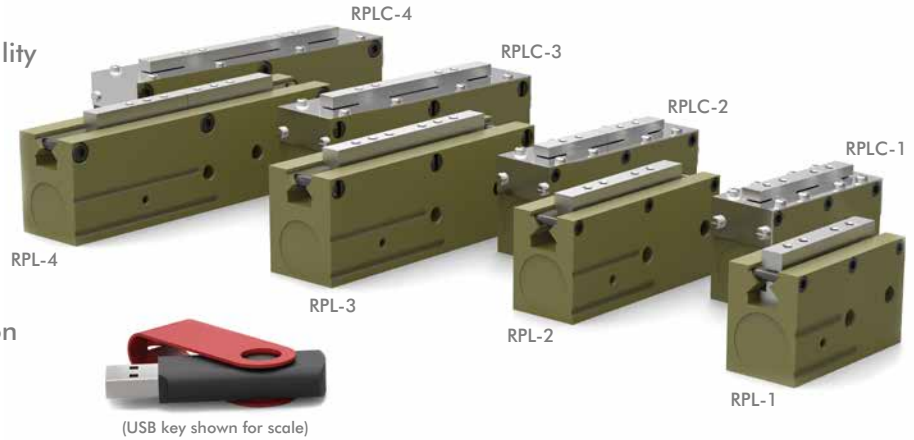


RPL/RPLC SERIES

2-Jaw Precision Parallel Grippers | Features and Benefits | How To Order

Features:

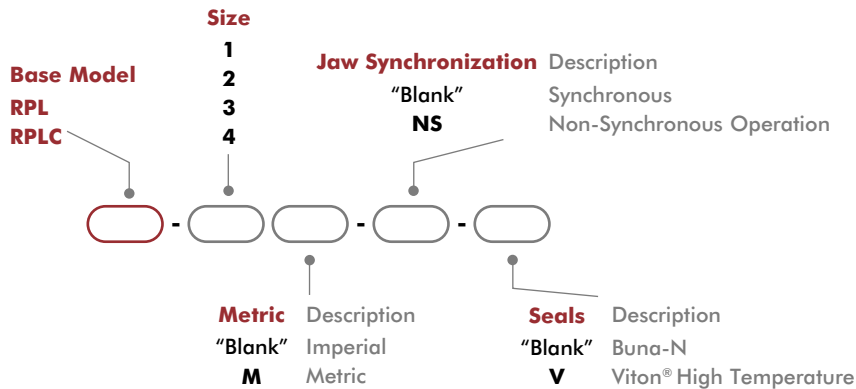
- Excellent part positioning and repeatability
- Zero side play using low friction Dual-V roller bearings
- Class 10 rated clean-room (RPLC) fits life Sciences applications
- Low friction for operation in low pressure applications, corrosion resistant design (RPLC)
- Optional non-synchronous jaw operation
- 30°C to +150°C [-20°F to +300°F] operating environment using Viton® seals option
- Purge port (RPLC) to prevent contaminants entering gripper
- Scavenge port (RPLC) prevents gripper grease from contaminating working environment



Applications:

- Clean room and harsh environments (RPLC)
- Delicate part handling with valve controls
- Long gripper finger requirements with precision
- High temperature applications using Viton® seals

How To Order



Accessories

Sensor Accessories	Model Numbers	Part Number	Qty/Unit
Sensor Mounting Kit for Imperial & Metric Units (mounts 2 sensors)	All Models	OSMK-008	1
NPN Magneto Resistive Sensor with Quick Disconnect*	All Models	OHSN-017	1-2
PNP Magneto Resistive Sensor with Quick Disconnect*	All Models	OHSP-017	1-2
Quick Disconnect 2 Meter Cable Length*	All Models	CABL-010	1-2
Quick Disconnect 5 Meter Cable Length*	All Models	CABL-013	1-2

Pneumatic Accessories	Model Numbers	Part Number	Qty/Unit
Fail Safe Valve (Imperial)	All Models	OFSV-001	1
Fail Safe Valve (Metric)	All Models	OFSV-004	1

*Sensor and cable sold separately.

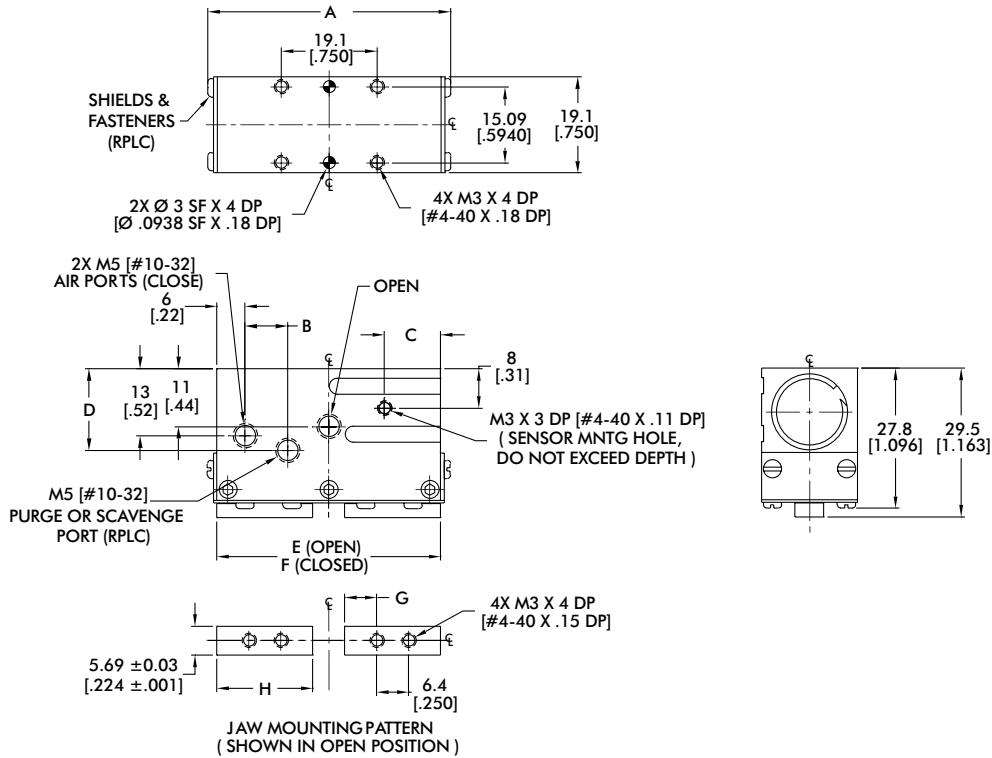
RPL/RPLC SERIES

2-Jaw Precision Parallel Grippers | Technical Specifications

Specifications	Units	1	2	3	4
Total Rated Grip Force F @ 100 psi [7 bar]	N [lb]	116 [26]		160 [36]	
Total Stroke	mm [in]	6.4 [0.25]	12.7 [0.50]	19.1 [0.75]	25.4 [1.00]
Weight	kg [lbs]	0.07 [0.16]	0.09 [0.20]	0.15 [0.32]	0.17 [0.38]
Pressure Range	bar [psi]	0.3-7 [5-100]			
Ingress Protection Class (IP)		IP 33 (RPL) / IP64 (RPLC)			
Displacement	cm ³ [in ³]	0.6 [0.038]	1.2 [0.075]	2.4 [0.147]	3.2 [0.196]
Temperature Range (Buna-N seals)	°C [°F]	-35°~80° C [-30°~180° F]			
Temperature Range (Viton® seals)	°C [°F]	-30°~120° C [-20°~250° F]			
Actuation (open/close)	sec	0.10	0.13	0.14	0.19
Accuracy	mm [in]	±0.05 [±0.002]			
Repeatability	mm [in]	±0.03 [±0.001]			
Valve to Actuate		4-way, 2-position			

RPL/RPLC-1, RPL/RPLC-2

2-Jaw Precision Parallel Grippers | Dimensions and Technical Specifications

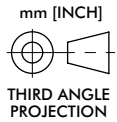


Model	A	B	C	D	E	F	G	H
RPL-1	44.5 [1.750]	--	11 [0.45]	--	44 [1.75]	38 [1.50]	6.4 [0.250]	19.1 [0.750]
RPL-2	59.5 [2.344]	--	16 [0.62]	--	57 [2.25]	44 [1.75]	6.4 [0.250]	22.2 [0.875]

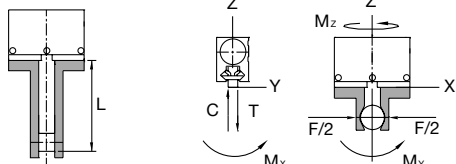
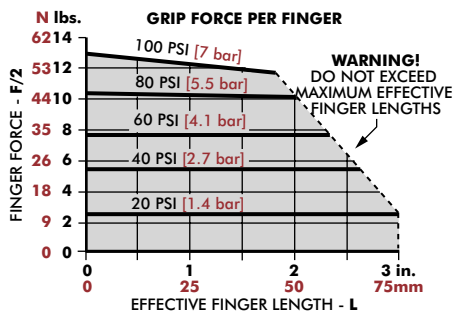
Model	A	B	C	D	E	F	G	H
RPLC-1	48.3 [1.900]	8 [0.33]	11 [0.44]	17.3 [0.68]	44 [1.75]	38 [1.50]	6.4 [0.250]	19.1 [0.750]
RPLC-2	62.9 [2.476]	13 [0.50]	16 [0.62]	17.3 [0.68]	59 [2.33]	46 [1.83]	8.3 [0.328]	23.2 [0.913]

Dimensions in mm [in]

Seal Repair Kits	1, 2
Buna-N Seal Repair Kit	SLKT-010
Viton® Seal Repair Kit	SLKT-010V

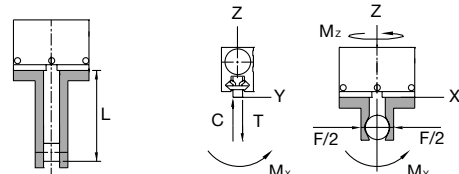
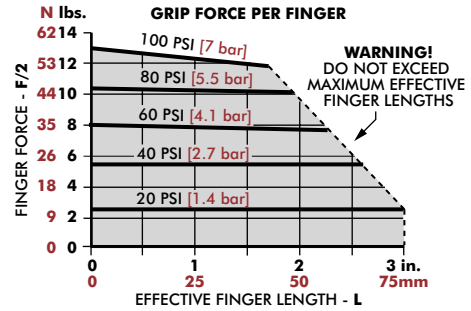


Loading Information



RPL-1	Static	Dynamic
Maximum Tensile T	222 N [50 lbs]	67 N [15 lbs]
Maximum Compressive C	222 N [50 lbs]	67 N [15 lbs]
Maximum Moment M_x	3.4 Nm [30 in-lbs]	1.1 Nm [10 in-lbs]
Maximum Moment M_y	4.5 Nm [40 in-lbs]	1.4 Nm [12 in-lbs]
Maximum Moment M_z	3.4 Nm [30 in-lbs]	1.1 Nm [10 in-lbs]

†Capacities are per set of jaws and are not simultaneous

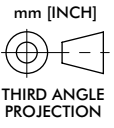
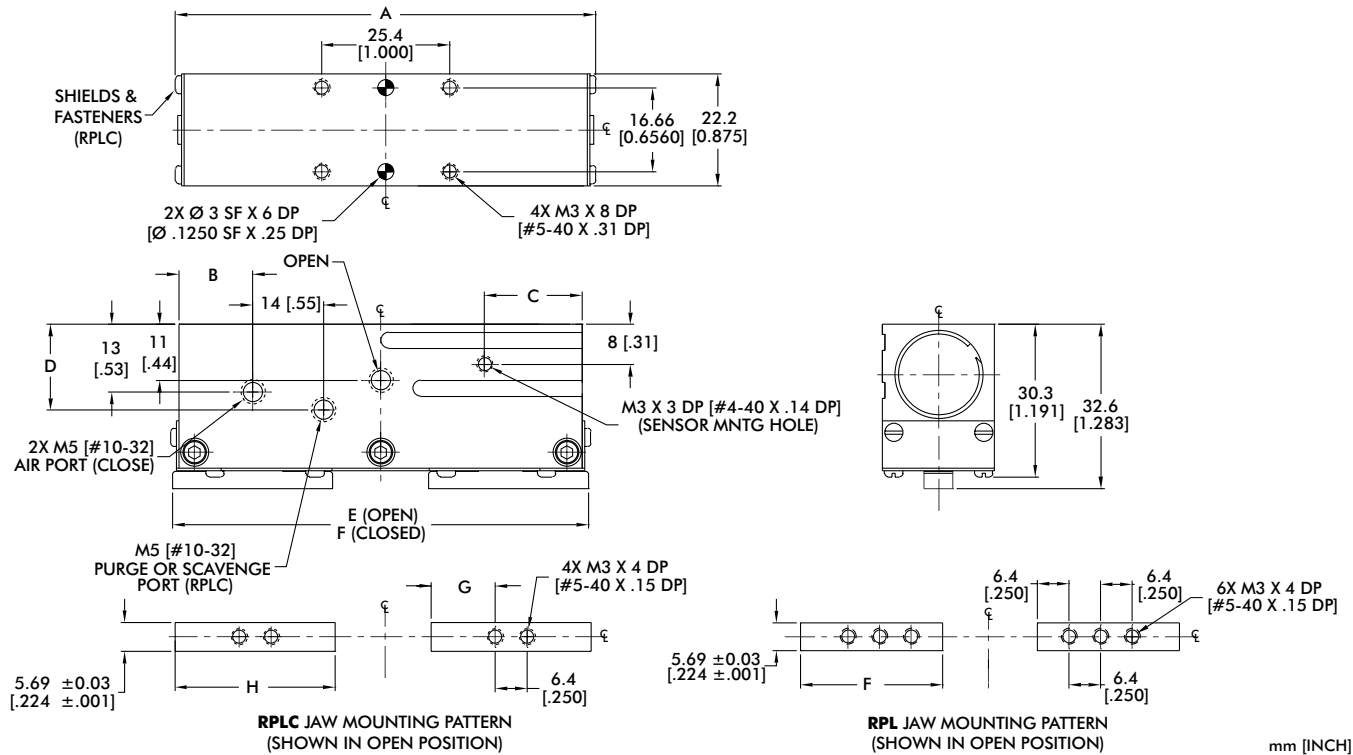


RPL-2	Static	Dynamic
Maximum Tensile T	289 N [65 lbs]	89 N [20 lbs]
Maximum Compressive C	289 N [65 lbs]	89 N [20 lbs]
Maximum Moment M_x	5.1 Nm [45 in-lbs]	1.7 Nm [15 in-lbs]
Maximum Moment M_y	6.8 Nm [60 in-lbs]	2.3 Nm [20 in-lbs]
Maximum Moment M_z	5.1 Nm [45 in-lbs]	1.7 Nm [15 in-lbs]

†Capacities are per set of jaws and are not simultaneous

RPL/RPLC-3, RPL/RPLC-4

2-Jaw Precision Parallel Grippers | Dimensions and Technical Specifications



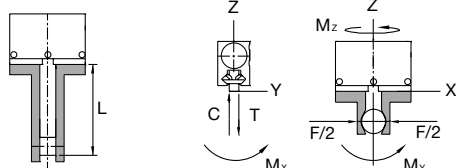
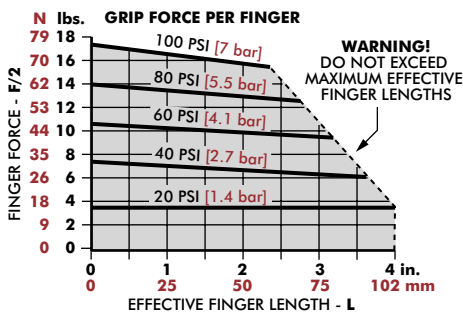
Model	A	B	C	D	E	F	G	H
RPL-3	80 [3.150]	15 [0.58]	19 [0.76]	--	76 [3.00]	57 [2.25]	--	28.6 [1.125]
RPL-4	98.4 [3.875]	30 [1.19]	25 [1.00]	--	92 [3.63]	66 [2.63]	--	33.3 [1.313]

Model	A	B	C	D	E	F	G	H
RPLC-3	83.4 [3.282]	15 [1.58]	19 [0.76]	18 [0.74]	83 [3.25]	63 [2.50]	12.7 [0.500]	31.8 [1.250]
RPLC-4	101.8 [4.007]	24 [0.94]	25 [1.00]	18 [0.74]	101 [4.00]	76 [3.00]	15.9 [0.625]	38.1 [1.50]

Dimensions in mm [in]

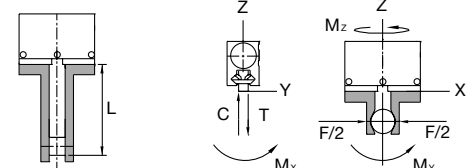
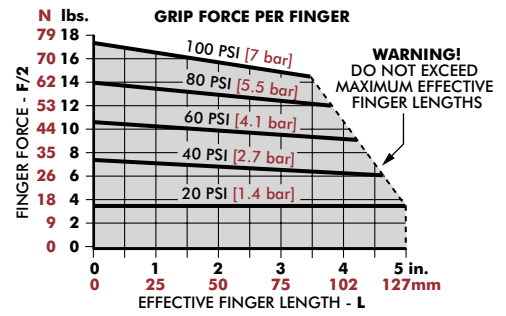
Seal Repair Kits	3, 4
Buna-N Seal Repair Kit	SLKT-012
Viton® Seal Repair Kit	SLKT-012V

Loading Information



RPL-3	Static	Dynamic
Maximum Tensile T	400 N [90 lbs]	133 N [30 lbs]
Maximum Compressive C	400 N [90 lbs]	133 N [30 lbs]
Maximum Moment M_x	6.8 Nm [60 in-lbs]	2.3 Nm [20 in-lbs]
Maximum Moment M_y	9.0 Nm [80 in-lbs]	2.8 Nm [25 in-lbs]
Maximum Moment M_z	6.8 Nm [60 in-lbs]	2.3 Nm [20 in-lbs]

*Capacities are per set of jaws and are not simultaneous



RPL-4	Static	Dynamic
Maximum Tensile T	534 N [120 lbs]	178 N [40 lbs]
Maximum Compressive C	534 N [120 lbs]	178 N [40 lbs]
Maximum Moment M_x	8.5 Nm [75 in-lbs]	2.8 Nm [25 in-lbs]
Maximum Moment M_y	11.3 Nm [100 in-lbs]	4.0 Nm [35 in-lbs]
Maximum Moment M_z	8.5 Nm [75 in-lbs]	2.8 Nm [25 in-lbs]

*Capacities are per set of jaws and are not simultaneous

PNEUMATIC INDUSTRIAL GRIPPERS

2-Jaw General Industrial Grippers | Product Overview

	Model	Stroke mm [in]	Grip Force N [lbs]	Operating Environment	Special Features	Page GR-GEN-#
CP		4-32 [0.16-1.26]	60-2749 [13-618]	IP54	Compact Design with High Grip Force.	3
DPDL		3.2-19.1 [0.13-0.75]	62-1779 [14-400]	IP66 Using Purge Port & Boot Option. Clean Room Class 10, ISO 4 Using Scavenge Port	Sealed Gripper. Dirty and Caustic Environments. Wide Range of Sizes. DIRECTCONNECT	11
DPDS		4.8-50.8 [0.188-2]	62-1779 [14-400]	IP54 Using Purge Port. Clean Room Class 100, ISO 5 Using Scavenge Port	Rugged General Purpose Applications. Wide Range of Sizes. DIRECTCONNECT	19
DPG		6.35-25.4 [0.25-1.0]	222-249 [50-56]	IP54. Clean Room Class 100, ISO 5	8 Position Sensing General Purpose Gripper. Multiple Mounting/Porting Options. DIRECTCONNECT	27
RDH		4-70 [0.16-2.73]	361-28002 [81-6300]	IP55 Using Purge Port. Clean Room Class 100, ISO 5 Using Scavenge Port	Highest Force vs. Size & Weight. Wide Range of Sizes. High Precision. Long Fingers. Rugged Applications	31
REP2		10-30 [0.39-1.181]	480-3268 [108-753]	IP55. Class 100, ISO 5 Using Scavenge Port	Spring Assist. Rugged and Harsh Environments. High Precision.	41
RP		4.0-50.8 [0.16-2]	156-3336 [35-750]	IP43	Small General Purpose. Rugged Applications. Wide Range of Sizes. Cost Effective	47, 51
RPM		3.2-6.3 [0.13-0.25]	36 [8]	IP33	Smallest Gripper, Low Friction, Small Parts Handling.	59
RPMC		3.2-6.3 [0.13-0.25]	36 [8]	IP64 Using Purge Port. Clean Room Class 10, ISO 4 Using Scavenge Port	Smallest Shielded Gripper for Clean or Harsh Environments. Small Delicate Parts Handling.	59
RPS		4-43 [0.16-1.7]	222-2669 [50-600]	IP43	Spring Assist, General Purpose Gripper. Rugged Applications. Wide Range of Sizes. Cost Effective	63

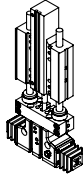
PNEUMATIC INDUSTRIAL GRIPPERS

2-Jaw General Industrial Grippers | DIRECTCONNECT™ Mounting Compatibility Chart

DIRECTCONNECT Modular Direct Mounting System without Adapter Plates

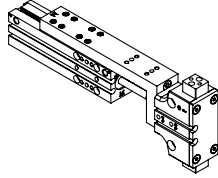
Products can be mounted in multiple positions. Refer to datasheet for complete info.

Slide to Gripper



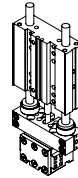
DLT Thruster Slide to DPDL Parallel Gripper

Slide to Gripper



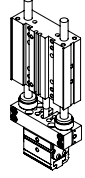
DLM Thruster Slide to DPDL Parallel Gripper

Slide to Gripper



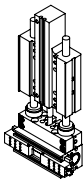
DLT Thruster Slide to DPDS Parallel Gripper

Slide to Gripper



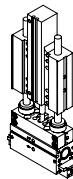
DLT Thruster Slide to DPDS Parallel Gripper

Slide to Gripper



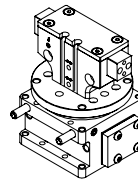
DLT Thruster Slide to DPG Parallel Gripper

Slide to Gripper



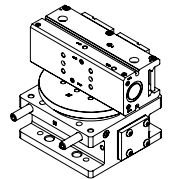
DLT Thruster Slide to DPG Parallel Gripper

Rotary to Gripper



DRF Rotary Actuator to DPDL Parallel Gripper

Rotary to Gripper



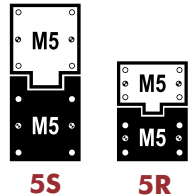
DRF Rotary Actuator to DPG Parallel Gripper

DIRECTCONNECT Mounting Compatibility Chart

DESTACO's DIRECTCONNECT™ technology, allows all components of the system—grippers, rotaries and slides—to be mounted together directly. Look for matching icons on product datasheets for mounting compatibility.

Note: The numbers in the cell represent the metric screw size and basic mounting pattern.

S=Square, R=Rectangle. ie; 5S = M5 Screw with square mounting pattern.



Catalog Models								
		DPDS-047, 056	DPDS-088, 125	DPDS-175, 250	DPDL-047, 056	DPDL-088, 125	DPDL-175, 250	DPG
Base Slides	DLB-06,08		3R			3R		
	DLB-10,12,16	5R		5R			5R	5R
	DLB-20,25				10R			
Thruster Slides	DLT-06,08		3R			3R		
	DLT-10,12,16	5R	3R	5R		3R	5R	5R
	DLT-20,25	5R		5R	10R		5R	5R
	DLM-07		3R			3R		
	DLM-9,12	5R	3R	5R		3R	5R	5R
Rotary Actuators	DRF-075,094	5R	3R	5R		3R	5R	5R
	DRF-106	5R	3R	5R		3R	5R	5R
	DRF-131	5R		5R	10R		5R	5R