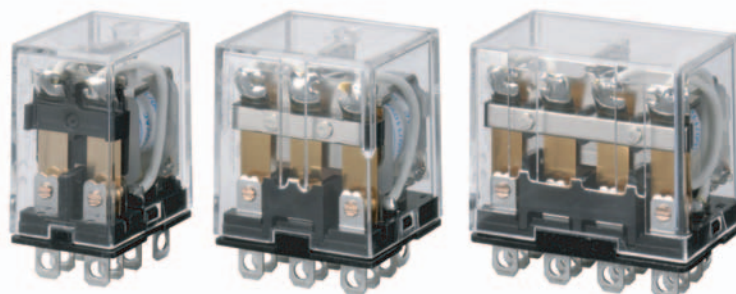


## Power-switching Compact General-purpose Relays



- The standard models include models that are compliant with the UL, CSA, and SEV safety standards and with the Electrical Appliances and Material Safety Act.
- Equipped with an arc barrier for arc interruption.
- Withstand voltages up to 2,000 V.
- New built-in diode and built-in CR circuit models have joined the series.
- The lineup also includes models that are compliant with the LR and VDE safety standards.
- Single-pole and double-pole models have AC4 ratings and DC2 ratings (operating coil ratings: 100/110 VAC, 110/120 VAC, 200/220 VAC, 220/240 VAC, and 100/110 VDC).
- Three-pole and four-pole models have AC4 ratings and DC2 ratings (operating coil ratings: 100/110 VAC, 200/220 VAC and 100/110 VDC).



Refer to the standards certifications and compliance section of your OMRON website for the latest information on certified models.



Refer to the *Common Relay Precautions*.

## Model Number Structure

| Classification                                                                                                                                                        | Structure       |             | Relays with Plug-in Terminals |                           | Relays with PCB Terminals | Case-surface mounting |
|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------|-------------|-------------------------------|---------------------------|---------------------------|-----------------------|
|                                                                                                                                                                       | Number of poles |             |                               | With operation indicators |                           |                       |
|                                                                                                                                                                       |                 |             |                               |                           |                           |                       |
| Standard models<br>Compliance with Electrical Appliances and Material Safety Act                                                                                      | 1               |             | *LY1                          | **LY1N                    | *LY1-0                    | *LY1F                 |
|                                                                                                                                                                       | 2               |             | *LY2                          | **LY2N                    | *LY2-0                    | *LY2F                 |
|                                                                                                                                                                       | 2               | Bifur-cated | **LY2Z                        | **LY2ZN                   | **LY2Z-0                  | **LY2ZF               |
|                                                                                                                                                                       | 3               |             | *LY3                          | **LY3N                    | *LY3-0                    | *LY3F                 |
| Models with diode for coil surge absorption (DC coil specification only)<br>       | 4               |             | *LY4                          | **LY4N                    | *LY4-0                    | *LY4F                 |
|                                                                                                                                                                       | 1               |             | **LY1-D                       | **LY1N-D2                 | ---                       | ---                   |
|                                                                                                                                                                       | 2               |             | **LY2-D                       | **LY2N-D2                 | ---                       | ---                   |
|                                                                                                                                                                       | 2               | Bifur-cated | **LY2Z-D                      | **LY2ZN-D2                | ---                       | ---                   |
| Models with CR circuits for coil surge absorption (AC coil specification only)<br> | 3               |             | **LY3-D                       | **LY3N-D2                 | ---                       | ---                   |
|                                                                                                                                                                       | 4               |             | **LY4-D                       | **LY4N-D2                 | ---                       | ---                   |
|                                                                                                                                                                       | 1               |             | ---                           | ---                       | /                         | /                     |
|                                                                                                                                                                       | 2               |             | **LY2-CR                      | **LY2N-CR                 |                           |                       |
|                                                                                                                                                                       | 2               | Bifur-cated | **LY2Z-CR                     | **LY2ZN-CR                |                           |                       |

- Note:** 1. Cells with a diagonal line cannot be manufactured. Ask your OMRON representative for details on manufacturing products for cells containing "—" in the above table.
2. If #187 tab terminals are required, use the LY1F-T2 or LY2F-T2 (single-pole or double-pole models only).
3. Refer to page 12 for information on plug-in terminal and socket combinations.
4. Items with an asterisk (\*) in the table are certified for UL, CSA, and SEV. This is indicated with a certification mark on the products.
5. Items with two asterisks (\*\*) in the table are certified for UL and CSA. This is indicated with a certification mark on the products.
6. All models in the table are certified for IEC (TÜV).
7. The models with plug-in terminals (single-pole, double-pole, and 4-pole) were combined with the PTF-E for the EC Declaration of Conformity. These products display the CE Marking.

## Ordering Information

When your order, specify the rated voltage.

### Models with Plug-in Terminals

| Number of poles             |                                                           | 1 pole  |                                          | 2 poles  |                                                   | 3 poles |                                 | 4 poles |                                 |
|-----------------------------|-----------------------------------------------------------|---------|------------------------------------------|----------|---------------------------------------------------|---------|---------------------------------|---------|---------------------------------|
| Classification              |                                                           | Model   | Rated voltage (V)                        | Model    | Rated voltage (V)                                 | Model   | Rated voltage (V)               | Model   | Rated voltage (V)               |
| Models with single contacts | Standard models                                           | LY1     | 12, 24, 100/110, 110/120, or 200/220 VAC | LY2      | 12, 24, 100/110, 110/120, 200/220, or 220/240 VAC | LY3     | 12, 24, 100/110, or 200/220 VAC | LY4     | 12, 24, 100/110, or 200/220 VAC |
|                             |                                                           |         | 12, 24, 48, or 100/110 VDC               |          | 12, 24, 48, or 100/110 VDC                        |         | 12, 24, 48, or 100/110 VDC      |         | 12, 24, 48, or 100/110 VDC      |
|                             | Models with built-in operation indicators                 | LY1N    | 12, 24, 100/110, 110/120, or 200/220 VAC | LY2N     | 12, 24, 100/110, 110/120, 200/220, or 220/240 VAC | LY3N    | 12, 24, 100/110, or 200/220 VAC | LY4N    | 12, 24, 100/110, or 200/220 VAC |
|                             |                                                           |         | 12, 24, or 100/110 VDC                   |          | 12, 24, 48, or 100/110 VDC                        |         | 12, 24, 48, or 100/110 VDC      |         | 12, 24, 48, or 100/110 VDC      |
|                             | Models with built-in diodes                               | LY1-D   | 12, 24, 48, or 100/110 VDC               | LY2-D    | 12, 24, 48, or 100/110 VDC                        | LY3-D   | 12, 24, 48, or 100/110 VDC      | LY4-D   | 12, 24, 48, or 100/110 VDC      |
|                             | Models with built-in diodes and operation indicators      | LY1N-D2 | 12, 24, or 48 VDC                        | LY2N-D2  | 12, 24, 48, or 100/110 VDC                        | LY3N-D2 | 12, 24, or 100/110 VDC          | LY4N-D2 | 12, 24, 48, or 100/110 VDC      |
| Bifurcated contacts         | Standard models                                           | ---     | ---                                      | LY2Z     | 100/110, 110/120, 200/220, or 220/240 VAC         | ---     | ---                             | ---     | ---                             |
|                             |                                                           | ---     | ---                                      |          | 12, 24, 48, or 100/110 VDC                        | ---     | ---                             | ---     | ---                             |
|                             | Models with built-in operation indicators                 | ---     | ---                                      | LY2ZN    | 100/110, 110/120, 200/220, or 220/240 VAC         | ---     | ---                             | ---     | ---                             |
|                             |                                                           | ---     | ---                                      |          | 12 or 24 VDC                                      | ---     | ---                             | ---     | ---                             |
|                             | Models with built-in diodes                               | ---     | ---                                      | LY2Z-D   | 12, 24, or 48 VDC                                 | ---     | ---                             | ---     | ---                             |
|                             | Models with built-in diodes and operation indicators      | ---     | ---                                      | LY2ZN-D2 | 12, 24, or 100/110 VDC                            | ---     | ---                             | ---     | ---                             |
| Bifurcated contacts         | Models with built-in CR circuits                          | ---     | ---                                      | LY2Z-CR  | 100/110 VAC                                       | ---     | ---                             | ---     | ---                             |
|                             | Models with built-in CR circuits and operation indicators | ---     | ---                                      | LY2ZN-CR | 100, 110, 110/120, or 200/220 VAC                 | ---     | ---                             | ---     | ---                             |

### Relays with PCB Terminals

| Number of poles             |       | 1 pole |                                      | 2 poles |                                                   | 3 poles |                             | 4 poles |                             |
|-----------------------------|-------|--------|--------------------------------------|---------|---------------------------------------------------|---------|-----------------------------|---------|-----------------------------|
| Classification              |       | Model  | Rated voltage (V)                    | Model   | Rated voltage (V)                                 | Model   | Rated voltage (V)           | Model   | Rated voltage (V)           |
| Models with single contacts | LY1-0 |        | 24, 100/110, 110/120, or 200/220 VAC | LY2-0   | 12, 24, 100/110, 110/120, 200/220, or 220/240 VAC | LY3-0   | 24, 100/110, or 200/220 VAC | LY4-0   | 24, 100/110, or 200/220 VAC |
|                             |       |        | 12 or 24 VDC                         |         | 12, 24, 48, or 100/110 VDC                        |         | 12, 24, 48, or 100/110 VDC  |         | 12, 24, 48, or 100/110 VDC  |
| Bifurcated contacts         | ---   | ---    | ---                                  | LY2Z-0  | 100/110 VAC                                       | ---     | ---                         | ---     | ---                         |
|                             |       |        |                                      |         | 24, 48, or 100/110 VDC                            |         |                             |         | ---                         |

### Case-surface Mounting

| Number of poles             |      | 1 pole |                                               | 2 poles |                                                   | 3 poles |                                 | 4 poles |                                 |
|-----------------------------|------|--------|-----------------------------------------------|---------|---------------------------------------------------|---------|---------------------------------|---------|---------------------------------|
| Classification              |      | Model  | Rated voltage (V)                             | Model   | Rated voltage (V)                                 | Model   | Rated voltage (V)               | Model   | Rated voltage (V)               |
| Models with single contacts | LY1F |        | 24, 100/110, 110/120, 200/220, or 220/240 VAC | LY2F    | 12, 24, 100/110, 110/120, 200/220, or 220/240 VAC | LY3F    | 12, 24, 100/110, or 200/220 VAC | LY4F    | 12, 24, 100/110, or 200/220 VAC |
|                             |      |        | 6, 12, 24, or 100/110 VDC                     |         | 12, 24, 48, or 100/110 VDC                        |         | 12, 24, or 100/110 VDC          |         | 12, 24, or 100/110 VDC          |
| Bifurcated contacts         | ---  | ---    | ---                                           | LY2ZF   | 24, 100/110, or 200/220 VAC                       | ---     | ---                             | ---     | ---                             |
|                             |      |        |                                               |         | 12 or 24 VDC                                      |         |                                 |         | ---                             |