FSG-ADIII • ADS Series
Column Type High Precision 3-Axes Automatic Surface Grinder
FSG-2040ADIII • 2060ADIII
FSG-2440ADS • 2460ADS • 2480ADS • FSG-24120ADS
PROGRAMMABLE CONTROLLED GRINDING MACHINE
The machine with micro-processor is programmed to perform rough grinding, fine grinding sparkout passes, automatic overwheel dressing and compensation for wheel dress amount. After grinding, table can be set to park either left end or right end. Spindle can be set to stop running or continue running and the wheelhead can also be set to lift up to the start or the reference point after grinding cycle has finished. The machine is suitable for mass production.

PRCISION SPINDLE AND RIGID ELEVATING GUIDeways
The rigid wheelhead houses a large diameter cartridge type spindle supported by six super precision Class 7 (P4) permanently lubricated angular contact ball bearings (four pieces for the 20 series). The balanced spindle motors are air cooled to ensure optimum surface finishes and maintain superior accuracy.

OPTIONAL AUTOMATIC WHEEL DRESSING WITH COMPENSATION
The machine efficiency is maximized by the automatic dressing with automatic dressing compensation during rough and/or fine grinding and at the end of rough grinding. This allows the machine to run unattended and reduces machining costs.

COMPLETELY SUPPORTED GUIDeways
Extended base guideways for crossfeed and longitudinal travel enhance the machines rigidity and stability in addition to upgrading the machines accuracy and longevity. The permissible loads can be completely supported and table overhang is eliminated.

RIGID CONSTRUCTION
All essential casting is made of high grade dense cast iron which has been stress relieved and ribbed with honeycomb ribs to enhance rigidity and increase stability, which increases cutting capability.

CROSSFEED STROKE SETTING
The crossfeed travel is set with push buttons on the control panel. This new break through in design is more efficient and user-friendly.

WHEELHEAD DRIVEN BY AC SERVO MOTOR
The wheelhead that is coated with Turcite-B travels on the hardened and ground column ways. The wheelhead is precisely positioned by a hardened and ground leadscrew (20 series) or precision ballscrew (24 series). An AC servo motor provides high torque, high speed and accurate positioning with a minimum increment of 0.001mm (0.0001`). A manual pulse generator (MPG) is standard for easy operation.

CROSSFEED SPEED CONTROL
A frequency converter on the FSG-20 ADIII series controls crossfeed continuous moving speed. The crossfeed of the FSG-24 ADS series is combined with a servo motor and is controlled by a ratio switch to obtain a better grinding surface finish and better dressing result.
**CONTROLLER FEATURES**

**FSG-2040AD**

- 2060AD
- 2440ADS
- 2460ADS
- 2480ADS
- 24120ADS

**COLUMN TYPE HIGH PRECISION 3-AXIS AUTOMATIC SURFACE GRINDER**

**GRINDING MODE DISPLAY ON THE CONTROLLER**

- **Plunge Grinding Mode**
- **Surface Grinding Mode**
- **Crisscross Grinding Mode**
- **Multi-Groove Grinding Mode (24ADS only)**
- **Dressing from Table**
- **Automatic overhead dresser with compensation (Optional)**
20 Series

■ Spindle
The spindle is supported by five pieces of Class 7 (P4) (six pieces for 24 series) super precision angular contact ball bearings, which have been accurately measured, selected and preloaded and assembled in a temperature controlled clean room. The spindle is permanently lubricated and requires no maintenance. The large diameter spindle is precisely balanced to ensure accuracy.

■ Longitudinal Stroke Adjustment Device
Table reversal is controlled by proximity switches which never make contact. It is simple for operator to adjust table reversal to minimum required stroke, thereby grinding less air and reducing grinding time. Stroke adjustment protection plate is designed to allow table stroke to be adjusted safely.

■ Crossfeed Guideways
Double “V” guideways are ground and laminated with Turcite-B then precisely hand scraped. Continuous lubrication is provided to ensure smooth and precise crossfeed increments.

■ Elevating Transmission Mechanism
The wheelhead travelling on a preloaded hardened and ground guideway system is driven by a hardened and ground leadscrew and an AC servo motor providing high torque, speed and accurate positioning with minimum increment of 0.001mm (0.0001”). A manual pulse generator (MPG) is standard for easy operation.

■ Column
The column is made of high grade dense cast iron which has been stress relieved and ribbed with honeycomb type ribs to enhance rigidity and increase stability thereby increasing the grinding performance.

■ Longitudinal Slide Way
One “V” and one flat table guideways are laminated with Turcite-B and precisely hand scraped to ensure high accuracy. Continuous lubrication is provided to assure smooth stick-slip free movement of the table and accurate positioning.

■ Crossfeed Transmission Mechanism
Enlarged precision leadscrew with backlash adjustment device is driven by an AC motor. The encoder type stroke setting key allows crossfeed reversal points to be set from operator’s control panel, thereby working efficiency is increased.
**24 Series**

- **Stable structure**
  The column is made of high grade dense cast iron which has been stress relieved. With ribbed and computer-analyzed structure, the stability and rigidity is greatly increased. Spindle travels on hardened and ground square ways, and is driven by precision ballscrew and an AC servo motor for heavy grinding and smooth and accurate movement.

- **Automatic Lubrication System (20 & 24 series)**
  Equipped with a central continuous lubrication system. A warning light will illuminate if oil pressure drops below preset pressure.

- **Crossfeed Slideways**
  Hardened and ground guideways are laminated with Turcite-B, then precisely hand scrapped. Continuous lubrication is provided to assure smooth stick-slip free movement of the table and accurate positioning.

- **Longitudinal Slideways**
  With double "V" guideways, which are laminated with turcite-B anti-friction material, for smooth and stable longitudinal movement.
  The table is full supported on the well designed front base of machine; thus, the accuracy is greatly increased.

- **Crossfeed Transmission Mechanism**
  An AC servo motor and the ballscrew drives the column in a linear motion. The encoder type stroke setting key allows the crossfeed reversal points to be set from operator's control panel, which increases working efficiency.

- **Spindle Counter Weights Balance System**
  Hydraulic counter weights balance system is installed to eliminate backlash and wear of elevating screws.
OPTIONAL ACCESSORIES (20 Series)

Note: Items marked with • are recommended to be factory installed

MACHINE LAMP
B01-0903X
(12V, 50W)

DIAMOND DRESSER
B03-0401X
(1.0 Carat)

WHEEL FLANGE
B05-0401X
Suitable for 355x127x50mm
(14”x5”x2”) grinding wheel
Clamping width: 22~38mm (7/8”~11/2”)

ELECTROMAGNETIC CHUCK
B09-1001X (2040)
500x1,000mm (19 5/8” x 39 3/8”)
B09-1002X (2060)
500x1,500mm (19 5/8” x 59”)
(Voltage: 110V/DC)
• To order B23-0705X chuck control is required.

PARALLEL DRESSING ATTACHMENT
(HYDRAULIC TYPE)
• B13-1001X
Max. OD: 355mm (14”)
Mini OD: 235mm (9.3”)
Max. Length: 60mm (2.4”)

OVERWHEEL PARALLEL DRESSER WITH AUTOMATIC DRESS COMPENSATION
• B13-1002X
Max. OD: 355mm (14”)
Mini OD: 235mm (9.3”)
Max. Length: 60mm (2.4”)

BALANCING STAND WITH LEVELLING BUBBLE
B15-0301X
Max. Dia: 355mm (14”)
Max. Width: 50mm (2”)

BALANCING STAND (ROLLER TYPE)
B15-0702X
Max. Dia: 508mm (20”)

COOLANT SYSTEM WITH AUTO PAPER FEEDING DEVICE (With 1 Roll of Paper)
B17-1002X
Volume: 120L
Paper feeding motor: 25W
Pump: 1/8HP
Coolant Capacity: 20L/min
Space: 1,450x620mm (57” x 24 3/8”)
Height: 760mm (30”)

FSG-20ADIII / COLUMB TYPE HIGH PRECISION 3-AXIS AUTOMATIC SURFACE GRINDER
COOLANT SYSTEM WITH AUTO PAPER FEEDING DEVICE & MAGNETIC SEPARATOR (With 1 Roll of Paper) B17-1003X
Volume: 120L
Paper feeding motor: 25W
Pump: 1/8HP
Coolant Capacity: 20L/min
Space: 1,450x620mm (57" x24 3/8")
Height: 760mm (30")

WATER BAFFLE
• B19-1001X (2040)
• B19-1002X (2060)

CHUCK CONTROLLER
• B23-0704X
Input Voltage: 135VAC
Output Voltage: 110VDC 10A
* With variable holding power, auto demagnetization
* Must be ordered with electro-magnetic chuck

SPINDLE MOTOR
• B31-1001X (10HP, 4P) (2040)
• B31-1003X (7.5HP, 6P for 508mm(20") wheel

CROSSFEED BALLSCREW
• B37-1001X (metric)
• B37-1002X (inch)

FREQUENCY CONVERTER
• B48-10011 (7.5HP) (Voltage: 200V-230V) (2040)
• B48-10021 (7.5HP+Transformer) (Voltage: 480V-575V, 240V, 346V) (2040)
• B48-10031 (10HP) (Voltage: 200V-230V) (2060)
• B48-10041 (10HP+Transformer) (Voltage: 480V-575V, 240V, 346V) (2060)
• B48-10051 (7.5HP) (Voltage: 380V-415V, 440V, 460V) (2040)
• B48-10061 (10HP) (Voltage: 380V, 415V, 440V, 460V) (2060)

HYDRAULIC TEMPERATURE REGULATOR
• B42-1001X(HBO-1000PSB)
Cooling capacity: 4,500 kcal/hr/60Hz
• B42-1002X(HBO-600PSB)
Cooling capacity: 2,100 kcal/hr/60Hz
MACHINE LAMP
B01-0702X
(24V, 50W)

DIAMOND DRESSER
B03-0701X
(1.0 Carat)

WHEEL FLANGE
B05-0701X
Bore size: 127mm (Ø5")
Clamping width:

COOLANT SYSTEM WITH AUTO PAPER FEEDING DEVICE
B17-0701X
Volume: 250L
Pump: 1/2HP
Coolant Capacity: 120L/min
Space: 1,600x1,100mm (63"x43")
Height: 750mm (29 1/2")

COOLANT SYSTEM WITH AUTO PAPER FEEDING DEVICE & MAGNETIC SEPARATOR
B17-0702X
Volume: 250L
Pump: 1/2HP
Coolant Capacity: 120L/min
Space: 1,600x1,100mm (63"x43")
Height: 750mm (29 1/2")

AUTO OVER-THE-WHEEL DRESSER with AUTO DRESSING COMPENSATION
• B13-0708X
Suitable for 406mm (16") grinding wheel Max. OD: 406mm (16")
Mini OD: 236mm (9.3")
Max. Length: 76mm (3")

SPINDLE MOTOR
• B31-0701X
25HP/4p, 1,700rpm/60cy,
1,400rpm/50cy
• B31-0705X
15HP/6p, 1,200rpm/60cy,
1,000rpm/50cy for Ø508mm (Ø20") wheel

FREQUENCY CONVERTER
• B48-07061
(25HP) (Voltage: 380V-460V)
• B48-07061
(25HP) (Voltage: 200V-230V)
• B48-07011
(15HP) (Voltage: 200V-230V)
• B48-07021
(15HP) (Voltage: 240V, 346V, 480V)
• B48-07031
(15HP) (Voltage: 380V-460V)

ELECTROMAGNETIC CHUCK
B09-0701X
600x1,000mm x 1pc
(24"x39 3/8" x 1pc)
B09-0702X
600x1,500mm x 1pc
(24"x59" x 1pc)
(Voltage: 110VDC)
B09-0704X
600x1,000mm x 2pcs
(24"x39 3/8" x 2pcs)
*To order B23-0704X chuck control is required.

Note: Items marked with • are recommended to be factory installed.
The total suggested maximum loads of working table are shown as follows:

<table>
<thead>
<tr>
<th>Model</th>
<th>2040ADIII</th>
<th>2060ADIII</th>
<th>2440ADS</th>
<th>2460ADS</th>
<th>2480ADS</th>
<th>24120ADS</th>
</tr>
</thead>
<tbody>
<tr>
<td>A</td>
<td>900</td>
<td>1,100</td>
<td>1,120</td>
<td>1,320</td>
<td>1,240</td>
<td>1,540</td>
</tr>
<tr>
<td></td>
<td>(1,980)</td>
<td>(2,420)</td>
<td>(2,464)</td>
<td>(2,904)</td>
<td>(2,728)</td>
<td>(3,388)</td>
</tr>
<tr>
<td>B</td>
<td>270</td>
<td>440</td>
<td>380</td>
<td>480</td>
<td>760</td>
<td>960</td>
</tr>
<tr>
<td></td>
<td>(594)</td>
<td>(968)</td>
<td>(836)</td>
<td>(1,056)</td>
<td>(1,672)</td>
<td>(2,112)</td>
</tr>
<tr>
<td>C</td>
<td>1,170</td>
<td>1,540</td>
<td>1,500</td>
<td>1,800</td>
<td>2,000</td>
<td>2,500</td>
</tr>
<tr>
<td></td>
<td>(2,574)</td>
<td>(3,388)</td>
<td>(3,300)</td>
<td>(3,960)</td>
<td>(4,400)</td>
<td>(5,500)</td>
</tr>
</tbody>
</table>

A = Workpiece  B = Magnetic chuck  C = A + B

Grinding with Electromagnetic Chuck

Grinding without Electromagnetic Chuck

Unit: kgs(lbs)
### Dimensional Drawings

#### Description

<table>
<thead>
<tr>
<th>Description</th>
<th>2040ADIII</th>
<th>2060ADIII</th>
<th>2440ADS</th>
<th>2460ADS</th>
<th>2480ADS</th>
<th>24120ADS</th>
</tr>
</thead>
<tbody>
<tr>
<td>A</td>
<td>3,400mm (137 7/8&quot;)</td>
<td>4,600mm (181 1/8&quot;)</td>
<td>3,500mm (137 3/4&quot;)</td>
<td>4,500mm (177 1/4&quot;)</td>
<td>6,000mm (236 1/4&quot;)</td>
<td>8,733mm (344&quot;)</td>
</tr>
<tr>
<td>B</td>
<td>1,800mm (70 7/8&quot;)</td>
<td>2,800mm (110 1/4&quot;)</td>
<td>2,100mm (82 3/4&quot;)</td>
<td>3,100mm (122&quot;)</td>
<td>4,100mm (161 3/8&quot;)</td>
<td>N/A</td>
</tr>
<tr>
<td>C</td>
<td>3,810mm (150&quot;)</td>
<td>4,953mm (195&quot;)</td>
<td>3,870mm (152 3/8&quot;)</td>
<td>4,870mm (191 3/4&quot;)</td>
<td>6,120mm (241&quot;)</td>
<td>8,000mm (314&quot;)</td>
</tr>
<tr>
<td>D</td>
<td>2,719mm (107&quot;)</td>
<td>2,780mm (109 3/8&quot;)</td>
<td>2,799mm (110&quot;)</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>E</td>
<td>2,175mm (85 5/8&quot;)</td>
<td>2,855mm (112 3/8&quot;)</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>F</td>
<td>2,810mm (110 5/8&quot;)</td>
<td>3,660mm (144 1/8&quot;)</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>G</td>
<td>280mm (11&quot;)</td>
<td>295mm (11 3/5&quot;)</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>H</td>
<td>280mm (11&quot;)</td>
<td>305mm (12&quot;)</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>I</td>
<td>160mm (6 5/16&quot;)</td>
<td>210mm (8 1/4&quot;)</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>J</td>
<td>730mm (28 3/4&quot;)</td>
<td>Max. 850mm (33 1/2&quot;); Min. 170mm (6 3/4&quot;)</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>K</td>
<td>2,310mm (91&quot;)</td>
<td>N/A</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>L</td>
<td>990mm (39&quot;)</td>
<td>880mm (34 11/16&quot;)</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>M</td>
<td>95mm (3 3/4&quot;)</td>
<td>110mm (4 5/16&quot;)</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Unit: mm(*)

Notice: The manufacturer reserves the right to modify the design, specifications, mechanisms,...etc. of the machine without notice. All content is for reference only and may be subject to change without notice or obligation.
### DISCRIPTION

<table>
<thead>
<tr>
<th>Model</th>
<th>2040AD III</th>
<th>2060AD III</th>
<th>2440ADS</th>
<th>2460ADS</th>
<th>2480ADS</th>
<th>24120ADS</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Capacity</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Max. Grinding Length-Longitudinal</td>
<td>1,000mm (40&quot;)</td>
<td>1,500mm (59&quot;)</td>
<td>1,000mm (40&quot;)</td>
<td>1,500mm (59&quot;)</td>
<td>2,000mm (78.7&quot;)</td>
<td>3,000mm (118&quot;)</td>
</tr>
<tr>
<td>Max. Grinding Width-Crosswise</td>
<td>500mm (20&quot;)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Distance Between Table To Spindle Centerline</td>
<td>730mm (28.7&quot;)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Table</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Table Working Size</td>
<td>500mm x 1,000mm (20” x 40”)</td>
<td>500mm x 1,500mm (20” x 59”)</td>
<td>600mm x 1,000mm (24” x 40”)</td>
<td>600mm x 1,500mm (24” x 59”)</td>
<td>600mm x 2,000mm (24” x 80”)</td>
<td>600mm x 3,000mm (24” x 118&quot;)</td>
</tr>
<tr>
<td>T-Slots (Width x Dis. x No.)</td>
<td>14mm x160mm x 3 (0.55” x 6.3” x 3)</td>
<td>14mm x 210mm x 3 (0.55” x 8.3” x 3)</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>The Distance From Table To Ground</td>
<td>990mm (39&quot;)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Table Speed</td>
<td>5-25m/min. (16-82fpm)</td>
<td>5-25m/min. (16-82fpm)</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Max. Table Stroke</td>
<td>1,100mm (43 1/4&quot;)</td>
<td>1,600mm (63&quot;)</td>
<td>1,100mm (43.3&quot;)</td>
<td>1,600mm (63&quot;)</td>
<td>2,100mm (82.6&quot;)</td>
<td>3100mm (122&quot;)</td>
</tr>
<tr>
<td><strong>Transverse Movement (Z)</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Rapid Travel</td>
<td>1.5m/min. (60Hz / 4.99fpm), 1.25m/min. (50Hz / 4.08fpm)</td>
<td>1.5m/min. (60Hz / 4.99fpm), 1.25m/min. (50Hz / 4.08fpm)</td>
<td></td>
<td></td>
<td></td>
<td>0-5m/min. (0-16fpm)</td>
</tr>
<tr>
<td>Auto Matic Transverse Movement</td>
<td>3-32mm (18°-1 1/4&quot;)</td>
<td>3-32mm (18°-1 1/4&quot;)</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Hand Wheel Per Revolution</td>
<td>5mm (0.2&quot;)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Hand Wheel Per Graduation</td>
<td>0.02mm (0.0008&quot;)</td>
<td>0.02mm (0.0008&quot;)</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Transverse Movement Stroke</td>
<td>560mm (22&quot;)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>675mm (26.6&quot;)</td>
</tr>
<tr>
<td><strong>Elevating Movement Of Wheel Head</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Rapid Travel</td>
<td>400mm/min. (15.7&quot;)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Head Wheel Per Graduation</td>
<td>0.001mm (0.0001&quot;)</td>
<td>0.001mm (0.0001&quot;)</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Spindle</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Spindle speed</td>
<td>60Hz / 1,750rpm, 50Hz / 1,450rpm</td>
<td>60Hz / 1,750rpm, 50Hz / 1,450rpm</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Wheel Size (OD x W x BORE)</td>
<td>Ø355mm x ð50mm x Ø127mm</td>
<td>Ø14 x Ø2&quot; x Ø5&quot;</td>
<td>406mm x 75mm x 127mm</td>
<td>Ø16&quot; x Ø3&quot; x Ø5&quot;</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Motors</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Spindle Motor</td>
<td>5.6kW (7.5HP,4P)</td>
<td>7.5kW (10HP,4P)</td>
<td></td>
<td></td>
<td></td>
<td>11kW (15HP)</td>
</tr>
<tr>
<td><strong>Power Requirement</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Power Required</td>
<td>13.5kW (18HP)</td>
<td>17kW (23HP,4P)</td>
<td>20.6kW (28HP)</td>
<td>22kW (30HP)</td>
<td>23.6kW (32HP)</td>
<td></td>
</tr>
<tr>
<td><strong>Tank Capacities</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Hydraulic Tank</td>
<td>200L (52 gals.)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>250L (66 gals.)</td>
</tr>
<tr>
<td>Lubricant Tank</td>
<td>-</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>45L (12 gals.)</td>
</tr>
<tr>
<td><strong>Machine Dimensions</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Machine Height (H)</td>
<td>2,719mm (107&quot;)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>2,799mm (110&quot;)</td>
</tr>
<tr>
<td>Required Floor Space (W x L)</td>
<td>3,810mm x 2,997mm (150° x 118&quot;)</td>
<td>4,953mm x 2,997mm (195° x 118&quot;)</td>
<td>3,660mm x 3,870mm (144° x 152&quot;)</td>
<td>3,660mm x 4,870mm (144° x 191&quot;)</td>
<td>3,660mm x 6,120mm (144° x 240&quot;)</td>
<td>3,660mm x 8,733mm (144° x 334&quot;)</td>
</tr>
<tr>
<td>Machine Weight</td>
<td>6200Kg (13,640lbs.)</td>
<td>7900Kg (17,380lbs.)</td>
<td>8,400Kg (18,480lbs.)</td>
<td>9,800Kg (21,560lbs.)</td>
<td>10,600Kg (23,320lbs.)</td>
<td>1,7500 Kg (38,500lbs.)</td>
</tr>
</tbody>
</table>

Notice: The manufacturer reserves the right to modify the design, specifications, mechanisms...etc. of the machine without notice. All the specifications shown above are just for reference.