

# KE 1092 Bare wire thermocouple

## Probe type

|              |               |
|--------------|---------------|
| Hot junction | Exposed       |
| Insulators   | Ceramic beads |
| Alternative  | Ceramic rod   |

## Thermocouple

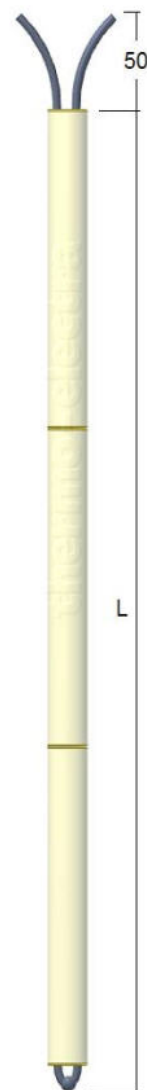
|                    |                                          |
|--------------------|------------------------------------------|
| Calibration        | K, T, J, E, N, U, L, B, R or S           |
| For duplex         | KK, TT, JJ, EE, NN, UU, LL, BB, RR or SS |
| Accuracy           | According IEC 584-1 / DIN 43710          |
| Wire size          | Diameter to specify                      |
| Standard           | 0.35 - 0.5 - 0.8 - 1.5<br>and 3.0 mm     |
| Element length "L" | Customer to specify                      |

## Construction

|                    |                            |
|--------------------|----------------------------|
| Thermocouple       | Bare wires                 |
| Insulator material | Ceramic type 610           |
| Diameter           | Customer to specify        |
| Oval shape         | 5 x 3 - 7 x 5 or 12 x 8 mm |
| Round shape        | Diameter 3 to 8 mm         |

## Options

|                    |                  |
|--------------------|------------------|
| Insulator material | Ceramic type 710 |
|--------------------|------------------|



## Thermokoppel kleurcodes

| Thermocouple<br>Extension Type   | ANSI | IEC |
|----------------------------------|------|-----|
| JX + Iron<br>- Constantan ®      |      |     |
| KX + Chromel ®<br>- Alumel ®     |      |     |
| TX + Copper<br>- Constantan ®    |      |     |
| EX + Chromel ®<br>- Constantan ® |      |     |
| NX + Nicrosil ®<br>- Nisil ®     |      |     |
| SX + Copper<br>RX - Alloy 11     |      |     |
| BX + Copper-S<br>- Copper-E      |      |     |

## Toleranties volgens IEC 584-2

| Type    | Class | Temperature range   | Fixed value °C | Tolerance to temp. t (°C) |
|---------|-------|---------------------|----------------|---------------------------|
| T       | 1     | - 40°C to + 350°C   | ± 0,5          | ± 0,004 ·  t              |
|         | 2     | - 40°C to + 350°C   | ± 1            | ± 0,0075 ·  t             |
|         | 3     | - 200°C to + 40°C   | ± 1            | ± 0,015 ·  t              |
| E       | 1     | - 40°C to + 800°C   | ± 1,5          | ± 0,004 ·  t              |
|         | 2     | - 40°C to + 900°C   | ± 2,5          | ± 0,0075 ·  t             |
|         | 3     | - 200°C to + 40°C   | ± 2,5          | ± 0,015 ·  t              |
| J       | 1     | - 40°C to + 750°C   | ± 1,5          | ± 0,004 ·  t              |
|         | 2     | - 40°C to + 750°C   | ± 2,5          | ± 0,0075 ·  t             |
|         | 3     | -                   | -              | -                         |
| K and N | 1     | - 40°C to + 1000°C  | ± 1,5          | ± 0,004 ·  t              |
|         | 2     | - 40°C to + 1200°C  | ± 2,5          | ± 0,0075 ·  t             |
|         | 3     | - 200°C to + 40°C   | ± 2,5          | ± 0,015 ·  t              |
| R and S | 1     | 0°C to + 1600°C     | ± 1,0          | ± [1+0,003·(t-1100)]°C    |
|         | 2     | 0°C to + 1600°C     | ± 1,5          | ± 0,0025 · t              |
|         | 3     | -                   | -              | -                         |
| B       | 1     | -                   | -              | -                         |
|         | 2     | + 600°C to + 1700°C | ± 1,5          | ± 0,0025 · t              |
|         | 3     | + 600°C to + 1700°C | ± 4            | ± 0,005 · t               |

## Ordering code

|                      |         |  |  |  |  |
|----------------------|---------|--|--|--|--|
| Model                | KE 1092 |  |  |  |  |
| Calibration          |         |  |  |  |  |
| Length "L" in mm     |         |  |  |  |  |
| Wire size            |         |  |  |  |  |
| Insulator size in mm |         |  |  |  |  |

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