

DATI TECNICI

|                                           |                                                                                                                                   |
|-------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------|
| Impiego                                   | strade urbani, strade di quartiere (interne), percorsi pedonali, parcheggi                                                        |
| Montaggio                                 | direttamente sul palo o sul braccio ø 60 x 180 mm, su braccio con l'estremità di ø 60 x 100 mm                                    |
| Colore                                    | inox / nero                                                                                                                       |
| Grado di protezione                       | IP 66 per la parte ottica e per il sistema d'alimentazione                                                                        |
| Sistema ottico                            | PMMA optics, interchangeable LED module, tempered glass diffuser                                                                  |
| Materiale                                 | lega di alluminio, anodizzato                                                                                                     |
|                                           | 0,013 m³                                                                                                                          |
| Campo di temperatura del funzionamento    | da -40°C a +40°C                                                                                                                  |
| Periodo di utilizzazione previsto         | L90B10 - 100 000 h                                                                                                                |
| Indice di resa cromatica CRI              | >70                                                                                                                               |
|                                           | 24,6 A / 195,5 µs ( CUDDLE MINI LED D4i 24 - 36)<br>98 A / 120 µs (CUDDLE MINI LED D4i 48 - 60)                                   |
| Frequenza della tensione di alimentazione | 50/60Hz                                                                                                                           |
| Fattore di potenza                        | ≥0.95                                                                                                                             |
| Numero di diodi                           | 16                                                                                                                                |
| Sistema di controllo                      | L'apparecchio può essere collegato a un sistema di controllo esterno e/o sensori tramite una presa compatibile con Zhaga Book 18. |



TABELLA DELLE VARIANTI

| Codice         | Nome                       | Potenza LED | Potenza totale dell'apparecchio | Corrente di conduzione LED | Temperatura di colore della luce | Sorgente di luce LED¹ | Sorgente di luce dell'apparecchio¹ | Efficienza luminosa¹ | Presa D4i | Peso netto |
|----------------|----------------------------|-------------|---------------------------------|----------------------------|----------------------------------|-----------------------|------------------------------------|----------------------|-----------|------------|
| 2228230/1/...² | CUDDLE MINI LED REG D4i 24 | 24 W        | 26 W                            | 250 mA                     | 2700 K                           | 4450 lm               | 3250 lm                            | 125 lm/W             | 1 ↑       | 5 kg       |
| 2228230/3/...² | CUDDLE MINI LED REG D4i 24 | 24 W        | 26 W                            | 250 mA                     | 3500 K                           | 4650 lm               | 3400 lm                            | 131 lm/W             | 1 ↑       | 5 kg       |
| 2228230/4/...² | CUDDLE MINI LED REG D4i 24 | 24 W        | 26 W                            | 250 mA                     | 4000 K                           | 4800 lm               | 3500 lm                            | 135 lm/W             | 1 ↑       | 5 kg       |
| 2228230/6/...² | CUDDLE MINI LED REG D4i 24 | 24 W        | 26 W                            | 250 mA                     | 5000 K                           | 4750 lm               | 3450 lm                            | 133 lm/W             | 1 ↑       | 5 kg       |
| 2228232/1/...² | CUDDLE MINI LED REG D4i 36 | 36 W        | 39 W                            | 375 mA                     | 2700 K                           | 6550 lm               | 4800 lm                            | 123 lm/W             | 1 ↑       | 5 kg       |
| 2228232/3/...² | CUDDLE MINI LED REG D4i 36 | 36 W        | 39 W                            | 375 mA                     | 3500 K                           | 6850 lm               | 5000 lm                            | 128 lm/W             | 1 ↑       | 5 kg       |
| 2228232/4/...² | CUDDLE MINI LED REG D4i 36 | 36 W        | 39 W                            | 375 mA                     | 4000 K                           | 7050 lm               | 5150 lm                            | 132 lm/W             | 1 ↑       | 5 kg       |
| 2228232/6/...² | CUDDLE MINI LED REG D4i 36 | 36 W        | 39 W                            | 375 mA                     | 5000 K                           | 6950 lm               | 5050 lm                            | 129 lm/W             | 1 ↑       | 5 kg       |
| 2228233/1/...² | CUDDLE MINI LED REG D4i 48 | 48 W        | 54 W                            | 500 mA                     | 2700 K                           | 8550 lm               | 6250 lm                            | 116 lm/W             | 1 ↑       | 5 kg       |
| 2228233/3/...² | CUDDLE MINI LED REG D4i 48 | 48 W        | 54 W                            | 500 mA                     | 3500 K                           | 8950 lm               | 6500 lm                            | 120 lm/W             | 1 ↑       | 5 kg       |
| 2228233/4/...² | CUDDLE MINI LED REG D4i 48 | 48 W        | 54 W                            | 500 mA                     | 4000 K                           | 9200 lm               | 6700 lm                            | 124 lm/W             | 1 ↑       | 5 kg       |
| 2228233/6/...² | CUDDLE MINI LED REG D4i 48 | 48 W        | 54 W                            | 500 mA                     | 5000 K                           | 9050 lm               | 6600 lm                            | 122 lm/W             | 1 ↑       | 5 kg       |
| 2228234/1/...² | CUDDLE MINI LED REG D4i 60 | 60 W        | 67 W                            | 625 mA                     | 2700 K                           | 10450 lm              | 7650 lm                            | 114 lm/W             | 1 ↑       | 5 kg       |
| 2228234/3/...² | CUDDLE MINI LED REG D4i 60 | 60 W        | 67 W                            | 625 mA                     | 3500 K                           | 10950 lm              | 7950 lm                            | 119 lm/W             | 1 ↑       | 5 kg       |
| 2228234/4/...² | CUDDLE MINI LED REG D4i 60 | 60 W        | 67 W                            | 625 mA                     | 4000 K                           | 11250 lm              | 8200 lm                            | 122 lm/W             | 1 ↑       | 5 kg       |
| 2228234/6/...² | CUDDLE MINI LED REG D4i 60 | 60 W        | 67 W                            | 625 mA                     | 5000 K                           | 11050 lm              | 8050 lm                            | 120 lm/W             | 1 ↑       | 5 kg       |
| 2228630/1/...² | CUDDLE MINI LED REG D 24   | 24 W        | 26 W                            | 250 mA                     | 2700 K                           | 4450 lm               | 3250 lm                            | 125 lm/W             | 1 ↓       | 5 kg       |
| 2228630/3/...² | CUDDLE MINI LED REG D 24   | 24 W        | 26 W                            | 250 mA                     | 3500 K                           | 4650 lm               | 3400 lm                            | 131 lm/W             | 1 ↓       | 5 kg       |
| 2228630/4/...² | CUDDLE MINI LED REG D 24   | 24 W        | 26 W                            | 250 mA                     | 4000 K                           | 4800 lm               | 3500 lm                            | 135 lm/W             | 1 ↓       | 5 kg       |
| 2228630/6/...² | CUDDLE MINI LED REG D 24   | 24 W        | 26 W                            | 250 mA                     | 5000 K                           | 4750 lm               | 3450 lm                            | 133 lm/W             | 1 ↓       | 5 kg       |
| 2228632/1/...² | CUDDLE MINI LED REG D 36   | 36 W        | 39 W                            | 375 mA                     | 2700 K                           | 6550 lm               | 4800 lm                            | 123 lm/W             | 1 ↓       | 5 kg       |
| 2228632/3/...² | CUDDLE MINI LED REG D 36   | 36 W        | 39 W                            | 375 mA                     | 3500 K                           | 6850 lm               | 5000 lm                            | 128 lm/W             | 1 ↓       | 5 kg       |
| 2228632/4/...² | CUDDLE MINI LED REG D 36   | 36 W        | 39 W                            | 375 mA                     | 4000 K                           | 7050 lm               | 5150 lm                            | 132 lm/W             | 1 ↓       | 5 kg       |
| 2228632/6/...² | CUDDLE MINI LED REG D 36   | 36 W        | 39 W                            | 375 mA                     | 5000 K                           | 6950 lm               | 5050 lm                            | 129 lm/W             | 1 ↓       | 5 kg       |
| 2228633/1/...² | CUDDLE MINI LED REG D 48   | 48 W        | 54 W                            | 500 mA                     | 2700 K                           | 8550 lm               | 6250 lm                            | 116 lm/W             | 1 ↓       | 5 kg       |

# CUDDLE MINI LED REG D4I



|                            |                               |      |      |        |        |          |         |          |           |      |
|----------------------------|-------------------------------|------|------|--------|--------|----------|---------|----------|-----------|------|
| 2228633/3/... <sup>2</sup> | CUDDLE MINI LED REG D 48      | 48 W | 54 W | 500 mA | 3500 K | 8950 lm  | 6500 lm | 120 lm/W | 1 ↓       | 5 kg |
| 2228633/4/... <sup>2</sup> | CUDDLE MINI LED REG D 48      | 48 W | 54 W | 500 mA | 4000 K | 9200 lm  | 6700 lm | 124 lm/W | 1 ↓       | 5 kg |
| 2228633/6/... <sup>2</sup> | CUDDLE MINI LED REG D 48      | 48 W | 54 W | 500 mA | 5000 K | 9050 lm  | 6600 lm | 122 lm/W | 1 ↓       | 5 kg |
| 2228634/1/... <sup>2</sup> | CUDDLE MINI LED REG D 60      | 60 W | 67 W | 625 mA | 2700 K | 10450 lm | 7650 lm | 114 lm/W | 1 ↓       | 5 kg |
| 2228634/3/... <sup>2</sup> | CUDDLE MINI LED REG D 60      | 60 W | 67 W | 625 mA | 3500 K | 10950 lm | 7950 lm | 119 lm/W | 1 ↓       | 5 kg |
| 2228634/4/... <sup>2</sup> | CUDDLE MINI LED REG D 60      | 60 W | 67 W | 625 mA | 4000 K | 11250 lm | 8200 lm | 122 lm/W | 1 ↓       | 5 kg |
| 2228634/6/... <sup>2</sup> | CUDDLE MINI LED REG D 60      | 60 W | 67 W | 625 mA | 5000 K | 11050 lm | 8050 lm | 120 lm/W | 1 ↓       | 5 kg |
| 2228430/1/... <sup>2</sup> | CUDDLE MINI LED REG D4i x2 24 | 24 W | 26 W | 250 mA | 2700 K | 4450 lm  | 3250 lm | 125 lm/W | 1 ↑ / 1 ↓ | 5 kg |
| 2228430/3/... <sup>2</sup> | CUDDLE MINI LED REG D4i x2 24 | 24 W | 26 W | 250 mA | 3500 K | 4650 lm  | 3400 lm | 131 lm/W | 1 ↑ / 1 ↓ | 5 kg |
| 2228430/4/... <sup>2</sup> | CUDDLE MINI LED REG D4i x2 24 | 24 W | 26 W | 250 mA | 4000 K | 4800 lm  | 3500 lm | 135 lm/W | 1 ↑ / 1 ↓ | 5 kg |
| 2228430/6/... <sup>2</sup> | CUDDLE MINI LED REG D4i x2 24 | 24 W | 26 W | 250 mA | 5000 K | 4750 lm  | 3450 lm | 133 lm/W | 1 ↑ / 1 ↓ | 5 kg |
| 2228432/1/... <sup>2</sup> | CUDDLE MINI LED REG D4i x2 36 | 36 W | 39 W | 375 mA | 2700 K | 6550 lm  | 4800 lm | 123 lm/W | 1 ↑ / 1 ↓ | 5 kg |
| 2228432/3/... <sup>2</sup> | CUDDLE MINI LED REG D4i x2 36 | 36 W | 39 W | 375 mA | 3500 K | 6850 lm  | 5000 lm | 128 lm/W | 1 ↑ / 1 ↓ | 5 kg |
| 2228432/4/... <sup>2</sup> | CUDDLE MINI LED REG D4i x2 36 | 36 W | 39 W | 375 mA | 4000 K | 7050 lm  | 5150 lm | 132 lm/W | 1 ↑ / 1 ↓ | 5 kg |
| 2228432/6/... <sup>2</sup> | CUDDLE MINI LED REG D4i x2 36 | 36 W | 39 W | 375 mA | 5000 K | 6950 lm  | 5050 lm | 129 lm/W | 1 ↑ / 1 ↓ | 5 kg |
| 2228433/1/... <sup>2</sup> | CUDDLE MINI LED REG D4i x2 48 | 48 W | 54 W | 500 mA | 2700 K | 8550 lm  | 6250 lm | 116 lm/W | 1 ↑ / 1 ↓ | 5 kg |
| 2228433/3/... <sup>2</sup> | CUDDLE MINI LED REG D4i x2 48 | 48 W | 54 W | 500 mA | 3500 K | 8950 lm  | 6500 lm | 120 lm/W | 1 ↑ / 1 ↓ | 5 kg |
| 2228433/4/... <sup>2</sup> | CUDDLE MINI LED REG D4i x2 48 | 48 W | 54 W | 500 mA | 4000 K | 9200 lm  | 6700 lm | 124 lm/W | 1 ↑ / 1 ↓ | 5 kg |
| 2228433/6/... <sup>2</sup> | CUDDLE MINI LED REG D4i x2 48 | 48 W | 54 W | 500 mA | 5000 K | 9050 lm  | 6600 lm | 122 lm/W | 1 ↑ / 1 ↓ | 5 kg |
| 2228434/1/... <sup>2</sup> | CUDDLE MINI LED REG D4i x2 60 | 60 W | 67 W | 625 mA | 2700 K | 10450 lm | 7650 lm | 114 lm/W | 1 ↑ / 1 ↓ | 5 kg |
| 2228434/3/... <sup>2</sup> | CUDDLE MINI LED REG D4i x2 60 | 60 W | 67 W | 625 mA | 3500 K | 10950 lm | 7950 lm | 119 lm/W | 1 ↑ / 1 ↓ | 5 kg |
| 2228434/4/... <sup>2</sup> | CUDDLE MINI LED REG D4i x2 60 | 60 W | 67 W | 625 mA | 4000 K | 11250 lm | 8200 lm | 122 lm/W | 1 ↑ / 1 ↓ | 5 kg |
| 2228434/6/... <sup>2</sup> | CUDDLE MINI LED REG D4i x2 60 | 60 W | 67 W | 625 mA | 5000 K | 11050 lm | 8050 lm | 120 lm/W | 1 ↑ / 1 ↓ | 5 kg |

1) a causa della classe di precisione dei diodi, la tolleranza del valore è del +/- 5%

2) simbolo del sistema ottico scelto p.e. 2228233/6/T2 sta per l'apparecchio CUDDLE MINI LED REG D4i 48 5000K con il sistema ottico T2

\* Per l'apparecchio CUDDLE MINI LED REG D4i con ottica P2 e PL, è disponibile come opzione un'ulteriore temperatura di colore: 5700K. In questo caso, il codice prodotto viene completato con il suffisso "/7". Esempio: 2228233/7/P2 – apparecchio CUDDLE MINI LED REG D4i 48W 5700K con ottica P2.

## DIRETTIVE E NORME

**DIRETTIVE:** 2014/35/EU (OJ L 96, 29/03/2014, p.357), 2014/30/EU (OJ L 96, 29/03/2014, p.79), 2011/65/ EU RoHS (OJ L 174, 01.07.2011, p. 88), 2009/125/EC (OJ L 285, 31.10.2009, p. 10)

**NORME:** PN-EN IEC 60598-1: 2021-7, PN-EN 60598-2-3: 2006, PN-EN 60529: 2003, PN-EN 62262: 2003, PN-EN 62471:2010, PN-EN 55015: 2019, PN-EN 61547: 2009, PN-EN 61000-3-2: 2019 , PN-EN 61000-3-3: 2014

Parametri luminosi presentati sulla base di ricerche di laboratorio secondo l'IESNA LM-79-19

## SCARICA DI CARICA DAL CORPO DELL'APPARECCHIO A LED

Per scaricare efficacemente la carica dall'alloggiamento dell'apparecchio a LED installato su un palo in materiale dielettrico (non conduttivo), è necessaria una delle seguenti soluzioni:

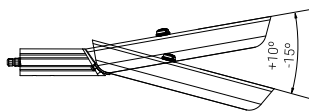
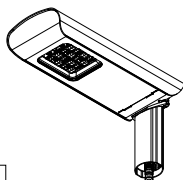
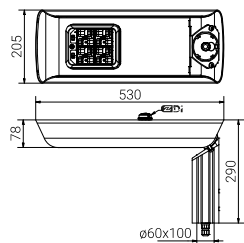
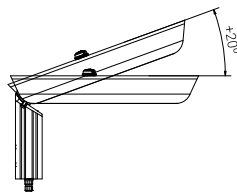
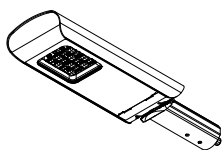
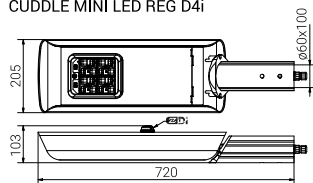
- messa a terra funzionale
- apparecchio a LED con un sistema di sicurezza aggiuntivo

# CUDDLE MINI LED REG D4I



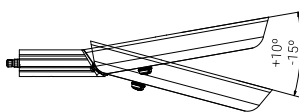
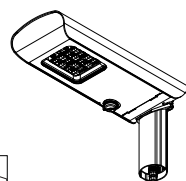
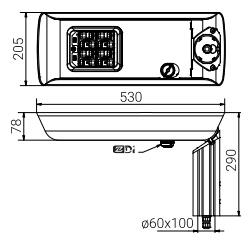
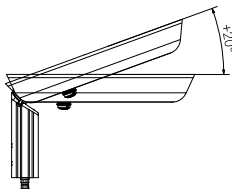
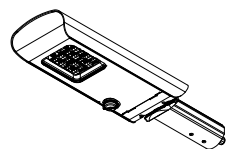
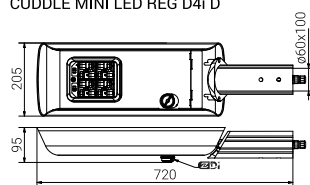
## DISEGNO TECNICO

CUDDLE MINI LED REG D4i



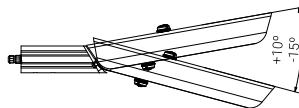
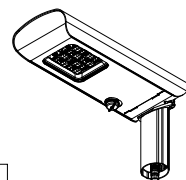
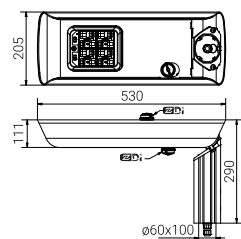
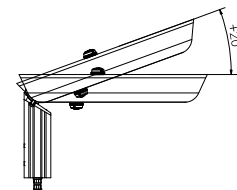
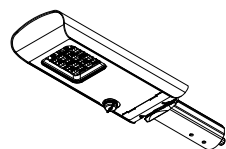
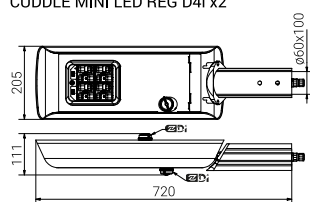
0,053m<sup>2</sup>

CUDDLE MINI LED REG D4i D



0,053m<sup>2</sup>

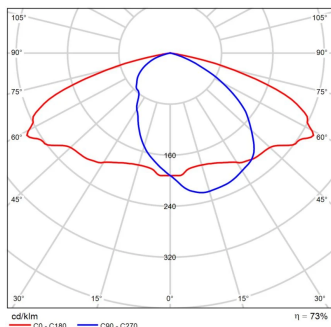
CUDDLE MINI LED REG D4i x2



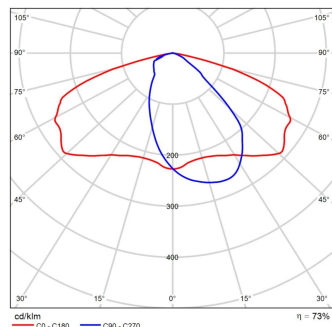
0,053m<sup>2</sup>

## CURVE FOTOMETRICHE

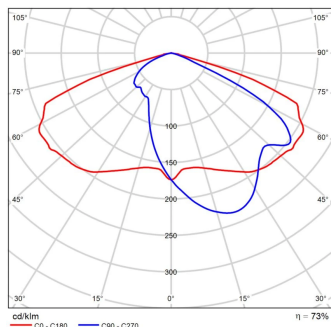
DW



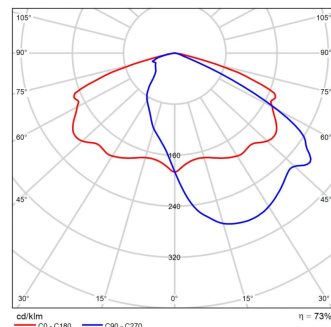
LN



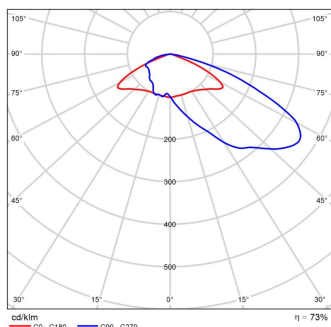
T3



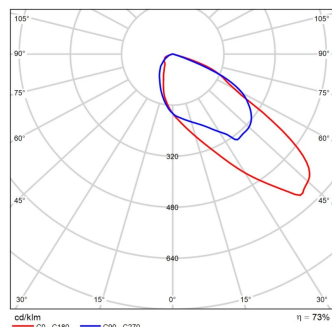
LW



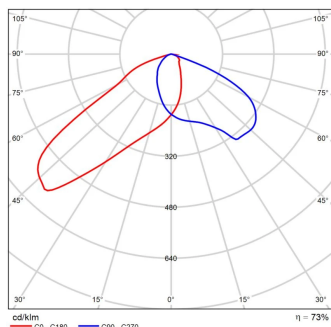
T4



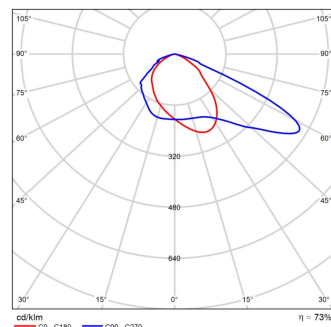
PP



PL



P2



## FUNZIONI DEL SISTEMA DI POTENZA

L'apparecchio dispone di serie delle seguenti funzioni del sistema di alimentazione intelligente:

- Possibilità di programmare l'oscuramento multistadio dell'apparecchio - fino a 5 intervalli di tempo nell'intervallo dal 10 al 100% della potenza nominale,
- Modulo LED dotato di protezione termica implementata tramite termistore NTC,
- Regolazione potenza/fluxo luminoso dell'apparecchio - possibilità di impostare un valore diverso da quello di catalogo, nel range 30-100% della potenza o del flusso nominale

## NUMERO AMMESSO DI APPARECCHI SU UN CIRCUITO

Interruttori magnetotermici di tipo B o C

| Apparecchi                         | Typ | 2A | 4A | 6A | 10A | 16A | 20A | 25A |
|------------------------------------|-----|----|----|----|-----|-----|-----|-----|
| CUDDLE MINI LED REG D4i<br>24, 36W | B   | 4  | 7  | 12 | 18  | 30  | 37  | 46  |
|                                    | C   | 4  | 10 | 16 | 27  | 43  | 54  | 68  |
| CUDDLE MINI LED REG D4i<br>48W     | B   | 1  | 2  | 4  | 6   | 10  | 12  | 15  |
|                                    | C   | 1  | 4  | 6  | 10  | 17  | 20  | 26  |
| CUDDLE MINI LED REG D4i<br>60W     | B   | 1  | 2  | 4  | 6   | 10  | 12  | 15  |
|                                    | C   | 1  | 4  | 6  | 10  | 17  | 20  | 26  |

Fusibili - tipo gG e gL

| Apparecchi                         | 2A | 4A | 6A | 10A | 16A | 20A | 25A |
|------------------------------------|----|----|----|-----|-----|-----|-----|
| CUDDLE MINI LED REG D4i<br>24, 36W | 1  | 10 | 20 | 26  | 52  | 71  | 101 |
| CUDDLE MINI LED REG D4i<br>48W     | 1  | 10 | 16 | 26  | 43  | 54  | 68  |
| CUDDLE MINI LED REG D4i<br>60W     | 0  | 2  | 4  | 5   | 10  | 14  | 20  |