



# GILSON PIPETTE SPECIFICATIONS

SYSTEMATIC ERROR = ACCURACY  
RANDOM ERROR = REPEATABILITY

PIPETMAN® L SINGLE CHANNEL—VARIABLE VOLUME MODELS														
Model	PIPETMAN® DIAMOND Tips		Part Number		Volume ( $\mu$ L)	Maximum Permissible Errors								
			With Stainless Steel Ejector	With Plastic Ejector		Gilson				ISO 8655				
						Systematic Error ( $\mu$ L)	Random Error ( $\mu$ L)	Systematic Error (%)	Random Error (%CV)*	Systematic Error ( $\mu$ L)	Random Error ( $\mu$ L)	Systematic Error (%)	Random Error (%CV)*	
P2L	D10 DL10	DF10ST DFL10ST	FA10001M	FA10001P	0.2 0.5 1 2	$\pm 0.024$ $\pm 0.025$ $\pm 0.027$ $\pm 0.030$	$\leq 0.012$ $\leq 0.012$ $\leq 0.013$ $\leq 0.014$	$\pm 12.0$ $\pm 5.0$ $\pm 2.7$ $\pm 1.5$	$\leq 6.0$ $\leq 2.4$ $\leq 1.3$ $\leq 0.7$	$\pm 0.08$ $\pm 0.08$ $\pm 0.08$ $\pm 0.08$	$\leq 0.04$ $\leq 0.04$ $\leq 0.04$ $\leq 0.04$	$\pm 40.0$ $\pm 16.0$ $\pm 8.0$ $\pm 4.0$	$\leq 20.0$ $\leq 8.0$ $\leq 4.0$ $\leq 2.0$	
P10L	D10 DL10	DF10ST DFL10ST	FA10002M	FA10002P	0.5 1 5 10	$\pm 0.040$ $\pm 0.025$ $\pm 0.075$ $\pm 0.100$	$\leq 0.016$ $\leq 0.012$ $\leq 0.030$ $\leq 0.040$	$\pm 8.0$ $\pm 2.5$ $\pm 1.5$ $\pm 1.0$	$\leq 3.2$ $\leq 1.2$ $\leq 0.6$ $\leq 0.4$	$\pm 0.12$ $\pm 0.12$ $\pm 0.12$ $\pm 0.12$	$\leq 0.08$ $\leq 0.08$ $\leq 0.08$ $\leq 0.08$	$\pm 24.0$ $\pm 12.0$ $\pm 2.4$ $\pm 1.2$	$\leq 16.0$ $\leq 8.0$ $\leq 1.6$ $\leq 0.8$	
P20L	D200	DF30ST	FA10003M	FA10003P	2 10 20	$\pm 0.10$ $\pm 0.10$ $\pm 0.20$	$\leq 0.030$ $\leq 0.050$ $\leq 0.060$	$\pm 5.0$ $\pm 1.0$ $\pm 0.3$	$\leq 1.5$ $\leq 0.5$ $\leq 0.3$	$\pm 0.2$ $\pm 0.2$ $\pm 0.2$	$\leq 0.1$ $\leq 0.1$ $\leq 0.1$	$\pm 10.0$ $\pm 2.0$ $\pm 1.0$	$\leq 5.0$ $\leq 1.0$ $\leq 0.5$	
P100L	D200	DF100ST	FA10004M	FA10004P	10 50 100	$\pm 0.35$ $\pm 0.40$ $\pm 0.80$	$\leq 0.10$ $\leq 0.12$ $\leq 0.15$	$\pm 3.5$ $\pm 0.8$ $\pm 0.8$	$\leq 1.0$ $\leq 0.24$ $\leq 0.15$	$\pm 0.8$ $\pm 0.8$ $\pm 0.8$	$\leq 0.3$ $\leq 0.3$ $\leq 0.3$	$\pm 8.0$ $\pm 1.6$ $\pm 0.8$	$\leq 3.0$ $\leq 0.6$ $\leq 0.3$	
P200L	D200 D300	DF200ST DF300ST	FA10005M	FA10005P	20 100 200	$\pm 0.50$ $\pm 0.80$ $\pm 1.60$	$\leq 0.20$ $\leq 0.25$ $\leq 0.30$	$\pm 2.5$ $\pm 0.8$ $\pm 0.8$	$\leq 1.0$ $\leq 0.25$ $\leq 0.15$	$\pm 1.6$ $\pm 1.6$ $\pm 1.6$	$\leq 0.6$ $\leq 0.6$ $\leq 0.6$	$\pm 8.0$ $\pm 1.6$ $\pm 0.8$	$\leq 3.0$ $\leq 0.6$ $\leq 0.3$	
P1000L	D1000 D1200	DF1000ST DF1200ST	FA10006M	FA10006P	100 500 1000	$\pm 3.0$ $\pm 4.0$ $\pm 8.0$	$\leq 0.6$ $\leq 1.0$ $\leq 1.5$	$\pm 3.0$ $\pm 0.8$ $\pm 0.8$	$\leq 0.6$ $\leq 0.2$ $\leq 0.15$	$\pm 8.0$ $\pm 8.0$ $\pm 8.0$	$\leq 3.0$ $\leq 3.0$ $\leq 3.0$	$\pm 8.0$ $\pm 1.6$ $\pm 0.8$	$\leq 3.0$ $\leq 0.6$ $\leq 0.3$	
P5000L	D5000		FA10007		500 2500 5000	$\pm 12$ $\pm 15$ $\pm 30$	$\leq 3$ $\leq 5$ $\leq 8$	$\pm 2.4$ $\pm 0.6$ $\pm 0.6$	$\leq 0.6$ $\leq 0.2$ $\leq 0.16$	$\pm 40$ $\pm 40$ $\pm 40$	$\leq 15.0$ $\leq 15.0$ $\leq 15.0$	$\pm 8.0$ $\pm 1.6$ $\pm 0.8$	$\leq 3.0$ $\leq 0.6$ $\leq 0.3$	
P10mLL	D10mL		FA10008		1000 5000 10000	$\pm 30$ $\pm 40$ $\pm 60$	$\leq 6$ $\leq 10$ $\leq 16$	$\pm 3.0$ $\pm 0.8$ $\pm 0.6$	$\leq 0.6$ $\leq 0.2$ $\leq 0.2$	$\pm 60$ $\pm 60$ $\pm 60$	$\leq 30.0$ $\leq 30.0$ $\leq 30.0$	$\pm 6.0$ $\pm 1.2$ $\pm 0.6$	$\leq 3.0$ $\leq 0.6$ $\leq 0.3$	
PIPETMAN® L MULTICHANNEL MODELS														
P8x10L	D10 DL10	DF10ST DFL10ST	FA10013		0.5 1 5 10	$\pm 0.08$ $\pm 0.08$ $\pm 0.20$ $\pm 0.20$	$\leq 0.04$ $\leq 0.05$ $\leq 0.10$ $\leq 0.10$	$\pm 16.0$ $\pm 8.0$ $\pm 4.0$ $\pm 2.0$	$\leq 8.0$ $\leq 5.0$ $\leq 2.0$ $\leq 1.0$	$\pm 0.24$ $\pm 0.24$ $\pm 0.24$ $\pm 0.24$	$\leq 0.16$ $\leq 0.16$ $\leq 0.16$ $\leq 0.16$	$\pm 48.0$ $\pm 24.0$ $\pm 4.8$ $\pm 2.4$	$\leq 32.0$ $\leq 16.0$ $\leq 3.2$ $\leq 1.6$	
P12x10L			FA10014											
P8x20L	DL10 D200	DFL10ST DF30ST	FA10009		2 10 20	$\pm 0.10$ $\pm 0.20$ $\pm 0.40$	$\leq 0.08$ $\leq 0.10$ $\leq 0.15$	$\pm 5.0$ $\pm 2.0$ $\pm 2.0$	$\leq 4.0$ $\leq 1.0$ $\leq 1.0$	$\pm 0.4$ $\pm 0.4$ $\pm 0.4$	$\leq 0.20$ $\leq 0.20$ $\leq 0.20$	$\pm 20.0$ $\pm 4.0$ $\pm 2.0$	$\leq 10.0$ $\leq 2.0$ $\leq 1.0$	
P12x20L			FA10010											
P8x200L	D200 D300	DF200ST DF300ST	FA10011		20 100 200	$\pm 0.50$ $\pm 1.00$ $\pm 2.00$	$\leq 0.25$ $\leq 0.40$ $\leq 0.50$	$\pm 2.5$ $\pm 1.0$ $\pm 1.0$	$\leq 1.25$ $\leq 0.4$ $\leq 0.25$	$\pm 3.2$ $\pm 3.2$ $\pm 3.2$	$\leq 1.2$ $\leq 1.2$ $\leq 1.2$	$\pm 16.0$ $\pm 3.2$ $\pm 1.6$	$\leq 6.0$ $\leq 1.2$ $\leq 0.6$	
P12x200L			FA10012											
P8x200LVR	D200 D300	DF200ST DF300ST	FA10035		20 100 200	$\pm 0.50$ $\pm 1.00$ $\pm 2.00$	$\leq 0.25$ $\leq 0.40$ $\leq 0.50$	$\pm 2.5$ $\pm 1.0$ $\pm 1.0$	$\leq 1.25$ $\leq 0.4$ $\leq 0.25$	$\pm 3.2$ $\pm 3.2$ $\pm 3.2$	$\leq 1.2$ $\leq 1.2$ $\leq 1.2$	$\pm 16.0$ $\pm 3.2$ $\pm 1.6$	$\leq 6.0$ $\leq 1.2$ $\leq 0.6$	
P12x200LVR			FA10036											
P8x300L	D200 D300	DF200ST DF300ST	FA10015		20 30 150 300	$\pm 1.00$ $\pm 1.00$ $\pm 1.50$ $\pm 3.00$	$\leq 0.35$ $\leq 0.35$ $\leq 0.60$ $\leq 1.00$	$\pm 5.0$ $\pm 3.33$ $\pm 1.0$ $\pm 1.0$	$\leq 1.75$ $\leq 1.17$ $\leq 0.4$ $\leq 0.33$	$\pm 8.0$ $\pm 8.0$ $\pm 8.0$ $\pm 8.0$	$\leq 3.0$ $\leq 3.0$ $\leq 3.0$ $\leq 3.0$	$\pm 40.0$ $\pm 26.67$ $\pm 5.33$ $\pm 2.67$	$\leq 15.0$ $\leq 10.0$ $\leq 2.0$ $\leq 1.0$	
P12x300L			FA10016											
P8x300LVR	D200 D300	DF200ST DF300ST	FA10037		20 30 150 300	$\pm 1.00$ $\pm 1.00$ $\pm 1.50$ $\pm 3.00$	$\leq 0.35$ $\leq 0.35$ $\leq 0.60$ $\leq 1.00$	$\pm 5.0$ $\pm 3.33$ $\pm 1.0$ $\pm 1.0$	$\leq 1.75$ $\leq 1.17$ $\leq 0.4$ $\leq 0.33$	$\pm 4.8$ $\pm 4.8$ $\pm 4.8$ $\pm 4.8$	$\leq 1.8$ $\leq 1.8$ $\leq 1.8$ $\leq 1.8$	$\pm 24.0$ $\pm 16.0$ $\pm 3.2$ $\pm 1.6$	$\leq 9.0$ $\leq 6.0$ $\leq 1.2$ $\leq 0.6$	
P12x300LVR			FA10038											
P8x1200L	D1200	DF1200ST	FA10039		100 120 600 1200	$\pm 6.0$ $\pm 6.0$ $\pm 8.0$ $\pm 10.0$	$\leq 0.90$ $\leq 0.90$ $\leq 1.20$ $\leq 1.50$	$\pm 6.0$ $\pm 5.0$ $\pm 1.3$ $\pm 0.8$	$\leq 0.9$ $\leq 0.8$ $\leq 0.2$ $\leq 0.1$	$\pm 32$ $\pm 32$ $\pm 32$ $\pm 32$	$\leq 12$ $\leq 12$ $\leq 12$ $\leq 12$	$\pm 32.0$ $\pm 26.7$ $\pm 5.3$ $\pm 2.7$	$\leq 12.0$ $\leq 10.0$ $\leq 2.0$ $\leq 1.0$	
P12x1200L			FA10040											

\*CV means Coefficient of Variation

Gilson maximum permissible errors are guaranteed only when PIPETMAN® pipettes are used with the recommended PIPETMAN® DIAMOND Tips.

For a pipette with a plastic tip ejector, the part number ends with the letter P.

For a pipette with a stainless steel tip ejector, the part number ends with the letter M.

P5000L and P10mLL are equipped with plastic tip ejectors.