



新

創新 Innovation

實

信實 Honesty

勤

勤快 Diligence

效

效益 Efficiency



Chenta Company Profile

- 1 1960年本公司董事長陳茂正先生創設“成大機器廠”於高雄市自強二路，工廠取名“成大”乃本於其對母校成功大學機械系在機械專業知識教育養成之感恩及飲水思源之情。
- 2 成大機器廠成立後，專門從事汽車船舶引擎曲軸之研磨再生，汽缸搪缸及柴油引擎校正等機械加工工程，當時為南台灣之翹楚，由於技術精良服務親切，開業後旋即聞名遐邇，生意蓬勃。
- 3 1971年本於公司發展應有自主性產品，才能永續經營遂與日本減速機製造廠技術合作，開始生產製造自有品牌之成大齒輪減速機，發展至今，公司員工近90名，產品以自有之CHENTA品牌行銷全球。主要市場為台灣、亞洲、北美洲及中東，至今已執台灣業界之牛耳。並在海外設立美國分公司及中國上海分公司。
- 4 建廠以來，本公司即本著“結合一流人才，研發製造高品質的產品”為信念。產品政策以“品質保證”“交貨準確”“價格競爭”“生產合理”及“行銷國際”為追求目標。
- 5 累積50多年之機械製造經驗及誠信經營精神，本公司已自然形成一種優良的公司文化，此精神文化乃是公司最寶貴之資源，表諸文字即是“新”“實”“勤”“效”，乃創新、信實、勤快、效益，之意也。
- 6 全體員工受此公司文化之薰陶，工作勤奮盡忠職守。在良好工作環境下，協力合作積極創新。使公司持續穩定發展，營造共同效益。
- 7 本公司將在現有資源文化基礎上，繼續秉持敬業精神，以客戶至上的服務態度，精益求精，生產高品質具競爭價位之齒輪減速機回饋國內外客戶，與客戶攜手成長，以臻永續經營之目標。

公司概要

公司名稱：成大精機工業股份有限公司
CHENTA PRECISION MACHINERY IND. INC.

成立：民國 60 年（1971 年）

職工人數：100 名

廠房面積：仁武廠 7000M²

上海廠 6800M²

蘇州廠 30000M²



Chenta Company Profile

- 1** In 1960, Mr. Mao Cheng Chen, president of the company, and two colleagues in the department of Mechanical Engineering at Tainan Engineering College (predecessor of Cheng Kung University) established a company called "Chen Ta Machinery Works". It was named "Chen Ta" in honor of their Alma mater, Cheng Kung University (called Chen Ta in short).
- 2** Chen Ta Machinery Works specialized in machining jobs such as grinding/re-building of the crankshafts of automobile and vessel engines, cylinder overhaul, and diesel tuning. Due to the excellent technique and cordial service, the company name was soon well known and the business became prosperous.
- 3** In 1971, Chen Ta Machinery began a partnership with Mitaka Koki, and then Jen Wu Machinery Co., Ltd and CHENTA were established with a starting of manufacturing "CHENTA GEAR REDUCERS". Now CHENTA products are sold throughout worldwide. In Taiwan, CHENTA remains at the top of the field; also set an office in CA, USA and a plant in Shanghai, China.
- 4** Since the beginning, our conviction has been to "Gather excellent human resources, and research and manufacture high quality products". Our product policy is "Guaranteed Quality", "On Time Delivery", "Competitive Prices", "Rational Production", and "International Marketing".
- 5** The motto of our company is "INNOVATION", "HONESTY", "DILIGENCE", and "EFFICIENCY".
- 6** With our 50 years of experience in mechanical manufacturing and honest operation, a fine culture has grown inside the company. This spirit is our most precious resource.
- 7** Based on the company's existing cultural resources, we will maintain expertise in the field, serve our customers with respect and honesty, constantly discipline employees, and manufacture premium quality Gear Speed Reducers at a reasonable price for reaching the goal of our long term operation and expanding business over the world.

Company Profile

Chenta Precision Machinery Ind. Inc.

Established: 1971

Employee: 100 persons

Plant Sizes: Jen Wu Plant: 7000M²

Shanghai Plant: 6800M²

Suzhou Plant: 30000M²



公司沿革

1960 “成大機器廠”設立於高雄市自強二路，從事引擎之曲軸研磨，汽缸搪缸零件修理等工程。

1971 成立仁武機械股份有限公司，設廠於高雄縣仁武鄉，正式生產“成大牌”蝸輪減速機（由日本MITAKA KOKI 技術提供），資本額 1 5 0 萬元。

1975 購鳳山工業區內廠地，並著手興建鋼筋水泥標準廠房。

1976 減速機首度成功外銷至美國芝加哥，開啟外銷市場。董事長陳茂正因公司經營傑出，獲頒國立成功大學校友榮譽獎章。

1977 資本額增資至 3 0 0 萬元，鳳山工廠興建完成，仁武廠併入鳳山廠生產。

1983 資本額增資至 1 0 0 0 萬元。

1989 開發成功全省最大馬力之 4 0 0 型蝸輪減速機，供應台糖公司。

1990 正式啟用電腦化連線管理作業及 AUTOCAD 電腦輔助設計。

1991 購置全省最大型之蝸桿螺牙磨床（研磨工件最大長度：1 5 0 0 MM）

1992 開發成功大馬力 5 0 0 型及 6 2 5 型蝸輪減速機，供鋼鐵公司使用。

1993 資本額增資為 2 0 0 0 萬元。成立美國分公司—Channel power transmission Inc. 拓展美國市場。

1994 承製國連鋼鐵公司 800HP 軋鋼用齒輪箱，品質客戶滿意。

1995 與日本 MAKI-SHINKO 製作所技術交流，公司幹部赴日學習。

1996 推動執行工廠 5 S 運動—整理、整頓、清掃、清潔、修身。

1997 購置日本大阪精密公司之齒輪檢測儀。新產品螺旋齒輪減速機正式量產銷售。

1998 正式取得 ISO 9001 國際品質保證。

1999 首度赴德國漢諾威 (HANNOVER MESSE) 參展減速機。

2000 建地面積 7000m² 之現代化新廠完成啟用。

2001 公司電腦管理系統，正式更新為視窗版 WORKFLOW-ERP (流程導向-企業資源規劃系統)。

2002 於上海嘉定區設立分公司—上海成奕精密機械有限公司，擴大並直接服務廣大之中國大陸客戶。與國立成功大學機械工程系合作，導入有限元素分析 (Finite Element Analysis - FEA)，進行產品之最佳化設計。

2003 ISO 9002 品質保證系統轉昇為 ISO 9001 - 2000 年版。

2004 購置三次元檢驗設備，配合臥式綜合加工中心機，升級加工精度等級。

2007 設立美國西岸辦公室於加州橘郡。

2008 與中鋼公司簽約成為減速機維修承包商。

董事長陳茂正先生獲頒國立成功大學傑出校友成就獎。

2009 9月升級 ISO 9001:2008 年版國際品質保證。

11月經濟部中小企業處優質企業示範觀摩。

2012 5月水車式增氧機通過成功大學先進動力系統研究中心綠色產品檢測實驗室試驗節能合格，並獲漁業署專案採購補助。

CHRONOLOGY

1960

"Chenta Machinery Works" was established at Tzu-Chlan 2nd Road, Kaohsiung City. We engaged in the business of engine crankshaft grinding, cylinder and engine overhaul.

1971

Jen Wu Machinery Co., Ltd. was founded and located on Jen Wu Village, Kaohsiung County with a start of manufacturing "CHENTA BRAND" Worm Gear Speed Reducers (techniques provided by Mitaka Koki, Japan). Capital \$1.5 million NT dollars.

1975

Bought a land in Feng Shan Industrial Zone for building a standard concrete plant in construction.

1976

Opened the exporting business by a successful delivery to Chicago, USA. Due to the excellent company performance, Chen Gong University awarded Mr. Mao-Cheng Chen as an eminent alumnus.

1977

Increased the capital to 3 million NT dollars. The Feng-Shan plant was completed and made a combination of production from Jen Wu plant and new Feng-Shan plant.

1983

Increased the capital to 10 million NT dollars.

1989

Successfully developed the largest horse power size 400 Worm Gear Reducer in Taiwan for a usage by Taiwan Sugar Mill Company.

1990

Started to computerize on-line operation and AutoCAD computer-aided design.

1991

Purchased the largest Worm-thread Grinder Machine in Taiwan. Maximum ability of length is 1500 mm.

1992

Successfully developed size 500 and size 625 large HP Worm Gear Reducers for steel mill application.

1993

Increased the capital to 20 million NT dollars and established USA branch office - GearKing, Inc. for developing USA market.

1994

Completed Kwo-Lian Steel Mill Company's 800 HP roller mill Gearbox. Customer was pleased with the quality.

1995

Techniques Interchanged with Japan Makishinko. Sent company's cadre members to Japan for training.

1996

5-S Drive: Order, Reorganization, Sweep, Clean, Cultivation (pronounced in Japanese).

1997

Purchased gear tester from Osaka Seimitsu, Japan. Started manufacturing new product - Helical Gear Reducers.

1998

Awarded ISO 9002 international quality certification.

1999

Maiden exhibition of CHENTA speed reducers in the Hannover Messer, Germany.

2000

Completed and started operating in the 5000 M2 modern plant in Jen Wu.

2001

Updated the computer managing system to WORKFLOW-ERP (Enterprise Resource Planning) in windows 2000 version

2002

Located in Ja-Din Area, Shanghai, China, the branch office, CHENYI Machinery Co., was setup to serve customers in Mainland China. Cooperated with Department of Mechanical Engineering in National Cheng Kung University to import Finite Element Analysis-FEA technology to optimize the design of our gear products

2003

Converted ISO 9002 to ISO 9001-2000 version

2004

Having a new 3-Dimensions Inspection Equipment, with horizontal CNC machine, upgrade the accuracy of machining job.

2007

Established branch office in California, USA

2008

Becoming the CSC (China Steel Corp.) official contractor for gearboxes maintenance

The president Mr. M. C. Chen is awarded the most outstanding alumnus honor by National Cheng Kung University

2009

September: obtain ISO9001:2008 certificate

November: Appointed by Ministry of Economic Affairs R.O.C to be a demonstration factory for Medium and Small Sized Enterprises in the country

2012

May: Chenta Water Paddle Aerator passed the exam and gained a Green-Product certification by the Green-Product Certification Division at National Cheng Kung University.



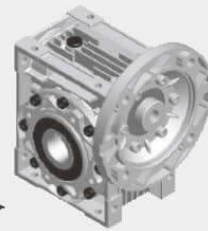
CHENTA

成大齒輪減速機

1. 蝸輪減速機
(WORM GEAR REDUCERS)



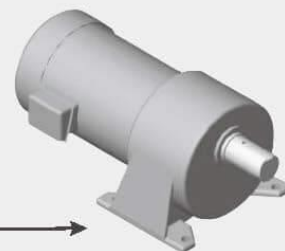
2. 鋁殼中空軸蝸輪減速機
(ALUMINUM HOUSING WORM
GEAR REDUCERS)



3. 強力型齒輪減速機
(HELICAL GEAR REDUCERS)



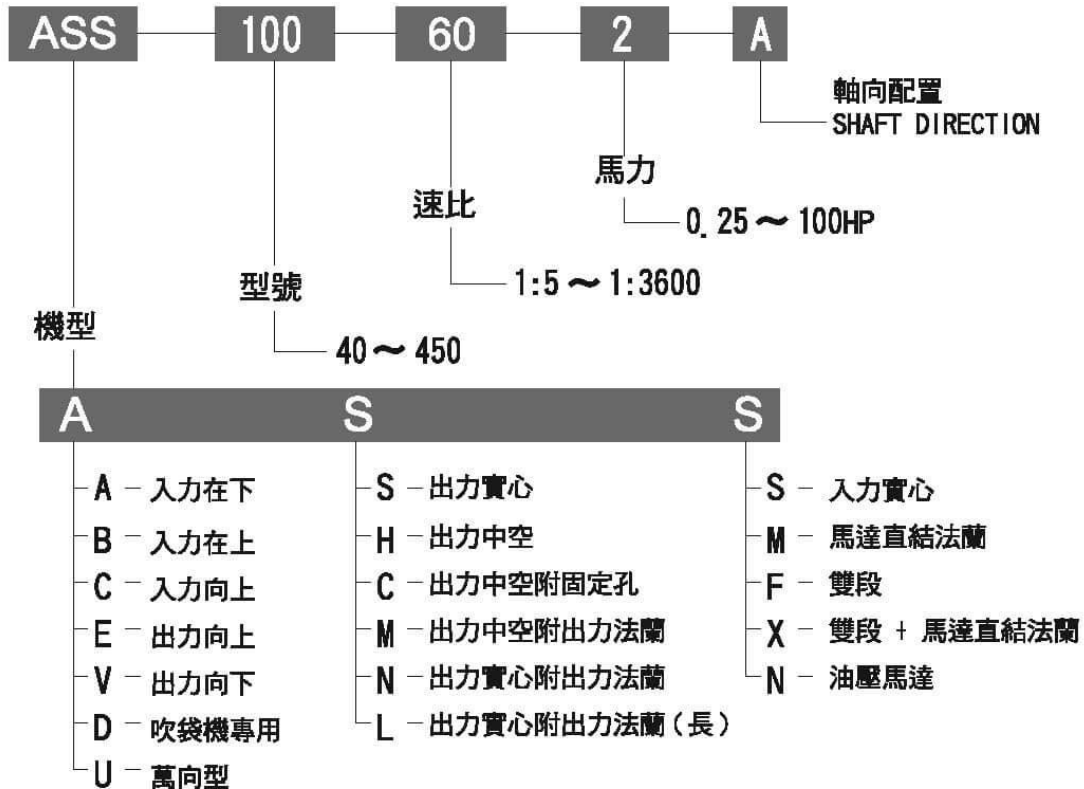
4. 小型齒輪減速馬達
(COMPACT HELICAL GEAR MOTOR)



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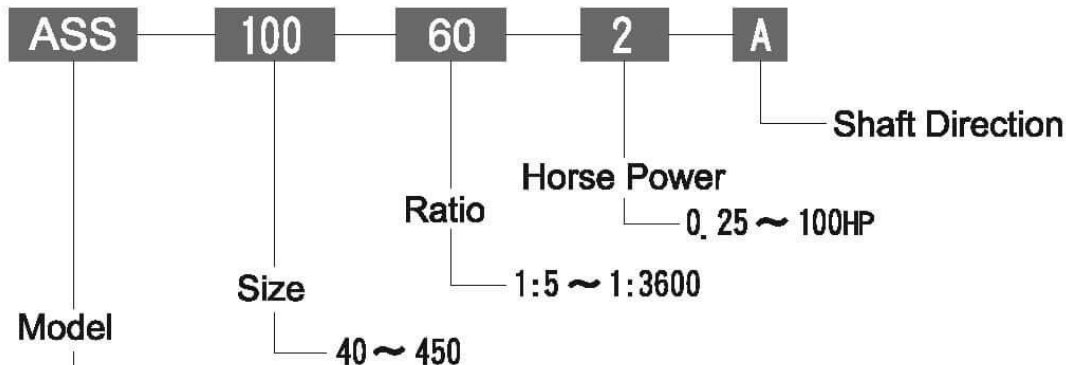
蝸齒輪減速機之型號編碼說明:



CHENTA 蝸齒輪減速機特點

- 具有公制 IEC 及美制 NEMA 兩種馬達法蘭規格
- 減速比範圍 5:1 到 3600:1
- 成大蝸輪減速機成品低背隙標準，可提供客戶諮詢選用
- 使用馬力範圍小從 1/4HP 大至 100HP
- 使用高品質雙唇油封
- 蝸桿採用 S45C 中碳鋼經硬化熱處理後，牙面研磨齒形
- 300 型(含)以上，蝸桿採用 SCM440 鉻鉬合金鋼，經調質高週波處理後，牙面齒形研磨
- 蝸輪材質採用高品質之 ALBC3 鋁青銅具最佳耐磨性
- 機體外殼採高強度之 FC-20 灰口鑄鐵
- 300 型(含)以上機體外殼採更高強度之 FCD45 球狀石墨鑄鐵
- 入力軸承使用圓錐滾子軸承
- 萬向型具活動式底座
- 工業用重負載型使用壽命長
- 一年使用保固

Numbering Systems for Worm Gear Reducers:



A	S	S
A — Solid Input at Bottom	S — Solid Output Shaft	S — Solid Input Shaft
B — Solid Input at Top	H — Hollow Output Shaft	M — Motor Flange
C — Solid Input Upward	C — Hollow Output Shaft with Setting Holes	F — Double Reduction
E — Solid Output Upward	M — Hollow Output Shaft with Mounting Flange	X — Double Reduction with Motor Flange
V — Solid Output Downward	N — Solid Output Shaft with Mounting Flange	N — for Hydraulic Motor
D — for Plastic-bag Blowing Machine	L — Solid Output Shaft with Long Mounting Flange	
U — Universal Mounting		











































CHENTA Features of Worm Gear Reducers:

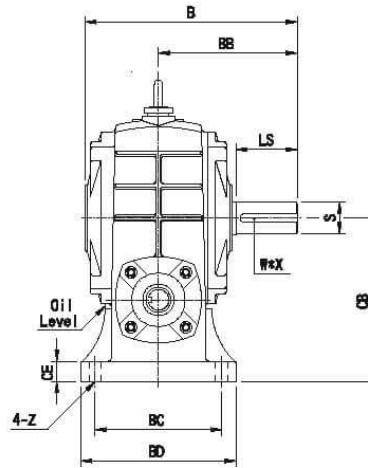
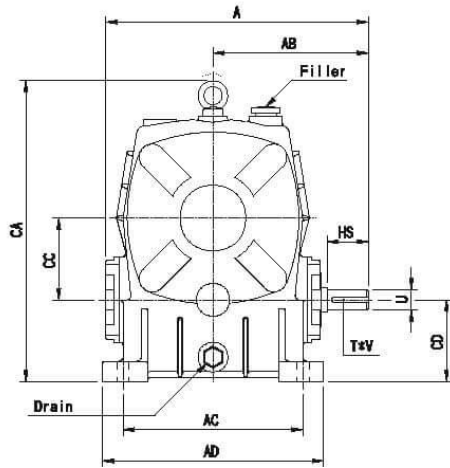
- Motor Flange: both IEC and NEMA flanges are available
- Range of Ratio: 5:1 ~ 3600:1
- Reduced Backlash Designs are available for Chenta Worm Gear Reducers.
- Range of Horse Power: 1/4HP ~ 100HP
- Oil Seals: premium quality double lips oil seals
- Worm Shaft:
 - Under size 300- in medium carbon steel (S45C) with harden heat-treatment and threads grounded
 - Size 300 to up- in Chromium Molybdenum Alloy Steel (SCM440) with high frequency heat-treatment and threads grounded
- Worm Wheel: in Aluminum Bronze (ALBC3) with the most durable feature
- Housing:
 - Under size 300- in Grey Iron (FC20) with higher strength
 - Size 300 to up- in Ductile Cast Iron (FCD45) with first-rate intensity
- Removable bases for universal mounting
- Enduring service life
- One year limited warranty

型號頁次索引

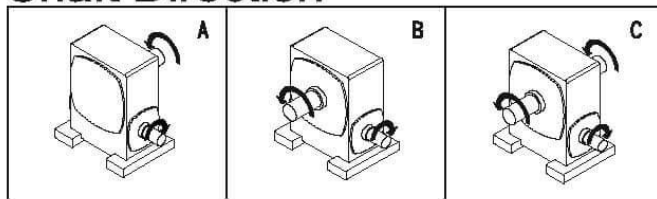
型 式	簡 介	頁次	型 式	簡 介	頁次	型 式	簡 介	頁次
	ASS 單 段 入力實心在下	5		ESX 雙段出力向上 入力附法蘭	34		UHS 單段萬向型 出力中空軸	57
	ASM/ASN 單 段 入力在下附法蘭	8/9		VSS 單 段 出力向下	37		UHM 出力中空軸 入力附法蘭	58
	ASF 雙 段 入，出力實心	10		VSM 單段出力向下 入力附法蘭	40		UHF 雙段萬向型 出力中空軸	59
	ASX 雙 段 入力附法蘭	13		VSF 雙 段 出力向下	42		UHX 雙段出力中空 入力附法蘭	60
	BSS 單 段 入力實心在上	15		VSX 雙段出力向下 入力附法蘭	45		UCS 單段出力中空 大蓋具固定孔	61
	BSM/BSN 單 段 入力在上附法蘭	17/19		DMM 單段出力內孔式 入力附法蘭	48		UCM 出力中空具固定孔 入力附法蘭	62
	CSS 單 段 入力實心向上	20		DNN 出力實心短法蘭 入力附法蘭	49		UCF 雙段出力中空 具固定孔	63
	CSM 單 段 入力向上附法蘭	21		DLM 出力實心長法蘭 入力附法蘭	50		UCX 出力中空具固定孔 入力附法蘭	64
	CHS 單段出力中空 入力實心向上	22		BCB 煞車離合器型 出力實心	51		UNS 出力中空附法蘭 入力實心	65
	CHM 單段出力中空 入力向上附法蘭	23		BSV 無段變速器型 入，出力實心	52		UNM 出力中空附法蘭 入力附法蘭	66
	WSM 單 段 水車專用型	24		USS 單段萬向型 入，出力實心	53		UNF 雙段出力中空附 法蘭入力實心	67
	ESS 單 段 出力向上	25		USM 單段萬向型 入力附法蘭	54		UNX 雙段出力中空 入，出力附法蘭	68
	ESM/ESN 單段出力向上 入力附法蘭	28/30		USF 雙段萬向型 入，出力實心	55		H-BASE 萬向型平底座	69
	ESF 雙 段 出力向上	31		USX 雙段萬向型 入力附法蘭	56		L-BASE 萬向型直角座	70

Model Guide

Mode	Description	Page	Mode	Description	Page	Mode	Description	Page
	ASS: Single reduction, solid input at bottom	5		ESX: Double reduction, output upward in vertical, hollow input with motor flange	34		UHS: Single reduction, solid input, hollow output, universal mounting	57
	ASM/ASN: Single reduction, hollow input at bottom with motor flange	8/9		VSS: Single reduction, solid output downward in vertical	37		UHM: Single reduction, input motor flange, hollow output, universal mounting	58
	ASF: Double reduction, solid input and output shaft	10		VSM: Single reduction, output downward in vertical, input with motor flange	40		UHF: Double reduction, solid input, hollow output, universal mounting	59
	ASX: Double reduction, hollow input with motor flange	13		VSF: Double reduction, solid input and output downward in vertical	42		UHX: Double reduction, input motor flange, hollow output, universal mounting	60
	BSS: Single reduction, solid input at top	15		VSX: Double reduction, output downward in vertical, hollow input with motor flange	45		UCM: Hollow output, output cover with setting holes, input motor flange	61
	BSM/BSN: Single reduction, hollow input at top with motor flange	17/19		DMM: Hollow output with mounting flange, input with motor flange	48		UCS: Hollow output, output cover with setting holes	62
	CSS: Single reduction, solid input upward	20		DNM: Solid output with short mounting flange, input with motor flange	49		UCF: Double reduction, hollow output, output cover with setting holes	63
	CSM: Single reduction, hollow input upward with motor flange	21		DLM: Solid output with long mounting flange, input with motor flange	50		UCS: Double reduction, hollow output, output cover with setting holes, input motor flange	64
	CHS: Single reduction, hollow output, solid input vertical	22		BCB: Solid input with brake and clutch, solid output	51		UMS: Hollow output with mounting flange, solid input	65
	CHM: Single reduction, hollow output, input vertical with motor flange	23		BSV: Special for variable speed drive	52		UMM: Hollow output with mounting flange, input motor flange	66
	WSM: Special for Paddle Wheel Aerator	24		USS: Single reduction, solid input and output, universal mounting	53		UMF: Double reduction, hollow output with mounting flange, solid input	67
	ESS: Single reduction, solid output upward in vertical	25		USM: Single reduction, input motor flange, universal mounting	54		UMX: Double reduction, hollow output with mounting flange, input motor flange	68
	ESM/ESN: Single reduction, output upward in vertical, input with motor flange	28/30		USF: Double reduction, solid input and output, universal mounting	55		H-BASE: H-shape base for universal type	69
	ESF: Double reduction, solid input and output upward in vertical	31		USX: Double reduction, input motor flange, universal mounting	56		L-BASE: L-shape base for universal type	69



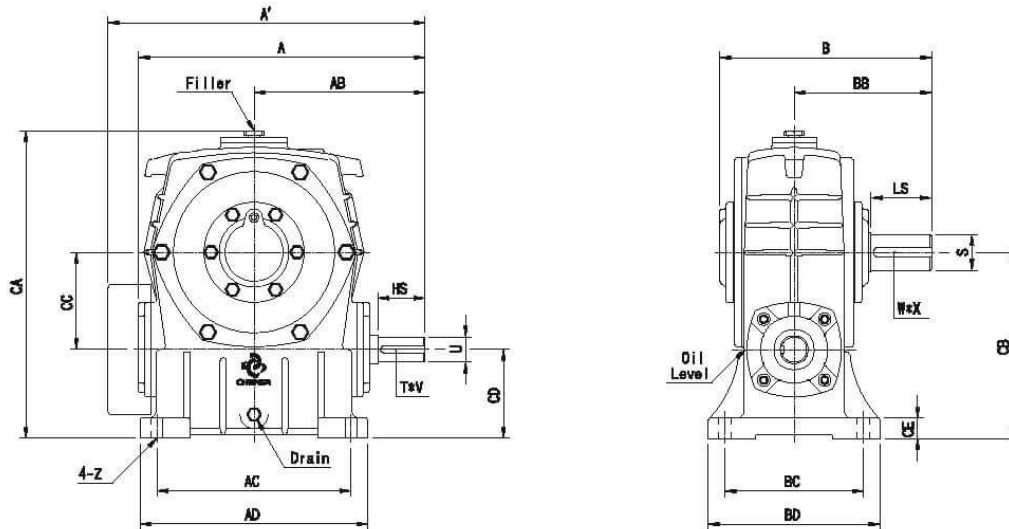
Shaft Direction



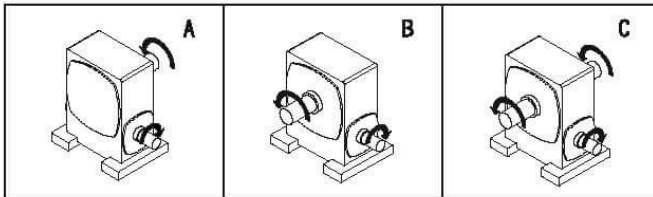
Unit:mm

Size	Ratio	A	AB	AC	AD	B	BB	BC	BD	CA	CB	CC	CD	CE	Z
40	1/10	139	83	70	88	120	78	80	102	135	70	40	30	10	9
50		181	107	110	140	147	95	95	120	180	100	50	50	18	11
60	1/15	204	124	120	150	168	110	105	130	210	120	60	60	20	11
70	1/20	235	140	150	190	196	130	115	150	240	140	70	70	22	15
80	1/30	265	160	180	220	216	140	135	170	278	160	80	80	23	15
100	1/40	325	192	220	270	260	170	155	190	376	200	100	100	25	15
120	1/50	389	230	260	320	291	190	180	230	435	240	120	120	30	18
135	1/60	435	260	290	350	320	210	200	250	490	270	135	135	30	18

Size	Input Shaft			Output Shaft			Oil (l)	Weight (kg)
	HS	U	T * V	LS	S	W * X		
40	25	12	4 * 2.5	35	16	5 * 3	0.2	4.1
50	30	12	4 * 2.5	40	17	5 * 3	0.22	7
60	40	15	5 * 3	50	22	7 * 4	0.32	9.7
70	40	18	5 * 3	60	28	7 * 4	0.55	14.6
80	50	22	7 * 4	65	32	10 * 5	0.77	19.7
100	50	25	7 * 4	75	38	10 * 5	1.53	38.4
120	65	30	7 * 4	85	45	12 * 5	2.4	63.4
135	75	35	10 * 5	95	55	15 * 5	3.25	83.2



Shaft Direction



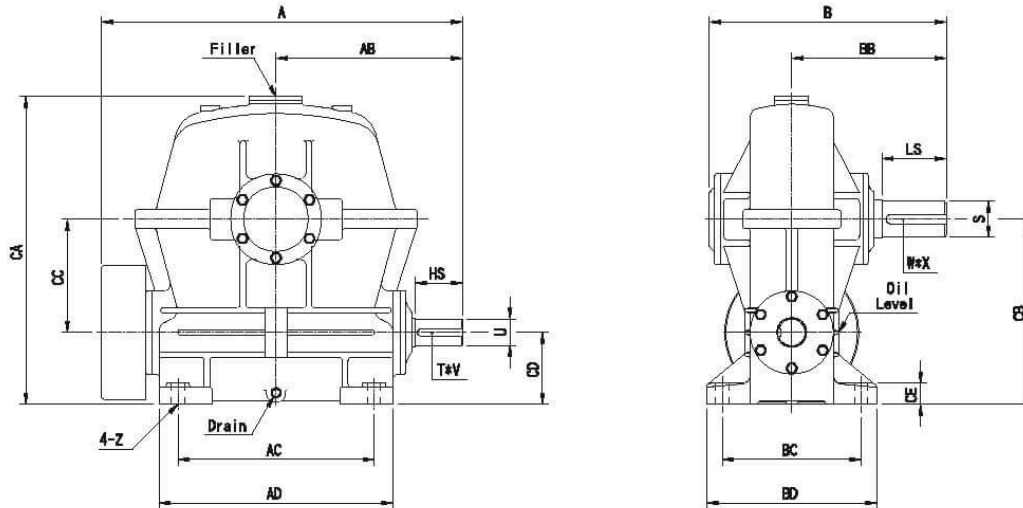
Unit:mm

Size	Ratio	A'	A	AB	AC	AD	B	BB	BC	BD	CA	CB	CC	CD	CE	Z
155	1/10	---	479	286	320	385	377	242	220	280	487	290	155	135	30	20
175	1/15	---	517	308	350	410	381	248	250	310	536	335	175	180	37	20
200	1/20	---	---	357	350	420	479	305	280	350	637	390	200	190	35	22
225	1/30	697	---	361	390	470	530	345	330	410	670	415	225	190	45	27
250	1/40	720	---	361	390	470	530	345	330	410	670	415	225	190	45	27
250	1/50	815	---	420	440	520	565	380	380	440	742	450	250	200	40	27
250	1/60	815	---	420	440	520	565	380	380	440	742	450	250	200	40	27

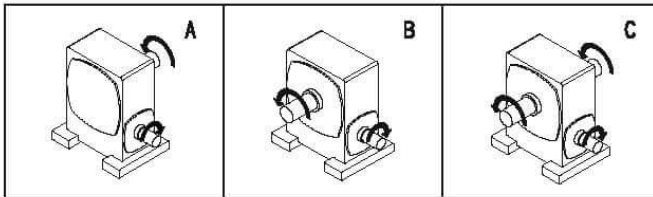
Size	Input Shaft			Output Shaft			Oil (l)	Weight (kg)
	HS	U	T * V	LS	S	W * X		
155	85	40	10 * 5	100	60	15 * 5	4.1	115.3
175	85	45	12 * 5	110	65	18 * 6	5.8	158.3
200	95	50	12 * 5	125	70	20 * 7	6.5	210
225	95	55	15 * 5	140	80	20 * 7	7	282
250	110	60	15 * 5	145	90	24 * 8	9	337

註：風扇罩裝置於 200 型以上。

*cooling fan is set for size 200 to up



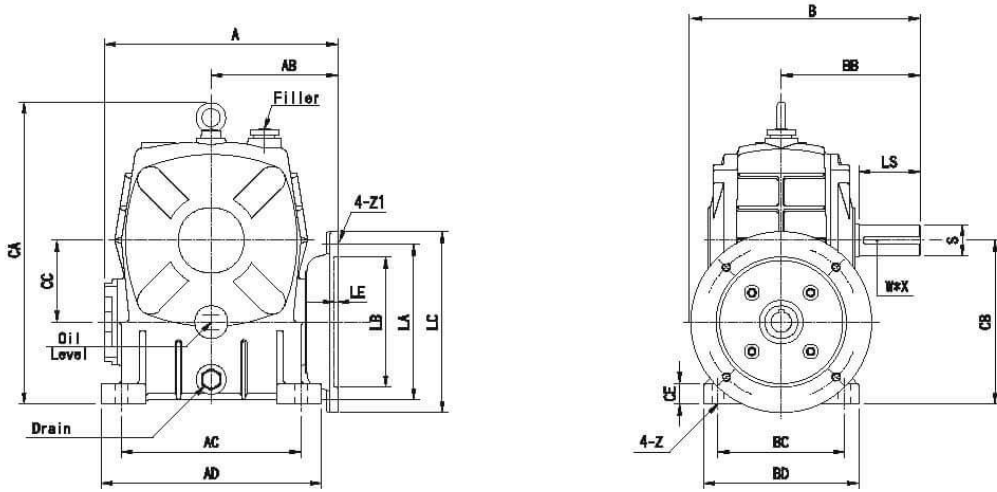
Shaft Direction



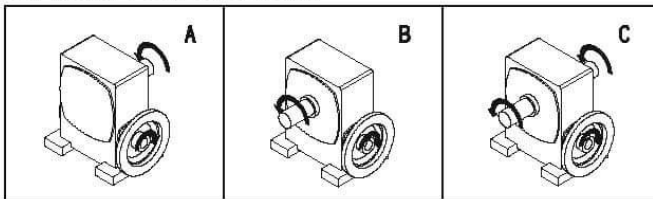
Unit:mm

Size	Ratio	A	AB	AC	AD	B	BB	BC	BD	CA	CB	CC	CD	CE	Z
300	1/10 1/40	958	495	520	620	628	410	368	450	815	490	300	180	55	38
350	1/15 1/50	1088	570	597	700	748	480	432	520	940	585	350	215	55	43
400	1/20 1/60	1160	620	660	780	775	500	470	580	1070	650	400	250	55	43
450	1/30 1/80	1359	695	762	880	860	545	508	620	1190	705	450	255	40	43

Size	Input Shaft			Output Shaft			Oil (l)	Weight (kg)
	HS	U	T * V	LS	S	W * X		
300	125	70	18 * 6	170	95	24 * 8	21	498
350	145	80	20 * 7	190	115	32 * 10	30	673
400	150	85	24 * 8	205	130	35 * 11	41	1006
450	180	85	24 * 8	205	140	35 * 11	50	1330



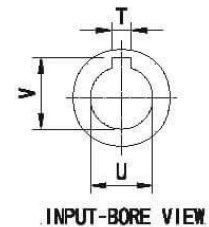
Shaft Direction



Unit:mm

Size	Ratio	A	AB	AC	AD	B	BB	BC	BD	CA	CB	CC	CE	Z	Input Bore		
															U	T	V
50	1/10	174	97	110	140	175	95	95	120	180	100	50	18	11	11	4	12.8
60	1/15	177	97	120	150	190	110	105	130	210	120	60	20	11	11	4	12.8
		213	118	150	190	210	130	115	160	240	140	70	22	15	14	5	16
70	1/20	223	120	150	190	230	130	115	160	240	140	70	22	15	19	5	21.8
80	1/30	234	130	180	220	240	140	135	170	278	160	80	23	15	19	6	21.8
		273	140	220	270	295	170	155	190	378	200	100	25	15	24	8	27.3
100	1/40	295	165	220	270	295	170	155	190	378	200	100	25	15	28	8	31.3
120	1/50	336	180	260	320	315	190	180	230	435	240	120	30	18	28	8	31.3
135	1/60	370	195	290	350	335	210	200	250	490	270	135	30	18	28	8	31.3
		380	218	290	350	360	210	200	250	490	270	135	30	18	38	10	41.3

Size	Output Shaft			Flange					HP	Oil (l)	Weight (kg)
	LS	S	W*X	LA	LB	LC	LE	Z1			
50	40	17	5 * 3	130	110	160	4	M8	1/4 1/2	0.22	7.2
60	50	22	7 * 4	130	110	160	4	M8	1/4 1/2	0.32	10
70	60	28	7 * 4	130	110	160	4	M8	1/2	0.55	15
				165	130	200	5	M10	1	0.77	20.2
80	65	32	10 * 5	165	130	200	4	M10	1 2	0.77	20.2
100	75	38	10 * 5	165	130	200	5	M10	2 3	1.53	39.5
				215	180	250	5	M12	3 5	2.4	65
120	85	45	12 * 5	215	180	250	5	M12	5 7	3.25	85.2
				265	230	300	5	M15	7.5	3.25	85.2



INPUT-BORE VIEW

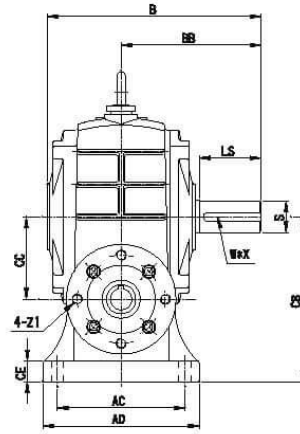
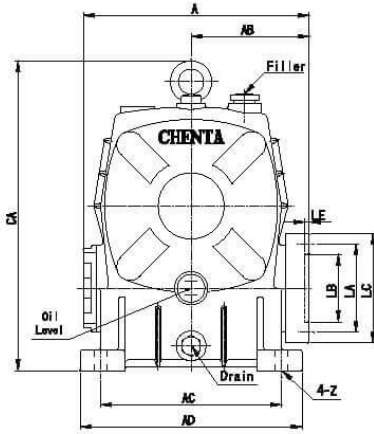


配油壓馬達

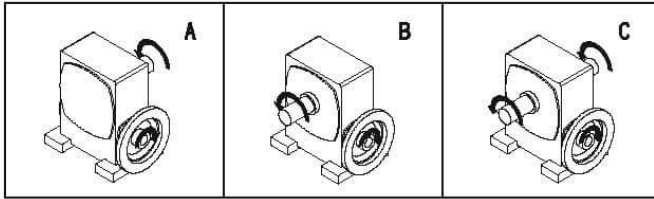
Model : ASN

成大齒輪減速機

Size : 100~135



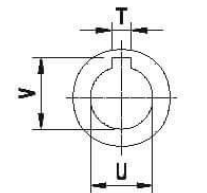
Shaft Direction



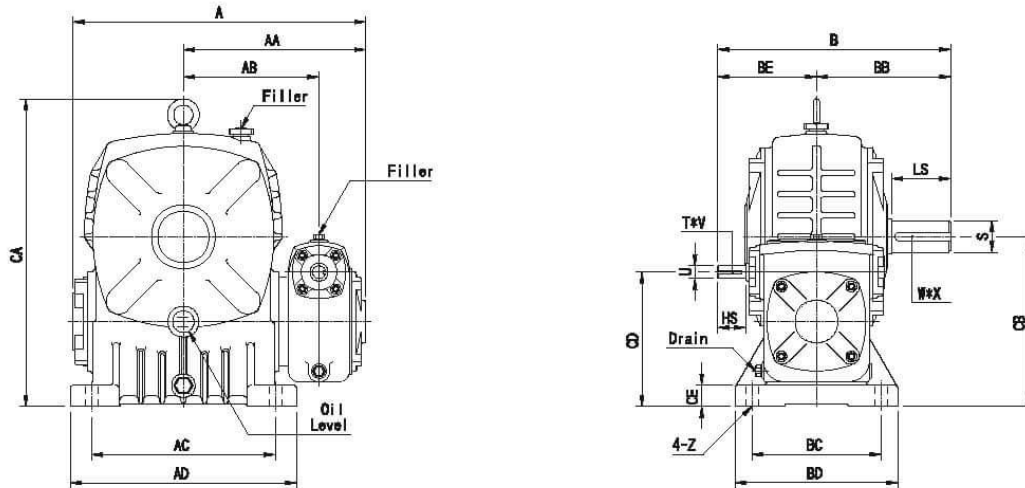
Unit:mm

Size	Ratio	A	AB	AC	AD	B	BB	BC	BD	CA	CB	CC	CE	Z	Input Bore		
															U	T	V
100	1/10	275	143,5	220	270	260	170	155	190	376	200	100	25	15	25,4	6,35	28,5
	1/40																
120	1/15	311	155	260	320	291	190	180	230	435	240	120	30	18	25,4	6,35	28,5
	1/50																
135	1/20	348	178	290	350	320	210	200	250	490	270	135	30	18	25,4	6,35	28,5
	1/80														31,75	7,94	35,5

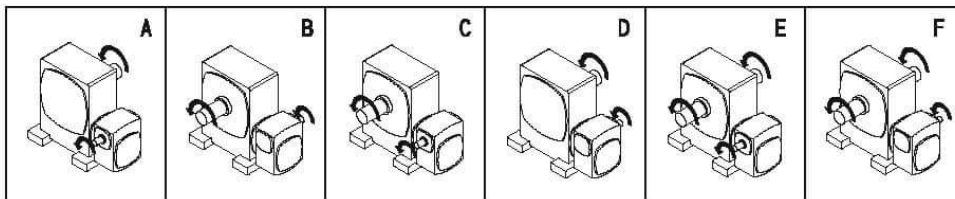
Size	Output Shaft			Flange				
	LS	S	W*X	LA	LB	LC	LE	Z1
100	75	38	10 * 5	107	82,55	133	5	M12
120	85	45	12 * 5	107	82,55	145	7	M12
135	95	55	15 * 5	107	82,55	153	10	M12



INPUT-BORE VIEW



Shaft Direction



Unit:mm

Size	Ratio	A	AA	AB	AC	AD	B	BB	BC	BD	BE	CA	CB	CD	CE	Z
50-80	1/100	286	184	132	180	220	247	140	135	170	107	278	160	130	23	15
60-100		352	219	161	220	270	294	170	155	190	124	372	200	160	25	15
70-120	1/3600	417	258	192	260	320	330	190	180	230	140	430	240	190	30	18
80-135		463	287	211	290	350	370	210	200	250	160	491	270	215	30	18

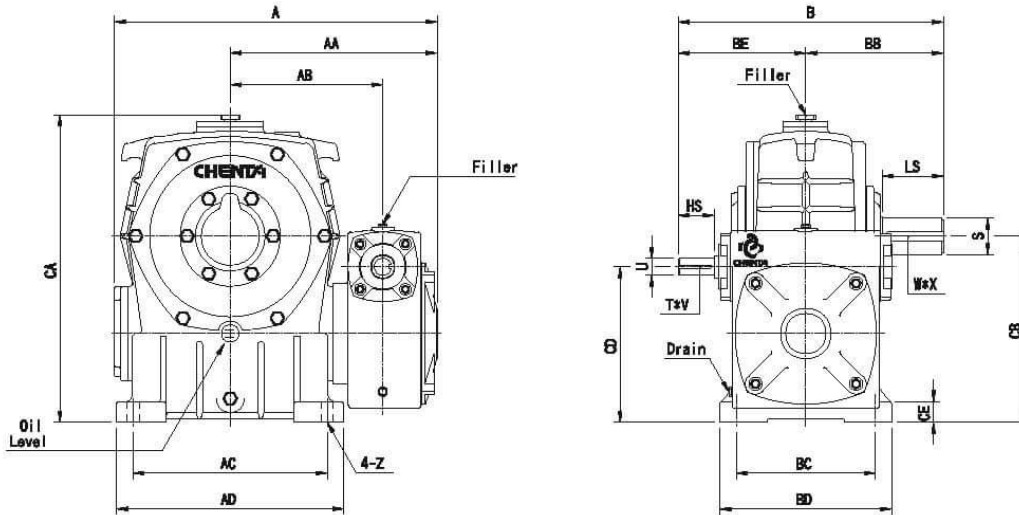
Size	Input Shaft			Output Shaft			Oil (l)	Weight (kg)
	HS	U	T*V	LS	S	W*X		
50-80	30	12	4*2.5	65	32	10*5	1.2	23.8
60-100	40	15	5*3	75	38	10*5	2.2	46.6
70-120	40	18	5*3	85	45	12*5	3.2	73.5
80-135	50	22	7*4	95	55	15*5	4.3	97.7



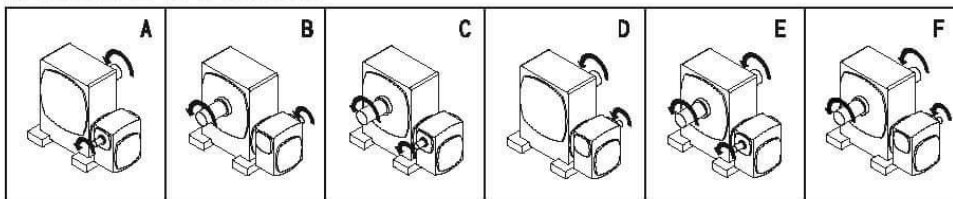
Model : ASF

成大齒輪減速機

Size : 100/155~155/250



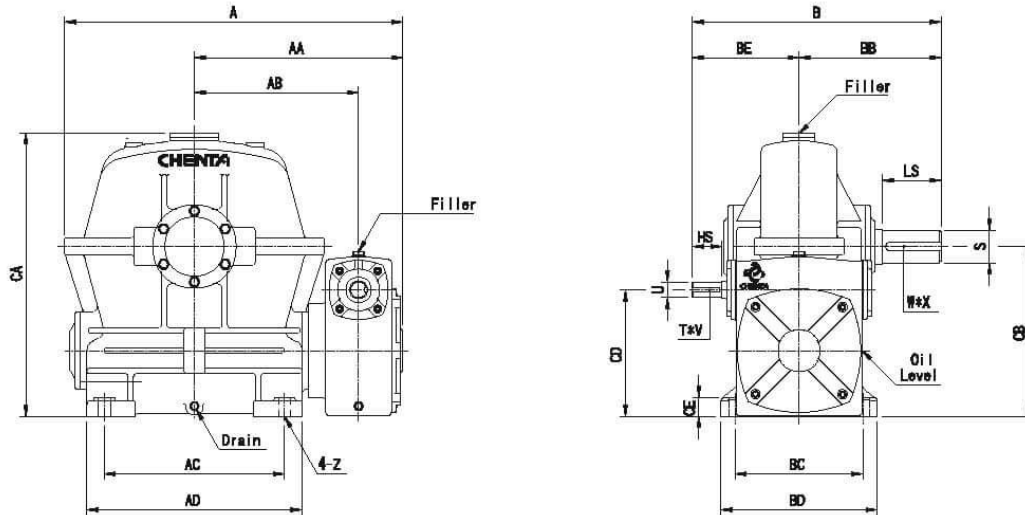
Shaft Direction



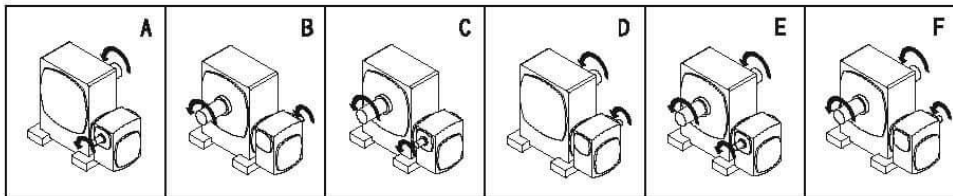
Unit:mm

Size	Ratio	A	AA	AB	AC	AD	B	BB	BC	BD	BE	CA	CB	CD	CE	Z
100-155	1/100	540	340	257	320	385	434	242	220	280	182	487	290	235	30	20
120-175		585	376	275	350	410	478	248	250	310	230	553	335	280	37	20
120-200	1/3600	660	414	312.5	350	420	535	305	280	350	230	637	390	310	35	22
135-225		672	425	315	390	470	605	345	330	410	260	680	415	325	45	27
155-250		750	483	365	440	520	646	360	380	440	286	742	450	355	40	27

Size	Input Shaft			Output Shaft			Oil (l)	Weight (kg)
	HS	U	TxV	LS	S	WxX		
100-155	50	25	7x4	100	60	15x5	6.1	135.5
120-175	65	30	7x4	110	65	18x6	9.2	195.8
120-200	65	30	7x4	125	70	20x7	14.7	258
135-225	75	35	10x5	140	80	20x7	17.2	367
155-250	85	40	10x5	145	90	24x8	22	428



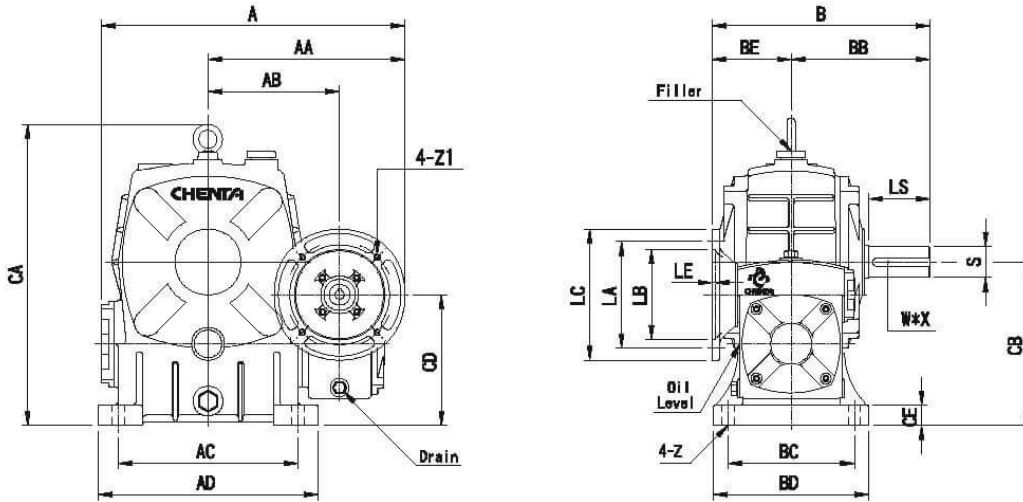
Shaft Direction



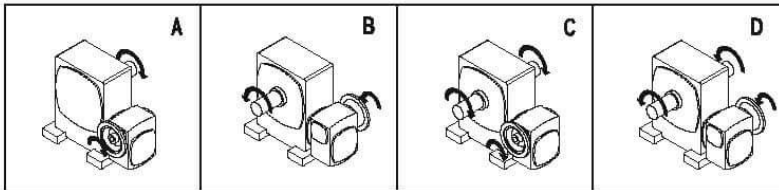
Unit:mm

Size	Ratio	A	AA	AB	AC	AD	B	BB	BC	BD	BE	CA	CB	CD	CE	Z
175-300	1/100 1/3600	980	601	473	520	620	718	410	368	450	308	840	490	365	55	36
200-350		1060	630	525	597	700	830	480	432	520	350	940	565	415	55	43
225-400		1252	777	620	660	780	875	500	470	580	375	1120	650	475	55	43

Size	Input Shaft			Output Shaft			Oil (l)	Weight kg
	HS	U	T*V	LS	S	W*X		
175-300	85	45	12*5	170	95	24 * 8	60	560
200-350	95	50	12*5	190	115	32*10	80	660
225-400	95	55	15*5	205	130	35*11	110	1215



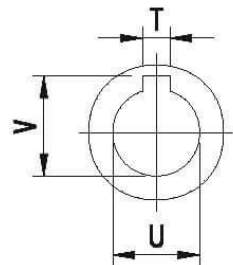
Shaft Direction



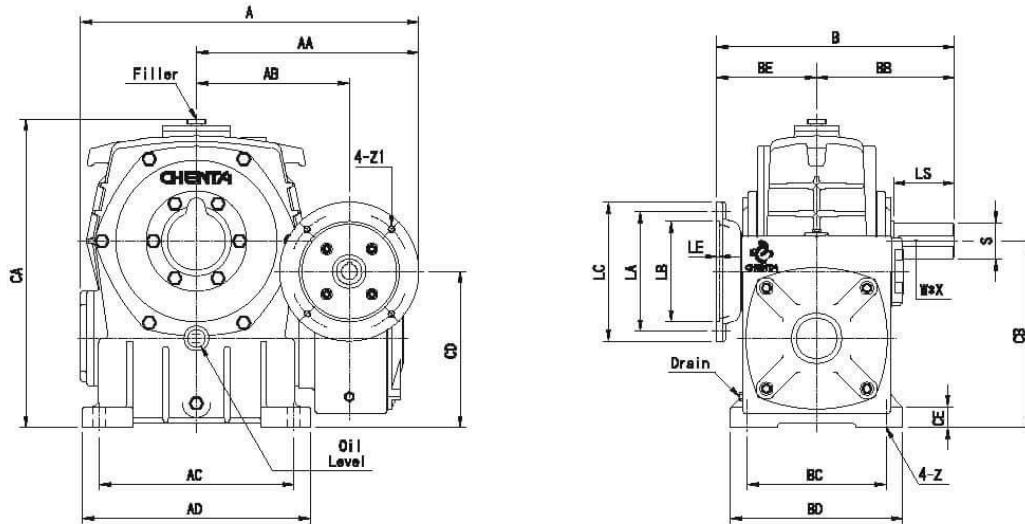
Unit:mm

Size	Ratio	A	AA	AB	AC	AD	B	BB	BC	BD	BE	CA	CB	CD	CE	Z	Input Bore		
																	U	T	V
50-80	1/100	316	212	132	180	220	237	140	135	170	96	271	160	130	23	15	11	4	12.8
60-100		372	241	161	220	270	267	170	155	190	97	372	200	180	25	15	11	4	12.8
70-120	1/3600	428	272	192	260	320	308	190	180	230	118	435	240	190	30	18	14	5	16
80-135		448	292	211	290	350	340	210	200	250	120	490	270	215	30	18	19	6	21.8

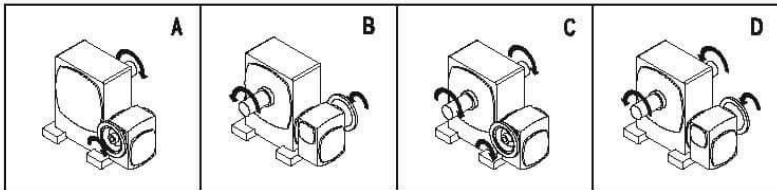
Size	Output Shaft			Flange					HP	Oil (l)	Weight (kg)
	LS	S	W*X	LA	LB	LC	LE	Z1			
50-80	65	32	10*5	130	110	180	4	M8	1/4	1.2	24.9
60-100	75	38	10*5	130	110	180	4	M8	1/4	2.2	48.1
70-120	85	45	12*5	130	110	180	4	M8	1/2	3.2	75.5
80-135	95	55	15*5	165	130	200	5	M10	1	4.3	100.2



INPUT-BORE VIEW



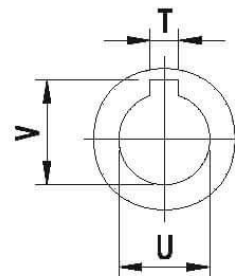
Shaft Direction



Unit:mm

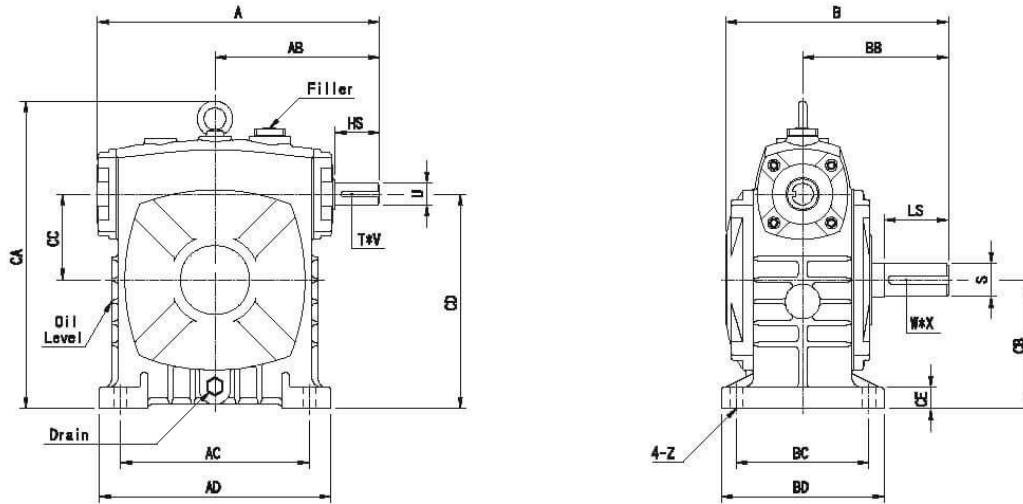
Size	Ratio	A	AA	AB	AC	AD	B	BB	BC	BD	BE	CA	CB	CD	CE	Z	Input Bore		
																	U	T	V
100-155	1/100	545	357	257	320	385	382	242	220	280	140	487	290	235	32	20	24	8	27.3
		574	382																
120-175	1/100	608	400	275	350	410	426	248	250	310	180	553	335	280	37	20	28	8	31.3
120-200		687	437	312.5	350	420	485	305	280	350	180	637	390	310	35	22	28	8	31.3
135-225	1/3600	692	440	315	390	470	540	345	330	410	195	680	415	325	45	27	28	8	31.3
		717	465																
155-250		817	515	365	440	520	596	360	380	440	236	742	450	355	40	27	38	10	41.3

Size	Output Shaft			Flange					HP	Oil (l)	Weight (kg)
	LS	S	WxX	LA	LB	LC	LE	Z1			
100-155	100	80	15*5	165	130	200	5	M10	2	8.1	138.7
120-175	110	85	18*6	215	180	250	5	M12	3	9.2	199.6
									5		
120-200	125	70	20*7	215	180	250	5	9	5	15	261
135-225	140	80	20*7	215	180	250	5	M12	5	17	365
									7.5		
155-250	145	90	24*8	265	230	300	5	15	10	22	425

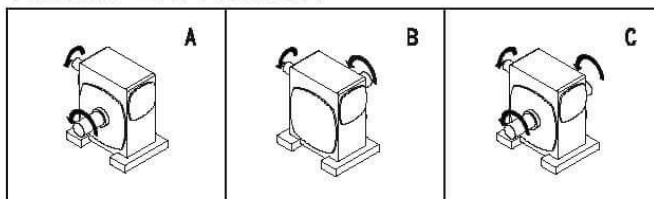


INPUT-BORE VIEW





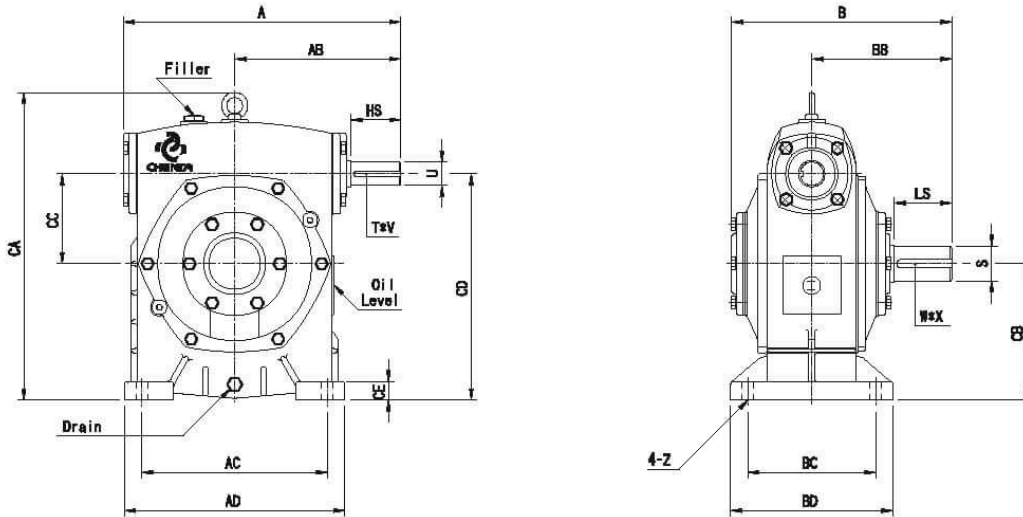
Shaft Direction



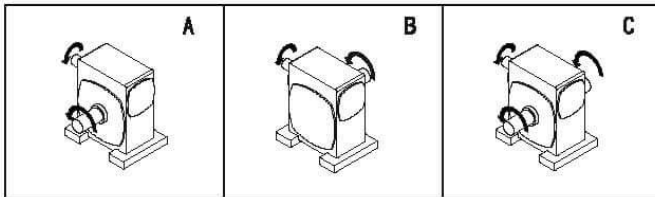
Unit:mm

Size	Ratio	A	AB	AC	AD	B	BB	BC	BD	CA	CB	CC	CD	CE	Z
40	1/10	139	83	70	98	118	78	80	102	140	60	40	100	10	9
50		181	107	110	140	147	95	95	120	175	80	50	130	15	11
60	1/15	204	124	120	150	168	110	105	130	200	90	60	150	18	11
70		235	140	150	190	196	130	115	150	235	105	70	175	20	15
80	1/30	265	160	180	220	216	140	135	170	260	120	80	200	20	15
100	1/40	328	192	220	270	262	170	155	190	359	150	100	250	25	15
120	1/50	389	230	260	320	288	190	180	230	425	180	120	300	30	18
135	1/60	435	260	290	350	320	210	200	250	478	215	135	350	30	18

Size	Input Shaft			Output Shaft			Oil (l)	Weight (kg)
	HS	U	T * V	LS	S	W * X		
40	24.5	12	4 * 2.5	35	16	5 * 3	0.2	4.7
50	30	12	4 * 2.5	40	17	5 * 3	0.4	6.5
60	40	15	5 * 3	50	22	7 * 4	0.5	8.5
70	40	18	5 * 3	60	28	7 * 4	0.8	14
80	50	22	7 * 4	65	32	10 * 5	1.2	19
100	50	25	7 * 4	75	38	10 * 5	2.2	38
120	65	30	7 * 4	85	45	12 * 5	4.2	64
135	75	35	10 * 5	95	55	15 * 5	6	85



Shaft Direction



Unit:mm

Size	Ratio	A	AB	AC	AD	B	BB	BC	BD	CA	CB	CC	CD	CE	Z
155		479	298	320	380	381	242	220	280	536	235	155	390	32	20
175	1/10 1/40	517	308	350	410	381	248	250	310	587	260	175	435	35	20
	1/15 1/50														
200	1/20	697	357	350	420	479	305	280	350	650	290	200	490	35	22
	1/30 1/60														
225		709	381	340	456	495	345	240	330	656	320	225	545	40	26,5

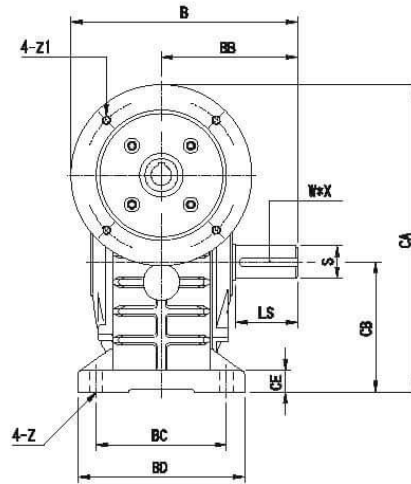
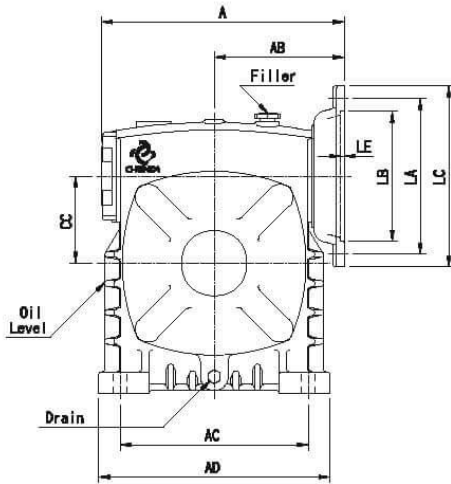
Size	Input Shaft			Output Shaft			Oil (l)	Weight (kg)
	HS	U	T * V	LS	S	W * X		
155	85	40	10 * 5	100	60	15 * 5	7,4	115
175	85	45	12 * 5	110	65	18 * 6	11,5	160
200	95	50	12 * 5	120	70	20 * 7	15	235
225	95	55	15 * 5	140	80	20 * 7	21	375



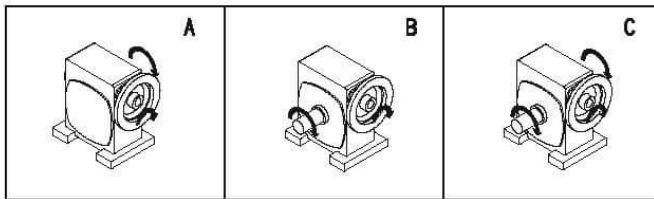
Model : BSM

成大齒輪減速機

Size : 50~135



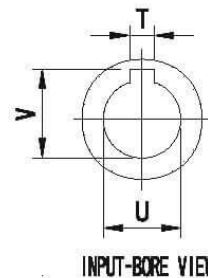
Shaft Direction



Unit:mm

Size	Ratio	A	AB	AC	AD	B	BB	BC	BD	CA	CB	CC	CE	Z	Input Bore		
															U	T	V
50	1/10	173	96	110	140	175	95	95	120	210	80	90	18	11	11	4	12.8
															14	5	16
60	1/15	177	97	120	150	190	110	105	130	230	90	80	20	11	11	4	12.8
															14	5	16
70	1/20	213	118	150	190	210	130	115	150	255	105	70	22	15	14	5	18
		223	120			230				275					19	8	21.8
80	1/30	234	130	180	220	240	140	135	170	300	120	80	20	15	19	6	21.8
															24	8	27.3
100	1/40	273	140	220	270	270	170	155	190	350	150	100	25	15	24	8	27.3
		276	142			295				375					26	8	31.3
120	1/50	334	180	260	320	315	190	180	230	425	180	120	30	18	28	8	31.3
															28	8	31.3
135	1/60	370	195	290	350	335	210	200	250	475	215	135	30	18	28	8	31.3
		390	218			360				500					38	10	41.3

Size	Output Shaft			Flange				HP	Oil (l)	Weight (kg)	
	LS	S	W * X	LA	LB	LC	LE				Z1
50	40	17	5 * 3	130	110	160	4	M8	1/4	0.22	7.2
60	50	22	7 * 4	130	110	180	4	M8	1/4	0.32	10
									1/2		
70	60	28	7 * 4	130	110	180	4	M8	1/2	0.55	15
									M10		
80	65	32	10 * 5	165	130	200	4	M10	1	0.77	20.2
									2		
100	75	38	10 * 5	195	130	200	5	M10	2	1.53	39.5
									M12		
120	85	45	12 * 5	215	180	250	5	M12	3	2.4	65
									5		
135	95	55	15 * 5	215	180	250	5	M12	5	3.25	85.2
									7.5		



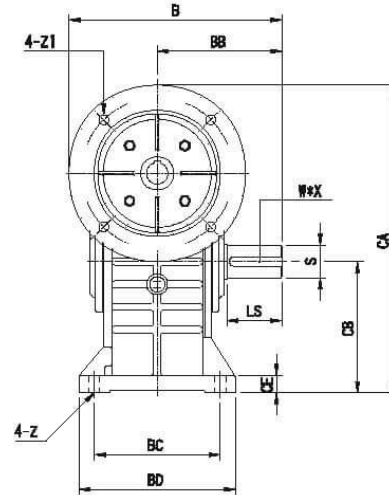
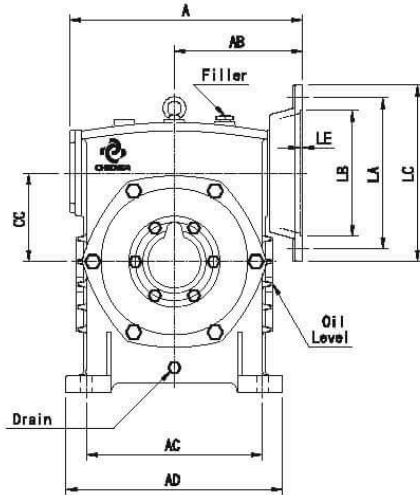
INPUT-BORE VIEW



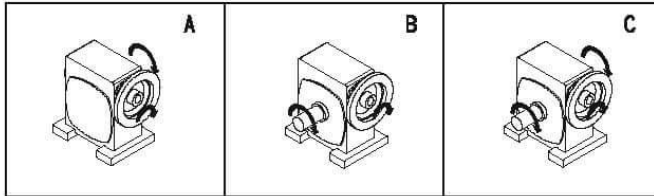
Model : BSM

成大齒輪減速機

Size : 155~175



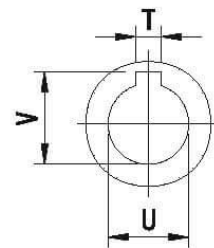
Shaft Direction



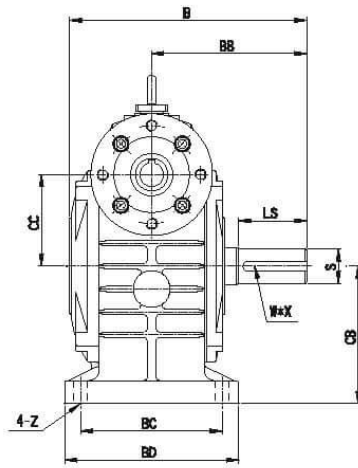
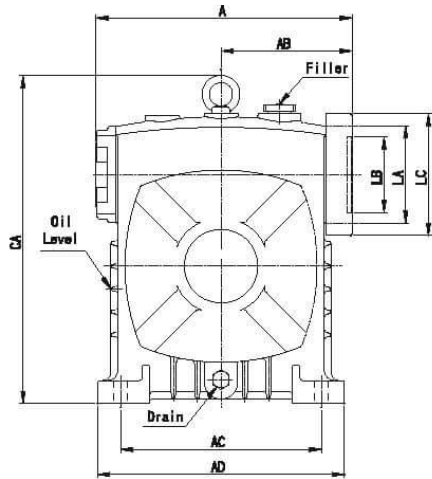
Unit:mm

Size	Ratio	A	AB	AC	AD	B	BB	BC	BD	CA	CB	CC	CE	Z	Input Bore		
															U	T	V
155	1/10	430	236	320	380	392	242	220	280	540	235	155	32	20	38	10	41.3
	1/15														10	41.3	
175	1/20	465	212	350	410	398	248	250	310	585	260	175	35	20	38	10	41.3
	1/30														12	45.3	

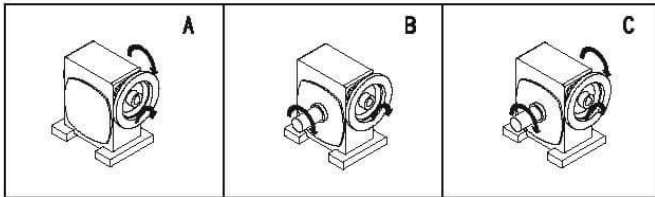
Size	Output Shaft			Flange					HP	Oil (l)	Weight (kg)
	LS	S	W * X	LA	LB	LC	LE	Z1			
155	100	60	15 * 5	285	230	300	4.5	15	7.5 10	11.5	115
175	110	65	18 * 6	285 300	230 250	300 350	5 8	12 19	10 15	7.4	180



INPUT-BORE VIEW



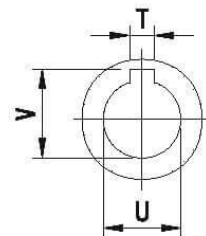
Shaft Direction



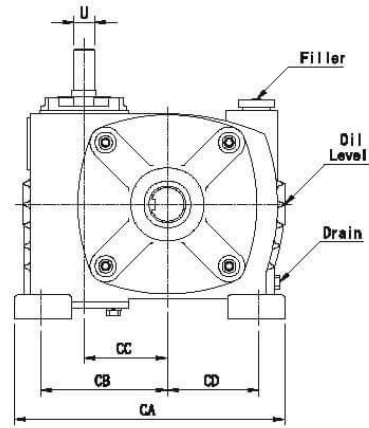
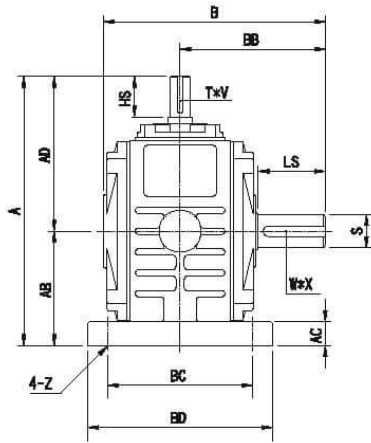
Unit:mm

Size	Ratio	A	AB	AC	AD	B	BB	BC	BD	CA	CB	CC	CE	Z	Input Bore		
															U	T	V
100	1/10 1/40	280	144	220	270	262	170	155	190	359	150	100	25	15	25,4	6,35	28,5
120	1/15	311	155	260	320	288	190	180	230	425	180	120	30	18	25,4	6,35	28,5
	1/20 1/60																
135	1/30 1/60	350	178	290	350	320	210	200	250	478	215	135	30	18	25,4 31,75	6,35 7,94	28,5 35,5

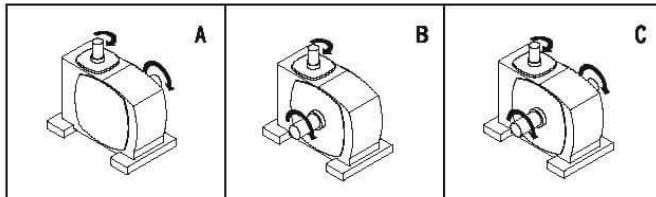
Size	Output Shaft			Flange				
	LS	S	W * X	LA	LB	LC	LE	Z1
100	75	38	10 * 5	107	82,55	133	5	M12
120	85	45	12 * 5	107	82,55	145	7	M12
135	95	55	15 * 5	107	82,55	153	10	M12



INPUT-BORE VIEW



Shaft Direction



Unit:mm

Size	Ratio	A	AB	AC	AD	B	BB	BC	BD	CA	CB	CC	CD	Z
50	1/10	177	70	15	107	147	95	100	125	181	77	50	53	11
60	1/15	214	90	20	124	188	110	105	136	205	98	60	67	11
70	1/20	250	110	20	140	196	130	120	155	196	100	70	55	15
80	1/30	265	105	20	160	216	140	125	160	264	125	80	90	15
100	1/40	327	135	25	192	260	170	170	205	320	157	100	115	15
120	1/50	385	155	30	230	288	190	180	230	352	170	120	120	18
135	1/60	430	170	30	260	320	210	200	250	390	200	135	130	18

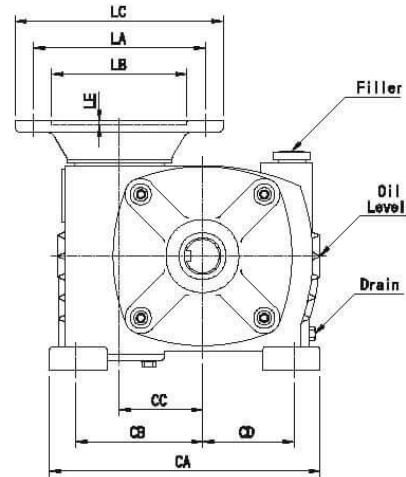
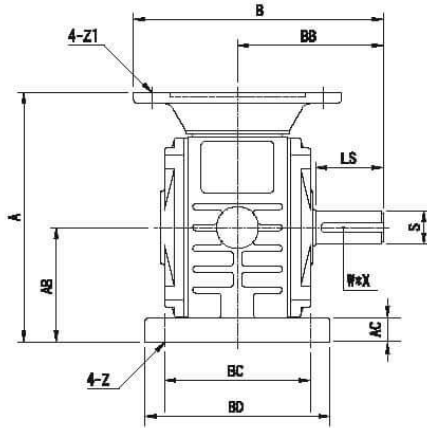
Size	Input Shaft			Output Shaft			Oil (l)	Weight (kg)
	HS	U	T * V	LS	S	W * X		
50	30	12	4 * 2.5	40	17	5 * 3	0.3	7
60	40	15	5 * 3	50	22	7 * 4	0.5	11
70	40	18	5 * 3	60	28	7 * 4	1	14
80	50	22	7 * 4	65	32	10 * 5	1.2	19
100	50	25	7 * 4	75	38	10 * 5	2.8	36
120	65	30	7 * 4	85	45	12 * 5	4	55
135	75	35	10 * 5	95	55	15 * 5	5.5	65



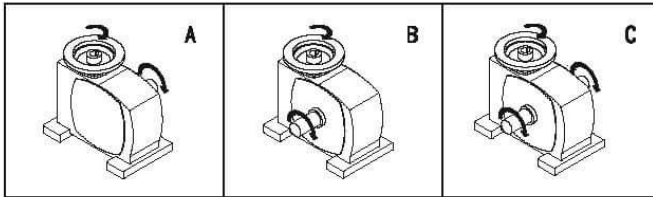
Model : CSM

成大齒輪減速機

Size : 50~135



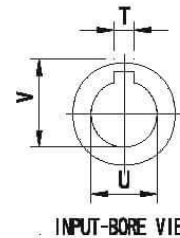
Shaft Direction



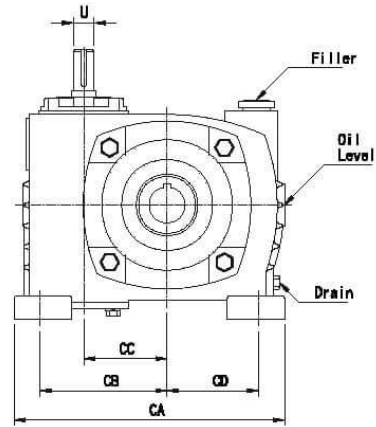
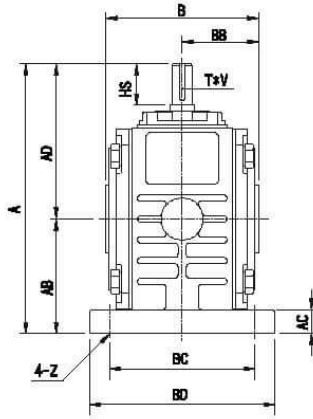
Unit:mm

Size	Ratio	A	AB	AC	B	BB	BC	BD	CA	CB	CC	CD	Z	Input Bore		
														U	T	V
50	1/10	182	70	15	175	95	100	125	161	77	50	53	11	11 14	4 5	12.8 16.3
60	1/15	187	90	20	190	110	105	136	205	88	60	67	10	11 14	4 5	12.8 16.3
70	1/20	228	110	20	210	130	120	155	196	100	70	55	15	14	5	16.3
		230			19									21.8		
80	1/30	235	105	20	240	140	125	160	264	125	80	90	15	19 24	6 8	21.8 27.3
100	1/40	277	135	25	270	170	170	205	320	157	100	115	15	24	8	27.3
		279			28									31.3		
120	1/50	335	155	30	315	190	180	230	352	170	120	120	18	28	8	31.3
135	1/60	365	170	30	335	210	200	250	390	200	135	130	18	28	8	31.3
		388			38									41.5		

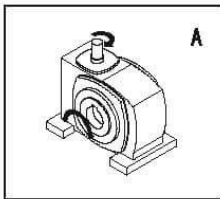
Size	Output Shaft			Flange					HP	Oil (l)	Weight (kg)
	LS	S	W * X	LA	LB	LC	LE	Z1			
50	40	17	5 * 3	130	110	160	4	M8	1/4 1/2	0.3	9
60	50	22	7 * 4	130	110	160	4	M8	1/4 1/2	0.5	13
70	60	28	7 * 4	130	110	160	4	M8	1/2	1	16
				165	130	200	5	M10			
80	65	32	10 * 5	185	130	200	5	M10	1 2	1.2	23
100	75	38	10 * 5	185	130	200	5	M10	2 3	2.8	40
				215	180	250	5	M12			
120	85	45	12 * 5	215	180	250	5	M12	3 5	4	58
				215	180	250	5	M12			
135	95	55	15 * 5	215	180	250	5	M12	5 7.5	5.5	70
				265	230	300	5	M12			



INPUT-BORE VIEW



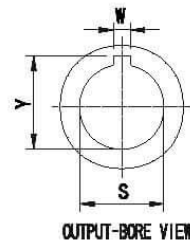
Shaft Direction



Unit:mm

Size	Ratio	A	AB	AC	AD	B	BB	BC	BD	CA	CB	CC	CD	Z
50	1/10	177	70	15	107	110	55	100	125	161	77	50	53	11
60	1/15	214	90	20	124	117	58,5	105	136	205	98	60	67	11
70	1/20	250	110	20	140	130	65	120	155	196	100	70	55	15
80	1/30	285	105	20	160	144	72	125	160	264	125	80	90	15
100	1/40	327	135	25	192	175	87,5	170	205	320	157	100	115	15
120	1/50	385	155	30	230	200	100	180	230	352	170	120	120	18
135	1/60	430	170	30	260	230	115	200	250	390	200	135	130	18

Size	Input Shaft			Output Bore			Oil (l)	Weight (kg)
	HS	U	T * V	S	W	Y		
50	30	12	4 * 2,5	20	5	22,3	0,3	7
60	40	15	5 * 3	25	7	28	0,5	11
70	40	18	5 * 3	30	8	33,3	1	14
80	50	22	7 * 4	35	10	38,5	1,2	19
100	50	25	7 * 4	40	12	43,5	2,8	36
120	65	30	7 * 4	45	12	48,5	4	53
135	75	35	10 * 5	60	15	65	5,5	65

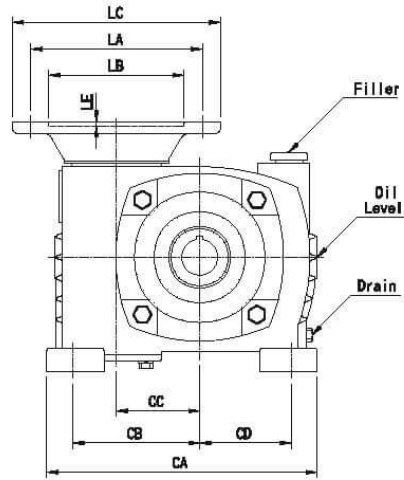
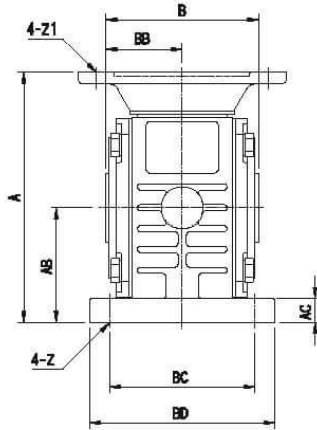




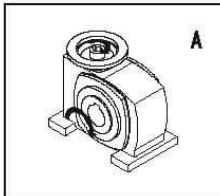
Model : CHM

成大齒輪減速機

Size : 50~135



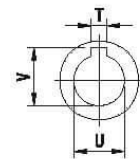
Shaft Direction



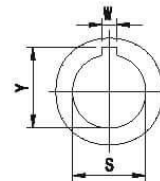
Unit:mm

Size	Ratio	A	AB	AC	B	BB	BC	BD	CA	CB	CC	CD	Z	Input Bore		
														U	T	V
50	1/10	182	70	15	110	55	100	125	161	77	50	53	11	11 14	4 5	12.8 16.3
60	1/15	187	90	20	117	58.5	105	136	205	98	60	67	10	11 14	4 5	12.8 16.3
70	1/20	228 230	110	20	130	65	120	155	196	100	70	55	15	14 19	5 6	16.3 21.8
80	1/30	235	105	20	144	72	125	160	264	125	80	90	15	19 24	6 8	21.8 27.3
100	1/40	277 279	135	25	175	87.5	170	205	320	157	100	115	15	24 28	8 8	27.3 31.3
120	1/50	310	155	30	200	100	180	230	352	170	120	120	18	28	8	31.3
135	1/60	365 388	170	30	230	115	200	250	390	200	135	130	18	28 38	8 10	31.3 41.5

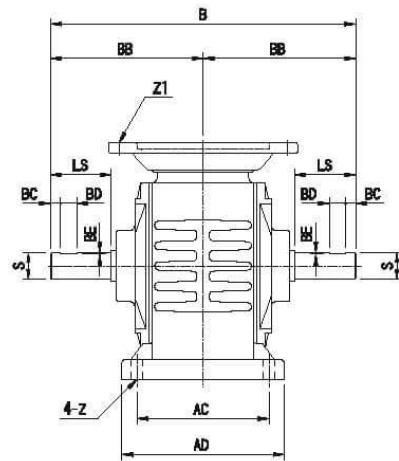
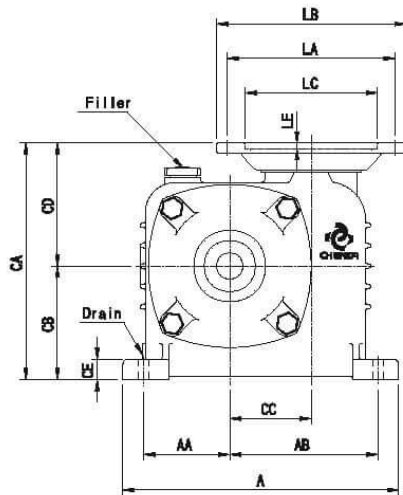
Size	Output Bore			Flange					HP	Oil (l)	Weight (kg)
	S	W	Y	LA	LB	LC	LE	Z1			
50	20	5	22.3	130	110	160	4	M8	1/4 1/2	0.3	9
60	25	7	28	130	110	160	4	M8	1/4 1/2	0.5	13
70	30	8	33.3	130 165	110 130	160 200	4 5	M8 M10	1/2 1	1	16
80	35	10	38.5	165	130	200	5	M10	1 2	1.2	23
100	40	12	43.5	165 215	130 180	200 250	5	M10 M12	2 3	2.8	40
120	45	12	48.5	215	180	250	5	M12	3 5	4	58
135	60	15	65	215 265	180 230	250 300	5	M12 15	5 7.5	5.5	70



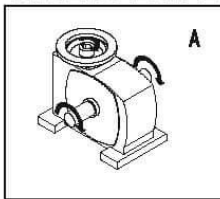
INPUT-BORE VIEW



OUTPUT-BORE VIEW



Shaft Direction



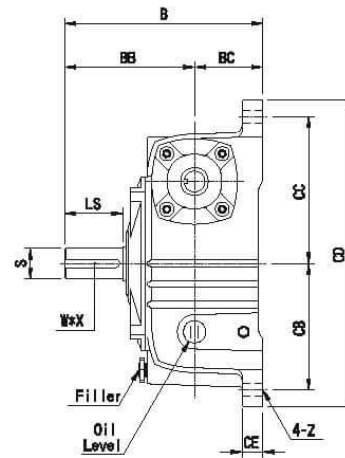
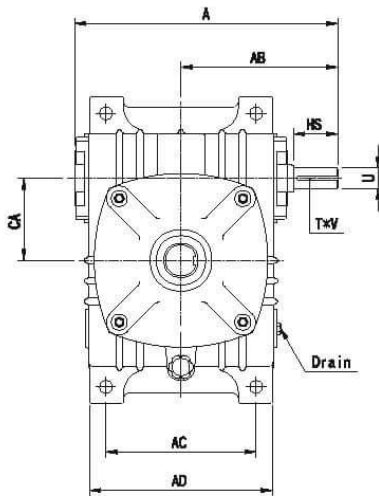
Unit:mm

Size	Ratio	A	AA	AB	AC	AD	B	BB	CA	CB	CC	CD	CE	Z	Input Bore		
															D1	D2	T
W80	1/15	265	85	145	130	155	300	155	232	112	80	120	17	1/2"	25	19	4.2

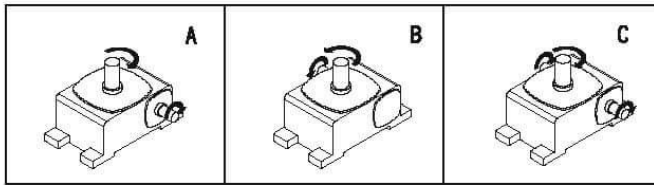
Size	Output Shaft					Flange					HP	Oil (l)	Weight (kg)
	LS	S	BC	BD	BE	LA	LB	LC	LE	Z1			
W80	60	25.4	10	16	0.9	165	186	130	6	3/8" UNC	1/2	1.2	25

註：螺絲及出力軸皆採用 SUS304
 *SUS304 for output shaft and screws





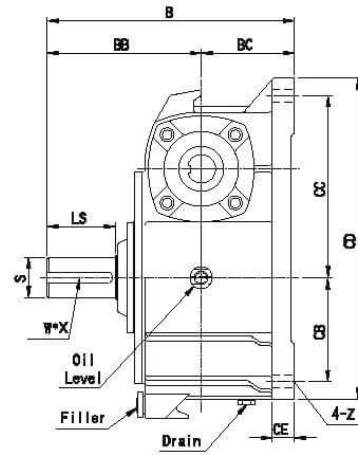
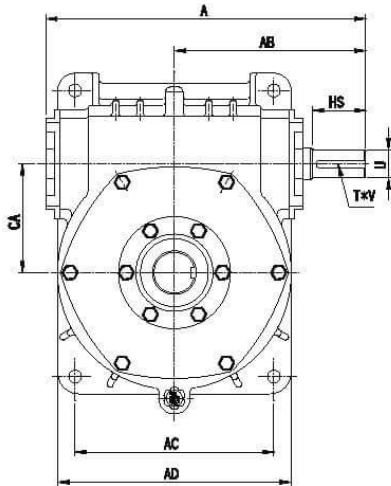
Shaft Direction



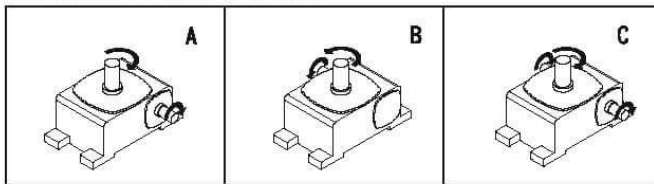
Unit:mm

Size	Ratio	A	AB	AC	AD	B	BB	BC	CA	CB	CC	CD	CE	Z
40	1/10	140	83	70	95	120	78	42	40	65	85	180	14	9
50	1/15	179	107	90	118	145	95	50	50	93	102	220	18	11
60	1/20	201	124	100	126	165	110	55	60	105	120	260	20	11
70	1/30	235	140	120	156	195	130	65	70	120	135	295	20	15
80	1/40	285	180	140	176	213	140	73	80	130	150	320	20	15
100	1/50	328	190	190	226	260	170	90	100	155	180	375	30	15
120	1/60	389	230	220	268	290	190	100	120	185	215	450	30	18
135	1/60	430	260	260	295	320	210	110	135	210	235	495	30	18

Size	Input Shaft			Output Shaft			Oil (l)	Weight (kg)
	HS	U	T * V	LS	S	W * X		
40	25	12	4 * 2.5	35	16	5 * 3	0.2	4.1
50	30	12	4 * 2.5	40	17	5 * 3	0.4	6.5
60	40	15	5 * 3	50	22	7 * 4	0.6	9
70	40	18	5 * 3	60	28	7 * 4	1.1	13
80	50	22	7 * 4	65	32	10 * 5	1.5	18
100	50	25	7 * 4	75	38	10 * 5	3.0	42
120	65	30	7 * 4	85	45	12 * 5	5.0	68
135	75	35	10 * 5	95	55	15 * 5	7.5	90



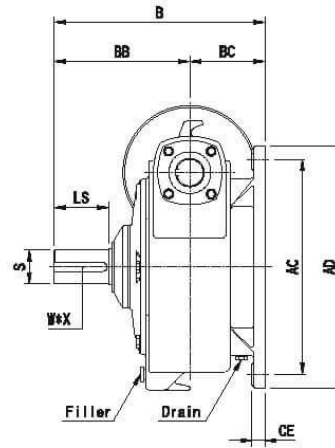
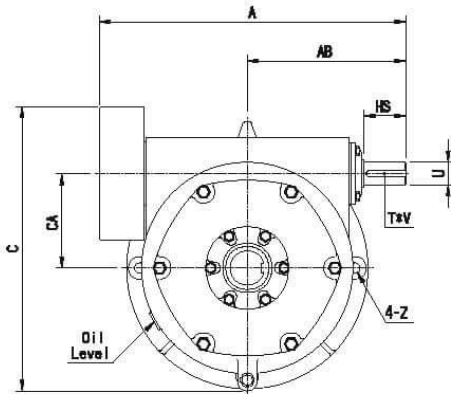
Shaft Direction



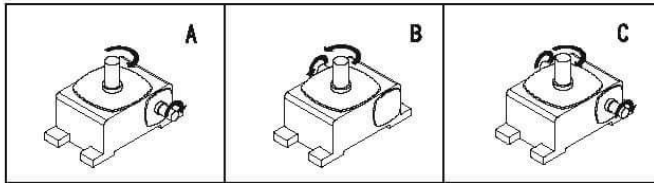
Unit:mm

Size	Ratio	A	AB	AC	AD	B	BB	BC	CA	CB	CC	CD	CE	Z
155	1/10	479	288	290	338	382	242	140	155	145	265	456	30	20
	1/15													
	1/40													
175	1/20	515	308	320	376	398	248	150	175	167	293	516	35	20
	1/30													
	1/80													

Size	Input Shaft			Output Shaft			Oil (l)	Weight (kg)
	HS	U	T * V	LS	S	W * X		
155	85	40	10 * 5	100	60	15 * 5	9,2	115
175	85	45	12 * 5	110	65	18 * 6	10,5	155



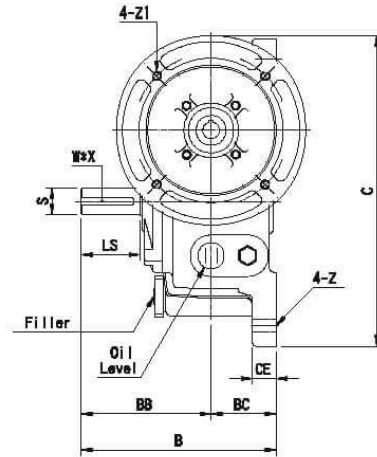
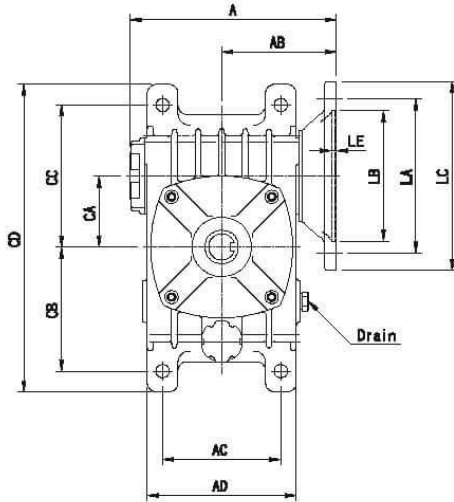
Shaft Direction



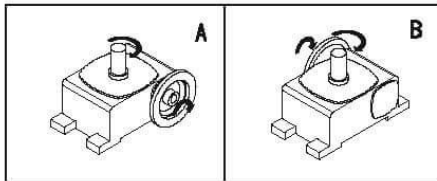
Unit:mm

Size	Ratio	A	AB	AC	AD	B	BB	BC	C	CA	CE	Z
200	1/10 1/40	698	357	450	510	495	305	190	643	200	30	22
225	1/15	709	361	510	580	545	345	200	700	225	35	27
250	1/20 1/50	813	420	570	640	580	360	200	754	250	35	27
300	1/30 1/60	943	495	660	750	645	410	235	853	300	42	36

Size	Input Shaft			Output Shaft			Oil (l)	Weight (kg)
	HS	U	T * V	LS	S	W * X		
200	95	50	12 * 5	125	70	20 * 7	12	220
225	95	55	15 * 5	140	80	20 * 7	17	315
250	110	80	15 * 5	145	90	24 * 8	23	365
300	125	70	18 * 6	170	95	24 * 8	45	520



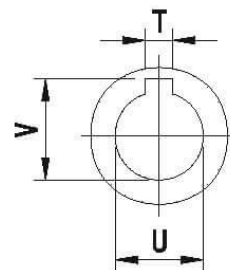
Shaft Direction



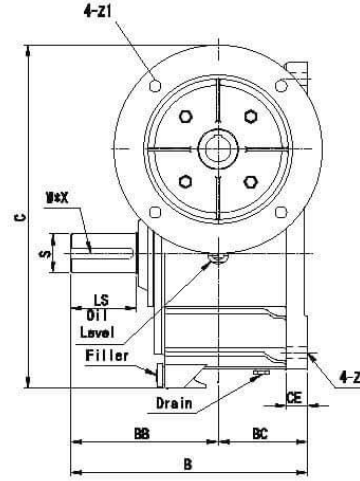
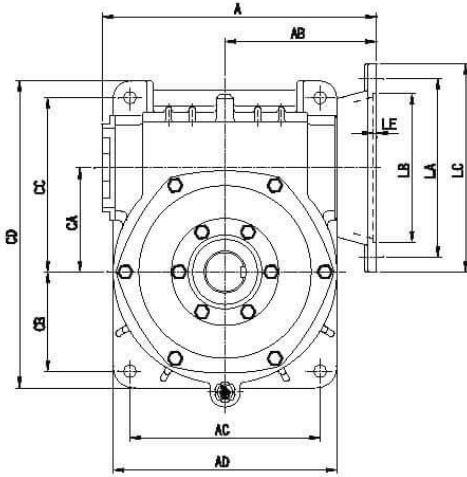
Unit:mm

Size	Ratio	A	AB	AC	AD	B	BB	BC	C	CA	CB	CC	CD	CE	Z	Input Bore		
																U	T	V
50	1/10	170	97	90	116	145	95	50	238	50	93	102	220	18	11	11	4	12.8
60	1/15	177	97	100	126	165	110	55	263	60	105	120	260	20	11	11	4	12.8
70	1/20	213 223	118 120	120	156	195	130	65	290 310	70	120	135	295	20	15	14	5	15 21.8
80	1/30	235	130	140	176	213	140	73	330	80	130	150	320	20	15	19	6	21.8 27.3
100	1/40	273 278	140 142	190	226	280	170	90	375 400	100	155	180	375	30	15	24	8	27.3 31.3
120	1/50	339	180	220	266	290	190	100	455	120	185	215	450	30	18	28	8	31.3
135	1/60	370 378	195 218	260	306	320	210	110	495 520	135	210	235	495	30	18	28	8	31.3 41.3

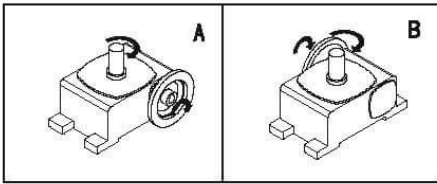
Size	Output Shaft			Flange					HP	Oil (l)	Weight (kg)
	LS	S	W * X	LA	LB	LC	LE	Z1			
50	40	17	5 * 3	130	110	160	5	M8	1/4 1/2	0.4	8.5
60	50	22	7 * 4	130	110	160	4	M8	1/4 1/2	0.6	9
70	60	28	7 * 4	130 165	110 130	160 200	4	M8 M10	1/2	1.1	13
80	65	32	10 * 5	165	130	200	4	M10	1/2	1.5	18
100	75	38	10 * 5	165 215	130 180	200 250	5	M10 M12	2/3	3	42
120	85	45	12 * 5	215	180	250	5	M12	3/5	5	86
135	95	55	15 * 5	215 265	180 230	250 300	5	M12 15	5/7.5	7.5	90



INPUT-BORE VIEW



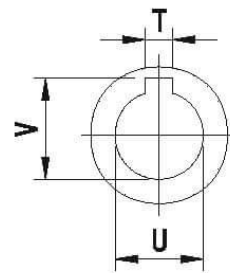
Shaft Direction



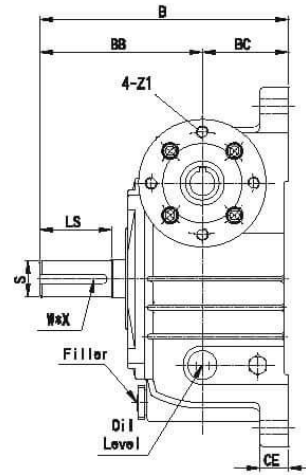
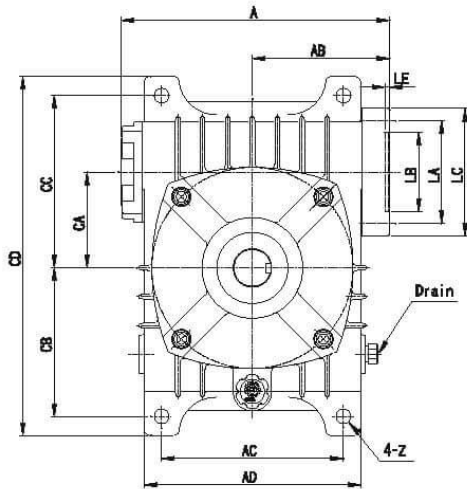
Unit:mm

Size	Ratio	A	AB	AC	AD	B	BB	BC	C	CA	CB	CC	CD	CE	Z	Input Bore		
																U	T	V
155	1/10	430	236	290	336	382	242	140	521	155	145	265	456	30	20	36	10	41,3
	1/15															38	10	41,3
	1/20															38	10	41,3
175	1/30	465	255	320	376	398	248	150	562	175	167	293	516	35	20	38	10	41,3
	1/60								42							12	45,3	

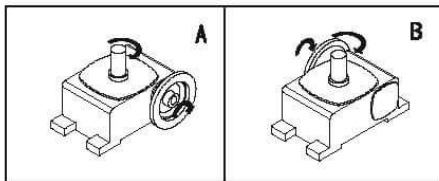
Size	Output Shaft			Flange					HP	Oil (l)	Weight (kg)
	LS	S	W * X	LA	LB	LC	LE	Z1			
155	100	80	15 * 5	265	230	300	4,5	15	7,5 10	8,2	115
175	110	85	18 * 6	265 300	230 250	300 350	5 6	M12 19	10 15	10,5	155



INPUT-BORE VIEW



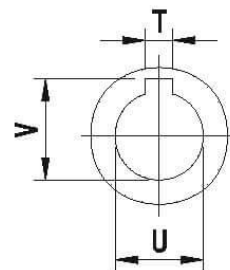
Shaft Direction



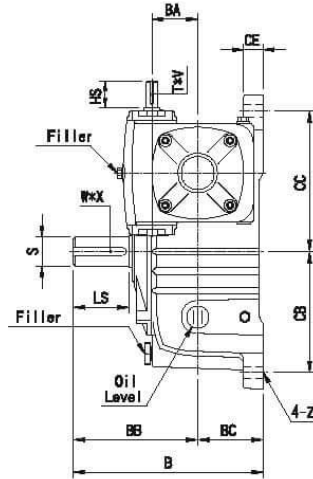
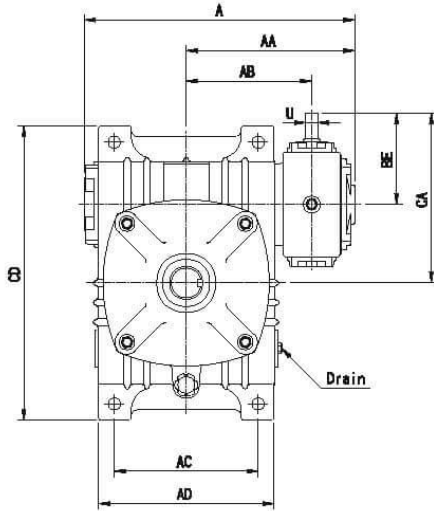
Unit:mm

Size	Ratio	A	AB	AC	AD	B	BB	BC	BD	CA	CB	CC	CE	Z	Input Bore		
															U	T	V
100	1/10 1/40	280	144	190	226	280	170	90	100	155	180	375	30	15	25,4	6,35	28,5
120	1/15	311	155	220	268	290	190	100	120	185	215	450	30	18	25,4	6,35	28,5
	1/20 1/50																
135	1/30 1/60	350	178	260	295	320	210	110	135	210	235	495	30	18	25,4	6,35	28,5
															31,75	7,94	35,5

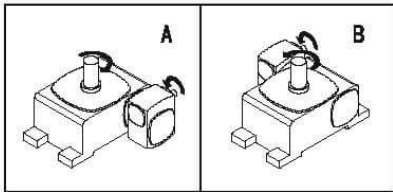
Size	Output Shaft			Flange				
	LS	S	W * X	LA	LB	LC	LE	Z1
100	75	38	10 * 5	107	82,55	133	5	M12
120	85	45	12 * 5	107	82,55	145	7	M12
135	95	55	15 * 5	107	82,55	153	10	M12



INPUT-BORE VIEW



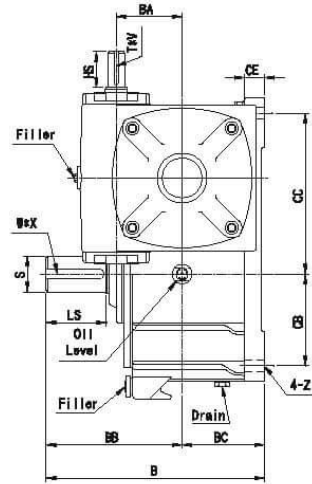
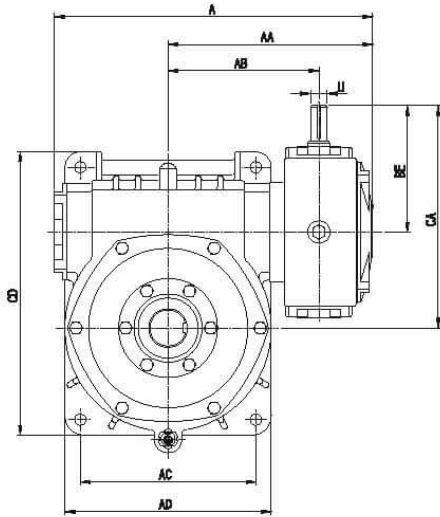
Shaft Direction



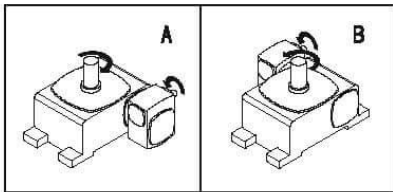
Unit:mm

Size	Ratio	A	AA	AB	AC	AD	B	BA	BB	BC	BE	CA	CB	CC	CD	CE	Z
50-80	1/100 1/3600	289	184	132	140	176	213	50	140	73	107	187	130	150	320	20	15
60-100		352	219	161	190	226	260	60	170	90	124	224	155	180	375	30	15
70-120		417	258	192	220	266	290	70	190	100	140	260	185	215	450	30	18
80-135		482	287	211	280	295	320	80	210	110	180	295	210	235	495	30	18

Size	Input Shaft			Output Shaft			Oil (l)	Weight (kg)
	HS	U	T * V	LS	S	W * X		
50-80	30	12	4 * 2.5	65	32	10 * 5	1.8	24
60-100	40	15	5 * 3	75	38	10 * 5	3.8	52
70-120	40	18	5 * 3	85	45	12 * 5	6	75
80-135	50	22	7 * 4	95	55	15 * 5	8.5	105



Shaft Direction



Unit:mm

Size	Ratio	A	AA	AB	AC	AD	B	BA	BB	BC	BE	CA	CB	CC	CD	CE	Z
100-155	1/100 2	540	340	257	290	336	382	100	242	140	192	347	145	265	456	30	20
120-175	1/3600	585	376	275	320	376	398	120	248	150	230	405	167	293	516	35	20

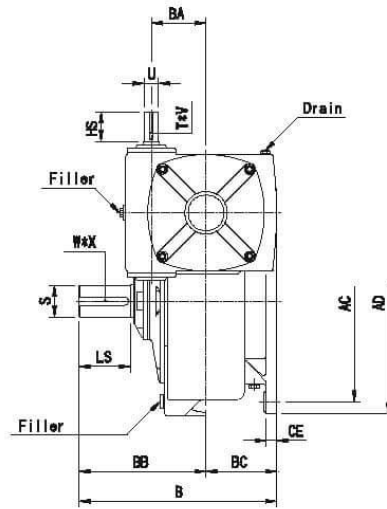
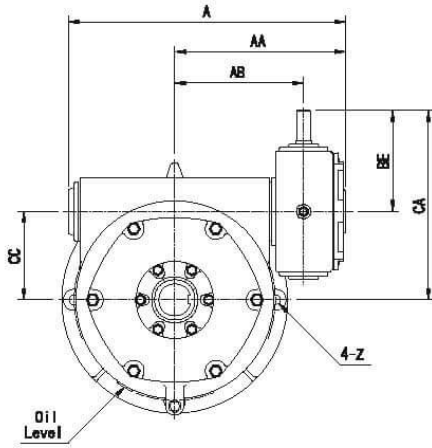
Size	Input Shaft			Output Shaft			Oil (l)	Weight (kg)
	HS	U	T * V	LS	S	W * X		
100-155	50	25	7 * 4	100	60	15 * 5	12	135
120-175	65	30	7 * 4	110	65	18 * 6	15	192



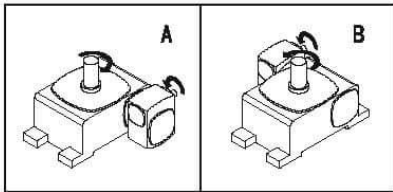
Model : ESF

成大齒輪減速機

Size : 120/200~175/300



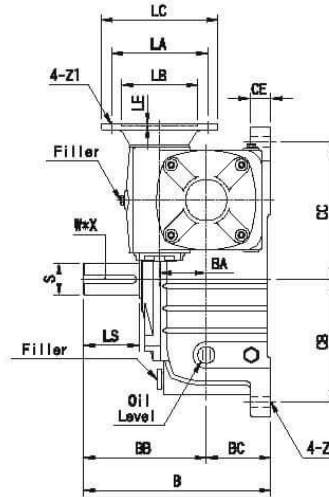
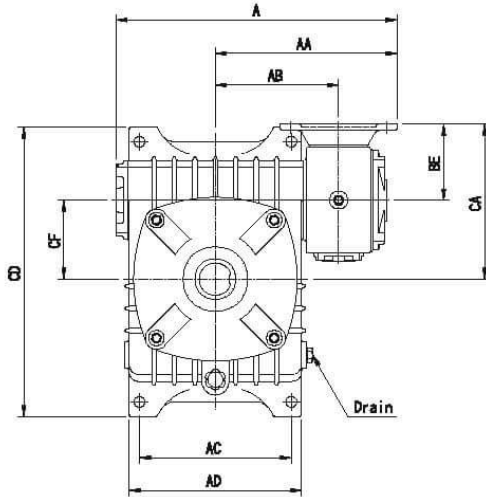
Shaft Direction



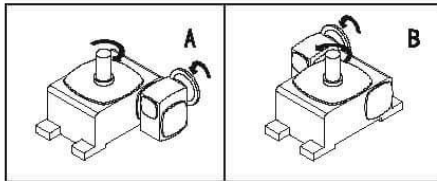
Unit:mm

Size	Ratio	A	AA	AB	AC	AD	B	BA	BB	BC	BE	CA	CC	CE	Z
120-200	1/100 1/3600	653	414	312.5	450	510	495	120	305	190	230	430	200	30	22
135-225		672	425	315	510	580	545	135	345	200	260	485	225	35	27
155-250		786	483	365	570	640	560	155	360	200	288	536	250	35	27
175-300		962	601	473	660	750	645	175	410	235	308	608	300	42	36

Size	Input Shaft			Output Shaft			Oil (l)	Weight (kg)
	HS	U	T * V	LS	S	W * X		
120-200	85	30	7 * 4	125	70	20 * 7	19	270
135-225	75	35	10 * 5	140	80	20 * 7	24	375
155-250	85	40	10 * 5	145	90	24 * 8	32	430
175-300	85	45	12 * 5	170	95	24 * 8	55	584



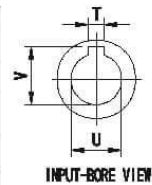
Shaft Direction



Unit:mm

Size	Ratio	A	AA	AB	AC	AD	B	BA	BB	BC	BE	CA	CB	CC	CD	CE	CF	Z
50-80	1/100	317	212	132	140	178	213	50	140	73	98	178	130	150	320	20	80	15
60-100		378	241	161	190	226	280	80	170	90	97	197	155	180	375	30	100	15
70-120	1/3600	428	272	192	220	266	290	70	190	100	118	238	185	215	450	30	120	18
80-135		448	292	211	260	295	320	80	210	110	130	265	210	235	495	30	135	18

Size	Input Bore			Output Shaft			Flange					HP	Oil (l)	Weight (kg)
	U	T	V	LS	S	W * X	LA	LB	LC	LE	Z1			
50-80	11 14	4 5	12.8 18	85	32	10 * 5	130	110	160	4	M8	1/4 1/2	1.8	24
60-100	11 14	4 5	12.8 18	75	38	10 * 5	130	110	160	4	M8	1/4 1/2	3.8	52
70-120	14 19	5 6	16 21.8	85	45	12 * 5	130 165	110 130	160 200	4 5	M8 M10	1/2 1	6	75
80-135	19 24	6 8	21.8 27.3	95	55	15 * 5	165	130	200	5	M10	1 2	8.5	105



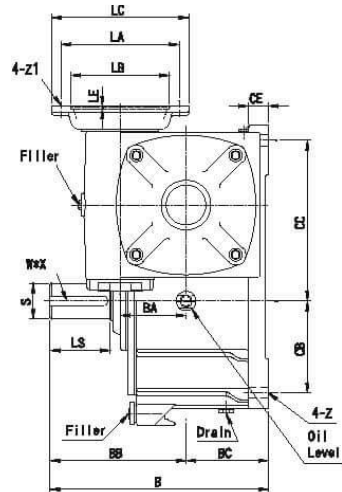
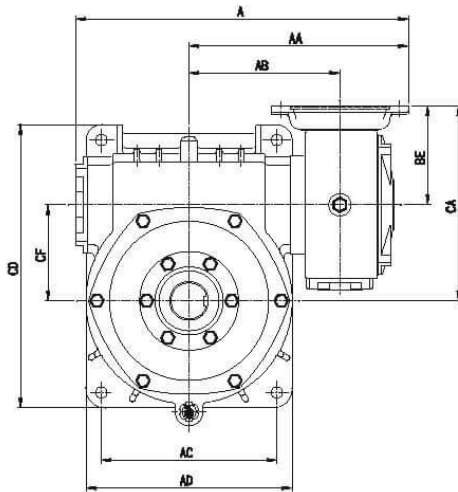
INPUT-BORE VIEW



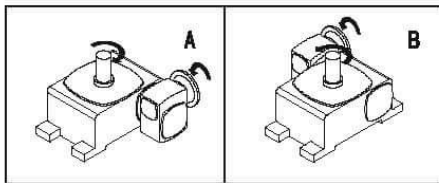
Model : ESX

成大齒輪減速機

Size : 100/155~120/175



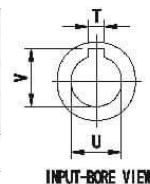
Shaft Direction



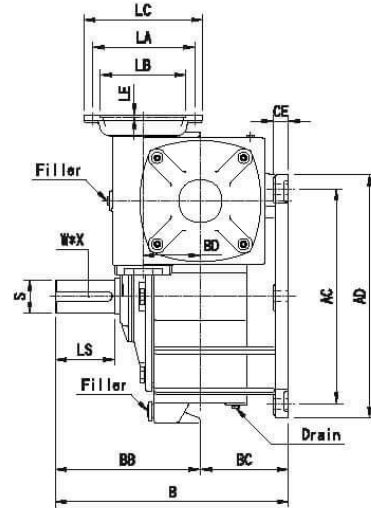
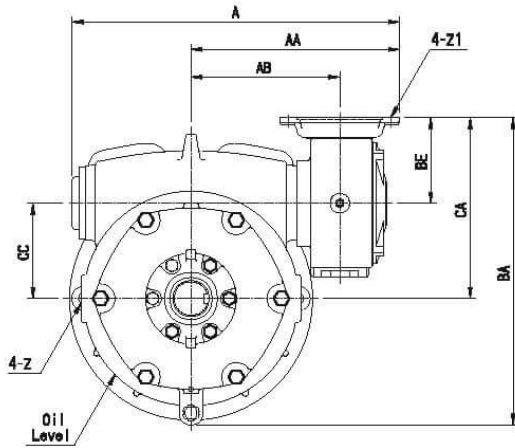
Unit:mm

Size	Ratio	A	AA	AB	AC	AD	B	BA	BB	BC	BE	CA	CB	CC	CD	CE	CF	Z
100-155	1/100 2	550	357	257	290	336	382	100	190	140	140	277	145	265	458	30	155	20
		574	382															
120-175	1/3600	607	400	275	320	376	398	120	248	150	180	355	167	293	518	35	175	20

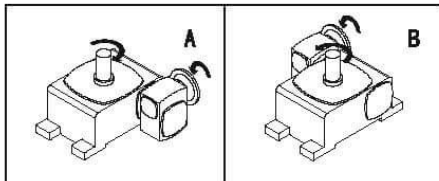
Size	Input Bore			Output Shaft			Flange					HP	Oil (l)	Weight (kg)
	U	T	V	LS	S	W * X	LA	LB	LC	LE	Z1			
100-155	24	8	27.3	100	60	15 * 5	165	130	200	5	M10	2	12	135
	28	8	31.3				215	180	250					
120-175	28	8	31.3	110	65	18 * 6	215	180	250	5	M12	3	15	192



INPUT-BORE VIEW



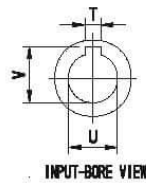
Shaft Direction



Unit:mm

Size	Ratio	A	AA	AB	AC	AD	B	BA	BB	BC	BD	BE	CA	CC	CE	Z
120-200	1/100	687	437	312	450	510	495	845	305	190	120	180	380	200	30	22
135-225		692	440	315	510	580	545	719	345	200	135	195	420	225	35	27
155-250	1/3600	817	515	365	570	640	560	812	360	200	155	238	486	250	35	27
175-300		983	623	473	660	750	645	890	410	235	175	215	515	300	42	36
		1008	648					930				255	555			

Size	Input Bore			Output Shaft			Flange					HP	Oil (l)	Weight (kg)
	U	T	V	LS	S	W * X	LA	LB	LC	LE	Z1			
120-200	28	8	31.3	125	70	20 * 7	215	180	250	5	M12	3 5	19	270
135-225	28 38	8 10	31.3 41.3	140	80	20 * 7	215 265	180 230	250 300	5	M12 15	5 7.5	24	375
155-250	38	10	41.3	145	90	24 * 8	265	230	300	5	15	7.5 10	32	430
175-300	38 42	10 12	41.3 45.3	170	95	24 * 8	265 300	230 250	300 350	5 8	M12 19	10 15	55	584

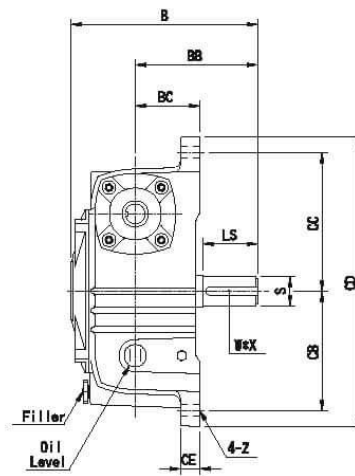
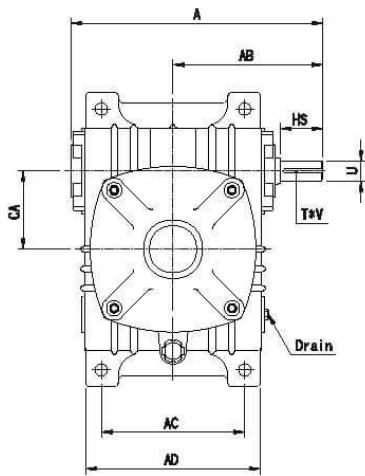




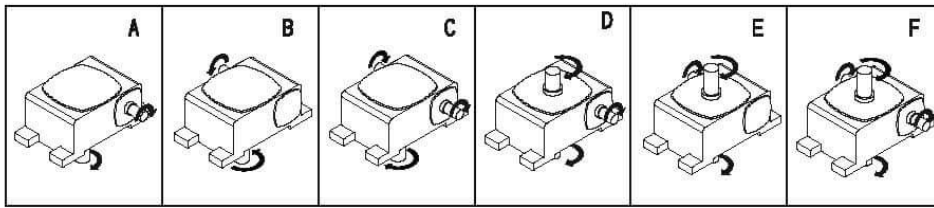
Model : VSS

成大齒輪減速機

Size : 40~135



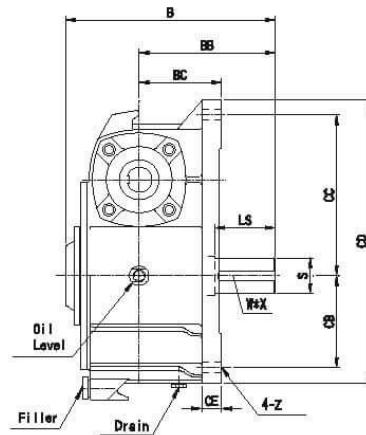
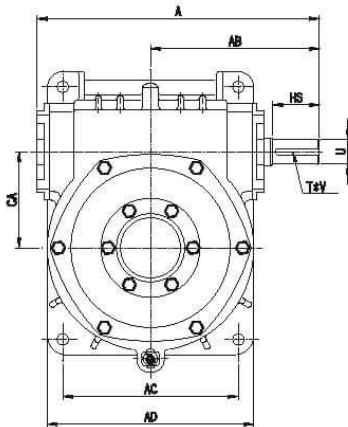
Shaft Direction



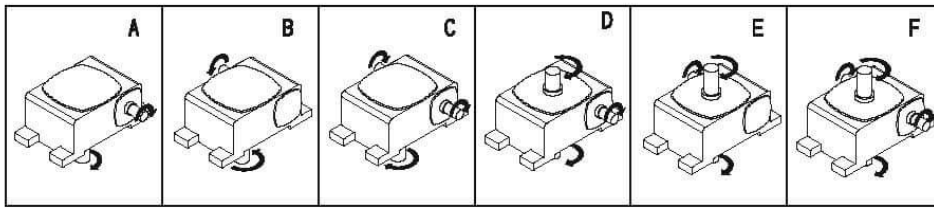
Unit:mm

Size	Ratio	A	AB	AC	AD	B	BB	BC	CA	CB	CC	CD	CE	Z
40	1/10	140	83	70	95	118	78	42	40	65	85	180	14	9
50	1/15	179	107	90	118	145	95	50	50	93	102	220	18	11
60	1/20	201	124	100	126	168	110	55	60	105	120	260	20	11
70	1/30	235	140	120	156	193	130	65	70	120	135	295	20	15
80	1/40	265	160	140	176	212	140	73	80	130	150	320	20	15
100	1/50	328	192	190	226	250	170	90	100	155	180	375	30	15
120	1/60	389	230	220	266	284	190	100	120	185	215	450	30	18
135	1/60	435	260	260	295	322	210	110	135	210	235	495	30	18

Size	Input Shaft			Output Shaft			Oil (l)	Weight (kg)
	HS	U	T * V	LS	S	W * X		
40	24.5	12	4 * 2.5	35	16	5 * 3	0.2	4.1
50	30	12	4 * 2.5	40	17	5 * 3	0.4	6.5
60	40	15	5 * 3	50	22	7 * 4	0.6	9
70	40	18	5 * 3	60	28	7 * 4	1.1	13
80	50	22	7 * 4	65	32	10 * 5	1.5	18
100	50	25	7 * 4	75	38	10 * 5	3	42
120	65	30	7 * 4	85	45	12 * 5	5	66
135	75	35	10 * 5	95	55	15 * 5	7.5	90



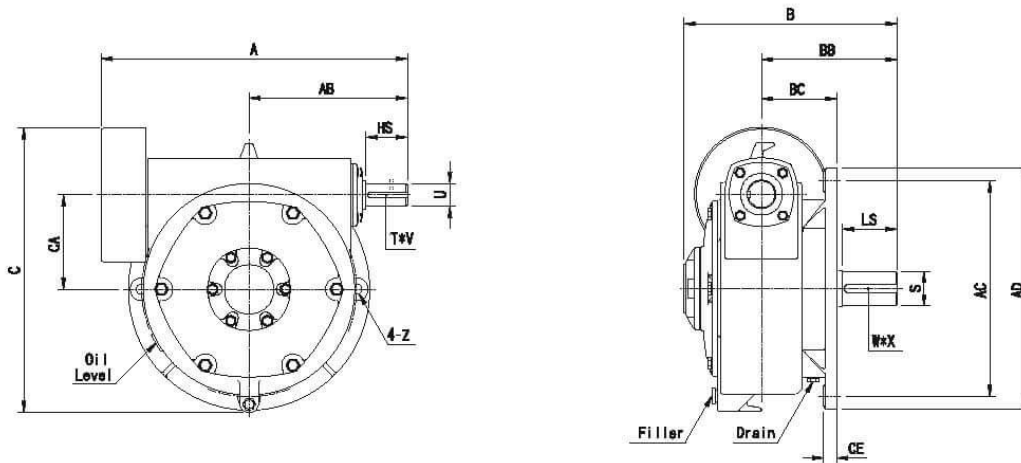
Shaft Direction



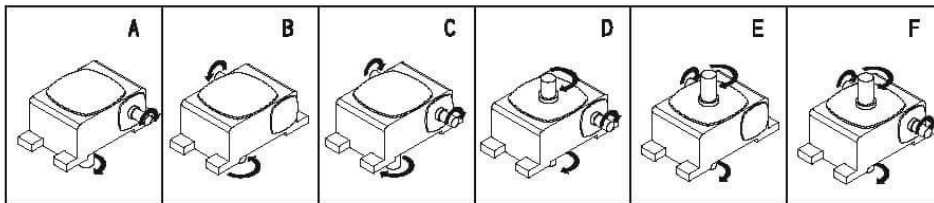
Unit:mm

Size	Ratio	A	AB	AC	AD	B	BB	BC	CA	CB	CC	CD	CE	Z
155	1/10	479	286	290	336	377	242	140	155	145	265	456	30	20
	1/15													
	1/40													
175	1/15	515	308	320	378	382	248	150	175	167	293	516	35	20
	1/20													
	1/60													

Size	Input Shaft			Output Shaft			Oil (l)	Weight (kg)
	HS	U	T * V	LS	S	W * X		
155	85	40	10 * 5	100	60	15 * 5	9.2	115
175	85	45	12 * 5	110	65	18 * 6	10.5	155



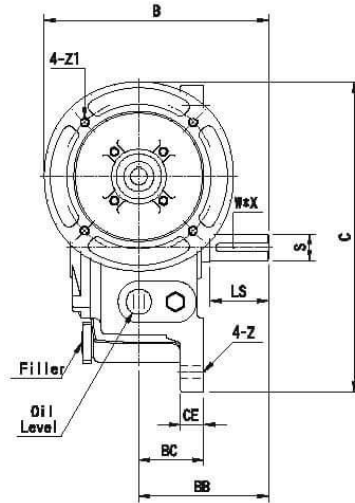
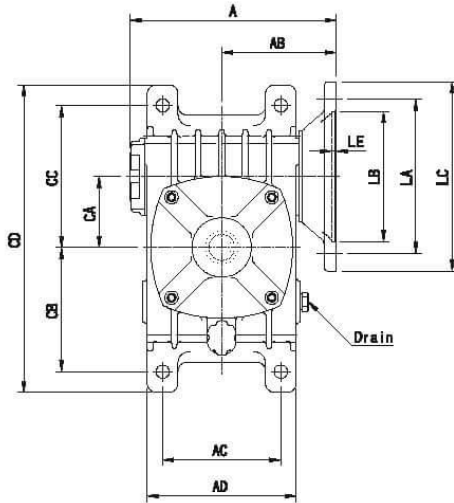
Shaft Direction



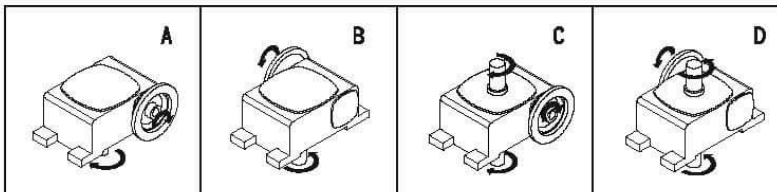
Unit:mm

Size	Ratio	A	AB	AC	AD	B	BB	BC	C	CA	CE	Z
200	1/10 1/40	698	357	450	510	483	305	190	643	200	30	22
225	1/15	709	361	510	580	530	345	200	700	225	35	27
250	1/20 1/50	813	420	570	640	585	360	200	754	250	35	27
300	1/30 1/60	943	495	660	750	623	410	235	853	300	42	36

Size	Input Shaft			Output Shaft			Oil (l)	Weight (kg)
	HS	U	T * V	LS	S	W * X		
200	95	50	12 * 5	125	70	20 * 7	12	220
225	95	55	15 * 5	140	80	20 * 7	17	315
250	110	80	15 * 5	145	90	24 * 8	23	365
300	125	70	18 * 6	170	95	24 * 8	45	520



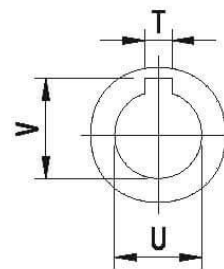
Shaft Direction



Unit:mm

Size	Ratio	A	AB	AC	AD	B	BB	BC	C	CA	CB	CC	CD	CE	Z	Input Bore		
																U	T	V
50	1/10	174	97	90	116	175	95	50	236	50	93	102	220	18	11	14	4	12.8
60	1/15	177	97	100	126	190	110	55	263	60	105	120	260	20	11	14	4	12.8
70	1/20	213 223	118 120	120	158	210 230	130	65	290 310	70	120	135	295	20	15	14 19	5 6	16 21.8
80	1/30	235	130	140	176	240	140	73	330	80	130	150	320	20	15	19	6	21.8 27.3
100	1/40	273 278	140 142	190	226	270 295	170	90	375 400	100	155	180	375	30	15	24 28	8 8	27.3 31.3
120	1/50	339	180	220	266	315	180	100	455	120	185	215	450	30	18	28	8	31.3
135	1/60	370 378	195 218	260	308	335 360	210	110	495 520	135	210	235	495	30	18	28 38	8 10	31.3 41.3

Size	Output Shaft			Flange					HP	Oil (l)	Weight (kg)
	LS	S	W * X	LA	LB	LC	LE	Z1			
50	40	17	5 * 3	130	110	160	4	M8	1/4 1/2	0.4	6.5
60	50	22	7 * 4	130	110	160	4	M8	1/4 1/2	0.6	9
70	60	28	7 * 4	130 165	110 130	160 210	4 5	M8 M10	1/2 1	1.1	13
80	65	32	10 * 5	165	130	200	5	M10	1 2	1.5	18
100	75	38	10 * 5	165 215	130 180	200 250	5	M10 M12	2 3	3	42
120	85	45	12 * 5	215	180	250	5	M12	3 5	5	66
135	95	55	15 * 5	215 265	180 230	250 300	5	M12 15	5 7.5	7.5	90



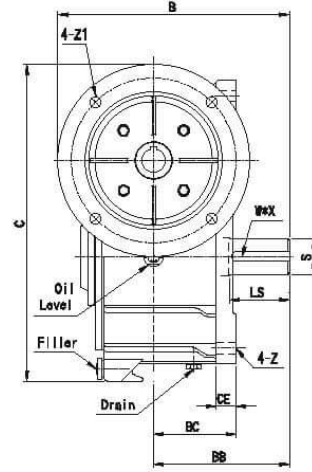
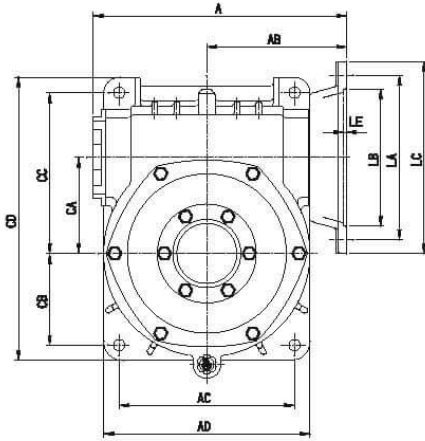
INPUT-BORE VIEW



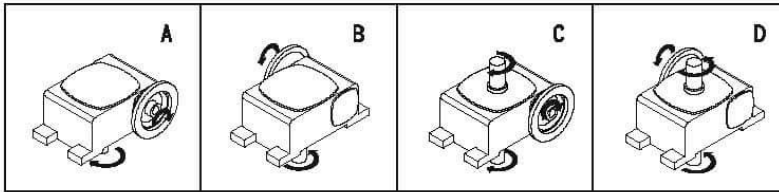
Model : VSM

成大齒輪減速機

Size : 155~175



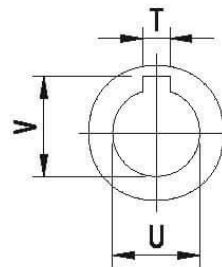
Shaft Direction



Unit:mm

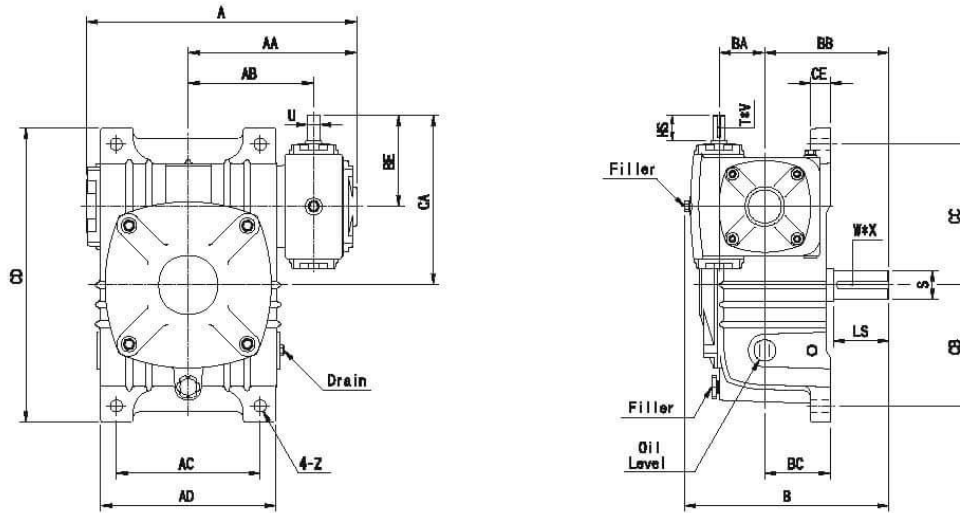
Size	Ratio	A	AB	AC	AD	B	BB	BC	C	CA	CB	CC	CD	CE	Z	Input Bore		
																U	T	V
155	1/10	430	236	290	336	392	242	140	521	155	145	265	456	30	20	38	10	41,3
	1/15																	
	1/40																	
175	1/20	420	212	320	376	398	248	150	552	175	187	293	516	35	20	38	10	41,3
	1/30																	
	1/60																	

Size	Output Shaft			Flange					HP	Oil (l)	Weight (kg)
	LS	S	W * X	LA	LB	LC	LE	Z1			
155	100	80	15 * 5	265	230	300	4,5	15	7,5 10	9,2	115
175	110	85	18 * 6	265 300	230 250	300 350	5 6	M12 19	10 15	10,5	155

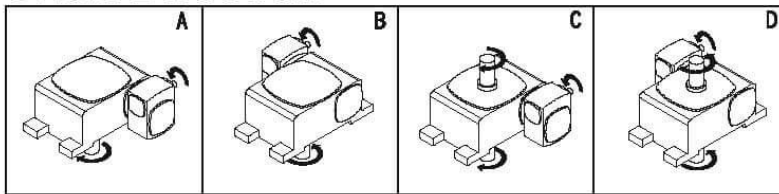


INPUT-BORE VIEW

Size : 50/80~80/135



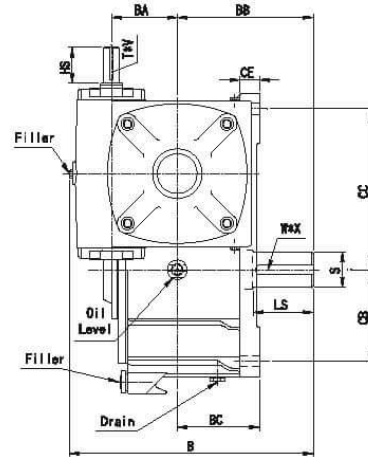
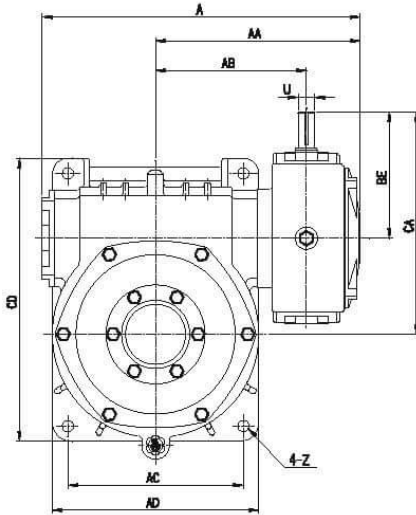
Shaft Direction



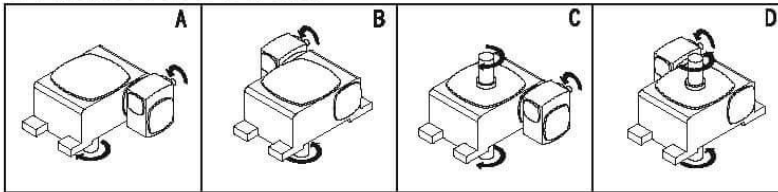
Unit:mm

Size	Ratio	A	AA	AB	AC	AD	B	BA	BB	BC	BE	CA	CB	CC	CD	CE	Z
50-80	1/100	289	184	132	140	176	229	50	140	73	107	187	130	150	320	20	15
60-100		352	219	161	190	226	285	60	170	90	124	224	155	180	375	30	15
70-120	1/3600	417	258	192	220	286	313	70	190	100	140	280	185	215	450	30	18
80-135		462	287	211	280	295	357	80	210	110	160	295	210	235	495	30	18

Size	Input Shaft			Output Shaft			Oil (l)	Weight (kg)
	HS	U	T * V	LS	S	W * X		
50-80	30	12	4 * 2.5	65	32	10 * 5	1.8	24
60-100	40	15	5 * 3	75	38	10 * 5	3.8	52
70-120	40	18	5 * 3	85	45	12 * 5	6	75
80-135	50	22	7 * 4	95	55	15 * 5	8.5	105



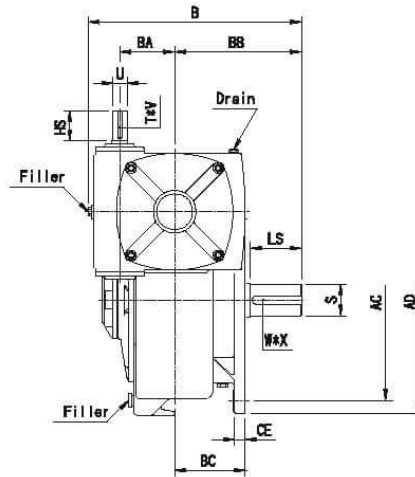
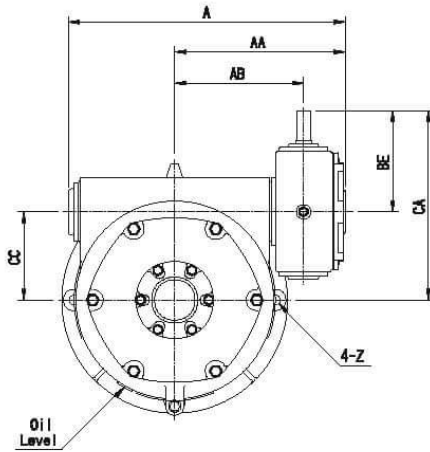
Shaft Direction



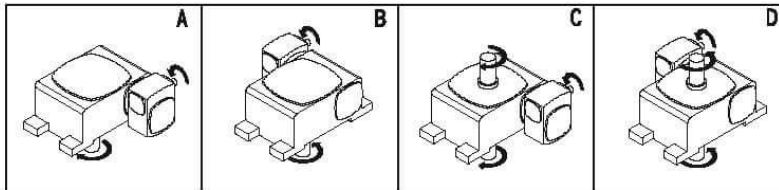
Unit:mm

Size	Ratio	A	AA	AB	AC	AD	B	BA	BB	BC	BE	CA	CB	CC	CD	CE	Z
100-155	1/100	540	349	257	290	336	420	100	242	140	190	347	145	255	456	30	20
120-175	1/3600	585	376	275	320	376	444	120	248	150	230	405	167	283	516	35	20

Size	Input Shaft			Output Shaft			Oil (l)	Weight (kg)
	HS	U	T * V	LS	S	W * X		
100-155	50	25	7 * 4	100	60	15 * 5	12	135
120-175	65	30	7 * 4	110	65	18 * 6	15	192



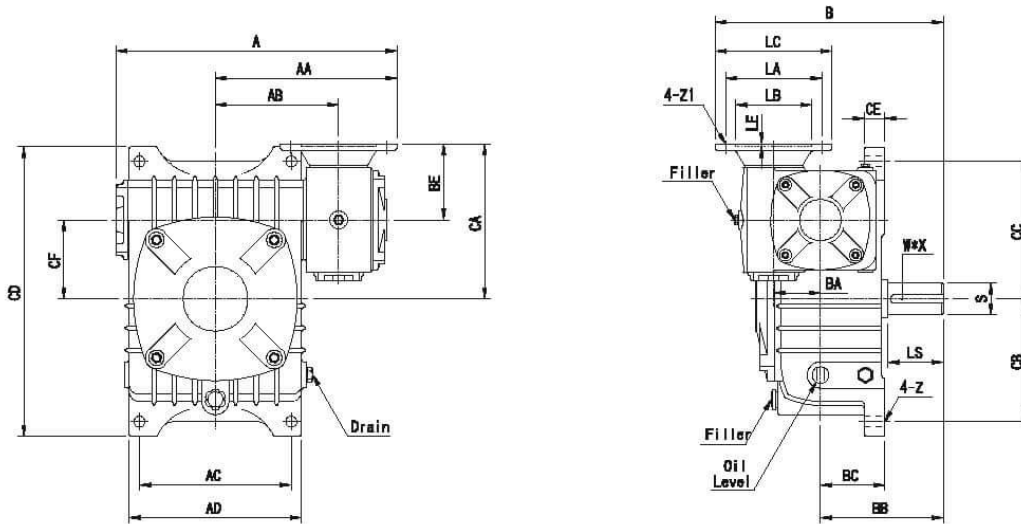
Shaft Direction



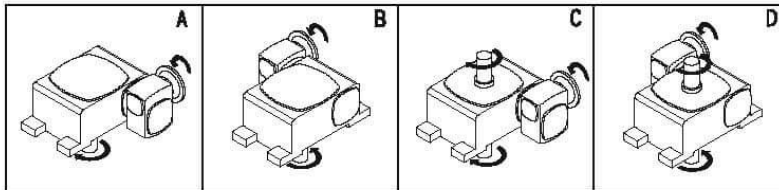
Unit:mm

Size	Ratio	A	AA	AB	AC	AD	B	BA	BB	BC	BE	CA	CC	CE	Z
120-200	1/100	653	414	312	450	510	501	120	305	190	230	430	200	30	22
135-225		672	425	315	510	580	586	135	345	200	260	485	225	35	27
155-250	1/3600	786	483	385	570	640	605	155	360	200	286	536	250	35	27
175-300		962	601	473	660	750	695	175	410	235	308	608	300	42	36

Size	Input Shaft			Output Shaft			Oil (l)	Weight (kg)
	HS	U	T * V	LS	S	W * X		
120-200	65	30	7 * 4	125	70	20 * 7	19	270
135-225	75	35	10 * 5	140	80	20 * 7	24	375
155-250	85	40	10 * 5	145	90	24 * 8	32	430
175-300	85	45	12 * 5	170	95	24 * 8	55	584



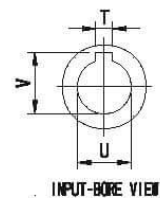
Shaft Direction

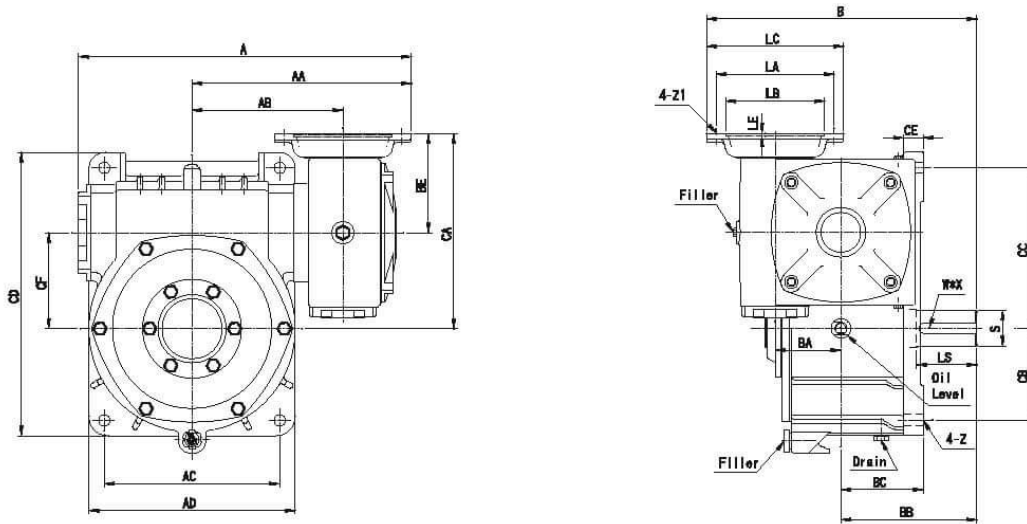


Unit:mm

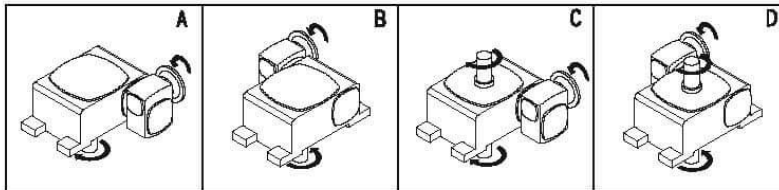
Size	Ratio	A	AA	AB	AC	AD	B	BA	BB	BC	BE	CA	CB	CC	CD	CE	CF	Z
50-80	1/100 ? 1/3600	317	212	132	140	176	270	50	140	73	96	176	130	150	320	20	80	15
60-100		378	241	161	190	226	310	60	170	90	97	197	155	180	375	30	100	15
70-120		428 448	272 292	192	220	266	340 360	70	190	100	118 120	238 240	185	215	450	30	120	18
80-135		480	311	211	260	295	390	80	210	110	130	265	210	235	495	30	135	18

Size	Input Bore			Output Shaft			Flange					HP	Oil (l)	Weight (kg)
	U	T	V	LS	S	W * X	LA	LB	LC	LE	Z1			
50-80	11 14	4 5	12.8 18	65	32	10 * 5	130	110	160	4	M8	1/4 1/2	1.8	24
60-100	11 14	4 5	12.8 18	75	38	10 * 5	130	110	160	4	M8	1/4 1/2	3.8	52
70-120	14 19	5 6	16 21.8	85	45	12 * 5	130 165	110 130	160 200	5	M8 M10	1/2 1	6	75
80-135	19 24	6 8	21.8 27.3	95	55	15 * 5	165	130	200	5	M10	1 2	8.5	105





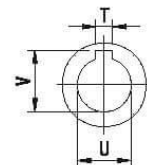
Shaft Direction



Unit:mm

Size	Ratio	A	AA	AB	AC	AD	B	BA	BB	BC	BE	CA	CB	CC	CD	CE	CF	Z
100-155	1/100	550	357	257	290	336	442	100	242	140	140	277	145	265	456	30	155	20
	?	574	382				467				142	279						
120-175	1/3600	607	400	275	320	376	493	120	248	150	180	355	167	293	516	35	175	20

Size	Input Bore			Output Shaft			Flange					HP	Oil (l)	Weight (kg)
	U	T	V	LS	S	W * X	LA	LB	LC	LE	Z1			
100-155	24	8	27.3	100	60	15 * 5	165	130	200	5	M10	2	12	135
	28	8	31.3				215	180	250					
120-175	28	8	31.3	110	65	18 * 6	215	180	250	5	M12	3	15	192



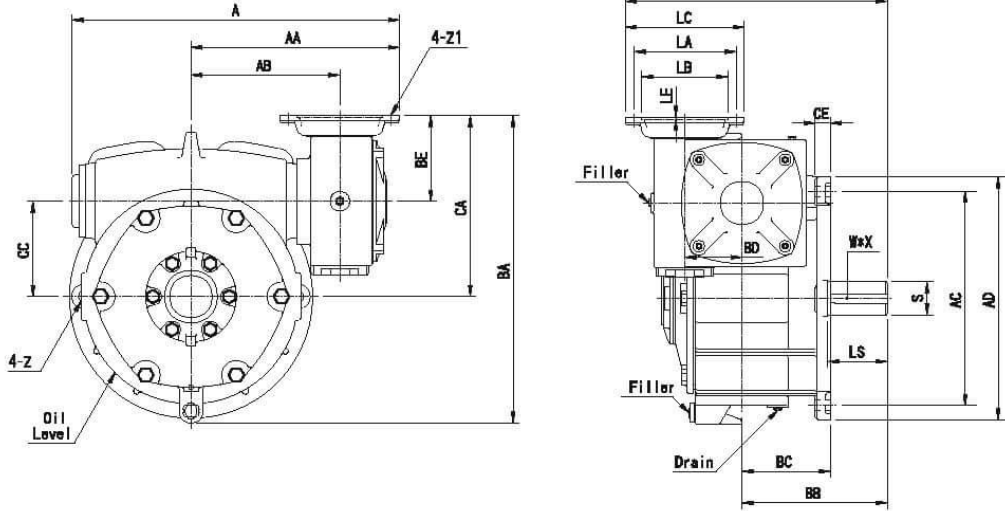
INPUT-BORE VIEW



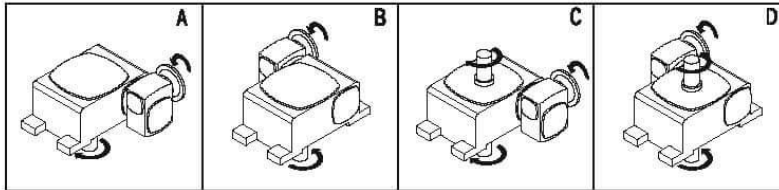
Model : VSX

成大齒輪減速機

Size : 120/200~175/300



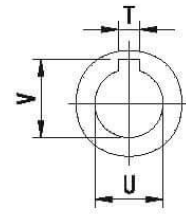
Shaft Direction



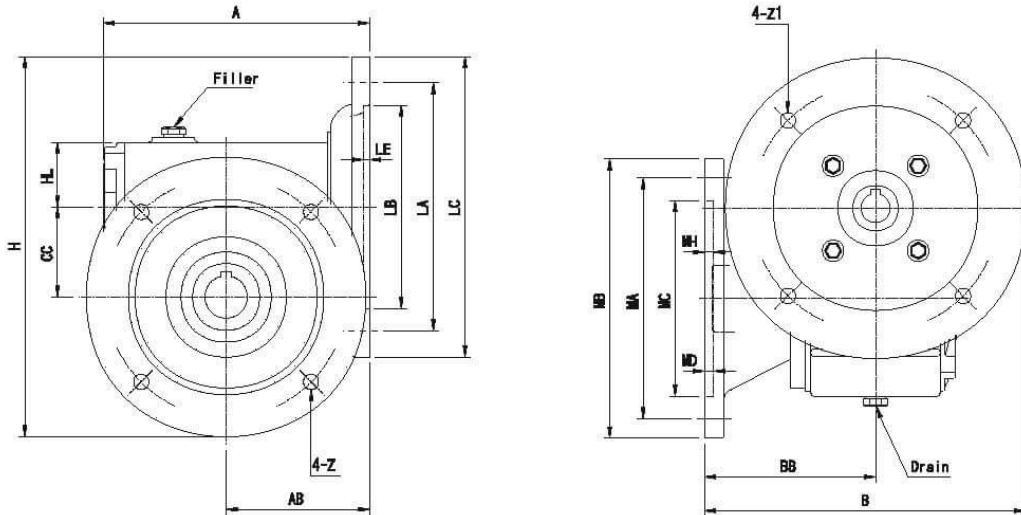
Unit:mm

Size	Ratio	A	AA	AB	AC	AD	B	BA	BB	BC	BD	BE	CA	CC	CE	Z
120-200	1/100	687	437	312	450	510	550	645	305	190	120	180	380	200	30	22
135-225		692 717	440 465	315	510	580	605 630	719 742	345	200	135	195 218	420 443	225	35	27
155-250	1/3600	817	515	365	570	640	665	812	360	200	155	236	486	250	35	27
175-300		983 1008	623 648	473	660	750	735 760	890 930	410	235	175	215 255	515 555	300	42	36

Size	Input Bore			Output Shaft			Flange					HP	Oil (l)	Weight (kg)
	U	T	V	LS	S	W * X	LA	LB	LC	LE	Z1			
120-200	28	8	31.3	125	70	20 * 7	215	180	250	5	M12	3 5	19	270
135-225	28 38	8 10	31.3 41.3	140	80	20 * 7	215 265	180 230	250 300	5	M12 15	5 7.5	24	375
155-250	38	10	41.3	145	90	24 * 8	265	230	300	5	15	7.5 10	32	430
175-300	38 42	10 12	41.3 45.3	170	95	24 * 8	265 300	230 250	300 350	5 6	M12 19	10 15	55	584

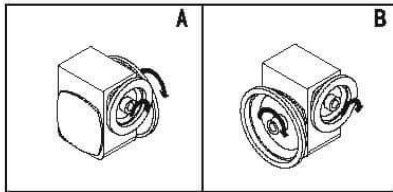


INPUT-BORE VIEW



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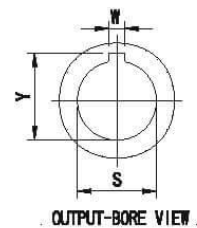
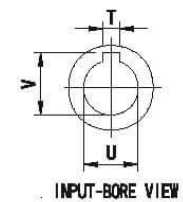
Shaft Direction



Unit:mm

Size	Ratio	A	AB	B	BB	CC	H	HL	MA	MB	MC	MD	MH	Z	Input Bore		
															U	T	V
60	1/10 1/40	170	88	191 184	110.5 114	60	205 233	43	99 160	120 186	75 130	6	1.5	10	14	5	16
	1/15 1/50	178	95.5	210.5 214	110.5 114	60	225 253	43	99 160	120 186	75 130	6	1.5	10	19	6	21.8
	1/20																
70	1/30 1/80	201	105	228	128	70	263	53	165	186	140	6	4	10	24	8	27.3

Size	Output Bore			Flange					HP	Oil (l)	Weight (kg)
	S	W	Y	LA	LB	LC	LE	Z1			
60	28	7	31	130	110	160	4	M8	1/2	0.26	9
	28	7	31	165	130	186	4	M10	1	0.4	12
70	28	7	31	165	130	200	5	M10	2	0.7	18

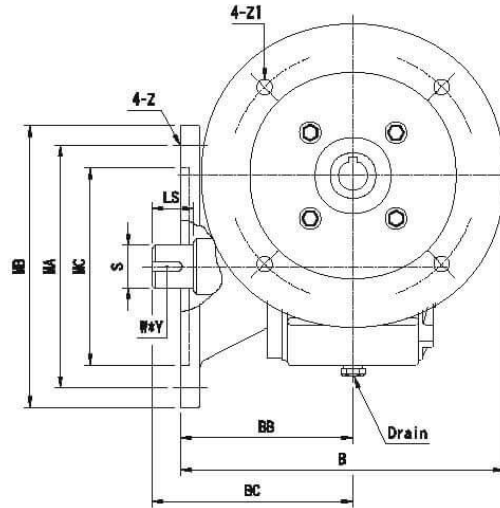
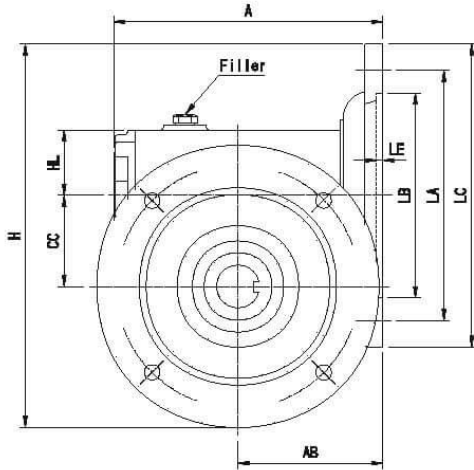


*60出力中空深度55mm

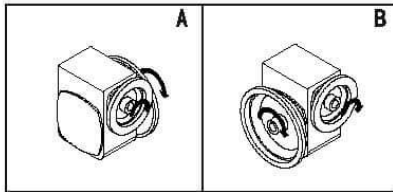
*70出力中空深度43mm

*size 60: 55mm for the depth of hollow output shaft

*size 70: 43mm for the depth of hollow output shaft



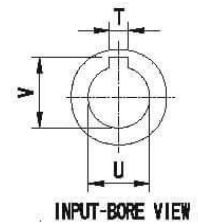
Shaft Direction

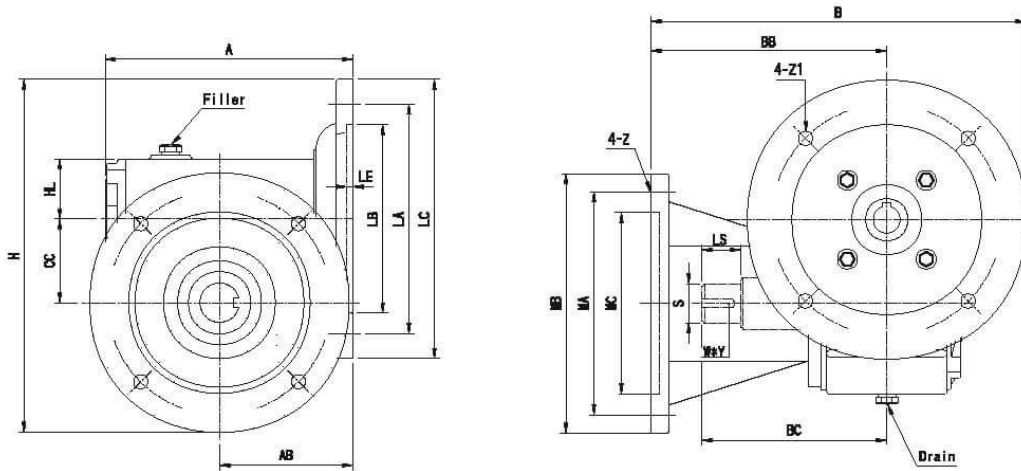


Unit:mm

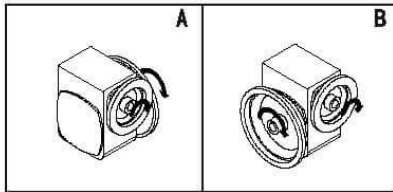
Size	Ratio	A	AB	B	BB	BC	CC	H	HL	MA	MB	MC	Z	Input Bore		
														U	T	V
60	1/10 1/40	170	88	207	127	162	60	220	43	130	160	110	12	14	5	16
	1/15 1/50	178	95.5	227	127	162	60	240	43	130	160	110	12	19	6	21.8
	1/20															
70	1/30 1/60	213	105	250	150	185	70	256	53	130	160	110	12	24	8	27.3

Size	Output Shaft			Flange					HP	Oil (l)	Weight (kg)
	LS	S	W*Y	LA	LB	LC	LE	Z1			
60	35	28	7 * 4	130	110	160	4	M8	1/2	0.4	12
	35	28	7 * 4	165	130	165	4	M10	1	0.4	12
70	35	28	7 * 4	165	130	200	5	M10	2	0.7	18





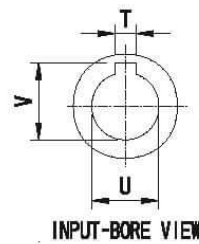
Shaft Direction

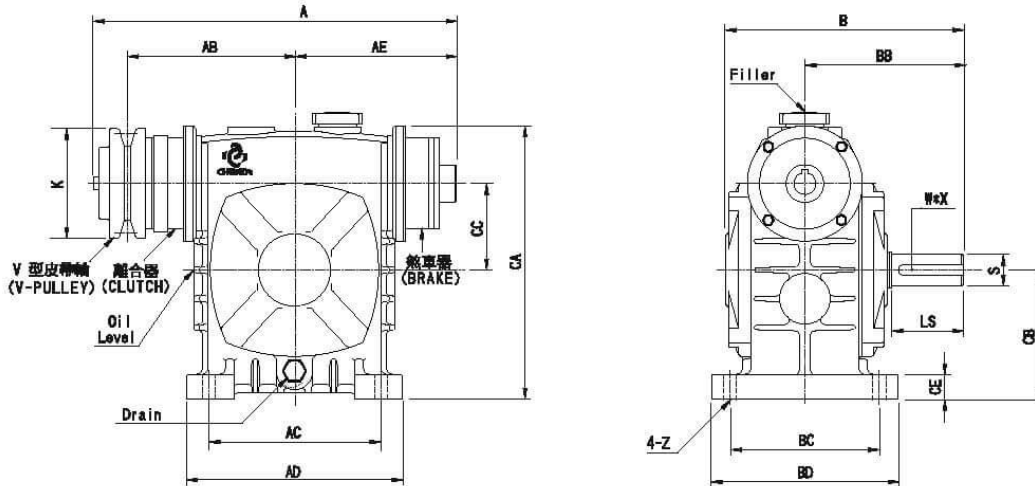


Unit:mm

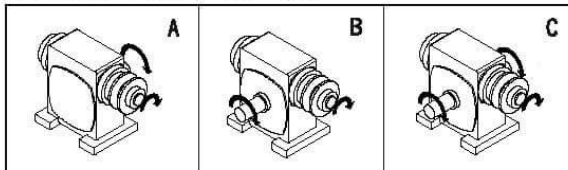
Size	Ratio	A	AB	B	BB	BC	CC	H	HL	MA	MB	MC	Z	Input Bore		
														U	T	V
60	1/10 1/40	170 178	88 95,5	253 273	173	121	60	232,5 252,5	43	160	185	130	15	14 19	5 6	16 21,8
	1/15 1/50	170 178	88 95,5	296 316	216	162	60	232,5 252,5	43	160	185	125	14	14 19	5 6	16 21,8
	1/20															
70	1/30 1/60	213	105	339	239	185	70	262,5	53	160	185	125	14	24	8	27,3

Size	Output Shaft			Flange					HP	Oil (l)	Weight (kg)
	LS	S	W*Y	LA	LB	LC	LE	Z1			
60	45	28	7 * 4	130 165	110 130	160	4	M8	1/2	0,4	12
	35	28	7 * 4	130 165	110 130	166	4	M10	1	0,4	12
70	35	28	7 * 4	165	130	200	5	M10	2	0,7	18





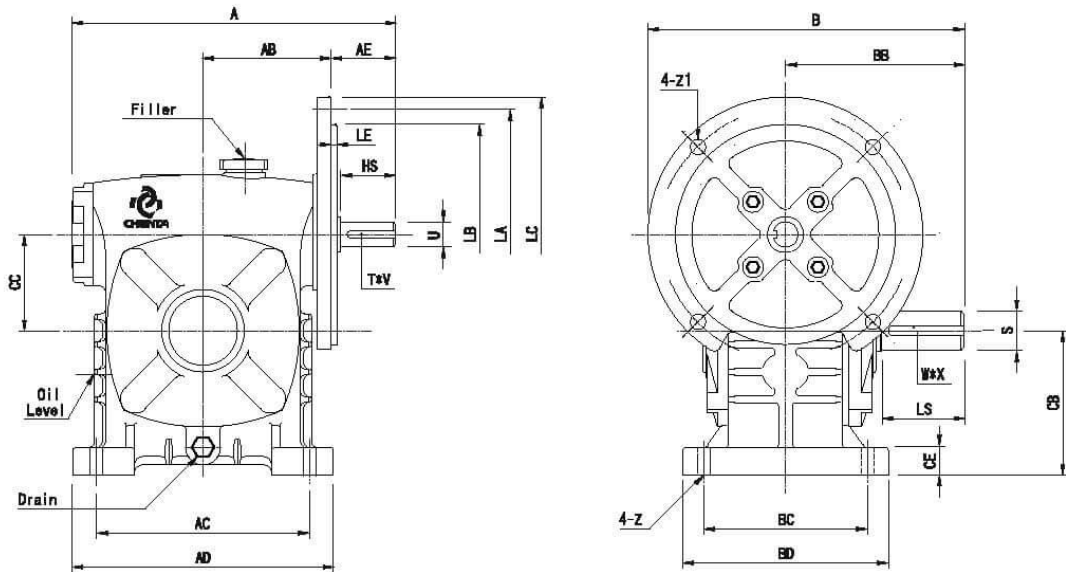
Shaft Direction



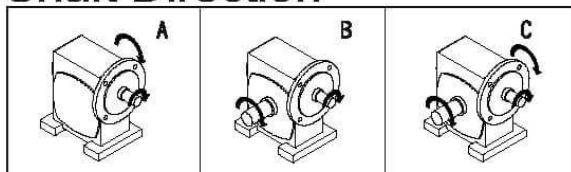
Unit:mm

Size	Ratio	TORQUE CODE	A	AB	AC	AD	AE	B	BB	BC	BD	CA	CB	CC	K	CE	Z
50	1/10	M5	257	119,5	110	140	118	147	95	95	120	170	80	50	76	15	11
60	1/15	M10	264	117	120	150	123	168	110	105	130	200	90	80	102	17,5	11
	1/20																
70	1/30	M10	298	134,5	150	190	138	195	130	115	150	226	105	70	102	20	15
	1/40	M20	316	144,5			151								127	22	
80	1/40	M20	338	158,5	180	220	181	210	140	135	170	264	120	80	127	20	15
	1/50	M40	360	162			171								152	23	
100	1/60	M40	411	187	220	270	196	260	170	155	190	326	150	100	152	25	15

Size	Output Shaft			Oil (l)	Weight (kg)
	LS	S	W * X		
50	40	17	5 * 3	0,22	7,2
60	50	22	7 * 4	0,32	10
70	60	28	7 * 4	0,55	15
80	65	32	10 * 5	0,77	20,2
100	75	38	10 * 5	1,53	38,5



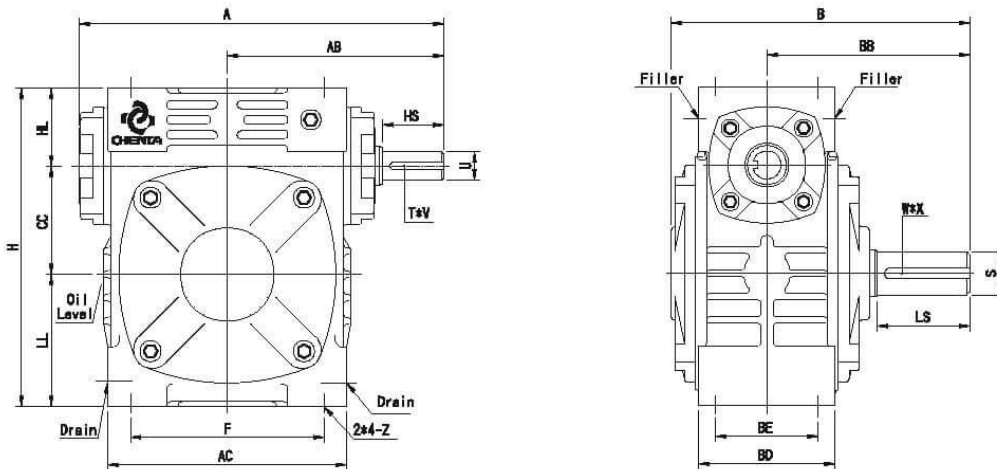
Shaft Direction



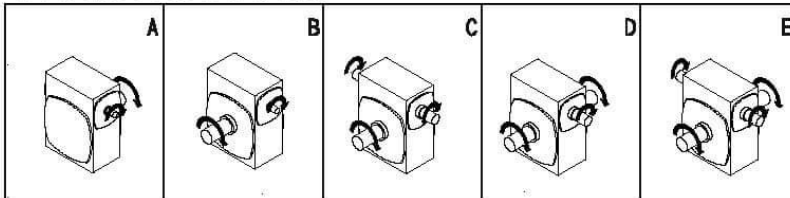
Unit:mm

Size	Ratio	A	AB	AC	AD	AE	B	BB	BC	BD	CA	CB	CC	CE	Z
60	1/10	202	75	120	150	49	190	110	105	130	230	90	60	20	11
70	1/15	236	93	150	190	47	230	130	115	150	275	105	70	20	15
	1/20														
80	1/30	264	103	180	220	57	255	140	135	170	315	120	80	20	15
100	1/40	329	132	220	270	60	285	170	155	180	365	150	100	25	15
	1/50														
120	1/60	366	152	260	320	60	305	180	180	230	415	180	120	30	18

Size	Input Flange					Input Shaft			Output Shaft			Oil (l)	Weight (kg)
	LA	LB	LC	LE	Z1	HS	U	T * V	LS	S	W * X		
60	146	125	160	4.5	9	40	15	5 * 3	50	22	7 * 4	0.5	8.5
70	160	160	200	4.5	11	40	18	5 * 3	60	28	7 * 4	0.8	14
80	210	186	230	4.5	11	50	22	7 * 4	65	32	10 * 5	1.2	19
100	210	186	230	4.5	11	50	25	7 * 4	75	38	10 * 5	2.2	38
120	210	186	230	4.5	11	50	30	7 * 4	85	45	12 * 5	4.2	64



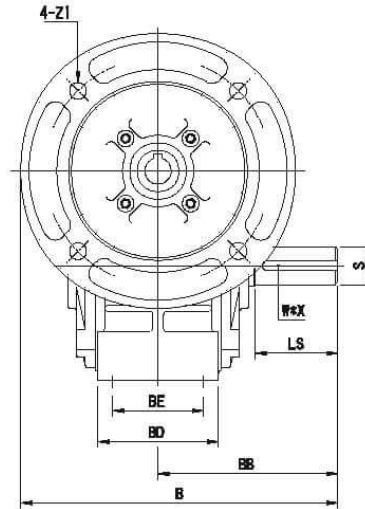
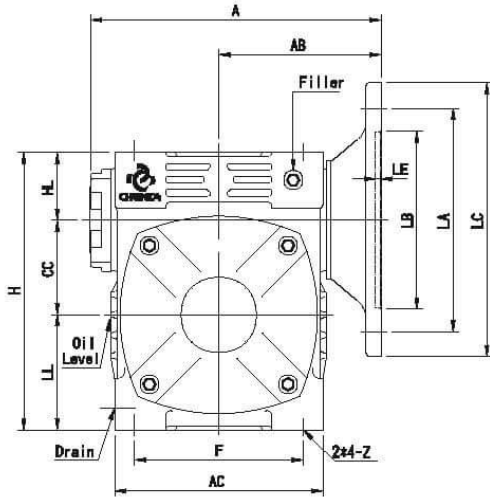
Shaft Direction



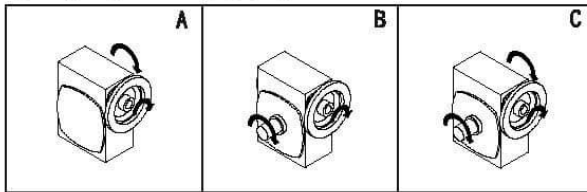
Unit:mm

Size	Ratio	A	AB	AC	B	BB	BD	BE	CC	F	H	HL	LL	Z
40	1/10	157	98,5	102	126	84	68	54	40	80	127	34	53	M8
50		181	107	115	147	95	68	50	50	90	150	35	65	M8
60	1/15	204	124	127	168	110	78	54	60	100	177	42	75	M10
70	1/20	234	140	154	196	130	88	66	70	125	205	50	85	M10
80	1/30	265	160	175	216	140	97	75	80	145	232	60	92	M10
100	1/40	325	190	224	262	170	116	91	100	187	310	80	130	M12
120	1/50	389	230	264	291	190	136	100	120	232	370	95	155	M14
135	1/60	435	260	300	320	210	144	111	135	264	425	105	185	M16
155		479	286	330	377	242	152	120	155	280	461	103	203	M16
175		517	308	370	381	248	165	140	175	320	521	123	223	M16

Size	Input Shaft			Output Shaft			Oil (l)	Weight (kg)
	HS	U	T * V	LS	S	W * X		
40	28	12	4 * 2,5	35	16	5 * 3,0	0,18	5
50	30	12	4 * 2,5	40	17	5 * 3,0	0,26	6
60	40	15	5 * 3	50	22	7 * 4,0	0,4	8
70	40	18	5 * 3	60	28	7 * 4,0	0,7	14
80	50	22	7 * 4	65	32	10 * 5,0	1,15	19
100	50	25	7 * 4	75	38	10 * 5,0	2,2	36
120	65	30	7 * 4	85	45	12 * 5,0	4,8	48
135	75	35	10 * 5	95	55	15 * 5,0	6,3	70
155	85	40	10 * 5	100	60	15 * 5,0	7,8	105
175	85	45	12 * 5	110	65	18 * 6,0	12,2	145



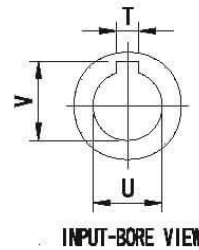
Shaft Direction



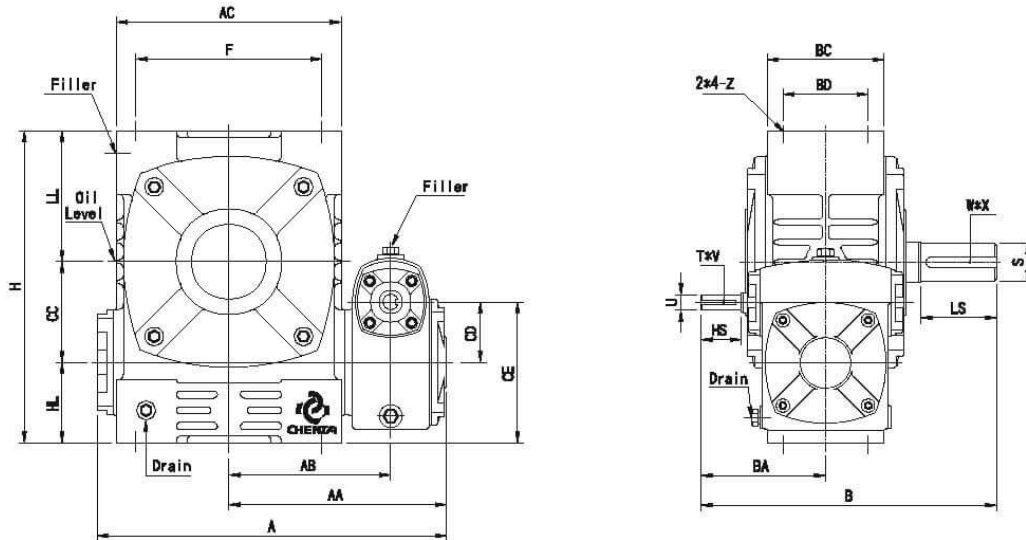
Unit:mm

Size	Ratio	A	AB	AC	B	BB	BD	BE	CC	F	H	HL	LL	Z	Input Bore		
															U	T	V
40	1/10	151	85	102	164	84	88	54	40	80	127	34	53	M8	11	4	12.8
50	1/15	174	97	115	175	95	88	50	50	80	150	35	65	M8	11	4	12.8
60		177	97	127	190	110	78	54	60	160	177	42	75	M10	11	4	12.8
70	1/20	213	118	154	210	130	88	66	70	125	205	50	85	M10	14	5	16.3
80		223	120	175	230	140	97	75	80	145	232	60	92	M10	19	6	21.8
80	1/30	235	130	175	240	140	97	75	80	145	232	60	92	M10	19	6	21.8
100	1/40	273	140	224	270	170	116	90	100	187	310	90	130	M12	24	8	27.3
120		275	142	224	295	170	116	90	100	187	310	90	130	M12	24	8	27.3
120	1/50	339	180	264	315	190	136	100	120	232	370	95	155	M14	28	8	31.3
135	1/60	370	195	300	335	210	144	111	135	264	425	105	185	M16	28	8	31.3
135		393	218	300	360	210	144	111	135	264	425	105	185	M16	28	8	31.3

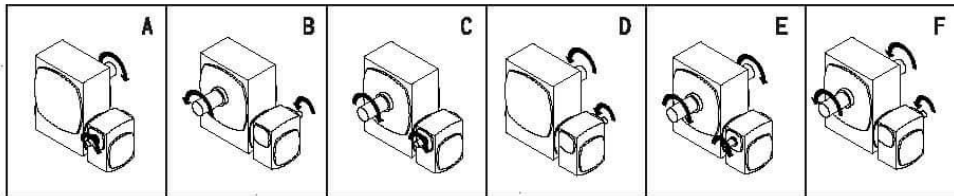
Size	Output Shaft			Flange					HP	Oil (l)	Weight (kg)
	LS	S	W * X	LA	LB	LC	LE	Z1			
40	35	16	5 * 3	130	110	160	4	M8	1/4	0.18	6
50	40	17	5 * 3	130	110	160	4	M8	1/4	0.26	7
60	50	22	7 * 4	130	110	160	4	M8	1/4	0.4	9
70	60	28	7 * 4	130	110	160	4	M8	1/2	0.7	16
80	65	32	10 * 5	165	130	200	5	M10	1	1.15	21
100	75	38	10 * 5	185	130	200	5	M10	2	2.2	39
120	85	45	12 * 5	215	180	250	5	M12	3	4.8	52
135	95	55	15 * 5	215	180	250	5	15	5	6.3	74



INPUT-BORE VIEW



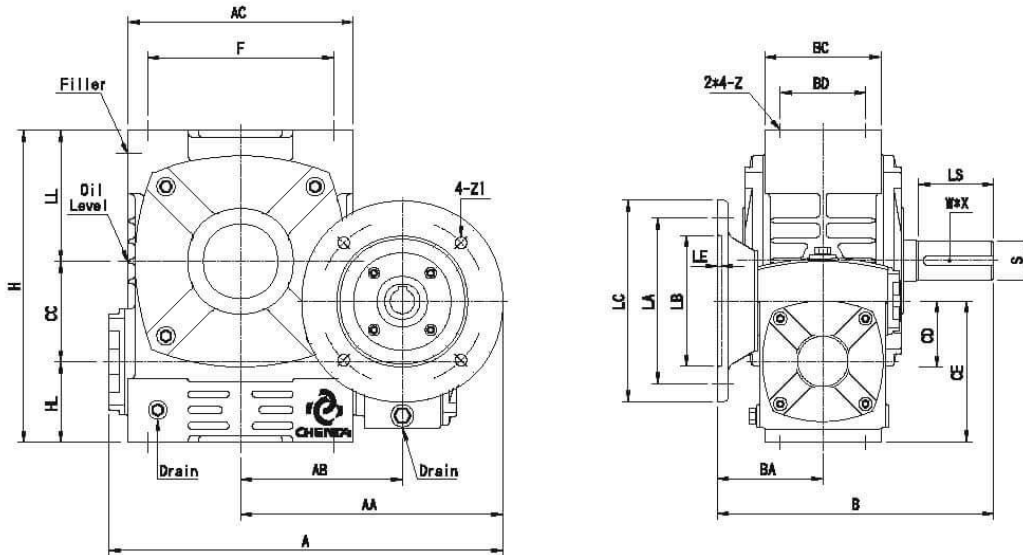
Shaft Direction



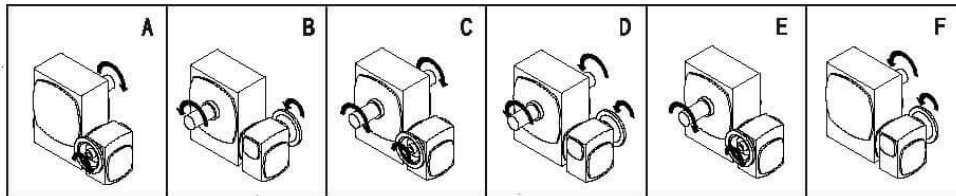
Unit:mm

Size	Ratio	A	AA	AB	AC	F	B	BA	BC	BD	CC	CD	CE	H	HL
40-70	1/100 1/3600	270	175	131	154	125	213	83	88	86	70	40	90	205	50
50-80		289	184	132	175	145	247	107	97	75	80	50	110	232	60
60-100		352	219	161	224	187	294	124	116	91	100	60	140	310	80
70-120		417	258	192	264	232	330	140	136	100	120	70	165	370	95
80-135		482	287	211	300	264	370	160	144	111	135	80	185	425	105
100-155		540	340	257	330	280	434	192	152	120	155	100	203	461	103
120-175	858	376	275	370	320	478	230	185	140	175	120	243	521	123	

Size	LL	Z	Input Shaft			Output Shaft			Oil (l)	Weight (kg)
			HS	U	T * V	LS	S	W * X		
40-70	85	M10	25	12	4 * 2.5	60	28	7 * 4	0.65	17
50-80	92	M10	30	12	4 * 2.5	65	32	10 * 5	1.05	23
60-100	130	M12	40	15	5 * 3	75	38	10 * 5	1.7	42
70-120	155	M14	40	18	5 * 3	85	45	12 * 5	3	73
80-135	185	M16	50	22	7 * 4	95	55	15 * 4	4.75	84
100-155	203	M16	50	25	7 * 4	100	60	15 * 5	8.5	121
120-175	223	M16	65	30	7 * 4	110	65	18 * 6	9.8	168



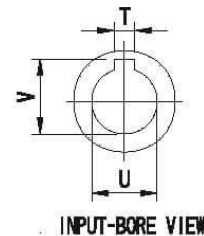
Shaft Direction



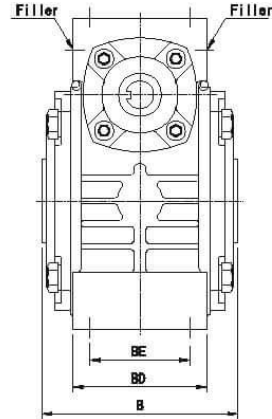
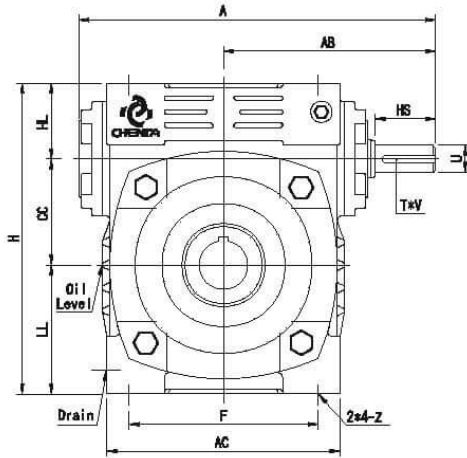
Unit:mm

Size	Ratio	A	AA	AB	AC	F	B	BA	BC	BD	CC	CD	CE	H	LL	HL	Z	Input Bore		
																		U	T	V
40-70	1/100 1/3600	306	211	131	154	125	213	79	88	66	70	40	90	205	85	50	M10	11	4	12.8
50-80		316	212	132	175	145	237	97	97	75	80	50	110	232	92	60	M10	11	4	12.8
60-100		374	241	161	224	187	287	97	116	91	100	60	140	310	130	80	M12	11	4	12.8
70-120		431 451	272 292	192	264	232	308 310	118 120	136	100	120	70	165	370	155	95	M14	14	5	16.3
80-135		481	311	211	300	264	340	130	144	111	135	80	185	425	185	105	M16	19	6	21.8
100-155		545 574	357 382	257	330	280	382 407	140 165	152	120	155	100	203	461	203	103	M16	24	8	27.3
120-175	608	400	275	370	320	428	180	185	140	175	120	243	521	223	123	M16	28	8	31.3	

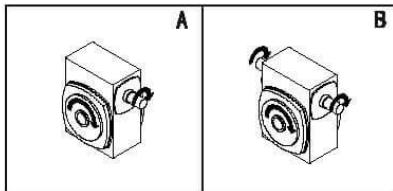
Size	Output Shaft			Flange					HP	Oil (l)	Weight (kg)
	LS	S	W * X	LA	LB	LC	LE	Z1			
40-70	60	28	7 * 4	130	110	160	4	M8	1/4HP	0.65	18
50-80	85	32	10 * 5	130	110	180	4	M8	1/4HP 1/2HP	1.05	24
60-100	75	38	10 * 5	130	110	160	4	M8	1/4HP 1/2HP	1.7	43
70-120	85	45	12 * 5	130 165	110 130	180 200	5	M8 M10	1/2HP 1HP	3	74
80-135	95	55	15 * 5	165	130	200	5	M10	1HP 2HP	4.75	87
100-155	100	60	15 * 5	165 215	130 180	200 250	5	M10 M12	2HP 3HP	6.5	125
120-175	110	65	18 * 9	215	180	250	5	15	3HP 5HP	9.8	176



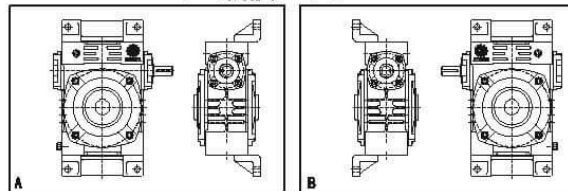
INPUT-BORE VIEW



Shaft Direction



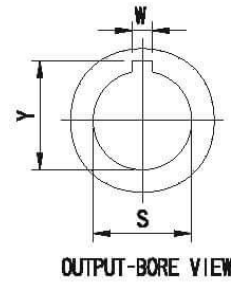
UHS+L型腳座 (UHS+L-BASE)



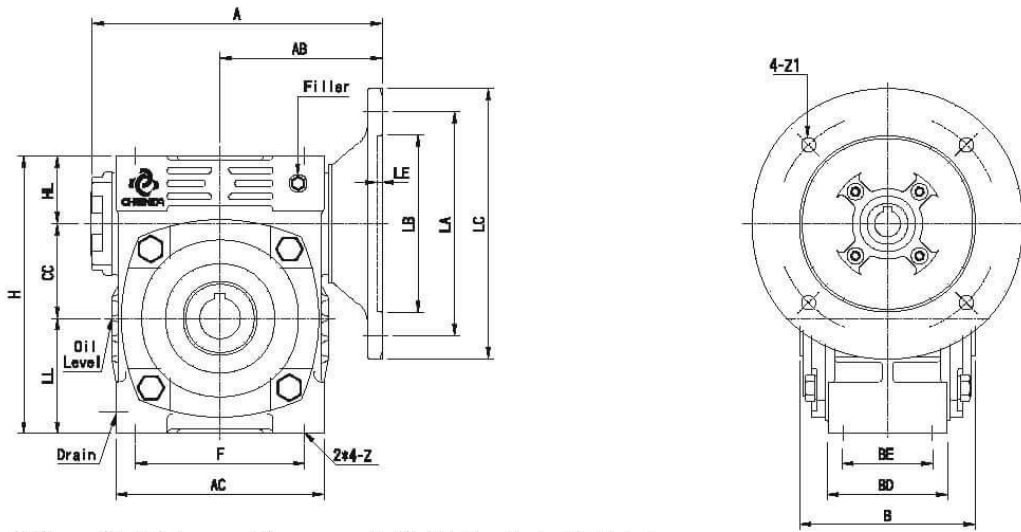
Unit:mm

Size	Ratio	A	AB	AC	B	BD	BE	CC	F	H	HL	LL	Z
40	1/10	157	96.5	102	110	68	54	40	80	127	34	53	M8
50		181	107	115	110	68	50	50	90	150	35	65	M8
60	1/15	204	124	127	117	78	54	60	100	177	42	75	M10
70	1/20	234	140	154	130	88	66	70	125	205	50	85	M10
80	1/30	265	160	175	144	97	75	80	145	232	60	92	M10
100	1/40	325	192	224	175	116	91	100	187	310	80	130	M12
120	1/50	389	230	264	200	136	100	120	232	370	95	155	M14
135	1/60	435	260	300	230	144	111	135	264	425	105	185	M16
155		479	286	330	256	152	120	155	280	461	103	203	M16
175		517	308	370	282	185	140	175	320	521	123	223	M16

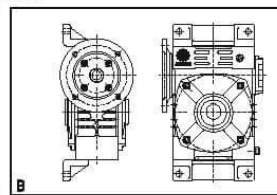
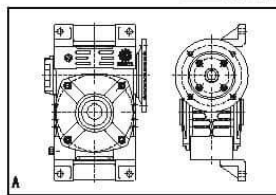
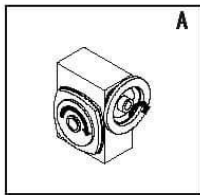
Size	Input Shaft			Output Bore			Oil (l)	Weight (kg)
	HS	U	T * V	S	W	Y		
40	28	12	4 * 2.5	19	5	21	0.18	5
50	30	12	4 * 2.5	20	5	22.3	0.26	6
60	40	15	5 * 3	25	7	28	0.4	8
70	40	18	5 * 3	30	8	33.3	0.7	14
80	50	22	7 * 4	35	10	38.5	1.15	19
100	50	25	7 * 4	40	12	43.5	2.2	36
120	65	30	7 * 4	45	12	48.5	4.8	48
135	75	35	10 * 5	60	15	65	8.3	70
155	85	40	10 * 5	70	20	74.9	7.8	105
175	85	45	12 * 5	80	22	85.4	12.2	145



OUTPUT-BORE VIEW



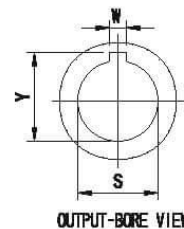
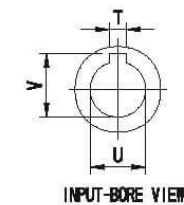
Shaft Direction UHM+L型腳座(UHM+L-BASE)

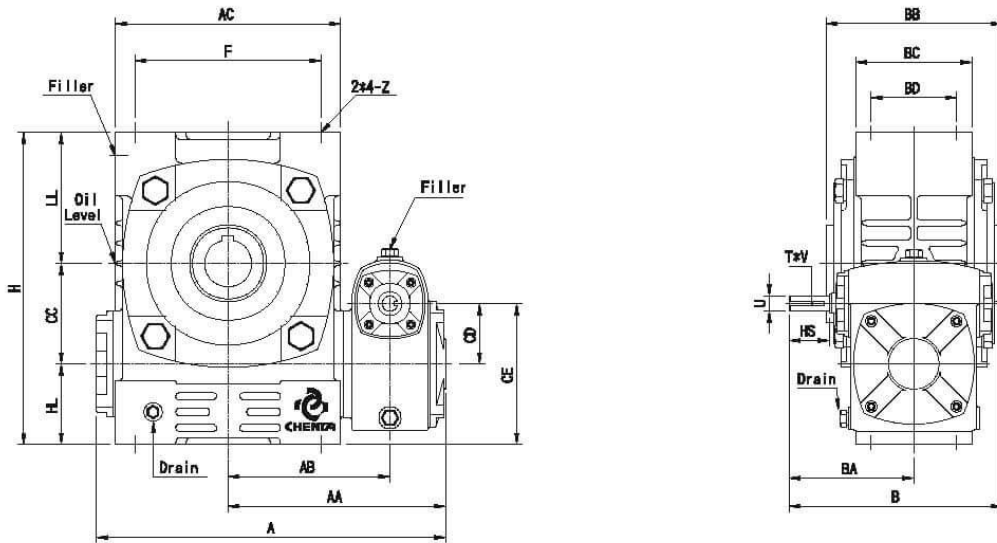


Unit:mm

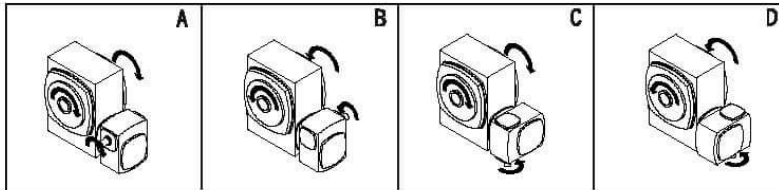
Size	Ratio	A	AB	AC	B	BD	BE	CC	F	H	HL	LL	Z	Input Bore		
														U	T	V
40	1/10	151	85	102	110	68	54	40	80	127	34	53	M8	11	4	12.8
50	1/15	174	97	115	110	68	50	50	90	150	35	65	M8	11	4	12.8
60		177	97	127	117	78	54	60	100	177	42	75	M10	11	4	12.8
70	1/30	213	118	154	130	88	66	70	125	205	50	85	M10	14	5	16.3
80		223	120	154	130	88	66	70	125	205	50	85	M10	14	5	16.3
100	1/40	276	140	224	175	116	91	100	187	310	80	130	M12	19	6	21.8
120		277	141	224	175	116	91	100	187	310	80	130	M12	24	8	27.3
135	1/60	339	180	264	200	136	100	120	232	370	95	155	M14	28	8	31.3
135		385	195	300	230	144	111	135	264	425	105	185	M16	28	8	31.3

Size	Output Bore			Flange					HP	Oil (l)	Weight (kg)
	S	W	Y	LA	LB	LC	LE	Z1			
40	19	5	21	130	110	160	4	M8	1/4	0.18	6
50	20	5	22.3	130	110	160	4	M8	1/4	0.26	7
60	25	7	28	130	110	160	4	M8	1/4	0.4	9
70	30	8	33.5	130	110	160	4	M8	1/2	0.7	16
80	35	10	38.5	185	130	200	5	M10	1/2	1.15	21
100	40	12	43.5	185	130	200	5	M10	2	2.2	39
120	45	12	48.5	215	180	250	5	M12	3	4.8	52
135	60	15	65	215	180	250	5	Ø15	5	6.3	74





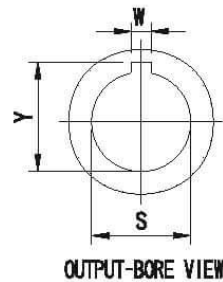
Shaft Direction

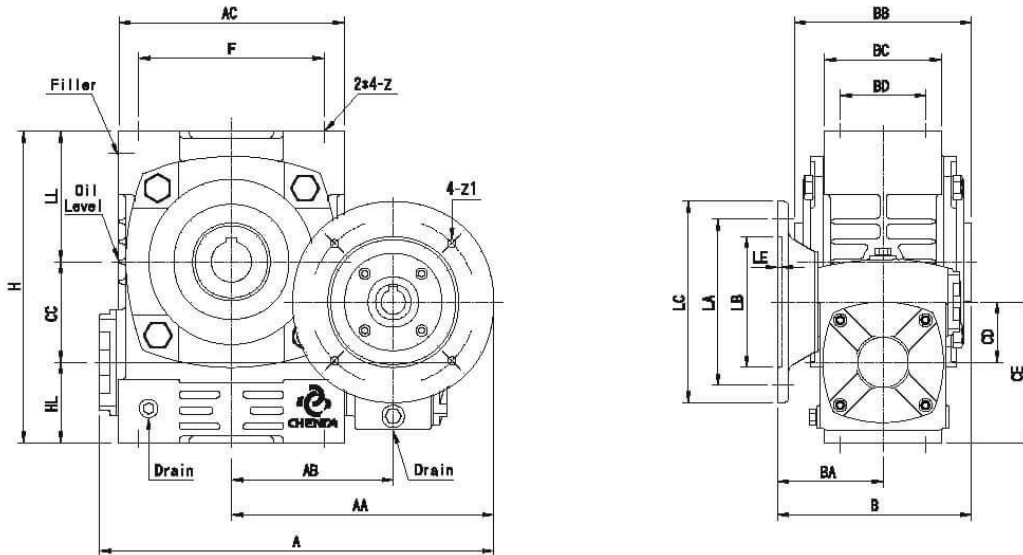


Unit:mm

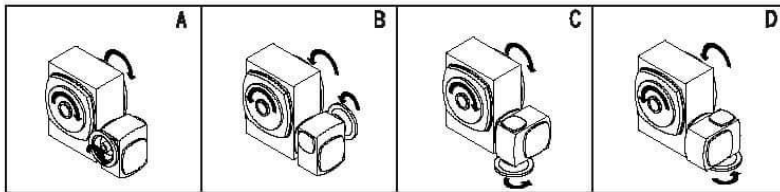
Size	Ratio	A	AA	AB	AC	F	B	BA	BB	BD	BC	CC	CD	CE	H	HL	LL
40-70	1/100 1/3600	270	175	131	154	125	148	83	130	66	88	70	40	90	205	50	85
50-80		289	184	132	175	145	179	107	144	75	97	80	50	110	232	60	92
60-100		352	219	161	224	187	211.5	124	175	91	116	100	60	140	310	80	130
70-120		417	258	192	264	232	240	140	200	100	136	120	70	165	370	95	155
80-135		482	287	211	300	264	275	160	230	111	144	135	80	185	425	105	185
100-155		540	340	257	330	280	320	190	256	120	152	155	100	203	461	103	203
120-175		658	376	275	370	320	371	230	282	140	185	175	120	243	521	123	223

Size	Z	Input Shaft			Output Bore			Oil (l)	Weight (kg)
		HS	U	T * V	S	W	Y		
40-70	M10	25	12	4 * 2.5	30	8	33.5	0.65	17
50-80	M10	30	12	4 * 2.5	35	10	38.5	1.05	23
60-100	M12	40	15	5 * 3	40	12	43.5	1.7	42
70-120	M14	40	18	5 * 3	45	12	48.5	3	73
80-135	M16	50	22	7 * 4	60	15	65.0	4.75	84
100-155	M18	50	25	7 * 4	70	20	74.9	6.5	121
120-175	M16	65	30	7 * 4	80	22	85.4	9.8	168





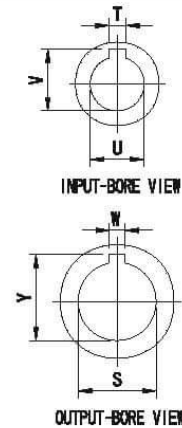
Shaft Direction



Unit:mm

Size	Ratio	A	AA	AB	AC	F	B	BA	BB	BC	BD	CC	CD	CE	H	HL	LL	Z
40-70	1/100	306	211	131	154	125	144	79	130	88	66	70	40	90	205	50	85	M10
50-80		316	212	132	175	145	169	97	144	97	75	80	50	110	232	60	92	M10
60-100	1/3600	374	241	161	224	187	184	97	175	116	91	100	60	140	310	80	130	M12
70-120		431 451	272 292	192	264	232	218 220	118 120	200	136	100	120	70	165	370	95	155	M14
80-135	1/3600	481	311	211	300	264	245	130	230	154	111	135	80	165	425	105	185	M16
100-155		545 574	357 382	257	330	280	266 293	140 165	256	152	120	155	100	203	461	103	203	M16
120-175		608	400	275	370	320	321	180	282	185	140	175	120	243	521	123	223	M16

Size	Input Bore			Output Bore			Flange					HP	Oil (l)	Weight (kg)
	U	T	V	S	W	Y	LA	LB	LC	LE	Z1			
40-70	11	4	12.8	30	8	33.5	130	110	160	4	M6	1/4HP	0.65	18
50-80	11 14	4 5	12.8 16.3	35	10	38.5	130	110	160	4	M6	1/4HP 1/2HP	1.05	24
60-100	11 14	4 5	12.8 16.3	40	12	43.5	130	110	160	4	M6	1/4HP 1/2HP	1.7	43
70-120	14 19	5 6	15.3 21.6	45	12	48.5	130 165	110 130	160 200	4 5	M6 M10	1/2HP 1HP	3	74
80-135	19 24	6 8	21.6 27.3	60	15	65	165	130	200	5	M10	1HP 2HP	4.75	87
100-155	24 28	8 8	27.3 31.3	70	20	74.9	165 215	130 180	200 250	5	M10 M12	2HP 3HP	6.5	125
120-175	28	8	31.3	80	22	85.4	215	180	250	5	M12	3HP 5HP	9.8	176

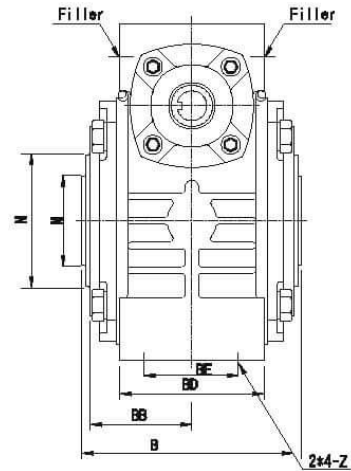
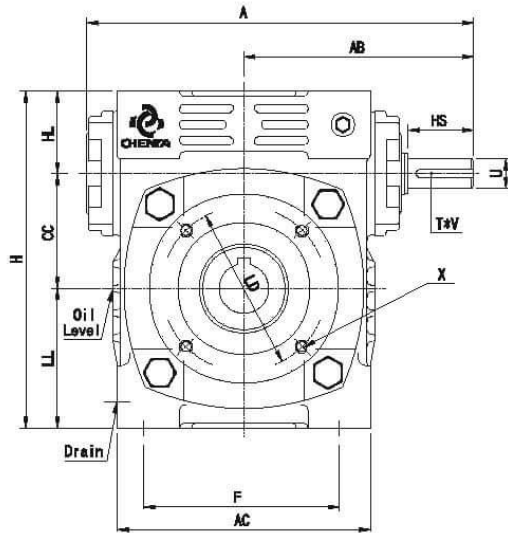




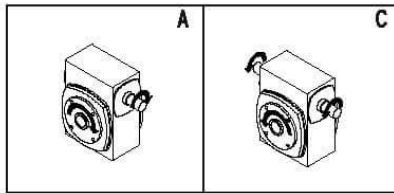
Model : UCS

成大齒輪減速機

Size : 50~135



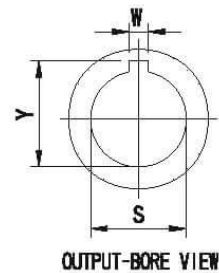
Shaft Direction

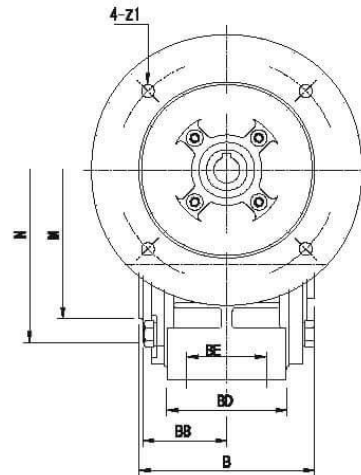
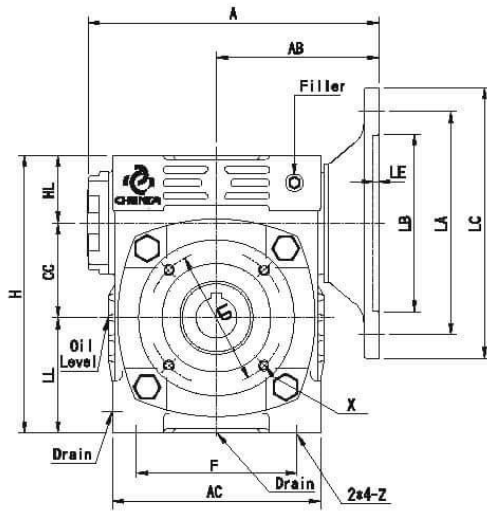


Unit:mm

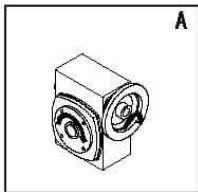
Size	Ratio	A	AB	AC	B	BB	BD	BE	CC	F	M	N	H	HL	LL	LD	X	Z
50	1/10	181	107	115	110	52	68	50	50	90	58	80	150	35	65	70	4-M6	M8
60	1/15	204	124	127	117	55.5	78	54	60	100	70	96	177	42	75	82	4-M8	M10
70	1/20	234	140	154	130	62	88	65	70	125	80	115	205	50	85	100	4-M8	M10
80	1/30	265	160	175	144	68	97	75	80	145	95	135	232	60	92	115	4-M10	M10
100	1/40	325	192	224	175	83	116	91	100	187	110	160	310	80	130	130	4-M12	M12
120	1/50	389	230	264	200	95	136	100	120	232	130	200	370	95	155	165	4-M12	M14
135	1/60	435	260	300	230	110	144	111	135	264	160	233	425	105	185	200	6-M12	M16

Size	Input Shaft			Output Bore			Oil (l)	Weight (kg)
	HS	U	T * V	S	W	Y		
50	30	12	4 * 2.5	20	5	22.3	0.26	6
60	40	15	5 * 3	25	7	28.3	0.4	8
70	40	18	5 * 3	30	8	33.5	0.7	14
80	50	22	7 * 4	35	10	38.5	1.15	19
100	50	25	7 * 4	40	12	43.5	2.2	36
120	65	30	7 * 4	45	12	48.5	4.8	48
135	75	35	10 * 5	60	15	65	6.3	70





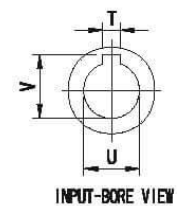
Shaft Direction



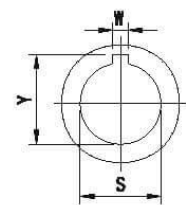
Unit:mm

Size	Ratio	A	AB	AC	B	BB	BD	BE	CC	F	M	N	H	HL	LL	LD	X	Z	Input Bore		
																			U	T	V
50	1/10	174	97	115	110	52	68	50	50	90	58	80	150	35	65	70	4-M6	M8	11	4	12.8
60	1/15	177	97	127	117	55.5	78	54	60	100	70	98	177	42	75	82	4-M6	M10	11	4	12.8
70	1/20	213 223	118 120	154	130	62	88	66	70	125	80	115	205	50	85	100	4-M6	M10	14	5	16.3
80	1/30	235	130	175	144	68	97	75	80	145	95	135	232	60	92	115	4-M10	M10	19	8	21.8
100	1/40	273 275	140 142	224	175	83	116	91	100	187	110	160	310	80	130	130	4-M12	M12	24	8	27.3
120	1/50	339	180	264	200	95	136	100	120	232	130	200	370	95	155	185	4-M12	M14	28	8	31.3
135	1/60	370 393	195 218	300	230	110	144	111	135	264	160	233	425	105	185	200	6-M12	M16	28	8	31.3

Size	Output Bore			Flange					HP	Oil (l)	Weight (kg)
	S	W	Y	LA	LB	LC	LE	Z1			
50	20	5	22.3	130	110	160	4	M8	1/4P 1/2P	0.26	7
60	25	7	28	130	110	160	4	M8	1/4P 1/2P	0.4	9
70	30	8	33.5	130 165	110 130	160 200	4 5	M8 M10	1/2P 1P	0.7	16
80	35	10	38.5	165	130	200	5	M10	1P 2P	1.15	21
100	40	12	43.5	165 215	130 180	200 250	5	M10 M12	2P 3P	2.2	39
120	45	12	48.5	215	180	250	5	M12	3P 5P	4.8	52
135	60	15	65	215 265	180 230	250 300	5	M12 15	5P 7.5P	6.3	74



INPUT-BORE VIEW



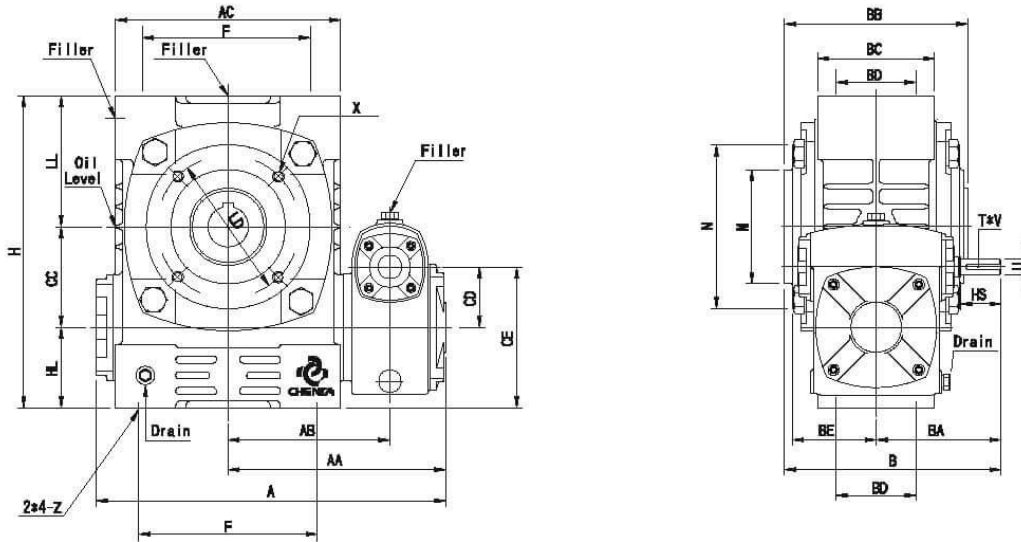
OUTPUT-BORE VIEW



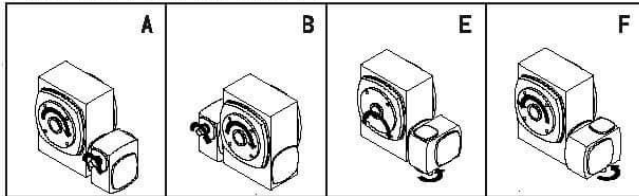
Model : UCF

成大齒輪減速機

Size : 40/70~80/135



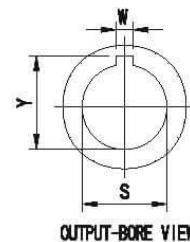
Shaft Direction

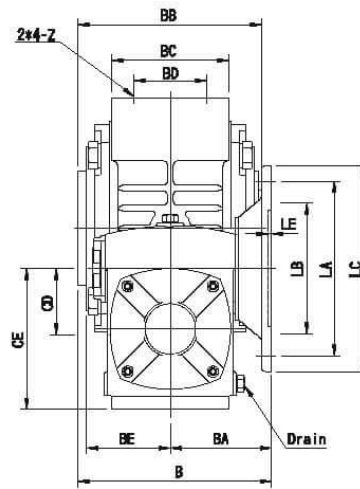
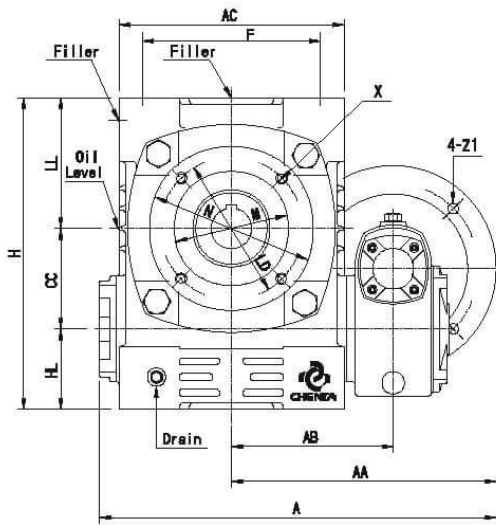


Unit:mm

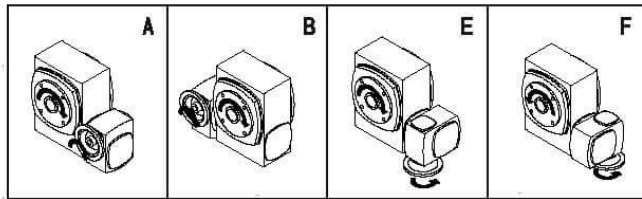
Size	Ratio	A	AA	AB	AC	B	BA	BB	BD	BC	CC	F	CD	CE	H	HL	LL	BE	LD	Z
40-70	1/100	270	175	131	154	148	83	130	66	88	70	125	40	90	205	50	85	62	100	M10
50-80		289	184	132	175	179	107	144	75	97	80	145	50	110	232	60	92	68	115	M10
60-100	1/3600	352	219	161	224	211,5	124	175	91	116	100	187	60	140	310	80	130	83	130	M12
70-120		417	258	192	264	240	140	200	100	136	120	232	70	165	370	95	155	95	165	M14
80-135		462	287	211	300	275	160	230	111	144	135	264	80	185	425	105	185	110	200	M16

Size	M	N	X	Input Shaft			Output Bore			Oil (l)	Weight (kg)
				HS	U	T * V	S	W	Y		
40-70	80	115	4-M8	25	12	4 * 2,5	30	8	33,5	0,65	17
50-80	95	135	4-M10	30	12	4 * 2,5	35	10	38,5	1,05	23
60-100	110	160	4-M12	40	15	5 * 3	40	12	43,5	1,7	42
70-120	130	200	4-M12	40	18	5 * 3	45	12	48,5	3	73
80-135	160	233	6-M12	50	22	7 * 4	60	15	85	4,75	84





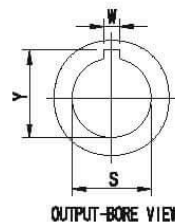
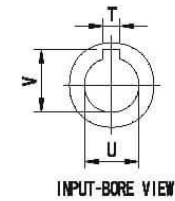
Shaft Direction

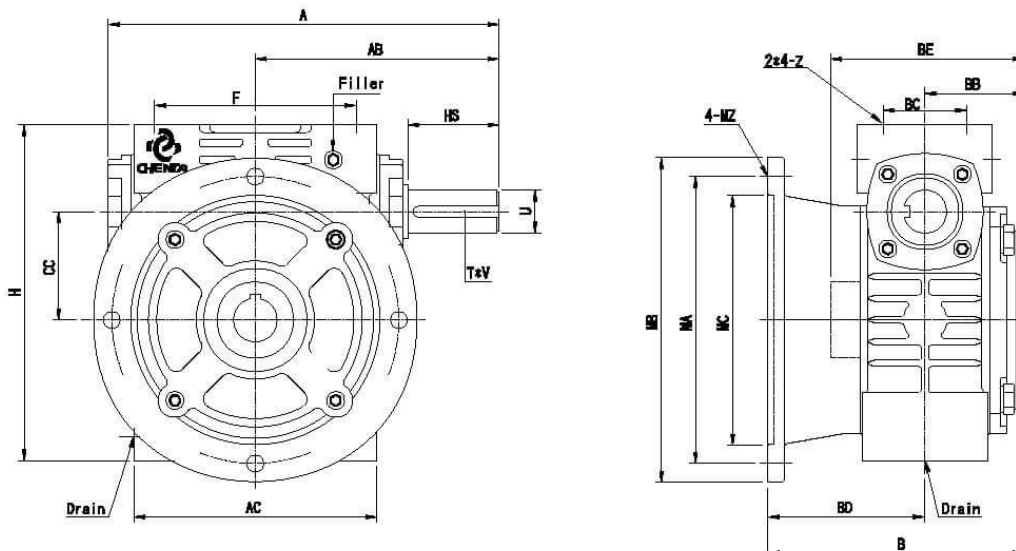


Unit:mm

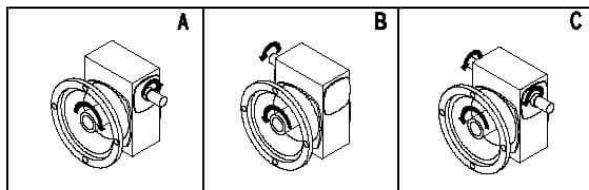
Size	Ratio	A	AA	AB	AC	F	B	BA	BB	BC	BD	BE	CC	CD	CE	H	HL	LL	LD	M	N	X	Z
40-70	1/100	306	211	131	154	125	150	85	130	88	66	62	70	40	90	205	50	85	100	80	115	4-M8	M10
50-80		316	212	132	175	145	169	97	144	97	75	88	80	50	110	232	60	92	115	95	135	4-M10	M10
60-100		374	241	181	224	187	184	97	175	116	91	83	100	60	140	310	80	130	130	110	160	4-M12	M12
70-120	1/3600	431	272	192	264	232	218	118	200	136	100	95	120	70	165	370	95	155	165	130	200	4-M12	M14
80-135		451	292	192	264	232	245	130	230	144	111	110	135	80	185	425	105	185	200	160	233	6-M12	M16

Size	Input Bore			Output Bore			Flange					HP	Oil (l)	Weight (kg)
	U	T	V	S	W	Y	LA	LB	LC	LE	Z1			
40-70	11	4	12.8	30	8	33.5	130	110	160	4	M8	1/4HP	0.65	18
50-80	11	4	12.8	35	10	38.5	130	110	160	4	M8	1/4HP	1.05	24
	14	5	16.3									1/2HP		
60-100	11	4	12.8	40	12	43.5	130	110	160	4	M8	1/4HP	1.7	43
	14	5	16.3									1/2HP		
70-120	14	5	16.3	45	12	48.5	130	110	160	4	M8	1/2HP	3	74
	19	6	21.8									1HP		
80-135	19	6	21.8	60	15	65	165	130	200	4	M10	1HP	4.75	87
	24	8	27.3									2HP		





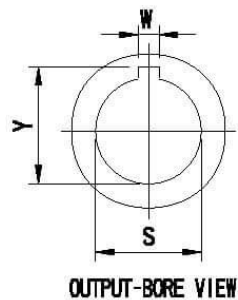
Shaft Direction

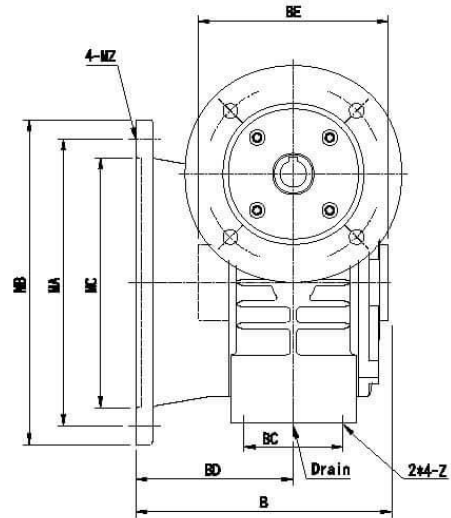
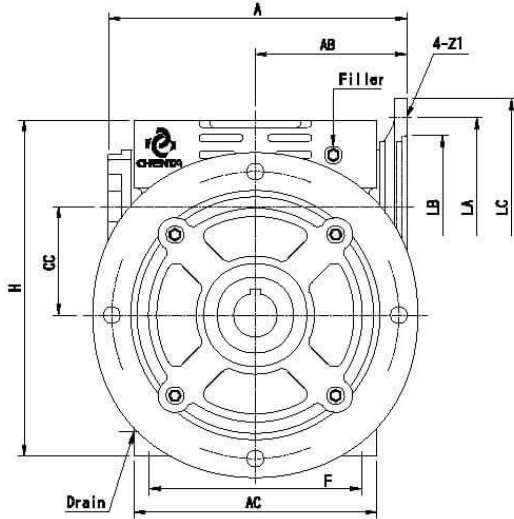


Unit:mm

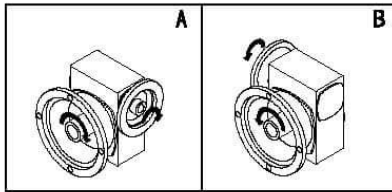
Size	Ratio	A	AB	AC	BC	B	BB	F	BD	BE	CC	H	MA	MB	MC	MZ	Z
50	1/10	181	107	115	50	136	55	90	81	110	50	150	150	180	130	11	M8
60	1/15	204	124	127	54	154,5	58,5	100	96	117	60	177	150	180	130	11	M10
70	1/20	234	140	154	66	180	65	125	115	130	70	205	215	250	180	15	M10
80	1/30	265	160	175	75	177	72	145	105	144	80	232	215	250	180	14	M10
100	1/40	325	192	224	91	232	87,5	187	144,5	175	100	310	285	300	230	15	M12
120	1/50	389	230	264	100	245	100	232	145	200	120	370	300	350	250	19	M14
135	1/60	435	260	300	111	290	115	264	175	230	135	425	350	400	300	19	M16

Size	Input Shaft			Output Bore		Oil (l)	Weight kg
	HS	U	T * V	S	W * Y		
50	30	12	4 * 2,5	20	5 * 22,3	0,26	8
60	40	15	5 * 3	25	7 * 28	0,4	11
70	40	18	5 * 3	30	8 * 33,5	0,7	16
80	50	22	7 * 4	35	10 * 38,5	1,15	21
100	50	25	7 * 4	40	12 * 43,5	2,2	40
120	65	30	7 * 4	45	12 * 48,5	4,8	52
135	75	35	10 * 5	60	15 * 65	6,3	75





Shaft Direction

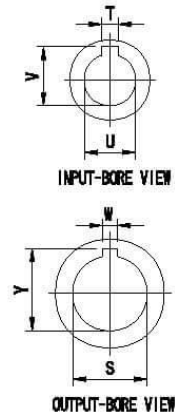


66

Unit:mm

Size	Ratio	A	AB	AC	B	F	BD	BE	CC	BC	H	MA	MB	MC	MZ	Z	Input Bore		
																	U	T	V
50	1/10	168	97	115	136	90	81	110	50	50	150	150	180	130	11	M8	11 14	4 5	12.8 16.3
60	1/15	177	97	127	154.5	100	96	117	60	54	177	150	180	130	11	M10	11 14	4 5	12.8 16.3
70	1/20	213 223	118 120	154	180	125	115	130	70	66	205	215	250	180	15	M10	14 19	5 6	16.3 21.8
80	1/30	235	130	175	177	145	105	144	80	75	232	215	250	180	14	M10	19 24	6 8	21.8 27.3
100	1/40	273 275	140 142	224	232	187	144.5	175	100	91	310	265	300	230	15	M12	24 28	8	27.3 31.3
120	1/50	339	180	284	245	232	145	200	120	100	370	300	350	250	19	M14	28	8	31.3
135	1/60	370 393	195 218	300	290	264	175	230	135	111	425	350	400	300	19	M16	28 36	8 10	31.3 41.5

Size	Output Bore			Flange					HP	Oil (l)	Weight (kg)
	S	W	Y	LA	LB	LC	LE	Z1			
50	20	5	22.3	130	110	160	4	M8	1/4 1/2	0.26	9
60	25	7	28	130	110	180	4	M8	1/4 1/2	0.4	12
70	30	8	33.5	130 165	110 130	180 200	4	M8 M10	1/2 1	0.7	18
80	35	10	38.5	165	130	200	4	M10	1 2	1.15	24
100	40	12	43.5	165 215	130 180	200 250	5	M10 M12	2 3	2.2	43
120	45	12	48.5	215	180	250	5	M12	3 5	4.8	56
135	60	15	65	215 265	180 230	250 300	5	M12 Ø15	5 7.5	6.3	79

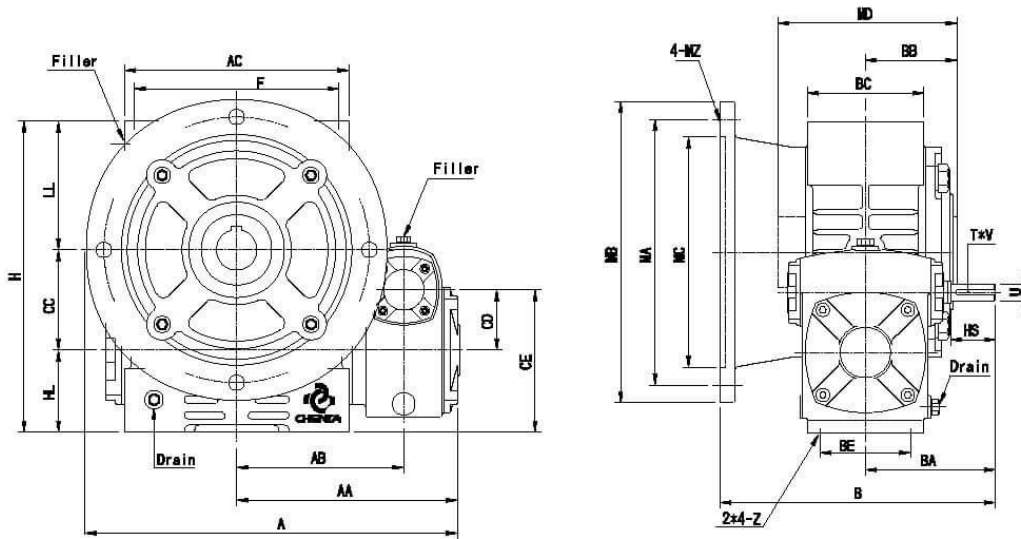




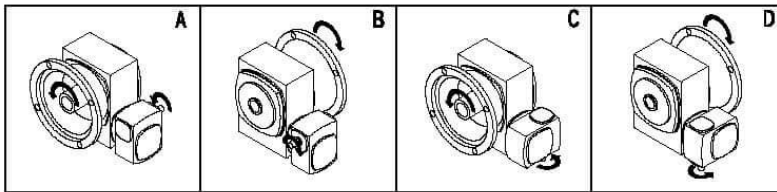
Model : UMF

成大齒輪減速機

Size : 40/70~80/135



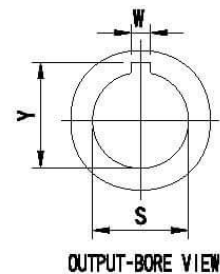
Shaft Direction



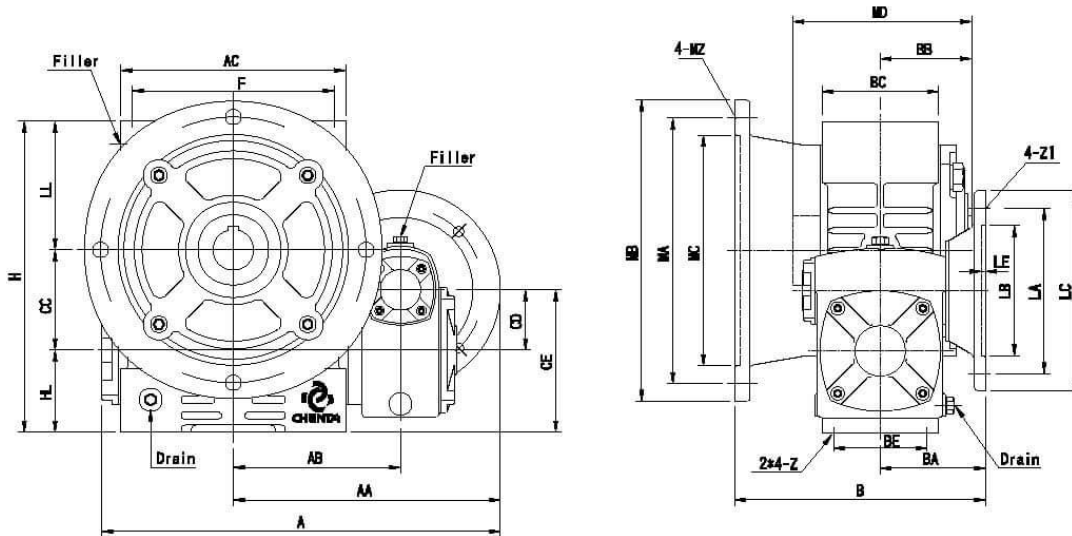
Unit:mm

Size	Ratio	A	AA	AB	AC	F	B	BA	BB	BC	BE	CC	CD	CE	H	HL	LL	Z
40-70	1/100 1/3600	270	175	131	154	125	198	83	65	86	66	70	40	90	205	50	85	M10
50-80		288	184	132	175	145	212	107	72	97	75	80	50	110	232	60	92	M10
60-100		352	219	161	224	187	268.5	124	87.5	116	91	100	80	140	310	80	130	M12
70-120		412	256	192	264	232	285	140	100	136	100	120	70	165	370	95	155	M14
80-135		462	293	211	300	264	335	160	115	144	111	135	80	185	425	105	185	M16

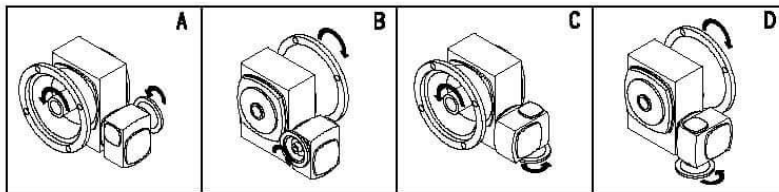
Size	MB	MA	MC	MD	MZ	Input Shaft			Output Bore			Oil (l)	Weight (kg)
						HS	U	T×V	S	W	Y		
40-70	250	215	180	130	15	25	12	4 × 2.5	30	8	33.5	0.65	20
50-80	250	215	180	144	14	30	12	4 × 2.5	35	10	38.5	1.05	27
60-100	300	285	230	175	15	40	15	5 × 3	40	12	43.5	1.7	46
70-120	350	300	250	200	19	40	18	5 × 3	45	12	48.5	3	77
80-135	400	350	300	230	19	50	22	7 × 4	60	15	65	4.75	89



OUTPUT-BORE VIEW



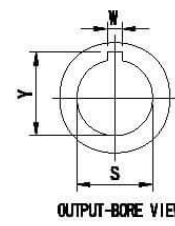
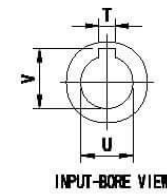
Shaft Direction



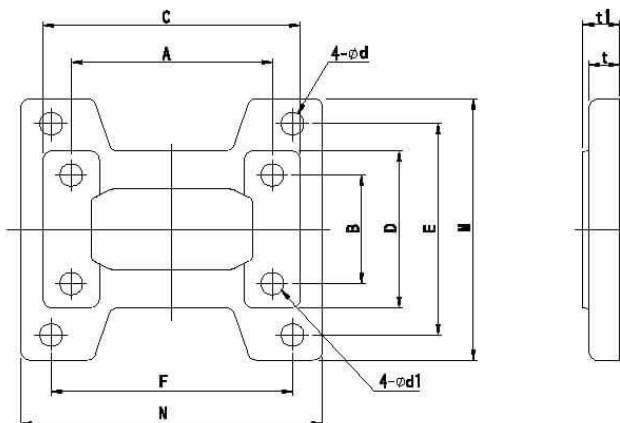
Unit:mm

Size	Ratio	A	AA	AB	AC	F	B	BA	BB	BC	BE	CC	CD	CE	H	HL	LL	Z	MB	MA	MC	MD	MZ
40-70	1/100	306	211	131	154	125	200	85	65	88	66	70	40	90	205	50	85	M10	250	215	180	130	15
50-80		316	212	132	175	145	202	97	72	97	75	80	50	110	232	60	92	M10	250	215	180	144	15
60-100	1/3600	374	241	161	224	187	241,5	97	87,5	116	91	100	60	140	310	80	130	M12	300	265	230	175	15
70-120		431 451	272 292	192	264	232	283 285	118 120	100	136	100	120	70	165	370	95	155	M14	350	300	250	200	19
80-135		481	311	211	300	264	305	130	115	144	111	135	80	185	425	105	185	M16	400	350	300	230	19

Size	Input Bore			Output Bore			Flange					HP	Oil (l)	Weight (kg)
	U	T	V	S	W	Y	LA	LB	LC	LE	Z1			
40-70	11	4	12,8	30	8	33,5	130	110	160	4	M8	1/4HP	0.65	20
50-80	14	4,5	12,8 16,3	35	10	38,5	130	110	160	4	M8	1/4HP 1/2HP	1.05	27
60-100	14	4,5	12,8 16,3	40	12	43,5	130	110	160	4	M8	1/4HP 1/2HP	1.7	47
70-120	14 19	5 6	16,3 21,8	45	12	48,5	130 165	110 130	160 200	4 5	M8 M10	1/2HP 1HP	3	78
80-135	19 24	6 8	21,8 27,3	60	15	65	165	130	200	5	M10	1HP 2HP	4.75	92



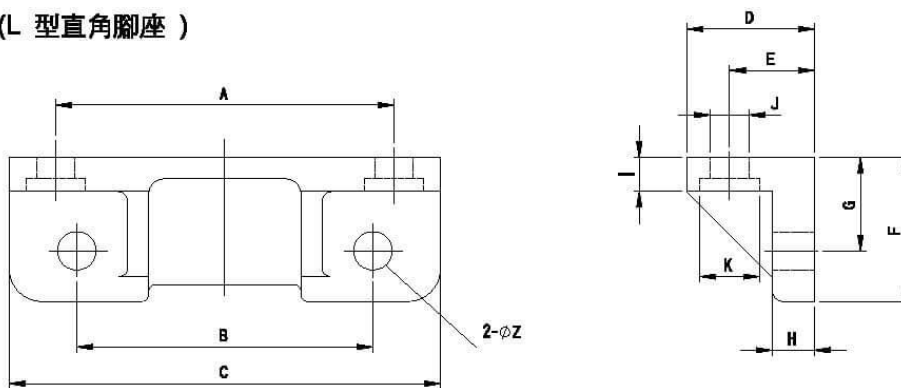
Type:H-Base (H 型平底腳座)



Unit:mm

Size	A	B	C	D	E	F	M	N	t	t1	d	d1
40	80	54	102	68	90	100	110	125	11	13	10	8.7
50	90	50	115	68	95	110	120	140	13	15	11	9
60	100	54	127	78	105	120	130	150	15	18	11	11
70	125	66	156	92	115	150	150	190	18	20	15	11
80	145	75	174	100	135	160	170	220	18	20	15	11
100	187	91	224	120	155	220	190	270	22	25	15	14
120	232	100	264	140	180	260	230	320	26	30	18	17
135	264	111	294	154	200	290	250	350	26	30	18	17

Type:L-Base (L 型直角腳座)



Unit:mm

Size	A	B	C	D	E	F	G	H	I	J	K	Z
40	80	80	102	38	30	34	22	10	8	8	14	9
50	90	90	115	46	32	40	25	14	9	9	14	11
60	100	100	127	50	33.5	45	30	15	12	11	17	11
70	125	120	155	50	34	50	35	18	14	11	17	15
80	145	140	175	54	36.5	60	40	20	18	11	17	15
100	187	190	224	70	47.5	60	40	20	18	14	20	15
120	232	220	264	80	52	62.5	40	24	18	16	23	18
135	264	260	300	86	61.5	68	45	28	24	18	26	18

蝸輪單段減速機型

出力軸許可傳達馬力及許可扭力矩表

Single Reduction

Rating Table

每日 8~10 小時連續運轉並在平均負荷
*applies for continuous service free from recurrent shock loading and does not exceed 10 hours per day

SIZE	RATIO	INPUT RPM	1800	1500	1200	900	600	300
40	1/10	1. Input HP (hp)	0.83	0.77	0.67	0.56	0.43	0.23
		2. Output HP (hp)	0.65	0.6	0.51	0.43	0.32	0.16
		3. Output Torque (kg-m)	2.6	2.8	3.1	3.4	3.8	3.8
		4. Output OHL (kg)	70	70	70	70	70	70
	1/15	1. Input HP (hp)	0.41	0.37	0.33	0.27	0.2	0.11
		2. Output HP (hp)	0.28	0.25	0.20	0.17	0.11	0.04
		3. Output Torque (kg-m)	2.3	2.5	2.8	3.2	3.5	3.8
		4. Output OHL (kg)	70	70	70	70	70	70
	1/20	1. Input HP (hp)	0.39	0.35	0.31	0.27	0.2	0.12
		2. Output HP (hp)	0.27	0.24	0.21	0.17	0.12	0.08
		3. Output Torque (kg-m)	2.1	2.3	2.5	2.8	3.1	3.7
		4. Output OHL (kg)	70	70	70	70	70	70
	1/30	1. Input HP (hp)	0.43	0.4	0.34	0.27	0.2	0.09
		2. Output HP (hp)	0.28	0.25	0.21	0.16	0.11	0.04
		3. Output Torque (kg-m)	3.3	3.5	3.8	3.8	3.8	3.8
		4. Output OHL (kg)	70	70	70	70	70	70
	1/40	1. Input HP (hp)	0.27	0.24	0.21	0.19	0.15	0.08
		2. Output HP (hp)	0.15	0.15	0.12	0.11	0.07	0.04
		3. Output Torque (kg-m)	2.5	2.6	2.8	3.1	3.4	3.8
		4. Output OHL (kg)	70	70	70	70	70	70
	1/50	1. Input HP (hp)	0.25	0.23	0.2	0.17	0.12	0.07
		2. Output HP (hp)	0.15	0.12	0.11	0.11	0.05	0.03
		3. Output Torque (kg-m)	2.8	3.0	3.2	3.5	3.8	3.8
		4. Output OHL (kg)	70	70	70	70	70	70
1/60	1. Input HP (hp)	0.2	0.19	0.16	0.15	0.11	0.07	
	2. Output HP (hp)	0.11	0.09	0.08	0.07	0.04	0.03	
	3. Output Torque (kg-m)	2.4	2.6	2.7	3.0	3.2	3.8	
	4. Output OHL (kg)	70	70	70	70	70	70	
SIZE	RATIO	INPUT RPM	1800	1500	1200	900	600	300
50	1/10	1. Input HP (hp)	1.23	1.16	1.01	0.86	0.58	0.31
		2. Output HP (hp)	0.99	0.93	0.80	0.67	0.45	0.23
		3. Output Torque (kg-m)	3.95	4.47	4.80	5.33	5.43	5.43
		4. Output OHL (kg)	90	100	110	120	140	200
	1/15	1. Input HP (hp)	0.95	0.85	0.74	0.61	0.41	0.22
		2. Output HP (hp)	0.73	0.65	0.56	0.45	0.30	0.15
		3. Output Torque (kg-m)	4.38	4.64	5.06	5.43	5.43	5.43
		4. Output OHL (kg)	110	120	130	140	160	200
	1/20	1. Input HP (hp)	0.71	0.63	0.55	0.48	0.35	0.17
		2. Output HP (hp)	0.50	0.44	0.38	0.32	0.23	0.11
		3. Output Torque (kg-m)	4.00	4.25	4.58	5.07	5.43	5.43
		4. Output OHL (kg)	130	140	155	170	200	200
	1/30	1. Input HP (hp)	0.62	0.55	0.45	0.36	0.25	0.12
		2. Output HP (hp)	0.42	0.37	0.30	0.23	0.15	0.07
		3. Output Torque (kg-m)	5.02	5.31	5.43	5.43	5.34	5.34
		4. Output OHL (kg)	150	170	180	200	200	200
	1/40	1. Input HP (hp)	0.47	0.43	0.39	0.32	0.22	0.13
		2. Output HP (hp)	0.28	0.25	0.22	0.17	0.11	0.06
		3. Output Torque (kg-m)	4.53	4.82	5.41	5.43	5.43	5.43
		4. Output OHL (kg)	170	180	200	200	200	200
	1/50	1. Input HP (hp)	0.39	0.37	0.31	0.26	0.18	0.09
		2. Output HP (hp)	0.23	0.21	0.17	0.14	0.09	0.04
		3. Output Torque (kg-m)	4.82	4.91	5.19	5.43	5.43	5.43
		4. Output OHL (kg)	200	200	200	200	200	200
1/60	1. Input HP (hp)	0.33	0.30	0.26	0.23	0.15	0.07	
	2. Output HP (hp)	0.18	0.16	0.13	0.11	0.07	0.03	
	3. Output Torque (kg-m)	4.31	4.61	4.83	5.41	5.43	5.43	
	4. Output OHL (kg)	200	200	200	200	200	200	

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蝸輪單段減速機型

出力軸許可傳達馬力及許可扭力矩表

Single Reduction Rating Table

每日 8~10 小時連續運轉並在平均負荷
 *applies for continuous service free from recurrent shock loading and does not exceed 10 hours per day

SIZE	RATIO	INPUT RPM	1800	1500	1200	900	600	300
60	1/10	1. Input HP (hp)	2.52	2.01	1.76	1.52	1.19	0.64
		2. Output HP (hp)	1.78	1.63	1.41	1.20	0.92	0.48
		3. Output Torque (kg-m)	7.09	7.82	8.45	9.62	11.0	11.6
		4. Output OHL (kg)	90	100	110	120	140	200
	1/15	1. Input HP (hp)	1.68	1.53	1.36	1.13	0.89	0.46
		2. Output HP (hp)	1.32	1.18	1.04	0.85	0.65	0.32
		3. Output Torque (kg-m)	7.92	8.50	9.30	10.2	11.6	11.6
		4. Output OHL (kg)	110	120	130	140	160	200
	1/20	1. Input HP (hp)	1.18	1.05	0.95	0.79	0.64	0.37
		2. Output HP (hp)	0.89	0.79	0.69	0.57	0.44	0.24
		3. Output Torque (kg-m)	7.09	7.58	8.20	9.00	10.4	11.6
		4. Output OHL (kg)	130	140	155	170	200	200
	1/30	1. Input HP (hp)	1.07	0.98	0.87	0.74	0.52	0.28
		2. Output HP (hp)	0.75	0.67	0.58	0.48	0.32	0.16
		3. Output Torque (kg-m)	9.0	9.60	10.3	11.5	11.6	11.6
		4. Output OHL (kg)	150	170	180	200	200	200
	1/40	1. Input HP (hp)	0.78	0.71	0.64	0.54	0.43	0.24
		2. Output HP (hp)	0.51	0.45	0.39	0.32	0.24	0.12
		3. Output Torque (kg-m)	8.06	8.60	9.20	10.3	11.5	11.6
		4. Output OHL (kg)	170	180	200	200	200	200
	1/50	1. Input HP (hp)	0.61	0.55	0.51	0.43	0.35	0.20
		2. Output HP (hp)	0.36	0.32	0.28	0.23	0.17	0.09
		3. Output Torque (kg-m)	7.10	7.60	8.30	9.10	10.2	11.6
		4. Output OHL (kg)	180	200	200	200	200	200
1/60	1. Input HP (hp)	0.51	0.47	0.42	0.35	0.29	0.19	
	2. Output HP (hp)	0.29	0.26	0.22	0.18	0.14	0.08	
	3. Output Torque (kg-m)	6.90	7.40	8.00	8.70	9.70	11.3	
	4. Output OHL (kg)	200	200	200	200	200	200	
SIZE	RATIO	INPUT RPM	1800	1500	1200	900	600	300
70	1/10	1. Input HP (hp)	3.27	3.01	2.68	2.24	1.75	1.15
		2. Output HP (hp)	2.69	2.45	2.16	1.79	1.36	0.86
		3. Output Torque (kg-m)	10.7	11.7	12.9	14.3	16.3	20.7
		4. Output OHL (kg)	140	150	160	170	200	300
	1/15	1. Input HP (hp)	2.60	2.37	2.04	1.72	1.36	0.86
		2. Output HP (hp)	2.04	1.84	1.57	1.30	1.00	0.61
		3. Output Torque (kg-m)	12.2	13.2	14.1	15.6	18.0	21.9
		4. Output OHL (kg)	170	180	200	220	250	300
	1/20	1. Input HP (hp)	1.83	1.66	1.44	1.17	0.86	0.50
		2. Output HP (hp)	1.42	1.27	1.09	0.87	0.62	0.34
		3. Output Torque (kg-m)	11.3	12.1	13.0	13.9	14.7	16.0
		4. Output OHL (kg)	210	230	250	270	300	300
	1/30	1. Input HP (hp)	1.56	1.41	1.26	1.06	0.85	0.51
		2. Output HP (hp)	1.12	0.98	0.85	0.71	0.53	0.29
		3. Output Torque (kg-m)	13.4	14.2	15.2	17.0	19.0	20.5
		4. Output OHL (kg)	240	260	280	300	300	300
	1/40	1. Input HP (hp)	1.18	1.07	0.94	0.77	0.56	0.33
		2. Output HP (hp)	0.81	0.72	0.62	0.49	0.34	0.18
		3. Output Torque (kg-m)	12.9	13.7	14.8	15.5	16.2	17.4
		4. Output OHL (kg)	270	280	300	300	300	300
	1/50	1. Input HP (hp)	0.87	0.79	0.71	0.61	0.50	0.30
		2. Output HP (hp)	0.52	0.46	0.40	0.33	0.25	0.15
		3. Output Torque (kg-m)	10.4	11.0	11.9	13.1	14.8	17.4
		4. Output OHL (kg)	280	300	300	300	300	300
1/60	1. Input HP (hp)	0.75	0.68	0.63	0.51	0.43	0.28	
	2. Output HP (hp)	0.44	0.39	0.34	0.27	0.21	0.12	
	3. Output Torque (kg-m)	10.4	11.1	12.0	13.1	14.7	17.1	
	4. Output OHL (kg)	300	300	300	300	300	300	

蝸輪單段減速機型

出力軸許可傳達馬力及許可扭力矩表

Single Reduction

Rating Table

每日 8~10 小時連續運轉並在平均負荷
*applies for continuous service free from recurrent shock loading and does not exceed 10 hours per day

SIZE	RATIO	INPUT RPM	1800	1500	1200	900	600	300
80	1/10	1. Input HP (hp)	4.50	4.36	3.81	3.20	2.57	1.56
		2. Output HP (hp)	3.72	3.55	3.08	2.56	2.01	1.18
		3. Output Torque (kg-m)	14.8	17.0	18.4	20.5	24.0	28.3
		4. Output OHL (kg)	160	180	200	230	270	400
	1/15	1. Input HP (hp)	3.60	3.27	2.88	2.41	1.97	1.26
		2. Output HP (hp)	2.84	2.56	2.21	1.83	1.46	0.87
		3. Output Torque (kg-m)	17.0	18.4	19.8	21.9	26.2	31.2
		4. Output OHL (kg)	230	240	260	280	330	400
	1/20	1. Input HP (hp)	2.48	2.25	1.97	1.65	1.32	0.87
		2. Output HP (hp)	1.91	1.71	1.47	1.21	0.93	0.57
		3. Output Torque (kg-m)	15.2	16.3	17.5	19.2	22.3	27.3
		4. Output OHL (kg)	270	280	320	360	400	400
	1/30	1. Input HP (hp)	2.09	1.90	1.65	1.43	1.14	0.75
		2. Output HP (hp)	1.51	1.34	1.14	0.96	0.73	0.44
		3. Output Torque (kg-m)	18.1	19.2	20.5	22.9	26.2	31.4
		4. Output OHL (kg)	320	340	360	400	400	400
	1/40	1. Input HP (hp)	1.80	1.47	1.29	1.10	0.88	0.54
		2. Output HP (hp)	1.08	0.96	0.38	0.68	0.52	0.28
		3. Output Torque (kg-m)	17.2	18.3	19.7	21.8	24.7	26.4
		4. Output OHL (kg)	340	360	400	400	400	400
	1/50	1. Input HP (hp)	1.28	1.17	1.05	0.88	0.72	0.45
		2. Output HP (hp)	0.84	0.75	0.65	0.53	0.40	0.23
		3. Output Torque (kg-m)	16.8	17.8	19.3	21.2	23.9	28.0
		4. Output OHL (kg)	360	400	400	400	400	400
1/60	1. Input HP (hp)	1.03	0.95	0.85	0.73	0.58	0.39	
	2. Output HP (hp)	0.82	0.55	0.48	0.39	0.29	0.17	
	3. Output Torque (kg-m)	14.9	15.7	17.2	18.7	21.0	24.6	
	4. Output OHL (kg)	400	400	400	400	400	400	
SIZE	RATIO	INPUT RPM	1800	1500	1200	900	600	300
100	1/10	1. Input HP (hp)	6.50	5.98	5.26	4.49	3.51	2.27
		2. Output HP (hp)	5.73	4.90	4.30	3.64	2.78	1.74
		3. Output Torque (kg-m)	21.4	23.4	25.7	29.0	33.2	41.5
		4. Output OHL (kg)	190	200	220	240	300	450
	1/15	1. Input HP (hp)	5.14	4.49	4.00	3.36	2.65	1.70
		2. Output HP (hp)	4.10	3.54	3.13	2.59	2.00	1.22
		3. Output Torque (kg-m)	23.9	25.4	28.0	31.0	35.8	44.0
		4. Output OHL (kg)	200	250	270	300	340	450
	1/20	1. Input HP (hp)	4.42	3.99	3.48	2.92	2.31	1.51
		2. Output HP (hp)	3.35	3.14	2.71	2.23	1.73	1.06
		3. Output Torque (kg-m)	28.0	30.0	32.3	35.5	41.3	50.0
		4. Output OHL (kg)	250	270	300	340	450	450
	1/30	1. Input HP (hp)	3.69	3.33	2.93	2.47	1.97	1.15
		2. Output HP (hp)	2.70	2.40	2.06	1.71	1.31	0.70
		3. Output Torque (kg-m)	32.2	34.4	36.9	40.8	46.8	50.0
		4. Output OHL (kg)	320	340	370	450	450	450
	1/40	1. Input HP (hp)	2.78	2.52	2.20	1.88	1.48	0.89
		2. Output HP (hp)	2.00	1.77	1.52	1.26	0.96	0.52
		3. Output Torque (kg-m)	31.8	33.8	36.3	40.2	45.7	50.0
		4. Output OHL (kg)	350	380	450	450	450	450
	1/50	1. Input HP (hp)	2.29	2.06	1.84	1.55	1.23	0.76
		2. Output HP (hp)	1.59	1.40	1.22	1.00	0.75	0.42
		3. Output Torque (kg-m)	31.6	33.4	36.5	40.0	45.0	50.0
		4. Output OHL (kg)	390	450	450	450	450	450
1/60	1. Input HP (hp)	1.87	1.70	1.53	1.28	1.02	0.65	
	2. Output HP (hp)	1.26	1.12	0.97	0.80	0.59	0.34	
	3. Output Torque (kg-m)	30.0	32.0	34.6	38.0	42.4	49.3	
	4. Output OHL (kg)	450	450	450	450	450	450	

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SIZE	RATIO	INPUT RPM	1800	1500	1200	900	600	300
120	1/10	1. Input HP (hp)	10.7	10.1	8.58	7.40	5.75	3.74
		2. Output HP (hp)	8.89	8.35	7.03	6.01	4.60	2.89
		3. Output Torque (kg-m)	35.4	39.9	42.0	47.9	55.0	69.1
		4. Output OHL (kg)	250	260	280	300	350	520
	1/15	1. Input HP (hp)	8.34	7.46	6.85	5.52	4.55	2.85
		2. Output HP (hp)	6.88	5.94	5.25	4.30	3.47	2.08
		3. Output Torque (kg-m)	39.9	42.6	47.0	51.4	62.1	74.5
		4. Output OHL (kg)	320	340	360	390	440	520
	1/20	1. Input HP (hp)	6.85	6.31	5.53	4.68	3.70	1.95
		2. Output HP (hp)	5.40	4.92	4.26	3.53	2.71	1.68
		3. Output Torque (kg-m)	43.0	47.0	50.9	56.2	64.6	80.0
		4. Output OHL (kg)	370	390	420	460	520	520
	1/30	1. Input HP (hp)	6.27	5.68	5.00	4.18	3.39	1.89
		2. Output HP (hp)	4.64	4.15	3.59	2.92	2.27	1.17
		3. Output Torque (kg-m)	55.4	59.4	64.3	69.8	81.4	84.0
		4. Output OHL (kg)	450	470	500	520	520	520
	1/40	1. Input HP (hp)	4.48	4.07	3.56	3.03	2.44	1.57
		2. Output HP (hp)	3.13	2.79	2.39	1.97	1.51	0.88
		3. Output Torque (kg-m)	49.8	53.2	57.1	62.8	72.2	84.0
		4. Output OHL (kg)	500	500	520	520	520	520
	1/50	1. Input HP (hp)	3.64	3.28	2.90	2.47	1.91	1.19
		2. Output HP (hp)	2.61	2.31	2.01	1.66	1.24	0.70
		3. Output Torque (kg-m)	52.0	55.2	60.1	66.0	74.2	84.0
		4. Output OHL (kg)	500	520	520	520	520	520
1/60	1. Input HP (hp)	2.89	2.65	2.36	2.04	1.45	0.96	
	2. Output HP (hp)	1.98	1.76	1.53	1.26	0.94	0.56	
	3. Output Torque (kg-m)	47.4	50.4	54.9	60.1	67.6	80.0	
	4. Output OHL (kg)	520	520	520	520	520	520	
135	1/10	1. Input HP (hp)	17.7	16.5	14.2	12.0	9.54	6.20
		2. Output HP (hp)	15.0	13.9	11.9	10.0	7.83	4.94
		3. Output Torque (kg-m)	59.7	66.4	71.0	79.6	93.5	117
		4. Output OHL (kg)	330	340	360	440	500	810
	1/15	1. Input HP (hp)	14.6	13.1	11.8	9.80	9.67	4.77
		2. Output HP (hp)	11.9	10.6	9.45	7.75	6.95	3.56
		3. Output Torque (kg-m)	71.0	75.9	84.6	92.5	124	127
		4. Output OHL (kg)	430	460	490	540	590	810
	1/20	1. Input HP (hp)	10.3	9.26	8.14	6.79	5.36	3.47
		2. Output HP (hp)	8.39	7.47	6.48	5.33	4.13	2.54
		3. Output Torque (kg-m)	66.8	71.3	77.4	84.9	98.6	121
		4. Output OHL (kg)	570	600	660	760	810	810
	1/30	1. Input HP (hp)	8.76	7.87	6.86	5.82	4.64	3.02
		2. Output HP (hp)	6.65	5.90	5.07	4.20	3.23	1.96
		3. Output Torque (kg-m)	79.4	84.5	90.8	100	116	140
		4. Output OHL (kg)	680	710	770	810	810	810
	1/40	1. Input HP (hp)	6.44	5.74	5.06	4.38	3.40	2.18
		2. Output HP (hp)	4.79	4.22	3.64	3.06	2.31	1.36
		3. Output Torque (kg-m)	76.3	80.7	86.9	97.4	110	130
		4. Output OHL (kg)	710	770	810	810	810	810
	1/50	1. Input HP (hp)	4.84	4.41	3.90	3.34	2.61	1.69
		2. Output HP (hp)	3.52	3.16	2.73	2.26	1.71	1.01
		3. Output Torque (kg-m)	70	75.5	81.4	90.1	102	120
		4. Output OHL (kg)	770	810	810	810	810	810
1/60	1. Input HP (hp)	3.65	3.58	3.16	2.74	2.11	1.37	
	2. Output HP (hp)	2.55	2.40	2.12	1.76	1.32	0.77	
	3. Output Torque (kg-m)	60.8	70.0	76.0	83.9	94.4	111	
	4. Output OHL (kg)	810	810	810	810	810	810	



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SIZE	RATIO	INPUT RPM	1800	1500	1200	900	600	300
155	1/10	1. Input HP (hp)	21.7	21.7	19.0	16.2	12.7	8.41
		2. Output HP (hp)	18.3	18.3	16.0	13.5	10.4	6.70
		3. Output Torque (kg-m)	73	84.4	92.3	104	120	154
		4. Output OHL (kg)	750	860	900	990	1130	1700
	1/15	1. Input HP (hp)	16.9	16.9	15.0	12.5	9.97	6.52
		2. Output HP (hp)	13.9	13.9	12.2	10	7.80	4.90
		3. Output Torque (kg-m)	83	96.3	105	115	135	169
		4. Output OHL (kg)	900	1050	1130	1270	1420	1700
	1/20	1. Input HP (hp)	15.52	14.0	12.2	10.4	8.24	5.23
		2. Output HP (hp)	12.6	11.3	9.70	8.20	6.30	3.80
		3. Output Torque (kg-m)	100	108	116	130	150	181
		4. Output OHL (kg)	1220	1280	1380	1510	1700	1700
	1/30	1. Input HP (hp)	12.5	11.3	9.93	8.33	6.81	4.49
		2. Output HP (hp)	9.50	8.50	7.30	6.00	4.70	2.90
		3. Output Torque (kg-m)	109	118	126	138	162	201
		4. Output OHL (kg)	1380	1470	1570	1700	1700	1700
	1/40	1. Input HP (hp)	9.65	8.81	7.70	6.35	5.31	3.44
		2. Output HP (hp)	7.15	6.38	5.50	4.40	3.52	2.10
		3. Output Torque (kg-m)	114	122	131	140	168	200
		4. Output OHL (kg)	1490	1600	1700	1700	1700	1700
	1/50	1. Input HP (hp)	7.53	6.86	5.89	4.93	4.14	2.46
		2. Output HP (hp)	5.40	4.84	4.07	3.30	2.64	1.43
		3. Output Torque (kg-m)	107	115	121	131	157	170
		4. Output OHL (kg)	1600	1700	1700	1700	1700	1700
1/60	1. Input HP (hp)	6.14	5.43	4.91	4.24	3.38	2.16	
	2. Output HP (hp)	4.29	3.74	3.30	2.75	2.09	1.21	
	3. Output Torque (kg-m)	102	107	118	131	149	173	
	4. Output OHL (kg)	1700	1700	1700	1700	1700	1700	
SIZE	RATIO	INPUT RPM	1800	1500	1200	900	600	300
175	1/10	1. Input HP (hp)	30.7	30.7	27.7	23.0	18.2	11.8
		2. Output HP (hp)	26.1	26.1	23.4	19.3	15.0	9.50
		3. Output Torque (kg-m)	104	120	135	148	173	219
		4. Output OHL (kg)	850	980	1050	1130	1300	2000
	1/15	1. Input HP (hp)	24.4	24.4	21.5	18.3	14.1	9.40
		2. Output HP (hp)	20.2	20.2	17.6	14.8	11.2	7.20
		3. Output Torque (kg-m)	120	140	152	170	194	249
		4. Output OHL (kg)	1050	1210	1300	1420	1630	2000
	1/20	1. Input HP (hp)	21.0	19.0	16.9	14.0	10.9	7.11
		2. Output HP (hp)	17.2	15.4	13.5	11.1	8.40	5.25
		3. Output Torque (kg-m)	133	143	157	172	195	244
		4. Output OHL (kg)	1280	1350	1450	1600	2000	2000
	1/30	1. Input HP (hp)	17.7	15.8	14.2	11.9	9.54	6.11
		2. Output HP (hp)	13.6	12.0	10.6	8.70	6.70	4.00
		3. Output Torque (kg-m)	157	186	183	200	232	278
		4. Output OHL (kg)	1420	1580	1630	2000	2000	2000
	1/40	1. Input HP (hp)	13.2	11.9	10.5	8.82	7.22	4.56
		2. Output HP (hp)	9.87	8.72	7.58	6.19	4.83	2.83
		3. Output Torque (kg-m)	153	162	176	193	225	264
		4. Output OHL (kg)	1670	1760	2000	2000	2000	2000
	1/50	1. Input HP (hp)	9.60	8.98	7.87	7.12	5.47	3.54
		2. Output HP (hp)	7.00	6.40	5.50	4.84	3.52	2.09
		3. Output Torque (kg-m)	139	153	164	192	210	249
		4. Output OHL (kg)	1900	2000	2000	2000	2000	2000
1/60	1. Input HP (hp)	7.73	6.88	6.08	5.22	4.12	2.70	
	2. Output HP (hp)	5.70	5.00	4.30	3.61	2.72	1.64	
	3. Output Torque (kg-m)	132	139	149	167	189	226	
	4. Output OHL (kg)	2000	2000	2000	2000	2000	2000	

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SIZE	RATIO	INPUT RPM	1800	1500	1200	900	600	300
200	1/10	1. Input HP (hp)	52.6	39.4	35.0	29.7	23.0	15.0
		2. Output HP (hp)	44.0	33.6	29.7	25.0	19.1	12.2
		3. Output Torque (kg-m)	181	165	183	205	235	300
		4. Output OHL (kg)	1000	1150	1200	1300	1400	2200
	1/15	1. Input HP (hp)	39.5	31.2	27.7	23.3	18.0	11.9
		2. Output HP (hp)	32.1	25.9	22.8	19.0	14.4	9.20
		3. Output Torque (kg-m)	198	192	210	234	266	340
		4. Output OHL (kg)	1200	1350	1440	1520	1670	2200
	1/20	1. Input HP (hp)	27.6	27.6	24.2	20.3	15.8	10.3
		2. Output HP (hp)	22.5	22.5	19.6	16.2	12.3	7.70
		3. Output Torque (kg-m)	180	215	234	258	293	367
		4. Output OHL (kg)	1200	1450	1590	1720	2200	2200
	1/30	1. Input HP (hp)	22.6	22.6	18.8	15.1	12.2	7.90
		2. Output HP (hp)	17.4	17.4	14.2	11.2	8.70	5.34
		3. Output Torque (kg-m)	208	257	262	276	322	394
		4. Output OHL (kg)	1400	1650	1800	2200	2200	2200
	1/40	1. Input HP (hp)	17.9	16.3	14.5	11.9	9.58	6.19
		2. Output HP (hp)	13.6	12.2	10.7	8.61	6.61	4.00
		3. Output Torque (kg-m)	216	233	255	274	315	382
		4. Output OHL (kg)	1750	1850	2200	2200	2200	2200
	1/50	1. Input HP (hp)	13.2	11.9	10.6	9.00	7.20	4.61
		2. Output HP (hp)	9.80	8.62	7.54	6.23	4.74	2.80
		3. Output Torque (kg-m)	195	206	225	248	283	334
		4. Output OHL (kg)	2000	2200	2200	2200	2200	2200
1/60	1. Input HP (hp)	10.8	9.77	8.49	7.41	6.11	3.75	
	2. Output HP (hp)	7.82	6.93	5.90	5.00	3.90	2.20	
	3. Output Torque (kg-m)	184	196	208	235	275	310	
	4. Output OHL (kg)	2200	2200	2200	2200	2200	2200	
SIZE	RATIO	INPUT RPM	1800	1500	1200	900	600	300
225	1/10	1. Input HP (hp)	71.2	52.3	52.3	43.5	33.8	22.1
		2. Output HP (hp)	60.2	44.8	44.8	37.0	28.5	18.3
		3. Output Torque (kg-m)	239	214	267	294	340	437
		4. Output OHL (kg)	1050	1100	1300	1400	1500	2500
	1/15	1. Input HP (hp)	56.8	46.0	40.7	34.2	26.4	17.3
		2. Output HP (hp)	46.9	38.7	34.0	28.3	21.5	13.7
		3. Output Torque (kg-m)	280	277	304	338	385	490
		4. Output OHL (kg)	1300	1400	1500	1600	1800	2500
	1/20	1. Input HP (hp)	38.6	38.6	33.6	27.9	22.0	14.3
		2. Output HP (hp)	31.9	31.9	27.5	23.1	17.5	11.0
		3. Output Torque (kg-m)	254	304	328	387	418	525
		4. Output OHL (kg)	1400	1600	1800	2000	2500	2500
	1/30	1. Input HP (hp)	31.5	31.5	27.0	20.3	18.2	11.7
		2. Output HP (hp)	24.8	24.8	21.0	17.6	13.5	8.30
		3. Output Torque (kg-m)	296	355	376	420	483	594
		4. Output OHL (kg)	1700	1900	2200	2500	2500	2500
	1/40	1. Input HP (hp)	22.5	22.5	19.2	15.8	12.6	8.12
		2. Output HP (hp)	17.2	17.2	14.4	11.6	8.90	5.40
		3. Output Torque (kg-m)	274	328	344	369	425	515
		4. Output OHL (kg)	2000	2200	2500	2500	2500	2500
	1/50	1. Input HP (hp)	18.1	16.3	14.3	12.3	9.81	6.25
		2. Output HP (hp)	13.6	12.0	10.4	8.60	6.60	3.90
		3. Output Torque (kg-m)	270	286	310	342	394	465
		4. Output OHL (kg)	2300	2500	2500	2500	2500	2500
1/60	1. Input HP (hp)	15.1	13.6	11.9	10.1	8.05	5.27	
	2. Output HP (hp)	11.2	9.90	8.50	7.00	5.30	3.20	
	3. Output Torque (kg-m)	259	275	295	324	368	444	
	4. Output OHL (kg)	2500	2500	2500	2500	2500	2500	



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SIZE	RATIO	INPUT RPM	1800	1500	1200	900	600	300
250	1/10	1. Input HP (hp)	96.5	65.8	65.8	55.3	43.5	28.1
		2. Output HP (hp)	81.3	56.3	56.3	46.9	36.5	23.1
		3. Output Torque (kg-m)	323	269	336	373	435	551
		4. Output OHL (kg)	1100	1200	1500	1600	1700	2700
	1/15	1. Input HP (hp)	72.3	51.6	51.6	43.7	33.9	22.3
		2. Output HP (hp)	59.3	43	43.0	36.0	27.5	17.5
		3. Output Torque (kg-m)	354	308	385	430	492	626
		4. Output OHL (kg)	1360	1400	1800	2000	2300	2700
	1/20	1. Input HP (hp)	42.3	42.3	42.3	35.6	27.5	17.9
		2. Output HP (hp)	34.8	34.8	34.8	29.0	22.0	13.8
		3. Output Torque (kg-m)	277	332	425	473	538	675
		4. Output OHL (kg)	1600	1700	2300	2550	2700	2700
	1/30	1. Input HP (hp)	34.9	34.9	34.9	29.8	23.2	15.4
		2. Output HP (hp)	27	27	27.0	22.6	17.1	10.7
		3. Output Torque (kg-m)	322	387	483	539	612	766
		4. Output OHL (kg)	1900	2000	2460	2700	2700	2700
	1/40	1. Input HP (hp)	27.9	27.9	24.5	20.8	16.5	10.7
		2. Output HP (hp)	21.5	21.5	18.5	15.4	11.1	7.24
		3. Output Torque (kg-m)	342	420	452	502	577	708
		4. Output OHL (kg)	2200	2500	2700	2700	2700	2700
	1/50	1. Input HP (hp)	22.6	20.6	18.2	15.4	12.3	7.80
		2. Output HP (hp)	17.4	15.5	13.4	11.1	8.49	5.04
		3. Output Torque (kg-m)	360	385	416	460	528	626
		4. Output OHL (kg)	2500	2700	2700	2700	2700	2700
1/60	1. Input HP (hp)	18.7	16.9	14.7	12.8	10.1	6.41	
	2. Output HP (hp)	14.1	12.5	10.7	9.00	6.80	4.00	
	3. Output Torque (kg-m)	336	358	383	430	487	573	
	4. Output OHL (kg)	2700	2700	2700	2700	2700	2700	
SIZE	RATIO	INPUT RPM	1800	1500	1200	900	600	300
300	1/10	1. Input HP (hp)	146	133	120	101	78	52
		2. Output HP (hp)	123	111	100	84	65	42
		3. Output Torque (kg-m)	516	563	631	704	814	1056
		4. Output OHL (kg)	2590	2710	2860	3090	3460	3800
	1/15	1. Input HP (hp)	115	105	92	78	61	40
		2. Output HP (hp)	96	87.2	76	64	49	31
		3. Output Torque (kg-m)	564	616	679	767	874	1106
		4. Output OHL (kg)	2910	3040	3210	3480	380	3800
	1/20	1. Input HP (hp)	86	79	68	58	45	30
		2. Output HP (hp)	70	65	56	47	36	22
		3. Output Torque (kg-m)	573	631	680	759	876	1100
		4. Output OHL (kg)	3150	3280	3500	3790	3800	3800
	1/30	1. Input HP (hp)	69	62	54	45	36	23
		2. Output HP (hp)	54	48	42	35	27	16
		3. Output Torque (kg-m)	658	708	765	848	976	1196
		4. Output OHL (kg)	3580	3800	3800	3800	3800	3800
	1/40	1. Input HP (hp)	53	47	41	34	28	18
		2. Output HP (hp)	40	35	31	25	19	12
		3. Output Torque (kg-m)	665	710	771	849	979	1186
		4. Output OHL (kg)	3800	3800	3800	3800	3800	3800
	1/50	1. Input HP (hp)	40	36	32	28	21	14
		2. Output HP (hp)	30	27	23	20	14	9
		3. Output Torque (kg-m)	612	659	713	828	888	1074
		4. Output OHL (kg)	3800	3800	3800	3800	3800	3800
1/60	1. Input HP (hp)	32	28	25	21	16	11	
	2. Output HP (hp)	23	21	18	15	11	6	
	3. Output Torque (kg-m)	571	608	660	729	811	980	
	4. Output OHL (kg)	3800	3800	3800	3800	3800	3800	

蝸輪單段減速機型

出力軸許可傳達馬力及許可扭力矩表

Single Reduction Rating Table

每日 8~10 小時連續運轉並在平均負荷
 *applies for continuous service free from recurrent shock loading and does not exceed 10 hours per day

SIZE	RATIO	INPUT RPM	1800	1500	1200	900	600	300
350	1/10	1. Input HP (hp)	-	185	165	141	110	73
		2. Output HP (hp)	-	156	139	118	92	59
		3. Output Torque (kg-m)	-	788	876	993	1161	1493
		4. Output OHL (kg)	-	3260	3430	3680	4080	4890
	1/15	1. Input HP (hp)	-	153	138	115	90	59
		2. Output HP (hp)	-	127	114	94	73	46
		3. Output Torque (kg-m)	-	926	1044	1152	1332	1706
		4. Output OHL (kg)	-	3680	3850	4170	4650	5100
	1/20	1. Input HP (hp)	140	129	111	95	74	48
		2. Output HP (hp)	115	106	91	77	59	37
		3. Output Torque (kg-m)	933	1030	1111	1257	1441	1798
		4. Output OHL (kg)	3900	4000	4320	4640	5100	5100
	1/30	1. Input HP (hp)	-	89	78	66	52	34
		2. Output HP (hp)	-	69	60	50	38	24
		3. Output Torque (kg-m)	-	1043	1133	1263	1461	1792
		4. Output OHL (kg)	-	4870	5100	5100	5100	5100
	1/40	1. Input HP (hp)	79	70	62	52	41	27
		2. Output HP (hp)	59	53	47	39	29	18
		3. Output Torque (kg-m)	991	1061	1171	1297	1475	1782
		4. Output OHL (kg)	5100	5100	5100	5100	5100	5100
	1/50	1. Input HP (hp)	62	56	49	41	44	29
		2. Output HP (hp)	46	42	36	30	31	19
		3. Output Torque (kg-m)	926	999	1081	1197	1357	1647
		4. Output OHL (kg)	5100	5100	5100	5100	5100	5100
1/60	1. Input HP (hp)	48	43	38	32	25	16	
	2. Output HP (hp)	36	32	28	23	17	10	
	3. Output Torque (kg-m)	872	933	1011	1115	1249	1512	
	4. Output OHL (kg)	5100	5100	5100	5100	5100	5100	
SIZE	RATIO	INPUT RPM	1800	1500	1200	900	600	300
400	1/10	1. Input HP (hp)	-	277	245	211	165	109
		2. Output HP (hp)	-	235	208	179	139	90
		3. Output Torque (kg-m)	-	1182	1308	1501	1752	2258
		4. Output OHL (kg)	-	3830	4100	4290	4770	5690
	1/15	1. Input HP (hp)	-	214	193	159	125	81
		2. Output HP (hp)	-	177	160	131	102	64
		3. Output Torque (kg-m)	-	1337	1509	1653	1931	2421
		4. Output OHL (kg)	-	4340	4520	4950	5480	6730
	1/20	1. Input HP (hp)	-	168	148	125	97	63
		2. Output HP (hp)	-	137	121	102	78	49
		3. Output Torque (kg-m)	-	1340	1746	1654	1895	2405
		4. Output OHL (kg)	-	4910	5190	5610	6290	7000
	1/30	1. Input HP (hp)	-	137	121	102	81	51
		2. Output HP (hp)	-	107	94	79	62	37
		3. Output Torque (kg-m)	-	1509	1660	1869	2190	2638
		4. Output OHL (kg)	-	5320	5870	6090	6740	7000
	1/40	1. Input HP (hp)	-	100	88	73	58	37
		2. Output HP (hp)	-	75	66	55	42	25
		3. Output Torque (kg-m)	-	1509	1651	1829	2121	2534
		4. Output OHL (kg)	-	6350	6810	7000	7000	7000
	1/50	1. Input HP (hp)	-	79	69	58	45	30
		2. Output HP (hp)	-	59	52	43	33	20
		3. Output Torque (kg-m)	-	1393	1525	1673	1914	2331
		4. Output OHL (kg)	-	7000	7000	7000	7000	7000
1/60	1. Input HP (hp)	-	65	56	47	37	24	
	2. Output HP (hp)	-	48	42	35	26	16	
	3. Output Torque (kg-m)	-	1347	1456	1610	1810	2201	
	4. Output OHL (kg)	-	7000	7000	7000	7000	7000	



蝸輪雙段減速機型

出力軸許可傳達馬力及許可扭力矩表

Double Reduction Rating Table

每日 8~10 小時連續運轉並在平均負荷
 *applies for continuous service free from recurrent shock loading and does not exceed 10 hours per day

SIZE	RATIO	INPUT RPM	1800	1500	1200	900
34 / 60	1/200	1. Input HP (hp)	0.29	0.25	0.19	0.16
		2. Output HP (hp)	0.14	0.12	0.09	0.07
		3. Output Torque (kg-m)	11.6	11.6	11.6	11.6
		4. Output OHL (kg)	200	200	200	200
	1/300	1. Input HP (hp)	0.20	0.18	0.14	0.12
		2. Output HP (hp)	0.09	0.08	0.06	0.05
		3. Output Torque (kg-m)	11.6	11.6	11.6	11.6
		4. Output OHL (kg)	200	200	200	200
	1/400	1. Input HP (hp)	0.16	0.14	0.12	0.10
		2. Output HP (hp)	0.07	0.06	0.05	0.04
		3. Output Torque (kg-m)	11.6	11.6	11.6	11.6
		4. Output OHL (kg)	200	200	200	200
	1/500	1. Input HP (hp)	0.18	0.14	0.11	0.09
		2. Output HP (hp)	0.06	0.05	0.04	0.03
		3. Output Torque (kg-m)	11.6	11.6	11.6	11.6
		4. Output OHL (kg)	200	200	200	200
	1/600	1. Input HP (hp)	0.13	0.11	0.09	0.06
		2. Output HP (hp)	0.05	0.04	0.03	0.02
		3. Output Torque (kg-m)	11.6	11.6	11.6	11.6
		4. Output OHL (kg)	200	200	200	200
	1/800	1. Input HP (hp)	0.11	0.09	0.06	0.03
		2. Output HP (hp)	0.04	0.03	0.02	0.01
		3. Output Torque (kg-m)	11.6	11.6	11.6	11.6
		4. Output OHL (kg)	200	200	200	200
1/900	1. Input HP (hp)	0.10	0.09	0.06	0.03	
	2. Output HP (hp)	0.03	0.03	0.02	0.01	
	3. Output Torque (kg-m)	11.6	11.6	11.6	11.6	
	4. Output OHL (kg)	200	200	200	200	
SIZE	RATIO	INPUT RPM	1800	1500	1200	900
40 / 70	1/200	1. Input HP (hp)	0.57	0.49	0.40	0.32
		2. Output HP (hp)	0.30	0.25	0.20	0.16
		3. Output Torque (kg-m)	23.8	24.7	25.0	25.0
		4. Output OHL (kg)	300	300	300	300
	1/300	1. Input HP (hp)	0.42	0.35	0.29	0.22
		2. Output HP (hp)	0.21	0.17	0.14	0.10
		3. Output Torque (kg-m)	25.0	25.0	25.0	25.0
		4. Output OHL (kg)	300	300	300	300
	1/400	1. Input HP (hp)	0.34	0.29	0.23	0.19
		2. Output HP (hp)	0.16	0.13	0.10	0.08
		3. Output Torque (kg-m)	25.0	25.0	25.0	25.0
		4. Output OHL (kg)	300	300	300	300
	1/500	1. Input HP (hp)	0.28	0.25	0.20	0.16
		2. Output HP (hp)	0.12	0.10	0.08	0.06
		3. Output Torque (kg-m)	25.0	25.0	25.0	25.0
		4. Output OHL (kg)	300	300	300	300
	1/600	1. Input HP (hp)	0.24	0.22	0.18	0.14
		2. Output HP (hp)	0.10	0.09	0.07	0.05
		3. Output Torque (kg-m)	25.0	25.0	25.0	25.0
		4. Output OHL (kg)	300	300	300	300
	1/800	1. Input HP (hp)	0.21	0.16	0.14	0.12
		2. Output HP (hp)	0.08	0.06	0.05	0.04
		3. Output Torque (kg-m)	25.0	25.0	25.0	25.0
		4. Output OHL (kg)	300	300	300	300
1/900	1. Input HP (hp)	0.21	0.19	0.16	0.10	
	2. Output HP (hp)	0.07	0.06	0.05	0.03	
	3. Output Torque (kg-m)	25.0	25.0	25.0	25.0	
	4. Output OHL (kg)	300	300	300	300	

SIZE	RATIO	INPUT RPM	1800	1500	1200	900
50 / 80	1/200	1. Input HP (hp)	0.68	0.66	0.57	0.46
		2. Output HP (hp)	0.35	0.33	0.28	0.22
		3. Output Torque (kg-m)	28.2	31.7	33.7	35.0
		4. Output OHL (kg)	400	400	400	400
	1/300	1. Input HP (hp)	0.59	0.52	0.42	0.32
		2. Output HP (hp)	0.28	0.24	0.19	0.14
		3. Output Torque (kg-m)	33.7	35.0	35.0	35.0
		4. Output OHL (kg)	400	400	400	400
	1/400	1. Input HP (hp)	0.52	0.43	0.35	0.29
		2. Output HP (hp)	0.22	0.18	0.14	0.11
		3. Output Torque (kg-m)	35.0	35.0	35.0	35.0
		4. Output OHL (kg)	400	400	400	400
	1/500	1. Input HP (hp)	0.43	0.37	0.33	0.25
		2. Output HP (hp)	0.17	0.14	0.12	0.09
		3. Output Torque (kg-m)	35.0	35.0	35.0	35.0
		4. Output OHL (kg)	400	400	400	400
	1/600	1. Input HP (hp)	0.35	0.30	0.27	0.20
		2. Output HP (hp)	0.14	0.12	0.10	0.07
		3. Output Torque (kg-m)	35.0	35.0	35.0	35.0
		4. Output OHL (kg)	400	400	400	400
	1/800	1. Input HP (hp)	0.32	0.28	0.21	0.16
		2. Output HP (hp)	0.11	0.09	0.07	0.05
		3. Output Torque (kg-m)	35.0	35.0	35.0	35.0
		4. Output OHL (kg)	400	400	400	400
1/900	1. Input HP (hp)	0.29	0.24	0.18	0.16	
	2. Output HP (hp)	0.10	0.08	0.06	0.05	
	3. Output Torque (kg-m)	35.0	35.0	35.0	35.0	
	4. Output OHL (kg)	400	400	400	400	
SIZE	RATIO	INPUT RPM	1800	1500	1200	900
60 / 100	1/200	1. Input HP (hp)	1.13	0.96	0.79	0.59
		2. Output HP (hp)	0.63	0.52	0.42	0.31
		3. Output Torque (kg-m)	50.0	50.0	50.0	50.0
		4. Output OHL (kg)	450	450	450	450
	1/300	1. Input HP (hp)	0.75	0.65	0.56	0.43
		2. Output HP (hp)	0.42	0.35	0.28	0.21
		3. Output Torque (kg-m)	50.0	50.0	50.0	50.0
		4. Output OHL (kg)	450	450	450	450
	1/400	1. Input HP (hp)	0.62	0.53	0.44	0.35
		2. Output HP (hp)	0.31	0.26	0.21	0.16
		3. Output Torque (kg-m)	50.0	50.0	50.0	50.0
		4. Output OHL (kg)	450	450	450	450
	1/500	1. Input HP (hp)	0.53	0.45	0.38	0.28
		2. Output HP (hp)	0.25	0.21	0.17	0.12
		3. Output Torque (kg-m)	50.0	50.0	50.0	50.0
		4. Output OHL (kg)	450	450	450	450
	1/600	1. Input HP (hp)	0.46	0.39	0.34	0.25
		2. Output HP (hp)	0.21	0.17	0.14	0.10
		3. Output Torque (kg-m)	50.0	50.0	50.0	50.0
		4. Output OHL (kg)	450	450	450	450
	1/800	1. Input HP (hp)	0.39	0.32	0.26	0.22
		2. Output HP (hp)	0.16	0.13	0.10	0.08
		3. Output Torque (kg-m)	50.0	50.0	50.0	50.0
		4. Output OHL (kg)	450	450	450	450
1/900	1. Input HP (hp)	0.38	0.34	0.28	0.21	
	2. Output HP (hp)	0.14	0.12	0.09	0.07	
	3. Output Torque (kg-m)	50.0	50.0	50.0	50.0	
	4. Output OHL (kg)	450	450	450	450	





蝸輪雙段減速機型

出力軸許可傳達馬力及許可扭力矩表

Double Reduction Rating Table

每日 8~10 小時連續運轉並在平均負荷

*applies for continuous service free from recurrent shock loading and does not exceed 10 hours per day

SIZE	RATIO	INPUT RPM	1800	1500	1200	900
70 / 120	1/200	1. Input HP (hp)	1.94	1.66	1.37	1.06
		2. Output HP (hp)	1.06	0.88	0.70	0.53
		3. Output Torque (kg-m)	84.0	84.0	84.0	84.0
		4. Output OHL (kg)	520	520	520	520
	1/300	1. Input HP (hp)	1.40	1.20	1.00	0.76
		2. Output HP (hp)	0.70	0.58	0.47	0.35
		3. Output Torque (kg-m)	84.0	84.0	84.0	84.0
		4. Output OHL (kg)	520	520	520	520
	1/400	1. Input HP (hp)	1.10	0.93	0.76	0.59
		2. Output HP (hp)	0.53	0.44	0.35	0.26
		3. Output Torque (kg-m)	84.0	84.0	84.0	84.0
		4. Output OHL (kg)	520	520	520	520
	1/500	1. Input HP (hp)	0.97	0.83	0.70	0.53
		2. Output HP (hp)	0.42	0.35	0.28	0.21
		3. Output Torque (kg-m)	84.0	84.0	84.0	84.0
		4. Output OHL (kg)	520	520	520	520
	1/600	1. Input HP (hp)	0.81	0.69	0.57	0.44
		2. Output HP (hp)	0.35	0.28	0.23	0.17
		3. Output Torque (kg-m)	84.0	84.0	84.0	84.0
		4. Output OHL (kg)	520	520	520	520
	1/800	1. Input HP (hp)	0.63	0.56	0.44	0.36
		2. Output HP (hp)	0.26	0.22	0.17	0.13
		3. Output Torque (kg-m)	84.0	84.0	84.0	84.0
		4. Output OHL (kg)	520	520	520	520
1/900	1. Input HP (hp)	0.62	0.52	0.44	0.37	
	2. Output HP (hp)	0.23	0.19	0.15	0.12	
	3. Output Torque (kg-m)	84.0	84.0	84.0	84.0	
	4. Output OHL (kg)	520	520	520	520	
SIZE	RATIO	INPUT RPM	1800	1500	1200	900
80 / 135	1/200	1. Input HP (hp)	2.98	2.52	2.05	1.58
		2. Output HP (hp)	1.73	1.44	1.15	0.87
		3. Output Torque (kg-m)	140	140	140	140
		4. Output OHL (kg)	810	810	810	810
	1/300	1. Input HP (hp)	2.09	1.77	1.48	1.16
		2. Output HP (hp)	1.15	0.96	0.77	0.58
		3. Output Torque (kg-m)	140	140	140	140
		4. Output OHL (kg)	810	810	810	810
	1/400	1. Input HP (hp)	1.64	1.41	1.16	0.89
		2. Output HP (hp)	0.87	0.72	0.58	0.43
		3. Output Torque (kg-m)	140	140	140	140
		4. Output OHL (kg)	810	810	810	810
	1/500	1. Input HP (hp)	1.40	1.20	0.97	0.79
		2. Output HP (hp)	0.69	0.58	0.46	0.35
		3. Output Torque (kg-m)	140	140	140	140
		4. Output OHL (kg)	810	810	810	810
	1/600	1. Input HP (hp)	1.20	1.06	0.84	0.67
		2. Output HP (hp)	0.58	0.46	0.38	0.29
		3. Output Torque (kg-m)	140	140	140	140
		4. Output OHL (kg)	810	810	810	810
	1/800	1. Input HP (hp)	0.95	0.83	0.70	0.55
		2. Output HP (hp)	0.43	0.36	0.29	0.22
		3. Output Torque (kg-m)	140	140	140	140
		4. Output OHL (kg)	810	810	810	810
1/900	1. Input HP (hp)	1.10	0.96	0.81	0.66	
	2. Output HP (hp)	0.38	0.32	0.26	0.20	
	3. Output Torque (kg-m)	140	140	140	140	
	4. Output OHL (kg)	810	810	810	810	

SIZE	RATIO	INPUT RPM	1800	1500	1200	900
100 / 155	1/200	1. Input HP (hp)	4.25	3.72	3.25	2.67
		2. Output HP (hp)	2.41	2.07	1.76	1.42
		3. Output Torque (kg-m)	192	198	210	226
		4. Output OHL (kg)	1700	1700	1700	1700
	1/300	1. Input HP (hp)	3.32	2.95	2.58	2.10
		2. Output HP (hp)	1.76	1.52	1.29	1.01
		3. Output Torque (kg-m)	210	218	231	242
		4. Output OHL (kg)	1700	1700	1700	1700
	1/400	1. Input HP (hp)	2.71	2.44	2.06	1.58
		2. Output HP (hp)	1.41	1.22	1.01	0.76
		3. Output Torque (kg-m)	225	234	242	242
		4. Output OHL (kg)	1700	1700	1700	1700
	1/500	1. Input HP (hp)	2.36	2.08	1.68	1.32
		2. Output HP (hp)	1.18	1.01	0.81	0.61
		3. Output Torque (kg-m)	236	242	242	242
		4. Output OHL (kg)	1700	1700	1700	1700
	1/600	1. Input HP (hp)	2.19	1.86	1.55	1.19
		2. Output HP (hp)	1.01	0.84	0.67	0.50
		3. Output Torque (kg-m)	242	242	242	242
		4. Output OHL (kg)	1700	1700	1700	1700
	1/800	1. Input HP (hp)	1.68	1.48	1.21	0.95
		2. Output HP (hp)	0.76	0.63	0.51	0.38
		3. Output Torque (kg-m)	242	242	242	242
		4. Output OHL (kg)	1700	1700	1700	1700
1/900	1. Input HP (hp)	2.23	1.86	1.50	1.13	
	2. Output HP (hp)	0.87	0.58	0.45	0.34	
	3. Output Torque (kg-m)	242	242	242	242	
	4. Output OHL (kg)	1700	1700	1700	1700	
SIZE	RATIO	INPUT RPM	1800	1500	1200	900
120 / 175	1/200	1. Input HP (hp)	5.68	5.12	4.35	3.58
		2. Output HP (hp)	3.40	2.97	2.48	1.99
		3. Output Torque (kg-m)	271	284	296	317
		4. Output OHL (kg)	2000	2000	2000	2000
	1/300	1. Input HP (hp)	4.44	3.94	3.43	2.76
		2. Output HP (hp)	2.48	2.16	1.83	1.44
		3. Output Torque (kg-m)	298	309	327	345
		4. Output OHL (kg)	2000	2000	2000	2000
	1/400	1. Input HP (hp)	3.73	3.30	2.80	2.18
		2. Output HP (hp)	2.00	1.73	1.44	1.08
		3. Output Torque (kg-m)	318	331	345	345
		4. Output OHL (kg)	2000	2000	2000	2000
	1/500	1. Input HP (hp)	3.14	2.73	2.26	1.75
		2. Output HP (hp)	1.68	1.44	1.16	0.87
		3. Output Torque (kg-m)	334	345	345	345
		4. Output OHL (kg)	2000	2000	2000	2000
	1/600	1. Input HP (hp)	2.91	2.50	2.05	1.60
		2. Output HP (hp)	1.44	1.20	0.96	0.72
		3. Output Torque (kg-m)	345	345	345	345
		4. Output OHL (kg)	2000	2000	2000	2000
	1/800	1. Input HP (hp)	2.35	2.01	1.67	1.31
		2. Output HP (hp)	1.08	0.90	0.72	0.45
		3. Output Torque (kg-m)	345	345	345	345
		4. Output OHL (kg)	2000	2000	2000	2000
1/900	1. Input HP (hp)	3.20	2.66	2.13	1.60	
	2. Output HP (hp)	0.96	0.80	0.64	0.48	
	3. Output Torque (kg-m)	345	345	345	345	
	4. Output OHL (kg)	2000	2000	2000	2000	



蝸輪雙段減速機型

出力軸許可傳達馬力及許可扭力矩表

Double Reduction Rating Table

每日 8~10 小時連續運轉並在平均負荷
 *applies for continuous service free from recurrent shock loading and does not exceed 10 hours per day

SIZE	RATIO	INPUT RPM	1800	1500	1200	900
120 / 200	1/200	1. Input HP (hp)	8.18	7.26	6.29	5.17
		2. Output HP (hp)	4.82	4.18	3.53	2.81
		3. Output Torque (kg-m)	384	399	421	448
		4. Output OHL (kg)	2200	2200	2200	2200
	1/300	1. Input HP (hp)	6.16	5.45	4.74	3.84
		2. Output HP (hp)	3.52	3.05	2.58	2.04
		3. Output Torque (kg-m)	421	437	462	488
		4. Output OHL (kg)	2200	2200	2200	2200
	1/400	1. Input HP (hp)	5.06	4.50	3.83	2.96
		2. Output HP (hp)	2.81	2.47	2.04	1.53
		3. Output Torque (kg-m)	447	471	488	488
		4. Output OHL (kg)	2200	2200	2200	2200
	1/500	1. Input HP (hp)	4.37	3.82	3.14	2.46
		2. Output HP (hp)	2.37	2.04	1.63	1.23
		3. Output Torque (kg-m)	473	488	488	488
		4. Output OHL (kg)	2200	2200	2200	2200
	1/600	1. Input HP (hp)	4.01	3.42	2.83	2.18
		2. Output HP (hp)	2.04	1.70	1.36	1.02
		3. Output Torque (kg-m)	488	488	488	488
		4. Output OHL (kg)	2200	2200	2200	2200
	1/800	1. Input HP (hp)	3.13	2.67	2.19	1.72
		2. Output HP (hp)	1.53	1.28	1.02	0.76
		3. Output Torque (kg-m)	488	488	488	488
		4. Output OHL (kg)	2200	2200	2200	2200
1/900	1. Input HP (hp)	3.32	2.87	2.39	1.85	
	2. Output HP (hp)	1.36	1.14	0.91	0.58	
	3. Output Torque (kg-m)	488	488	488	488	
	4. Output OHL (kg)	2200	2200	2200	2200	
SIZE	RATIO	INPUT RPM	1800	1500	1200	900
135 / 225	1/200	1. Input HP (hp)	11.0	9.86	8.50	7.03
		2. Output HP (hp)	6.85	5.98	5.02	4.03
		3. Output Torque (kg-m)	545	571	599	642
		4. Output OHL (kg)	2500	2500	2500	2500
	1/300	1. Input HP (hp)	8.85	7.85	6.85	5.37
		2. Output HP (hp)	5.02	4.35	3.66	2.89
		3. Output Torque (kg-m)	599	623	655	690
		4. Output OHL (kg)	2500	2500	2500	2500
	1/400	1. Input HP (hp)	7.19	6.39	5.39	4.18
		2. Output HP (hp)	4.03	3.49	2.89	2.17
		3. Output Torque (kg-m)	642	668	690	690
		4. Output OHL (kg)	2500	2500	2500	2500
	1/500	1. Input HP (hp)	6.27	5.43	4.44	3.46
		2. Output HP (hp)	3.40	2.89	2.31	1.73
		3. Output Torque (kg-m)	676	690	690	690
		4. Output OHL (kg)	2500	2500	2500	2500
	1/600	1. Input HP (hp)	5.64	4.83	4.02	3.10
		2. Output HP (hp)	2.89	2.41	1.93	1.45
		3. Output Torque (kg-m)	690	690	690	690
		4. Output OHL (kg)	2500	2500	2500	2500
	1/800	1. Input HP (hp)	4.42	3.79	3.15	2.46
		2. Output HP (hp)	2.17	1.80	1.45	1.08
		3. Output Torque (kg-m)	690	690	690	690
		4. Output OHL (kg)	2500	2500	2500	2500
1/900	1. Input HP (hp)	4.21	3.63	3.10	2.43	
	2. Output HP (hp)	1.82	1.61	1.28	0.96	
	3. Output Torque (kg-m)	690	690	690	690	
	4. Output OHL (kg)	2500	2500	2500	2500	

SIZE	RATIO	INPUT RPM	1800	1500	1200	900
155 / 250	1/200	1. Input HP (hp)	14.0	12.6	10.8	8.93
		2. Output HP (hp)	8.71	7.74	6.48	5.18
		3. Output Torque (kg-m)	693	739	774	825
		4. Output OHL (kg)	2700	2700	2700	2700
	1/300	1. Input HP (hp)	11.0	9.74	8.50	6.54
		2. Output HP (hp)	6.48	5.60	4.75	3.56
		3. Output Torque (kg-m)	774	803	850	850
		4. Output OHL (kg)	2700	2700	2700	2700
	1/400	1. Input HP (hp)	9.16	8.09	6.60	5.09
		2. Output HP (hp)	5.18	4.45	3.56	2.67
		3. Output Torque (kg-m)	824	850	850	850
		4. Output OHL (kg)	2700	2700	2700	2700
	1/500	1. Input HP (hp)	7.62	6.47	5.28	4.10
		2. Output HP (hp)	4.27	3.56	2.85	2.14
		3. Output Torque (kg-m)	850	850	850	850
		4. Output OHL (kg)	2700	2700	2700	2700
	1/600	1. Input HP (hp)	6.93	5.97	4.88	3.81
		2. Output HP (hp)	3.56	2.97	2.37	1.78
		3. Output Torque (kg-m)	850	850	850	850
		4. Output OHL (kg)	2700	2700	2700	2700
	1/800	1. Input HP (hp)	5.40	4.64	3.82	3.01
		2. Output HP (hp)	2.67	2.23	1.78	1.34
		3. Output Torque (kg-m)	850	850	850	850
		4. Output OHL (kg)	2700	2700	2700	2700
1/900	1. Input HP (hp)	5.31	4.56	3.74	2.97	
	2. Output HP (hp)	2.37	1.98	1.58	1.19	
	3. Output Torque (kg-m)	850	850	850	850	
	4. Output OHL (kg)	2700	2700	2700	2700	
SIZE	RATIO	INPUT RPM	1800	1500	1200	900
175 / 300	1/200	1. Input HP (hp)	15.8	13.9	12.0	9.9
		2. Output HP (hp)	9.7	8.4	7.1	5.7
		3. Output Torque (kg-m)	1012	1059	1122	1195
		4. Output OHL (kg)	3800	3800	3800	3800
	1/300	1. Input HP (hp)	12.3	10.9	9.1	7.1
		2. Output HP (hp)	7.1	6.2	5.1	3.8
		3. Output Torque (kg-m)	1122	1170	1200	1200
		4. Output OHL (kg)	3800	3800	3800	3800
	1/400	1. Input HP (hp)	10.2	8.6	7.0	5.5
		2. Output HP (hp)	5.7	4.7	3.8	2.8
		3. Output Torque (kg-m)	1197	1200	1200	1200
		4. Output OHL (kg)	3800	3800	3800	3800
	1/500	1. Input HP (hp)	8.2	7.0	5.7	4.5
		2. Output HP (hp)	4.4	3.7	3.0	2.2
		3. Output Torque (kg-m)	1200	1200	1200	1200
		4. Output OHL (kg)	3800	3800	3800	3800
	1/600	1. Input HP (hp)	7.5	6.4	5.2	4.1
		2. Output HP (hp)	3.8	3.2	2.5	1.9
		3. Output Torque (kg-m)	1200	1200	1200	1200
		4. Output OHL (kg)	3800	3800	3800	3800
	1/800	1. Input HP (hp)	5.9	5.0	4.1	3.2
		2. Output HP (hp)	2.8	2.4	1.9	1.4
		3. Output Torque (kg-m)	1200	1200	1200	1200
		4. Output OHL (kg)	3800	3800	3800	3800
1/900	1. Input HP (hp)	5.7	4.9	4.0	3.2	
	2. Output HP (hp)	2.5	2.1	1.7	1.3	
	3. Output Torque (kg-m)	1200	1200	1200	1200	
	4. Output OHL (kg)	3800	3800	3800	3800	



蝸輪雙段減速機型

出力軸許可傳達馬力及許可扭力矩表

Double Reduction Rating Table

每日8~10小時連續運轉並在平均負荷
*applies for continuous service free from recurrent shock loading and does not exceed 10 hours per day

SIZE	RATIO	INPUT RPM	1800	1500	1200	900
200 / 350	1/200	1. Input HP (hp)	24.5	21.6	17.9	13.8
		2. Output HP (hp)	15.2	13.2	10.7	8.0
		3. Output Torque (kg-m)	1700	1773	1800	1800
		4. Output OHL (kg)	5100	5100	5100	5100
	1/300	1. Input HP (hp)	18.3	15.5	12.6	9.8
		2. Output HP (hp)	10.7	8.9	7.2	5.4
		3. Output Torque (kg-m)	1800	1800	1800	1800
		4. Output OHL (kg)	5100	5100	5100	5100
	1/400	1. Input HP (hp)	14.6	12.4	10.1	7.9
		2. Output HP (hp)	8.3	6.9	5.5	4.2
		3. Output Torque (kg-m)	1800	1800	1800	1800
		4. Output OHL (kg)	5100	5100	5100	5100
	1/500	1. Input HP (hp)	12.0	10.2	8.5	6.5
		2. Output HP (hp)	6.7	5.5	4.4	3.3
		3. Output Torque (kg-m)	1800	1800	1800	1800
		4. Output OHL (kg)	5100	5100	5100	5100
	1/600	1. Input HP (hp)	10.5	8.9	7.2	5.7
		2. Output HP (hp)	5.4	4.5	3.6	2.7
		3. Output Torque (kg-m)	1800	1800	1800	1800
		4. Output OHL (kg)	5100	5100	5100	5100
	1/800	1. Input HP (hp)	8.4	7.1	5.9	4.6
		2. Output HP (hp)	4.2	3.5	2.8	2.1
		3. Output Torque (kg-m)	1800	1800	1800	1800
		4. Output OHL (kg)	5100	5100	5100	5100
1/900	1. Input HP (hp)	7.8	6.7	5.5	4.3	
	2. Output HP (hp)	3.7	3.1	2.5	1.8	
	3. Output Torque (kg-m)	1800	1800	1800	1800	
	4. Output OHL (kg)	5100	5100	5100	5100	

SIZE	RATIO	INPUT RPM	1800	1500	1200	900
225 / 400	1/200	1. Input HP (hp)	32.9	28.8	25.0	20.1
		2. Output HP (hp)	20.7	18.0	15.3	11.9
		3. Output Torque (kg-m)	2239	2342	2482	2580
		4. Output OHL (kg)	7000	7000	7000	7000
	1/300	1. Input HP (hp)	25.5	22.4	18.2	14.1
		2. Output HP (hp)	15.3	13.2	10.6	7.9
		3. Output Torque (kg-m)	2482	2580	2580	2580
		4. Output OHL (kg)	7000	7000	7000	7000
	1/400	1. Input HP (hp)	20.6	17.4	14.2	11.1
		2. Output HP (hp)	11.9	9.9	7.9	6.0
		3. Output Torque (kg-m)	2580	2580	2580	2580
		4. Output OHL (kg)	7000	7000	7000	7000
	1/500	1. Input HP (hp)	16.8	14.3	11.7	9.1
		2. Output HP (hp)	9.5	7.9	6.4	4.8
		3. Output Torque (kg-m)	2580	2580	2580	2580
		4. Output OHL (kg)	7000	7000	7000	7000
	1/600	1. Input HP (hp)	14.9	12.6	10.3	8.0
		2. Output HP (hp)	7.9	6.6	5.3	4.0
		3. Output Torque (kg-m)	2580	2580	2580	2580
		4. Output OHL (kg)	7000	7000	7000	7000
	1/800	1. Input HP (hp)	11.8	10.0	8.2	6.4
		2. Output HP (hp)	6.0	5.0	4.0	3.0
		3. Output Torque (kg-m)	2580	2580	2580	2580
		4. Output OHL (kg)	7000	7000	7000	7000
1/900	1. Input HP (hp)	11.5	9.8	8.1	6.3	
	2. Output HP (hp)	5.5	4.6	3.7	2.7	
	3. Output Torque (kg-m)	2580	2580	2580	2580	
	4. Output OHL (kg)	7000	7000	7000	7000	

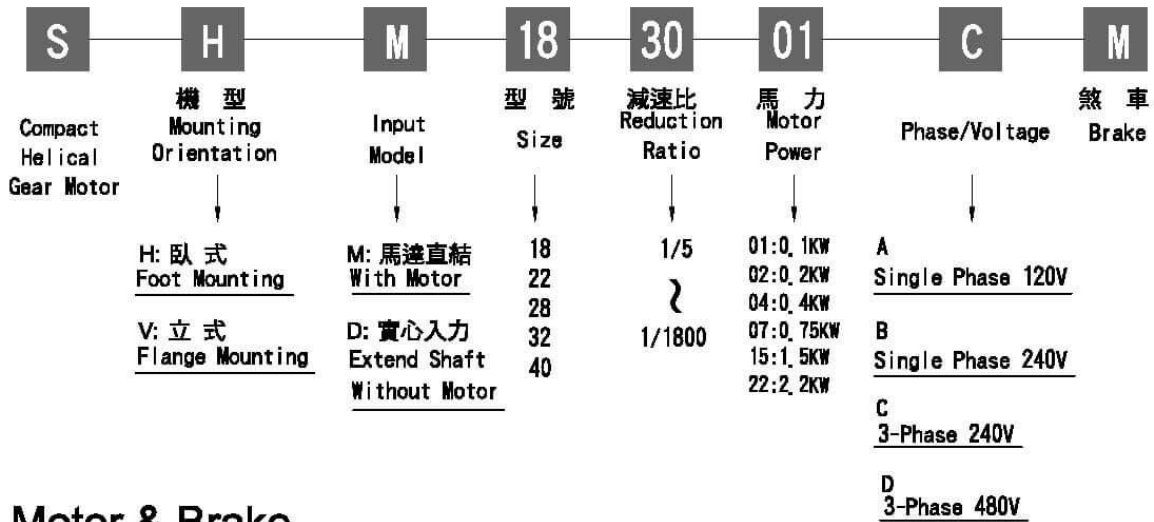
重要說明 (IMPORTANT NOTICE)

為降低蝸桿牙口和蝸輪齒部嚙合時之集中磨耗，本公司產品中下列型號 (SIZE) 之實際速比，採用「追逐輪齒」(Hunting Tooth) 速比設計為非整數比，敬請用戶注意。

1. 型號 (SIZE) 50, 60, 70, 100, 120, 135, 155, 175 及 225 型之速比 10:1，其實際速比為 10.3333:1 (RATIO 10:1, Actual ratio is 10.3333:1)。80 型為正速比 10:1 (RATIO 10:1)。
2. 型號 (SIZE) 50, 60, 70, 80, 100, 120, 135, 155 及 175 型之速比 20:1，其實際速比為 20.5:1 (RATIO 20:1, Actual ratio is 20.5:1)。
3. 型號 (SIZE) 50、60 及 70 型之速比 5:1，其實際速比為 5.25:1 (RATIO 5:1, Actual ratio is 5.25:1)，40 型為正速比 5:1 (Ratio 5:1)。

Compact Helical Gear Motor

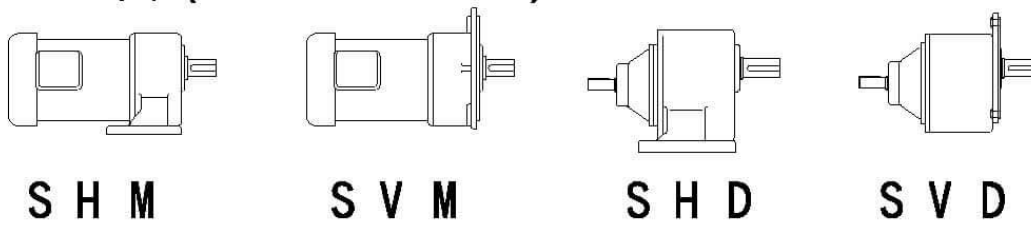
小型齒輪減速馬達之型號編碼說明：

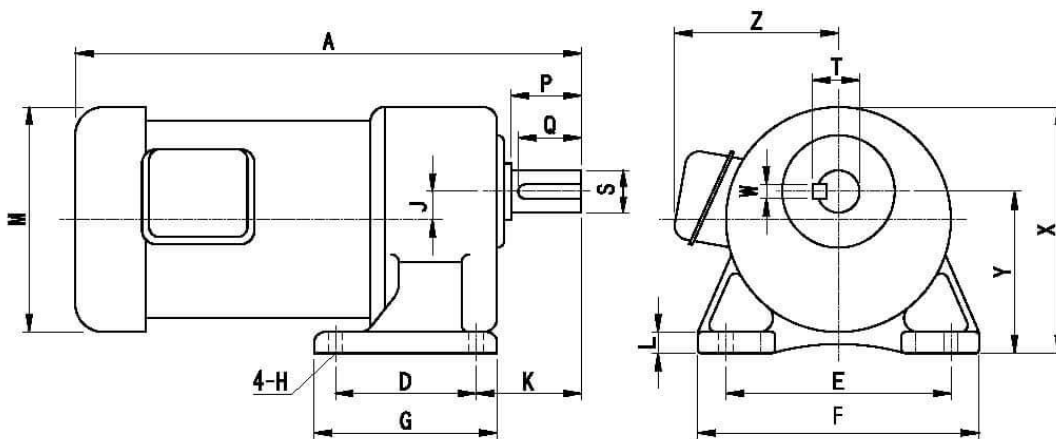


Motor & Brake

PHASE	HP (4P)	VOLT	Hz	RATING			CLASS	Kgf-m	Release Time (sec)		Adjust Gap (mm)		With Brake		
				R. P. M	AMP"S	Kg-m			AC Switch	DC Switch	Specified Value	Boundary Value	Brake Volt	In/Out Volt	Operation Times
3	1/8	240/480	60	1650	0.7	0.06	E	0.1	0.1	0.06	0.3	0.7	DC90V	AC220 240V	10/min
	1/4	240/480	60	1650	1.0	0.110	E	0.2	0.07	0.03	0.3	0.7			
	1/2	240/480	60	1680	1.9	0.216	E	0.4	0.10	0.03	0.3	0.7			
	1	240/480	60	1700	3.4	0.427	E	0.8	0.12	0.05	0.4	1.0			
	2	240/480	60	1710	6.1	0.849	E	1.6	0.14	0.05	0.4	1.0			
	3	240/480	60	1725	8.7	1.262	E	2.5	0.15	0.03	0.4	1.0			
1	1/8	120/240	60	1730	2	0.06	E	0.1	0.1	0.06	0.3	0.7	DC90V	AC100 110V	10/min
	1/4	120/240	60	1730	4.7	0.110	E	0.2	0.07	0.03	0.3	0.7			
	1/2	120/240	60	1750	7.5	0.216	E	0.4	0.10	0.03	0.3	0.7			
	1	120/240	60	1740	14	0.427	E	0.8	0.12	0.15	0.4	1.0			

機型示意圖 (Model Illustration)





UNIT: mm

馬力 HP	減速比 Gear Ratio	型號 Size	A	D	E	G	F	H	L	J	K	M	X	Y	Z	出力軸端 OUTPUT SHAFT END				
																P	Q	S	T	W
0.1KW 1/8HP-4P	5-50	18	245 (270)	40	110	65	135	10	10	14	50	126	130	85	115	30	27	18	20	5
	60-200	22	245 (270)	65	130	90	156	11	13	18	55	126	135	90	115	40	35	22	25	7
	250-1800	28	340 (385)	90	140	120	170	11	14	22	65	126	164	110	115	45	40	28	31	7
0.2KW 1/4HP-4P	5-10	18	280 (305)	40	110	65	135	10	10	14	50	126	130	85	115	30	27	18	20	5
	15-90	22	300 (325)	65	130	90	156	11	13	18	55	126	135	90	115	40	35	22	25	7
	100-200	28	335 (360)	90	140	120	170	11	14	22	65	126	164	110	115	45	40	28	31	7
	250-1800	32	405 (430)	130	170	167	208	13	17	27	73	126	197	130	115	55	50	32	35.5	10
0.4KW 1/2HP-4P	5-10	22	325 (375)	65	130	90	156	11	13	18	55	142	135	90	120	40	35	22	25	7
	15-90	28	360 (410)	90	140	120	170	11	14	22	65	142	164	110	120	45	40	28	31	7
	100-200	32	390 (440)	130	170	167	208	13	17	27	73	142	197	130	120	55	50	32	35.5	10
	250-1800	40	480 (530)	150	210	198	252	15	18	32.5	93	142	227	150	120	65	60	40	43.5	10
0.75KW 1HP-4P	5-25	28	375 (425)	90	140	120	170	11	14	22	65	156	164	110	130	45	40	28	31	7
	30-120	32	410 (460)	130	170	167	208	13	17	27	73	156	197	130	130	55	50	32	35.5	10
	125-200	40	450 (500)	150	210	198	252	15	18	32.5	93	156	227	150	130	65	60	40	43.5	10
	250-1800	50	570 (620)	160	230	201	291	18	25	40	100	156	267	170	130	75	70	50	53.5	14
1.5KW 2HP-4P	5-30	32	420 (470)	130	170	167	208	13	17	27	73	179	197	130	145	55	50	32	35.5	10
	40-100	40	460 (510)	150	210	198	252	15	18	32.5	93	179	227	150	145	65	60	40	43.5	10
	120-200	40	470 (520)	150	210	198	252	15	18	32.5	93	179	227	150	145	65	60	40	43.5	10
	250-900	50	580 (630)	160	230	201	291	18	25	40	100	179	267	170	145	75	70	50	53.5	14
2.2KW 3HP-4P	5-30	40	475 (525)	150	210	198	252	15	18	32.5	93	179	227	150	160	65	60	40	43.5	10
	40-120	50	485 (535)	160	230	201	291	18	25	40	100	179	267	170	160	75	70	50	53.5	14
3.7KW 5HP-4P	5-30	50	610 (660)	160	230	201	291	18	25	40	100	208	267	170	160	75	70	50	53.5	14

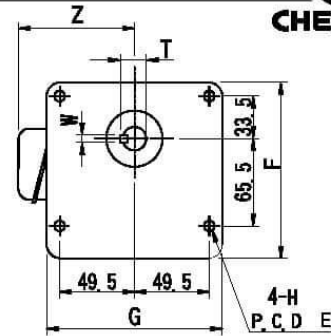
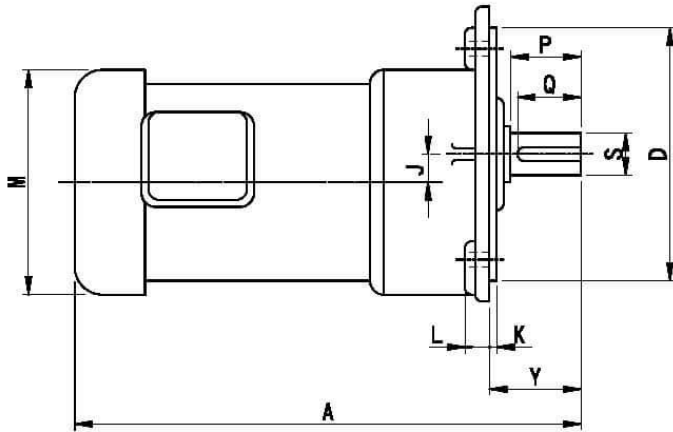


FIG 1

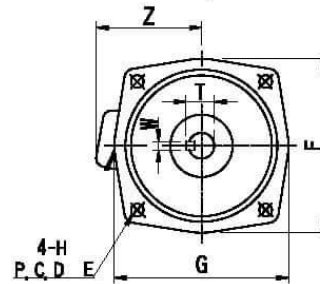
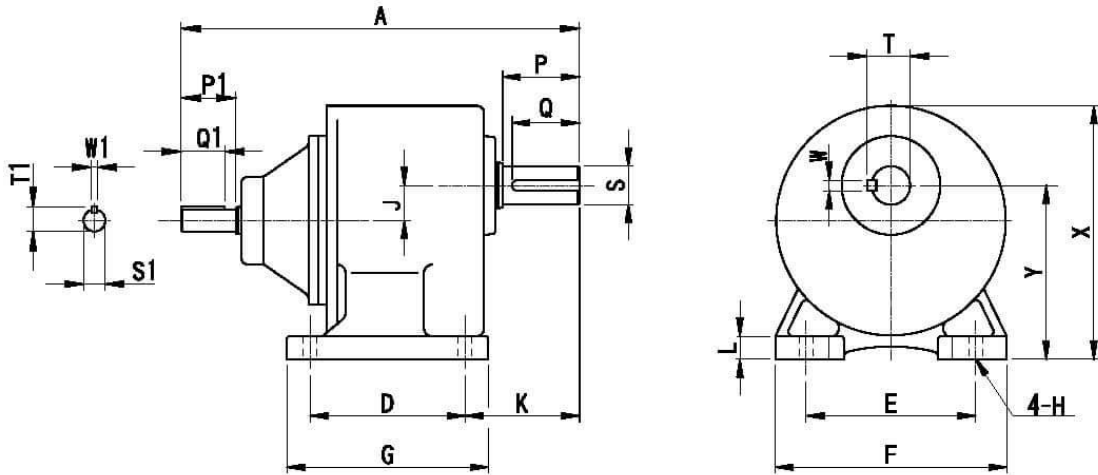


FIG 2

UNIT : mm

馬力 HP	減速比 Gear Ratio	型號 Size	A	D	E	G	F	H	L	J	K	M	X	Y	Z	出力軸端 OUTPUT SHAFT END					Flange
																P	Q	S	T	W	
0.1KW 1/8HP-4P	5-50	18	260 (280)	50	140	120	120	10	13	16	4	126	-	36	115	30	27	18	20	5	FIG.1
	60-200	22	290 (310)	148	185	165	165	11	12	18	4	126	-	46	115	40	35	22	25	7	FIG.2
	250-1800	28	340 (365)	170	215	193	198	11	14	22	4	126	-	52	115	45	40	28	31	7	FIG.2
0.2KW 1/4HP-4P	5-10	18	280 (320)	50	140	120	120	10	13	14	4	126	-	36	115	30	27	18	20	5	FIG.1
	15-90	22	310 (340)	148	185	165	165	11	12	18	4	126	-	46	115	40	35	22	25	7	FIG.2
	100-200	28	323 (352)	170	215	193	195	11	14	22	4	126	-	52	115	45	40	28	31	7	FIG.2
	250-1800	32	435 (450)	180	250	215	230	13	15	27	4	126	-	82	115	55	50	32	35.5	10	FIG.2
0.4KW 1/2HP-4P	5-10	22	330 (360)	148	185	165	165	11	12	18	4	142	-	46	120	40	35	22	25	7	FIG.2
	15-90	28	332 (364)	170	215	193	198	11	14	22	4	142	-	52	120	45	40	28	31	7	FIG.2
	100-200	32	395 (445)	180	250	215	230	13	15	27	5	142	-	82	120	55	50	32	35.5	10	FIG.2
	250-1800	40	480 (580)	230	310	265	285	15	20	32.5	5	142	-	72	120	65	60	40	43.5	10	FIG.2
0.75KW 1HP-4P	5-25	28	371 (398)	170	215	193	198	11	14	22	4	156	-	52	130	45	40	28	31	7	FIG.2
	30-120	32	410 (480)	180	250	215	230	13	15	27	5	156	-	82	130	55	50	32	35.5	10	FIG.2
	125-200	40	485 (505)	230	310	265	285	15	20	32.5	5	156	-	72	130	65	60	40	43.5	10	FIG.2
	250-1800	50	570 (620)	270	360	300	325	22	22	40	5	156	-	83	130	75	70	50	53.5	14	FIG.2
1.5KW 2HP-4P	5-30	32	420 (470)	180	250	215	230	13	15	27	5	179	-	82	145	55	50	32	35.5	10	FIG.2
	40-100	40	460 (510)	230	310	265	285	15	20	32.5	5	179	-	72	145	65	60	40	43.5	10	FIG.2
	120-200	40	470 (520)	230	310	265	285	15	20	32.5	5	179	-	72	145	65	60	40	43.5	10	FIG.2
	250-900	50	580 (630)	270	360	300	325	22	22	40	5	179	-	83	145	75	70	50	53.5	14	FIG.2
2.2KW 3HP-4P	5-30	40	475 (525)	230	310	265	285	15	20	32.5	5	179	-	72	180	65	60	40	43.5	10	FIG.2
	40-120	50	485 (535)	270	360	300	325	22	22	40	5	179	-	83	180	75	70	50	53.5	14	FIG.2
3.7KW 5HP-4P	5-30	50	610 (680)	270	360	300	325	22	22	40	5	208	-	83	180	75	70	50	53.5	14	FIG.2



UNIT : mm

馬力 HP	減速比 Gear Ratio	型號 Size	A	D	E	G	F	H	L	J	K	X	Y	入力軸端 INPUT SHAFT END					出力軸端 OUTPUT SHAFT END				
														P1	Q1	S1	T1	W1	P	Q	S	T	W
1/8HP	5-50	18	166	40	110	65	135	10	10	14	50	130	85	25	22	11 (14)	13.5 (17)	4 (5)	30	27	18	20	5
	60-200	22	193	65	130	90	156	11	13	18	55	135	90	25	22	11 (14)	13.5 (17)	4 (5)	40	35	22	25	7
	250-1800	28	259	90	140	120	170	11	14	22	65	164	110	25	22	11 (14)	13.5 (17)	4 (5)	45	40	28	31	7
1/4HP	5-10	18	166	40	110	65	135	10	10	14	50	130	85	25	22	11 (14)	13.5 (17)	4 (5)	30	27	18	20	5
	15-90	22	193	65	130	90	156	11	13	18	55	135	90	25	22	11 (14)	13.5 (17)	4 (5)	40	35	22	25	7
	100-200	28	204	90	140	120	170	11	14	22	65	164	110	25	22	11 (14)	13.5 (17)	4 (5)	45	40	28	31	7
1/2HP	250-1800	32	288	130	170	167	208	13	17	27	73	197	130	25	22	11 (14)	13.5 (17)	4 (5)	55	50	32	35.5	10
	5-10	22	201	65	130	90	156	11	13	18	55	135	90	30	27	14	17	5	40	35	22	25	7
	15-90	28	219	90	140	120	170	11	14	22	65	164	110	30	27	14	17	5	45	40	28	31	7
	100-200	32	241	130	170	167	208	13	17	27	73	197	130	30	27	14	17	5	55	50	32	35.5	10
1HP	250-1800	40	243	150	210	198	252	15	18	32.5	93	227	150	30	27	14	17	5	65	60	40	43.5	10
	5-25	28	228	90	140	120	170	11	14	22	65	164	110	35	32	19	22	6	45	40	28	31	7
	30-120	32	260	130	170	167	208	13	17	27	73	197	130	35	32	19	22	6	55	50	32	35.5	10
	125-200	40	286	150	210	198	252	15	18	32.5	93	227	150	35	32	19	22	6	65	60	40	43.5	10
2HP	250-1800	50	400	160	230	210	291	18	25	40	100	267	170	35	32	19	22	6	75	70	50	53.5	14
	5-30	32	275	130	170	167	208	13	17	27	73	197	130	40	35	24	28	8	55	50	32	35.5	10
	40-100	40	312	150	210	198	252	15	18	32.5	93	227	150	40	35	24	28	8	65	60	40	43.5	10
	120-200	40	312	150	210	198	252	15	18	32.5	93	227	150	40	35	24	28	8	65	60	40	43.5	10
3HP	250-900	50	420	160	230	201	291	18	25	40	100	267	170	40	35	24	28	8	75	70	50	53.5	14
	5-30	40	316	160	230	198	252	15	18	32.5	93	227	150	45	40	28	32	8	65	60	40	43.5	10
5HP	40-120	50	316	270	360	201	291	18	25	40	100	267	170	45	40	28	32	8	75	70	50	53.5	14
	5-30	50	316	270	360	201	291	18	25	40	100	267	170	45	40	28	32	8	75	70	50	53.5	14

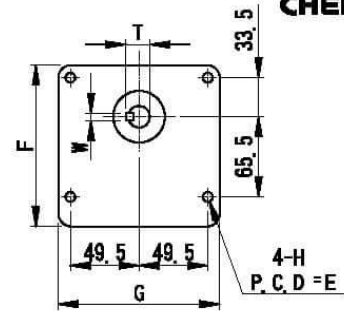
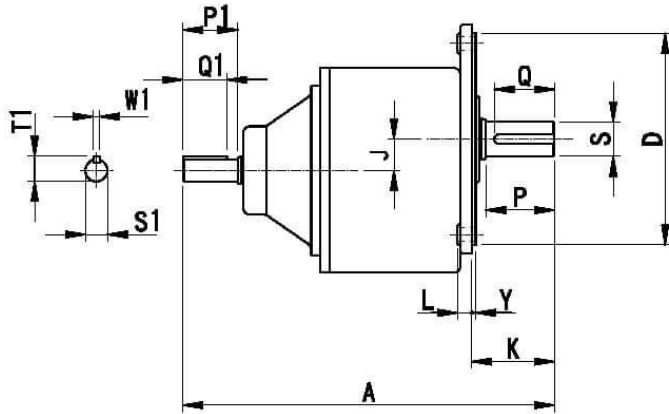


FIG 1

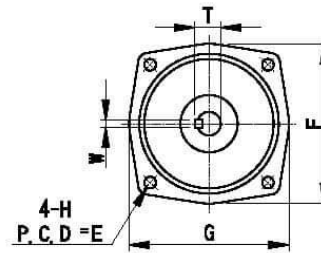


FIG 2

UNIT : mm

馬力 HP	減速比 Gear Ratio	型號 Size	A	D	E	G	F	H	L	J	Y	K	入力軸端 INPUT SHAFT END					出力軸端 OUTPUT SHAFT END				
													P1	Q1	S1	T1	W1	P	Q	S	T	W
1/8HP	5-50	18	188	50	140	120	120	10	13	16	4	38	25	22	11 (14)	13.5	4 (5)	30	27	18	20	5
	60-200	22	193	148	185	165	165	11	12	18	4	46	25	22	11 (14)	13.5	4 (5)	40	35	22	25	7
	250-1800	28	259	170	215	193	198	11	14	22	4	52	25	22	11 (14)	13.5	4 (5)	45	40	28	31	7
1/4HP	5-10	18	166	50	140	120	120	10	13	14	4	36	25	22	11 (14)	13.5	4 (5)	30	27	18	20	5
	15-90	22	193	148	185	165	165	11	12	18	4	46	25	22	11 (14)	13.5	4 (5)	40	35	22	25	7
	100-200	28	204	170	215	193	198	11	14	22	4	52	25	22	11 (14)	13.5	4 (5)	45	40	28	31	7
	250-1800	32	288	180	250	215	230	13	15	27	5	62	25	22	11 (14)	13.5	4 (5)	55	50	32	35.5	10
1/2HP	5-10	22	201	148	185	165	165	11	12	18	4	46	30	27	14	17	5	40	35	22	25	7
	15-90	28	219	170	215	193	198	11	14	22	4	52	30	27	14	17	5	45	40	28	31	7
	100-200	32	241	180	250	215	230	13	15	27	5	62	30	27	14	17	5	55	50	32	35.5	10
	250-1800	40	343	230	310	285	285	15	20	32.5	5	72	30	27	14	17	5	65	60	40	43.5	10
1HP	5-25	28	228	170	215	193	198	11	14	22	4	52	35	32	19	22	6	45	40	28	31	7
	30-120	32	280	180	250	215	230	13	15	27	5	62	35	32	19	22	6	55	50	32	35.5	10
	125-200	40	286	230	310	285	285	15	20	32.5	5	72	35	32	19	22	6	65	60	40	43.5	10
	250-1800	50	400	270	360	300	325	22	22	40	5	83	35	32	19	22	6	75	70	50	53.5	14
2HP	5-30	32	275	180	250	215	230	13	15	27	5	62	40	35	24	28	8	55	50	32	35.5	10
	40-100	40	312	230	310	265	285	15	20	32.5	5	72	40	35	24	28	8	65	60	40	43.5	10
	120-200	40	312	230	310	285	285	15	20	32.5	5	72	40	35	24	28	8	65	60	40	43.5	10
	250-900	50	420	270	360	300	325	22	22	40	5	83	40	35	24	28	8	75	70	50	53.5	14
3HP	5-30	40	318	230	310	265	285	15	20	32.5	5	72	45	40	28	32	8	65	60	40	43.5	10
	40-120	50	316	270	360	300	325	22	22	40	5	83	45	40	28	32	8	75	70	50	53.5	14
5HP	5-30	50	425	270	360	300	325	22	22	40	5	83	45	40	28	32	8	75	70	50	53.5	14

Selection Table of HP & Type (小型減速馬達及速比搭配型號之選配)

Input HP (4P)	Ratio	Type
1/8 (0.1KW)	5	18
	10	
	15	
	20	
	25	
	30	
	40	22
	50	
	60	
	80	
	100	
	120	
	160	28
	200	
	300	
375		
450		

Input HP (4P)	Ratio	Type
1 (0.75KW)	5	28
	10	
	15	
	20	
	25	
	30	32
	40	
	50	
	60	
	80	
	100	40
	120	
	160	
	200	
	200	

Input HP (4P)	Ratio	Type
1/4 (0.2KW)	5	18
	10	
	15	
	20	
	25	
	30	
	40	22
	50	
	60	
	80	
	100	
	120	
	160	28
	200	
	300	
375		
450		

Input HP (4P)	Ratio	Type
2 (1.5KW)	5	32
	10	
	15	
	20	
	25	
	30	40
	40	
	50	
	60	
	80	
	100	

Input HP (4P)	Ratio	Type
3 (2.2KW)	5	32
	10	
	15	40
	20	
	25	
	30	
	40	
	50	
	60	
	60	

Input HP (4P)	Ratio	Type
1/2 (0.4KW)	5	22
	10	
	15	
	20	
	25	
	30	28
	40	
	50	
	60	
	80	
	100	32
	120	
	160	
	200	
	300	
375	40	
450		

Type Selection Table 型號選擇對照表

INPUT RPM: 1750, Permissible Transmission Horsepower and Torque on Output Shaft

入力1750RPM : 出力軸許可傳達馬力及許可扭力矩表

型號 Size	功率 Kw	減速比 Gear Ratio	輸出軸轉速 Output Shaft R.P.M		輸出軸扭力 Output Torque (Kg-M)		重量 Wt. (Kg)	輸出軸徑 Output Shaft Dia.	功率 Kw	減速比 Gear Ratio	輸出軸轉速 Output Shaft R.P.M		輸出軸扭力 Output Torque (Kg-M)		重量 Wt. (Kg)		
			50HZ	60HZ	50HZ	60HZ					50HZ	60HZ					
18	0.1 1/8 HP-4P	1/5	300	360	0.28	0.24	20	32	0.4 1/2 HP-4P	1/160	9.4	11.2	37.45	31.2	510		
		1/10	150	180	0.56	0.47	50			1/200	7.5	9	44	39.4	520		
		1/15	100	120	0.85	0.71	75			1/30	50	60	13.8	11.4	350		
		1/20	75	92	1.1	0.94	105			1/40	37.5	45	18.3	15.2	425		
		1/25	60	72	1.4	1.2	120			1/50	30	36	22.7	18.9	500		
		1/30	50	60	1.7	1.4	135			1/60	25	30	27.8	23.2	560		
		1/40	37.5	45	2.3	1.9	150			1/80	18.8	22.5	35.7	30.5	585		
		1/50	30	36	2.5	2.4	160			1/100	15	18	36.7	31.5	750		
	0.2 1/4 HP-4P	1/60	25	30	3.36	2.82	165		1/5	300	360	4.7	3.9	170			
		1/5	300	360	0.57	0.48	25		1/10	150	180	9.4	7.8	250			
		1/10	150	180	1.1	0.96	55		1/15	100	120	14.3	11.9	370			
		1/15	100	120	1.7	1.4	80		1/20	75	90	19	15.8	410			
		1/20	75	90	2.3	1.9	110		1/25	60	72	23.4	19.7	470			
		1/25	60	72	2.9	2.4	120										
22	0.1 1/8 HP-4P	1/60	25	30	3.3	2.7	165	40	0.1 1/8 HP-4P	1/800	2.5	3	70	68.2	760		
		1/80	18.8	22.5	4.5	3.8	170			1/750	2	2.4	87.3	72.8	820		
		1/100	15	18	5.6	4.7	175			1/900	1.7	2	104.8	87.3	1150		
		1/120	12.5	15	6.6	5.5	230			1/1200	1.3	1.5	139.7	116	1530		
		1/160	9.4	11.2	9.2	7.7	280			0.2 1/4 HP-4P	1/300	5	6	61.2	51.1	560	
		1/200	7.5	9	11.2	9.4	320				1/375	4	4.8	76.5	63.9	700	
		1/30	50	60	3.4	2.9	155				1/450	3.3	4	78.4	75.8	770	
		1/40	37.5	45	4.6	3.8	160				1/100	15	18	44.6	37.1	750	
	0.2 1/4 HP-4P	1/50	30	36	5.7	4.7	165		1/120		12.5	15	55.1	45.8	840		
		1/60	25	30	7.0	5.9	170		1/160		9.4	11.2	70.2	58.5	850		
		1/80	18.8	22.5	9.3	7.7	175		1/200	7.5	9	78.4	75.2	1050			
		1/100	15	18	9.6	7.9	180		1/30	50	60	27.4	22.8	520			
		0.4 1/2 HP-4P	1/5	300	360	1.3	1		40	1/40	37.5	45	36.9	30.7	630		
			1/10	150	180	2.4	2		80	1/50	30	36	45.6	38	750		
	1/15		100	120	3.7	3.1	110		1/60	25	30	54.8	45.6	880			
	1/20		75	90	4.9	4.1	140		1/80	18.8	22.5	72.2	60.1	1010			
	1/25		60	72	6.1	5.1	150		1/100	15	18	74.5	61.9	1150			
									1/5	300	360	7	5.8	210			
	26	0.1 1/8 HP-4P	1/300	5	6	17.4	14.6		280	2.2 3HP-4P	1/10	150	180	14	11.7	320	
			1/375	4	4.8	21.8	18.1		336		1/15	100	120	20.8	17.3	430	
			1/450	3.3	4	26.2	21.8		408		1/20	75	90	28.3	23.5	515	
			1/100	15	18	11.4	9.5		260		1/25	60	72	33.5	28	615	
			0.2 1/4 HP-4P	1/120	12.5	15	14.1		11.8		265						
				1/160	9.4	11.2	18.3		15.3		275						
1/200		7.5		9	23.1	19.3	280										
1/30		50		60	7.1	5.9	220										
0.4 1/2 HP-4P		1/40		37.5	45	9.6	8	265									
		1/50		30	36	12.1	10.1	330									
		1/60	25	30	14.2	11.8	360										
		1/80	18.8	22.5	19.1	15.9	430										
		1/100	15	18	19.7	16.4	505										
		1/5	300	360	2.4	2	88										
0.75 1HP-4P		1/10	150	180	4.8	4	170										
		1/15	100	120	7.1	5.9	195										
		1/20	75	90	9.4	7.8	260										
		1/25	60	72	11.7	9.7	320										
	32	0.1 1/8 HP-4P	1/600	2.5	3	28.4	23.8	520									
			1/750	2	2.4	36	30.3	590									
1/900			1.7	2	44	36.3	720										
1/1200			1.3	1.5	69.3	58	1020										
1/300			5	6	30.2	25.3	500										
1/375			4	4.8	38.6	32.4	630										
0.2 1/4 HP-4P		1/450	3.3	4	44	36.4	740										
		1/100	15	18	23.6	19.7	470										
		1/120	12.5	15	28.96	24.1	480										

單位：扭力 kg-m
 * UNIT: TORQUE: kg-m
 OVERHUNG LOAD (OHL): kg
 * Applies for continuous service free from recurrent shock loading and does not exceed 10 hours per day, 1KG-M=86, 796IN-LB
 每日 8~10 小時連續運轉並在平均負荷
 * Service Factor: 1.0
 操作係數：1.0

選訂方法／範例說明

入力軸迴轉數

以聯結器直結或以皮帶傳動時之入力軸迴轉數，一般為1,800~600 rpm。本公司之標準齒輪減速機規定周速度為10 m/sec 以內，入力軸轉數最高為2,000rpm。

600rpm以下之低轉速，尤其100rpm以下時，因考慮效率之降低及出力軸扭力矩之增大，而須選大一級型號，並特別考慮潤滑問題。

出力軸迴轉數

出力軸轉數依入力軸迴轉數及速比而決定之，如下公式：

$$\text{出力軸轉數} = \text{入力軸轉數} \times \text{速比} \\ = 1800 \times 1/20 = 90 \text{ rpm}$$

效率

齒輪之效率決定於其選角(螺旋角)、周速度及其材質之摩擦係數。

可按下列公式計算型錄中之各減速機之效率。

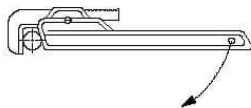
$$\text{效率} = \frac{\text{出力軸kW}}{\text{入力軸kW}} \times 100\% \dots\dots \text{公式(1)}$$

扭力 (扭矩) (Torque)

能使物體迴轉之外力為扭矩。

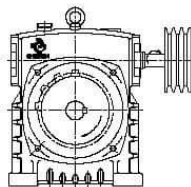
如圖1使用管板鉗鎖螺絲時，管板鉗以螺絲中心為中心而迴轉。

圖1



如圖2乃表示減速機將迴轉動力傳達，入力軸上之皮帶輪(或聯結器)迴轉時，將動力傳到出力軸上之齒輪。

圖2



<例題1>

如圖3有直徑500mm之迴轉體(滑輪)，其圓周吊掛重量50kg之物體時，請問其迴轉體(滑輪)軸，扭矩有多少kgf-m?

$$T = W \times R \dots\dots\dots \text{公式(2)}$$

$$R = \frac{500\text{mm}}{2 \times 1000\text{mm}} = 0.25\text{m}$$

$$T = 50\text{kg} \times 0.25 = 12.5\text{kgf-m}$$

動力與扭矩之關係 (Relation between horsepower and torque)

圖3之迴轉體受(kgf-m)之扭力而迴轉時，可依下列公式。

$$KW = \frac{N \times T}{974} \dots\dots\dots$$

Kw: 入力動力 [kW]

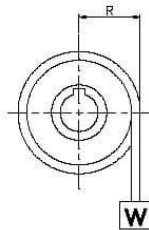
N: 出力迴轉數 [rpm]

T: 出力扭力 [kgf-m]

所以，

$$T = \frac{974 \times KW}{N} \text{ [kgf-m]}$$

圖3



<例題2>

圖3之迴轉體承受10kgf-m之扭力，而以每分鐘30rpm迴轉時，入力馬力為幾kW? (依公式3) 依公式(3)

$$KW = \frac{30\text{rpm} \times 10\text{kgf-m}}{974} = 0.308\text{kW}$$

答案為0.308kW。

按上式可知，在固定動力之下，若迴轉數增加則扭矩減少。反之，若迴轉數減少，則扭矩增大。換句話說，以固定動力馬達迴轉之減速機，其減速比愈大，扭矩亦愈大，而齒面上承受之力愈大，反之，若減速比小其扭矩及齒面所承受力亦小。

荷重係數 (荷載係數) (Load factor)

齒輪減速機之傳遞容量強度，其計算公式是按10小時連續迴轉之正常條件下設計的。故若扭力矩及速度會因速率的不同而變換時，或者常受衝擊荷重時，則可由下列荷重係數表中選出適合之型號來使用。

荷重係數表

電動機(馬達) 每日	荷重之種類		
	平均中等	中等衝擊	過重衝擊
30分以內之迴轉	0.70	0.80	1.00
2小時以內之迴轉	0.80	0.90	1.25
10小時以內之迴轉	1.00	1.25	1.50
24小時以內之迴轉	1.25	1.60	1.75

若1小時內有10次以上之啟動停止時，請用下表

電動機(馬達) 每日	荷重之種類		
	平均中等	中等衝擊	過重衝擊
30分以內之迴轉	0.80	1.00	1.25
2小時以內之迴轉	1.00	1.25	1.50
10小時以內之迴轉	1.25	1.50	1.75
24小時以內之迴轉	1.50	1.75	2.00

若用於攪拌機、水泥機等荷重變動劇烈時，請用下表

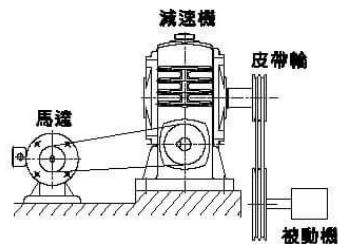
電動機(馬達) 每日	荷重之種類	
	入力軸正轉時	入力軸正、逆轉時
30分以內之迴轉	1.00	1.25
2小時以內之迴轉	1.25	1.50
10小時以內之迴轉	1.50	1.75
24小時以內之迴轉	1.75	2.00

超吊荷重 (Overhung Load) 扭力與超吊荷重之關係

使減速機軸變形彎曲，或外殼破裂的原因之一為超吊荷重所引起的。

超吊荷重就是作用於軸上之懸吊荷重，是選擇減速機時必須考慮之條件之一。一般將扭力矩除以迴轉體之半徑就是超吊荷重。

圖4



超吊荷重係數 (Overhung load coefficient)

在聯結減速機入力軸及出力軸，使用聯結器(coupling)時，僅考慮扭力荷重就可以。但若使用鏈條齒輪，三角皮帶輪及平皮帶輪傳動時，就必需考慮超吊荷重係數：

下表為超吊荷重係數：

超吊荷重係數			
鏈齒輪	齒輪	三角皮帶輪	平皮帶
1.00	1.25	1.50	2.50

超吊荷重之計算基準

設其作用點在軸心伸出總LS尺寸之中心位置來計算軸承，軸心，及外殼之強度。所以若作用點移動而不在LS尺寸之中心時，以下列兩條公式來計算之。

1) 荷重作用位置在外側邊時之超吊荷重

$$L_a = L_c \frac{l}{l+l_b} \dots\dots\dots \text{公式(4)}$$

2) 荷重作用位置在內側邊時之超吊荷重

$$L_a = L_c \frac{l}{l-l_b} \dots\dots\dots \text{公式(5)}$$

- L_a : 所要求之超吊荷重(Overhung load)
- L_c : 型錄中所配之超吊荷重
- l : L_s 中心到軸承中心的距離
- l_b : 由荷重作用點到 L_s 中心之距離

圖5

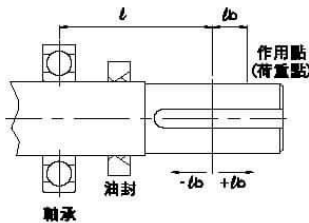
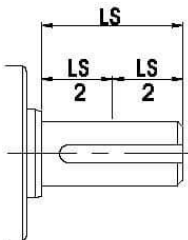


圖6



各型號之出力軸之尺寸表(mm)

型號	32	40	50	60
ℓ尺寸	39	38.5	47	54.5
型號	70	80	100	120
ℓ尺寸	82	84	83.5	87.5
型號	125	155	175	200
ℓ尺寸	98.5	100	112.5	142
型號	225	250	300	350
ℓ尺寸	172	171	188	205
型號	400			
ℓ尺寸	229			

超吊荷重之檢討公式

$$L_r = \frac{T}{R} \times f \dots\dots\dots \text{公式(6)}$$

$$R = \frac{T}{L_r} \times f \dots\dots\dots \text{公式(7)}$$

L_r : 實際上的超吊荷重(kg)

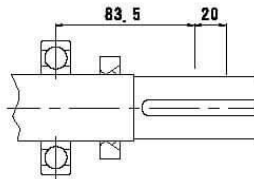
T : 扭力矩(kgf-m)

R : 鏈條齒輪，齒輪，三角皮帶輪等之半徑(m)

f : 超吊荷重係數

<例題3>

CTA100型1/30入力軸迴轉數1500rpm時之許可OHL是340kg(可由型錄中找出)，若出力軸中心點外移20mm位置為荷重點時，實際上的OHL是多少？



以公式(4)

$$L_a = L_c \frac{l}{l+l_b}$$

$$= 340 \times \frac{83.5}{83.5+20}$$

$$= 274.3 \text{ [kg]}$$

所以274.3kg

<例題4>

傳達27kgf-m之減速機出力軸上套150mm之齒輪時，實際之超吊荷重是多少kg？以公式(6)

$$L_r = \frac{T}{R} \times f$$

$$= \frac{27}{0.075} \times 1.25 = 450 \text{ kg}$$

所以450kg

<例題5>

CTB120型1/50，入力回轉數1800rpm，傳達扭力矩40kgf-m之減速機出力軸套上250mm之鏈齒輪，而超吊荷重作用於出力軸尺寸中心偏外10mm時，請檢討此型號可以嗎？

實際超吊荷重

按(6)式

$$L_r = \frac{T}{R} \times f$$

$$= \frac{40}{0.125} \times 1 = 320 \text{ kg}$$

依許可超吊荷重

按(4)式

$$L_a = L_c \frac{l}{l+l_b}$$

$$= 500 \times \frac{87.5}{87.5+10} = 449 \text{ kg}$$

而449kg大於320kg，所以知許可超吊荷重比實際超吊荷重大，即為安全可用。

<例題6>

減速機之選訂範例 (以使用於輸送帶為例)

使用條件：

入力軸迴轉數1500rpm

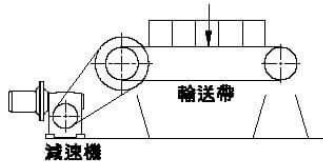
出力軸迴轉數30rpm

出力軸與輸送帶速比1:2鏈條傳動

需要驅動輸送帶之扭力矩為70(kgf-m)平均荷重，24小時連續運轉，荷重係數為1.25

減速機出力軸套上 ϕ 250mm之鏈齒輪，而其超吊荷重作用於 L_s 尺寸中心向外移20mm處。

(註：未考慮鏈條效率損失)



2. 減速比: $\frac{30}{1500} = 1/50$
 3. 減速機出力軸扭力矩 = $\frac{70}{2}$
 (1:2鏈條傳動)
 = 35 [kgf-m]

荷重係數 1.25
 $35 \times 1.25 = 43.8$ [kgf-m]
 從型錄中可找出
 #120型-1/50之許可扭力矩為 55.2 kgf-m
 (比實際 43.8 kgf-m 還大, 故安全。)
 許可 O. H. L. 為 520 kg
 實際超吊荷重
 $Lr = \frac{35}{0.125} \times 1 = 280$ [kg]

因超吊荷重之作用點在 LS 尺寸中心偏外 20mm, 所以調整後之許可 O. H. L. 為:
 $L_a = L_c \frac{l}{l+2b}$ 公式(4)

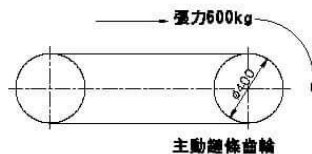
$$= 520 \times \frac{87.5}{87.5+20} = 423$$
 [kg]

則 423kg 比實際超吊荷重 280kg 還大, 故安全可用。

<例題7>

鏈條機之選定

鏈條傳送機之條件:
 鏈條張力為 600kg
 主動鏈條齒輪之直徑為 400mm
 輸送速度為 3.7m/min, 而主動鏈條齒輪以聯結器(Coupling)與減速機出力軸直結。
 問需何種減速機?



已知:
 入力軸迴轉數=1800rpm
 8小時/日平均負荷
 設 O. H. L.=600kg

主動鏈條齒輪之迴轉數是

$$\pi D N = 3.7 \text{ m/min}$$

$$N = \frac{30}{\pi D}$$

$$= \frac{3.7}{3.14 \times 0.4 \text{ (m)}}$$

$$= 2.94 \approx 3 \text{ rpm}$$

主動部鏈條齒輪上之扭力矩 T 是

$$T = W \cdot R$$

$$= 600 \times 0.2 = 120$$
 [kgf-m]
 減速比=1/600

選減速機為雙段式 80-135-1/600, 其容許扭力矩(許可扭力矩)為 140 kgf-m (大於 120 kgf-m), 故安全可用。
 容許 O. H. L. 810 [kg] (大於 600kg), 亦安全。

<例題8>

請選出減速比 1/40, 入力軸套上 1:3 之減速皮帶輪, 以動力 0.75kW 馬達驅動之減速機型號。

入力軸(蝸桿)迴轉數為
 (已知馬達轉速為 1800rpm)

$$\frac{1800}{3} = 600 \text{ rpm}$$

則由型錄中可找出是 80 型
 (型錄表列入力軸許可馬力為 0.86kw)

<例題9>

入力軸套上 $\phi 400$ mm 之把手搖輪, 要以 20kg 之手動力來迴轉時, 所能使用之最大減速機型號是多大? (速比為 1/50)

入力軸扭力矩是
 $20 \text{ kg (W)} \times 0.2 \text{ m (R)} = 4 \text{ kgf-m}$

所傳達於出力軸上之扭力矩為
 $4 \text{ kgf-m} \times 50 \times 0.3$ (啟動摩擦係數)
 = 60 kgf-m
 則由型錄中可找出是 120 型

<例題10>

馬達 1.5kW, 60Hz (週率), 6P (極), 以聯結器(Coupling)直結於入力軸, 減速比 1/30 時, 請算出減速機之大小型號, 效率及出力軸動力?

●由型錄扭力矩表上找出入力 1200rpm (60Hz X 6P), 速比 1/30, 可傳達 1.5kW 之減速機型為 100 型。(表列 2.93HP) 則型號為 100 型

●效率 = $\frac{\text{出力軸KW}}{\text{入力軸KW}}$
 $= \frac{2.06}{2.93} = 0.7$ (70%) (由型錄附表查出)

●出力軸動力 = 1.5kW X 70% = 1.05kW (1.4HP)

●若已知出力軸上之荷重及負荷時其選定法如下:

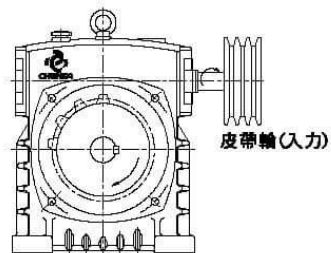
<例題11>

出力軸迴轉數 30rpm, 減速比 1/60, 出力軸扭力矩需要為 45kgf-m 時, 請選出減速機之型號來。

入力軸迴轉數是 30x60=1800rpm 則由型錄表中可找出 120 型 (表列 47.4kgf-m)

<例題12>

出力軸扭力矩 70kgf-m, 減速比 1/40, 減速機出力軸上套裝 100 之鏈齒輪驅動時, 請問超吊荷重有多少, 又要用何型號之減速機?
 (設入力軸迴轉數 1800rpm)



●O. H. L. = $\frac{T}{R} \times f$
 $= \frac{70}{0.05} \times 1 = 1400 \text{ kg}$ (超吊荷重)
 由型錄中選出可容許超吊荷重 1400kg 之減速機為
 型號 155 型 (1/40) (表列 1490kg)

常用之設計參考資料:

馬達公式		
直流馬達	交流馬達	
	單相 Single Phase	三相 Three Phase
AMP = (HPx746) / (VOLTxEFF) (0.75x1000) / (VOLTxPF)	(HPx746) / (VOLTxEFFxPF) (0.75x1000) / (VOLTxPF)	(HPx746) / (VOLTxEFFx1.73) (0.75x1000) / (VOLTxPFx1.73)
KW = (AMPxVOLT) / 1000	(AMPxVOLTxPF) / 1000	(AMPxVOLTxPFx1.73) / 1000
HP = (AMPxVOLTxEFF) / 746	(AMPxVOLTxEFFxPF) / 746	(AMPxVOLTxEFFxPFx1.73) / 746

PF= 功率因數約 80%
EFF= 效率, 約 80% - 90%
若欲取得更精確資料, 則請與馬達製造商聯絡

常用公式集			
欲知的條件	代碼	公式	單位
扭力 Torque	T	T = F x R	(Kg-m)
扭力 Torque	T	T = (716.2 x Hp) / N	(Kg-m)
扭力 Torque	T	T = (974 x kW) / N	(Kg-m)
馬力 HP	Hp	Hp = (T x N) / 716.2	(Hp)
動力 kW	kW	kW = (T x N) / 974	(kW)
馬力 HP	Hp	Hp = (F x V) / 75	(Hp)
動力 kW	kW	kW = (F x V) / 102	(kW)
速度 SPEED	V	V = (π x D x N) / 60	(m/sec)
減速比 RATIO	i	i = N1 / N2	
飛輪效應 Dynamic moment	GD ²	GD ² = 384 x (F x V ² x N ²)	kgm ²

F : 重量 (kg) D : 直徑 (m)
N : 出力轉每分鐘轉數 (RPM) R : 半徑 (m)

單位換算 Conversion Factors					
kW	HP	1kg-m	1Nm	1in-lb	1ft-lb
1.34HP	0.746kW	9.807 Nm	0.10197kg-m	0.1129 Nm	1.356 Nm
1.36PS	1.01PS	7.233ft-lb	0.7375ft-lb	0.0115kg-m	0.1383kg-m
102.0kg-m/s	70.07kg-m/s	88.706in-lb	8.85070in-lb	0.083ft-lb	12in-lb

潤滑油選定 Selection of Lubricant Oil
標準負荷, 入力轉速 600RPM 或之上

環境溫度 (°C)	中國石油	ISO VG	Mobil	Shell
-30 ~ -15	HD 100	VG 100	Mobilgear 627	Omala 100
-15 ~ -3	HD 150	VG 150	Mobilgear 629	Omala 150
-3 ~ 23	HD 220	VG 220	Mobilgear 630	Omala 220
23 ~ 40	HD 320	VG 320	Mobilgear 632	Omala 320
40 ~ 80	HD 460	VG 460	Mobilgear 634	Omala 460

超重負荷, 入力轉速 600RPM 或之上

環境溫度 (°C)	中國石油	ISO VG	Mobil	Shell
-30 ~ -15	HD 150	VG 150	Mobilgear 629	Omala 150
-15 ~ -3	HD 220	VG 220	Mobilgear 630	Omala 220
-3 ~ 23	HD 320	VG 320	Mobilgear 632	Omala 320
23 ~ 40	HD 460	VG 460	Mobilgear 634	Omala 460
40 ~ 80	HD 680	VG 680	Mobilgear 636	Omala 680

零件規格 Part Specification
ASS - BSS - USS (CTA.CTB.CTU)

型號 Type	入力軸 Shaft Input			出力軸 Shaft Output		
	軸承 Bearing	油封 Oil Seal	鍵 Key	軸承 Bearing	油封 Oil Seal	鍵 Key
40	6202	15, 25, 6	4*4*22 (單)	6203	17, 30, 7	5*5*30 (單) 5*5*26 (平)
50	6203	17, 30, 7	4*4*25 (單)	6204	20, 35, 8	5*5*35 (單) 7*7*30 (平)
60	30204	20, 35, 8	5*5*35 (單)	6205	25, 40, 8	7*7*45 (單) 10*8*30 (平)
70	30205	25, 40, 8	5*5*35 (單)	6206	30, 50, 11	7*7*55 (單) 10*8*45 (平)

型號 Type	入力軸 Shaft Input			出力軸 Shaft Output		
	軸承 Bearing	油封 Oil Seal	鍵 Key	軸承 Bearing	油封 Oil Seal	鍵 Key
80	30208	30, 50, 11	7*7*45 (單)	6207	35, 55, 11	10*8*60 (單) 10*8*50 (平)
100	30207	35, 55, 11	7*7*45 (單)	6208	40, 62, 12	10*8*70 (單) 12*8*60 (平)
120	30308	40, 62, 12	7*7*60 (單)	6210	50, 72, 12	12*8*80 (單) 15*10*75 (平)
135	30309	45, 68, 12	10*8*70 (單)	6212	50, 82, 12	15*10*90 (單) 18*12*80 (平)
155	30309	45, 68, 12	10*8*80 (單)	32213	65, 88, 12	15*10*95 (單) 20*13*95 (平)
175	30311	50, 72, 12	12*8*80 (單)	32214	70, 95, 13	18*12*105 (單) 20*13*100 (平)
200	30311*2 6311	52, 75, 12	12*8*90 (單)	32215	75, 100, 13	20*13*120 (單) 24*16*135 (平)
225	30312*2 6312	57, 75, 12	15*10*90 (單)	32217	85, 120, 13	20*13*135 (單) 24*16*135 (平)
250	30313*2 6313	62, 85, 12	15*10*105 (單)	32219	95, 120, 13	24*16*140 (單) 28*18*150 (平)

ESS, VSS (CTE-U, D)

型號 Type	入力軸 Shaft Input			出力軸 Shaft Output		
	軸承 Bearing	油封 Oil Seal	鍵 Key	軸承 Bearing	油封 Oil Seal	鍵 Key
40	6202	15, 25, 6	4*4*22 (單)	6203	17, 30, 7	5*5*30 (單) 5*5*26 (平)
50	6203	17, 30, 7	4*4*25 (單)	30204	20, 35, 8	5*5*35 (單) 7*7*30 (平)
60	30204	20, 35, 8	5*5*35 (單)	30205	25, 40, 8	7*7*45 (單) 10*8*30 (平)
70	30205	25, 40, 8	5*5*35 (單)	30206	30, 50, 11	7*7*55 (單) 10*8*45 (平)
80	30206	30, 50, 11	7*7*45 (單)	30207	35, 55, 11	10*8*60 (單) 10*8*50 (平)
100	30207	35, 55, 11	7*7*45 (單)	30208	40, 62, 12	10*8*70 (單) 12*8*60 (平)
120	30308	40, 62, 12	7*7*60 (單)	30210	50, 72, 12	12*8*80 (單) 15*10*75 (平)
135	30309	45, 68, 12	10*8*70 (單)	30212	60, 82, 12	15*10*90 (單) 18*12*80 (平)
155	30309	45, 68, 12	10*8*80 (單)	32213	65, 88, 12	15*10*95 (單) 20*13*95 (平)
175	30311	50, 72, 12	12*8*80 (單)	32214	70, 95, 13	18*12*105 (單) 20*13*100 (平)
200	30311*2 6311	52, 75, 12	12*8*90 (單)	32215	75, 100, 13	20*13*120 (單) 24*16*135 (平)
225	30312*2 6312	57, 75, 12	15*10*90 (單)	32217	85, 120, 13	20*13*135 (單) 24*16*135 (平)
250	30313*2 6313	62, 85, 12	15*10*105 (單)	32219	95, 120, 13	24*16*140 (單) 28*18*150 (平)

直結式入力軸, 中空型出力軸

型號 Type	直結式入力軸 Bore Input			中空型出力軸 Bore output	
	軸承 Bearing	油封 Oil Seal	馬力 Power	軸承 Bearing	油封 Oil Seal
40	6203 6203NR	25, 35, 8	1/4HP	6006	30, 50, 8
50	6202	00, 35, 5 25, 35, 8	1/4HP 1/2HP	6008	40, 62, 12
60	6005 6204	25, 38, 8	1/4HP 1/2HP	6009	45, 68, 12
70	30205 32004	25, 40, 8 00, 40, 5 35, 42, 7	1/2HP 1HP	6010	50, 72, 12
80	30205	40, 50, 8	1HP 2HP	6012	60, 82, 12
100	30208	40, 55, 8 48, 68, 12	2HP 3HP	6012	60, 82, 12
120	30308 32210	50, 72, 12	3HP 5HP	6214	70, 95, 13
135	30309 30309 32211	55, 75, 12 55, 75, 12	5HP 7 1/2 HP	6219	95, 120, 13

(備註: 油封規格孔徑 00 表示為全密封)

減速機使用說明

壹、安裝

1. 減速機入力軸直接與馬達聯結時，應採彈性聯軸器；出力軸直接與工作機聯結時，宜採用齒輪聯軸器。
2. 減速機應安裝在穩固的基礎座，且須注意空氣流通及換油時，注油及洩油之方便性。
3. 減速機入力軸及馬達出力軸之中心線必須對準確，誤差不得大於所用聯軸器之允許值。
4. 減速機安裝後，用手轉動需靈活，不可有卡死現象。
5. 減速機安裝好，使用前應先進行空負荷運轉，確定機器各部分都無異狀後，方可正式使用，如有故障應先排除。

貳、潤滑

1. 新減速機使用時，於運轉300小時後，需更換新油，其後每使用2500小時需換油；但在使用過程中仍應定期檢查油的質、量，若油有雜質、老化、變質情況，必須隨時更換。
2. 減速機應使用固定品牌、號碼之齒輪油，不應將不同品牌，號碼或不同類型的油相混合使用。
3. 在換油過程中，應先將減速機內部清除乾淨，再注入新油。
4. 在使用期間，當發現油溫過高（超過80°C以上）時，以及有不正常的噪音等現象，應立即停止使用、檢查原因，等排除故障或更換潤滑油後，才可繼續使用。
5. 推薦用油：ISO HD-460極壓機油或中油HD-320之極壓機油，或中油90#多效齒輪油。

參、維護

1. 減速機應定期檢修，發現異狀或有顯著磨損，必須立即採取有效措施制止，備用零件之材質、精度亦須照標準製造。更新零件後，應先進行空負荷運轉，確定正常後再正式使用。
2. 使用單位應建立合理的維護制度，對減速機的使用狀況及檢修中發現的問題，做仔細紀錄。

CHENTA WORM GEAR REDUCERS

I .Installation

- 1.Input shaft connects to motor directly, a flexible coupling is perferably applied; output shaft connects to machine, it is better to use a gear coupling.
- 2.Install on a stable foundation and good air ventilation and the convenience of oil filling / draining should be considered.
- 3.The input shaft of the reducer and the motor shaft should be in alignment and the tolerance should fit the allowance.
- 4.After installation, please check input shaft by hand first to check whether running smoothly of nut.
- 5.Before start-up, no-load running test should be proceeded and any abnormal status occurred should be corrected immediately.

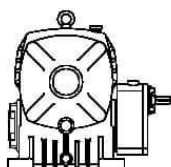
II .Lubrication

- 1.A new reducer needs replace oil in the beginning of 300 hrs operation; and then, each 2,500 hrs change again. Moreover, a regular oil checking is requierd and changed necessarily.
- 2.Please change by equivalent specification of oil and don't mix with other brands of specification of oil.
- 3.Before changing oil, the inside of reducer should be flushed and drained out, then fill in new oil.
- 4.During operation, if the heat is over 80 °C or any abnormal noise occurred, please shut down the reducer for checking immediately and start running only after the cause is resolved.
- 5.Lubricant recommendation: MOBIL gear 632, SHELL omala 320 or MOBIL mobilube HD80W-90, SHELL spirax E.P.90.

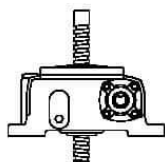
III .Maintenance

1. A regular maintenance is required and if found any worn out, corrective action should be taken. The accuracy of spare parts replaced should be exactly the same as the original standard and no-load running test in advance is required.
- 2.Build maintenance system and data collection of failure carefully for all problems been met.

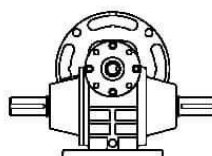
特殊型式簡介 (訂單生產)



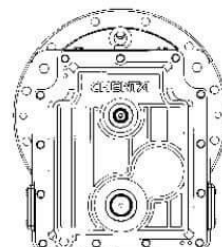
CT-ASG



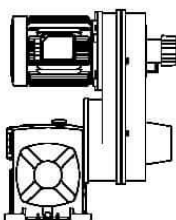
CT-ETS



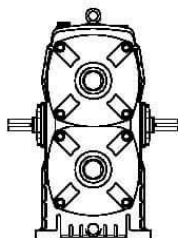
CT-DSM



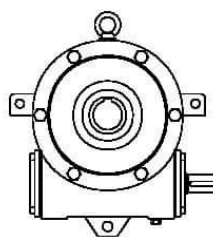
Gearbox of water pump
(Power from diesel cagine)
移動式抽水泵浦用齒輪箱



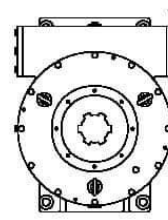
CT-BSV



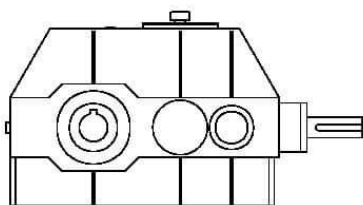
CT-TAB



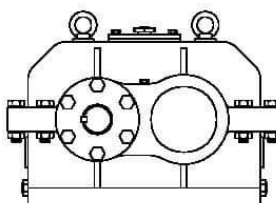
CT-RHS



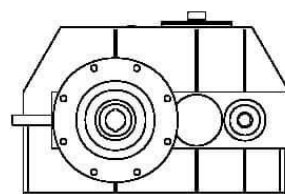
CT-EHM



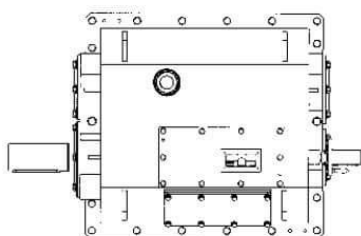
GEAR BOX
BEVEL HELICAL GEAR



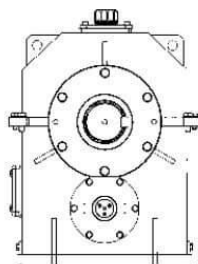
GEAR BOX
HELICAL GEAR



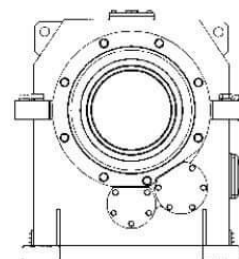
GEAR BOX WITH FLANGE
HELICAL GEAR



Gearbox of wind power generator
風力發電機用變速齒輪箱



Gear speed increaser
風力發電機用增速機

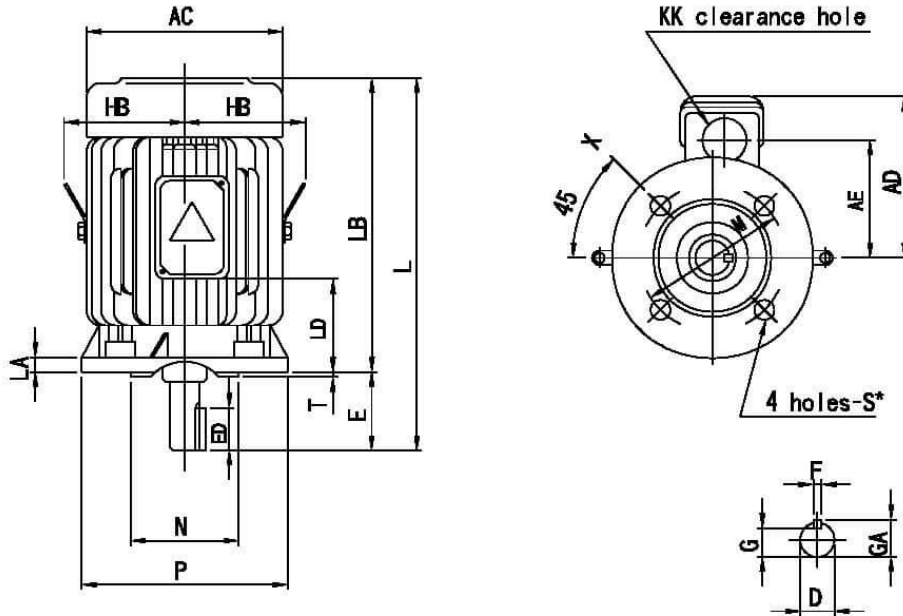


Gear speed increaser
for wind power generator
(with hollow bore output)
風力發電機用增速機

公制IEC標準馬達尺寸圖(參考用)

IEC STANDARD

Motor Dimensions Reference



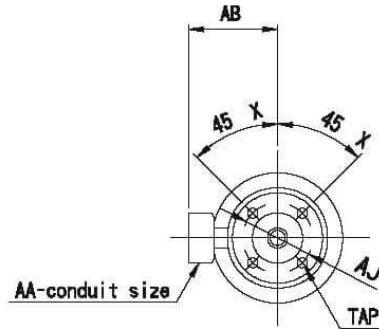
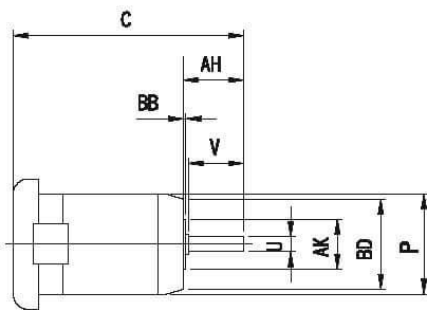
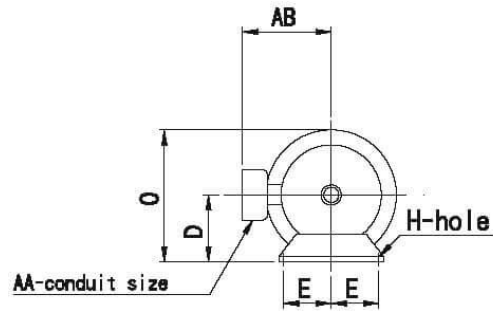
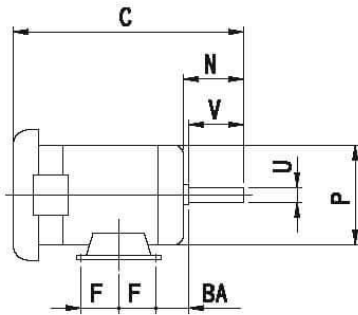
輸出 OUTPUT (HP)				框號 FRAME		AC	AD	AE	HB	KK	L	LA	LB	LD	M	N	P	S	T	軸端 END OF SHAFT								
2P	4P	6P	8P	標準 IEC	東元 TECO															D	E	ED	F	G	GA			
0.25	0.25	---	---	63	---	144	123	93	---	22	248	12	225	74	115	95	140	10	3.5	11	23	10	4	8.5	12.5			
0.25	0.25	---	---	---	63	144	123	93	---	22	248	12	225	74	130	110	160	10	3.5	11	23	10	4	8.5	12.5			
0.5	0.5	---	---	71	71	182	133	103	---	22	277.5	12	247.5	82	130	110	180	10	3.5	14	30	14	5	11.0	16.0			
1	1	0.5	0.25	80	80	177	144	112	---	22	282	12	242	80	185	130	200	12	3.5	19	40	25	6	15.5	21.5			
2	3	2	1	0.5	90L	90L	200	157	125	---	22	371.5	12	321.5	113	185	130	200	12	3.5	24	50	32	8	20.0	27.0		
---	3	2	1	100L	100L	219	180	145	140	28	374.5	16	314.5	88	215	180	250	14.5	4.0	28	80	40	8	24.0	31.0			
5	5	3	2	112M	112M	238	189	154	150	28	431	16	371	135	215	180	250	14.5	4.0	28	80	40	8	24.0	31.0			
7.5	10	7.5	5	3	132S	132S	273	224	180	35	454	20	374	97	285	230	300	14.5	4.0	38	80	56	10	33.0	41.0			
---	10	7.5	5	132M	132M	273	224	190	189	35	492	20	412	116	285	230	300	14.5	4.0	38	80	56	10	33.0	41.0			
15	20	15	10	7.5	160M	160M	334	283	218	217	35	608	20	498	151	300	250	350	18.5	5.0	42	110	80	12	37.0	45.0		
25	20	15	10	160L	160L	334	283	218	217	35	652	20	542	173	300	250	350	18.5	5.0	42	110	80	12	37.0	45.0			
30	---	---	---	---	180MA	382	305	250	241	52	672	20	562	170.5	350	300	400	18.5	5.0	48	110	80	14	42.5	51.5			
---	25	30	20	15	---	180MC	382	305	250	241	52	672	20	562	170.5	350	300	400	18.5	5.0	48	110	80	14	42.5	51.5		
---	25	20	15	180M	---	382	304	250	241	52	672	20	562	170.5	300	250	350	18.5	5.0	48	110	80	14	42.5	51.5			
---	30	25	20	180L	---	382	304	250	241	52	672	20	562	170.5	300	250	350	18.5	5.0	48	110	80	14	42.5	51.5			
40	---	---	---	---	180LA	382	305	250	241	52	710	20	600	189.5	350	300	400	18.5	5.0	55	110	80	16	49.5	59.5			
50	40	25	30	20	200L	180LC	382	305	250	241	52	710	20	600	189.5	350	300	400	18.5	5.0	55	110	80	16	49.0	59.0		
50	60	---	---	---	225M	200LA	458	362	299	286	65	774.5	20	664.5	194.5	400	350	450	18.5	5.0	55	110	80	16	49.0	59.5		
---	50	60	40	50	30	40	225S/M	200LC	458	362	299	286	65	804.5	20	664.5	194.5	400	350	450	18.5	5.0	60	140	110	18	53.0	64.0
75	---	---	---	---	225SA	510	411	337	312	92	786	22	676	190	500	450	500	18.5	5.0	55	110	80	16	49.0	59.0			
---	75	60	50	250M	225SC	510	411	337	312	92	816	22	676	190	500	450	550	18.5	5.0	65	140	110	18	58.0	69.0			
100	---	---	---	---	250SA	545	499	384	329.5	92	882.5	22	742.5	182.5	500	450	550	18.5	5.0	55	110	80	16	49.0	59.0			
---	100	75	60	280S	250SC	545	499	384	329.5	92	882.5	22	742.5	182.5	500	450	550	18.5	5.0	75	140	110	20	67.5	79.5			
125	---	---	---	---	250MA	545	499	384	329.5	92	890.5	22	780.5	201.5	500	450	550	18.5	5.0	55	110	80	16	49.0	59.0			
---	125	100	75	280M	250MC	545	499	384	329.5	92	920.5	22	780.5	201.5	500	450	550	18.5	5.0	75	140	110	20	67.5	79.5			

*註：“S”，東元≤180LC為4孔，≥200LC為8孔。
標準IEC≤132M為4孔，≥160L為8孔。

美制NEMA標準馬達尺寸圖(參考用)

NEMA STANDARD

Motor Dimensions Reference



NEMA FRAME	D	E	F	H	MIN N	D	P	U	MIN V	AA	AB	AH	AJ	AK	BA	BB	BD	TAP
48	3	2-1/8	1-3/8	11/32 SLOT	1-7/8	5-7/8	5-11/16	1/2	1-1/2	1/2	4-3/8	1-11/16	3-3/4	3	2-1/2	5/32	5-5/8	1/2-20
56	3-1/2	2-7/16	1-1/2	11/32 SLOT	2-1/4	6-7/8	6-5/8	5/8	1-7/8	1/2	5	2-1/16	5-7/8	4-1/2	2-3/4	5/32	6-1/2	3/8-16
143T	3-1/2	2-3/4	2	11/32	2	6-7/8	6-5/8	7/8	2	3/4	5-1/4	2-1/8	5-7/8	4-1/2	2-1/4	5/32	6-1/2	3/8-16
145T			2-1/2															
182			2-1/4		2			7/8	2			2-1/8	5-7/8	4-1/2		5/32	6-1/2	3/8-16
184			2-3/4				8-11/16	7-7/8		3/4	5-7/8			2-3/4				
182T	4-1/4	3-3/4	2-1/4	13/32	2-3/4			1-1/8	2-3/4			2-7/8	7-1/4	8-1/2	2-3/4	1/4	9	1/2-13
184T			2-3/4															
213			2-3/4					1-1/8	2-3/4				3					
215	5-1/4	4-1/4	3-1/2	13/32	3-3/8	10-1/4	9-9/16			3/4	7-3/8		7-1/4	8-1/2	3-1/2	1/4	9	1/2-13
213T			2-3/4					1-3/8	3-3/8				3-3/8					
215T			3-1/2															
254U			4-1/8					1-3/8	3-1/2				3-3/4					
256U			5															
254T	6-1/4	5	4-1/8	17/32	4-1/4	13	13-1/2	1-5/8	4	1	9-5/8		7-1/4	8-1/2	4-1/4	1/4	10	1/2-13
256T			5										4					



CHENTA