

Precision Planetary Reducer

精密行星減速機

High-end Structure Design
頂尖設計

+

GF
SERIES系列

+

Premium Performance
優異性能

GF series planetary reducer has the characteristics of high rigidity, high precision (single stage can achieve less than 1 arcmin), high transmission efficiency (single stage at 97% -98%), high torque / volume ratio, and lifetime maintenance-free.
GF系列行星減速器具有高剛性、高精度（單級可以達到小於1弧分）、高傳輸效率（單級達到97% - 98%）、高扭矩/體積比和無需終身保養等特點。



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DRIVES THE PRECISION



Performance data 性能資料表

規格 Specification		段 Stage	減速比 Speed Ratio	框 Frame						
				GF060	GF075	GF100	GF140	GF180		
額定輸出力矩 Nominal Output Torque	Nm	1	3	52	130	210	340	590		
			4	50	140	290	545	1050		
			5	58	160	333	650	1200		
			6	55	148	310	600	1108		
			7	50	140	300	555	1100		
			8	45	123	260	500	1000		
			10	42	102	235	460	910		
		2	15	52	130	210	340	590		
			20	50	140	290	545	1050		
			25	58	160	333	650	1200		
			30	55	148	310	600	1108		
			35	50	140	300	555	1100		
			40	45	123	260	500	1000		
			50	58	160	333	650	1200		
			60	55	148	310	600	1108		
			70	50	140	300	555	1100		
			80	45	123	260	500	1000		
100	42	102	235	460	910					
急停扭矩 Emergent Stop Torque	Nm	1, 2	3-100	3 倍額定輸出力矩 3 times of nominal output torque						
最大輸出扭矩 Maximum Output Torque	Nm			1.8 倍額定輸出力矩 1.8 times of nominal output torque						
額定輸入轉速 Nominal Input Speed	rpm			5000	4000	4000	3000	3000		
最大輸入轉速 Maximum Input Speed	rpm			10000	8000	8000	6000	6000		
背隙 Backlash	arcmin	1	3-10	P0	≤1					
				P1	≤3					
		2	15-100	P0	≤3					
				P1	≤5					
1	3-10	≥97								
		2	15-100	≥94						
扭轉剛性 Torsional Rigidity	Nm/arcmin			1, 2	3-100	7	14	25	50	145
最大徑向力 Maximum Radial Force	N	1400	4100			9200	14000	18000		
最大軸向力 Maximum Axial Force	N	1100	3700			5820	11400	19500		
使用壽命 Service Life	hr	30,000								
使用溫度 Operating Temperature	°C	-20~90								
防護等級 Protection Class	-	IP65								
潤滑 Lubrication	-	合成潤滑油脂 Synthetic Grease								
安裝位置 Mounting Position	-	任意方向 Any Direction								
噪音值 Noise	dB	1	3-10			≤58	≤60	≤63	≤65	≤67
		2	15-100			≤60	≤60	≤63	≤65	≤67
重量 Weight	Kg	1	3-10	1.6	3.9	8.9	18	35.5		
		2	15-100	2.1	5.1	8.1	16.6	42		

1. Speed ratio 減速比 ($i=S_{in}/S_{out}$)

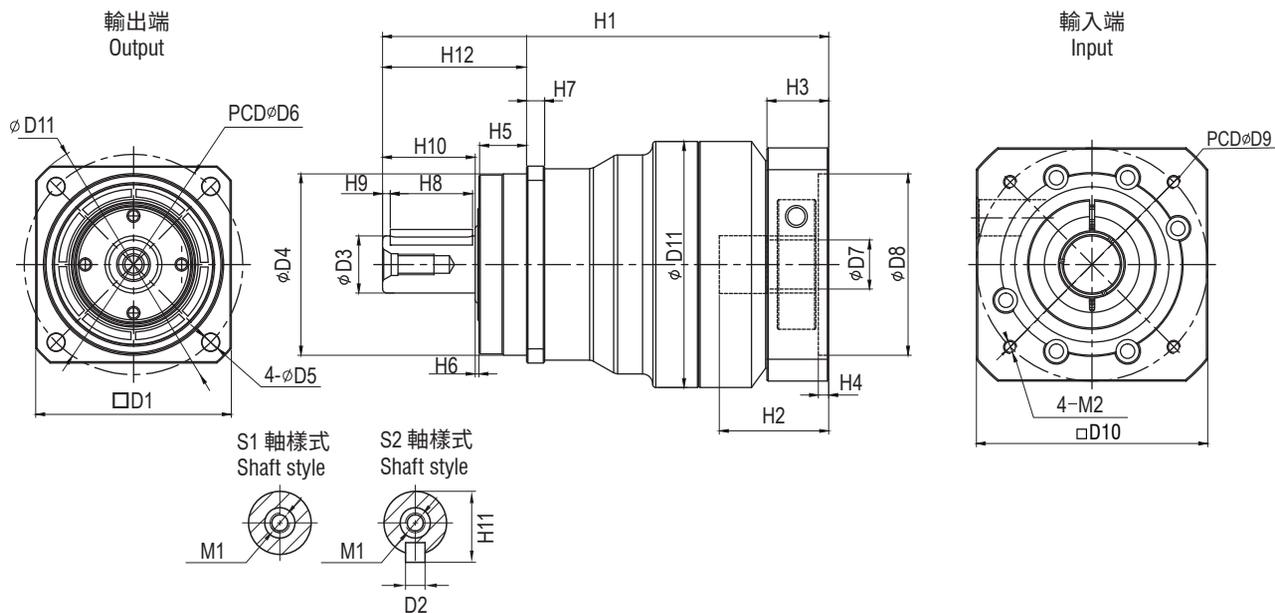
2. When the output speed is 100 rpm, it acts on the center of the output shaft. 輸出轉速 100rpm 時，作用於輸出軸中心

3. For Continuous operation, the service life is no less than 10,000 hours. 連續運轉時，壽命為 10,000 小時

4. The noise value was measured based on the input rotational speed of 3000 rpm, $i=10$. 噪音值為輸入轉速 3000rpm, $i=10$ 所得

Any product models and parameters in this sample are subject to change without prior notice. Please confirm with the company before ordering. 此型錄中所有產品型號及參數如有變更，恕不另行公告。訂購前請與我們確認。

Specification 規格尺寸表



型號 Model / 單位 Unit:mm		GF060	GF075	GF100	GF140	GF180
D1		62	76	105	142	180
D2		5	6	10	12	16
D3		16	22	32	40	55
D4		60	70	90	130	160
D5		5.5	6.8	9	11	13
D6		68	85	120	165	215
D7	L1	14	19	24	35	42
	L2	14	19	19	24	35
D8	L1	50	70	110	114.3	114.3
	L2	50	70	70	110	114.3
D9	L1	70	90	130	200	200
	L2	70	90	90	130	200
D10	L1	60	90	130	180	180
	L2	60	90	90	130	180
D11		70	95	122	152	205
M1		M5	M8	M12	M16	M20
M2	L1	M4	M5	M8	M12	M12
	L2	M4	M5	M5	M8	M12
H1	L1	131.5	173.5	247	296	343.8
	L2	154.5	205	248.7	296	380.6
H2	L1	33.5	41.5	71	83	97.5
	L2	34	41.5	42	322	83
H3	L1	20	24	42	53.5	53.5
	L2	20	24	24	42	53.5
H4	L1	5	4	16	15	8
	L2	5	4	4	10	15
H5		18.5	18.5	28	28.2	27
H6		1.5	1.5	2	1.8	3
H7		6	7	10	12	15
H8		25.2	32	40	70	70.5
H9		2	3	5	5	6
H10		28.5	36	58	82	82
H11		18	24.5	35	43	59
H12		48.5	56	88	112	112

Moment of Inertia 轉動慣量

規格 Specification	段 Stage	減速比 Speed Ratio	框 Frame					
			GF060	GF075	GF100	GF140	GF180	
轉動慣量 Moment of Inertia	Kg.cm ²	1	3	0.16	0.61	3.25	9.2	28.98
			4	0.14	0.48	2.74	7.5	23.67
			5	0.13	0.47	2.71	7.4	23.29
			6	0.13	0.45	2.65	7.2	22.75
			7	0.13	0.45	2.62	7.1	22.48
			8	0.13	0.44	2.58	7.0	22.59
			10	0.13	0.44	2.57	7.0	22.51
			15,20,25,30,35,40	0.13	0.47	0.47	2.71	7.42
			50,60,70, 80,100	0.13	0.44	0.44	2.57	7.03
			2					

- GB
- GBR
- GD
- GDR
- GDP
- GE
- GER
- GF**
- GCB
- GCBR
- GCE
- GCBK
- GA
- GAE
- GM
- GST