Micro Motion Technology Co., Ltd. (MMT) is the leading manufacturer and distributor of high precision positioning tables and precision components used for development and application of the advanced research and industrial applications.

The AA Series motorized 3 axis alignment stage has very low profile and enables the user to create a compact alignment system. Three different sizes are provided for wide range of applications needs.

Features

- Fine X-Y-T 3-axis alignment stage for inspection system (Hollow hole is optional)
- Travel range: ± 10 mm / ± 10 mm / ± 15°
- 5um accuracy
- Low profile stage - 3-axis are on the same plane
- High stiffness cross roller guide stage
- Vacuum environment compatible is optional

Applications

- Precision processing and inspection systems of Semiconductor, LCD, FPD, PCB, etc.
<table>
<thead>
<tr>
<th>SPECIFICATION</th>
<th>AA-200-3S</th>
<th>AA-300-3S</th>
<th>AA-400-3S</th>
</tr>
</thead>
<tbody>
<tr>
<td>Table Dimension (mm)</td>
<td>200x200</td>
<td>300x300</td>
<td>400x400</td>
</tr>
<tr>
<td>Travel Range (mm)</td>
<td>±5/±5/±2.5°</td>
<td>±5/±5/±2.5°</td>
<td>±10/±10/±2.5°</td>
</tr>
<tr>
<td>Travel Guide</td>
<td>B/S Ø8, L1, Cross Roller</td>
<td>B/S Ø10, L2, Cross Roller</td>
<td>B/S Ø14, L2, Cross Roller</td>
</tr>
<tr>
<td>Resolution (mm)</td>
<td>0.002/Pulse (Full Step)</td>
<td>0.004/Pulse (Full Step)</td>
<td></td>
</tr>
<tr>
<td>Maximum Speed (mm/sec)</td>
<td>20/5kHz</td>
<td>40/5kHz</td>
<td>40/5kHz</td>
</tr>
<tr>
<td>Accuracy (µm)</td>
<td>5</td>
<td>5</td>
<td>5</td>
</tr>
<tr>
<td>Uni-Repeatability (µm)</td>
<td>±1</td>
<td>±1.5</td>
<td>±1.5</td>
</tr>
<tr>
<td>Bi-Repeatability (µm)</td>
<td>±2</td>
<td>±3</td>
<td>±3</td>
</tr>
<tr>
<td>Parallelism (mm)</td>
<td>0.03</td>
<td>0.03</td>
<td>0.04</td>
</tr>
<tr>
<td>Running Parallelism (mm)</td>
<td>0.02</td>
<td>0.02</td>
<td>0.03</td>
</tr>
<tr>
<td>Straightness (mm)</td>
<td>0.01</td>
<td>0.01</td>
<td>0.015</td>
</tr>
<tr>
<td>Load Capacity (kg)</td>
<td>30</td>
<td>50</td>
<td>80</td>
</tr>
<tr>
<td>Material</td>
<td>Aluminum (Option. SUS)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Weight (kg)</td>
<td>15</td>
<td>20</td>
<td>40</td>
</tr>
<tr>
<td>Motor Model</td>
<td>PK-545-NB (5P STEP)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Drive Model</td>
<td>DFC5107-P (DC 24V)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Sensor</td>
<td>1 Home Sensor, 2 Limit Sensor</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Diagram of Connecting Wires:

- BLUE
- RED
- ORANGE
- GREEN
- BLACK
- Forward
- Reverse
- F.G
- Power Input (+)
- Home
- Ground
- OPEN
MOTORIZED ALIGNMENT STAGE

- **Type**
  - AA : Alignment Stage

- **Carriage Size**
  - 200 : 200 X 200mm
  - 300 : 300 X 300mm
  - 400 : 400 X 400mm

- **Special Option**
  - A : AC Servo Motor
  - AE : AC Servo + Linear Encoder
  - E : Linear Encoder
  - Blank : Standard (Step & Driver)
  - O : Order Made

- **Grade**
  - S : Standard
  - V : Vacuum (SUS Type)

- **Type of Moving Bearing**
  - 3 : Cross Roller Guide
  - 4 : LM Guide (Order Made)

► Note: All Products are able to be Changed by Customer Order
MMT can be Satisfied with custmer request