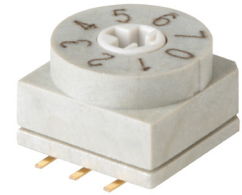


SERIES: RDS3-1065-SMT | **DESCRIPTION:** ROTARY DIP SWITCH

FEATURES

- 4, 8, 10, & 16 positions
- removable cap options
- surface mount


SPECIFICATIONS

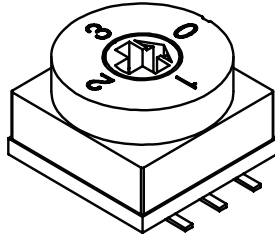
| parameter | conditions/description | min | typ | max | units |
|-----------------------|--|-----|--------|-----|---------|
| rated voltage | switching | | | 42 | Vdc |
| | non-switching | | | 42 | Vdc |
| rated current | switching | | | 150 | mA |
| | non-switching | | | 200 | mA |
| withstanding voltage | for 1 minute | | 250 | | Vac |
| contact resistance | | | | 80 | mΩ |
| insulation resistance | for 1 minute at 250 Vdc | 100 | | | MΩ |
| operating torque | | | | 700 | gf*cm |
| actuator travel | continuous rotation | | 360 | | degrees |
| operating temperature | | -40 | | 85 | °C |
| storage temperature | | -40 | | 85 | °C |
| life | at 42 Vdc, 150 mA, 15~20 cycles/minute | | 10,000 | | steps |
| flammability rating | see material tables | | | | |
| RoHS | yes | | | | |

PART NUMBER KEY

| | | | | | | | | | | | |
|-------------|-------------|---|---|---|-------------|---|--|---|------------|---|-----------|
| | RDS3 | - | XXS | - | 1065 | - | X | - | SMT | - | TR |
| Base Number | | | No. of Positions: 4 = 4 Positions 8 = 8 Positions 10 = 10 Positions 16 = 16 Positions | | | | Actuator Cap: "blank" = Without Cap 1 = Notched Cap 2 = Raised Slotted Cap 3 = Numbered Dial | | | | |

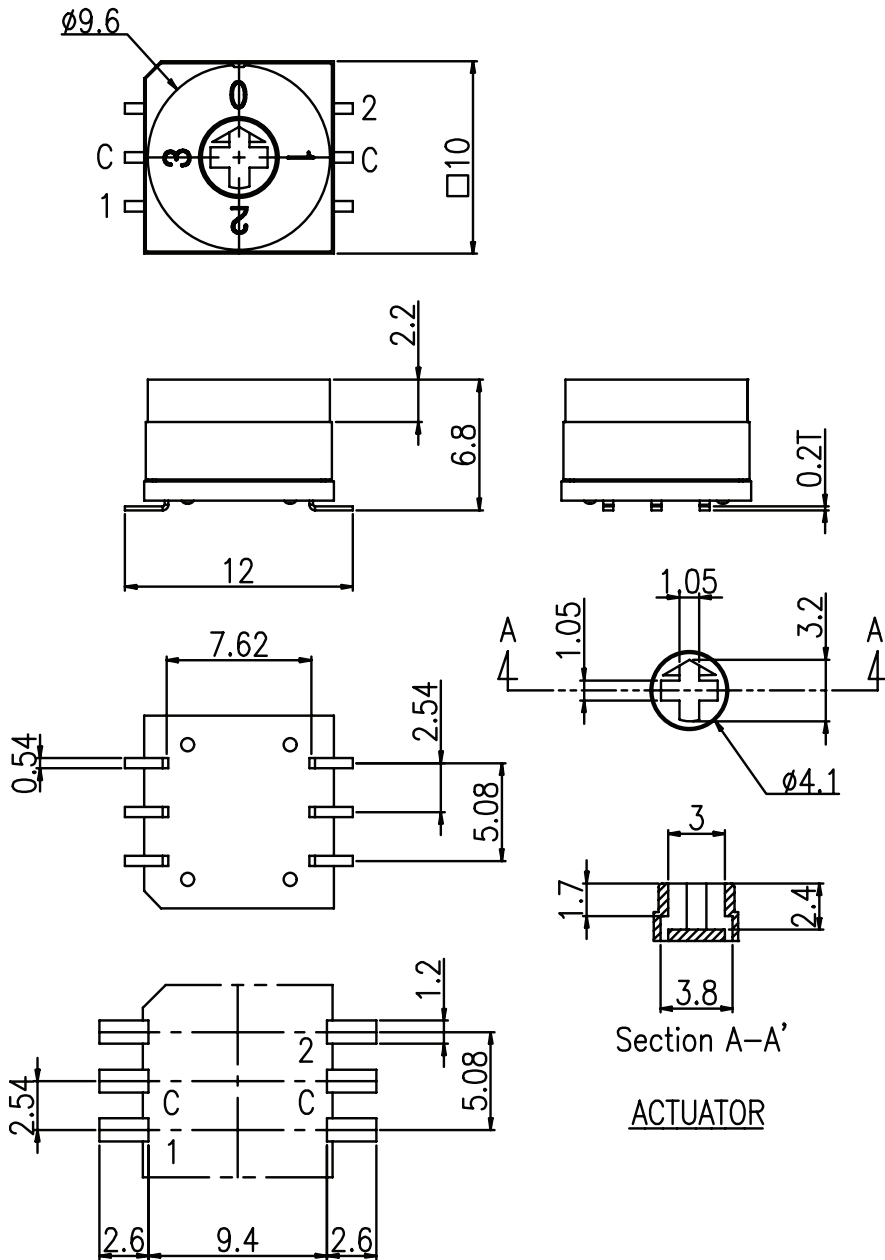
MECHANICAL DRAWING (POSITION 4)

units: mm
 tolerance: ±0.1 mm
 unless otherwise specified



| DESCRIPTION | MATERIAL | PLATING/COLOR |
|-------------|-------------------|---------------|
| actuator | PA66 (UL94V-0) | white |
| cover | LCP (UL94V-0) | gray |
| base | LCP (UL94V-0) | gray |
| terminals | phosphorus bronze | Ni/Au |

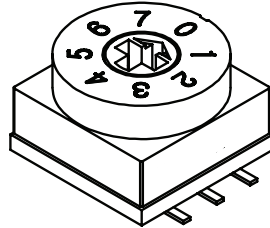
| ON ● | | | | |
|------------|------|---|---|---|
| OFF ○ | CODE | | | |
| TYPE | POS | C | 1 | 2 |
| 4 POSITION | 0 | ● | ○ | ○ |
| | 1 | ● | ● | ○ |
| | 2 | ● | ○ | ● |
| | 3 | ● | ● | ● |



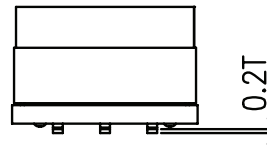
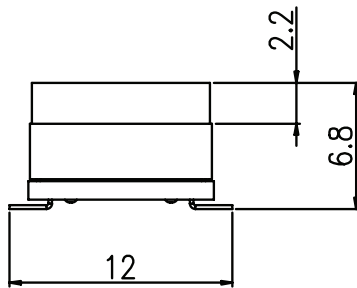
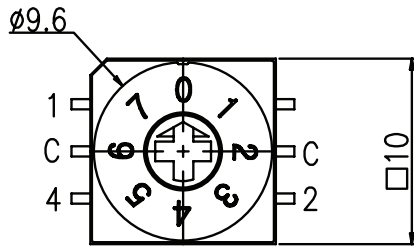
Recommended PCB Layout
 Top View

MECHANICAL DRAWING (POSITION 8)

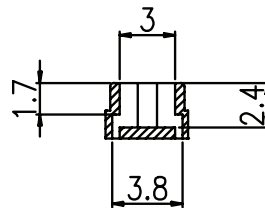
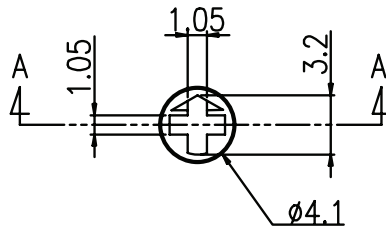
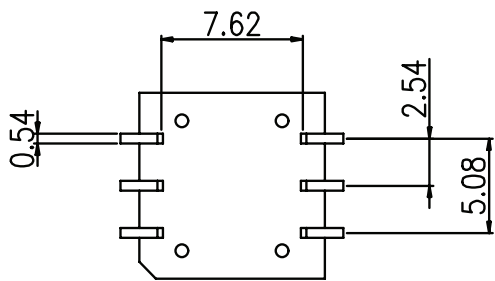
units: mm
 tolerance: ±0.1 mm
 unless otherwise specified



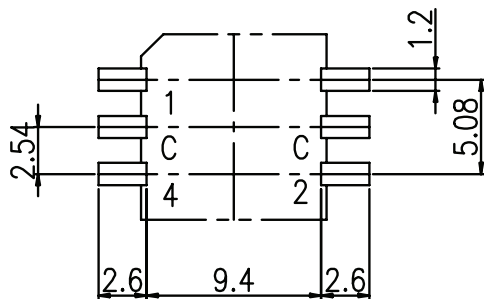
| DESCRIPTION | MATERIAL | PLATING/COLOR |
|-------------|-------------------|---------------|
| actuator | PA66 (UL94V-0) | white |
| cover | LCP (UL94V-0) | gray |
| base | LCP (UL94V-0) | gray |
| terminals | phosphorus bronze | Ni/Au |



| ON ● | | | | | |
|------------|------|---|---|---|---|
| OFF ○ | CODE | | | | |
| TYPE | POS | C | 1 | 2 | 4 |
| 8 POSITION | 0 | ● | ○ | ○ | ○ |
| | 1 | ● | ● | ○ | ○ |
| | 2 | ● | ○ | ● | ○ |
| | 3 | ● | ● | ● | ○ |
| | 4 | ● | ○ | ○ | ● |
| | 5 | ● | ● | ○ | ● |
| | 6 | ● | ○ | ● | ● |
| | 7 | ● | ● | ● | ● |



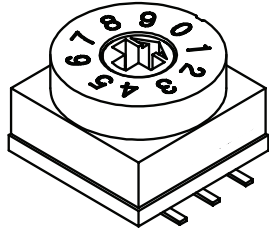
Section A-A'
 ACTUATOR



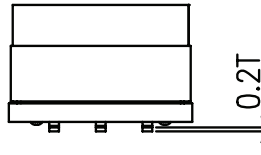
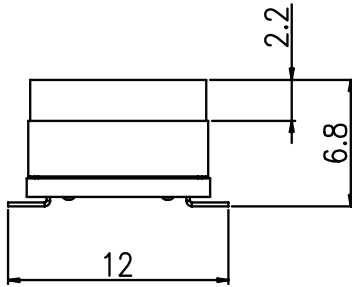
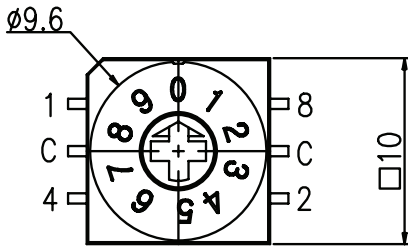
Recommended PCB Layout
 Top View

MECHANICAL DRAWING (POSITION 10)

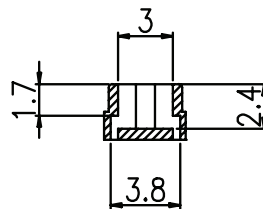
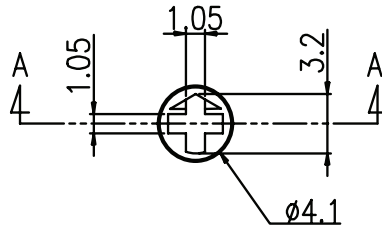
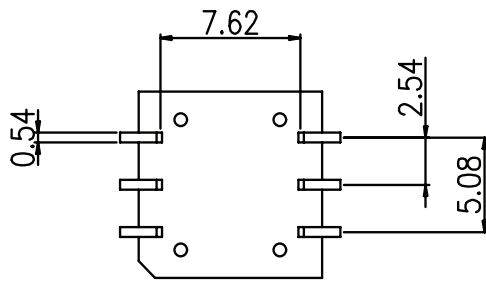
units: mm
tolerance: ±0.1 mm
unless otherwise specified



| DESCRIPTION | MATERIAL | PLATING/COLOR |
|-------------|-------------------|---------------|
| actuator | PA66 [UL94V-0] | white |
| cover | LCP [UL94V-0] | gray |
| base | LCP [UL94V-0] | gray |
| terminals | phosphorus bronze | Ni/Au |

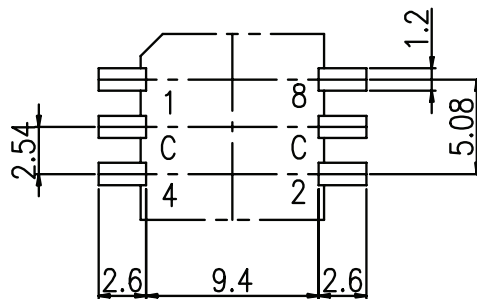


| TYPE | POS | CODE | | | | |
|-------------|-----|------|---|---|---|---|
| | | C | 1 | 2 | 4 | 8 |
| 10 POSITION | 0 | ● | ○ | ○ | ○ | ○ |
| | 1 | ● | ● | ○ | ○ | ○ |
| | 2 | ● | ○ | ● | ○ | ○ |
| | 3 | ● | ● | ● | ○ | ○ |
| | 4 | ● | ○ | ○ | ● | ○ |
| | 5 | ● | ● | ○ | ● | ○ |
| | 6 | ● | ○ | ● | ● | ○ |
| | 7 | ● | ● | ● | ● | ○ |
| | 8 | ● | ○ | ○ | ○ | ● |
| | 9 | ● | ● | ○ | ○ | ● |



Section A-A'

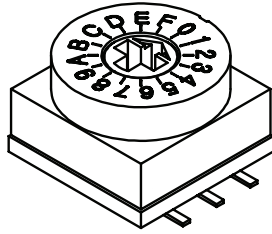
ACTUATOR



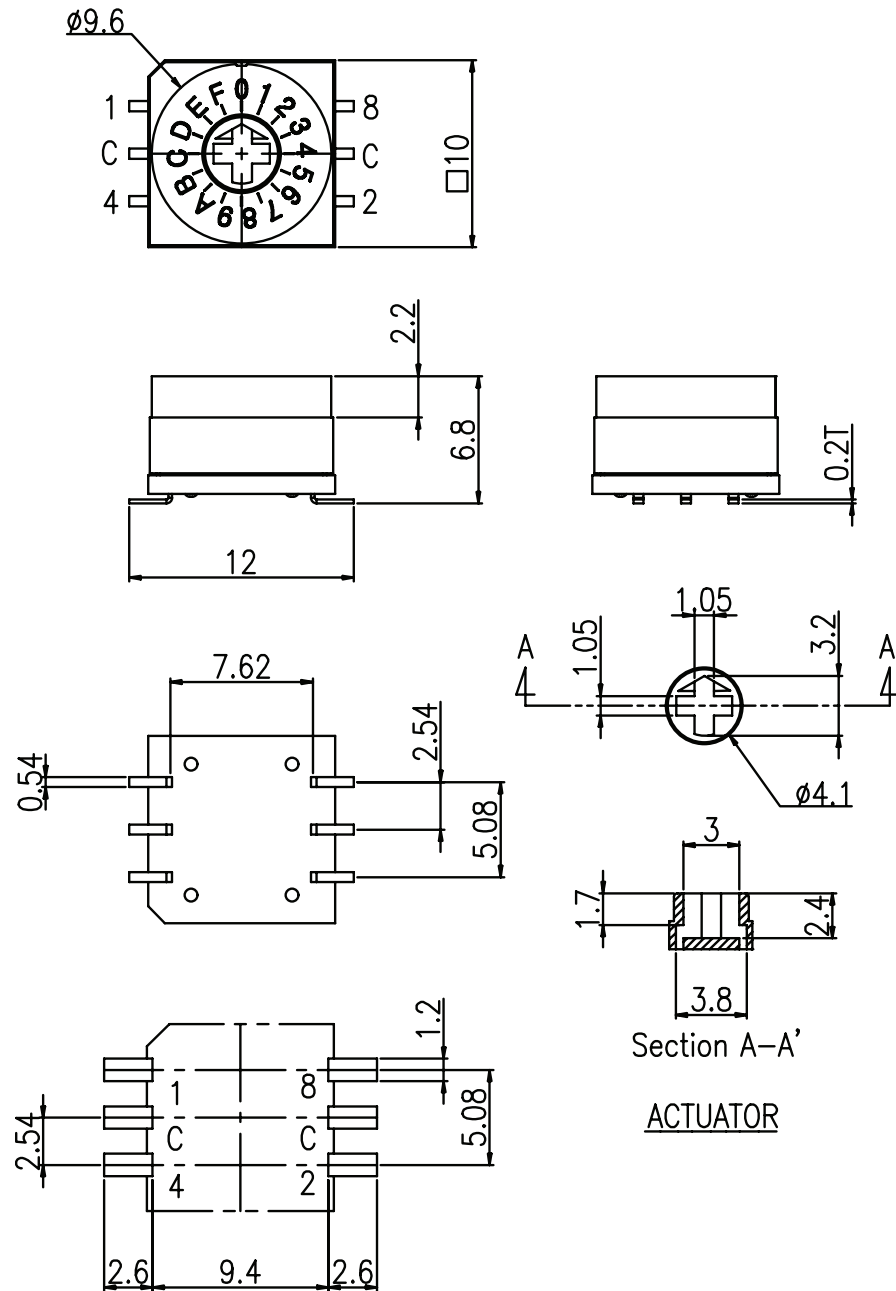
Recommended PCB Layout
Top View

MECHANICAL DRAWING (POSITION 16)

units: mm
tolerance: ±0.1 mm
unless otherwise specified



| DESCRIPTION | MATERIAL | PLATING/COLOR |
|-------------|-------------------|---------------|
| actuator | PA66 [UL94V-0] | white |
| cover | LCP [UL94V-0] | gray |
| base | LCP [UL94V-0] | gray |
| terminals | phosphorus bronze | Ni/Au |



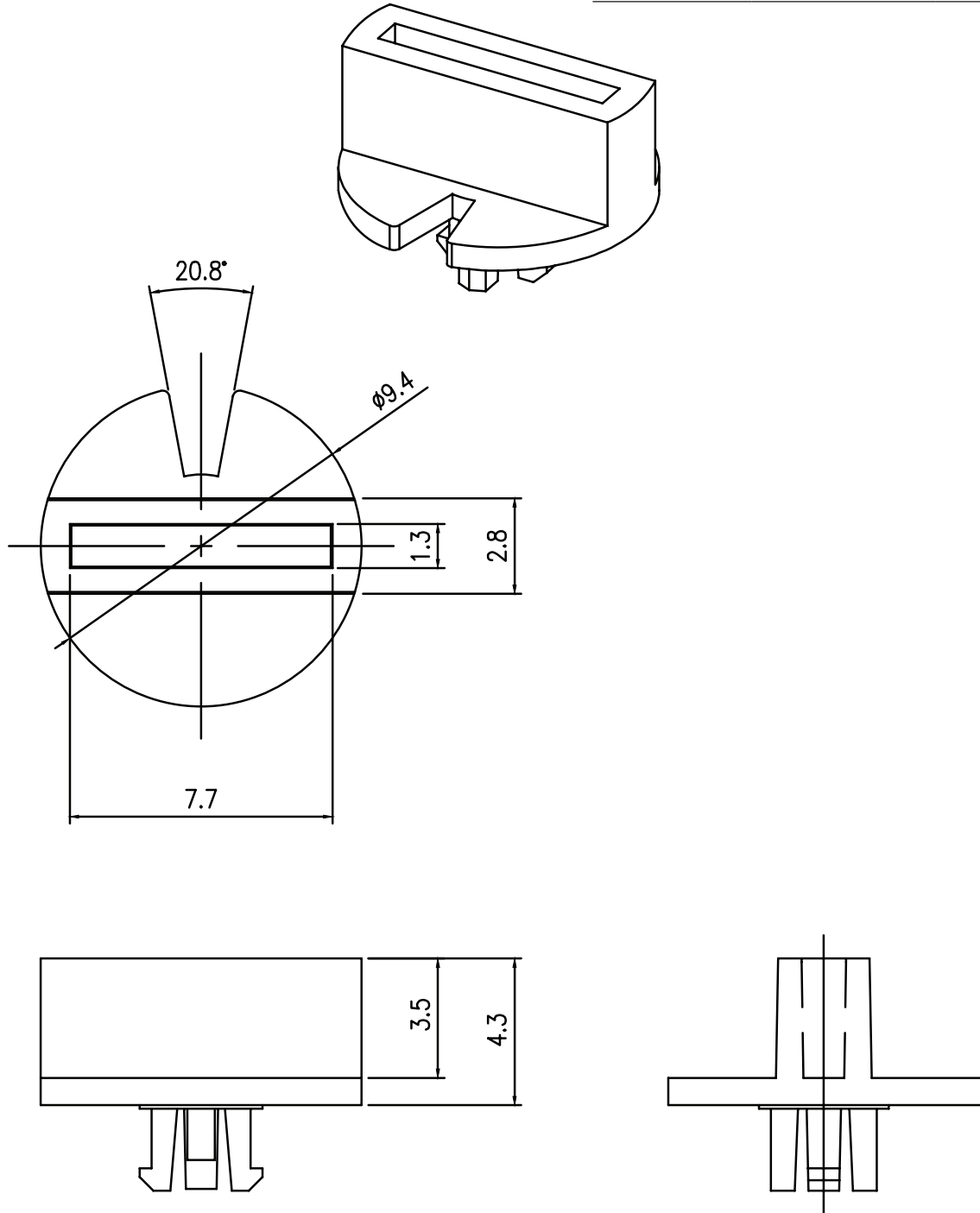
| TYPE | POS | CODE | | | | |
|-------------|-----|------|---|---|---|---|
| | | C | 1 | 2 | 4 | 8 |
| 16 POSITION | 0 | ● | ○ | ○ | ○ | ○ |
| | 1 | ● | ● | ○ | ○ | ○ |
| | 2 | ● | ○ | ● | ○ | ○ |
| | 3 | ● | ● | ● | ○ | ○ |
| | 4 | ● | ○ | ○ | ● | ○ |
| | 5 | ● | ● | ○ | ● | ○ |
| | 6 | ● | ○ | ● | ● | ○ |
| | 7 | ● | ● | ● | ● | ○ |
| | 8 | ● | ○ | ○ | ○ | ● |
| | 9 | ● | ● | ○ | ○ | ● |
| | A | ● | ○ | ● | ○ | ● |
| | B | ● | ● | ● | ○ | ● |
| | C | ● | ○ | ○ | ● | ● |
| | E | ● | ○ | ● | ● | ● |
| | F | ● | ● | ● | ● | ● |

Recommended PCB Layout
Top View

MECHANICAL DRAWING (NOTCHED CAP)

units: mm
 tolerance: ±0.3 mm
 unless otherwise specified

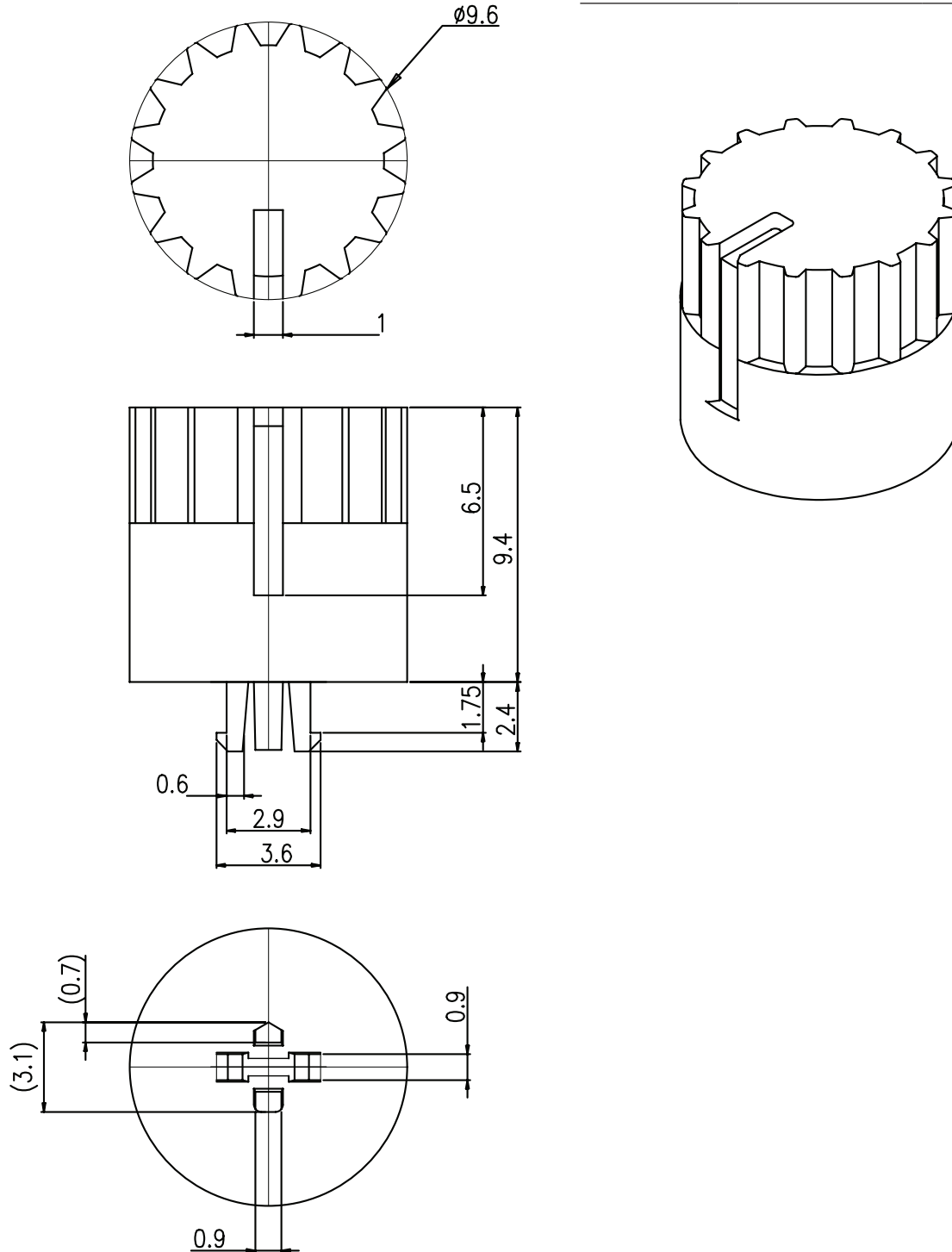
| DESCRIPTION | MATERIAL | PLATING/COLOR |
|-------------|----------------|---------------|
| housing | PA66 (UL94V-0) | black |



MECHANICAL DRAWING (RAISED SLOTTED CAP)

units: mm
 tolerance: ±0.3 mm
 unless otherwise specified

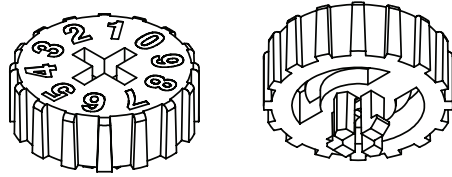
| DESCRIPTION | MATERIAL | PLATING/COLOR |
|-------------|----------------|---------------|
| housing | PA66 (UL94V-0) | black |



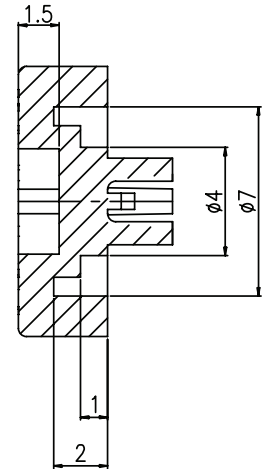
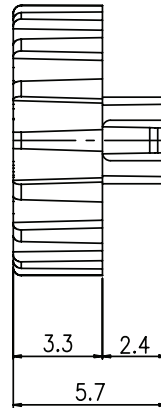
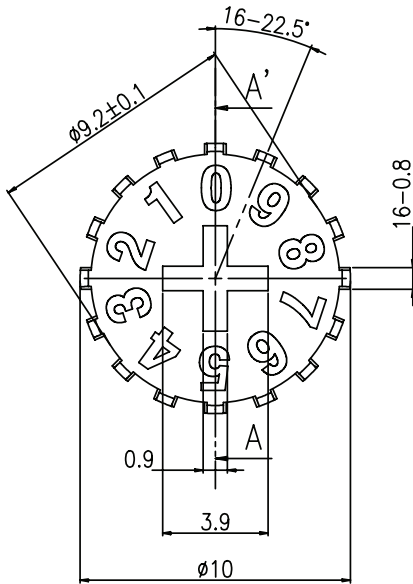
MECHANICAL DRAWING (NUMBERED DIAL)

units: mm
 tolerance: ± 0.3 mm
 unless otherwise specified

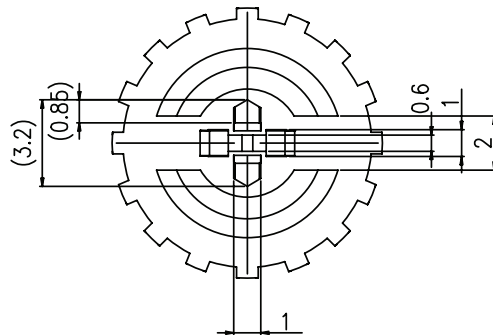
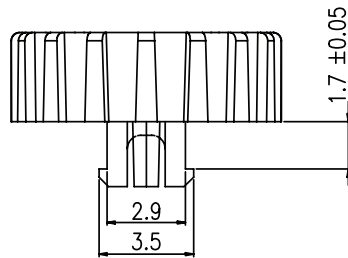
| DESCRIPTION | MATERIAL | PLATING/COLOR |
|-------------|----------------|---------------|
| housing | PA66 (UL94V-0) | black |



| Position | Direction |
|----------|-----------|
| 04 | |
| 08 | |
| 10 | |
| 16 | |

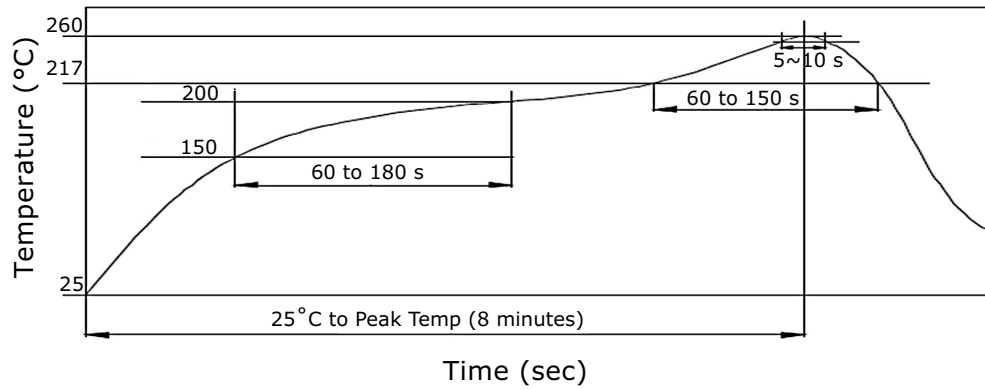


SECTION A-A'



SOLDERABILITY

| parameter | conditions/description | min | typ | max | units |
|------------------|------------------------|-----|-----|-----|-------|
| hand soldering | for maximum 3 seconds | | | 350 | °C |
| reflow soldering | | | | 260 | °C |

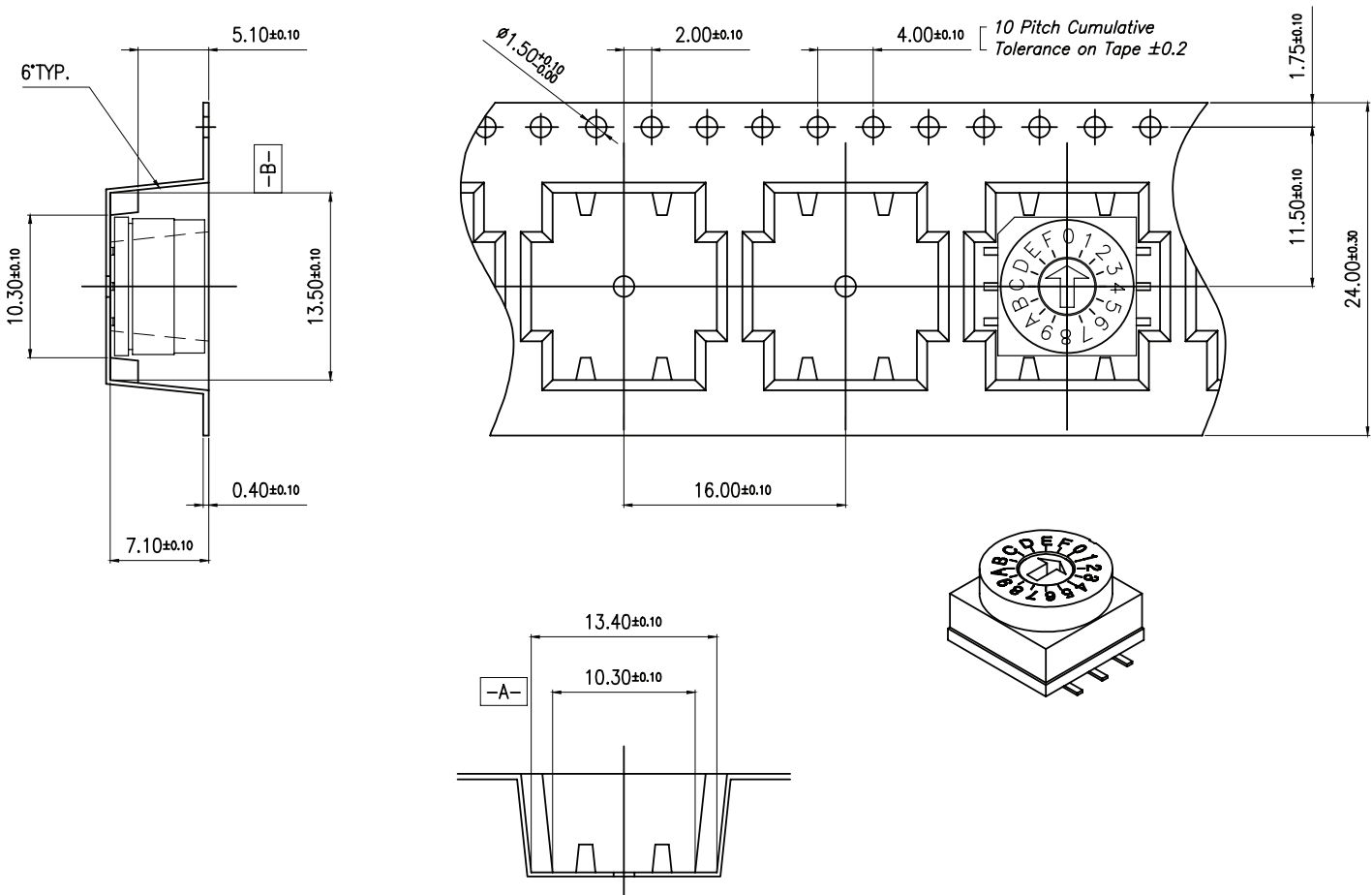


PACKAGING

units: mm

Reel Size: Ø330 mm

Reel QTY: 600 pcs per reel



REVISION HISTORY

| rev. | description | date |
|------|-----------------------------------|------------|
| 1.0 | initial release | 05/30/2023 |
| 1.01 | CUI Devices rebranded to Same Sky | 09/12/2024 |

The revision history provided is for informational purposes only and is believed to be accurate.



Same Sky offers a one (1) year limited warranty. Complete warranty information is listed on our website.

Same Sky reserves the right to make changes to the product at any time without notice. Information provided by Same Sky is believed to be accurate and reliable. However, no responsibility is assumed by Same Sky for its use, nor for any infringements of patents or other rights of third parties which may result from its use.

Same Sky products are not authorized or warranted for use as critical components in equipment that requires an extremely high level of reliability. A critical component is any component of a life support device or system whose failure to perform can be reasonably expected to cause the failure of the life support device or system, or to affect its safety or effectiveness.

[sameskydevices.com](https://www.sameskydevices.com)