

## CNC Rotary Table

### High - Power Clamp, Motor at Left

G X A - 1 7 0 S L

new  
optimization  
mode |

Table size

**S** Super multiple pneumatic  
**H** Hydraulic

☒ Vertical & horizontal application

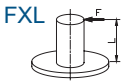
☒ Vertical application

worm gear transmission



- Worktable diameter Ø170, Ø210, Ø255.
- Motor mounted at left side of table
- Full gear depth transmitted by dual lead worm drive, resulting in higher efficiency and lower backlash. (P.20)

## SPECIFICATIONS

| MODEL                                             |                                                                                     | Unit              | GXA-170SL                            | GVA-210SL                            | GXA-255HL            |
|---------------------------------------------------|-------------------------------------------------------------------------------------|-------------------|--------------------------------------|--------------------------------------|----------------------|
| Worktable diameter                                | mm / inch                                                                           |                   | Ø170 / Ø 6.69                        | Ø210 / Ø 8.27                        | Ø255 / Ø10.04        |
| Center bore diameter                              | mm / inch                                                                           |                   | Ø40H7 / Ø 1.57H7                     | Ø65H7 / Ø 2.56H7                     | Ø140H7 / Ø 5.51H7    |
| Through-bor diameter                              | mm / inch                                                                           |                   | Ø40 / Ø 1.57H7                       | Ø65 / Ø 2.56H7                       | Ø100 / Ø 3.94        |
| Height of table (horizontal)                      | mm / inch                                                                           |                   | 175 / 6.89                           | —                                    | 210 / 8.27           |
| Height of table (vertical)                        | mm / inch                                                                           |                   | 135 / 5.31                           | 160 / 6.3                            | 190 / 7.48           |
| Width of T-slot                                   | mm / inch                                                                           |                   | 12H7 / 0.47H7                        | 12H7 / 0.47H7                        | 12H7 / 0.47H7        |
| Width of guide block                              | mm / inch                                                                           |                   | 18 / 0.71                            | 18 / 0.71                            | 18 / 0.71            |
| Clamping method / pressure                        | Mpa / psi                                                                           |                   | Pneumatic<br>0.55 ~ 0.7 / 79.8-101.5 | Pneumatic<br>0.55 ~ 0.7 / 79.8-101.5 | Hydraulic<br>5 / 725 |
| Clamping torque                                   | N.m / ft. lbs.                                                                      |                   | 300 / 221.1                          | 400 / 294.8                          | 900 / 663.3          |
| Servo motor spec                                  |                                                                                     |                   | refer to page 73                     |                                      |                      |
| Transmission ratio                                |                                                                                     |                   | 1 / 60                               | 1 / 72                               | 1 / 120              |
| Max. table speed / at specified servo motor speed | min <sup>-1</sup>                                                                   |                   | 53.3 / 3200                          | 53.3 / 3840                          | 22.2 / 2000          |
| Allowable loading inertia                         | $(\frac{W.D^2}{8})$                                                                 | kg.m <sup>2</sup> | 0.72                                 | 1.38                                 | 2.43                 |
| Resolution                                        | deg.                                                                                |                   | 0.001                                | 0.001                                | 0.001                |
| Indexing accuracy                                 | sec.                                                                                |                   | 20                                   | 20                                   | 15                   |
| Repeatability                                     | sec.                                                                                |                   | 6                                    | 6                                    | 6                    |
| Net weight (servo motor excluded)                 | kg / lb                                                                             |                   | 51.5 / 113.3                         | 60 / 132                             | 114 / 251            |
| Allowable loading capacity                        | Vertical                                                                            | kg / lb           | 100 / 220                            | 125 / 275                            | 150 / 330            |
|                                                   | Horizontal                                                                          | kg / lb           | 200 / 440                            | —                                    | 300 / 660            |
|                                                   | Rotary Tailstock applied                                                            | kg / lb           | 200 / 440                            | 250 / 550                            | 300 / 660            |
| FxL<br>When table clamped                         |  | N / lbs           | 14000 / 3141.6                       | 17000 / 3814.8                       | 20000 / 4488         |
|                                                   |  | N.m / ft. lbs.    | 1020 / 751.74                        | 1265 / 932                           | 1700 / 1252.9        |
|                                                   |  | N.m / ft. lbs.    | 300 / 221.1                          | 400 / 294.8                          | 900 / 663.3          |
| Allowable cutting torque                          |  | N.m / ft. lbs.    | 200 / 147.41                         | 260 / 191.62                         | 550 / 405.35         |
| Allowable Max. rotary joint quantity              |                                                                                     |                   | 4                                    | 4                                    | 6                    |

Note: 1. Allowable cutting torque at table speed of 1 min<sup>-1</sup>.

2. FxL When table clamped is a reference data, the users should consider proper safety factor or contact detron for details.

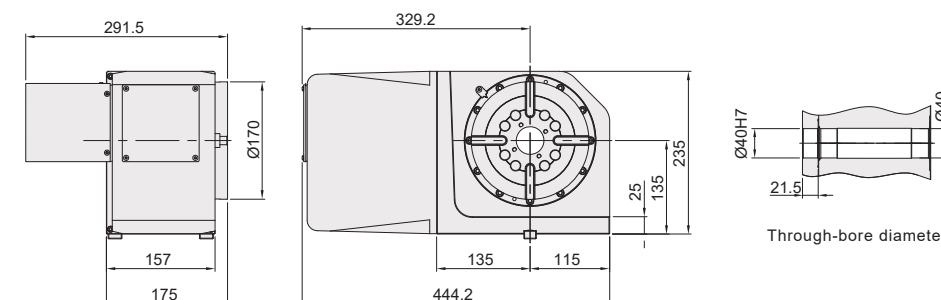
## DIMENSIONAL DRAWINGS

Unit : mm

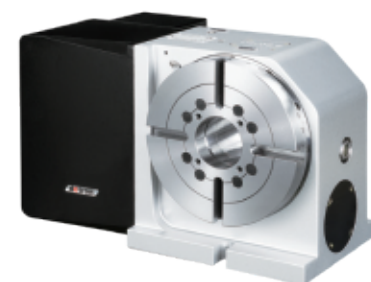
# GXA-170SL



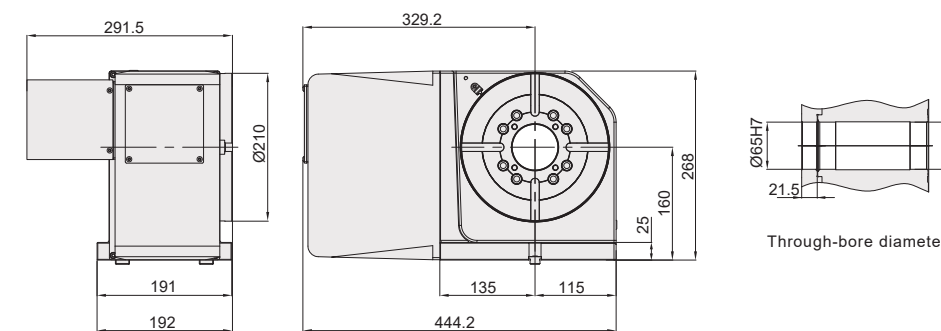
Equipped with upgraded high precision cross roller bearing.



## GVA-210SL



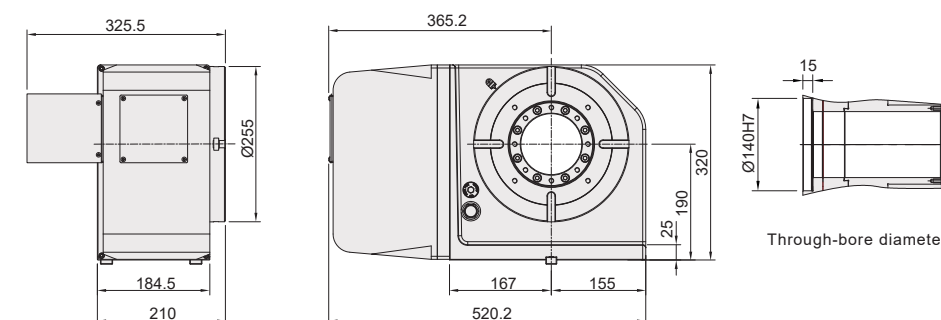
Equipped with upgraded high precision cross roller bearing.



## GXA-255HL



Consolidated spindle with YRT bearing built-in.



Note: The length of servo guard may vary with servo motor type.  
(metal sheet dimensions shown above are based on Fanuc motor)

### for VMC\_Worm Wheel Transmission