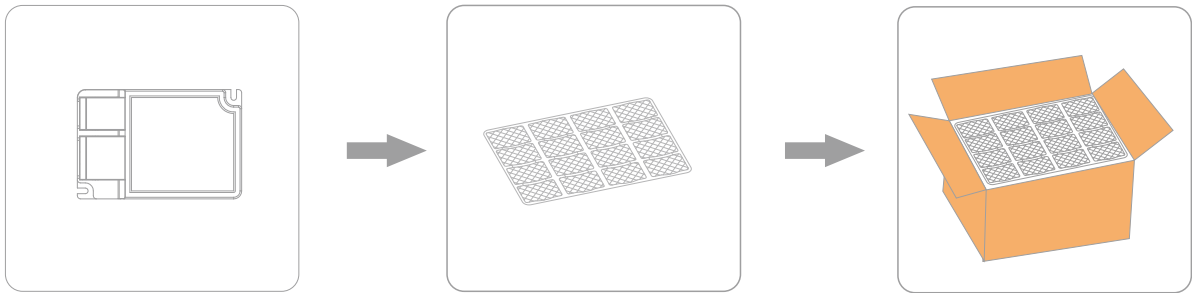
- Max. torque at the clamping screw: 0.5 Nm / M4

#### Replace LED module

1. Mains off
2. Remove LED module
3. Wait for 5 seconds
4. Connect LED module again

**Packaging**

**Optional 1: factory default**



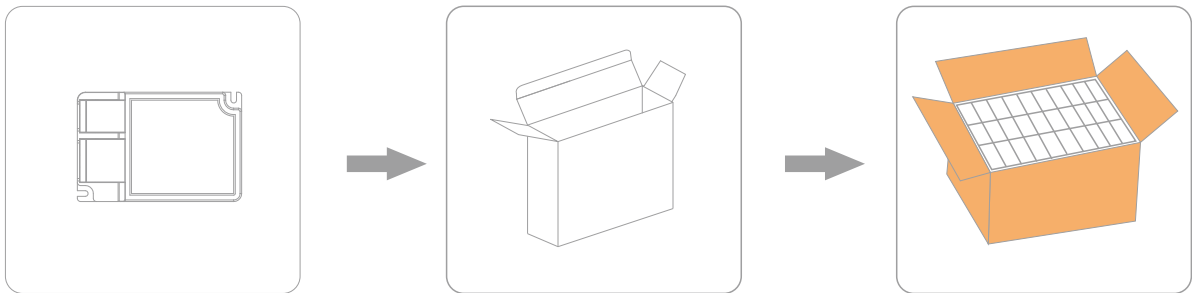
Product

Blister

16pcs×4layer=64pcs/CIN  
9pcs×4layer=36pcs/CIN

Model	Product size	Weight	Blister size	Carton size	Qty/carton	N.W	G.W
DEL030	L103*W68.5*H31mm	131g	L480*W330*H40mm	L490*W340*H165mm	64pcs	8.38kg	9.43kg
DEL042	L103*W68.5*H31mm	159g	L480*W330*H40mm	L490*W340*H165mm	64pcs	10.2kg	11.2kg
DEL060	L123*W78.5*H31mm	241g	L435*W345*H40mm	L450*W350*H180mm	36pcs	8.68kg	9.68kg

**Optional 2:**



Product

Packaging

24pcs×2layer=48pcs/CIN  
18pcs×2layer=36pcs/CIN

Model	Product size	Weight	Packaging size	Carton size	Qty/carton	N.W	G.W
DEL030	L103*W68.5*H31mm	131g	L130*W38*H85mm	L415*W330*H190mm	48pcs	6.29kg	7.89kg
DEL042	L103*W68.5*H31mm	159g	L130*W38*H85mm	L415*W330*H190mm	48pcs	7.63kg	9.23kg
DEL060	L123*W79.5*H31mm	241g	L140*W40*H100mm	L380*W295*H220mm	36pcs	8.68kg	10.2kg

**Additional information**

1. This product can only be used outside the light body, Can not be used inside of the light, and it must be used within the specified working environment.
2. The life and MTBF of the product are for reference only, and do not represent a warranty statement. If the drive has been turned on, there is no warranty.
3. For more information, please send an email to [info@bokedriver.com](mailto:info@bokedriver.com).