

R•J Series

NC Roll Feeding Machine

**Model R20 / R30 / R40 / R50****Model J06 / J15 / J25**

## Specifications Note

### Cautions for Installation

1. The supply voltage for NC feeding machines are 3 phase / single phase 200V ( $\pm 10\%$ )•50/60Hz, and no adjustment is made to adapt to conditions of electricity at each installation site.  
Note that a transformer to be installed independently is needed to adapt to the supplied voltage at the site where the feeder is going to be installed.
2. English characters and symbols are used to indicate operation panels on the controller.
3. The harmonic content included in the power circuit, which provides servo function, may cause radio hazards to AM radio, etc.
4. Installing a breaker may be required to work with to the inverter which is placed at the site where the Feeder is installed.
5. Conformity of the specifications depends on machining system, type of the mold, and conditions of equipment.
6. DIMAC NC Feeder is manufactured on the basis of specifications for domestic (in Japan) use. If the feeder is relocated to overseas or exported, be sure to start operation after safety requirement to observe in the country concerned is confirmed and necessary measures are taken.

\* This specifications is subject to changes without notice.

The feeder is under warranty in accordance with DIMAC Quality Assurance Provisions as described below.

### 【1】 Warranty

#### (1) Scope

- 1) If DIMAC genuine parts are found to be faulty under normal conditions of operation described in the Manual due to defects in the material or in the manufacturing process, the parts are supplied free of charge.

#### (2) Term

- 1) 12 months from the date of shipment.
- 2) 12 months from the date within thirty (30) days of shipment and described in the export declaration, if used overseas.

#### (3) Method

- 1) Persons are not dispatched to an installed site for repair and service but maintenance products and /or repair parts are provided.

### 【2】 Warranty exclusions

- (1) Cases listed below are excluded from the scope of warranty while in the terms of warranty.
  - 1) Natural disasters such as earthquake, typhoon, flood, and thunder fall, or accidents, fire, etc.
  - 2) Failure or malfunction due to repair, restoration, remodeling, etc. irrelevant to DIMAC.
  - 3) Usage out of the scope described in the specifications and ill or incorrect maintenance.
  - 4) Malfunction and failure due to other equipment connected to the feeder.
  - 5) Defects, corrosion, etc. due to external factor.
  - 6) Malfunction due to aging, wear from usage.
  - 7) Changes to human sense irrelevant to function (operational noises from controller, motor, etc.).
  - 8) Consequential damages to material, product, personal body, etc. due to installing this machine.
- (2) Services below are provided at user's charge.
  - 1) Inspection, maintenance, and cleaning.
  - 2) Replacement of supply parts described in the Manual.

### 【3】 Repair after the term of warranty is expired.

- 1) Repair to the product whose warranty term is expired is provided at user's charge.
- 2) For the case where 13 years have passed since the date of shipment of this product, there might be cases where repair service can't be provided due to stock and procurement conditions of the parts.
- 3) When quality and performance assurance after repair is deemed to be impossible, there might be cases where repair service can't be provided.

## ▪ Specification

Specification	Unit	R20	R30	R40	R50	J06	J15	J25
Max. Material width	mm	~200	~300	~400	~500	~70	~150	~250
Max. Material thickness	mm	~3.2				~1.2	~2.3	
Max. press follow-up speed	spm	~200				~300	~250	
Feeding system		Roll system by servo motor						
Acceleration adjustment		Automatic calculation (by press speed and feeding angles)						
Max. feed length	mm	~9999.99						
Feed length setting unit	mm	0.01						
Roll pressure system		Spring						
Roll pressure *1	N	~1960				~784	~1470	
	kgf	~200				~80	~150	
Release system		Air cylinder				Air diaphragm cylinder		
Release response time *2	sec.	0.04	0.045	0.05		0.02	0.025	
Repeatability	mm	±0.05						
		Condition : Feed length 50 mm *not release						
Approximate material dimensions *3	mm	80 × 3.2	80 × 3.2	80 × 3.2	80 × 3.2	70 × 1.2	60 × 2.3	60 × 2.3
		200 × 2.0	200 × 2.0	200 × 2.0	200 × 2.0		150 × 1.6	150 × 1.6
Power supply voltage		3 phase / Single phase 200V (±10%) · 50 / 60Hz						
Total weight	kg	42	49	55	61	13	25	28
Protection circuit	Standard	1. 2circuit emergency stop output 2. Abnormal stop output 3. Continuous operation stop output 4. Self-diagnosis / Abnormal stop 5. Overload prevention stop 6. Emergency stop input circuit						
	Option	1. Work shortage sensor						
Controller model		410C						

\*1 Maximum material thickness

\*2 DIMAC test result values are available for reference.

R Series : Roll opening amount (material thickness+0.3mm) air pressure 0.4 MPa · roll pressure 1176N

J Series : Roll opening amount (material thickness+0.3mm) air pressure 0.5 MPa · roll pressure 784N

\*3 It may vary depending on material stress and surface roughness.

## ▪ Performance table

### R20 / R30 / R40 / R50

Press Speed	Feed Angle		
	150°	180°	210°
SPM/Cons.	Unit(mm)		
200	28	42	60
190	31	47	67
180	35	54	76
170	40	61	86
160	46	70	98
150	54	80	113
140	63	94	131
130	74	110	153
120	88	131	181
110	106	157	215
100	131	192	255
90	164	234	303
80	207	286	364
70	263	353	443
60	338	443	548
50	386	569	694
40	600	757	914
30	862	1071	1280

### J06

Press Speed	Feed Angle		
	150°	180°	210°
SPM/Cons.	Unit(mm)		
300	12	19	27
280	14	22	32
260	17	26	38
240	21	32	46
220	25	39	56
200	32	49	69
180	41	62	87
160	53	80	112
140	72	108	150
130	85	126	176
120	101	150	208
110	122	181	247
100	150	220	292
90	188	268	349
80	238	328	419
70	303	406	509
60	389	509	629
50	509	653	797

### J15 / J25

Press Speed	Feed Angle		
	150°	180°	210°
SPM/Cons.	Unit(mm)		
250	18	29	41
240	20	32	45
230	23	35	50
220	25	39	55
210	28	43	61
200	32	48	68
180	40	61	86
160	53	79	111
140	71	106	149
130	84	125	174
120	100	149	206
110	121	179	244
100	149	218	289
90	186	265	345
80	236	325	414
70	299	401	503
60	384	503	622
50	503	646	789

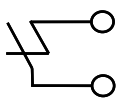
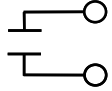
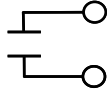
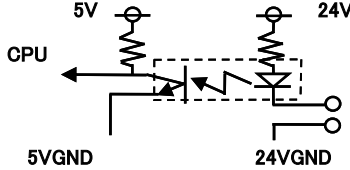
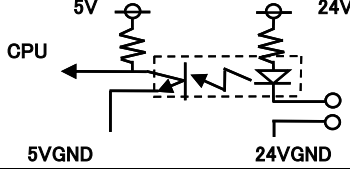
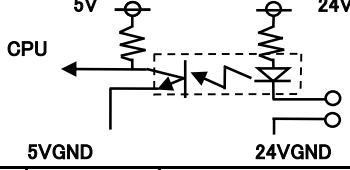
• Rotation speed of the rolls in the feed angle as the feed length of the set value input is automatically calculated.

• Max.feed lengths (mm) under varied speed and feed angles.

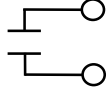
### Note:

It may be impossible to finish workpiece feeding at the angle as specified on the feed performance table if the feeder is under a load resulting from material actress, etc.

▪ Required for installing a press

Press	R20	R30	R40	R50	J06	J15	J25
Power supply voltage	3 phase / Single phase 200V (±10%)·50/60Hz						
Rated power consumption	1500W				300W	800W	
Emergency stop switch input  2-systems support	Emergency stop signal output This signal outputs directly from the emergency stop switch  1 A at 250 VAC or less 1 A at 30 VDC or less						
Abnormal stop input	Abnormal stop output  1 A at 250 VAC or less 1 A at 30 VDC or less Output at open						
Continuous operation stop input	Continuous operation stop output  1 A at 250 VAC or less 1 A at 30 VDC or less Output at open						
Emergency stop output  Open corrector output or Contact output	Emergency stop input circuit  Circuit specifications: Negative logic DC input Input current: 0.01 A at 30 VDC or less						
Press continuous operation output  Open corrector output or Contact output	Press process input circuit  Circuit specifications: Negative logic DC input Input current: 0.01 A at 30 VDC or less						
Synchronizing signal output  2-Open corrector output or 2-Contact output	Feeder synchronization signal input circuit Feed signal input circuit Release signal input circuits  Circuit specifications: Negative logic DC input Input current: 0.01 A at 30 VDC or less						
Air source	0.4~0.5MPa						
spm200 ℓ / min. (0.5MPa)	5.0				—	—	
spm300 ℓ / min. (0.5MPa)	—				1.91	—	
spm250 ℓ / min. (0.5MPa)	—				—	3.26	

〈Option〉

Press	R20	R30	R40	R50	J06	J15	J25
Work shortage sensor input circuit	Work shortage sensor output circuit  1 A at 250 VAC or less 1 A at 30 VDC or less Output at open						

• Option

Specification	R20	R30	R40	R50	J06	J15	J25
Feed direction change / DS6	○	○	○	○	○	○	○
Feed-during output / BS6	○	○	○	○	○	○	○
Feed complete output / FF6	○	○	○	○	○	○	○
Data bank / MP6	○	○	○	○	○	○	○
Feed conditions measurement / TC6	○	○	○	○	○	○	○
Remote box / RC6A	○	○	○	○	○	○	○
Work shortage sensor	○	○	○	○	○	○	○
Pulling function	○	○	○	○	○	○	○
Controller offset	○	○	○	○	Standard	○	○
Swing cover	○	○	○	○	○	○	○
Urethane roll	○	○	○	○	○	○	○
Silicon roll	○	○	○	○	○	○	○
BBC (blast + bluing) roll	○	○	○	○	○	○	○
Separate roll	○	○	○	○	—	*○	*○
Apron roll	○	○	○	○	○	○	○
Slide plate for mounting machine	○	—	—	—	○	○	○

\* Upper roll only

**Note:** When J06, J15 or the option [Feed direction Change DS6] is adopted, the material holding function only uses the spring pressure when the power is turned off, which may cause material misalignment.

**Note:** If the options are combined, they may not be equipped.

• Figure of dimension

**R20 / R30 / R40 / R50**

〈 Option : Swing cover 〉

\* Screw Positions  
for Mounting product  
(4 × M8)

MODEL	A	B	C
R20	230	200	221
R30	330	250	271
R40	330	300	321
R50	330	350	371

**J06**

**J15 / J25**

\* Screw Positions  
for Mounting product  
(4 × M8)

MODEL	A	B
J15	130	319
J25	230	419

**DIMAC CO., LTD.**

130-1 Torashinden, Ohdaka-cho, Midori-ku, Nagoya-city, Aichi, 459-8001 Japan

TEL(052)622-0811 FAX(052)622-0821

http://www.dimac.co.jp