

# Specifications (MD110S6000・MD150S6000)

| Item                             |                         | Unit              | MD110S6000  |        |            | MD150S6000  |        |        |     |
|----------------------------------|-------------------------|-------------------|---|--------|------------|---|--------|--------|-----|
| CLAMPING UNIT                    | CLAMPING SYSTEM         | -                 | double toggle   |        |            | ダブルトグル (double toggle)                                      |        |        |     |
|                                  | CLAMPING FORCE          | kN                | 1000  |        |            | 1300  |        |        |     |
|                                  |                         | US ton            | 112   |        |            | 146   |        |        |     |
|                                  | TIE BARS DISTANCE (H×V) | mm                | 460×410   |        |            | 510×460   |        |        |     |
|                                  |                         | in                | 18.11×16.14   |        |            | 20.08×18.11   |        |        |     |
|                                  | PLATEN SIZE (H×V)       | mm                | 610×610   |        |            | 670×670   |        |        |     |
|                                  |                         | in                | 24.02×24.02   |        |            | 26.38×26.38   |        |        |     |
|                                  | MOLD OPENING STROKE     | mm                | 350   |        |            | 380   |        |        |     |
|                                  |                         | in                | 13.78   |        |            | 14.96   |        |        |     |
|                                  | MOLD HEIGHT (MIN./MAX.) | mm                | 200/450   |        |            | 200/450   |        |        |     |
| in                               |                         | 7.87/17.72        |   |        | 7.87/17.72 |   |        |        |     |
| OPEN DAYLIGHT                    | mm                      | 800               |   |        | 830        |   |        |        |     |
|                                  | in                      | 31.50             |   |        | 32.68      |   |        |        |     |
| EJECTOR STROKE                   | mm                      | 100               |   |        | 100        |   |        |        |     |
|                                  | in                      | 3.94              |   |        | 3.94       |   |        |        |     |
| EJECTOR FORCE                    | kN                      | 32                |   |        | 32         |   |        |        |     |
|                                  | US ton                  | 3.60              |   |        | 3.60       |   |        |        |     |
| INJECTION . CAPACITY             | *1                      | T·m               | 12.7  |        |            | 14.0  |        |        |     |
| SCREW COMPLETE                   | SCREW TYPE              | -                 | Y   | A      | B          | Y   | A      | B      |     |
|                                  | SCREW DIAMETER          | mm                | 30  | 35     | 40         | 35  | 40     | 45     |     |
| SCREW STROKE                     |                         | mm                | 120   | 140    | 160        | 140   | 160    | 180    |     |
|                                  |                         | in                | 4.72  | 5.51   | 6.30       | 5.51  | 6.30   | 7.09   |     |
| Standard Specification           | CAL . INJ . CAPACITY    | *2                | cm <sup>3</sup>   | 85     | 135        | 201   | 135    | 201    | 286 |
|                                  |                         | cu-in             | 5.19  | 8.24   | 12.27      | 8.24  | 12.27  | 17.45  |     |
|                                  | SHOT MASS (PS)          | *3                | g   | 78     | 124        | 185   | 124    | 185    | 263 |
|                                  |                         | oz                | 2.75  | 4.37   | 6.53       | 4.37  | 6.53   | 9.28   |     |
|                                  | MAX. INJ . PRESSURE     | *4                | MPa   | 270    | 200        | 155   | 260    | 200    | 155 |
|                                  |                         | psi               | 39160   | 29010  | 22480      | 37710   | 29010  | 22480  |     |
|                                  | MAX. HOLD PRESSURE      | *4                | MPa   | 245    | 180        | 135   | 235    | 180    | 140 |
|                                  |                         | psi               | 35530   | 26110  | 19580      | 34080   | 26110  | 20310  |     |
|                                  | MAX. INJ. SPEED         | *5                | mm/s  | 300    |            |   | 300    |        |     |
|                                  |                         | in/s              | 11.81   |        |            | 11.81   |        |        |     |
| INJECTION RATE                   | cm <sup>3</sup> /s      | 212               | 289   | 377    | 289        | 377   | 477    |        |     |
|                                  | cu-in/s                 | 12.94             | 17.64   | 23.01  | 17.64      | 23.01   | 29.11  |        |     |
| LP Specification (OP.)           | CAL . INJ . CAPACITY    | *2                | cm <sup>3</sup>   | 85     | 135        | 201   | 135    | 201    | 286 |
|                                  |                         | cu-in             | 5.19  | 8.24   | 12.27      | 8.24  | 12.27  | 17.45  |     |
|                                  | SHOT MASS (PS)          | *3                | g   | 78     | 124        | 185   | 124    | 185    | 263 |
|                                  |                         | oz                | 2.75  | 4.37   | 6.53       | 4.37  | 6.53   | 9.28   |     |
|                                  | MAX. INJ . PRESSURE     | *4                | MPa   | 270    | 200        | 155   | 260    | 200    | 155 |
|                                  |                         | psi               | 39160   | 29010  | 22480      | 37710   | 29010  | 22480  |     |
|                                  | MAX. HOLD. PRESSURE     | *4                | MPa   | 245    | 180        | 135   | 235    | 180    | 140 |
|                                  |                         | psi               | 35530   | 26110  | 19580      | 34080   | 26110  | 20310  |     |
|                                  | MAX. INJ. SPEED         | *5                | mm/s  | 230    |            |   | 200    |        |     |
|                                  |                         | in/s              | 9.06  |        |            | 7.87  |        |        |     |
| INJECTION RATE                   | cm <sup>3</sup> /s      | 163               | 221   | 289    | 192        | 251   | 318    |        |     |
|                                  | cu-in/s                 | 9.95              | 13.49   | 17.64  | 11.72      | 15.32   | 19.41  |        |     |
| SCREW SPEED                      |                         | min <sup>-1</sup> | 360   |        |            | 360   |        |        |     |
| PLASTICIZING CAPACITY (PS)       | *6                      | kg/h              | 43  | 60     | 93         | 60  | 93     | 115    |     |
|                                  | oz/s                    | 0.42              | 0.59  | 0.91   | 0.59       | 0.91  | 1.13   |        |     |
| NOZZLE STROKE                    |                         | mm                | 370   |        |            | 370   |        |        |     |
| NOZZLE TOUCH FORCE               |                         | kN                | 20  |        |            | 20  |        |        |     |
|                                  |                         | US ton            | 2.25  |        |            | 2.25  |        |        |     |
| TEMP. ZONES                      | NOZZLE・BARREL           | -                 | 1G+4  |        |            | 1G+4  |        |        |     |
|                                  | HOPPER BASE             | -                 | 1   |        |            | 1   |        |        |     |
| HEATER CAPACITY                  |                         | kW                | 8.0   | 10.7   | 12.1       | 10.7  | 12.1   | 14.1   |     |
| TOTAL MACHINE POWER              | *7                      | kVA               | 29  |        |            | 29  |        |        |     |
| POWER SOURCE (VOLTAGE×FREQUENCY) |                         | -                 | 3 phase AC200V(±10%)×50Hz/60Hz<br>3 phase AC220V(±10%)×60Hz |        |            | 3 phase AC200V(±10%)×50Hz/60Hz<br>3 phase AC220V(±10%)×60Hz |        |        |     |
| CABLE SIZE                       | *8                      | mm <sup>2</sup>   | 22  |        |            | 22  |        |        |     |
|                                  |                         | (A.W.G)           | 4   |        |            | 4   |        |        |     |
| MACHINE MASS                     |                         | ton               | 4.7   |        |            | 6.2   |        |        |     |
|                                  |                         | US-ton            | 5.2   |        |            | 6.8   |        |        |     |
| MACHINE SIZE                     | LENGTH                  | m                 | 4.17  | 4.17   | 4.29       | 4.42  | 4.42   | 4.54   |     |
|                                  |                         | in                | 164.25  | 164.25 | 168.82     | 174.06  | 174.06 | 178.82 |     |
|                                  | WIDTH                   | m                 | 1.20  |        |            | 1.24  |        |        |     |
|                                  |                         | in                | 47.17   |        |            | 48.70   |        |        |     |
|                                  | HEIGHT                  | m                 | 1.62  |        |            | 1.69  |        |        |     |
|                                  |                         | in                | 63.58   |        |            | 66.54   |        |        |     |
| MAX COOLING WATER CONSUMPTION    | *9                      | L/min             | 5   |        |            | 7.5   |        |        |     |
|                                  |                         | gal/min           | 1.32  |        |            | 1.98  |        |        |     |

Note: The make of this "op." shows optional specification. Specifications are subject to change without notice.

\*1: Injection capacity = (Injection pressure) × (Calculated injection volume)

\*2: "Calculated injection Volume" = (Screw cross section) × (Screw stroke)

\*3: "Shot mass (PS)" is assumed to be 92% of "Calculated injection Volume"

\*4: Max. Injection pressure and Max. Hold. pressure may be limited by cycle time.

\*5: "Max. Injection speed" may not reach this value, depending on the status of load.

\*6: "Plasticizing capacity" is assumed by polystyrene.

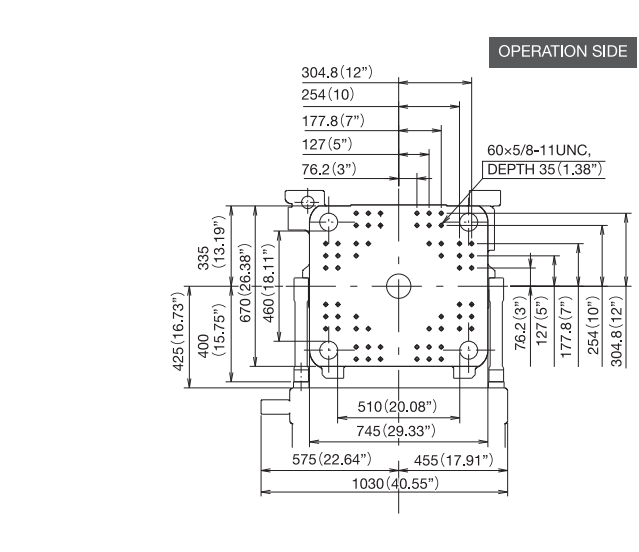
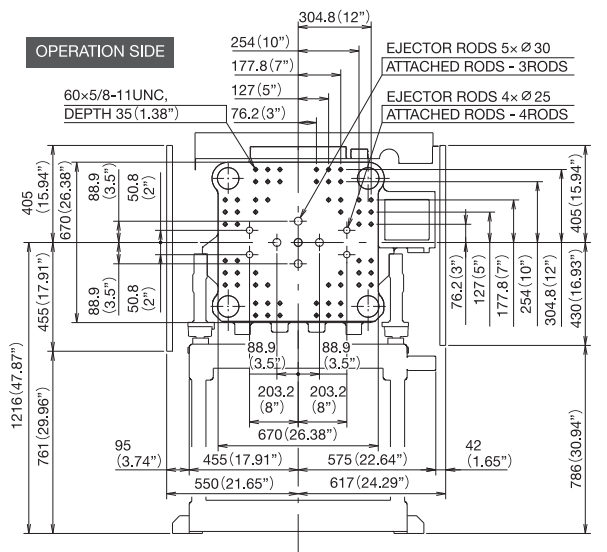
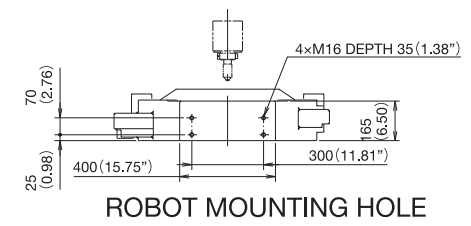
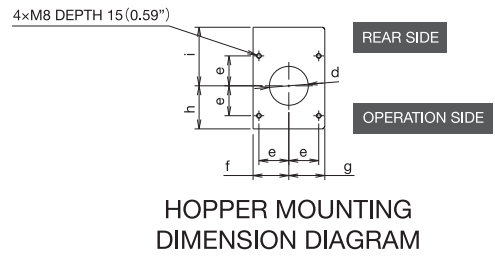
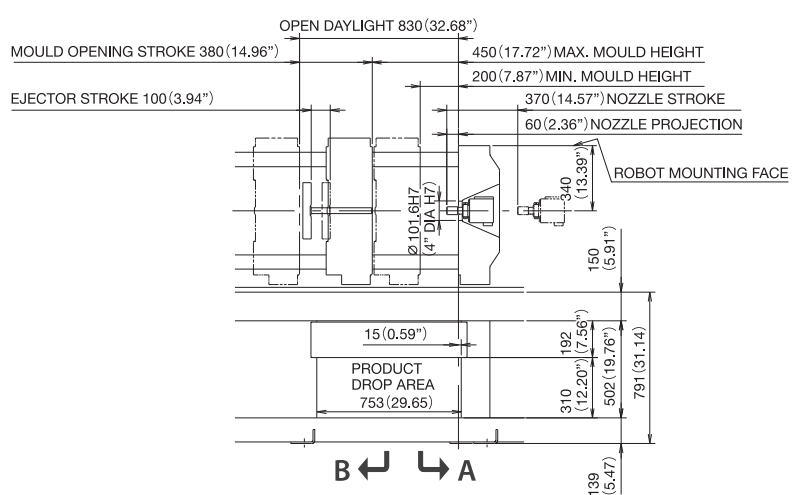
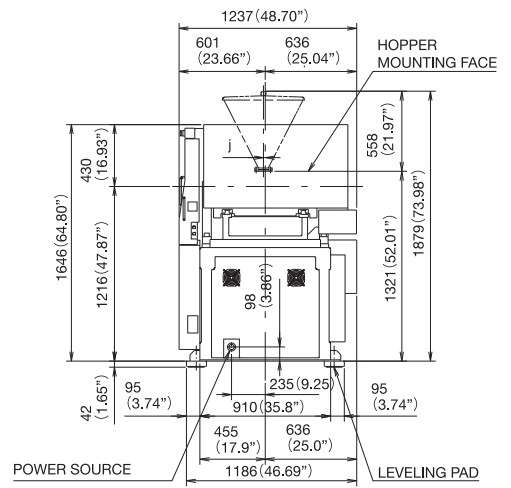
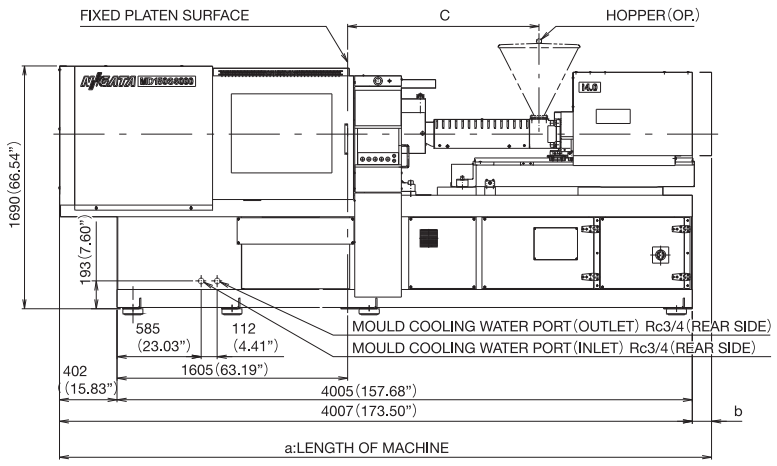
\*7: Shows the capacity of machine : When branching the power supply of auxiliary device from molding machine, increase the capacity by that value.

\*8: It is necessary to reflect the current derating (correcting) factor when multi conductor or so is used.

\*9: Used to cool the hopper base : Set the water pressure less than 0.5Mpa (72.5 psi).

# External Dimension Diagram (MD150S6000)

|               |      | Machine size table MODEL |                |             |               |              |            |            |            |            |            |
|---------------|------|--------------------------|----------------|-------------|---------------|--------------|------------|------------|------------|------------|------------|
|               |      | mm (inch <sup>3</sup> )  |                |             |               |              |            |            |            |            |            |
| INJ. Capacity | Type | Diameter                 | a              | b           | c             | d            | e          | f          | g          | h          | i          |
| i4.0          | Y    | ∅ 35 (1.38")             | 4421 (174.06") | 14 (0.55")  | 1226 (48.27") | ∅ 65 (2.56") | 50 (1.97") | 60 (2.36") | 60 (2.36") | 72 (2.84") | 98 (3.86") |
|               | A    | ∅ 40 (1.57")             | 4421 (174.06") | 14 (0.55")  | 1333 (52.48") | ∅ 65 (2.56") | 50 (1.97") | 65 (2.56") | 65 (2.56") | 72 (2.84") | 98 (3.86") |
|               | B    | ∅ 45 (1.77")             | 4542 (178.82") | 135 (5.31") | 1445 (56.87") | ∅ 65 (2.56") | 50 (1.97") | 65 (2.56") | 65 (2.56") | 72 (2.84") | 98 (3.86") |



B MOVABLE PLATEN MOULD MOUNTING DIMENSION DIAGRAM A FIXED PLATEN