## Ordering method

SXYBx - C - A1 - 305 - 45 - ZFL20 - 15 - 3L - RCX142 - E - R - P1 - CC - S

| Model | Cable | Combination | X-axis stroke | Y-axis stroke | ZR-axis | Z-axis stroke | Cable length | Controller | Usable for CE | Regenerative unit | Option I/O | Network | Battery |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | | A1 to A4 | 15 to 305 | 15 to 45 | | 15 to 35 | 3L, 5L, 10L | | | | | | |

Note : For the details of the controller, please refer to the catalog of Yamaha Controllers.

## Specification

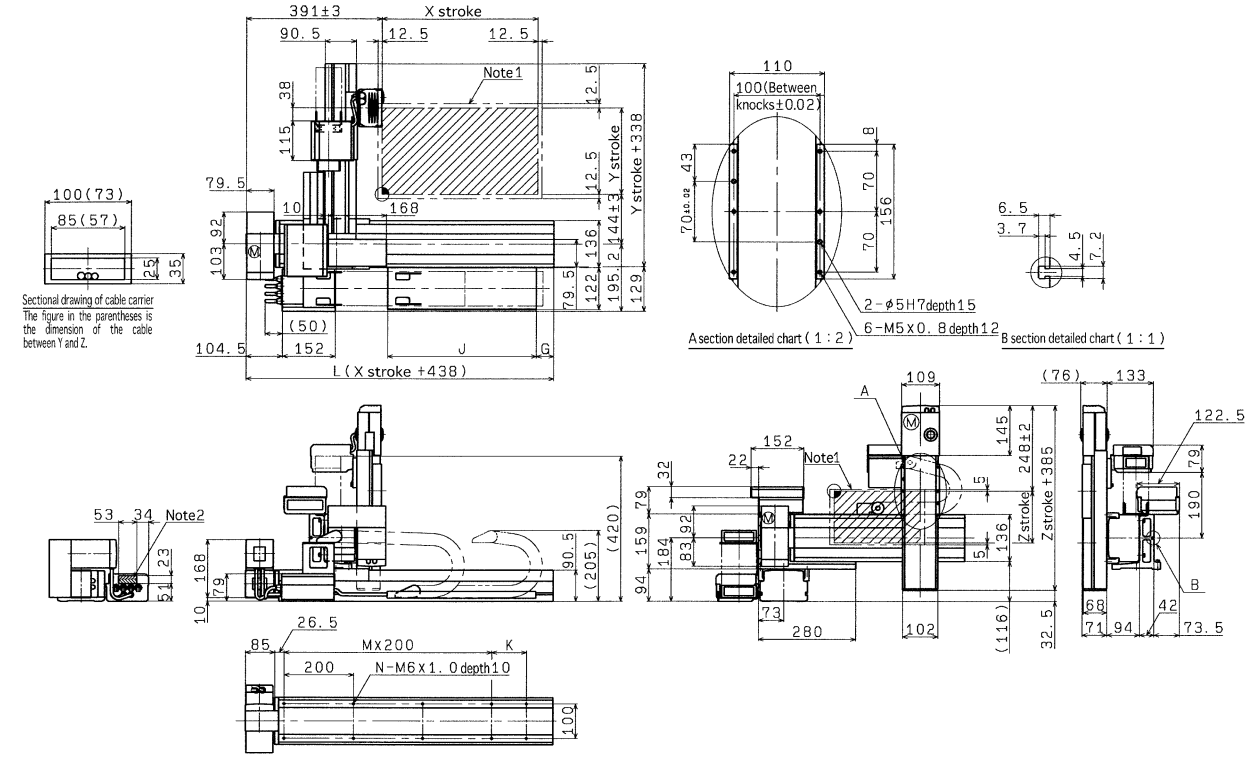
| | X-axis | Y-axis | Z-axis |
|---|---|---|---|
| Motor output | 200W | 100W | 200W |
| Repeatability Note 1 | +/-0.04mm | +/-0.04mm | +/-0.01mm |
| Drive system | Timing belt | Timing belt | Ball screw(Class C7) |
| Ball screw lead (Deceleration ratio) | Equivalent to lead 25mm | Equivalent to lead 25mm | 20mm |
| Maximum speed Note 2 | 1875mm/sec | 1875mm/sec | 1200mm/sec |
| Moving range | 150 to 3050mm | 150 to 450mm | 150 to 350mm |
| Robot cable length | Standard : 3.5m Option : 5m, 10m | | |
| Controller | RCX142-R | | |

Note 1 : Repeatability for single oscillation.

## Maximum load capacity

| Y stroke \ Z stroke | 150mm | 250mm | 350mm |
|---|---|---|---|
| 150mm | 7kg | 6kg | 5kg |
| 250mm | 5kg | 4kg | 3kg |
| 350mm | 3kg | 2kg | 1kg |
| 450mm | 1kg | — | — |

A1




Note 1 : The moving range when returning to origin and the stop position when stopping by the mechanical stopper. Note 2 : Theshaded position indicates the port where the user cable is taken out.

| X stroke | 150 | 250 | 350 | 450 | 550 | 650 | 750 | 850 | 950 | 1050 | 1150 | 1250 | 1350 | 1450 | 1550 | 1650 | 1750 | 1850 | 1950 | 2050 | 2150 | 2250 | 2350 | 2450 | 2550 | 2650 | 2750 | 2850 | 2950 | 3050 |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| L | 588 | 688 | 788 | 888 | 988 | 1088 | 1188 | 1288 | 1388 | 1488 | 1588 | 1688 | 1788 | 1888 | 1988 | 2088 | 2188 | 2288 | 2388 | 2488 | 2588 | 2688 | 2788 | 2888 | 2988 | 3088 | 3188 | 3288 | 3388 | 3488 |
| K | 200 | 100 | 200 | 100 | 200 | 100 | 200 | 100 | 200 | 100 | 200 | 100 | 200 | 100 | 200 | 100 | 200 | 100 | 200 | 100 | 200 | 100 | 200 | 100 | 200 | 100 | 200 | 100 | 200 | 100 |
| M | 1 | 2 | 2 | 3 | 3 | 4 | 4 | 5 | 5 | 6 | 6 | 7 | 7 | 8 | 8 | 9 | 9 | 10 | 10 | 11 | 11 | 12 | 12 | 13 | 13 | 14 | 14 | 15 | 15 | 16 |
| N | 6 | 8 | 8 | 10 | 10 | 12 | 12 | 14 | 14 | 16 | 16 | 18 | 18 | 20 | 20 | 22 | 22 | 24 | 24 | 26 | 26 | 28 | 28 | 30 | 30 | 32 | 32 | 34 | 34 | 36 |
| G | 0 | 50 | 0 | 50 | 0 | 50 | 0 | 50 | 0 | 50 | 0 | 50 | 0 | 50 | 0 | 50 | 0 | 50 | 0 | 50 | 0 | 50 | 0 | 50 | 0 | 50 | 0 | 50 | 0 | 50 |
| J | 330 | 330 | 430 | 430 | 530 | 530 | 630 | 630 | 730 | 730 | 830 | 830 | 930 | 930 | 1030 | 1030 | 1130 | 1130 | 1230 | 1230 | 1330 | 1330 | 1430 | 1430 | 1530 | 1530 | 1630 | 1630 | 1730 | 1730 |

| Y stroke | 150 | 250 | 350 | 450 |
|---|---|---|---|---|

| Z stroke | 150 | 250 | 350 |
|---|---|---|---|