



Artro Robot
Development & Motion Control

CONTENTS

CONTENTS

Advantages
Selection of ARTRO Robot
Ball screw
LM-Guide

INTRO 2

INTRO



AS-S/P Type Structure
AS-Series Model Info.
AS-045S/L/R/U
AS-050S/L/R/U
AS-070S/L/R/U
AS-090S/L/R/U-10/20
AS-120S/L/R/U
AS-160S/L/R/U
AS-200S/L/R/U

AS-SERIES (Ball screw 구동 Type) 18

AS-SERIES



ACS-S/P TYPE Structure
ACS-Series Model Info.
ACS-045S/L/R/U
ACS-065S/L/R/U
ACS-070S/L/R/U
ACS-090S-10/20/L/R/U
ACS-120S/L/R/U
ACS-160S/L/R/U
ACS-200S/L/R/U
ACS-270N

ACS-SERIES (Ball screw 구동 Clean Type) 52

ACS-SERIES



AB-Series Model Info.
Timing Belt Robot Table & Structure
AB-040
AB-090DL/DR/UL/UR/FL/FR
AB-120DL/DR/UL/UR/FL/FR
AB-160DL/DR/UL/UR/FL/FR
AB-200DL/DR/UL/UR/FL/FR

AB-SERIES (Belt 구동 Type) 86

AB-SERIES



AL-Series Model Info.
AL-Series Linear Motor Info.
AL-150
AL-180
AL-220
AL-300

AL-SERIES (Linear Motor 구동 Type) 116

AL-SERIES



AC-A Combination
AC-B Combination
AC-C Combination
AC-C2 Combination
AC-D Combination
AC-D2 Combination

AC-Combination 124

AC-COMBINATION

Advantages

■ 저렴한 가격, 고품질, 단 납기 대응.

ARTRO ROBOT은 직교로봇의 새로운 강자로서 검증된 부품 사용으로 좋은 품질의 로봇을 생산하고 있습니다.

■ 고 정밀 모션 실현

최대 반복정밀도 0.02(mm)를 실현하였습니다.

■ 다양한 유저요구속도 대응

기본 3가지 속도를 준비하였습니다. 250mm/s, 500mm/s, 1000mm/s, 그리고 유저 사양에 따라 다른 속도 또한 가능합니다. (optional)

■ 높은 강성 실현

Artro Robot Aluminum profile은 설계단계부터 고강성을 실현하기 위해 구조해석 프로그램을 이용하여 설계, 제작 되었습니다.

■ 설계 장점

다양한 크기와 기능으로 설계시간 단축.
생산 원가 절감 (설계비용, 가공비용, 소재비용, 인건비, 관리비 등...)
심플하고 컴팩트한 설계가 가능합니다.

■ 다양한 모터 및 컨트롤 시스템 적용

설계자의 요구에 따른 다양한 모터 및 컨트롤 시스템이 준비되어 있습니다.

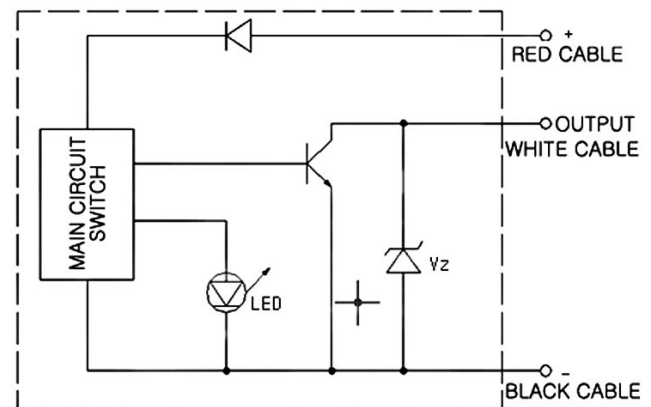
■ 센서

아트로 로봇은 기본으로 마그넷 센서를 사용합니다.
이는 로봇 외부에서 홈 및 리미트 센서의 작동 유무 확인 및 센서위치 조절이 편리합니다.
또한 센서 홈을 이용하여 기종이 다른 포토센서부착이 가능하고, 기타 다른 부품(Cable chain bk't...etc)을 추가 가공 없이 부착 가능합니다.

센서 홈과 센서 그림 1



센서 회로도



Selection of ARTRO Robot

로봇 선정 시 검토사항

1. 최대하중(kgf)
2. 최대속도(mm/s)
3. Stroke(mm)
4. 필요한 반복정밀도(mm)
5. 로봇 취부 방향(A, B, C Type)
6. 로봇 구동 메카니즘(Ball screw / Timing belt)
7. 기타 conditions



Type-A



Type-B



Type-C

구동토크 산출

볼나사는 나사축과 너트 사이에서 볼이 구름운동을 하기 때문에 높은 효율이 얻어지며 종래의 미끄럼 나사에 비하여 구동 토크가 1/3 이하입니다. (그림1, 그림2)

따라서, 회전운동을 직선운동으로 변환하는 것뿐만 아니라 직선운동을 회전운동으로 변환하는 것도 쉽게 가능합니다.

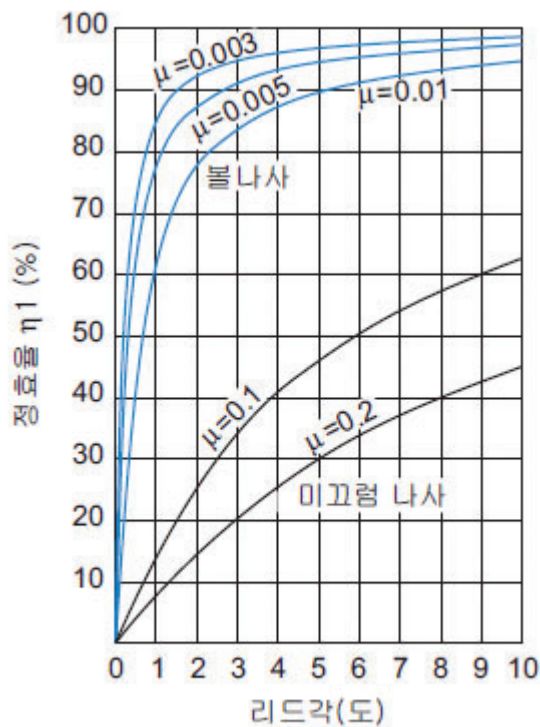


그림1 정효율(회전→직선)

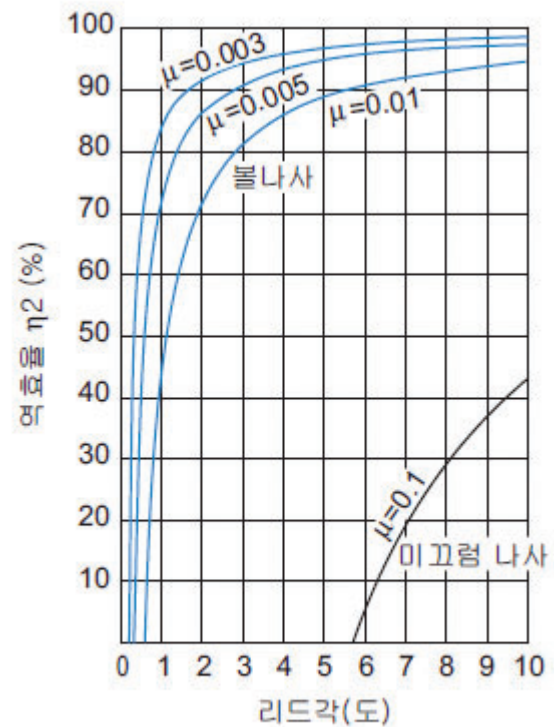


그림2 역효율(직선→회전)

리드각 산출

$$\tan\beta = \frac{Ph}{\pi \cdot d_p}$$

- β : 리드각 (°)
 d_p : 볼 중심경 (mm)
 Ph : 이송나사 리드 (mm)

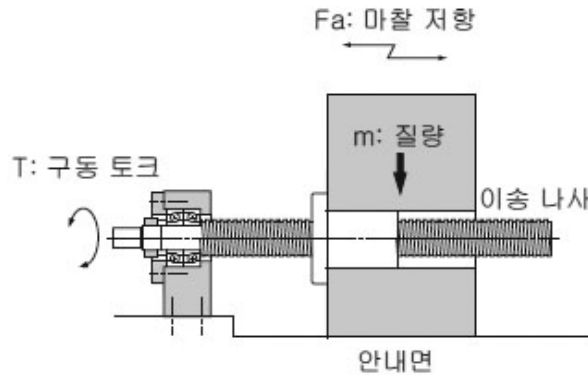
Selection of ARTRO Robot

■ 추력과 토크의 관계

추력 및 토크를 부여했을 때의 발생토크, 발생추력은 식(1)~(3)에 의해 구해집니다.

■ 추력을 얻기 위한 구동토크

$$T = \frac{F_a \cdot Ph}{2\pi \cdot \eta_1} \dots\dots\dots(1)$$



- T : 구동토크 (N-mm)
- F_a : 안내면의 마찰저항 (N)
- $F_a = \mu \times mg$
- μ : 안내면의 마찰계수
- g : 중력가속도 (9.8 m/s)
- m : 반송물의 질량
- Ph : 이송 나사 리드 (mm)
- η_1 : 이송 나사의 정효율 (A15-4 그림1 참조)

■ 토크를 부여했을 때의 발생추력

$$F_a = \frac{2\pi \cdot \eta_1 \cdot T}{Ph} \dots\dots\dots(2)$$

- F_a : 발생추력 (N)
- T : 구동토크 (N mm)
- Ph : 이송 나사 리드 (mm)
- η_1 : 이송 나사의 정효율 (A15-4 그림1 참조)

■ 추력을 부여했을 때의 발생토크

$$T = \frac{Ph \cdot \eta_2 \cdot F_a}{2\pi} \dots\dots\dots(3)$$

- T : 발생토크 (N-mm)
- F_a : 입력추력 (N)
- Ph : 이송 나사 리드 (mm)
- η_2 : 이송 나사의 정효율 (A15-4 그림2 참조)

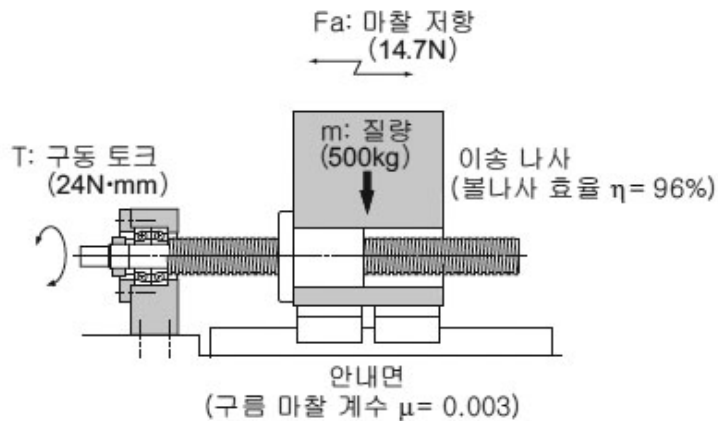
Selection of ARTRO Robot

■ 구동토크 산출예

질량 500kg의 물체를 유효경 : 33mm, 리드 : 10mm (리드각 : 5° 30')의 나사로 움직일 때 필요한 토크는 아래와 같습니다.

■ 구름안내($\mu = 0.003$)

볼나사($\mu = 0.003$ 으로서 효율 $\eta = 0.96$)



■ 안내면의 마찰저항

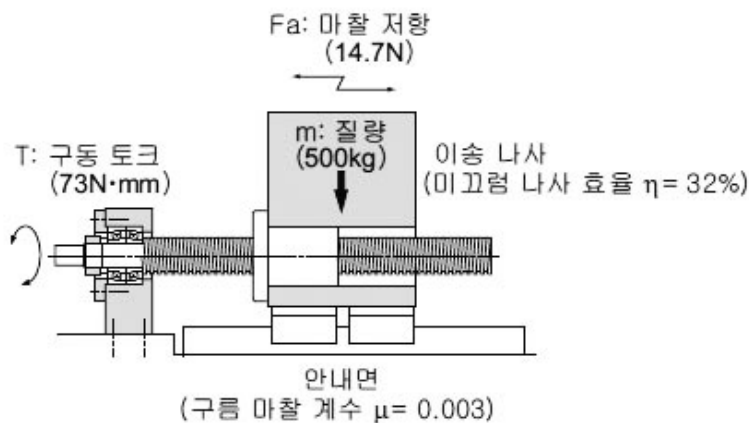
$$F_a = 0.003 \times 500 \times 9.8 = 14.7N$$

■ 구동토크

$$T = \frac{14.7 \times 10}{2\pi \times 0.96} = 24 \text{ N} \cdot \text{mm}$$

■ 구름안내($\mu = 0.003$)

미끄럼나사($\mu = 0.2$ 으로서 효율 $\eta = 0.32$)



■ 안내면의 마찰저항

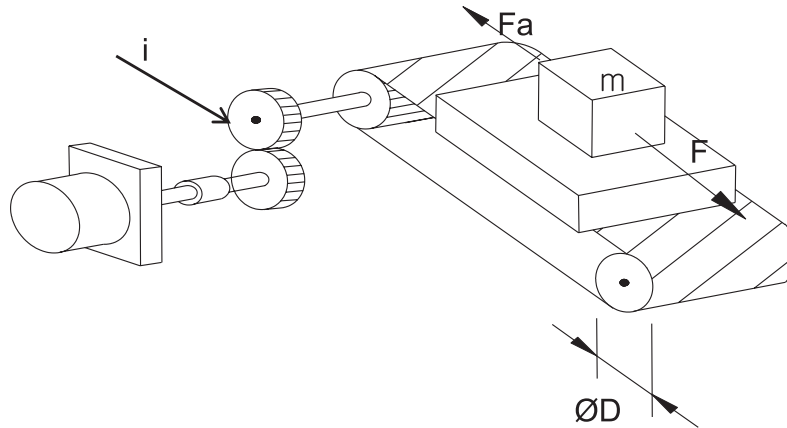
$$F_a = 0.003 \times 500 \times 9.8 = 14.7N$$

■ 구동토크

$$T = \frac{14.7 \times 10}{2\pi \times 0.32} = 73 \text{ N} \cdot \text{mm}$$

Selection of ARTRO Robot

■ Belt 타입 구동토크 산출



$$T_L = \frac{F}{2\pi\eta} \times \frac{\pi D}{i} = \frac{FD}{2\pi i} \text{ [Kgf} \cdot \text{cm]}$$

$F = \mu \times W \text{ [Kgf]}$ - 계산식 2 / Load Torque of Timing Belt

Symbol	Mean
T_L	구동토크(kgf/cm)
F	축 하중(kgf) = $\mu \times W$
η	Timing Belt 효율
D	Diameter of pulley
i	기어비
μ	마찰계수

※ 약식 계산식

$$T_{L(H)} = \frac{D}{2} \times F \times \frac{1}{\eta} \times \frac{1}{i} \times S \cdot$$

$$T_{L(V)} = \frac{D}{2} \times F \times \frac{1}{\eta} \times \frac{1}{i} \times 2 \times S \cdot$$

*SF (Normal Safety Factor) : x2~x2.5

※ Motor Sizing

구동토크를 산출 후 다음(계산식 3)에 적용한다.

$W = 0.1047 \times R(\text{rpm}) \times \text{Torque[Nm]}$ - 계산식 3 / 필요한 모터 토크

※모터용량을 구하기엔 약식 계산식으로 충분하다.

Ball screw

■ 볼스크류의 정도

리드정도

볼나사의 리드 정도는 JIS규격(JIS B1192 - 1997)에 준하여 정도관리가 되고 있습니다.

정도 등급 C0 ~ C5는 직선성과 방향성으로, C7 ~ C10은 300mm에 대한 이동량 오차로서 규정되어 있습니다.

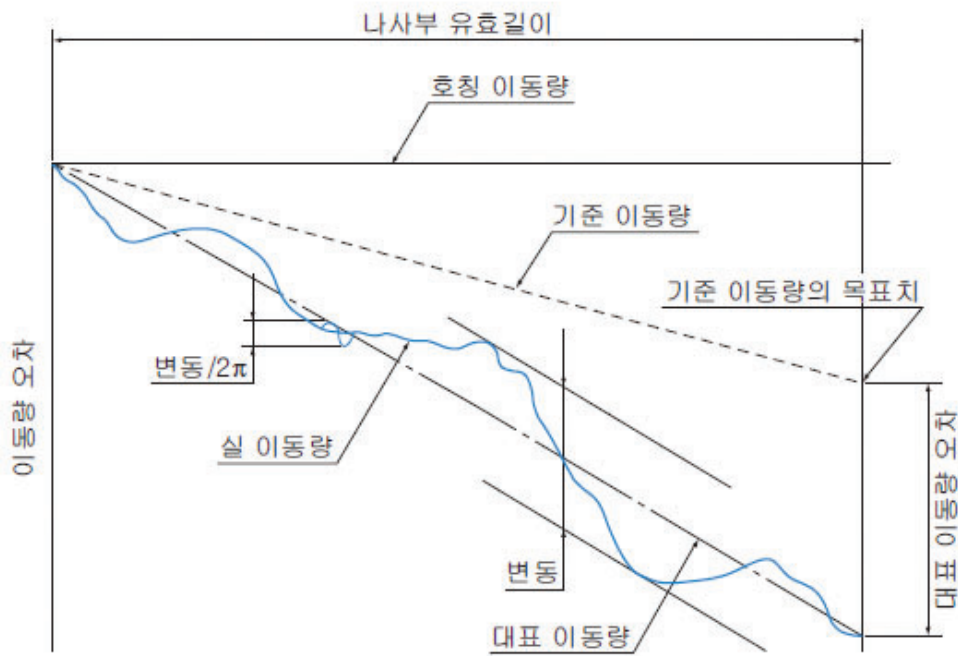


그림1 리드 정도 용어

■ 실 이동량

실제 볼 나사로 측정된 이동량 오차

■ 기준 이동량

일반적으로 호칭 이동량과 같지만 사용 용도에 따라 의도적으로 호칭 이동량을 보정한 값을 가질 수 있습니다.

■ 기준 이동 양의 목표치

나사축의 흔들림 방지를 위해서 텐션을 가하거나 외부하중이나 온도에 의한 신축을 고려해서 미리 기준 이동량을 “마이 너스” 또는 “플러스”로 설정 할 수 있습니다. 그런 경우에는 기준 이동량의 목표치를 지시해 주십시오.

■ 대표 이동량

실 이동량의 경향을 나타내는 직선이며, 실 이동량을 나타내는 곡선으로부터 최소 이송법에 의해서 얻어집니다.

■ 대표 이동량 오차 (표시)

대표 이동량과 기준 이동량의 차이

■ 변동

대표 이동량에 평행하게 그려진 두 직선 간의 실제 이동량의 최대폭입니다.

■ Fluctuation/300

임의의 나사 길이 300mm에 대한 변동을 나타냅니다.

■ Fluctuation/2

나사축의 1회전내의 변동입니다.

Ball screw

표1 리드 정도 (허용치)

		정밀 볼나사										전조 볼나사		
정도 등급		C0		C1		C2		C3		C5		C7	C8	C10
나사부 유효길이		대표 이동량 오차	변동	대표 이동량 오차	변동	대표 이동량 오차	변동	대표 이동량 오차	변동	대표 이동량 오차	변동	이동량 오차	이동량 오차	이동량 오차
초과	이하													
-	100	3	3	3.5	5	5	7	8	8	18	18	+50/ 300mm	+100/ 300mm	+210/ 300mm
100	200	3.5	3	4.5	5	7	7	10	8	20	18			
200	315	4	3.5	6	5	8	7	12	8	23	18			
315	400	5	3.5	7	5	9	7	18	10	25	20			
400	500	6	4	8	5	10	7	15	10	27	20			
500	600	6	4	9	6	11	8	16	12	30	23			
600	800	7	5	10	7	13	9	10	13	35	25			
800	1000	8	5	11	8	15	10	21	15	40	27			
1000	1250	9	5	13	9	18	11	24	16	46	30			
1250	1600	11	7	15	10	21	13	29	18	54	35			
1600	2000	-	-	18	11	25	15	35	21	65	40			
2000	2500	-	-	22	13	30	18	41	24	77	46			
2500	3150	-	-	26	15	36	21	50	29	93	54			
3150	4000	-	-	30	18	44	25	60	35	115	65			
4000	5000	-	-	-	-	52	30	72	41	140	77			
5000	6300	-	-	-	-	65	36	90	50	170	93			
6300	8000	-	-	-	-	-	-	110	60	210	115			
8000	10000	-	-	-	-	-	-	-	-	260	140			

주) 나사부 유효길이의 단위 : mm

표2 나사부 길이 300mm 및 1회전에 대한 변동(허용치)

정도 등급	C0	C1	C2	C3	C5	C7	C8	C10
변동/300	3.5	5	7	8	18	-	-	-
변동/2	3	4	5	6	8	-	-	-

표3 종류와 등급

종 류	시리즈 기호	등 급	비 고
위치 결정용	Cp	1, 3, 5	ISO 대응
반송용	C1	1, 3, 5, 7, 10	

Ball screw

예 : 기준 이동량의 목표치 $-9 \text{ mm}/500 \text{ mm}$ 로 제작된 볼나사의 리드를 측정한 결과 다음과 같은 데이터가 얻어졌습니다.

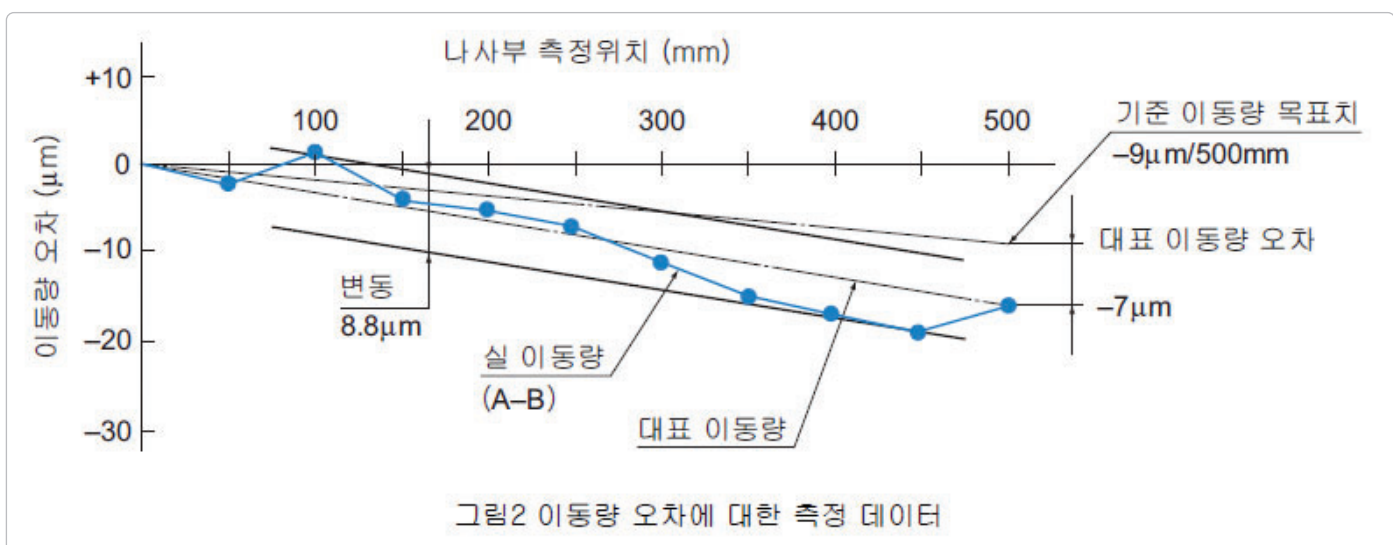
표4 이동량 오차에 대한 측정 데이터

지령 위치 (A)	이동 거리 (B)	이동량 오차 (A-B)
50	49.998	-0.002
100	100.001	+0.001
150	149.996	-0.004
200	199.995	-0.005
250	249.993	-0.007
300	299.989	-0.011
350	349.885	-0.015
400	399.983	-0.017
450	449.981	-0.019
500	499.984	-0.016

측정 데이터를 그래프로 나타내면 그림2와 같이 됩니다.

위치결정오차 (A-B)는 실 이동량으로 나타내며, (A-B)의 그래프의 경향을 대표하는 직선은 대표 이동량이 됩니다.

기준 이동량과 대표 이동량 사이의 차이는 대표 이동량 오차로 나타냅니다.



■ 측정결과

대표이동량 오차 : $-7 \mu\text{m}$

변동 : $8.8 \mu\text{m}$

LM-Guide

■ 정도 결정

정도규격

LM 가이드의 정도는 주행평행도, 높이와 폭에 대한 치수 허용차, 그리고 2개 이상의 LM 블록을 하나의 레일에 사용할 때, 또는 2개 이상의 레일을 동일한 면에 장착하는 경우에 필요로 하는 높이, 폭의 페어상호차가 각 형번마다 규정되어 있습니다.

■ 주행 평행도

LM 레일을 기준 베이스면에 볼트로서 체결한 상태에서 LM 블록을 LM 레일의 전장에 걸쳐 주행시켰을 때의 LM 블록과 LM 레일 기준면끼리의 평행도 오차

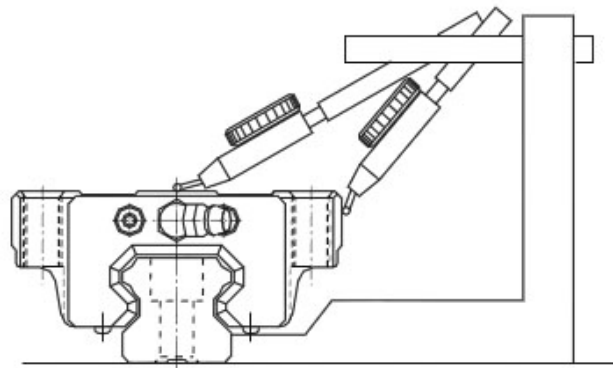


그림 1 주행평행도

■ 높이 M의 페어상호차

동일 평면상에 조합되는 각각의 LM 블록의 높이(M)치수의 최소치와 최대치의 차

■ 폭 W2의 페어상호차

1본의 LM 레일에 조합되는 각각의 LM 블록과 LM 레일간의 폭(W2)치수의 최대치와 최소치의 차

주1) 동일 평면상에 2세트 이상 병렬로 사용하는 경우 폭 (W2)의 치수허용차, 페어상호차는 기준측만 적용됩니다.
기준측 LM레일의 번호 말미에는 KB라고 마킹되어 있습니다. 단, 보통급에 대해서는 마킹이 되어 있지 않습니다.

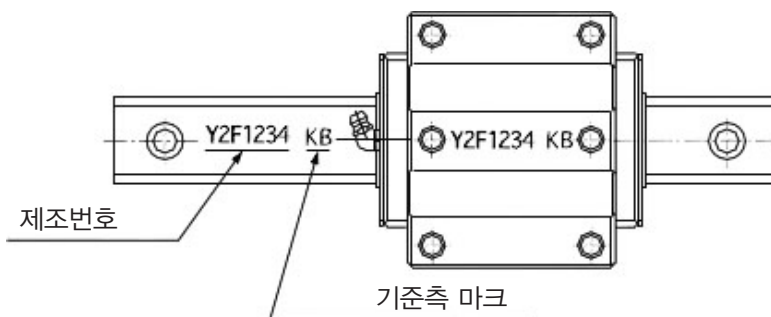


그림 2 기준측 LM레일

주2) 정도측정치는 LM블록 중심점 또는 중심부의 평균치를 표시합니다.

주3) LM 레일은 교정이 용이한 큰 곡률로 휘어 있는 상태로 가공되어 있으므로 기계 본체의 기준면에 밀어 붙여서 장착하는 것으로서 정도를 얻을 수 있습니다.

알루미늄과 같이 강성이 없는 곳에 장착하여 사용하는 경우에는 LM 레일의 휨이 기계 정도에 영향을 미칠 수 있으므로 미리 진직도를 규정할 필요가 있습니다.

LM-Guide

■ 사용기종에 따른 정도등급 기준

표1. 사용기계별 정도등급 기준

		정도 등급						
		Ct7	Ct5	보통	H	P	SP	UP
공작기계	머시닝 센터					●	●	
	선반					●	●	
	밀링 머신					●	●	
	보링반					●	●	
	지그보링기						●	●
	연삭 기계						●	●
	방전가공기					●	●	●
	편칭 프레스				●	●		
	레이저 가공기				●	●	●	
	목공기	●	●	●	●	●		
	NC 드릴링 기기				●	●		
	탭핑 센터				●	●		
	파렛트 체인지			●				
	ATC	●	●	●				
	와이어 컷					●	●	
	드레서 장치						●	●
산업용 로봇	직교좌표형			●	●	●		
	원통 좌표형			●	●			
반도체 제조장비	와이어 본더					●	●	
	프로버						●	●
	전자부품 삽입기				●	●		
	프린트 기판 구멍가공기				●	●	●	
기타장비	사출성형기			●	●			
	3차원 측정기						●	●
	사무기기	●	●	●	●			
	반송장치	●	●	●	●			
	XY 테이블				●	●	●	
	도장기	●	●	●	●			
	용접기	●	●	●	●			
	의료기기			●	●			
	디지털라이저				●	●	●	
	검사장비					●	●	●

Ct7 : Ct7 등급
Ct5 : Ct5 등급
보통 : 보통급
H : 상급

P : 정밀급
SP : 초정밀급
UP : 초초정밀급

CONTENTS

INTRO

AS-SERIES

ACS-SERIES

AB-SERIES

AL-SERIES

AC-COMBINATION

LM-Guide

■ 각 형번의 정도 규격

SHS, SSR, SVR/SVS, SNR, SNS, SHW, HSR, SR, NR/NRS, HRW, NSR-TBC, HSR-M1, HSRM1VV, SR-M1, HSR-M2, SRG, SRN형의 정도는 표3에 표시된대로 형번에 따라 Ct7 등급(Ct7), Ct5 등급(Ct5), 보통급(기호없음), 상급(H), 정밀급(P), 초정밀급(SP), 그리고 초초정밀급(UP)으로 분류됩니다.

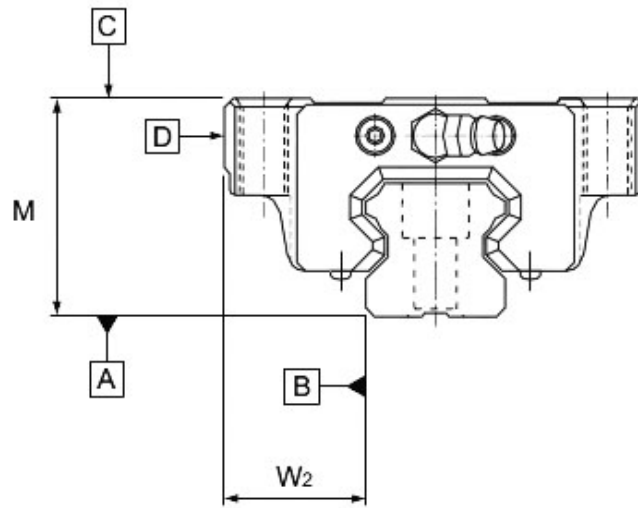


그림 2 기준축 LM레일

표2. 정도 규격별 LM 레일길이와 주행평행도

LM 레일 길이(mm)		주행평행도값						
초과	이하	Ct7 급	Ct5 급	보통급	상급	정밀급	초정밀급	초초정밀급
-	50	6	6	5	3	2	1.5	1
50	80	6	6	5	3	2	1.5	1
80	125	6	6	5	3	2	1.5	1
125	200	7	6	5	3.5	2	1.5	1
200	250	9.5	6.5	5	4	2.5	1.5	1
250	315	11	7.5	7	4.5	3	1.5	1
315	400	13	8.5	8	5	3.5	2	1.5
400	500	16	11	9	6	4.5	2.5	1.5
500	630	18	13	11	7	5	3	2
630	800	20	15	12	8.5	6	3.5	2
800	1000	23	16	13	9	6.5	4	2.5
1000	1250	26	18	15	11	7.5	4.5	3
1250	1600	28	20	16	12	8	5	4
1600	2000	31	23	18	13	8.5	5.5	4.5
2000	2500	34	25	20	14	9.5	6	5
2500	3090	3	27	21	16	11	6.5	5.5

주)Ct7급과 Ct5 등급은 HSR형에서만 적용 됩니다.

LM-Guide

표3. SHS형, SSR형, SVR/SVS형, SNR/SNS형, SHW형, HSR형, SR형, NR/NRS형, HRW형, NSR-TBC형, HSR-M1형, HSR-M1VV형, SR-M1형, HSR-M2형, SRG형, SRN형 정도 규격

형번	정도규격	Ct7 급	Ct5 급	보통급	상급	정밀급	초정밀급	초초정밀급
	머시닝 센터	Ct7	Ct5	기호 없음	H	P	SP	UP
8 10 12 14	높이 M의 치수 허용차	—	—	±0.07	±0.03	±0.015	±0.007	—
	높이 M의 페어 상호차	—	—	0.015	0.007	0.005	0.003	—
	폭 W ₂ 의 치수 허용차	—	—	±0.04	±0.02	±0.01	±0.007	—
	폭 W ₂ 의 페어 상호차	—	—	0.02	0.01	0.006	0.004	—
	A면에 대한 C면의 주행평행도	C (표 2. 에 의해)						
	B면에 대한 D면의 주행평행도	D (표 2. 에 의해)						
15 17 20 21	높이 M의 치수 허용차	±0.12	±0.12	±0.07	±0.03	0 -0.03	0 -0.015	0 -0.008
	높이 M의 페어 상호차	0.025	0.025	0.02	0.01	0.006	0.004	0.003
	폭 W ₂ 의 치수 허용차	±0.12	±0.12	±0.06	±0.03	0 -0.03	0 -0.015	0 -0.008
	폭 W ₂ 의 페어 상호차	0.025	0.025	0.02	0.01	0.006	0.004	0.003
	A면에 대한 C면의 주행평행도	C (표 2. 에 의해)						
	B면에 대한 D면의 주행평행도	D (표 2. 에 의해)						
25 27 30 35	높이 M의 치수 허용차	±0.12	±0.12	±0.08	±0.04	0 -0.04	0 -0.02	0 -0.01
	높이 M의 페어 상호차	0.025	0.025	0.02	0.015	0.007	0.005	0.003
	폭 W ₂ 의 치수 허용차	±0.12	±0.12	±0.07	±0.03	0 -0.03	0 -0.015	0 -0.01
	폭 W ₂ 의 페어 상호차	0.035	0.035	0.025	0.015	0.007	0.005	0.003
	A면에 대한 C면의 주행평행도	C (표 2. 에 의해)						
	B면에 대한 D면의 주행평행도	D (표 2. 에 의해)						
40 45 50 55 60	높이 M의 치수 허용차	—	—	±0.08	±0.04	0 -0.05	0 -0.03	0 -0.015
	높이 M의 페어 상호차	—	—	0.025	0.015	0.007	0.005	0.003
	폭 W ₂ 의 치수 허용차	—	—	±0.07	±0.04	0 -0.04	0 -0.025	0 -0.015
	폭 W ₂ 의 페어 상호차	—	—	0.03	0.015	0.007	0.005	0.003
	A면에 대한 C면의 주행평행도	C (표 2. 에 의해)						
	B면에 대한 D면의 주행평행도	D (표 2. 에 의해)						
65 70 75 85 100 120 150	높이 M의 치수 허용차	—	—	±0.08	±0.04	0 -0.05	0 -0.04	0 -0.03
	높이 M의 페어 상호차	—	—	0.03	0.02	0.01	0.007	0.005
	폭 W ₂ 의 치수 허용차	—	—	±0.08	±0.04	0 -0.05	0 -0.04	0 -0.03
	폭 W ₂ 의 페어 상호차	—	—	0.03	0.02	0.01	0.007	0.005
	A면에 대한 C면의 주행평행도	C (그림3. 에 의해)						
	B면에 대한 D면의 주행평행도	D (그림3. 에 의해)						

주) SRG형, SRN형은 정밀급 이상만 적용됩니다. (Ct7급, Ct5급, 보통급, 상급은 사용할 수 있습니다.
주) Ct7급과 Ct5등급은 HSR형에서만 적용됩니다.
주) Ct7급, Ct5급의 높이 M인 페어 상호차, 폭 W₂인 페어 상호차는 1축에서의 값입니다.

로봇 선정시 주의사항

■ Work Area 선정

Work Area 를 최소화 할 것. (비용절감)

X-Y 조합 또는 X-Y-Z 조합 시, 선행축의 Stroke 보다 후행축의 Stroke를 작게 선정할 것. (기구적 부하 최소화)

■ Pay Load

하중조건, 모멘트 혹은 하중 부하 방향에 따라 최대하중이 달라질 수 있으므로 본사에 문의 바랍니다.

■ 속도

스트로크에 따라 최대속도가 달라집니다. 준비된 표를 참고 바랍니다.

■ 설치 조건 및 환경

조립 및 유지보수가 용이하도록 구성하십시오.

로봇 사용 환경을 확인 바랍니다. 먼지, 습도, 온도 등 기타 환경에 따라 사양이 변경될 수 있습니다.

CONTENTS

INTRO

AS-SERIES

ACS-SERIES

AB-SERIES

AL-SERIES

AC-COMBINATION

AS-SERIES



AS-045S/L/R/U



AS-050S/L/R/U



AS-070S/L/R/U



AS-090S-10/20/L/R/U



Artro Robot
Development & Motion Control



AS-120S/L/R/U



AS-160S/L/R/U

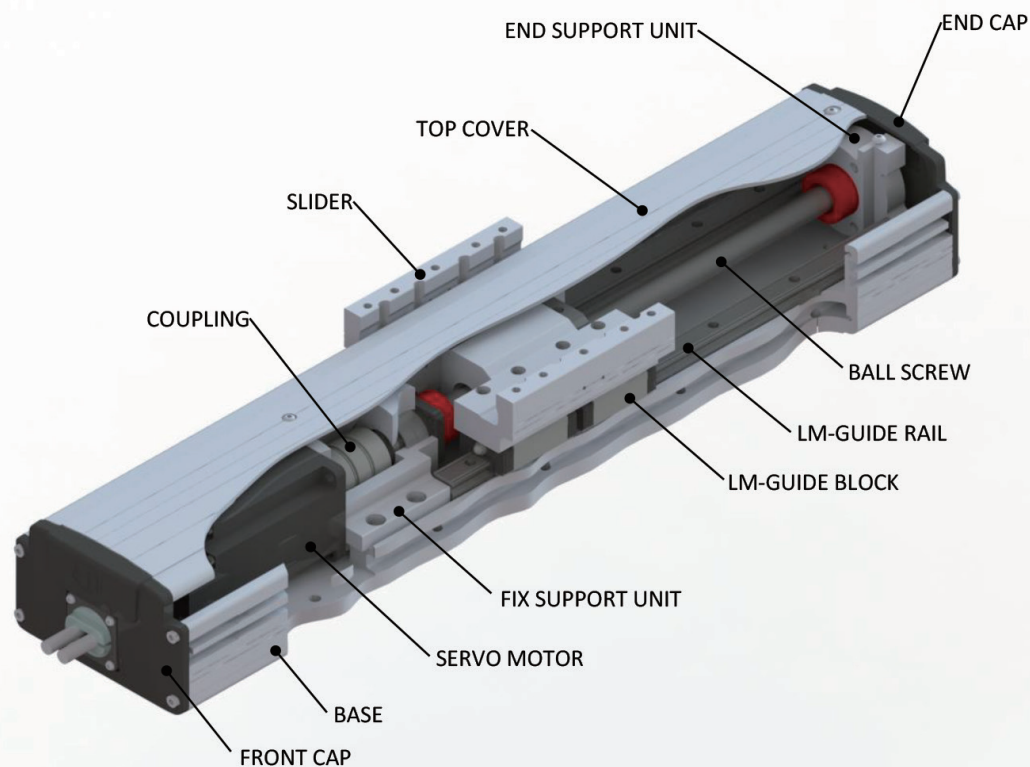


AS-200S/L/R/U

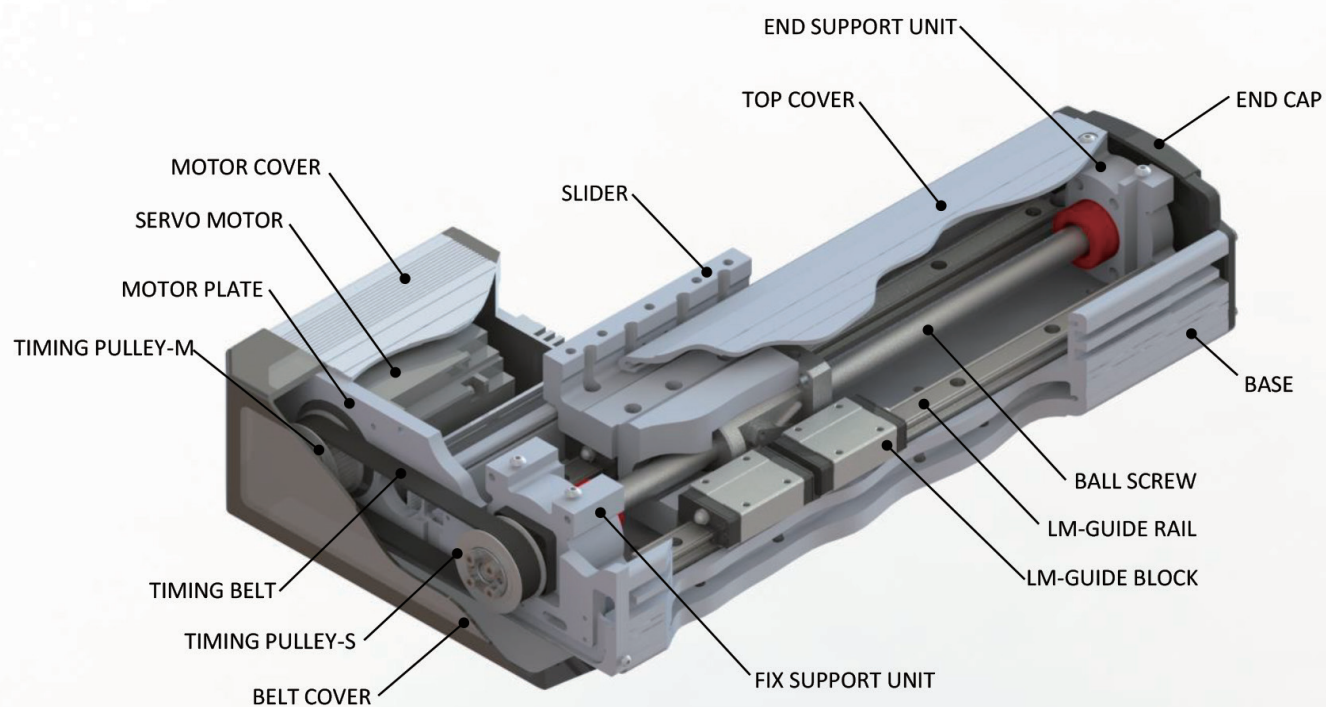
AS-SERIES



AS-S Type Structure



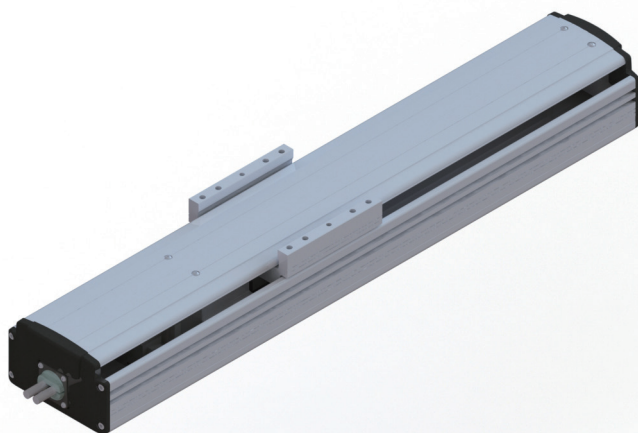
AS-P Type Structure



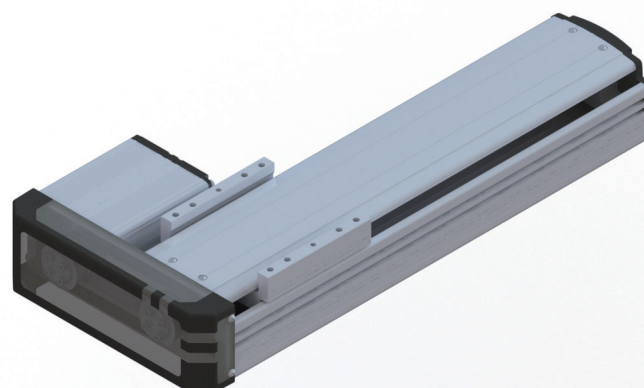
AS-Series Model Info.

AS	050S*	0300	10(B)**	H(-B)***
AS-Series	040 : 45 body 050 : 50 body 070 : 70 body 090 : 90 body 120 : 120 body 160 : 160 body 200 : 200 body *Motor joint Info. S : Straight joint L : Left Parallel joint R : Right Parallel joint U : Under Parallel joint	Stroke	Motor OutPut 10 : 100W 20 : 200W 40 : 400W 70 : 750W **Motor brake option. 10() : Without brake 10 B : With brake	Ball screw Lead H : 20mm N : 10mm L : 5mm *** Body Color B : Black Ano.

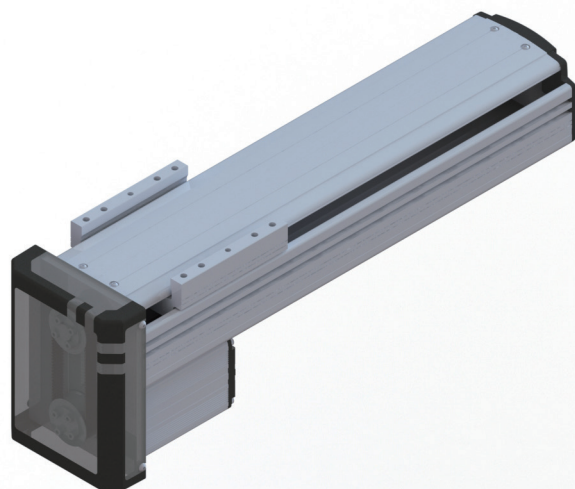
Straight joint



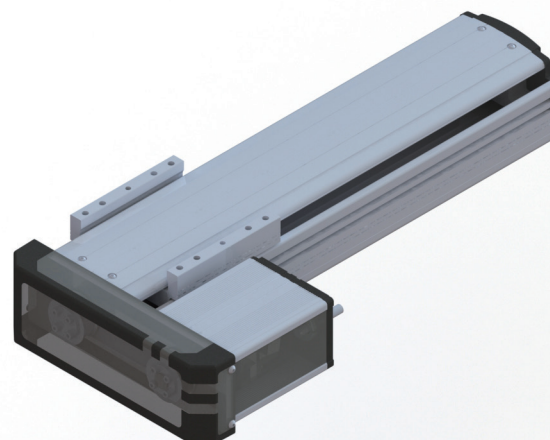
Left Parallel joint



Under Parallel joint

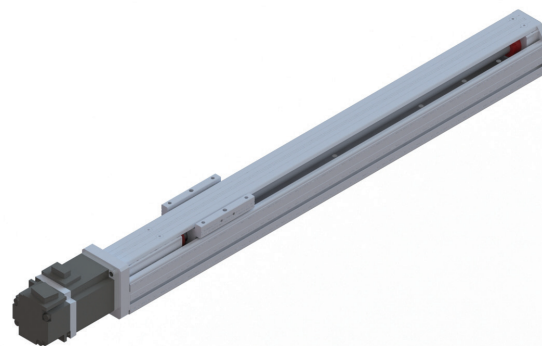


Right Parallel joint



AS-045S Specification

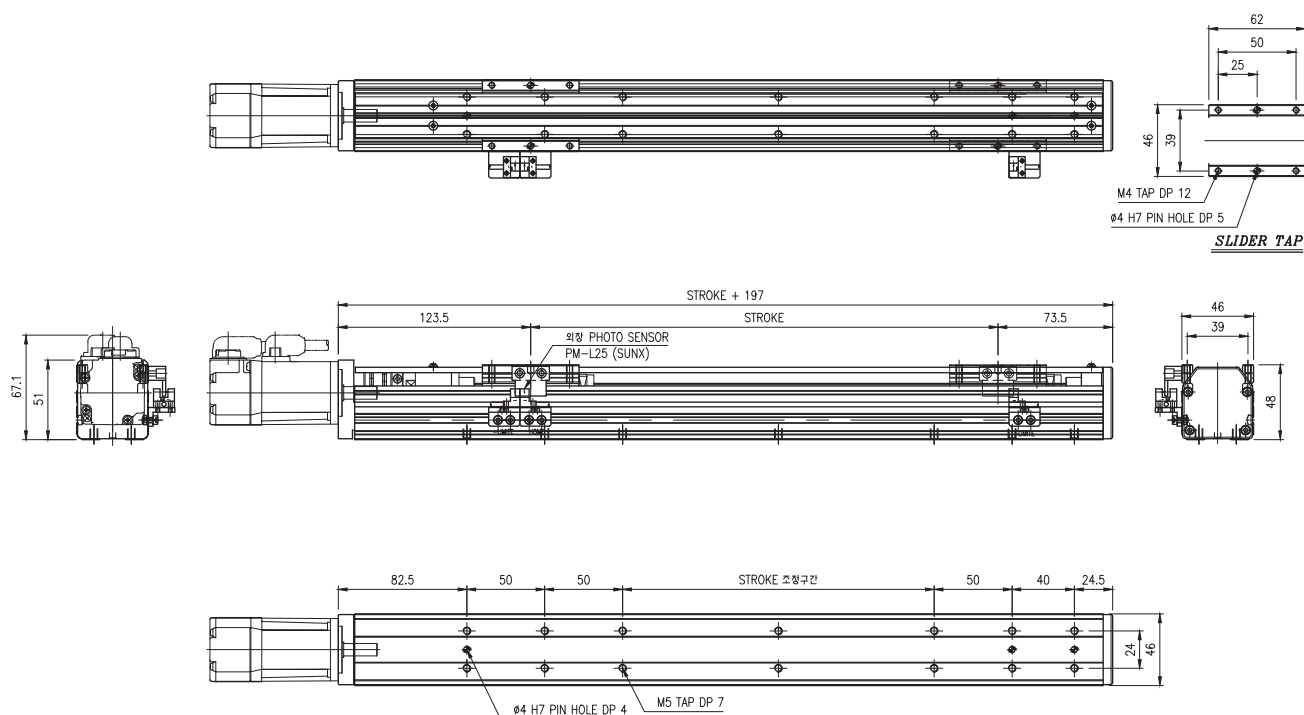
Servo Motor Output/rpm		100w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø12 Lead 20mm(10mm)
Liner motion guide		One way, No.12, 2 block
Repeatability		±0.02mm
Payload(kg) Ta = 0,2s	Lead 20mm	H : 2
		V : 1.5
	Lead 10mm	H : 12
		V : 3.5
Moment of inertia of area		Ix=5.57E+04, Iy=1.49E+05



AS-045S

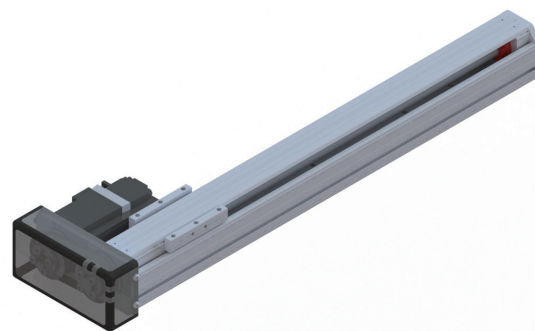
Stroke(mm)		100	200	300	400	500	600	700
Max. Speed (mm/sec)	Lead 20mm	1000						900
	Lead 10mm	500						450
Weight(kg)		2.71	3.03	3.35	3.67	3.99	4.31	4.64
		The weight of the model equipped with a brake is 0.2kg more heavier then this value.						
Base & Slide		Aluminum Profile, 백색전착 유광						

Dimension(mm)



AS-045L Specification

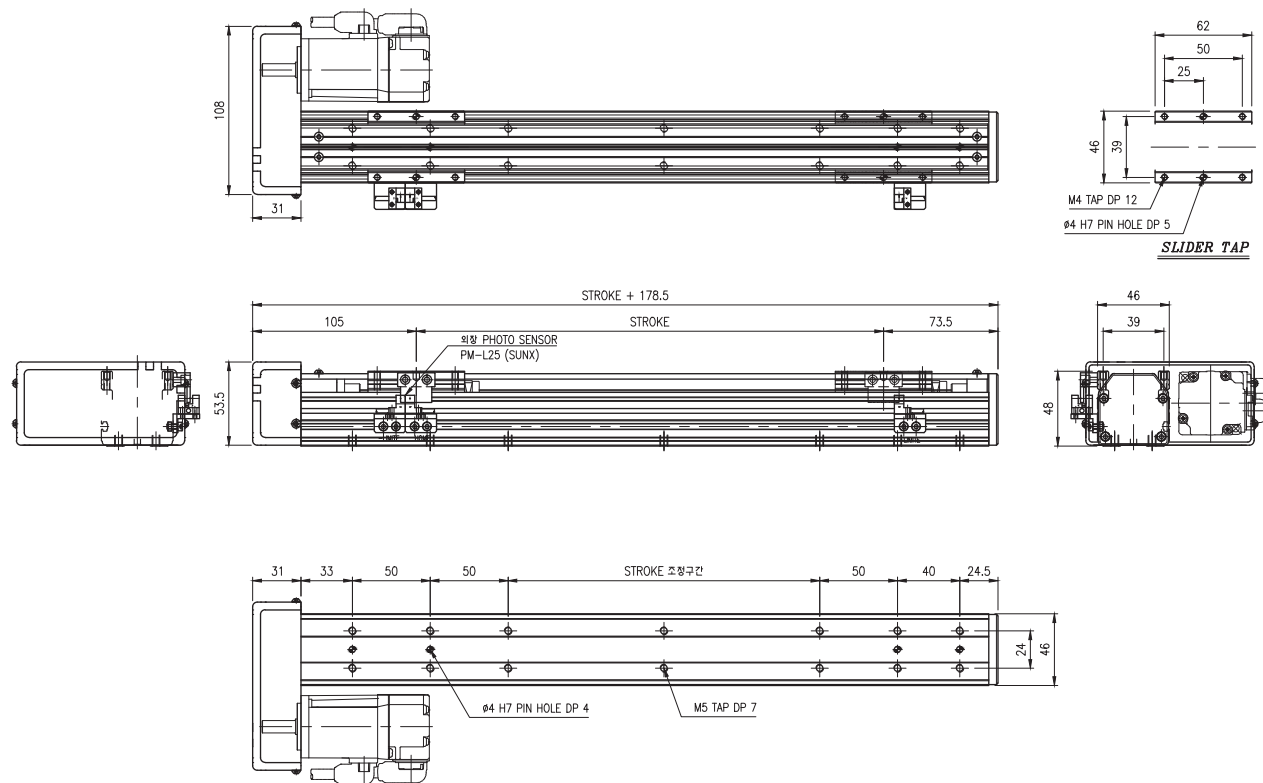
Servo Motor Output/rpm		100w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø12 Lead 20mm(10mm)
Liner motion guide		One way, No.12, 2 block
Repeatability		±0.02mm
Payload(kg) Ta = 0.2s	Lead 20mm	H : 2
		V : 1.5
	Lead 10mm	H : 12
		V : 3.5
Moment of inertia of area		Ix=5.57E+04, Iy=1.49E+05



AS-045L

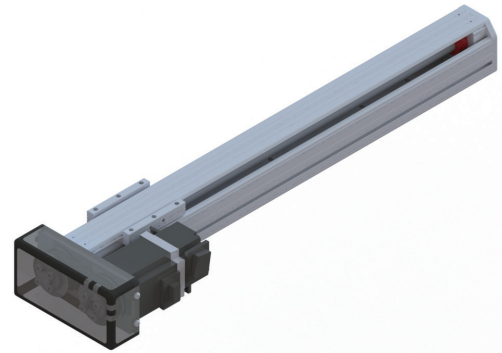
Stroke(mm)		100	200	300	400	500	600	700
Max. Speed (mm/sec)	Lead 20mm	1000						900
	Lead 10mm	500						450
Weight(kg)		2.86	3.18	3.5	3.82	4.14	4.46	4.78
		The weight of the model equipped with a brake is 0.2kg more heavier then this value.						
Base & Slide		Aluminum Profile, 백색전착 유광						

Dimension(mm)



AS-045R Specification

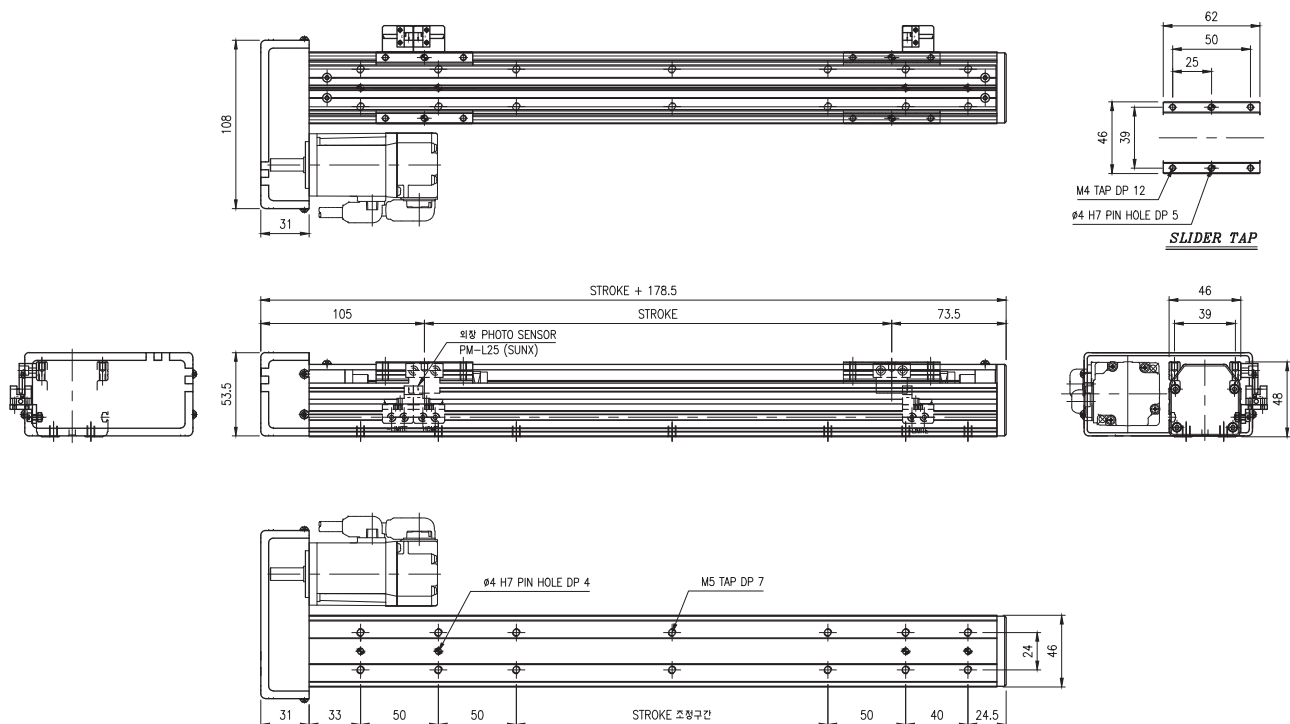
Servo Motor Output/rpm		100w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø12 Lead 20mm(10mm)
Liner motion guide		One way, No.12, 2 block
Repeatability		±0.02mm
Payload(kg) Ta = 0.2s	Lead 20mm	H : 2
		V : 1.5
	Lead 10mm	H : 12
		V : 3.5
Moment of inertia of area		Ix=5.57E+04, Iy=1.49E+05



AS-045R

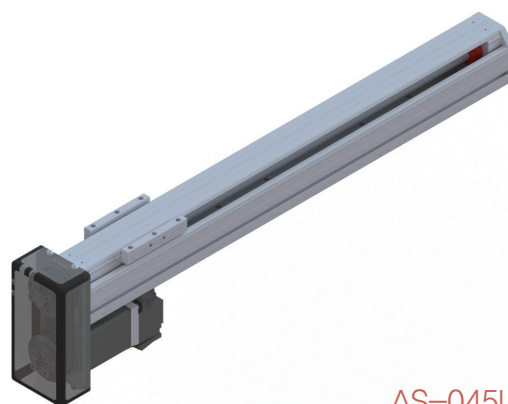
Stroke(mm)		100	200	300	400	500	600	700
Max. Speed (mm/sec)	Lead 20mm	1000						900
	Lead 10mm	500						450
Weight(kg)		2.86	3.18	3.5	3.82	4.14	4.46	4.78
		The weight of the model equipped with a brake is 0.2kg more heavier then this value.						
Base & Slide		Aluminum Profile, 백색전착 유광						

Dimension(mm)



AS-045U Specification

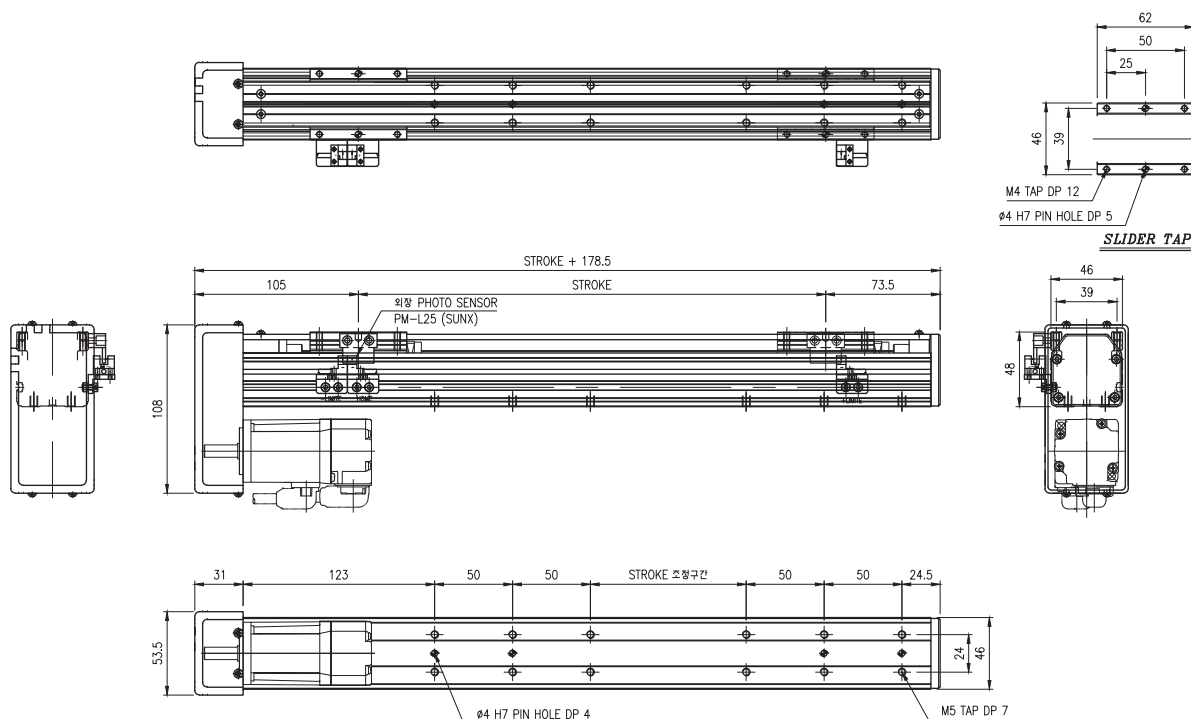
Servo Motor Output/rpm		100w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø12 Lead 20mm(10mm)
Liner motion guide		One way, No.12, 2 block
Repeatability		±0.02mm
Payload(kg) Ta = 0.2s	Lead 20mm	H : 2
		V : 1.5
	Lead 10mm	H : 12
		V : 3.5
Moment of inertia of area		Ix=5.57E+04, Iy=1.49E+05



AS-045U

Stroke(mm)		100	200	300	400	500	600	700
Max. Speed (mm/sec)	Lead 20mm	1000						900
	Lead 10mm	500						450
Weight(kg)		2.86	3.18	3.5	3.82	4.14	4.46	4.78
		The weight of the model equipped with a brake is 0.2kg more heavier then this value.						
Base & Slide		Aluminum Profile, 백색전착 유광						

Dimension(mm)



AS-050S Specification

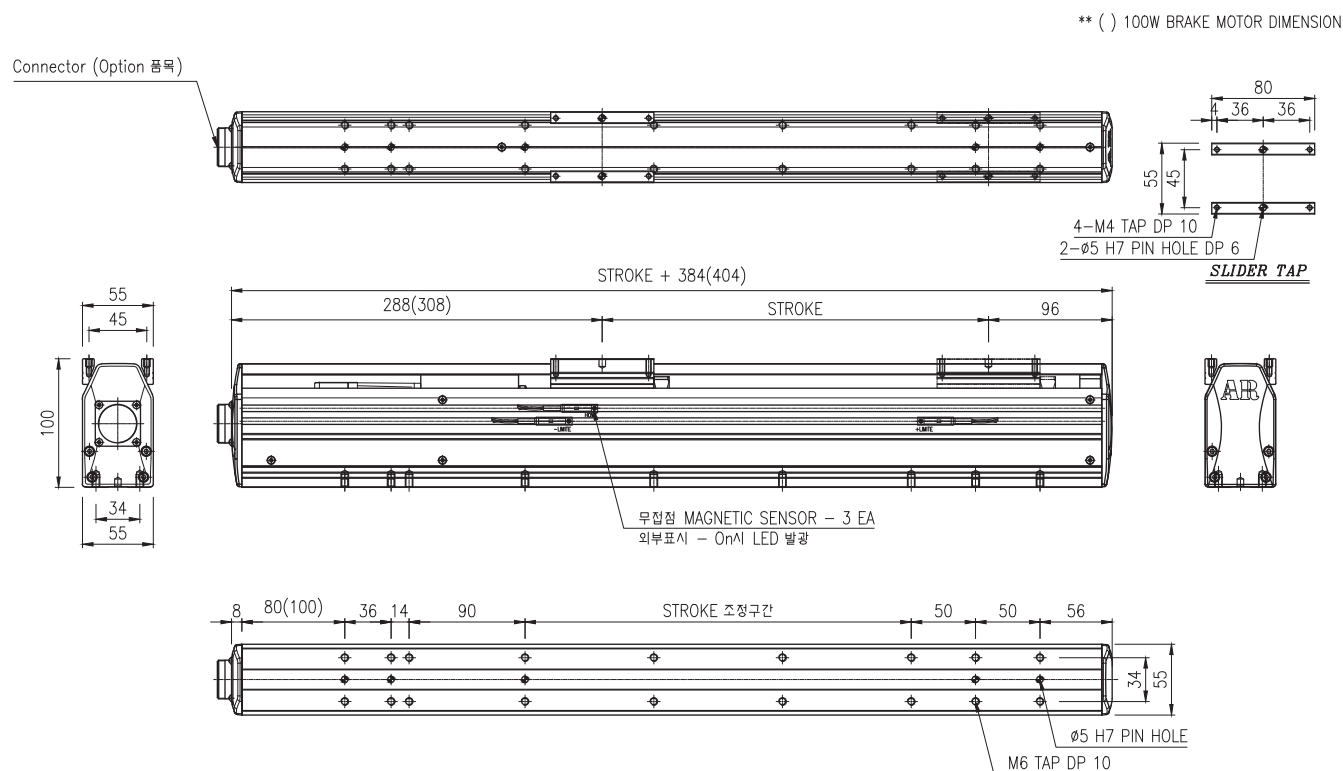
Servo Motor Output/rpm		100w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø15 Lead 20mm(10mm)
Liner motion guide		One way, 15V, 2 block
Repeatability		±0.02mm
Payload(kg) Ta = 0.2s	Lead 20mm	H : 4
		V : 3
	Lead 10mm	H : 24
		V : 7
Moment of inertia of area		Ix = 5.95E+04, Iy = 3.01E +05



AS-050S

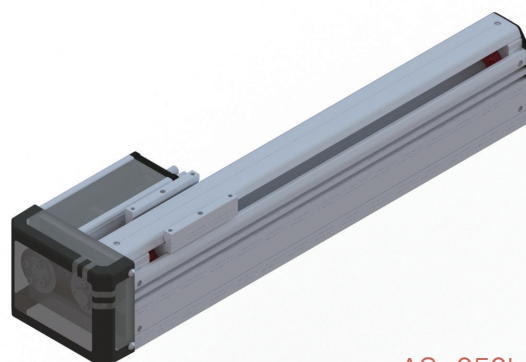
Stroke(mm)		100	200	300	400	500	600	700	800	900	1000
Max. Speed (mm/sec)	Lead 20mm	1000							850	680	560
	Lead 10mm	500							410	330	270
Weight(kg)		4.65	5.32	5.99	6.66	7.33	8.00	8.67	9.34	10.1	10.68
		The weight of the model equipped with a brake is 0.35kg more heavier then this value.									
Base & Slide		Aluminum Profile, 백색전착 유광									

Dimension(mm)



AS-050L Specification

Servo Motor Output/rpm		100w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø15 Lead 20mm(10mm)
Liner motion guide		One way, 15V, 2 block
Repeatability		±0.02mm
Payload(kg) Ta = 0.2s	Lead 20mm	H : 4
		V : 3
	Lead 10mm	H : 24
		V : 7
Moment of inertia of area		Ix = 5.95E+04, Iy = 3.01E +05

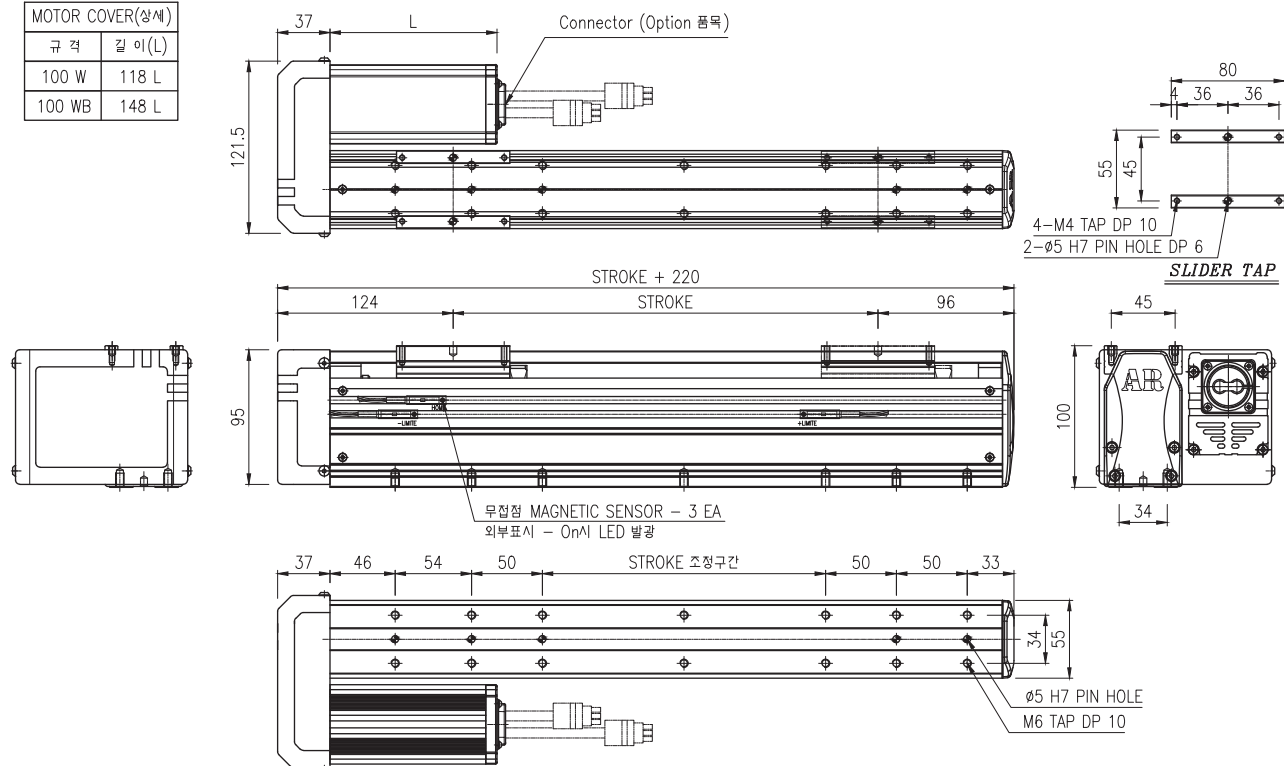


AS-050L

Stroke(mm)		100	200	300	400	500	600	700	800	900	1000
Max. Speed (mm/sec)	Lead 20mm	1000							850	680	560
	Lead 10mm	500							410	330	270
Weight(kg)		4.89	5.56	6.23	6.90	7.57	8.24	8.90	9.57	10.24	10.91
		The weight of the model equipped with a brake is 0.35kg more heavier then this value.									
Base & Slide		Aluminum Profile, 백색전착 유광									

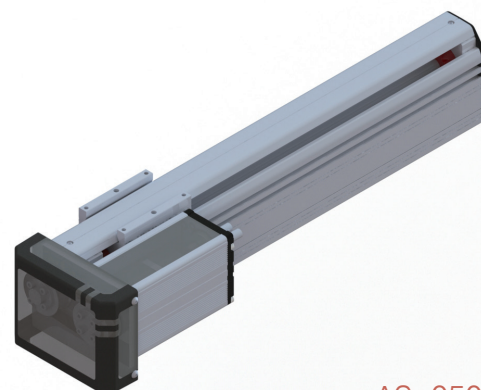
Dimension(mm)

MOTOR COVER(상세)	
규격	길이(L)
100 W	118 L
100 WB	148 L



AS-050R Specification

Servo Motor Output/rpm		100w/3000rpm	
Drive mechanism		Ball screw(C7, 연삭), Ø15 Lead 20mm(10mm)	
Liner motion guide		One way, 15V, 2 block	
Repeatability		±0.02mm	
Payload(kg) Ta = 0,2s	Lead 20mm	H : 4	
		V : 3	
	Lead 10mm	H : 24	
		V : 7	
Moment of inertia of area		Ix = 5.95E+04, ly = 3.01E +05	

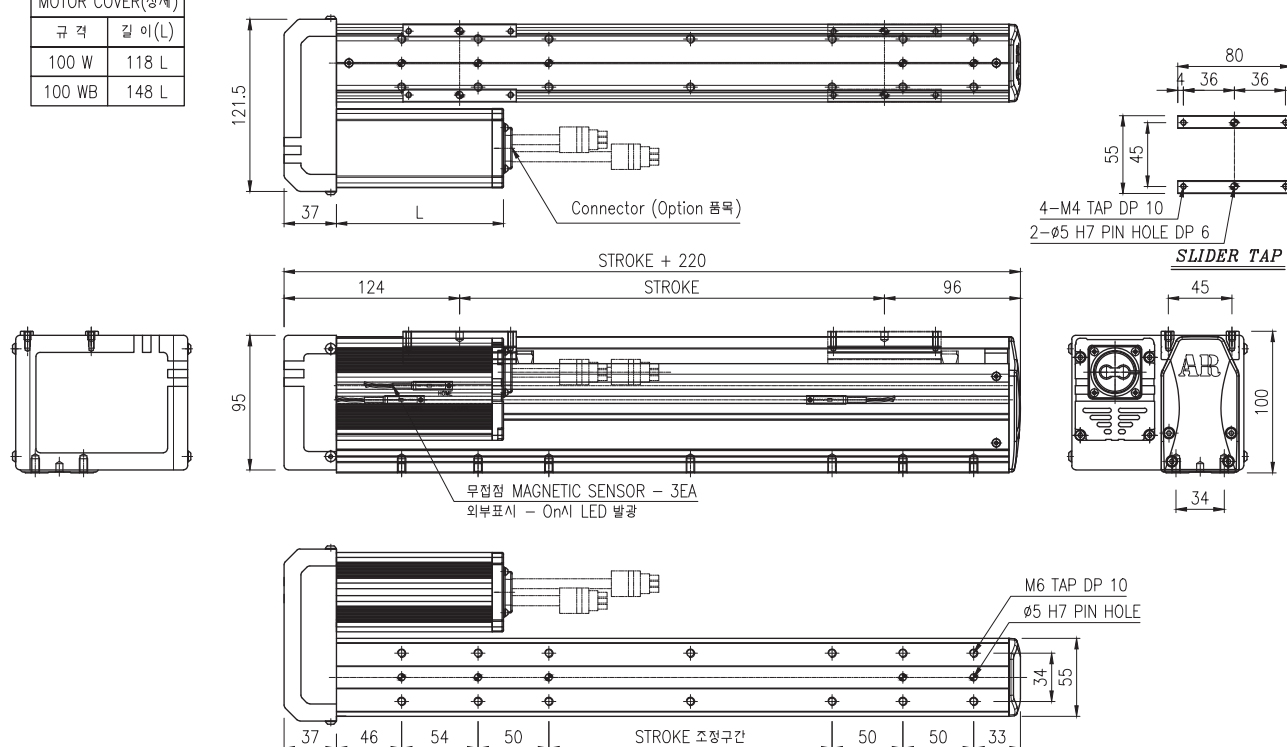


AS-050R

Stroke(mm)	100	200	300	400	500	600	700	800	900	1000
Max. Speed (mm/sec)	Lead 20mm	1000						850	680	560
	Lead 10mm	500						410	330	270
Weight(kg)	4.89	556	623	6.90	7.57	8.24	8.90	9.57	10.24	10.91
The weight of the model equipped with a brake is 0.35kg more heavier then this value.										
Base & Slide	Aluminum Profile, 백색전착 유광									

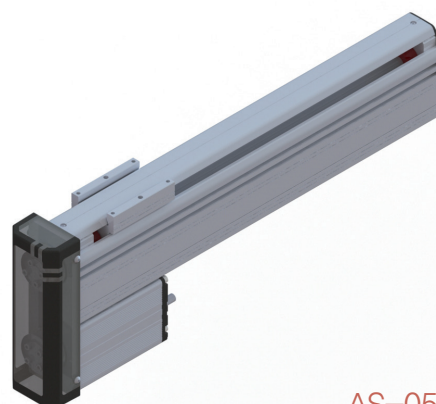
Dimension(mm)

MOTOR COVER(상세)	
규격	길이(L)
100 W	118 L
100 WB	148 L



AS-050U Specification

Servo Motor Output/rpm		100w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø15 Lead 20mm(10mm)
Liner motion guide		One way, 15V, 2 block
Repeatability		±0.02mm
Payload(kg) Ta = 0.2s	Lead 20mm	H : 4
		V : 3
	Lead 10mm	H : 24
		V : 7
Moment of inertia of area		Ix = 5.95E+04, Iy = 3.01E +05

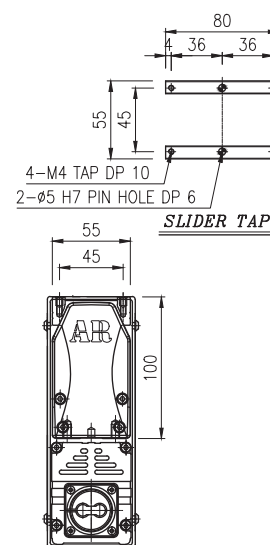
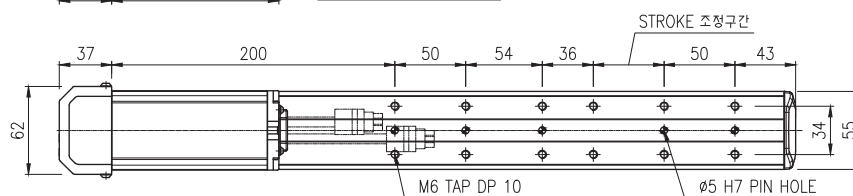
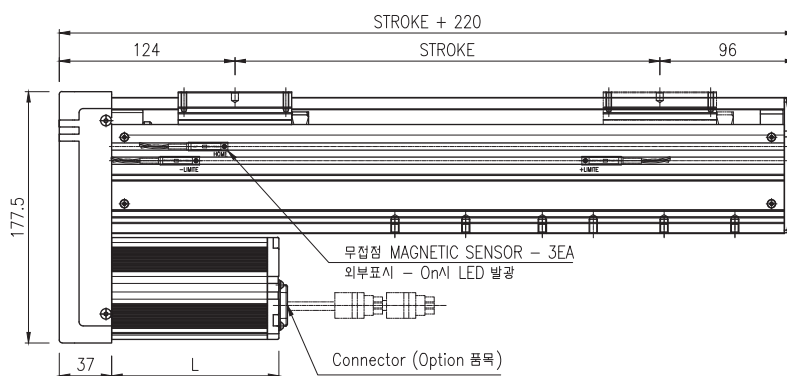
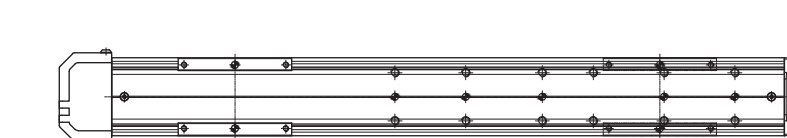
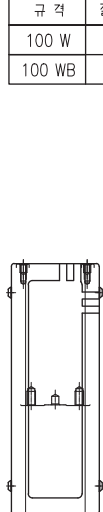


AS-050U

Stroke(mm)		100	200	300	400	500	600	700	800	900	1000
Max. Speed (mm/sec)	Lead 20mm	1000							850	680	560
	Lead 10mm	500							410	330	270
Weight(kg)		4.84	5.51	6.18	6.84	7.51	8.18	8.85	9.52	10.19	10.86
		The weight of the model equipped with a brake is 0.35kg more heavier then this value.									
Base & Slide		Aluminum Profile, 백색전착 유광									

Dimension(mm)

MOTOR COVER(상세)	
규격	길이(L)
100 W	118 L
100 WB	148 L



AS-070S Specification

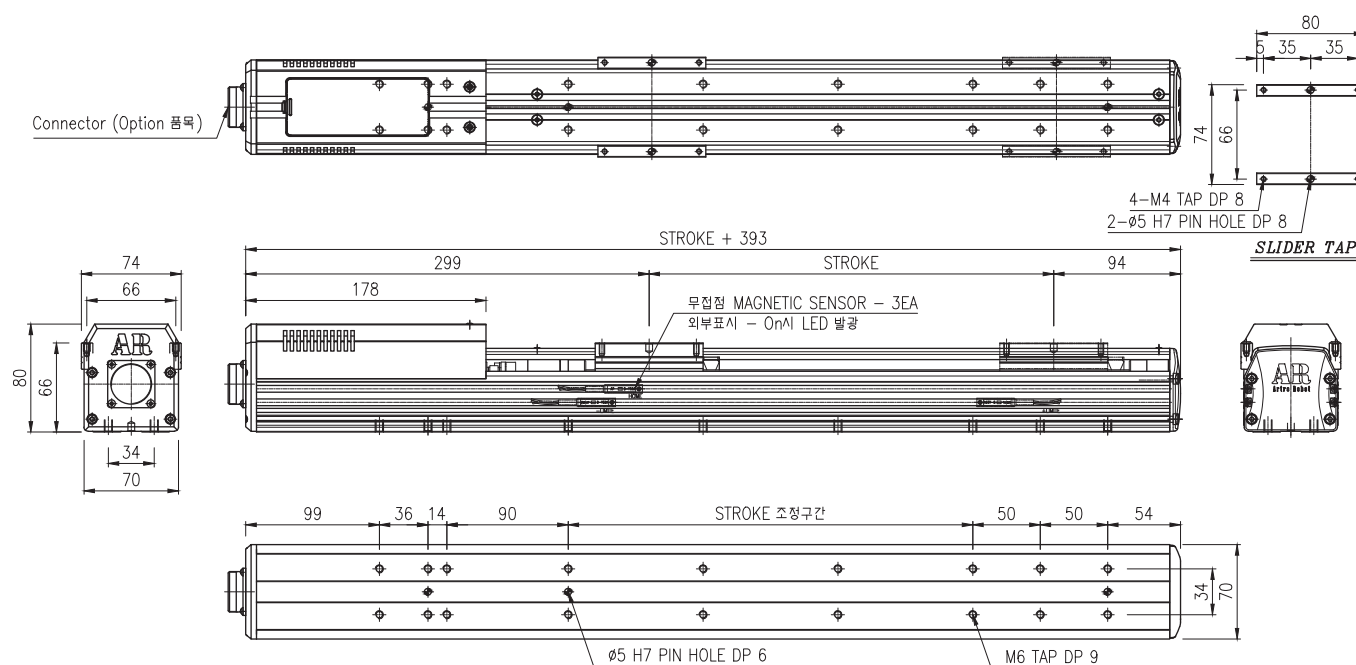
Servo Motor Output/rpm		100w/3000rpm	
Drive mechanism		Ball screw(C7, 연삭), Ø15 Lead 20mm(10mm)	
Liner motion guide		One way, No.24, 2 block	
Repeatability		±0.02mm	
Payload(kg) Ta = 0,2s	Lead 20mm	H : 4	
		V : 3	
	Lead 10mm	H : 24	
		V : 7	
Moment of inertia of area		Ix = 1,65E+05, ly = 4,84E +05	



AS-070S

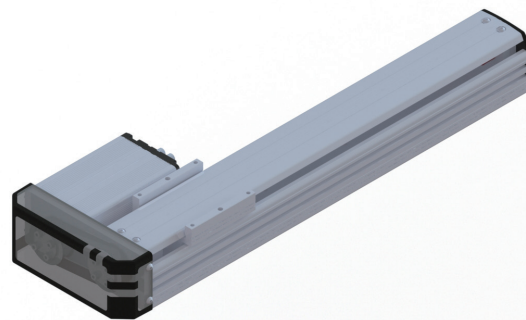
Stroke(mm)		100	200	300	400	500	600
Max. Speed (mm/sec)	Lead 20mm	1000					
	Lead 10mm	500					
Weight(kg)		4.09	4.67	5.25	5.83	6.41	6.99
		The weight of the model equipped with a brake is 0.35kg more heavier then this value.					
Base & Slide		Aluminum Profile, 백색전착 유광					

Dimension(mm)



AS-070L Specification

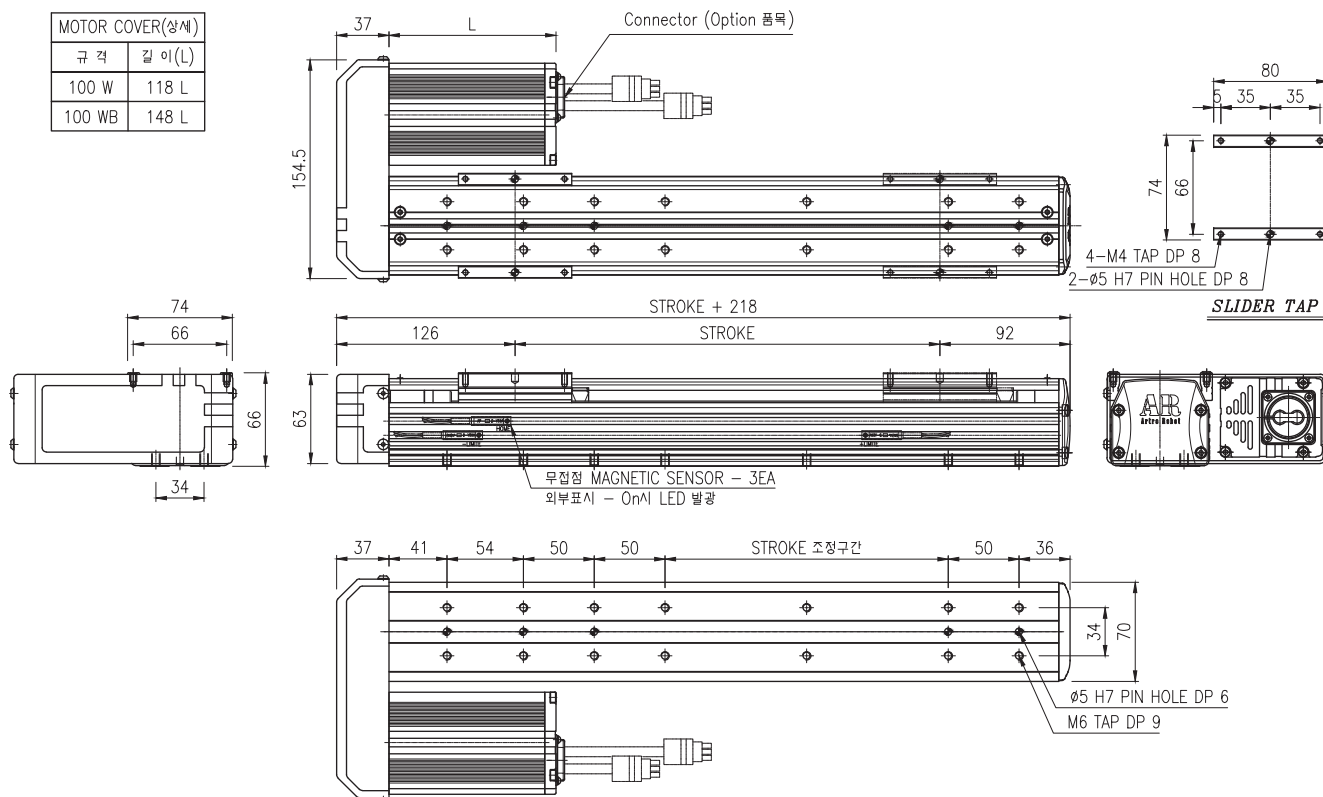
Servo Motor Output/rpm		100w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø15 Lead 20mm(10mm)
Liner motion guide		One way, No.24, 2 block
Repeatability		±0.02mm
Payload(kg) Ta = 0.2s	Lead 20mm	H : 4
		V : 3
	Lead 10mm	H : 24
		V : 7
Moment of inertia of area		Ix = 1.65E+05, Iy = 4.84E +05



AS-070L

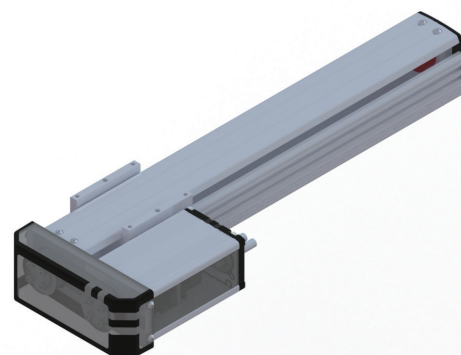
Stroke(mm)		100	200	300	400	500	600
Max. Speed (mm/sec)	Lead 20mm	1000					
	Lead 10mm	500					
Weight(kg)		4.37	4.94	5.51	6.09	6.66	7.23
		The weight of the model equipped with a brake is 0.35kg more heavier then this value.					
Base & Slide		Aluminum Profile, 백색전착 유광					

Dimension(mm)



AS-070R Specification

Servo Motor Output/rpm		100w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø15 Lead 20mm(10mm)
Liner motion guide		One way, No.24. 2 block
Repeatability		±0.02mm
Payload(kg) Ta = 0.2s	Lead 20mm	H : 4
		V : 3
	Lead 10mm	H : 24
		V : 7
Moment of inertia of area		Ix = 1.65E+05, Iy = 4.84E +05

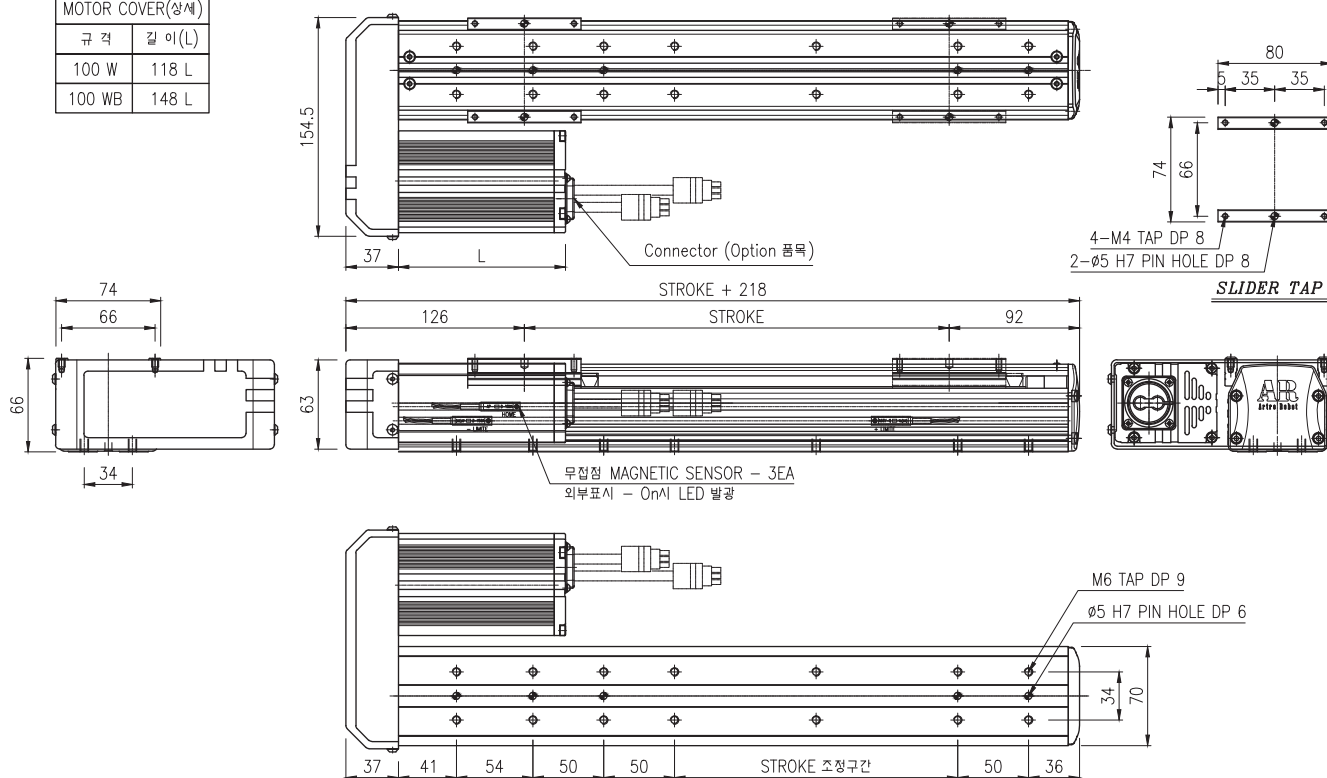


AS-070R

Stroke(mm)		100	200	300	400	500	600
Max. Speed (mm/sec)	Lead 20mm	1000					
	Lead 10mm	500					
Weight(kg)		4.37	4.94	5.51	6.09	6.66	7.23
		The weight of the model equipped with a brake is 0.35kg more heavier then this value.					
Base & Slide		Aluminum Profile, 백색전착 유광					

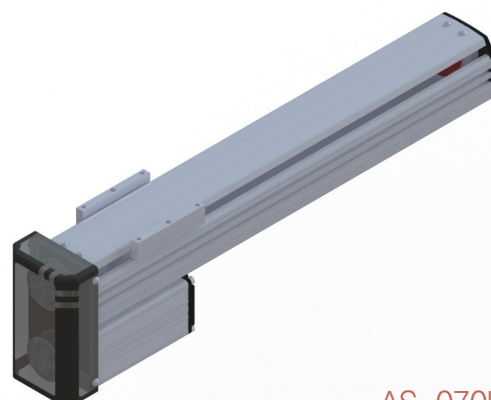
Dimension(mm)

MOTOR COVER(상세)	
규 격	길 이(L)
100 W	118 L
100 WB	148 L



AS-070U Specification

Servo Motor Output/rpm		100w/3000rpm	
Drive mechanism		Ball screw(C7, 연삭), Ø15 Lead 20mm(10mm)	
Liner motion guide		One way, No.24, 2 block	
Repeatability		±0,02mm	
Payload(kg) Ta = 0.2s	Lead 20mm	H : 4	
		V : 3	
	Lead 10mm	H : 24	
		V : 7	
Moment of inertia of area		Ix = 1.65E+05, Iy = 4.84E +05	

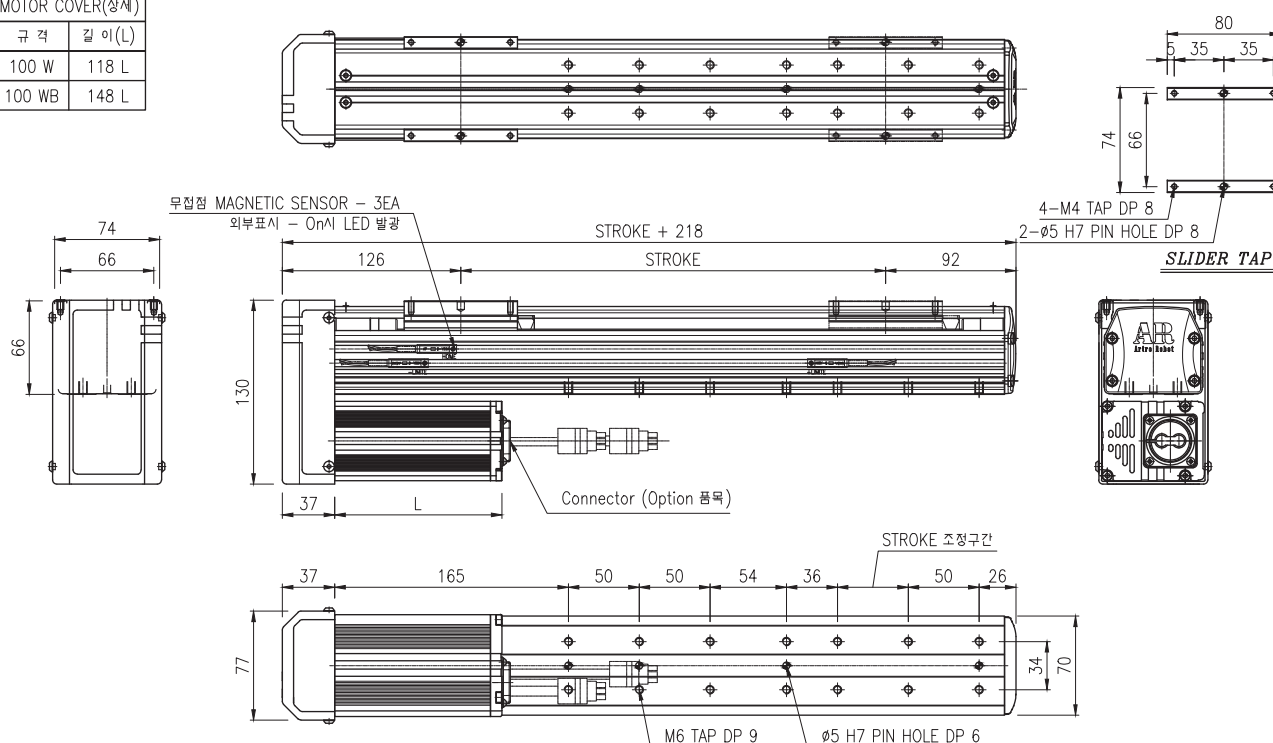


AS-070U

Stroke(mm)		100	200	300	400	500	600
Max. Speed (mm/sec)	Lead 20mm	1000					
	Lead 10mm	500					
Weight(kg)		4.38	4.95	5.52	6.09	6.67	7.24
		The weight of the model equipped with a brake is 0.35kg more heavier then this value.					
Base & Slide		Aluminum Profile, 백색전착 유광					

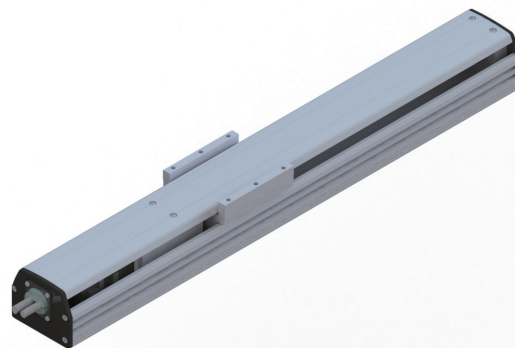
Dimension(mm)

MOTOR COVER(상세)	
규격	길이(L)
100 W	118 L
100 WB	148 L



AS-090S-10 Specification

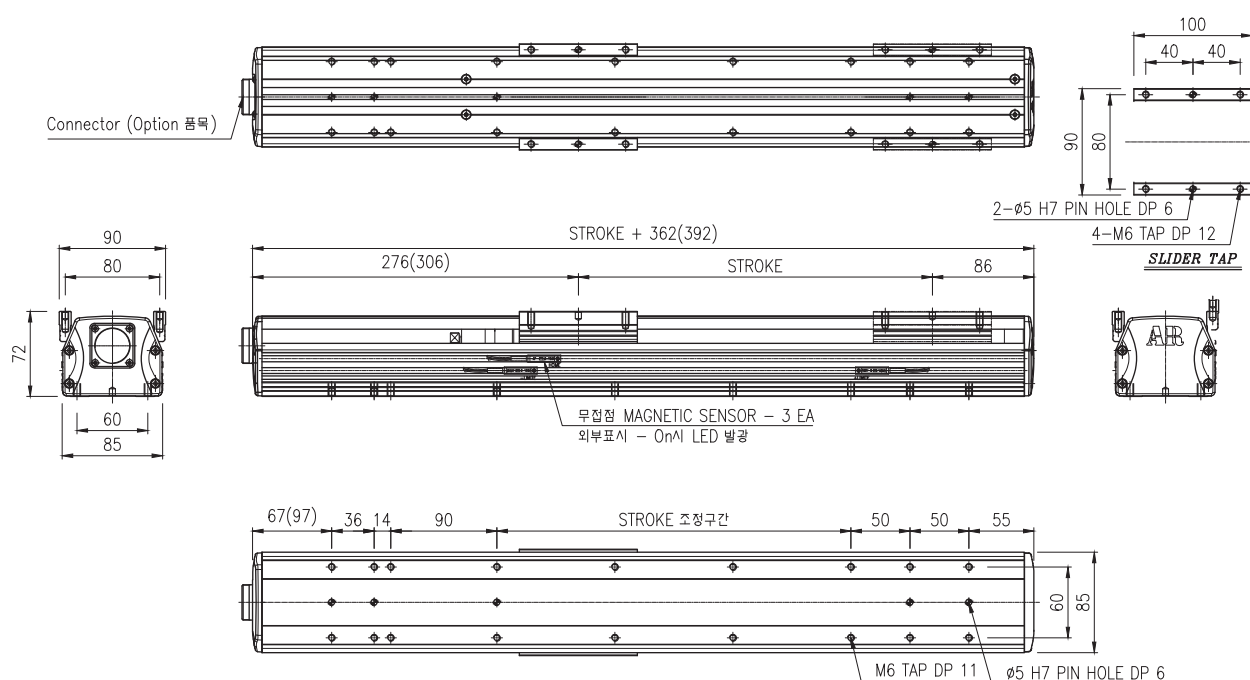
Servo Motor Output/rpm		100w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø15 Lead 20mm(10mm)
Liner motion guide		One way, No.42, 2 block
Repeatability		±0.02mm
Payload(kg) Ta = 0.2s	Lead 20mm	H : 4
		V : 3
	Lead 10mm	H : 24
		V : 7
Moment of inertia of area		Ix = 1.78E+05, Iy = 1.09E +06



AS-090S-10

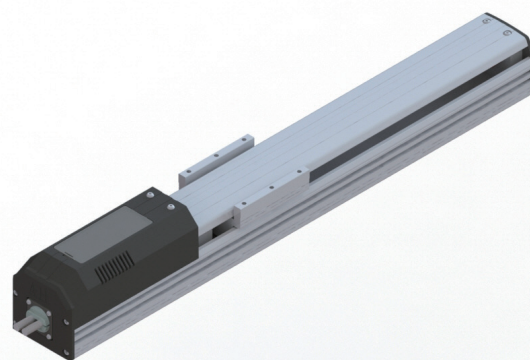
Stroke(mm)		100	200	300	400	500	600	700	800	900	1000
Max. Speed (mm/sec)	Lead 20mm	1000							850	680	560
	Lead 10mm	500							420	330	270
Weight(kg)		5.01	5.83	6.65	7.48	8.30	9.12	9.95	10.77	11.59	12.41
		The weight of the model equipped with a brake is 0.35kg more heavier then this value.									
Base & Slide		Aluminum Profile, 백색전착 유광									

Dimension(mm)



AS-090S-20 Specification

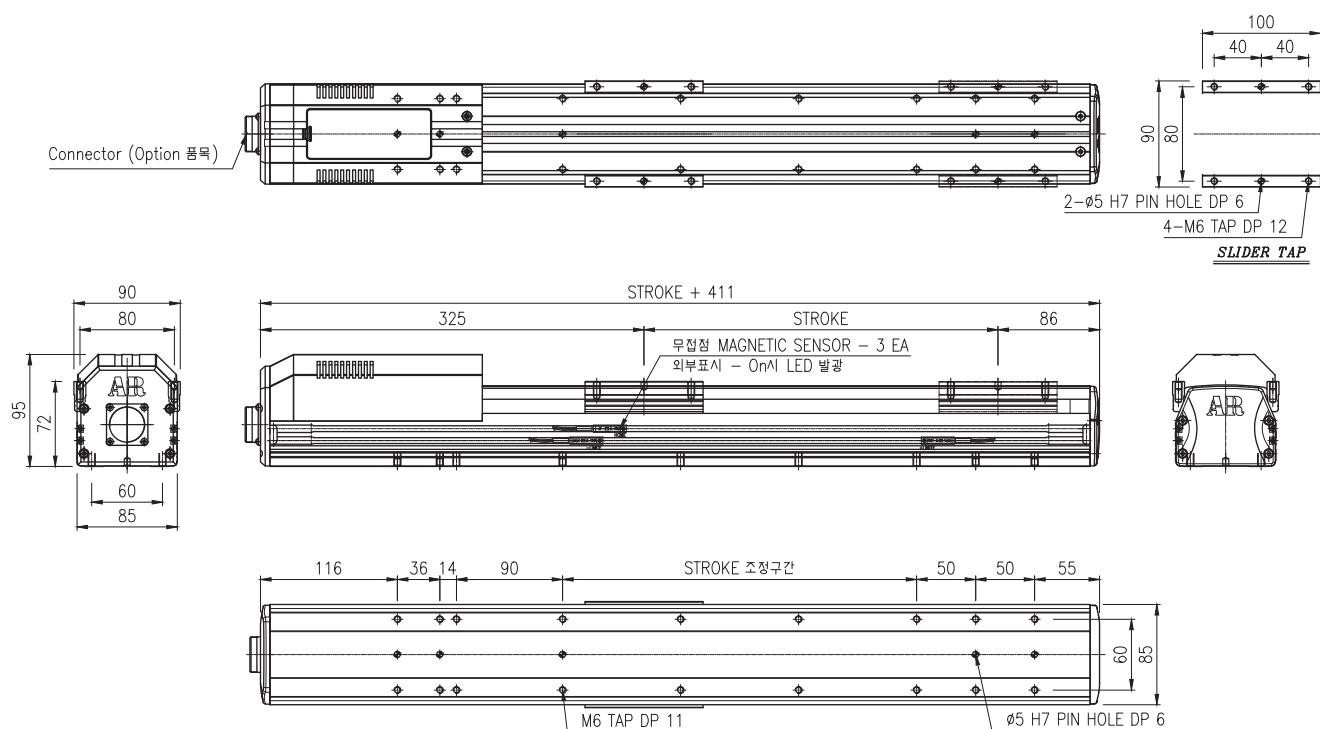
Servo Motor Output/rpm		200w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø15 Lead 20mm(10mm)
Liner motion guide		One way, No.42, 2 block
Repeatability		±0.02mm
Payload(kg) Ta = 0.2s	Lead 20mm	H : 28
		V : 8
	Lead 10mm	H : 30
		V : 16
Moment of inertia of area		Ix = 1.78E+05, Iy = 1.09E +06



AS-090S-20

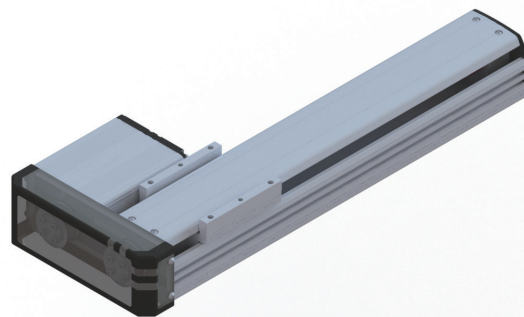
Stroke(mm)		100	200	300	400	500	600	700	800	900	1000
Max. Speed (mm/sec)	Lead 20mm	1000							850	680	560
	Lead 10mm	500							410	330	270
Weight(kg)		5.01	5.83	7.33	8.15	8.97	9.80	10.62	11.44	12.27	13.09
		The weight of the model equipped with a brake is 0.61kg more heavier then this value.									
Base & Slide		Aluminum Profile, 백색전착 유광									

Dimension(mm)



AS-090L Specification

Servo Motor Output/rpm		100w/3000rpm	200w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø15 Lead 20mm(10mm)	
Liner motion guide		One way, No.42, 2 block	
Repeatability		±0.02mm	
Payload(kg) Ta = 0,2s	Lead 20mm	H : 4	H : 28
		V : 3	V : 8
	Lead 10mm	H : 24	H : 30
		V : 7	V : 16
Moment of inertia of area		I _x = 1.78E+05, I _y = 1.09E +06	



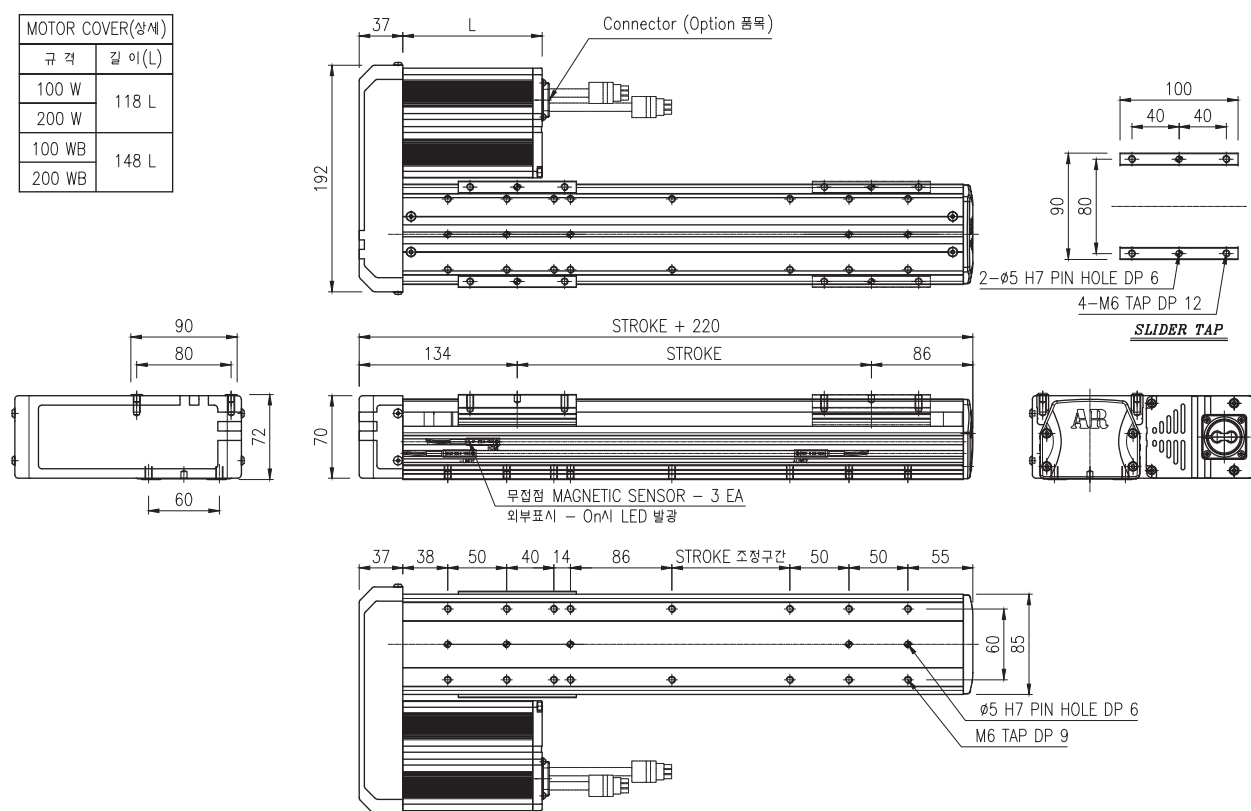
AS-090L

Stroke(mm)		100	200	300	400	500	600	700	800	900	1000
Max. Speed (mm/sec)	Lead 20mm	1000							850	680	560
	Lead 10mm	500							420	330	270
Weight(kg)		4.65	5.32	5.99	6.66	7.34	8.01	8.68	9.35	10.03	10.7
Base & Slide		Aluminum Profile, 백색전착 유광									

The weight of the model equipped with a brake is 0.61kg more heavier then this value.

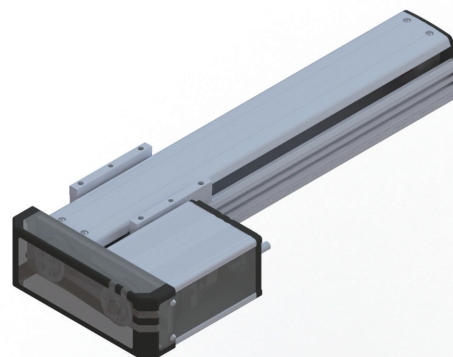
Dimension(mm)

MOTOR COVER(상세)	
규격	길이(L)
100 W	118 L
200 W	148 L
100 WB	148 L
200 WB	148 L



AS-090R Specification

Servo Motor Output/rpm		100w/3000rpm	200w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø15 Lead 20mm(10mm)	
Liner motion guide		One way, No.42, 2 block	
Repeatability		±0.02mm	
Payload(kg) Ta = 0.2s	Lead 20mm	H : 4	H : 28
		V : 3	V : 8
	Lead 10mm	H : 24	H : 30
		V : 7	V : 16
Moment of inertia of area		Ix = 1.78E+05, ly = 1.09E +06	

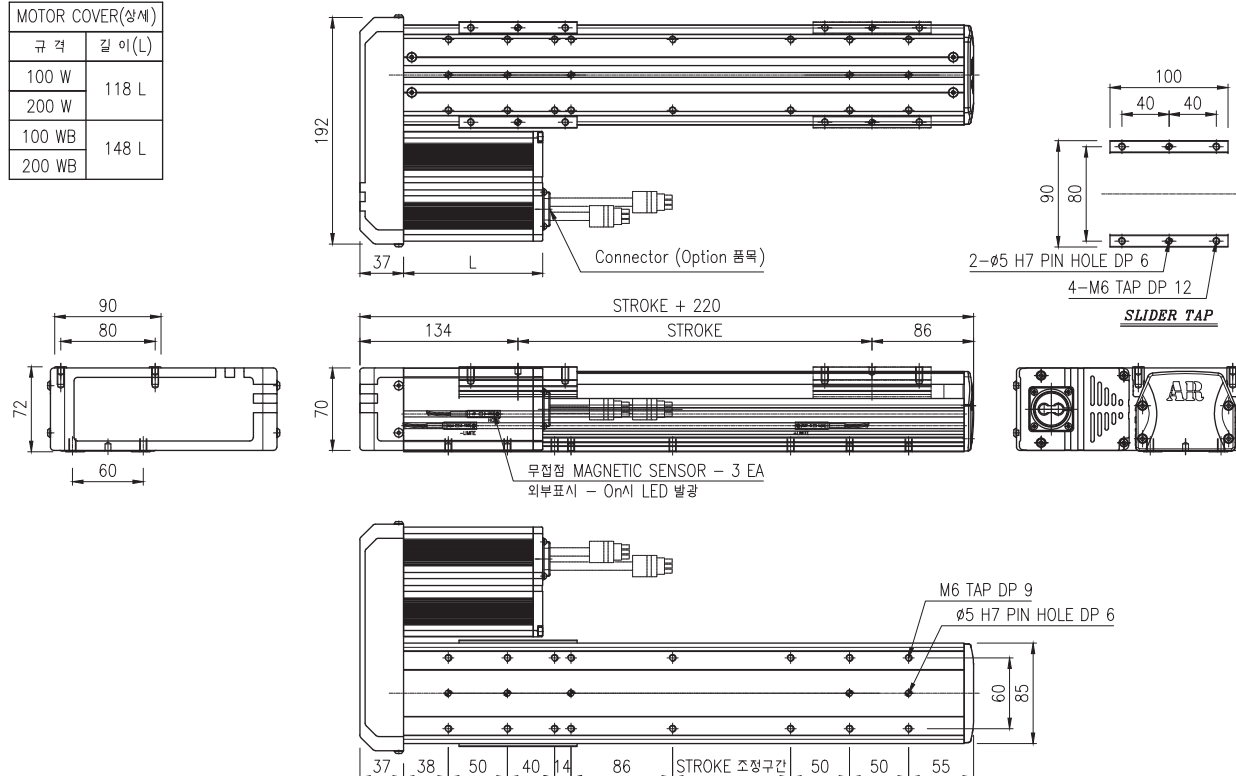


AS-090R

Stroke(mm)		100	200	300	400	500	600	700	800	900	1000
Max. Speed (mm/sec)	Lead 20mm	1000							850	680	560
	Lead 10mm	500							410	330	270
Weight(kg)		4.65	5.32	5.99	6.66	7.34	8.01	8.68	9.35	10.03	10.7
		The weight of the model equipped with a brake is 0.61kg more heavier then this value.									
Base & Slide		Aluminum Profile, 백색전착 유광									

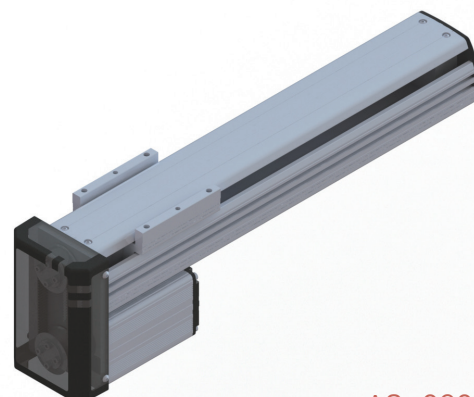
Dimension(mm)

MOTOR COVER(상세)	
규격	길이(L)
100 W	118 L
200 W	
100 WB	148 L
200 WB	



AS-090U Specification

Servo Motor Output/rpm		100w/3000rpm	200w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø15 Lead 20mm(10mm)	
Liner motion guide		One way, No.42, 2 block	
Repeatability		±0.02mm	
Payload(kg) Ta = 0,2s	Lead 20mm	H : 4	H : 28
		V : 3	V : 8
	Lead 10mm	H : 24	H : 30
		V : 7	V : 16
Moment of inertia of area		I _x = 1.78E+05, I _y = 1.09E +06	

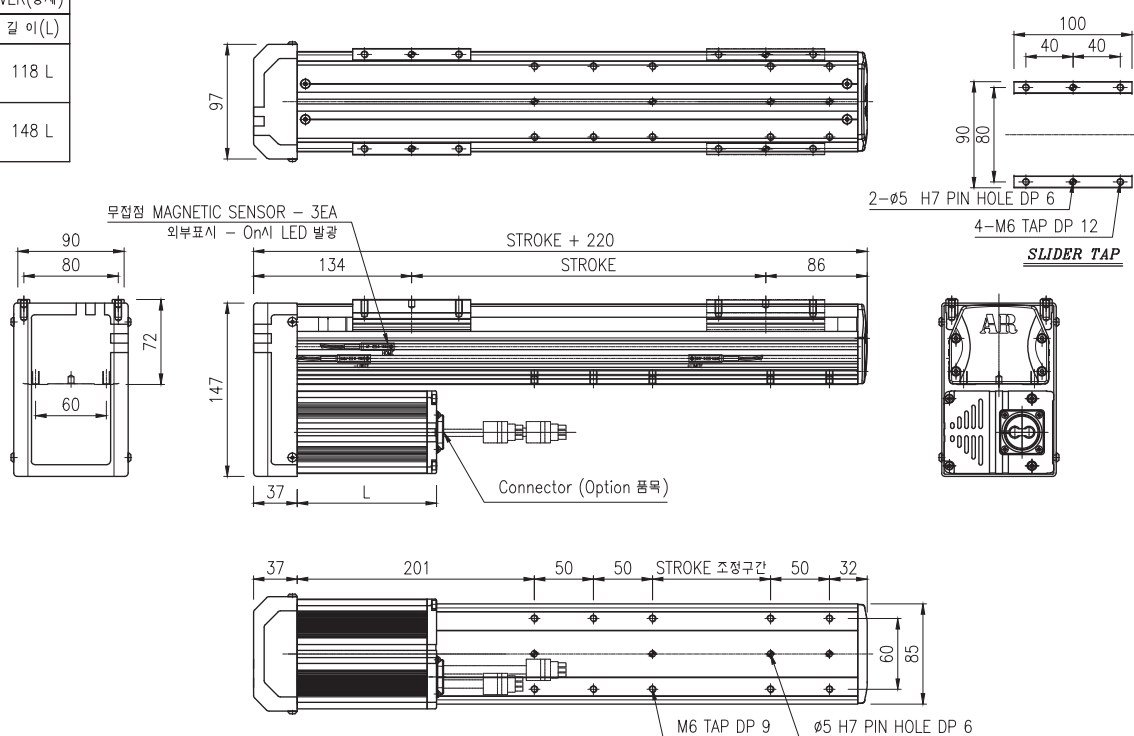


AS-090U

Stroke(mm)		100	200	300	400	500	600	700	800	900	1000
Max. Speed (mm/sec)	Lead 20mm	1000							850	680	560
	Lead 10mm	500							420	330	270
Weight(kg)		4.63	5.31	5.98	6.65	7.33	8.00	8.67	9.34	10.02	10.6
		The weight of the model equipped with a brake is 0.61kg more heavier then this value.									
Base & Slide		Aluminum Profile, 백색전착 유광									

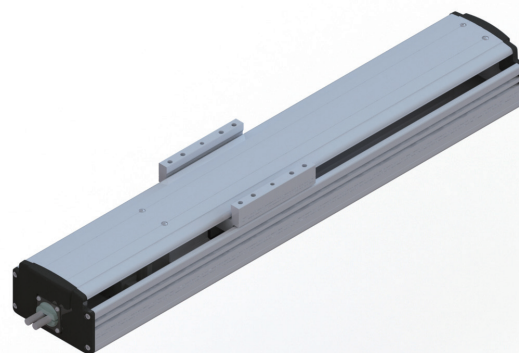
Dimension(mm)

MOTOR COVER(상세)	
규격	길이(L)
100 W	118 L
200 W	
100 WB	148 L
200 WB	



AS-120S Specification

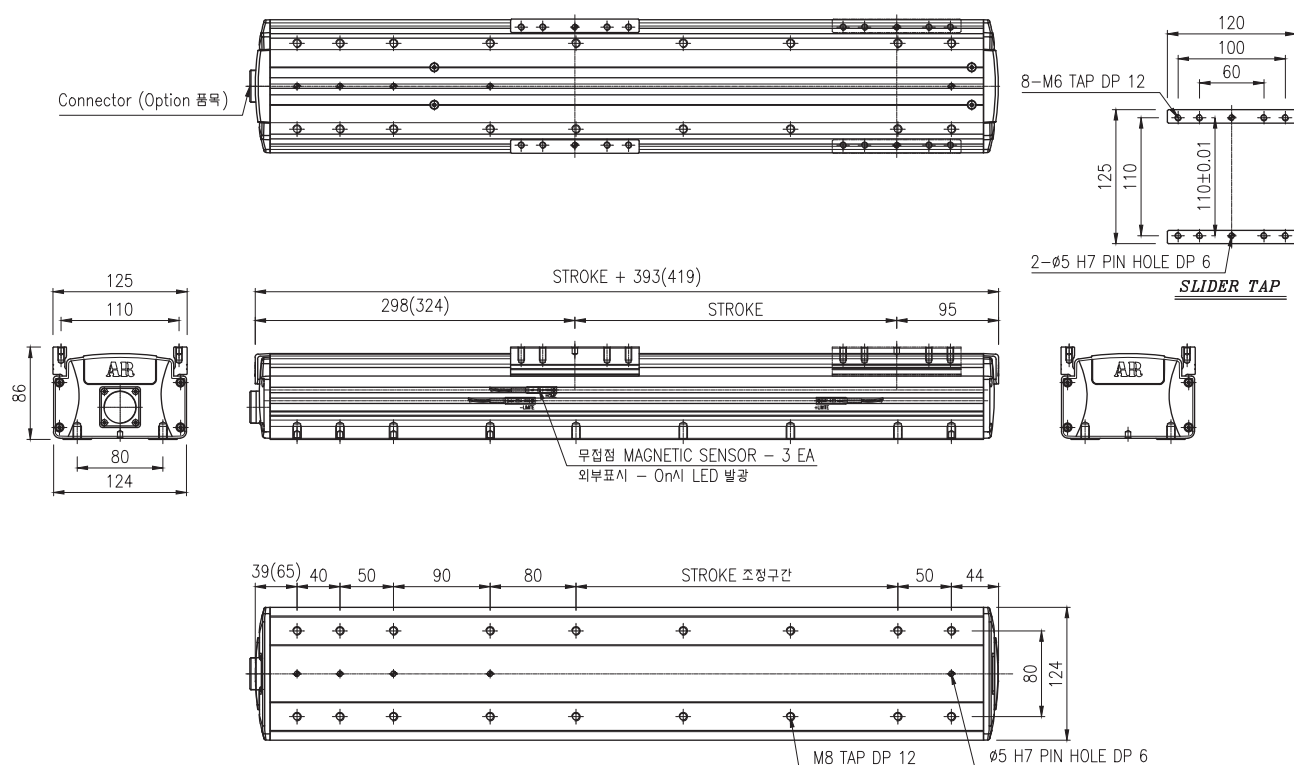
Servo Motor Output/rpm		200w/3000rpm		400w/3000rpm	
Drive mechanism		Ball screw(C7, 연삭), Ø15 Lead 20mm(10mm)			
Liner motion guide		Two way, 15w, 2 block			
Repeatability		±0.02mm			
Payload(kg) Ta = 0.2s	Lead 20mm	H : 30		H : 40	
		V : 8		V : 18	
	Lead 10mm	H : 50		H : 50	
		V : 20		V : 38	
Moment of inertia of area		Ix = 4.86E+05, ly = 4.45E +06			



AS-120S

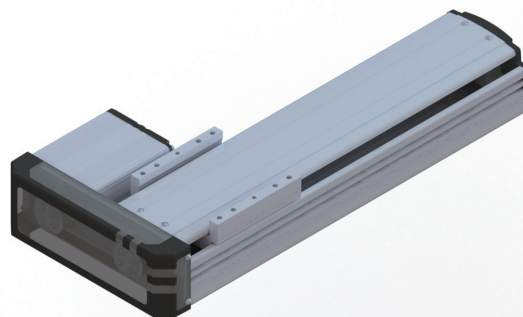
Stroke(mm)		100	200	300	400	500	600	700	800	900	1000	1100	1200
Max. Speed (mm/sec)	Lead 20mm	1000							850	680	560	460	390
	Lead 10mm	500							420	320	270	230	190
Weight(kg)		6.13	7.10	8.06	9.03	9.99	10.96	11.92	12.89	13.85	14.82	15.78	16.75
		The weight of the model equipped with a brake is 0.61kg more heavier then this value.											
Base & Slide		Aluminum Profile, 백색전착 유광											

Dimension(mm)



AS-120L Specification

Servo Motor Output/rpm		200w/3000rpm		400w/3000rpm	
Drive mechanism		Ball screw(C7, 연삭), Ø15 Lead 20mm(10mm)			
Liner motion guide		Two way, 15w, 2 block			
Repeatability		±0.02mm			
Payload(kg) Ta = 0.2s	Lead 20mm	H : 30		H : 40	
		V : 8		V : 18	
	Lead 10mm	H : 50		H : 50	
		V : 20		V : 38	
Moment of inertia of area		Ix = 4.86E+05, ly = 4.45E +06			

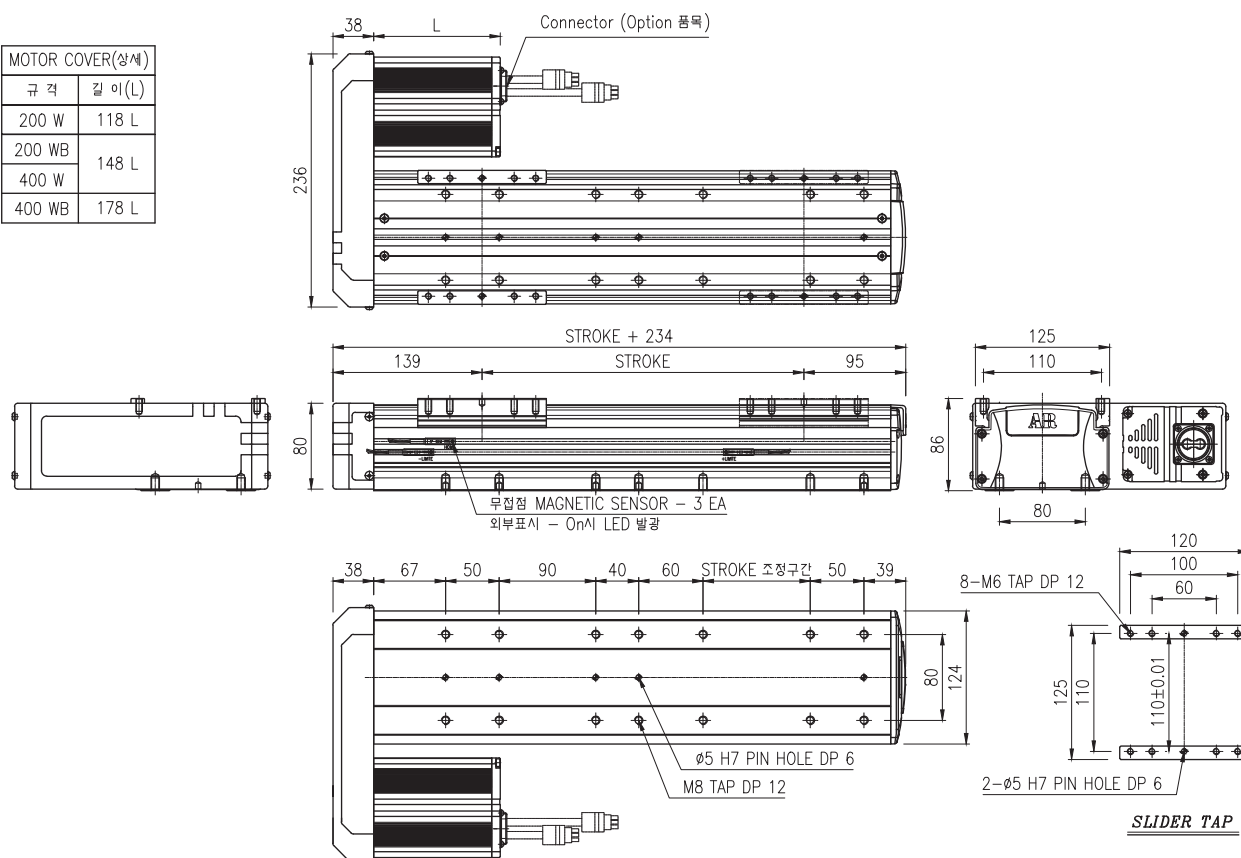


AS-120L

Stroke(mm)		100	200	300	400	500	600	700	800	900	1000	1100	1200
Max. Speed (mm/sec)	Lead 20mm	1000							850	680	560	460	390
	Lead 10mm	500							420	320	270	230	190
Weight(kg)		6.13	7.10	8.06	9.03	9.99	10.96	11.92	12.89	13.85	14.82	15.78	16.75
		The weight of the model equipped with a brake is 0.61kg more heavier then this value.											
Base & Slide		Aluminum Profile, 백색전착 유광											

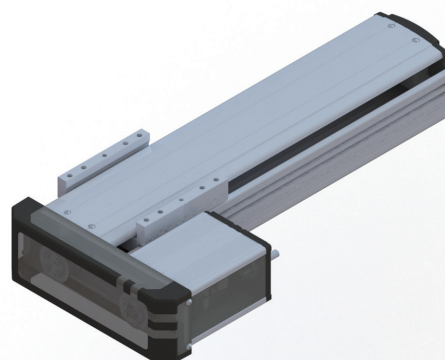
Dimension(mm)

MOTOR COVER(상세)	
규격	길이(L)
200 W	118 L
200 WB	148 L
400 W	148 L
400 WB	178 L



AS-120R Specification

Servo Motor Output/rpm		200w/3000rpm	400w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø15 Lead 20mm(10mm)	
Liner motion guide		Two way, 15w, 2 block	
Repeatability		±0.02mm	
Payload(kg) Ta = 0.2s	Lead 20mm	H : 30	H : 40
		V : 8	V : 18
	Lead 10mm	H : 50	H : 50
		V : 20	V : 38
Moment of inertia of area		I _x = 4.86E+05, I _y = 4.45E +06	

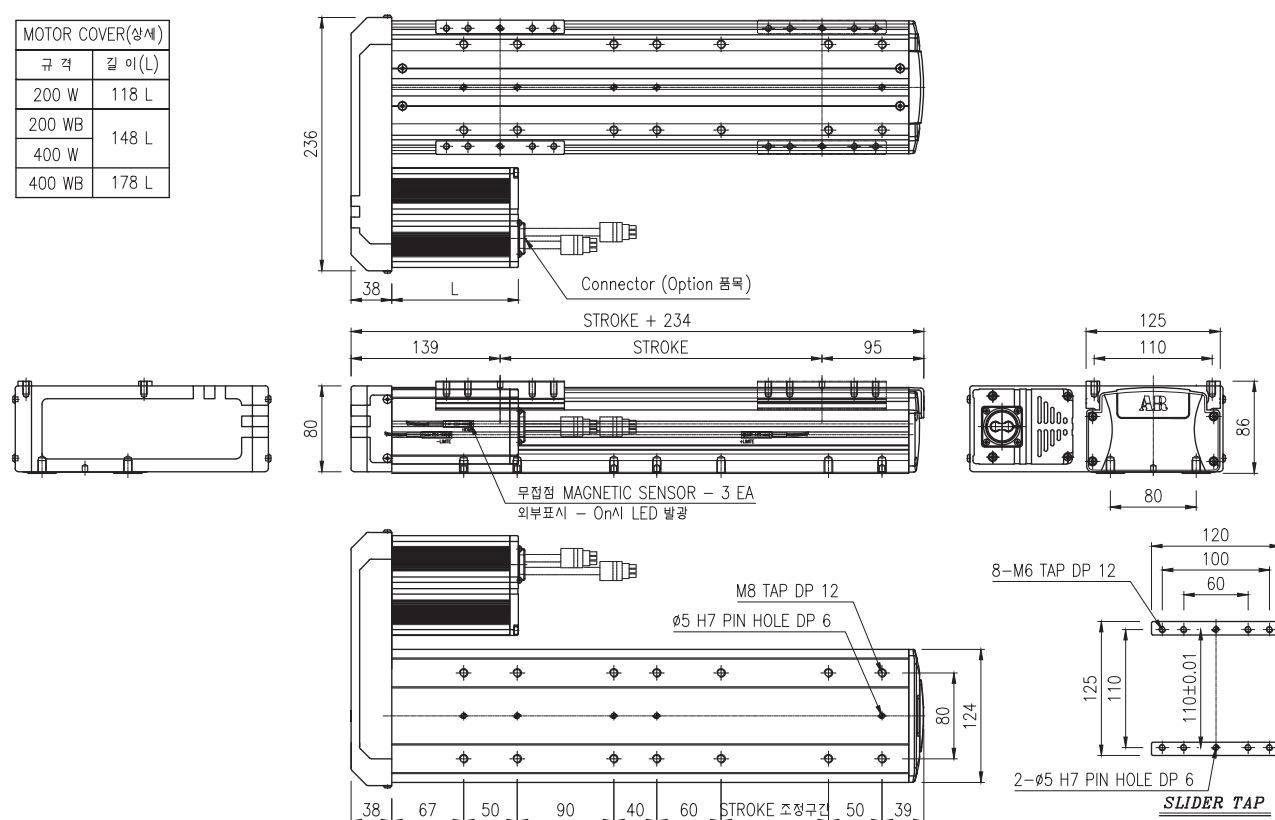


AS-120R

Stroke(mm)		100	200	300	400	500	600	700	800	900	1000	1100	1200
Max. Speed (mm/sec)	Lead 20mm	1000							850	680	560	460	390
	Lead 10mm	500							420	330	270	230	190
Weight(kg)		6.13	7.10	8.06	9.03	9.99	10.96	11.92	12.89	13.85	14.82	15.78	16.75
		The weight of the model equipped with a brake is 0.61kg more heavier then this value.											
Base & Slide		Aluminum Profile, 백색전착 유광											

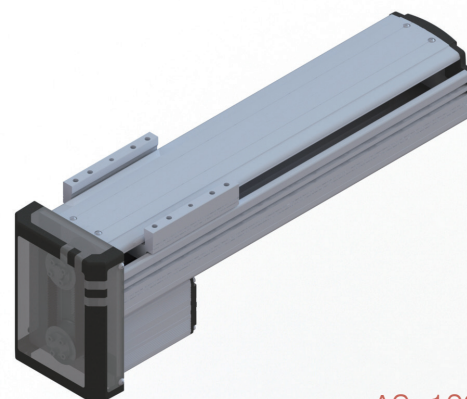
Dimension(mm)

MOTOR COVER(상세)	
규 격	길 이(L)
200 W	118 L
200 WB	148 L
400 W	
400 WB	178 L



AS-120U Specification

Servo Motor Output/rpm		200w/3000rpm		400w/3000rpm	
Drive mechanism		Ball screw(C7, 연삭), Ø15 Lead 20mm(10mm)			
Liner motion guide		Two way, 15w, 2 block			
Repeatability		±0.02mm			
Payload(kg) Ta = 0.2s	Lead 20mm	H : 30		H : 40	
		V : 8		V : 18	
	Lead 10mm	H : 50		H : 50	
		V : 20		V : 38	
Moment of inertia of area		Ix = 4.86E+05, ly = 4.45E +06			

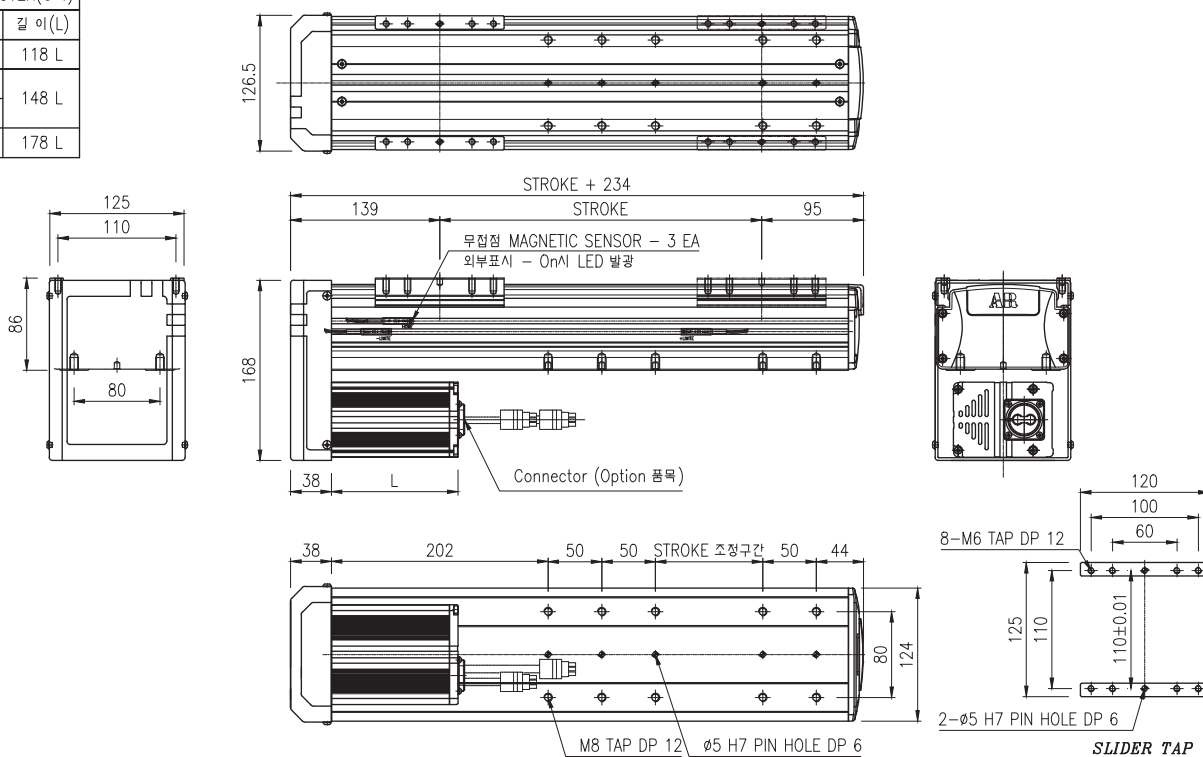


AS-120U

Stroke(mm)		100	200	300	400	500	600	700	800	900	1000	1100	1200
Max. Speed (mm/sec)	Lead 20mm	1000							850	680	560	460	390
	Lead 10mm	500							420	330	270	230	190
Weight(kg)		6.22	7.19	8.15	9.12	10.08	11.05	12.01	12.98	13.94	14.91	15.87	16.84
		The weight of the model equipped with a brake is 0.61kg more heavier then this value.											
Base & Slide		Aluminum Profile, 백색전착 유광											

Dimension(mm)

MOTOR COVER(상세)	
규격	길이(L)
200 W	118 L
200 WB	148 L
400 W	148 L
400 WB	178 L



AS-160S Specification

Servo Motor Output/rpm		400w/3000rpm		750w/3000rpm	
Drive mechanism		Ball screw(C7, 연삭), Ø15(Ø20) Lead 20mm(10mm)			
Liner motion guide		Two way, 20w, 2 block			
Repeatability		±0.02mm			
Payload(kg) Ta = 0.2s	Lead 20mm	H : 50		H : 60	
		V : 18		V : 24	
	Lead 10mm	H : 80		H : 80	
		V : 32		V : 40	
Moment of inertia of area		Ix = 9.38E+05, ly = 1.05E +07			

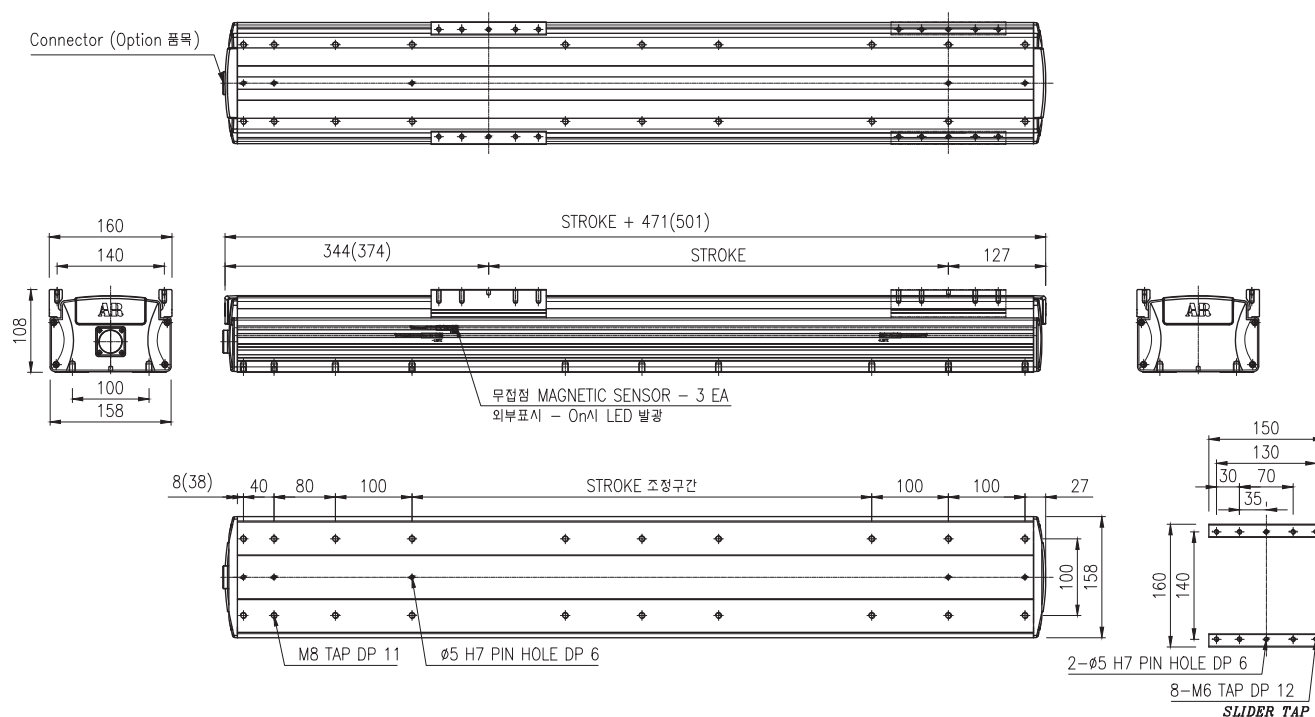


AS-160S

Stroke(mm)		100	200	300	400	500	600	700	800	900	1000	1100	1200	1300	1400	1500	1600
Max. Speed (mm/sec)	Lead 20mm	1000								910	750	620	530	450	390	340	300
	Lead 10mm	500								460	380	320	270	230			
Weight(kg)		14.48	16.19	17.90	19.60	21.31	23.02	24.72	26.43	28.14	29.84	31.55	33.26	34.96	36.67	38.38	40.08
		The weight of the model equipped with a brake is 0.61kg more heavier then this value.															
Base & Slide		Aluminum Profile, 백색전착 유광															

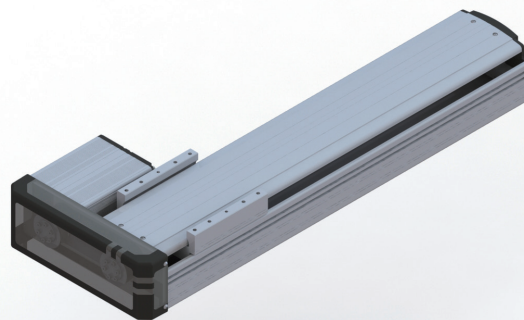
Dimension(mm)

** () 750W BRAKE MOTOR DIMENSION



AS-160L Specification

Servo Motor Output/rpm		400w/3000rpm	750w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø15(Ø20) Lead 20mm(10mm)	
Liner motion guide		Two way, 20w, 2 block	
Repeatability		±0.02mm	
Payload(kg) Ta = 0.2s	Lead 20mm	H : 50	H : 60
		V : 18	V : 24
	Lead 10mm	H : 80	H : 80
		V : 32	V : 40
Moment of inertia of area		Ix = 9.38E+05, Iy = 1.05E +07	

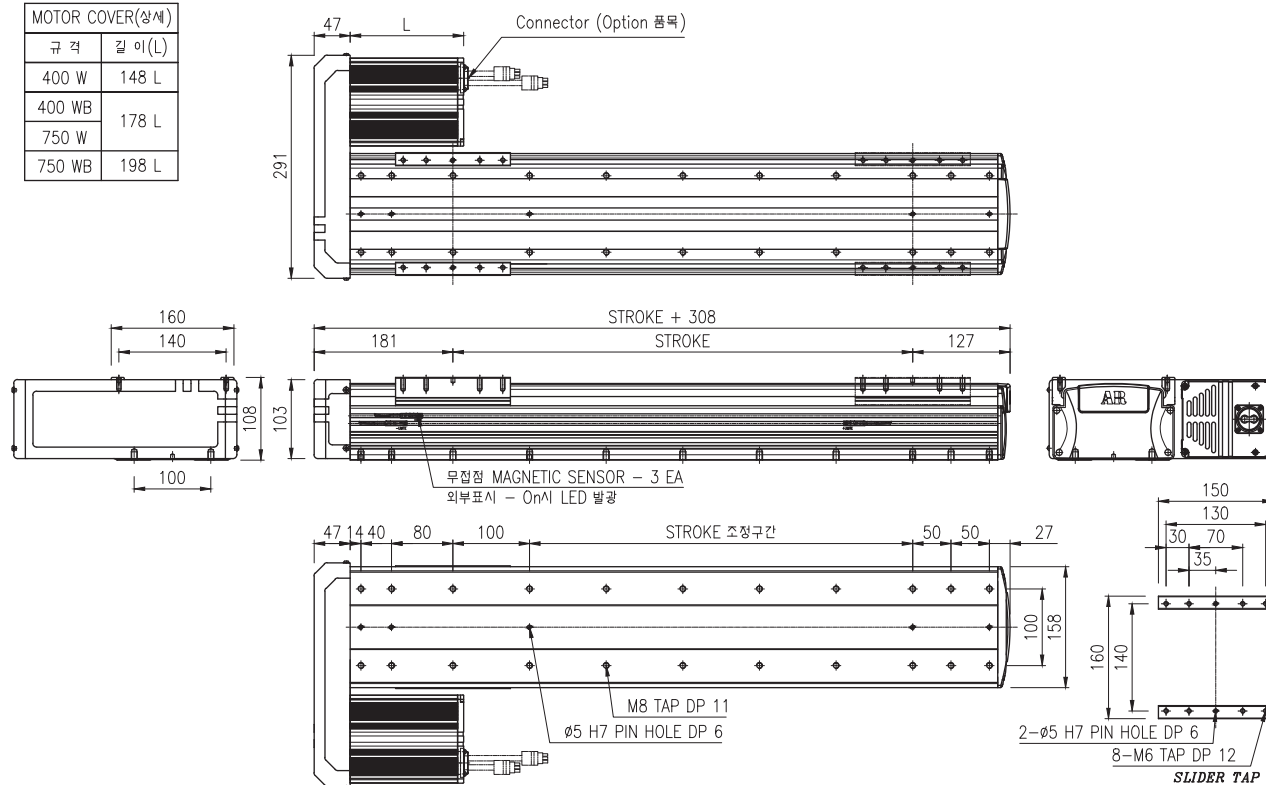


AS-160L

Stroke(mm)		100	200	300	400	500	600	700	800	900	1000	1100	1200	1300	1400	1500	1600
Max. Speed (mm/sec)	Lead 20mm	1000								910	750	620	530	450	390	340	300
	Lead 10mm	500								460	380	320	270	230			
Weight(kg)		14.70	16.41	18.11	19.82	21.53	23.23	24.94	26.65	28.35	30.06	31.77	33.47	35.18	36.89	38.59	40.30
		The weight of the model equipped with a brake is 0.61kg more heavier then this value.															
Base & Slide		Aluminum Profile, 백색전착 유광															

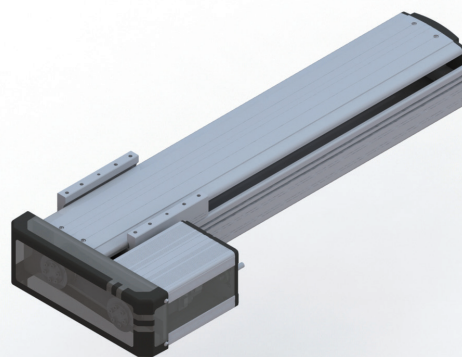
Dimension(mm)

MOTOR COVER(상세)	
규격	길이(L)
400 W	148 L
400 WB	178 L
750 W	198 L
750 WB	198 L



AS-160R Specification

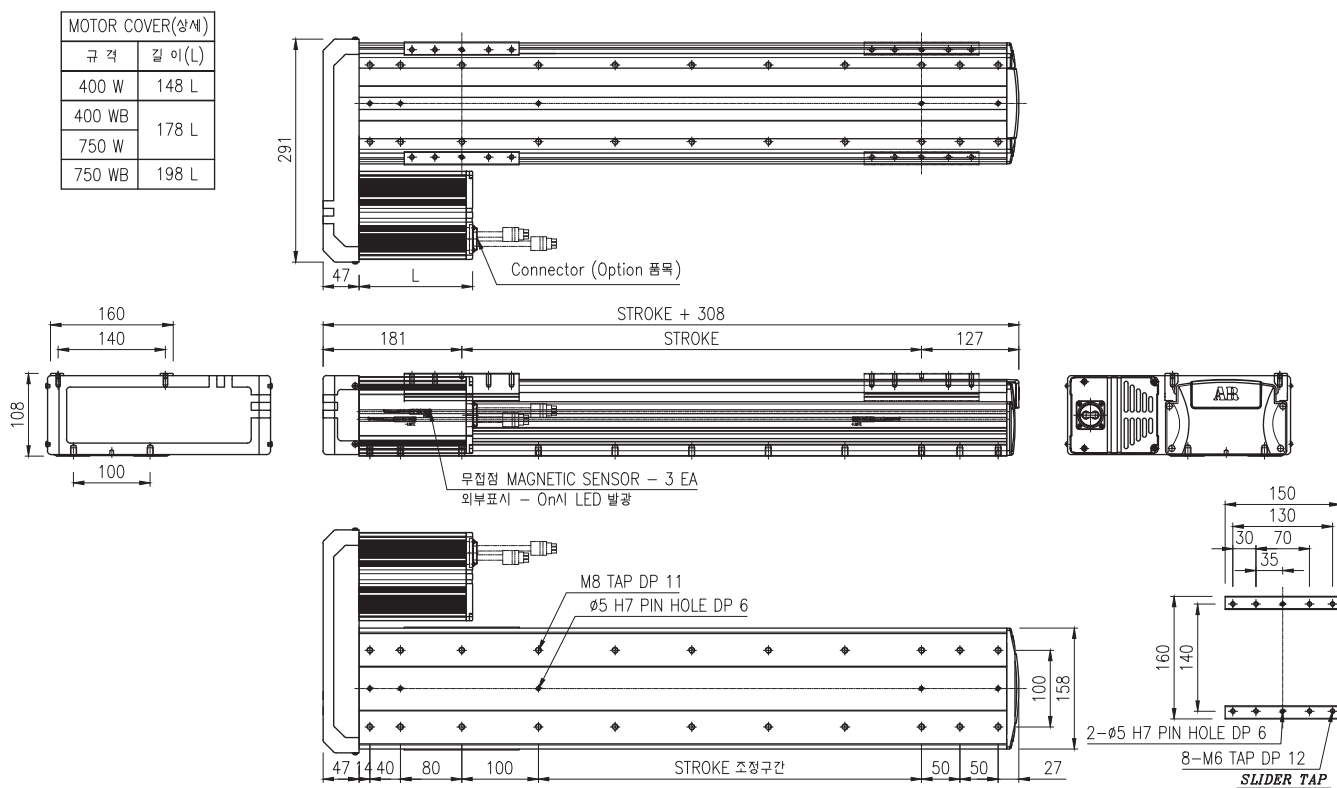
Servo Motor Output/rpm		400w/3000rpm		750w/3000rpm	
Drive mechanism		Ball screw(C7, 연삭), Ø15(Ø20) Lead 20mm(10mm)			
Liner motion guide		Two way, 20w, 2 block			
Repeatability		±0.02mm			
Payload(kg) Ta = 0.2s	Lead 20mm	H : 50		H : 60	
		V : 18		V : 24	
	Lead 10mm	H : 80		H : 80	
		V : 32		V : 40	
Moment of inertia of area		Ix = 9.38E+05, ly = 1.05E +07			



AS-160R

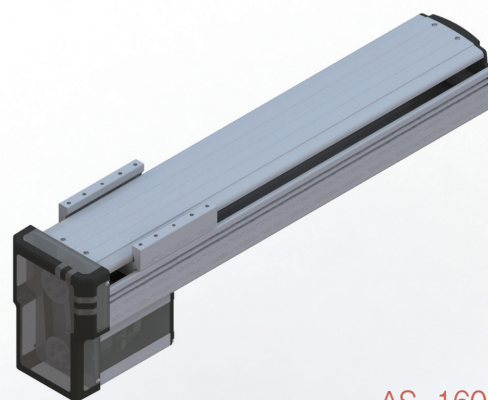
Stroke(mm)		100	200	300	400	500	600	700	800	900	1000	1100	1200	1300	1400	1500	1600
Max. Speed (mm/sec)	Lead 20mm	1000								910	750	620	530	450	390	340	300
	Lead 10mm	500								460	380	320	270	230			
Weight(kg)		14.70	16.41	18.11	19.82	21.53	23.23	24.94	26.65	28.35	30.06	31.77	33.47	35.18	36.89	38.59	40.30
		The weight of the model equipped with a brake is 0.61kg more heavier then this value.															
Base & Slide		Aluminum Profile, 백색전착 유광															

Dimension(mm)



AS-160U Specification

Servo Motor Output/rpm		400w/3000rpm	750w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø15(Ø20) Lead 20mm(10mm)	
Liner motion guide		Two way, 20w, 2 block	
Repeatability		±0.02mm	
Payload(kg) Ta = 0.2s	Lead 20mm	H : 50	H : 60
		V : 18	V : 24
	Lead 10mm	H : 80	H : 80
		V : 32	V : 40
Moment of inertia of area		Ix = 9.38E+05, Iy = 1.05E +07	

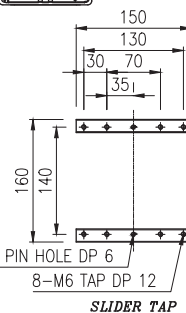
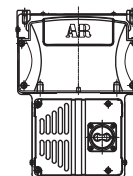
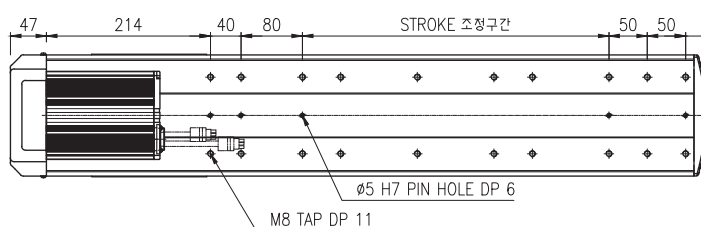
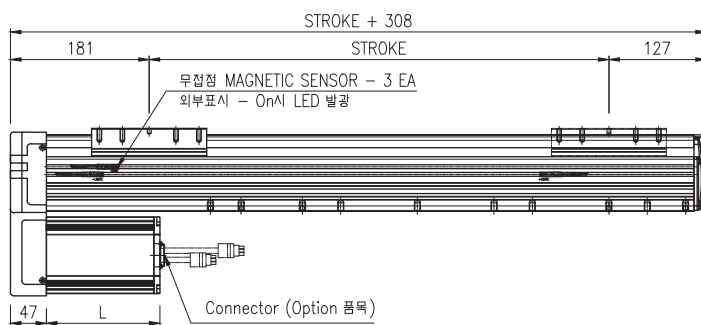
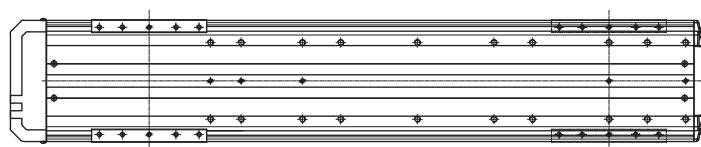
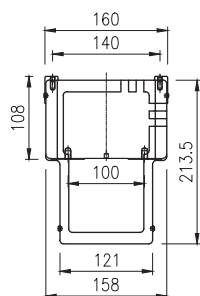


AS-160U

Stroke(mm)		100	200	300	400	500	600	700	800	900	1000	1100	1200	1300	1400	1500	1600
Max. Speed (mm/sec)	Lead 20mm	1000								910	750	620	530	450	390	340	300
	Lead 10mm	500								460	380	320	270	230			
Weight(kg)		14.61	16.31	18.02	19.23	21.43	23.14	24.85	26.55	28.26	29.97	31.67	33.38	35.29	36.79	38.50	40.21
		The weight of the model equipped with a brake is 0.61kg more heavier then this value.															
Base & Slide		Aluminum Profile, 백색전착 유광															

Dimension(mm)

MOTOR COVER(상세)	
규격	길이(L)
400 W	148 L
400 WB	178 L
750 W	198 L
750 WB	198 L



AS-200S Specification

Servo Motor Output/rpm		750w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø20(Ø25) Lead 20mm(10mm)
Liner motion guide		Two way, 25w, 2 block
Repeatability		±0.02mm
Payload(kg) Ta = 0.2s	Lead 20mm	H : 100
		V : 30
	Lead 10mm	H : 120
		V : 55
Moment of inertia of area		Ix = 1.79E+06, ly = 2.631E +07

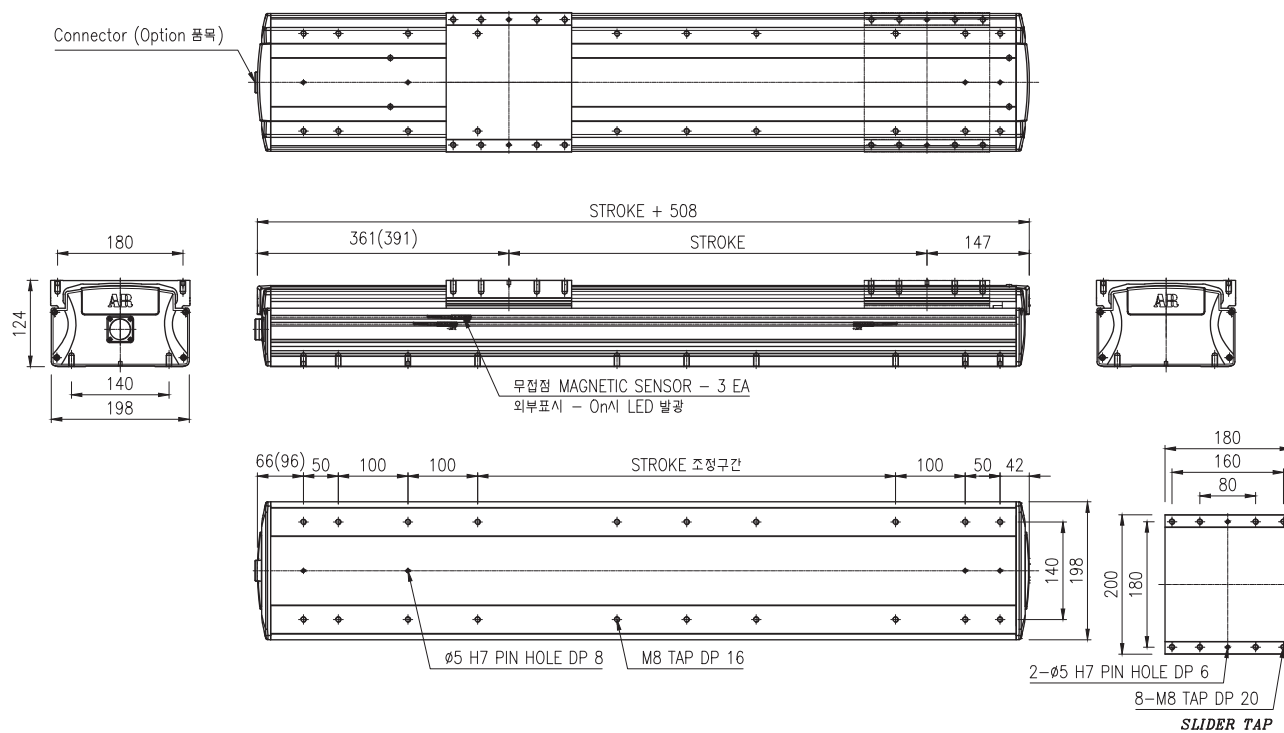


AS-200S

Stroke(mm)		100	200	300	400	500	600	700	800	900	1000	1100	1200	1300	1400	1500	1600
Max. Speed (mm/sec)	Lead 20mm	1000								910	750	620	530	450	390	340	300
	Lead 10mm	500								460	380	320	270	230			
Weight(kg)		24.25	26.82	29.39	31.96	34.54	37.11	39.68	42.25	44.83	47.40	49.97	52.54	55.12	57.69	60.26	62.83
		The weight of the model equipped with a brake is 1.0kg more heavier then this value.															
Base & Slide		Aluminum Profile, 백색전착 유광															

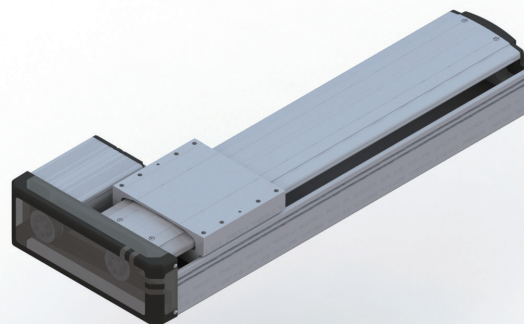
Dimension(mm)

** () 750W BRAKE MOTOR DIMENSION



AS-200L Specification

Servo Motor Output/rpm		750w/3000rpm	
Drive mechanism		Ball screw(C7, 연삭), Ø20(Ø25) Lead 20mm(10mm)	
Liner motion guide		Two way, 25w, 2 block	
Repeatability		±0.02mm	
Payload(kg) Ta = 0.2s	Lead 20mm	H : 100	
		V : 30	
	Lead 10mm	H : 120	
		V : 55	
Moment of inertia of area		Ix = 1.79E+06, Iy = 2.631E +07	

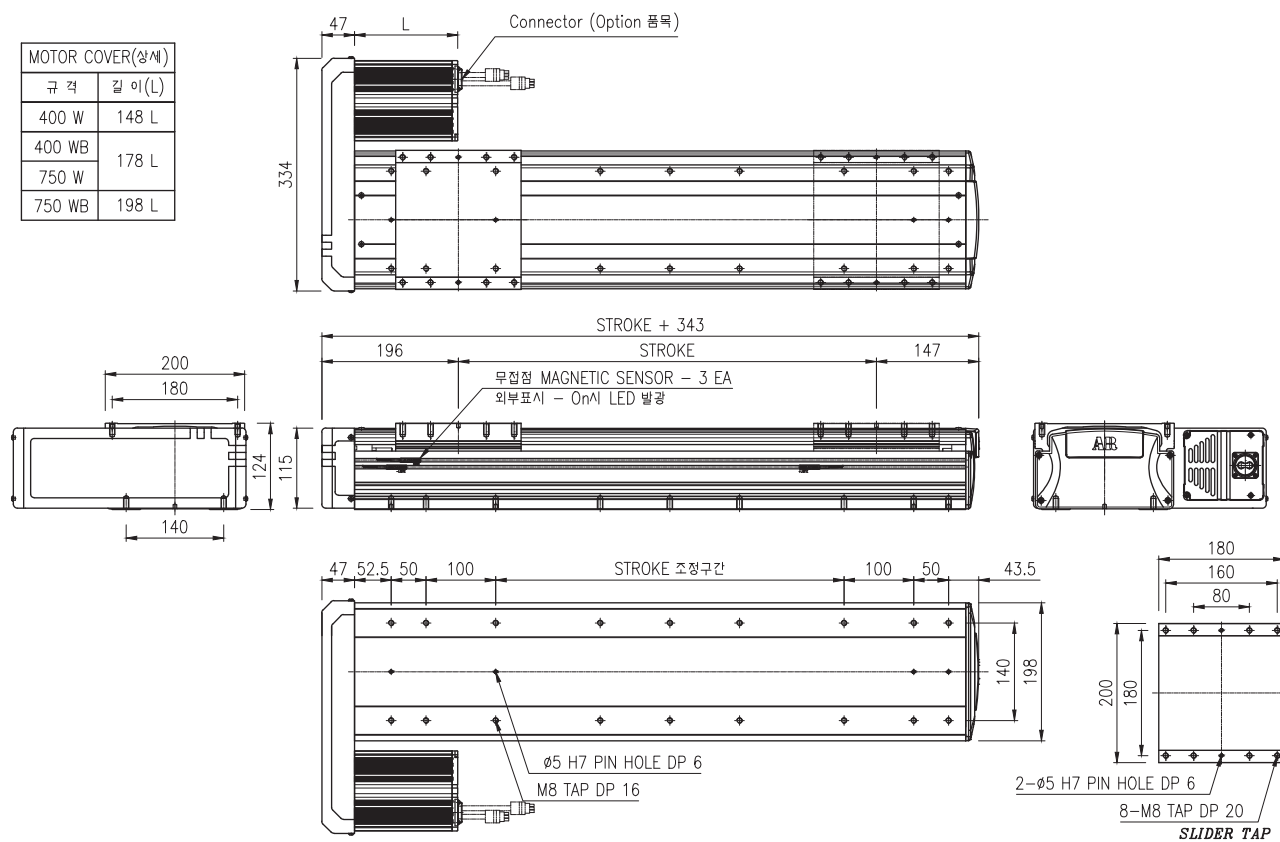


AS-200L

Stroke(mm)	100	200	300	400	500	600	700	800	900	1000	1100	1200	1300	1400	1500	1600
Max. Speed (mm/sec)	Lead 20mm	1000							910	750	620	530	450	390	340	300
	Lead 10mm	500							460	380	320	270	230			
Weight(kg)	23.20	25.77	28.34	30.91	33.49	36.06	38.63	41.20	43.78	46.35	48.92	51.50	54.07	55.64	59.21	61.79
	The weight of the model equipped with a brake is 1.0kg more heavier then this value.															
Base & Slide	Aluminum Profile, 백색전착 유광															

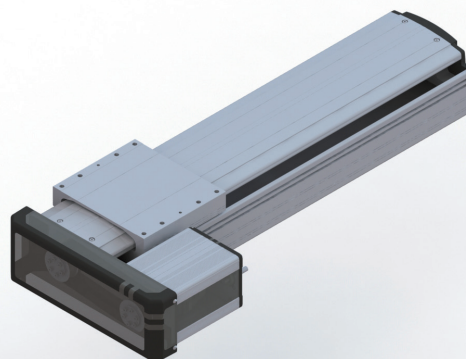
Dimension(mm)

MOTOR COVER(상세)	
규격	길이(L)
400 W	148 L
400 WB	178 L
750 W	178 L
750 WB	198 L



AS-200R Specification

Servo Motor Output/rpm		750w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø20(Ø25) Lead 20mm(10mm)
Liner motion guide		Two way, 25w, 2 block
Repeatability		±0.02mm
Payload(kg) Ta = 0.2s	Lead 20mm	H : 100
		V : 30
	Lead 10mm	H : 120
		V : 55
Moment of inertia of area		Ix = 1.79E+06, Iy = 2.631E +07

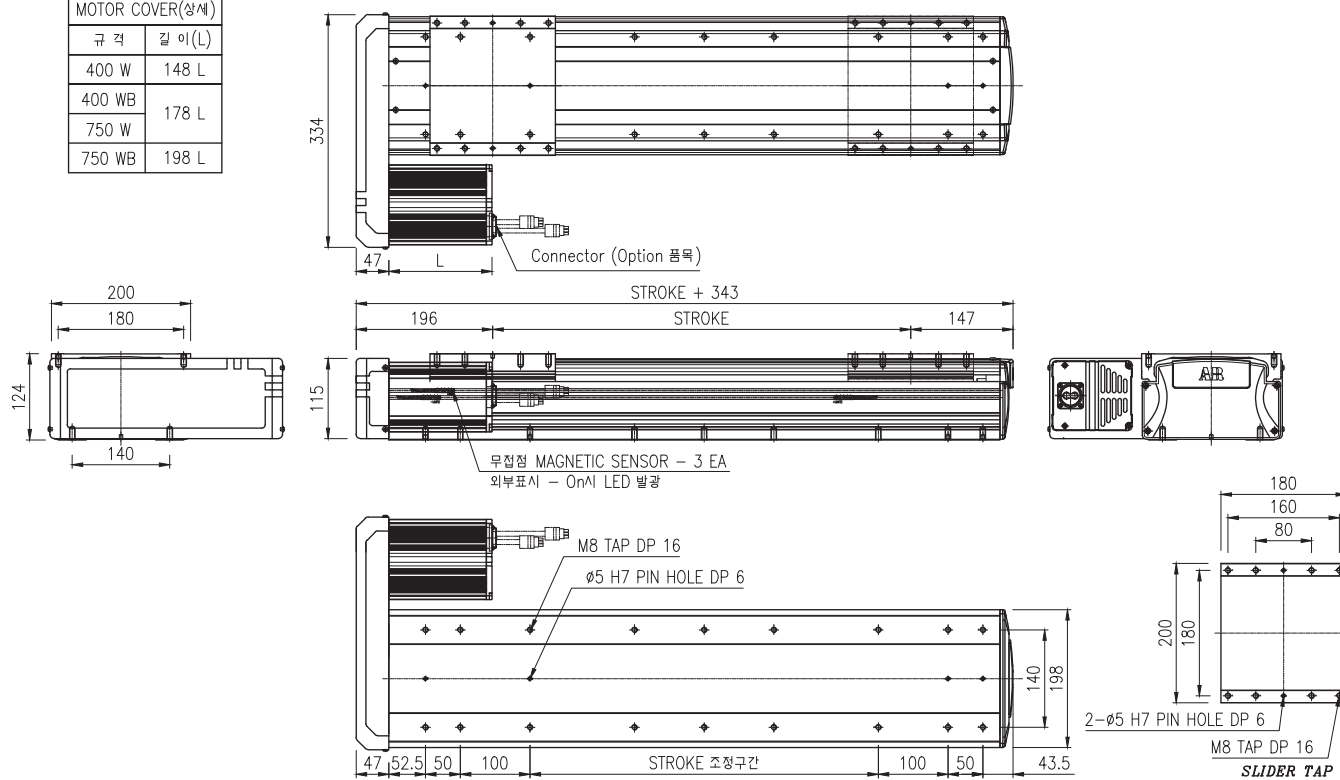


AS-200R

Stroke(mm)		100	200	300	400	500	600	700	800	900	1000	1100	1200	1300	1400	1500	1600
Max. Speed (mm/sec)	Lead 20mm	1000								910	750	620	530	450	390	340	300
	Lead 10mm	500								460	380	320	270	230			
Weight(kg)		23.20	25.77	28.34	30.91	33.49	36.06	38.63	41.20	43.78	46.35	48.92	51.50	54.07	55.64	59.21	61.79
		The weight of the model equipped with a brake is 1.0kg more heavier then this value.															
Base & Slide		Aluminum Profile, 백색전착 유광															

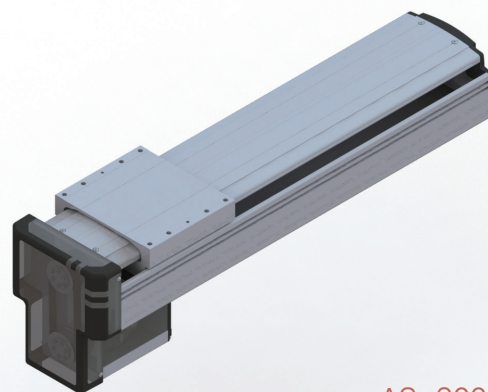
Dimension(mm)

MOTOR COVER(상세)	
규 격	길 이(L)
400 W	148 L
400 WB	178 L
750 W	
750 WB	198 L



AS-200U Specification

Servo Motor Output/rpm		750w/3000rpm	
Drive mechanism		Ball screw(C7, 연삭), Ø20(Ø25) Lead 20mm(10mm)	
Liner motion guide		Two way, 25w, 2 block	
Repeatability		±0.02mm	
Payload(kg) Ta = 0.2s	Lead 20mm	H : 100	
		V : 30	
	Lead 10mm	H : 120	
		V : 55	
Moment of inertia of area		Ix = 1.79E+06, Iy = 2.631E +07	

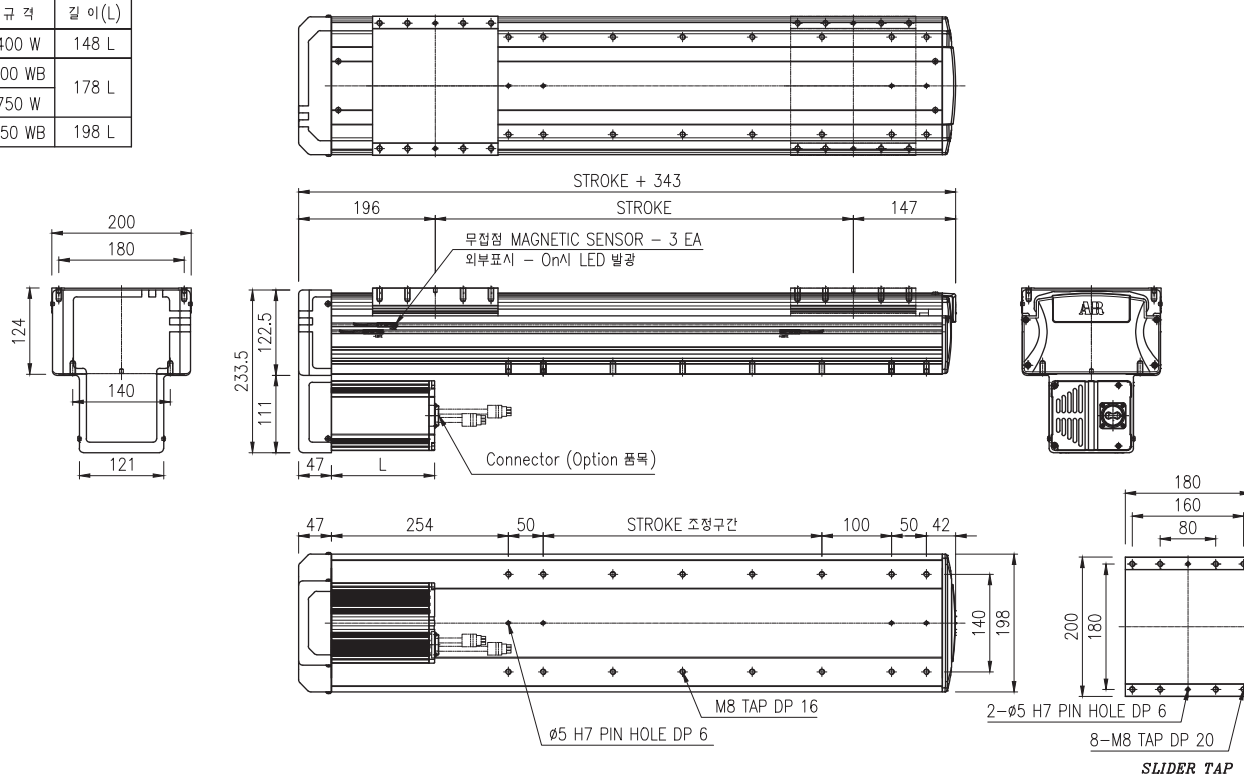


AS-200U

Stroke(mm)	100	200	300	400	500	600	700	800	900	1000	1100	1200	1300	1400	1500	1600
Max. Speed (mm/sec)	Lead 20mm	1000							910	750	620	530	450	390	340	300
	Lead 10mm	500							460	380	320	270	230			
Weight(kg)	22.06	25.63	28.21	30.78	33.35	35.92	38.50	41.07	43.64	46.21	48.79	1.36	53.93	56.51	59.08	61.65
The weight of the model equipped with a brake is 1.0kg more heavier then this value.																
Base & Slide	Aluminum Profile, 백색전착 유광															

Dimension(mm)

MOTOR COVER(상세)	
규격	길이(L)
400 W	148 L
400 WB	178 L
750 W	178 L
750 WB	198 L



CONTENTS

INTRO

AS-SERIES

ACS-SERIES

AB-SERIES

AL-SERIES

AC-COMBINATION

ACS-SERIES



ACS-045S/L/R/U



ACS-065S/L/R/U



ACS-070S/L/R/U



ACS-090S-10/20/L/R/U



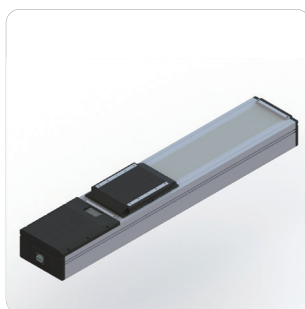
Artro Robot
Development & Motion Control



ACS-120S/L/R/U



ACS-160S/L/R/U



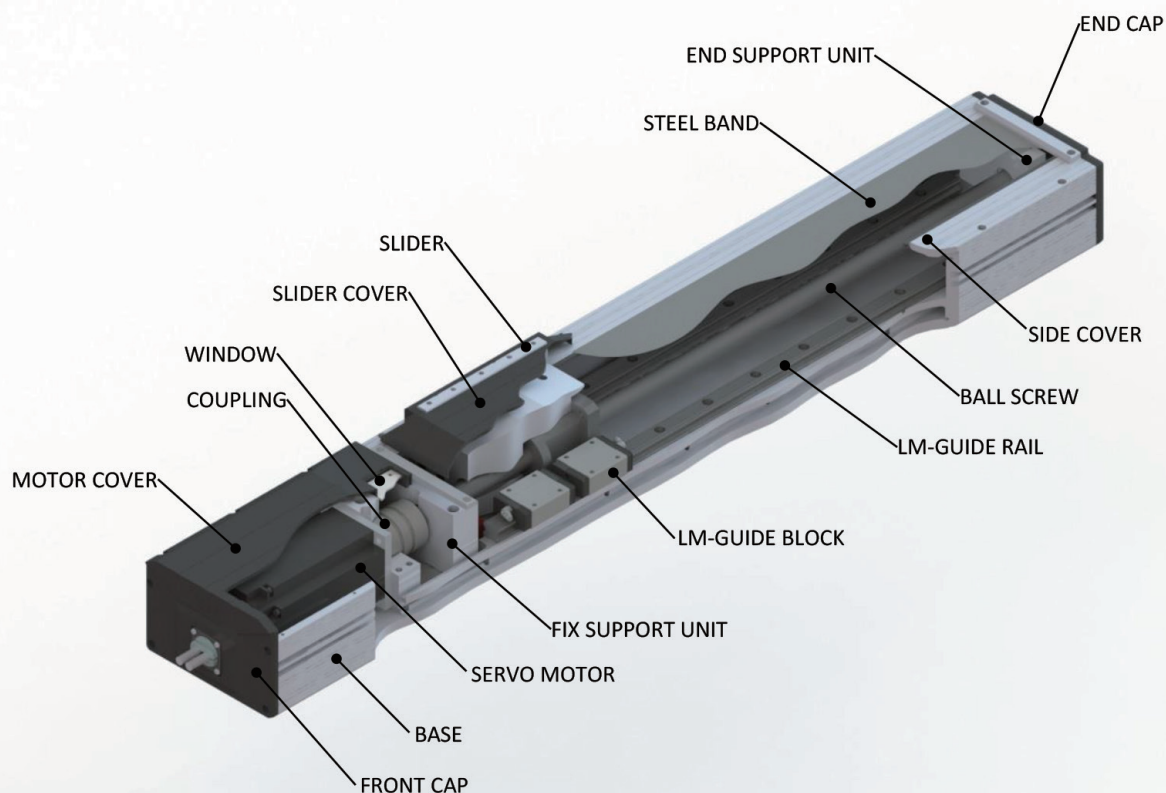
ACS-200S/L/R/U



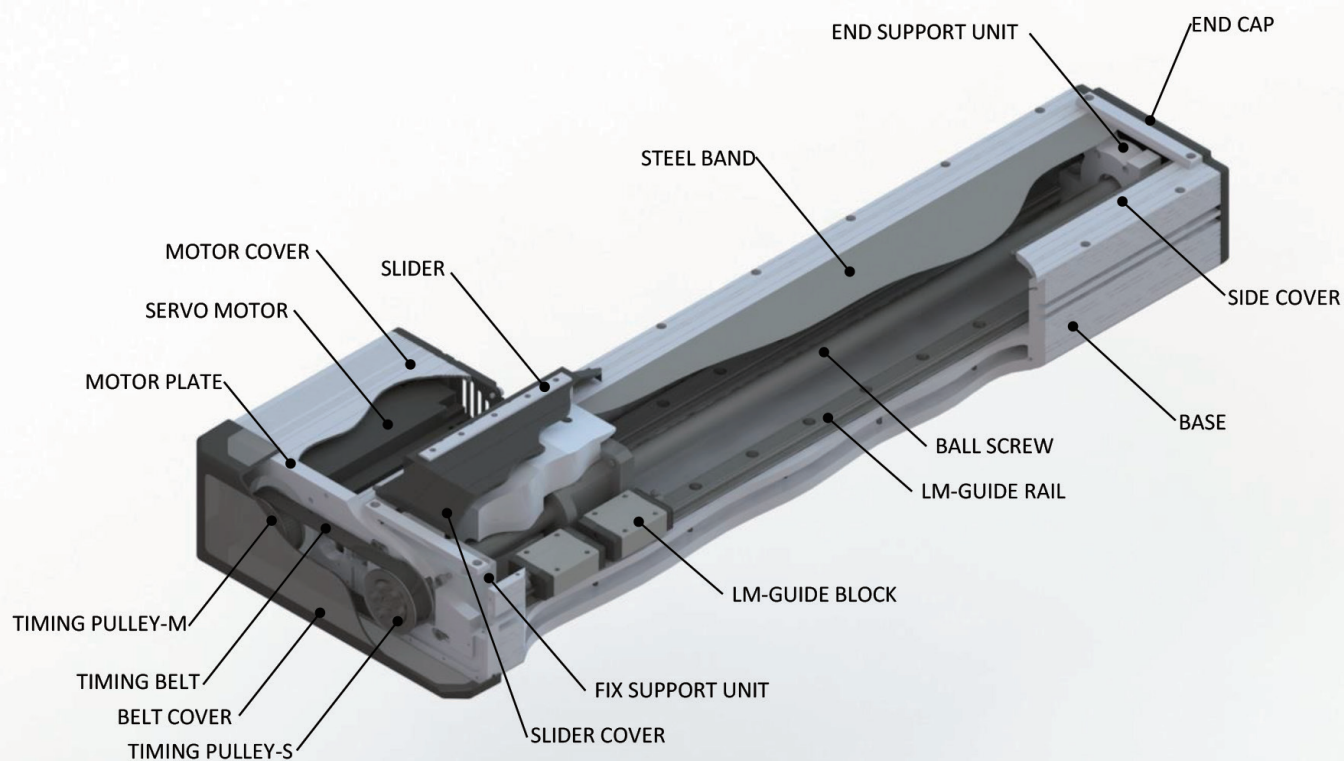
ACS-270N

ACS-SERIES

ACS-S TYPE Structure



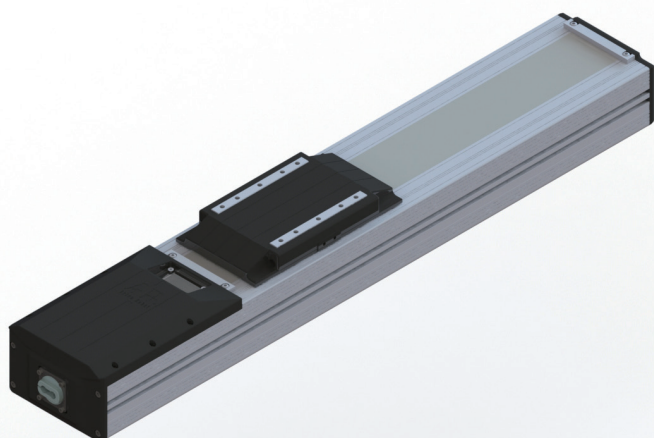
ACS-P TYPE Structure



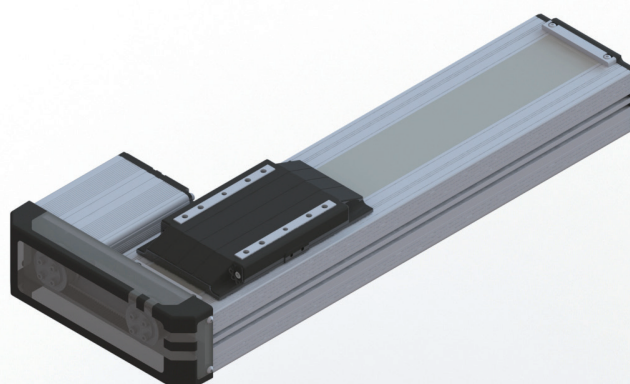
ACS-Series Model Info.

ACS	045S*	0300	10(B)**	H(-B)***
ACS-Series	045 : 45 body 065 : 65 body 070 : 70 body 090 : 90 body 120 : 120 body 160 : 160 body 200 : 200 body 270 : 270 body *Motor joint info. S : Straight joint L : Left Parallel joint R : Right Parallel joint U : Under Parallel joint	Stroke	Motor Output 10 : 100W 20 : 200W 40 : 400W 70 : 750W **Motor brake option. 10() : Without brake 10(B) : With brake	Ball screw Lead H : 20mm N : 10mm L : 5mm ***Body Color B : Black Ano.

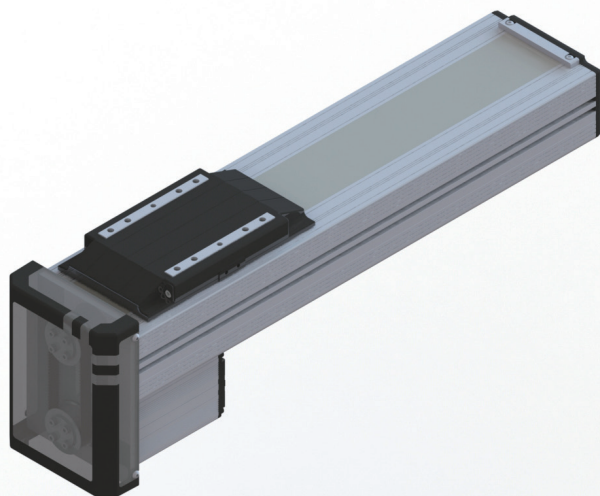
Straight joint



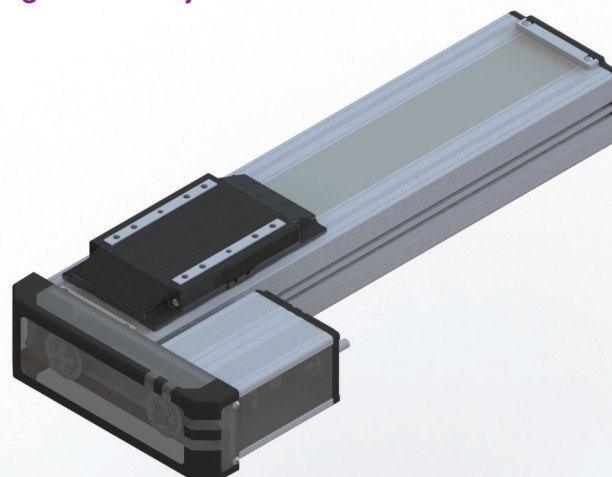
Left Parallel joint



Under Parallel joint

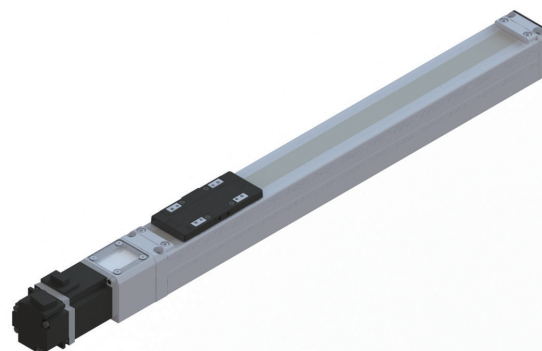


Right Parallel joint



ACS-045S Specification

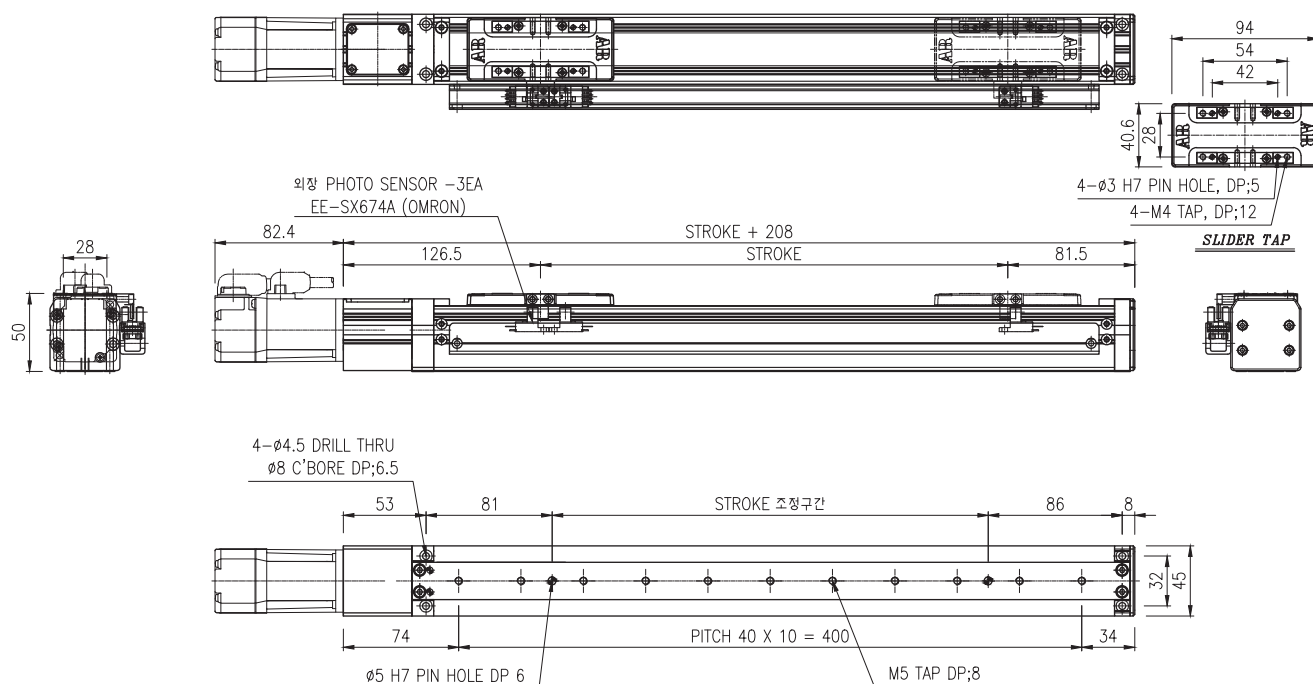
Servo Motor Output/rpm		100w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø12 Lead 20mm(10mm)
Liner motion guide		One way, No.24, 1 block
Repeatability		±0.02mm
Payload(kg) Ta = 0,2s	Lead 20mm	H : 2
		V : 1.5
	Lead 10mm	H : 12
		V : 3.5
Moment of inertia of area		Ix=1.88E+04, Iy=1.4E+05



ACS-045S

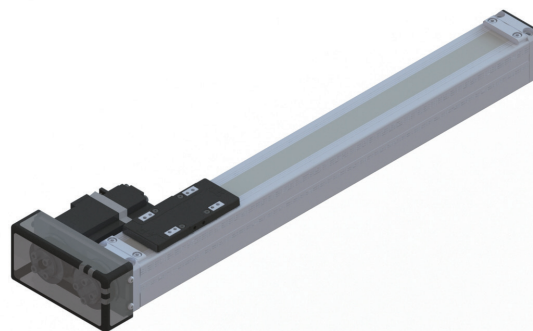
Stroke(mm)		100	200	300	400	500	600	700	800
Max. Speed (mm/sec)	Lead 20mm	1000						850	650
	Lead 10mm	500						420	320
Weight(kg)		2.74	3.08	3.41	3.75	4.08	4.42	4.75	5.09
		The weight of the model equipped with a brake is 0.2kg more heavier then this value.							
Base & Slide		Aluminum Profile, 백색전착 유광							

Dimension(mm)



ACS-045L Specification

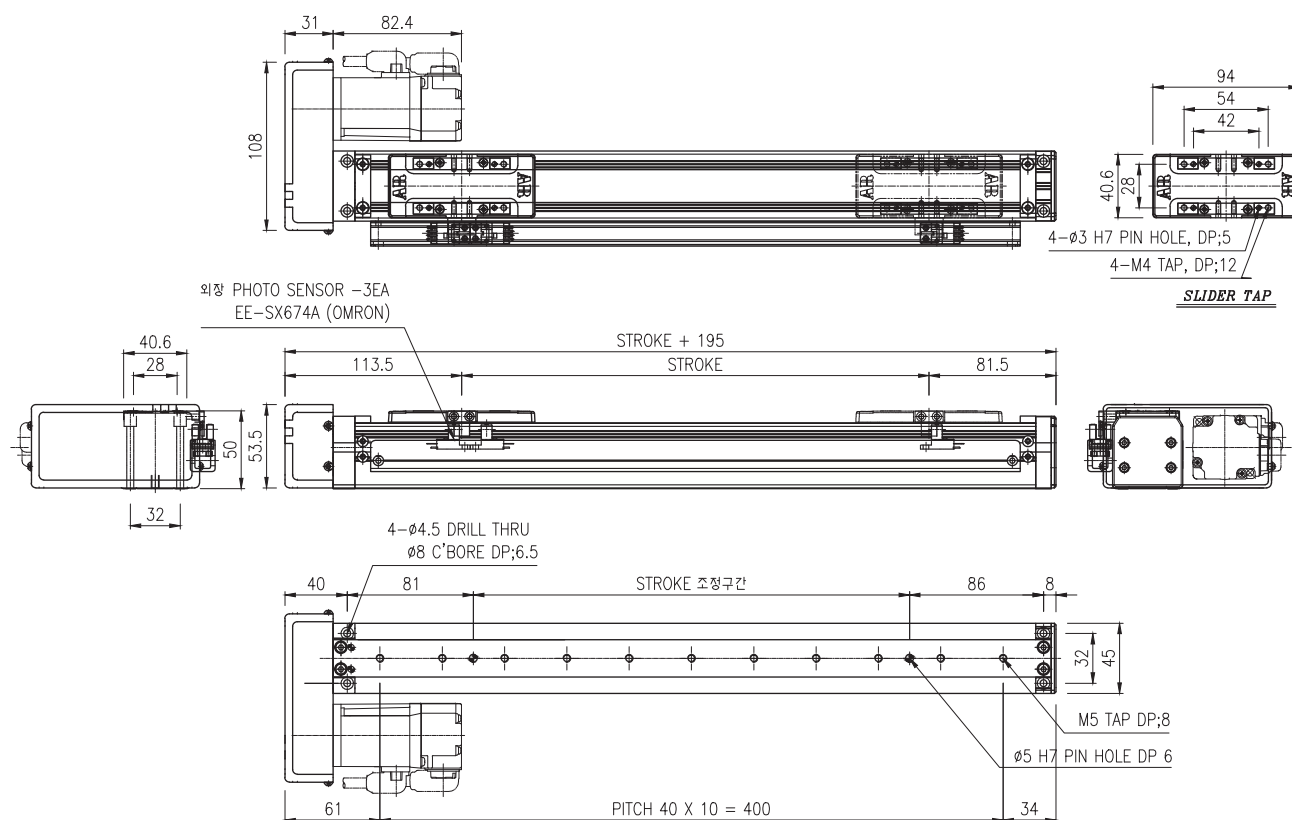
Servo Motor Output/rpm		100w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø12 Lead 20mm(10mm)
Liner motion guide		One way, No.24, 1 block
Repeatability		±0.02mm
Payload(kg) Ta = 0.2s	Lead 20mm	H : 2
		V : 1.5
	Lead 10mm	H : 12
		V : 3.5
Moment of inertia of area		Ix=1.88E+04, Iy=1.4E+05



ACS-045L

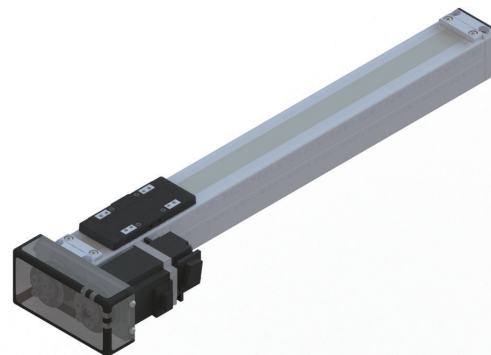
Stroke(mm)		100	200	300	400	500	600	700	800
Max. Speed (mm/sec)	Lead 20mm	1000						850	650
	Lead 10mm	500						420	320
Weight(kg)		2.95	3.29	3.63	3.97	4.31	4.65	4.99	5.33
		The weight of the model equipped with a brake is 0.2kg more heavier then this value.							
Base & Slide		Aluminum Profile, 백색전착 유광							

Dimension(mm)



ACS-045R Specification

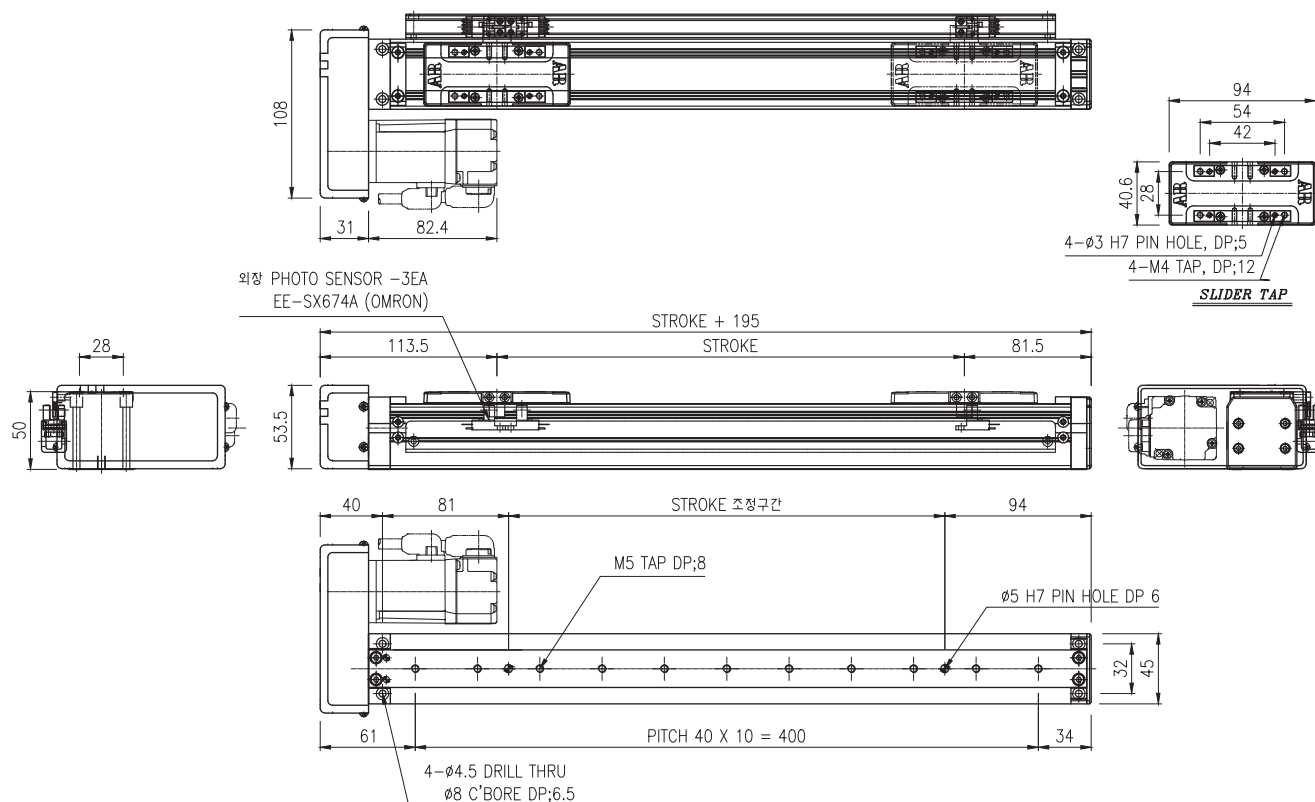
Servo Motor Output/rpm		100w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø12 Lead 20mm(10mm)
Liner motion guide		One way, No.24, 1 block
Repeatability		±0.02mm
Payload(kg) Ta = 0,2s	Lead 20mm	H : 2
		V : 1.5
	Lead 10mm	H : 12
		V : 3.5
Moment of inertia of area		Ix=1.88E+04, Iy=1.4E+05



ACS-045R

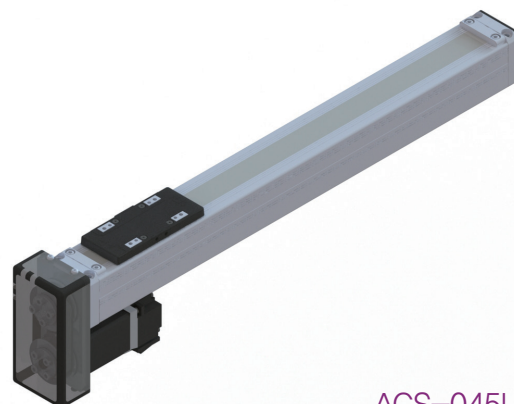
Stroke(mm)		100	200	300	400	500	600	700	800
Max. Speed (mm/sec)	Lead 20mm	1000						850	650
	Lead 10mm	500						420	320
Weight(kg)		2.95	3.29	3.63	3.97	4.31	4.65	4.99	5.33
		The weight of the model equipped with a brake is 0.2kg more heavier then this value.							
Base & Slide		Aluminum Profile, 백색전착 유광							

Dimension(mm)



ACS-045U Specification

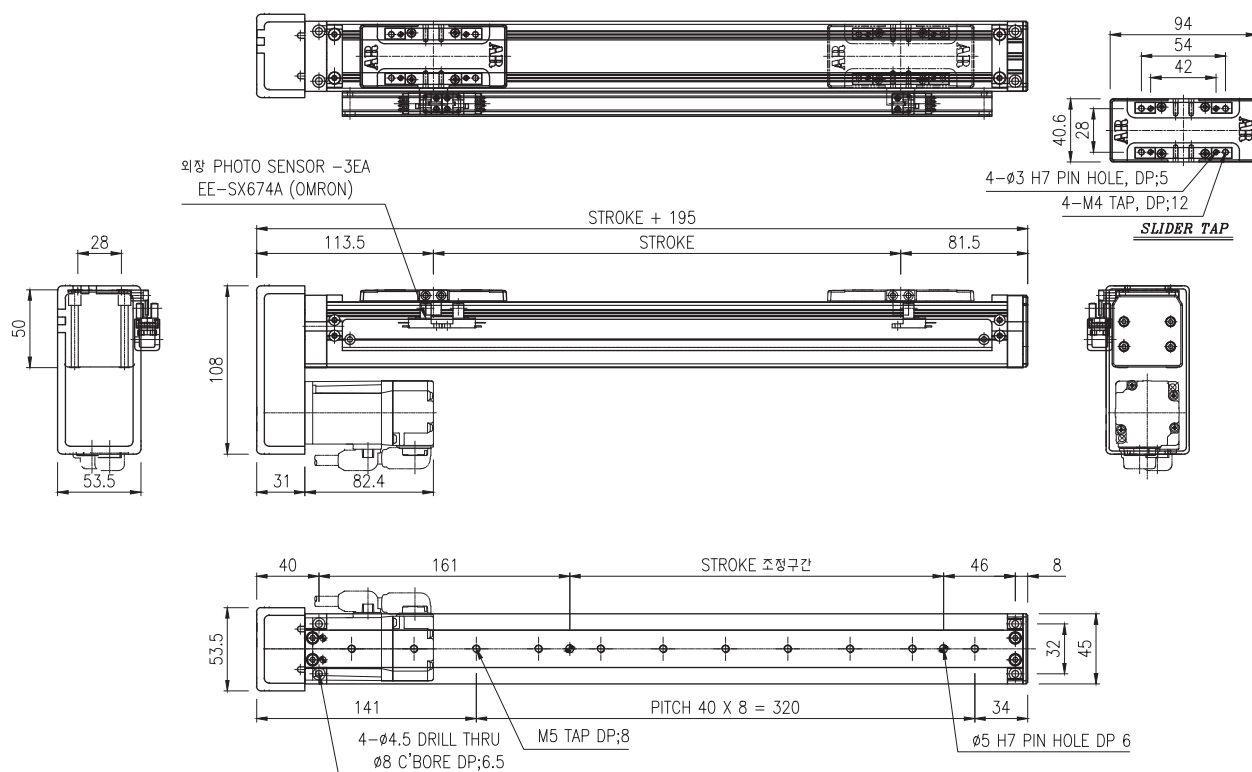
Servo Motor Output/rpm		100w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø12 Lead 20mm(10mm)
Liner motion guide		One way, No.24, 1 block
Repeatability		±0.02mm
Payload(kg) Ta = 0.2s	Lead 20mm	H : 2
		V : 1.5
	Lead 10mm	H : 12
		V : 3.5
Moment of inertia of area		Ix=1.88E+04, Iy=1.4E+05



ACS-045U

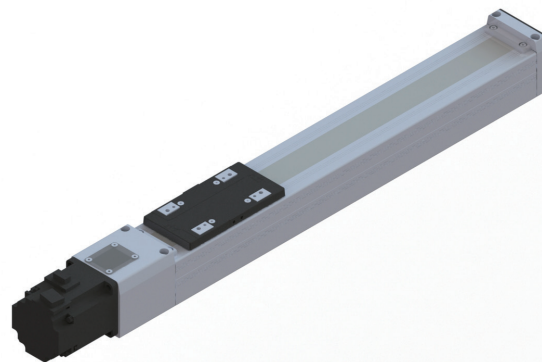
Stroke(mm)		100	200	300	400	500	600	700	800
Max. Speed (mm/sec)	Lead 20mm	1000						850	650
	Lead 10mm	500						420	320
Weight(kg)		2.95	3.29	3.63	3.97	4.31	4.65	4.99	5.33
		The weight of the model equipped with a brake is 0.2kg more heavier then this value.							
Base & Slide		Aluminum Profile, 백색전착 유광							

Dimension(mm)



ACS-065S Specification

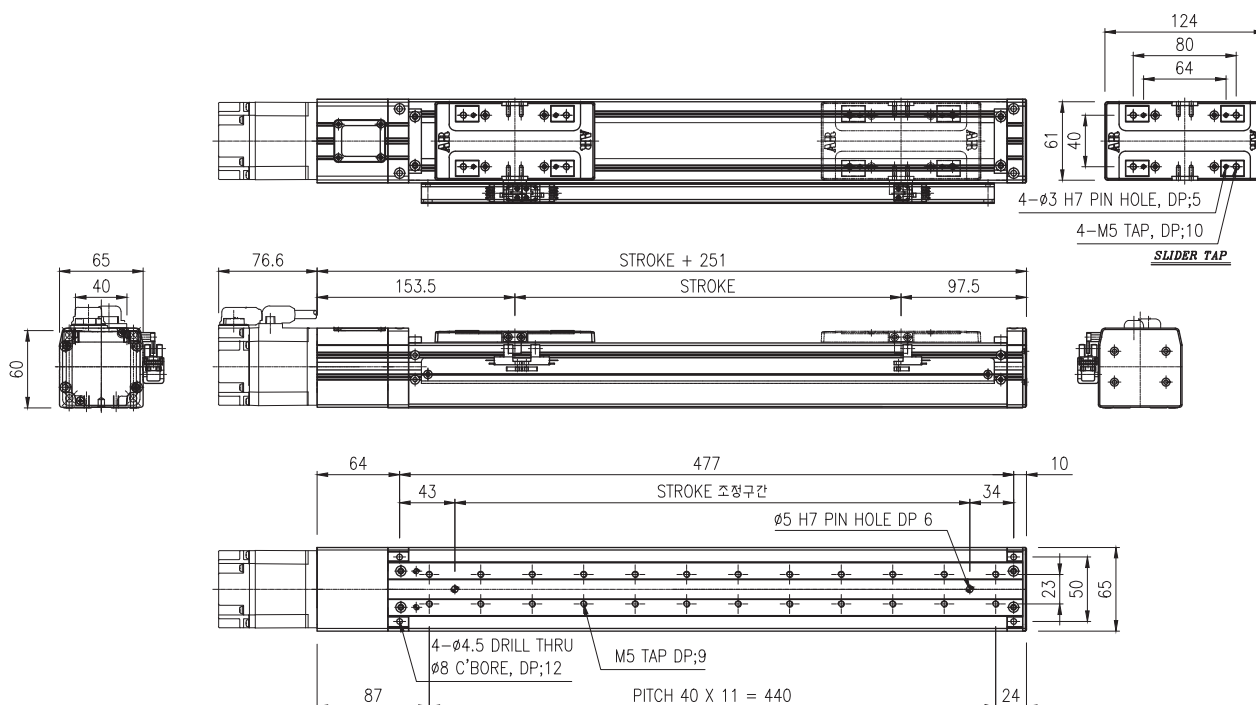
Servo Motor Output/rpm		100w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø12 Lead 20mm(10mm)
Liner motion guide		One way, No.42, 2 block
Repeatability		±0.02mm
Payload(kg) Ta = 0,2s	Lead 20mm	H : 4
		V : 3
	Lead 10mm	H : 24
		V : 7
Moment of inertia of area		Ix=4.4E+04, Iy=8.53E+05



ACS-065S

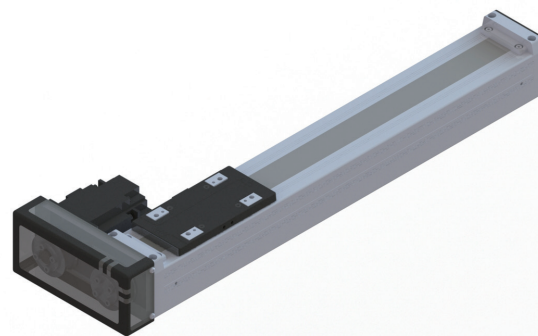
Stroke(mm)		100	200	300	400	500	600	700
Max. Speed (mm/sec)	Lead 20mm	1000						850
	Lead 10mm	500						420
Weight(kg)		4.44	4.94	5.44	5.94	6.44	6.94	7.44
		The weight of the model equipped with a brake is 0.2kg more heavier then this value.						
Base & Slide		Aluminum Profile, 백색전착 유광						

Dimension(mm)



ACS-065L Specification

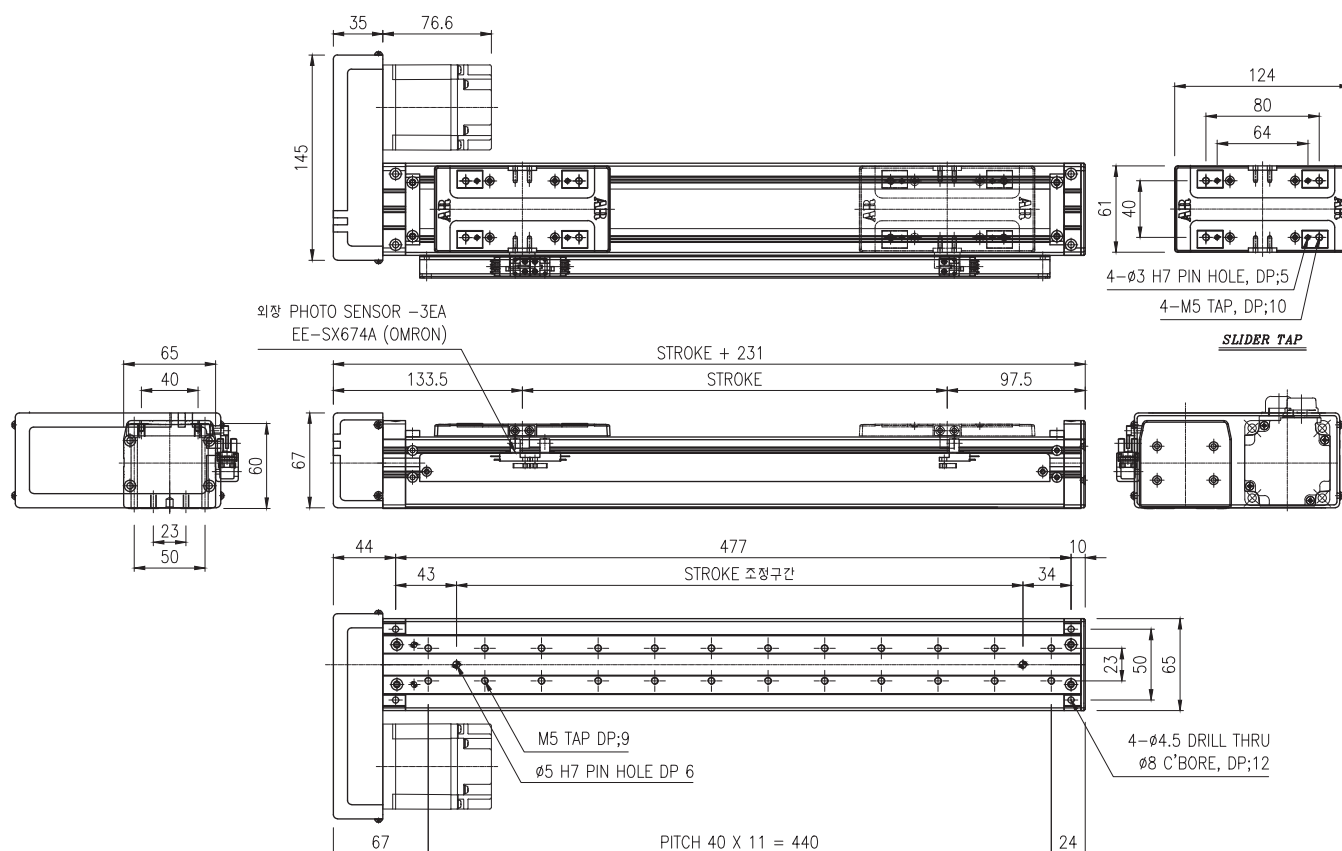
Servo Motor Output/rpm		100w/3000rpm	
Drive mechanism		Ball screw(C7, 연삭), Ø12 Lead 20mm(10mm)	
Liner motion guide		One way, No.42, 2 block	
Repeatability		±0.02mm	
Payload(kg) Ta = 0.2s	Lead 20mm	H : 4	
		V : 3	
	Lead 10mm	H : 24	
		V : 7	
Moment of inertia of area		Ix=4.4E+04, Iy=8.53E+05	



ACS-065L

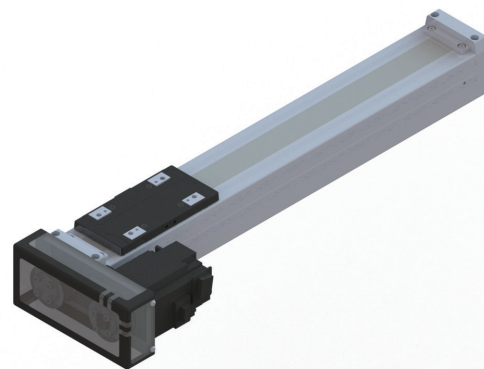
Stroke(mm)		100	200	300	400	500	600	700
Max. Speed (mm/sec)	Lead 20mm	1000						850
	Lead 10mm	500						420
Weight(kg)		5.02	5.52	6.02	6.52	7.02	7.52	8.02
		The weight of the model equipped with a brake is 0.2kg more heavier then this value.						
Base & Slide		Aluminum Profile, 백색전착 유광						

Dimension(mm)



ACS-065R Specification

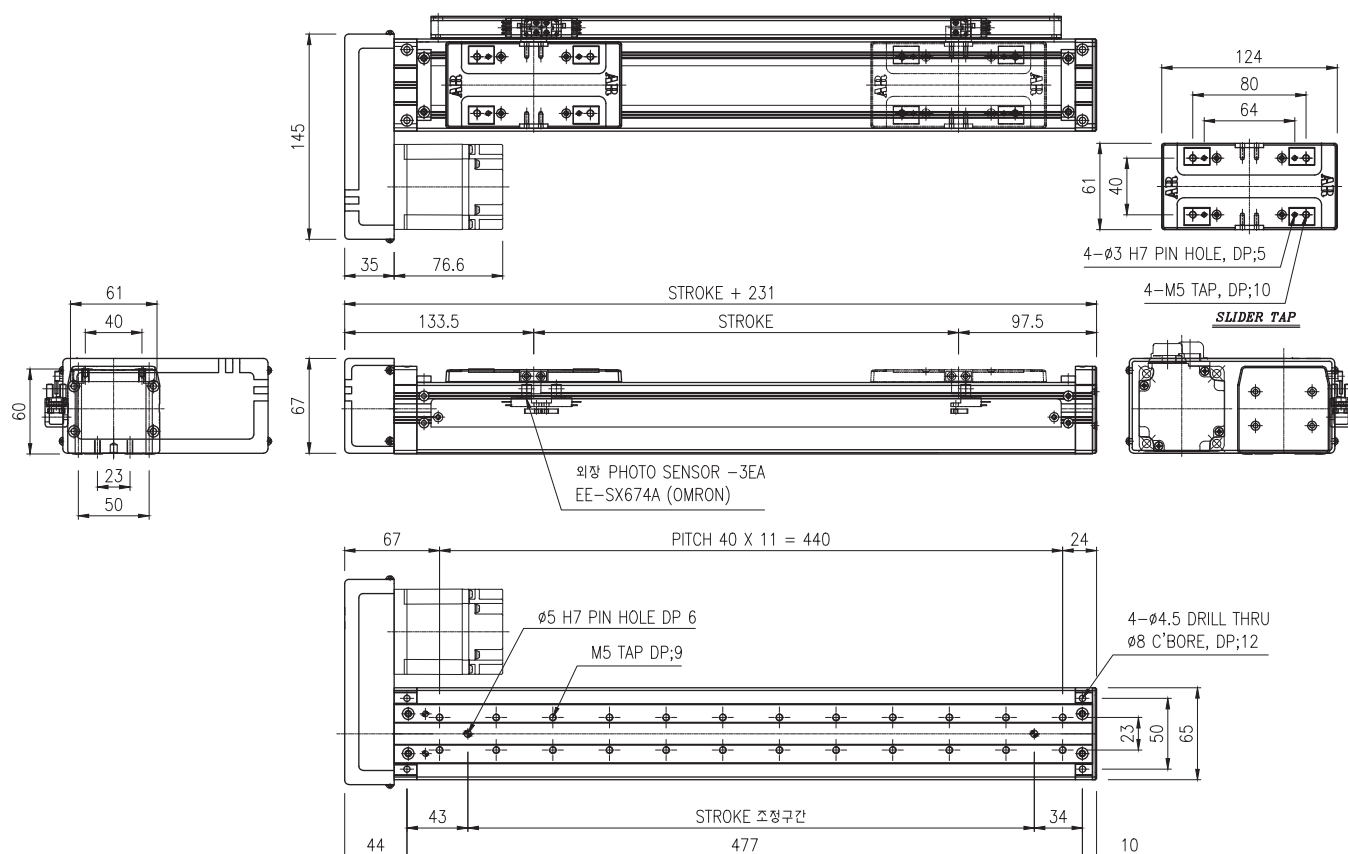
Servo Motor Output/rpm		100w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø12 Lead 20mm(10mm)
Liner motion guide		One way, No.42, 2 block
Repeatability		±0.02mm
Payload(kg) Ta = 0,2s	Lead 20mm	H : 4
		V : 3
	Lead 10mm	H : 24
		V : 7
Moment of inertia of area		Ix=4.4E+04, Iy=8.53E+05



ACS-065R

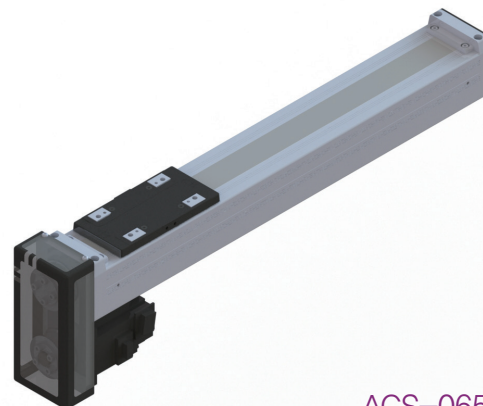
Stroke(mm)		100	200	300	400	500	600	700
Max. Speed (mm/sec)	Lead 20mm	1000						850
	Lead 10mm	500						420
Weight(kg)		5.02	5.52	6.02	6.52	7.02	7.52	8.02
		The weight of the model equipped with a brake is 0.2kg more heavier then this value.						
Base & Slide		Aluminum Profile, 백색전착 유광						

Dimension(mm)



ACS-065U Specification

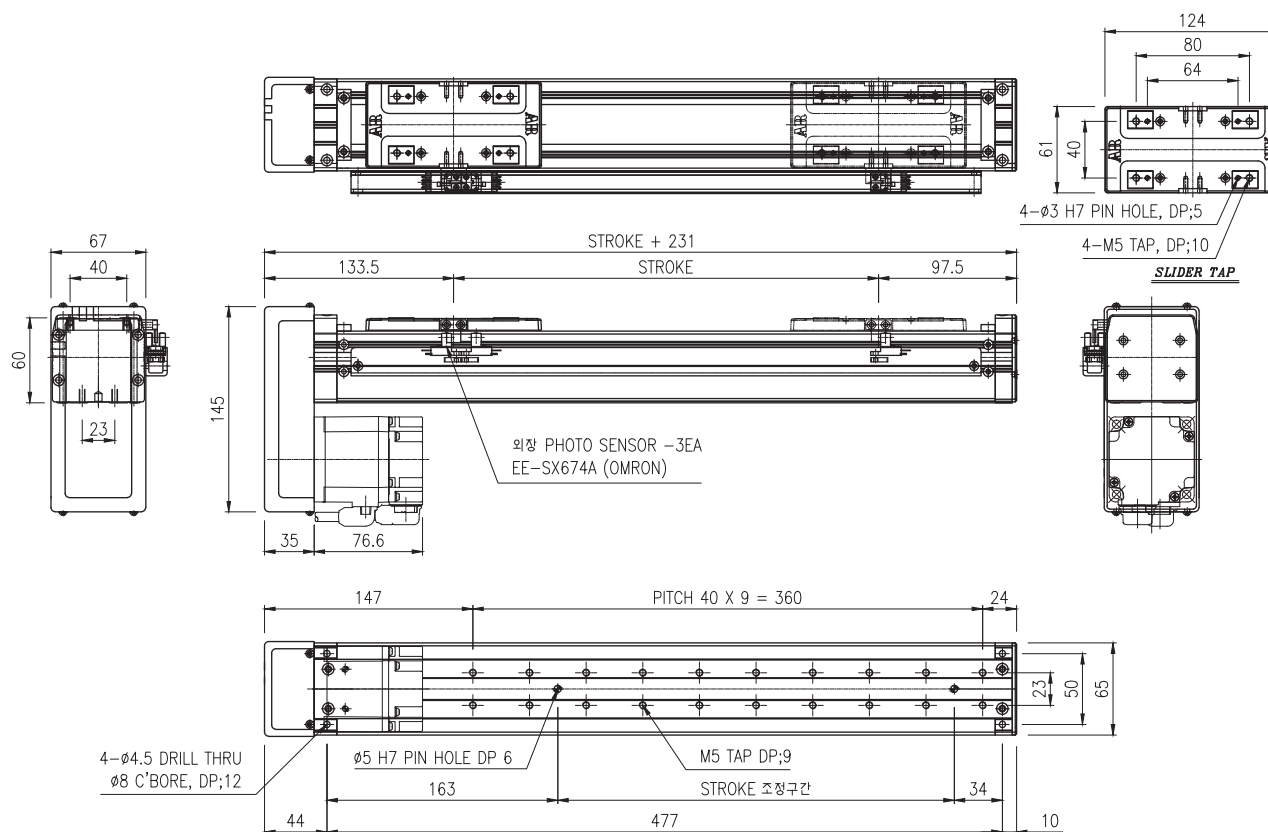
Servo Motor Output/rpm		100w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø12 Lead 20mm(10mm)
Liner motion guide		One way, No.42, 2 block
Repeatability		±0.02mm
Payload(kg) Ta = 0.2s	Lead 20mm	H : 4
		V : 3
	Lead 10mm	H : 24
		V : 7
Moment of inertia of area		Ix=4.4E+04, Iy=8.53E+05



ACS-065U

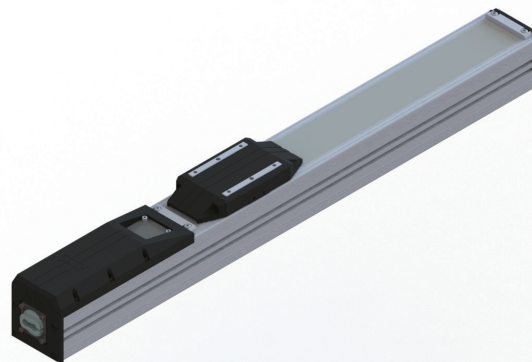
Stroke(mm)		100	200	300	400	500	600	700
Max. Speed (mm/sec)	Lead 20mm	1000						850
	Lead 10mm	500						420
Weight(kg)		5.02	5.52	6.02	6.52	7.02	7.52	8.02
		The weight of the model equipped with a brake is 0.2kg more heavier then this value.						
Base & Slide		Aluminum Profile, 백색전착 유광						

Dimension(mm)



ACS-070S Specification

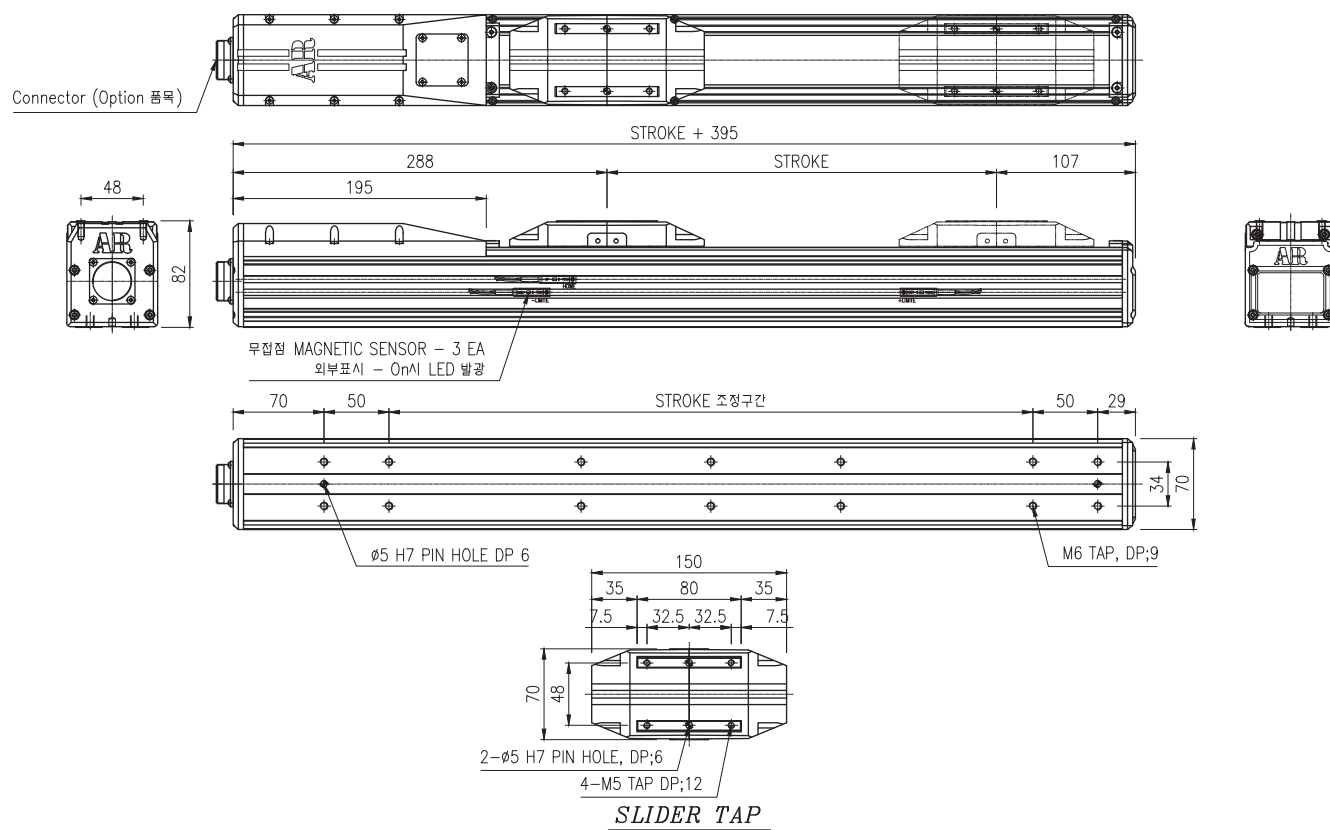
Servo Motor Output/rpm		100w/3000rpm	
Drive mechanism		Ball screw(C7, 연삭), Ø15 Lead 20mm(10mm)	
Liner motion guide		One way, No.24, 2 block	
Repeatability		±0.02mm	
Payload(kg) Ta = 0,2s	Lead 20mm	H : 3	
		V : 2	
	Lead 10mm	H : 20	
		V : 5	
Moment of inertia of area		Ix=2,97E+05, Iy=7,26E+05	



ACS-070S

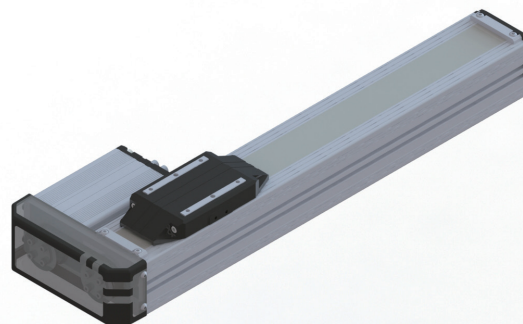
Stroke(mm)		100	200	300	400	500	600	700	800
Max. Speed (mm/sec)	Lead 20mm	1000							800
	Lead 10mm	500							400
Weight(kg)		5.16	5.78	6.41	7.03	7.66	8.28	8.90	9.53
		The weight of the model equipped with a brake is 0.2kg more heavier then this value.							
Base & Slide		Aluminum Profile, 백색전착 유광							

Dimension(mm)



ACS-070L Specification

Servo Motor Output/rpm		100w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø15 Lead 20mm(10mm)
Liner motion guide		One way, No.24, 2 block
Repeatability		±0.02mm
Payload(kg) Ta = 0.2s	Lead 20mm	H : 3
		V : 2
	Lead 10mm	H : 20
		V : 5
Moment of inertia of area		Ix=2.97E+05, Iy=7.26E+05

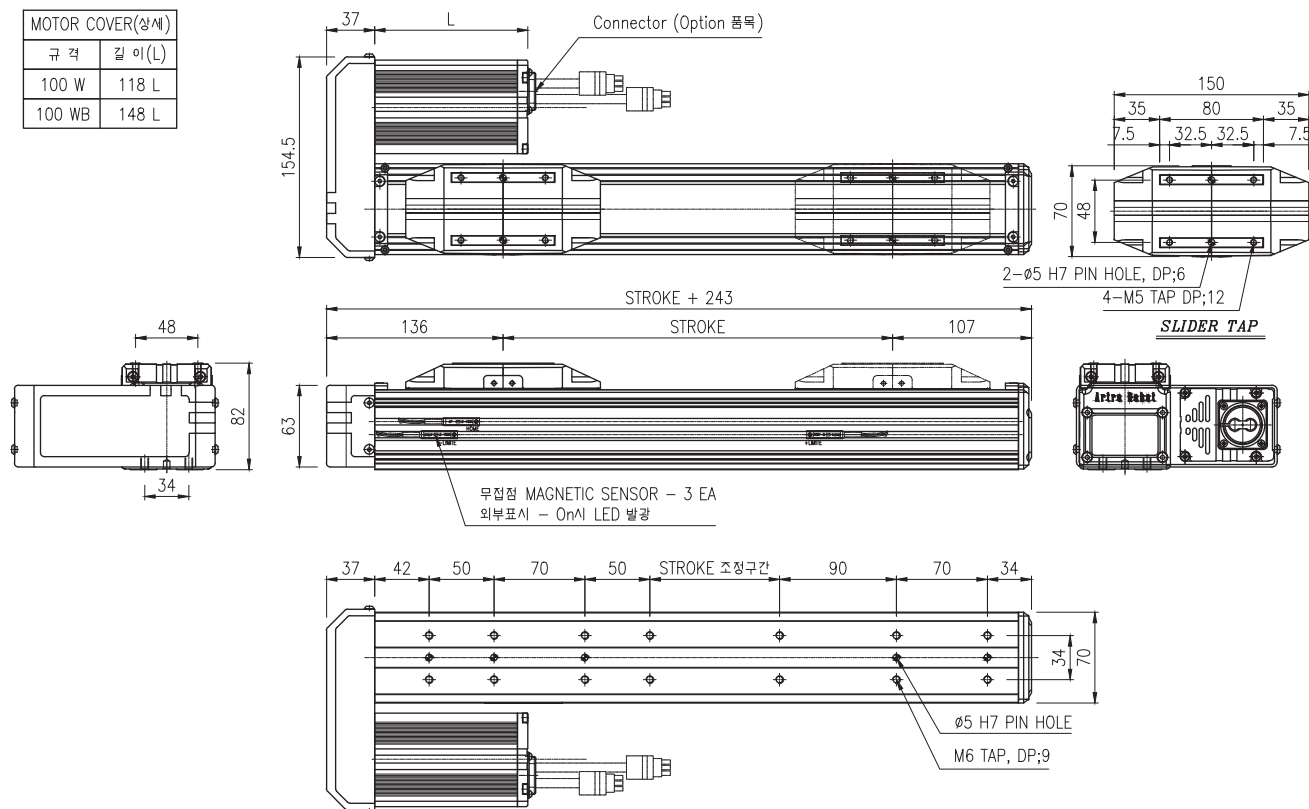


ACS-070L

Stroke(mm)		100	200	300	400	500	600	700	800
Max. Speed (mm/sec)	Lead 20mm	1000							800
	Lead 10mm	500							400
Weight(kg)		5.67	6.3	6.93	7.56	8.9	8.82	9.45	10.08
		The weight of the model equipped with a brake is 0.2kg more heavier then this value.							
Base & Slide		Aluminum Profile, 백색전착 유광							

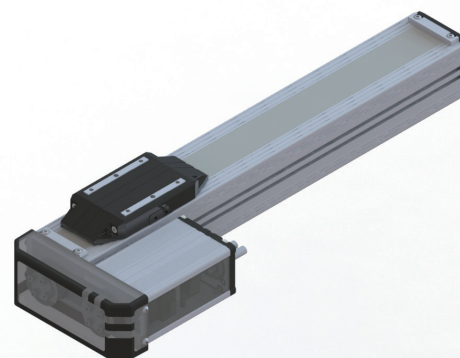
Dimension(mm)

MOTOR COVER(상세)	
규격	길이(L)
100 W	118 L
100 WB	148 L



ACS-070R Specification

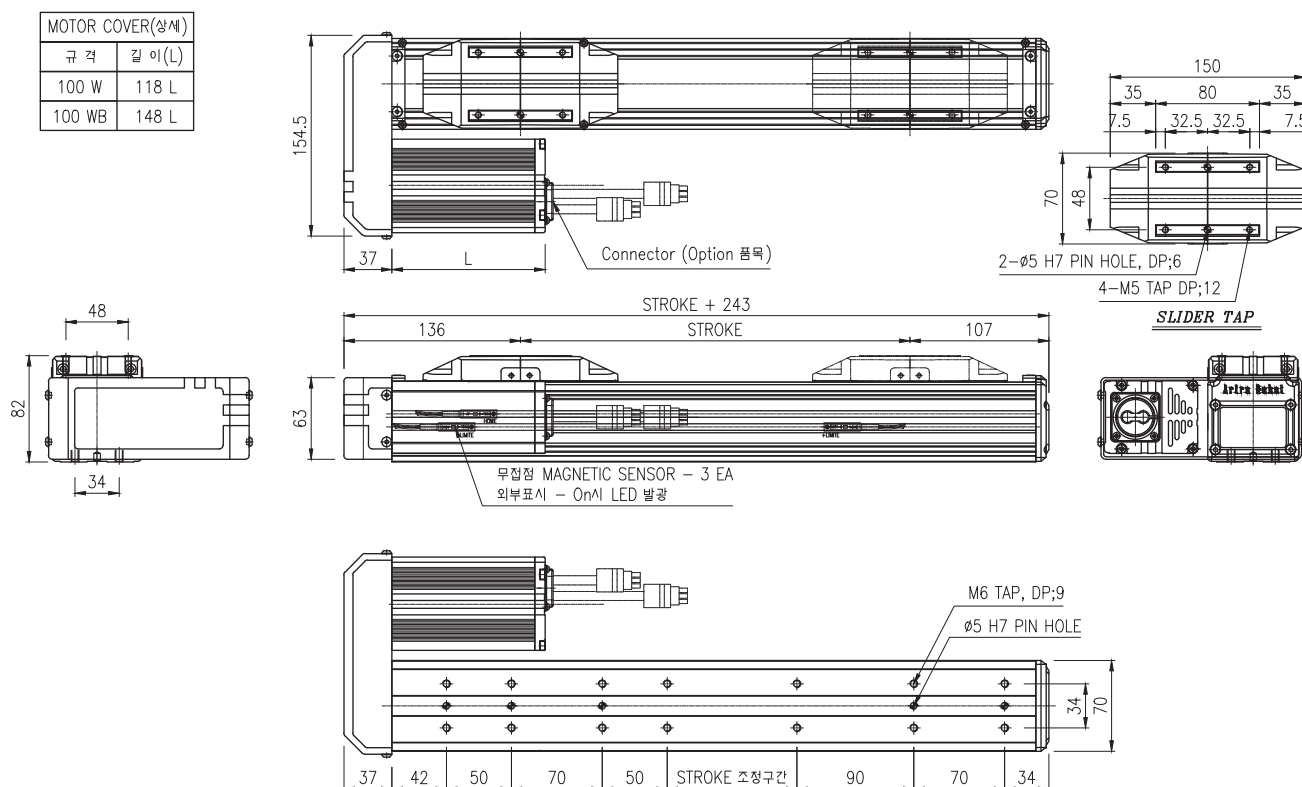
Servo Motor Output/rpm		100w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø15 Lead 20mm(10mm)
Liner motion guide		One way, No.24, 2 block
Repeatability		±0.02mm
Payload(kg) Ta = 0,2s	Lead 20mm	H : 3
		V : 2
	Lead 10mm	H : 20
		V : 5
Moment of inertia of area		Ix=2,97E+05, Iy=7,26E+05



ACS-070R

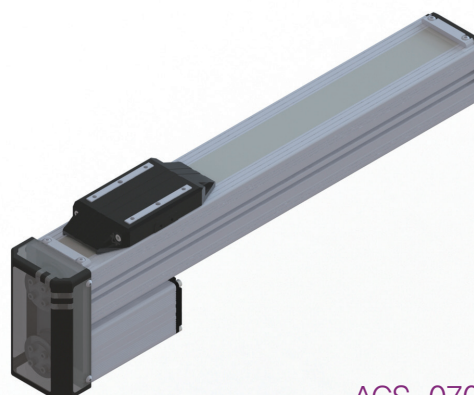
Stroke(mm)		100	200	300	400	500	600	700	800
Max. Speed (mm/sec)	Lead 20mm	1000							800
	Lead 10mm	500							400
Weight(kg)		5.67	6.3	6.93	7.56	8.19	8.82	9.45	10.08
		The weight of the model equipped with a brake is 0.2kg more heavier then this value.							
Base & Slide		Aluminum Profile, 백색전착 유광							

Dimension(mm)



ACS-070U Specification

Servo Motor Output/rpm		100w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø15 Lead 20mm(10mm)
Liner motion guide		One way, No.24, 2 block
Repeatability		±0.02mm
Payload(kg) Ta = 0.2s	Lead 20mm	H : 3
		V : 2
	Lead 10mm	H : 20
		V : 5
Moment of inertia of area		Ix=2.97E+05, Iy=7.26E+05

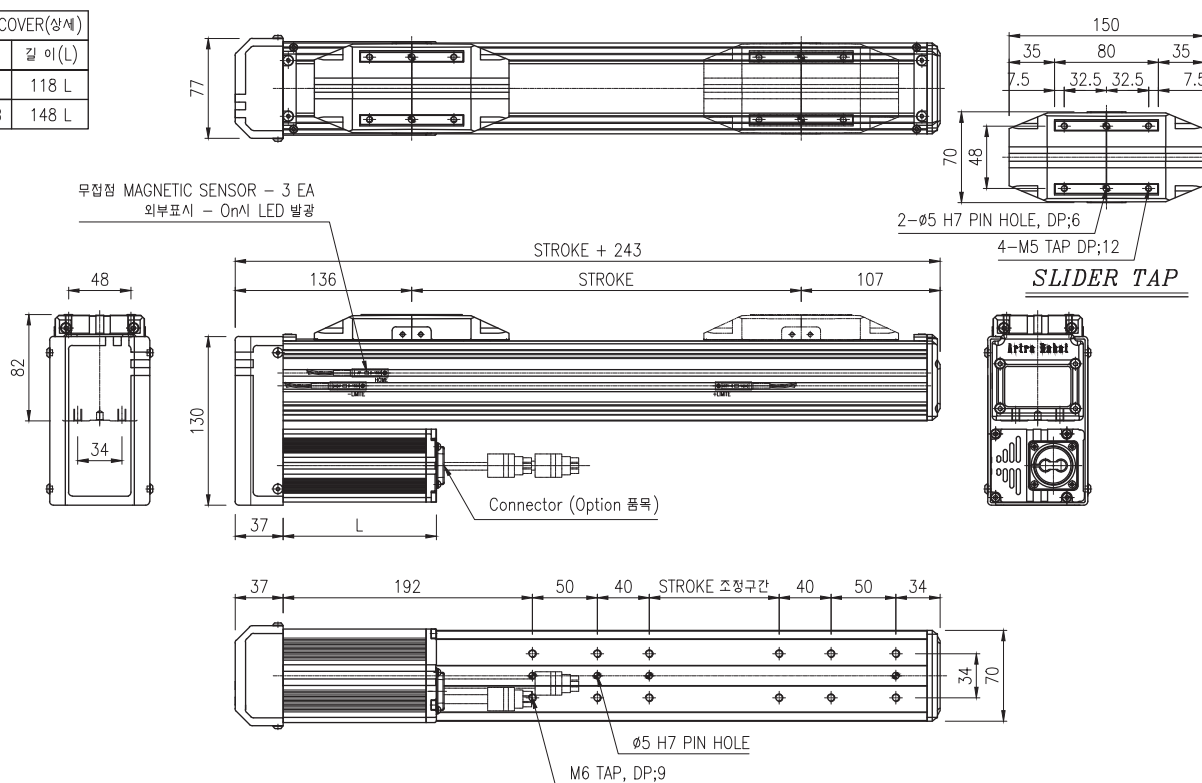


ACS-070U

Stroke(mm)		100	200	300	400	500	600	700	800
Max. Speed (mm/sec)	Lead 20mm	1000							800
	Lead 10mm	500							400
Weight(kg)		5.67	6.3	6.93	7.56	8.9	8.82	9.45	10.08
		The weight of the model equipped with a brake is 0.2kg more heavier then this value.							
Base & Slide		Aluminum Profile, 백색전착 유광							

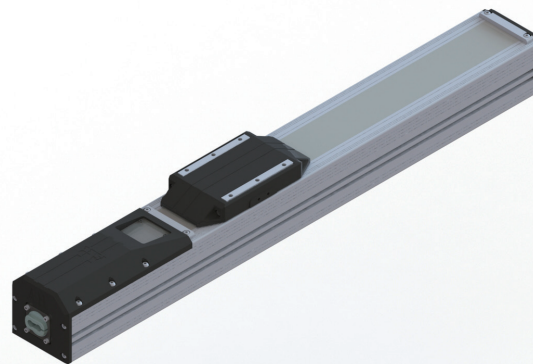
Dimension(mm)

MOTOR COVER(상세)	
규 격	길 이(L)
100 W	118 L
100 WB	148 L



ACS-090S-10 Specification

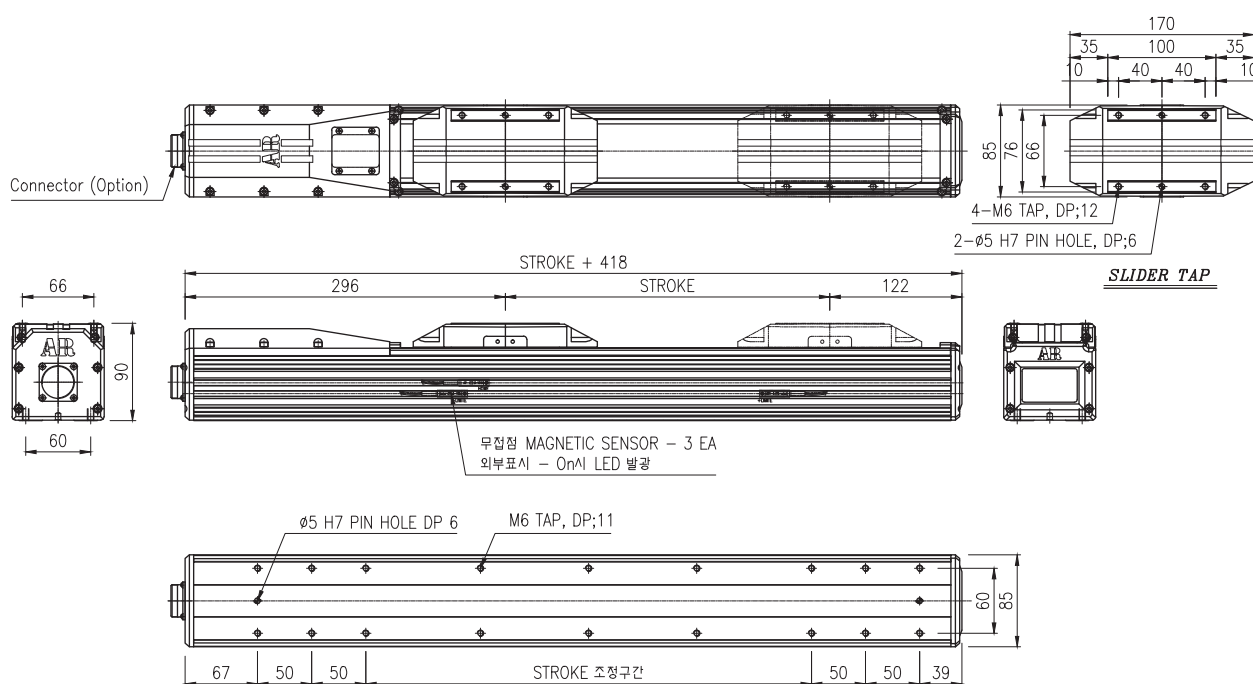
Servo Motor Output/rpm		100w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø15 Lead 20mm(10mm)
Liner motion guide		One way, No.42, 2 block
Repeatability		±0.02mm
Payload(kg) Ta = 0,2s	Lead 20mm	H : 4
		V : 3
	Lead 10mm	H : 24
		V : 7
Moment of inertia of area		Ix=5.02E+05, Iy=1.43E+06



ACS-090S-10

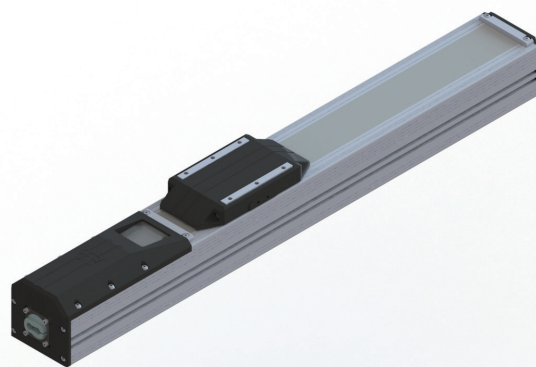
Stroke(mm)		100	200	300	400	500	600	700	800	900	1000
Max. Speed (mm/sec)	Lead 20mm	1000							760	620	500
	Lead 10mm	500							380	310	250
Weight(kg)		7.01	7.90	8.79	9.69	10.58	11.47	12.36	13.25	14.14	15.03
		The weight of the model equipped with a brake is 0.2kg more heavier then this value.									
Base & Slide		Aluminum Profile, 백색전착 유광									

Dimension(mm)



ACS-090S-20 Specification

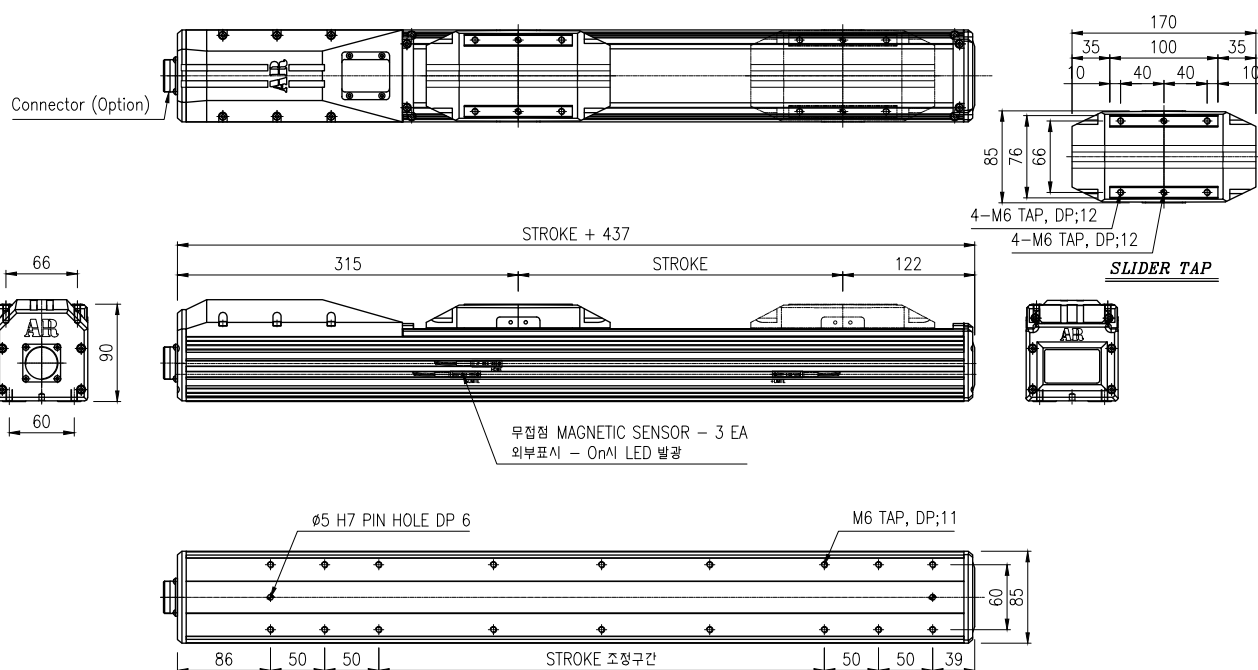
Servo Motor Output/rpm		200w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø15 Lead 20mm(10mm)
Liner motion guide		One way, No.42, 2 block
Repeatability		±0.02mm
Payload(kg) Ta = 0.2s	Lead 20mm	H : 28
		V : 8
	Lead 10mm	H : 30
		V : 16
Moment of inertia of area		Ix=5.02E+05, Iy=1.43E+06



ACS-090S-20

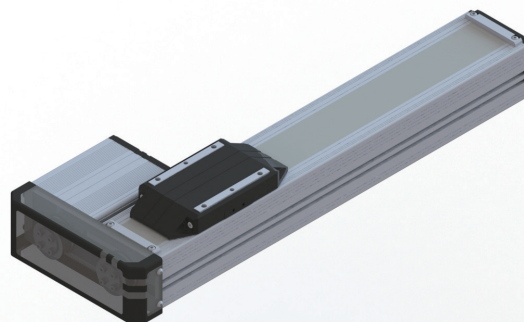
Stroke(mm)		100	200	300	400	500	600	700	800	900	1000
Max. Speed (mm/sec)	Lead 20mm	1000							760	620	500
	Lead 10mm	500							380	310	250
Weight(kg)		7.87	8.76	9.65	10.55	11.44	12.33	13.22	14.11	15.00	15.89
		The weight of the model equipped with a brake is 0.4kg more heavier then this value.									
Base & Slide		Aluminum Profile, 백색전착 유광									

Dimension(mm)



ACS-090L Specification

Servo Motor Output/rpm		100w/3000rpm	200w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø15 Lead 20mm(10mm)	
Liner motion guide		One way, No.42, 2 block	
Repeatability		±0.02mm	
Payload(kg) Ta = 0.2s	Lead 20mm	H : 4	H : 28
		V : 3	V : 8
	Lead 10mm	H : 24	H : 30
		V : 7	V : 16
Moment of inertia of area		Ix=5.02E+05, ly=1.43E+06	

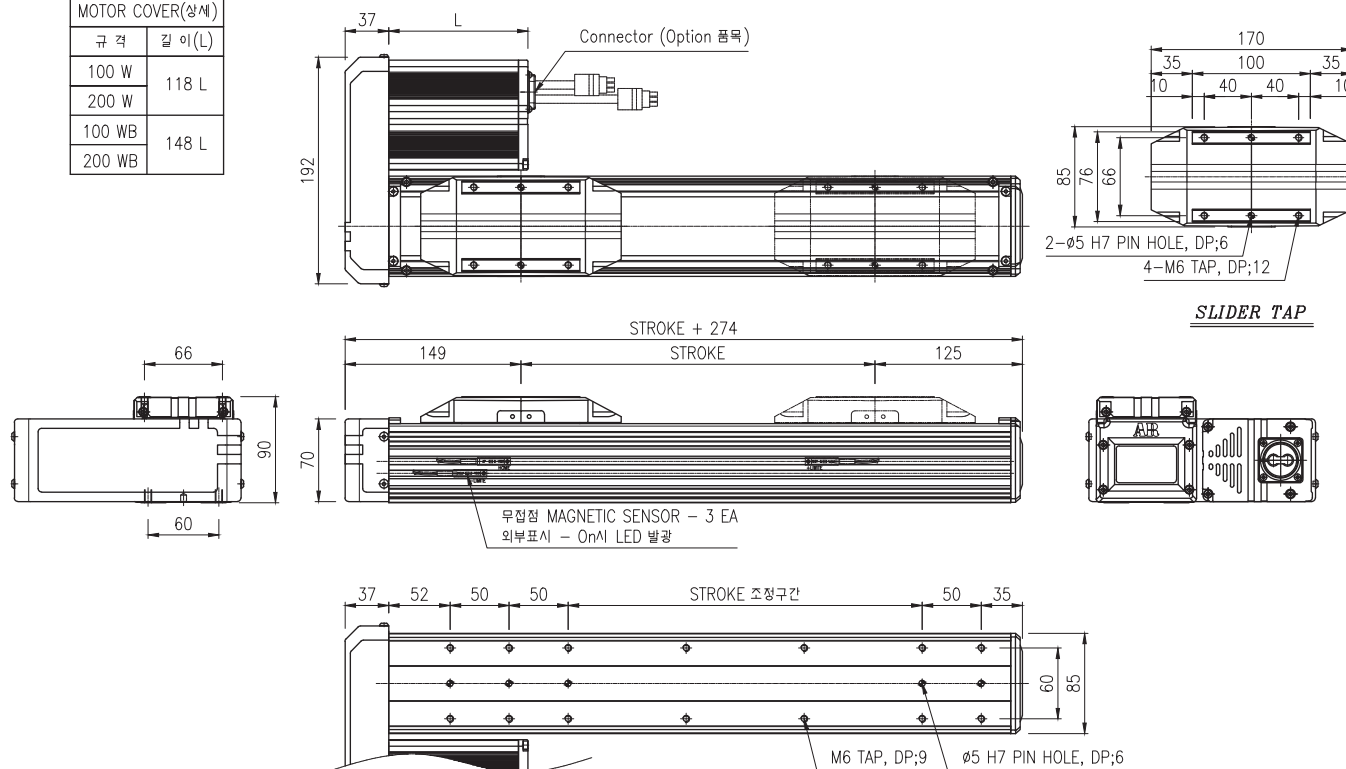


ACS-090L

Stroke(mm)		100	200	300	400	500	600	700	800	900	1000
Max. Speed (mm/sec)	Lead 20mm	1000							760	620	500
	Lead 10mm	500							380	310	250
Weight(kg)		7.27	8.16	9.05	9.94	10.83	11.72	12.61	13.5	14.39	15.28
		The weight of the model equipped with a brake is 0.4kg more heavier then this value.									
Base & Slide		Aluminum Profile, 백색전착 유광									

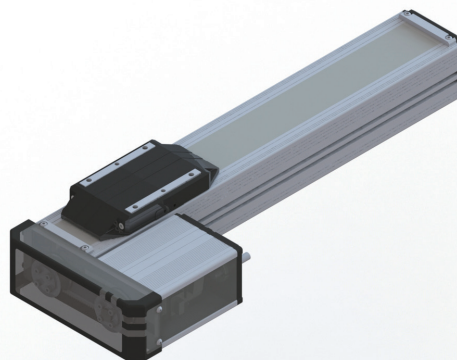
Dimension(mm)

MOTOR COVER(상세)	
규격	길이(L)
100 W	118 L
200 W	
100 WB	148 L
200 WB	



ACS-090R Specification

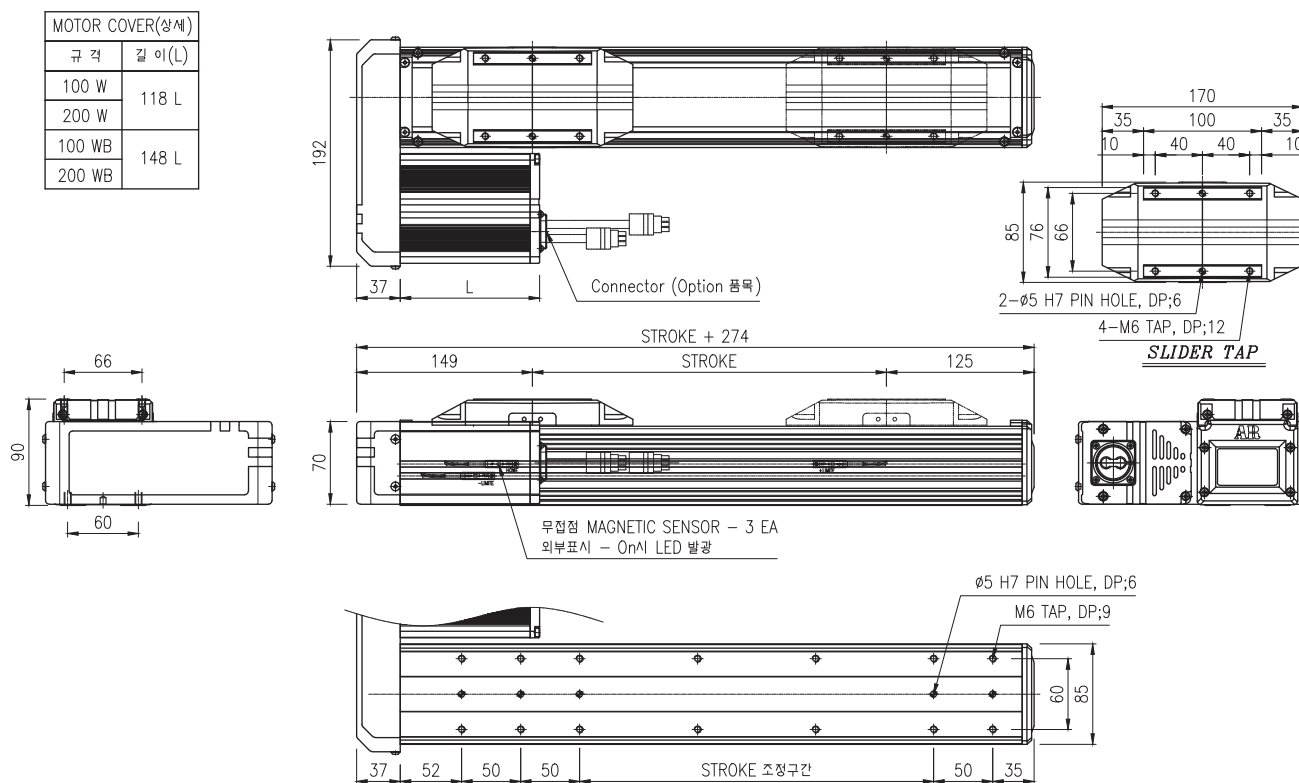
Servo Motor Output/rpm		100w/3000rpm	200w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø15 Lead 20mm(10mm)	
Liner motion guide		One way, No.42, 2 block	
Repeatability		±0.02mm	
Payload(kg) Ta = 0.2s	Lead 20mm	H : 4	H : 28
		V : 3	V : 8
	Lead 10mm	H : 24	H : 30
		V : 7	V : 16
Moment of inertia of area		Ix=5.02E+05, Iy=1.43E+06	



ACS-090R

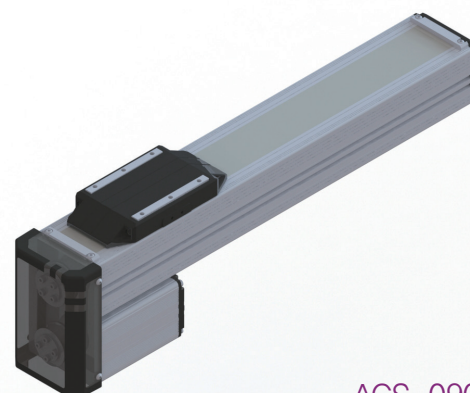
Stroke(mm)		100	200	300	400	500	600	700	800	900	1000
Max. Speed (mm/sec)	Lead 20mm	1000							760	620	500
	Lead 10mm	500							380	310	250
Weight(kg)		7.27	8.16	9.05	9.94	10.83	11.72	12.61	13.5	14.39	15.28
		The weight of the model equipped with a brake is 0.4kg more heavier then this value.									
Base & Slide		Aluminum Profile, 백색전착 유광									

Dimension(mm)



ACS-090U Specification

Servo Motor Output/rpm		100w/3000rpm	200w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø15 Lead 20mm(10mm)	
Liner motion guide		One way, No.42, 2 block	
Repeatability		±0.02mm	
Payload(kg) Ta = 0.2s	Lead 20mm	H : 4	H : 28
		V : 3	V : 8
	Lead 10mm	H : 24	H : 30
		V : 7	V : 16
Moment of inertia of area		Ix=5.02E+05, Iy=1.43E+06	

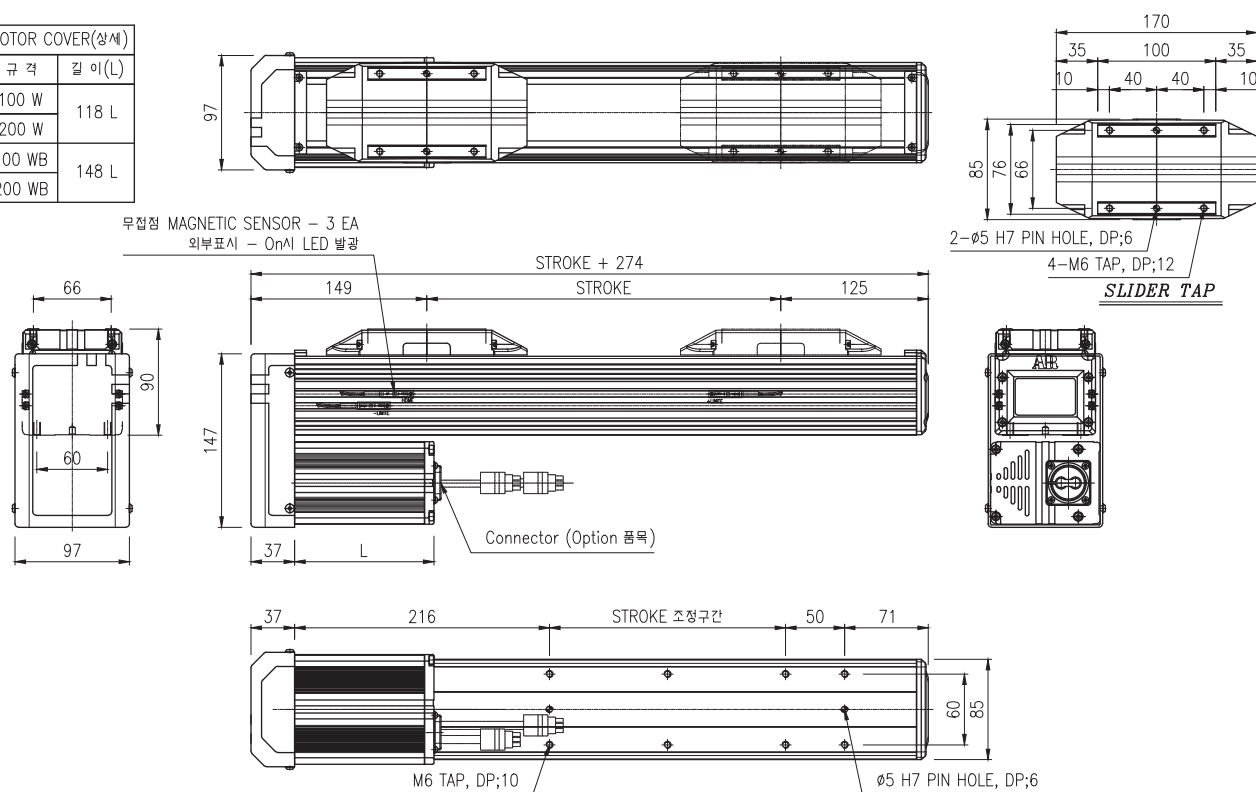


ACS-090U

Stroke(mm)		100	200	300	400	500	600	700	800	900	1000
Max. Speed (mm/sec)	Lead 20mm	1000							760	620	500
	Lead 10mm	500							380	310	250
Weight(kg)		7.27	8.16	9.05	9.94	10.83	11.72	12.61	13.5	14.39	15.28
		The weight of the model equipped with a brake is 0.4kg more heavier then this value.									
Base & Slide		Aluminum Profile, 백색전착 유광									

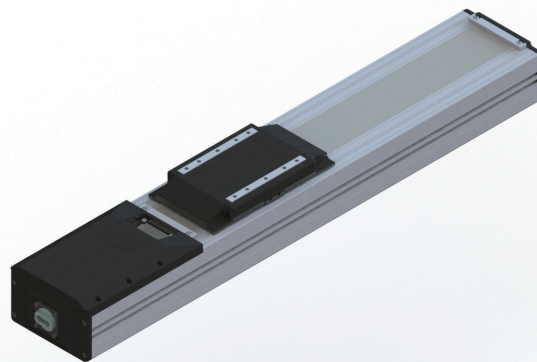
Dimension(mm)

MOTOR COVER(상세)	
규격	길이(L)
100 W	118 L
200 W	
100 WB	148 L
200 WB	



ACS-120S Specification

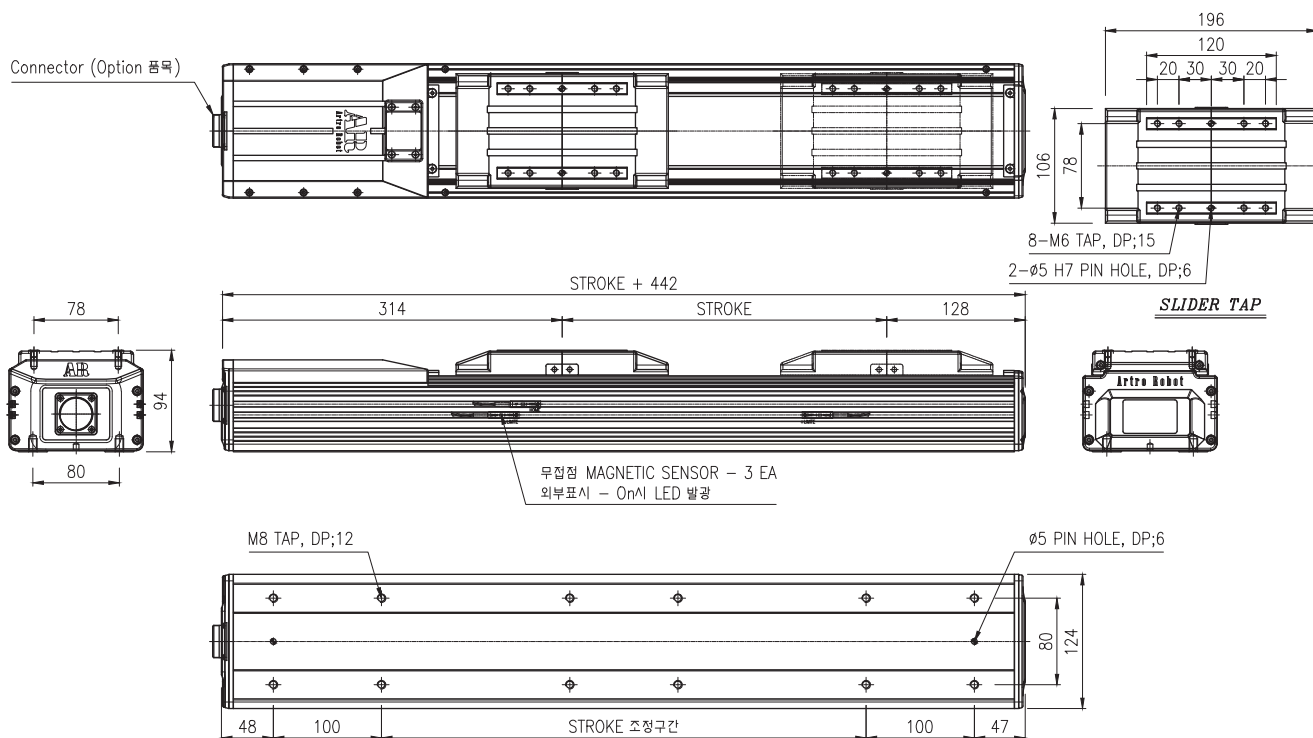
Servo Motor Output/rpm	200w/3000rpm	400w/3000rpm
Drive mechanism	Ball screw(C7, 연삭), Ø15 Lead 20mm(10mm)	
Liner motion guide	Two way, No.15w, 2 block	
Repeatability	±0.02mm	
Payload(kg) Ta = 0.2s	Lead 20mm	H : 30
		H : 40
	Lead 10mm	V : 8
		V : 18
		H : 50
		H : 50
		V : 20
		V : 38
Moment of inertia of area	Ix=6.32E+05, Iy=4.52E+06	



ACS-120S

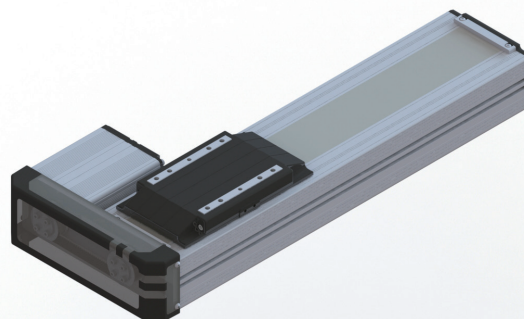
Stroke(mm)		100	200	300	400	500	600	700	800	900	1000	1100	1200
Max. Speed (mm/sec)	Lead 20mm	1000							760	620	500	420	360
	Lead 10mm	500							380	310	250	210	180
Weight(kg)		10.94	12.70	13.20	14.34	15.47	16.61	17.74	18.87	20.01	21.14	22.28	23.41
		The weight of the model equipped with a brake is 0.4kg more heavier then this value.											
Base & Slide		Aluminum Profile, 백색전착 유광											

Dimension(mm)



ACS-120L Specification

Servo Motor Output/rpm		200w/3000rpm	400w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø15 Lead 20mm(10mm)	
Liner motion guide		Two way, No.15w, 2 block	
Repeatability		±0.02mm	
Payload(kg) Ta = 0.2s	Lead 20mm	H : 30	H : 40
		V : 8	V : 18
	Lead 10mm	H : 50	H : 50
		V : 20	V : 38
Moment of inertia of area		Ix=6.32E+05, Iy=4.52E+06	

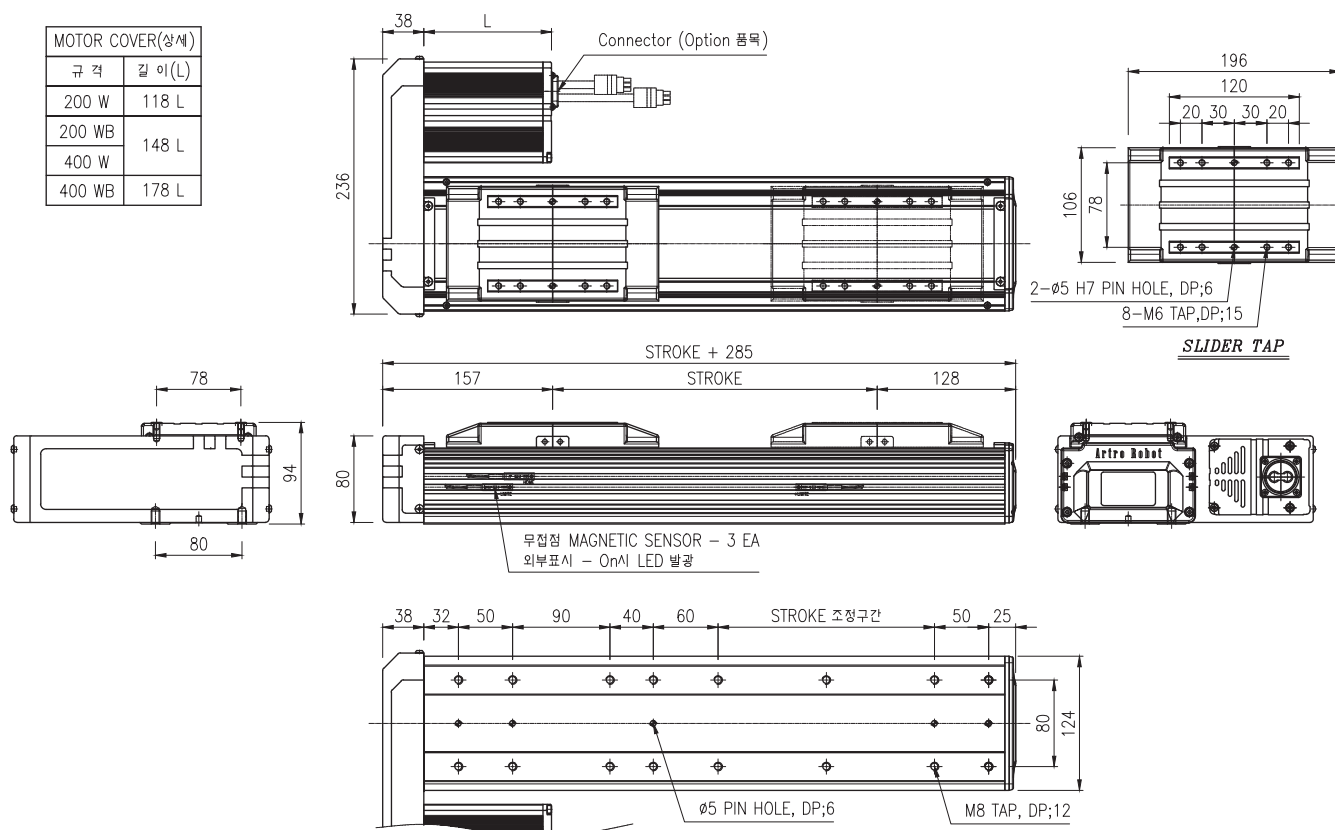


ACS-120L

Stroke(mm)		100	200	300	400	500	600	700	800	900	1000	1100	1200
Max. Speed (mm/sec)	Lead 20mm	1000							760	620	500	420	360
	Lead 10mm	500							380	310	250	210	180
Weight(kg)		11.29	12.42	13.55	14.68	15.81	16.94	18.07	19.2	20.33	21.46	22.59	23.72
		The weight of the model equipped with a brake is 0.4kg more heavier then this value.											
Base & Slide		Aluminum Profile, 백색전착 유광											

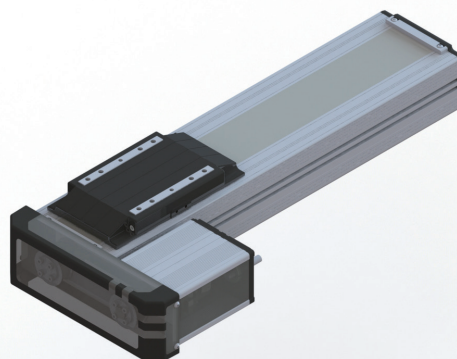
Dimension(mm)

MOTOR COVER(상세)	
구 격	깊 이(L)
200 W	118 L
200 WB	148 L
400 W	148 L
400 WB	178 L



ACS-120R Specification

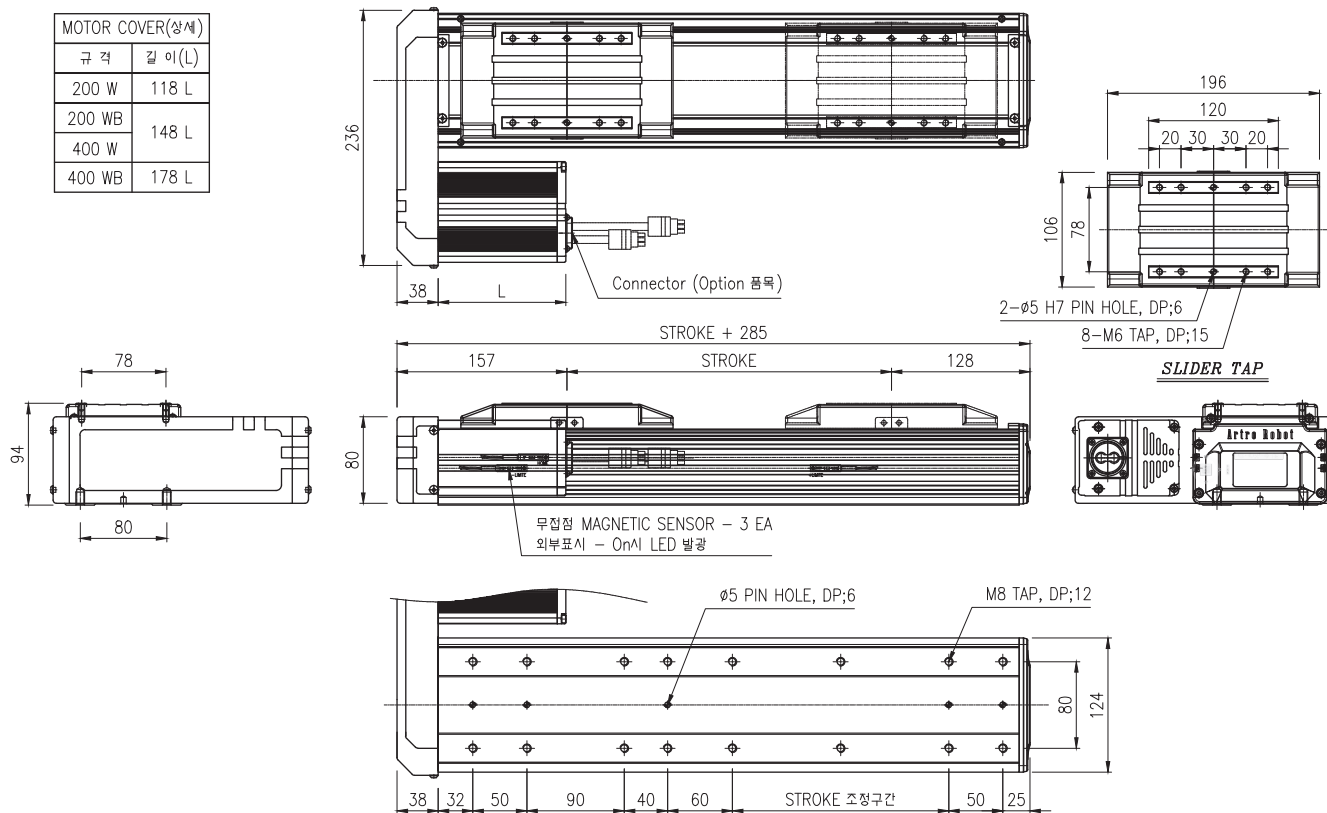
Servo Motor Output/rpm		200w/3000rpm		400w/3000rpm	
Drive mechanism		Ball screw(C7, 연삭), Ø15 Lead 20mm(10mm)			
Liner motion guide		Two way, No.15w, 2 block			
Repeatability		±0.02mm			
Payload(kg) Ta = 0.2s	Lead 20mm	H : 30		H : 40	
		V : 8		V : 18	
	Lead 10mm	H : 50		H : 50	
		V : 20		V : 38	
Moment of inertia of area		Ix=6.32E+05, Iy=4.52E+06			



ACS-120R

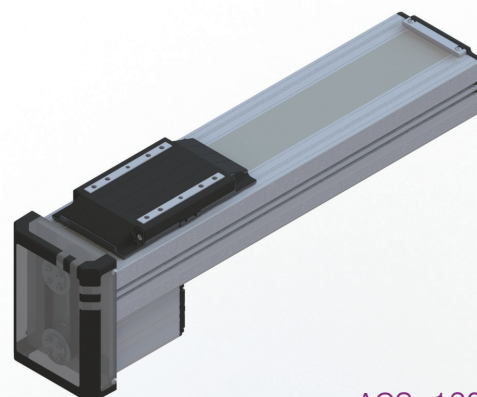
Stroke(mm)		100	200	300	400	500	600	700	800	900	1000	1100	1200
Max. Speed (mm/sec)	Lead 20mm	1000							760	620	500	420	360
	Lead 10mm	500							380	310	250	210	180
Weight(kg)		11.29	12.42	13.55	14.68	15.81	16.94	18.07	19.2	20.33	21.46	22.59	23.72
		The weight of the model equipped with a brake is 0.4kg more heavier then this value.											
Base & Slide		Aluminum Profile, 백색전착 유광											

Dimension(mm)



ACS-120U Specification

Servo Motor Output/rpm		200w/3000rpm	400w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø15 Lead 20mm(10mm)	
Liner motion guide		Two way, No.15w, 2 block	
Repeatability		±0.02mm	
Payload(kg) Ta = 0.2s	Lead 20mm	H : 30	H : 40
		V : 8	V : 18
	Lead 10mm	H : 50	H : 50
		V : 20	V : 38
Moment of inertia of area		Ix=6.32E+05, Iy=4.52E+06	

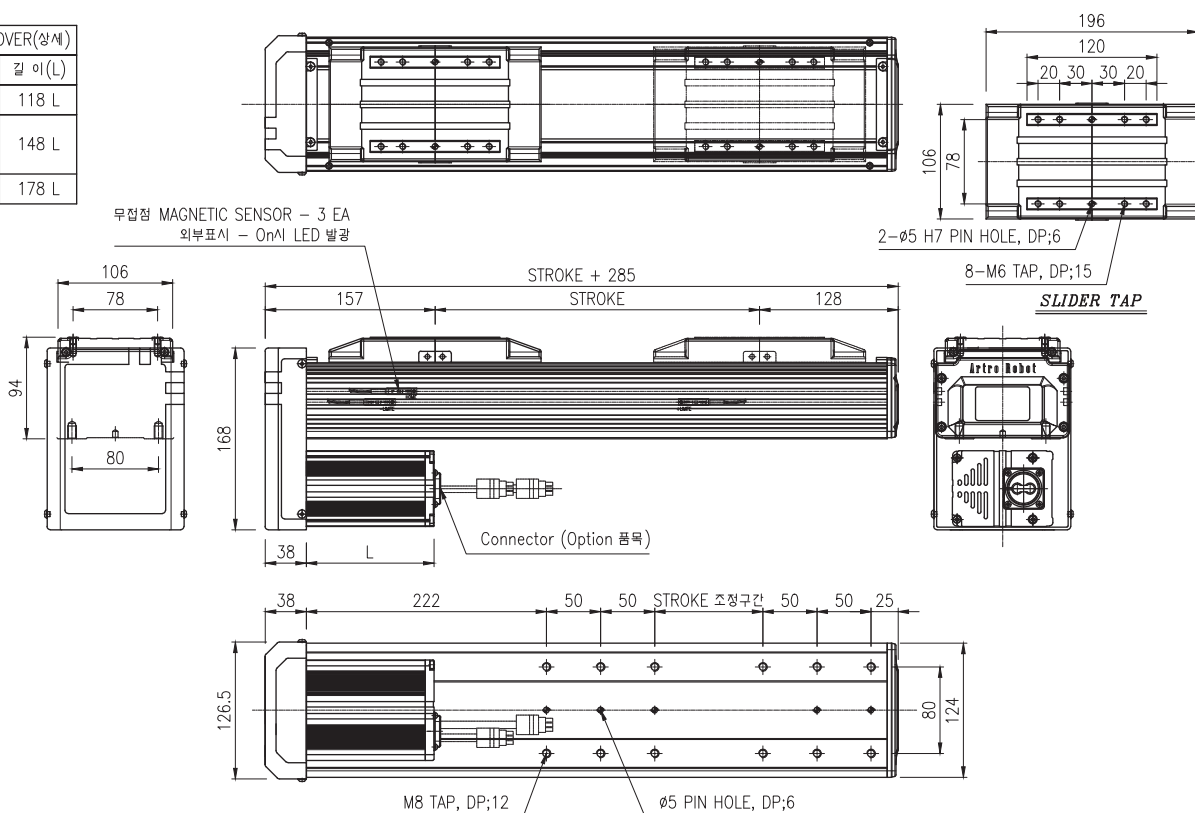


ACS-120U

Stroke(mm)		100	200	300	400	500	600	700	800	900	1000	1100	1200
Max. Speed (mm/sec)	Lead 20mm	1000							760	620	500	420	360
	Lead 10mm	500							380	310	250	210	180
Weight(kg)		11.29	12.42	13.55	14.68	15.81	16.94	18.07	19.2	20.33	21.46	22.59	23.72
		The weight of the model equipped with a brake is 0.4kg more heavier then this value.											
Base & Slide		Aluminum Profile, 백색전착 유광											

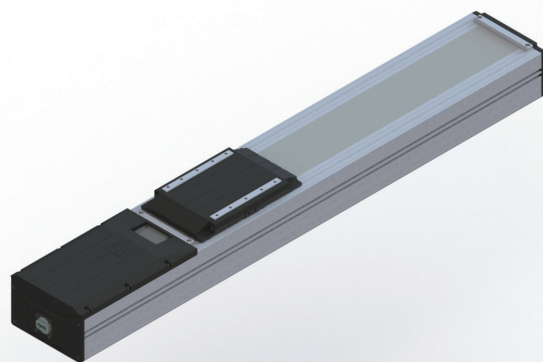
Dimension(mm)

MOTOR COVER(상세)	
규격	길이(L)
200 W	118 L
200 WB	148 L
400 W	148 L
400 WB	178 L



ACS-160S Specification

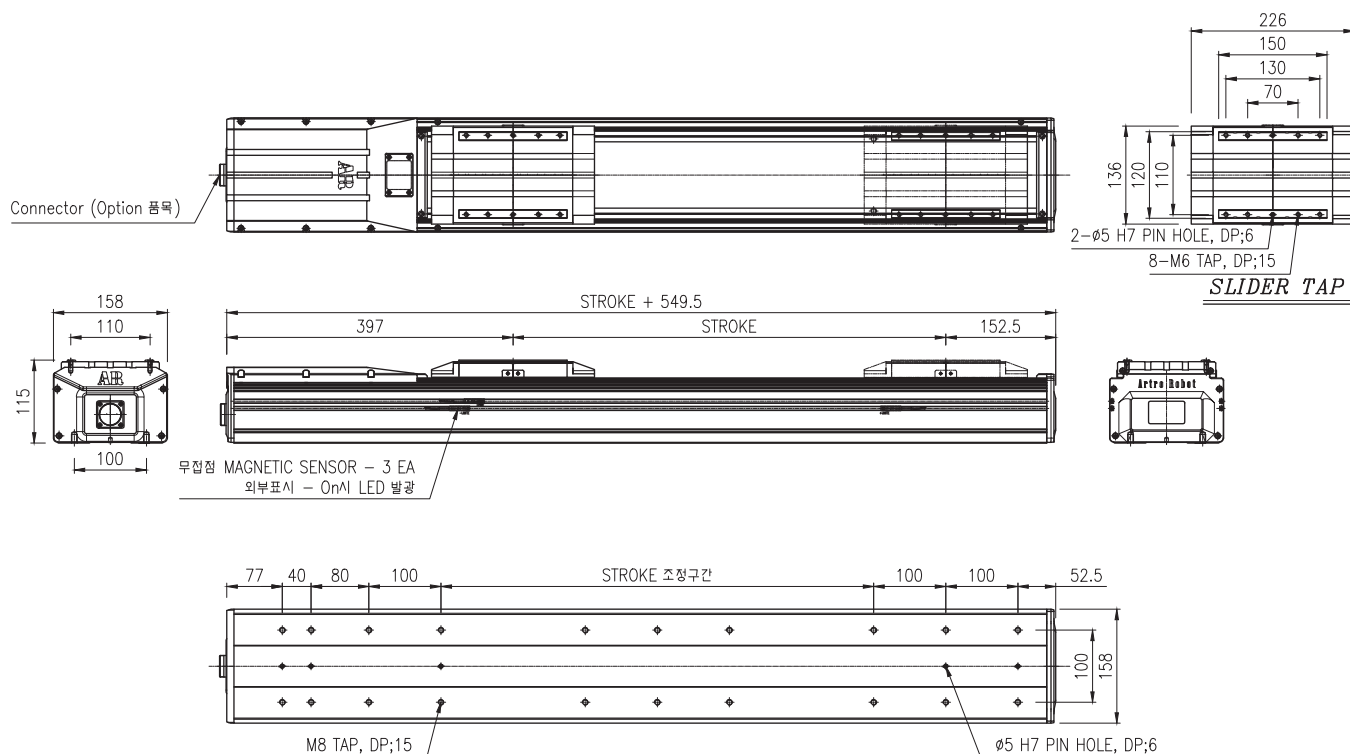
Servo Motor Output/rpm		400w/3000rpm		750w/3000rpm	
Drive mechanism		Ball screw(C7, 연삭), Ø20 Lead 20mm(10mm)			
Liner motion guide		Two way, No.20w, 2 block			
Repeatability		±0.02mm			
Payload(kg) Ta = 0.2s	Lead 20mm	H : 50		H : 60	
		V : 18		V : 24	
	Lead 10mm	H : 80		H : 80	
		V : 32		V : 40	
Moment of inertia of area		Ix=1.56E+06, Iy=1.11E+07			



ACS-160S

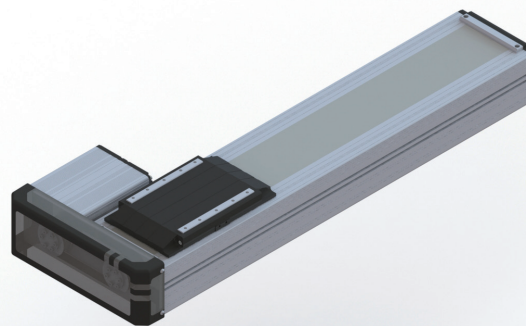
Stroke(mm)		100	200	300	400	500	600	700	800	900	1000	1100	1200	1300	1400
Max. Speed (mm/sec)	Lead 20mm	1000								840	700	580	480	420	360
	Lead 10mm	500								420	350	290	240	210	180
Weight(kg)		18.35	19.82	21.29	22.76	24.23	25.7	27.17	28.64	30.11	31.58	32.05	34.52	35.09	37.46
		The weight of the model equipped with a brake is 1kg more heavier then this value.													
Base & Slide		Aluminum Profile, 백색전착유광													

Dimension(mm)



ACS-160L Specification

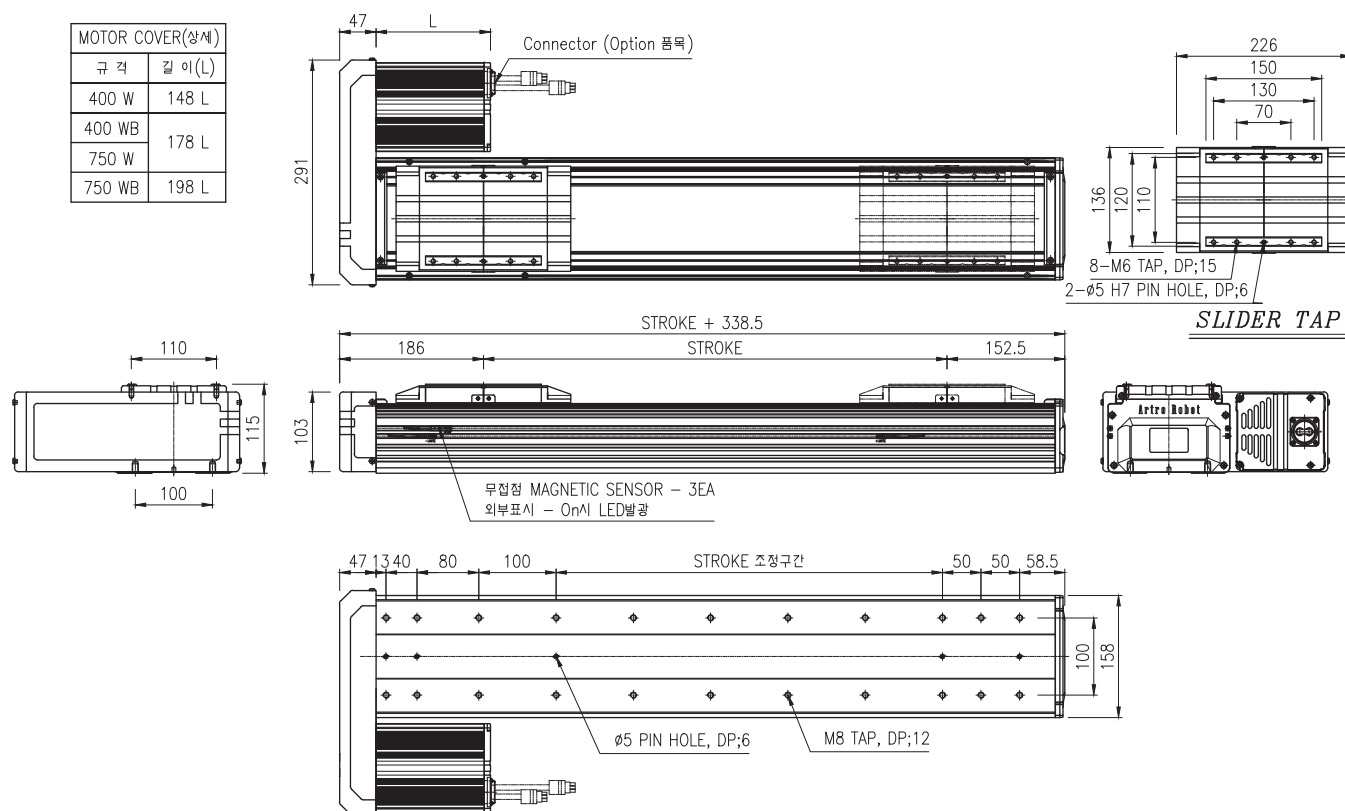
Servo Motor Output/rpm		400w/3000rpm	750w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø20 Lead 20mm(10mm)	
Liner motion guide		Two way, No.20w, 2 block	
Repeatability		±0.02mm	
Payload(kg) Ta = 0.2s	Lead 20mm	H : 50	H : 60
		V : 18	V : 24
	Lead 10mm	H : 80	H : 80
		V : 32	V : 40
Moment of inertia of area		Ix=1.56E+06, Iy=1.11E+07	



ACS-160L

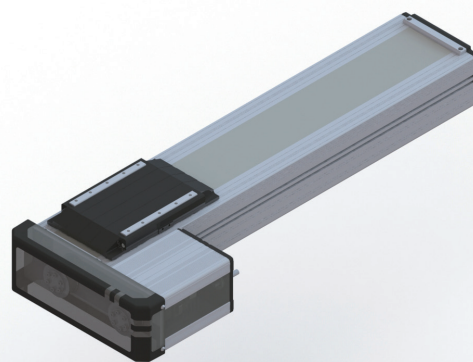
Stroke(mm)		100	200	300	400	500	600	700	800	900	1000	1100	1200	1300	1400
Max. Speed (mm/sec)	Lead 20mm	1000								840	700	580	480	420	360
	Lead 10mm	500								420	350	290	240	210	180
Weight(kg)		18.24	19.72	21.2	22.68	24.16	25.64	27.12	28.6	30.08	31.56	32.04	34.52	36	37.48
		The weight of the model equipped with a brake is 1kg more heavier then this value.													
Base & Slide		Aluminum Profile, 박색전착 유광													

Dimension(mm)



ACS-160R Specification

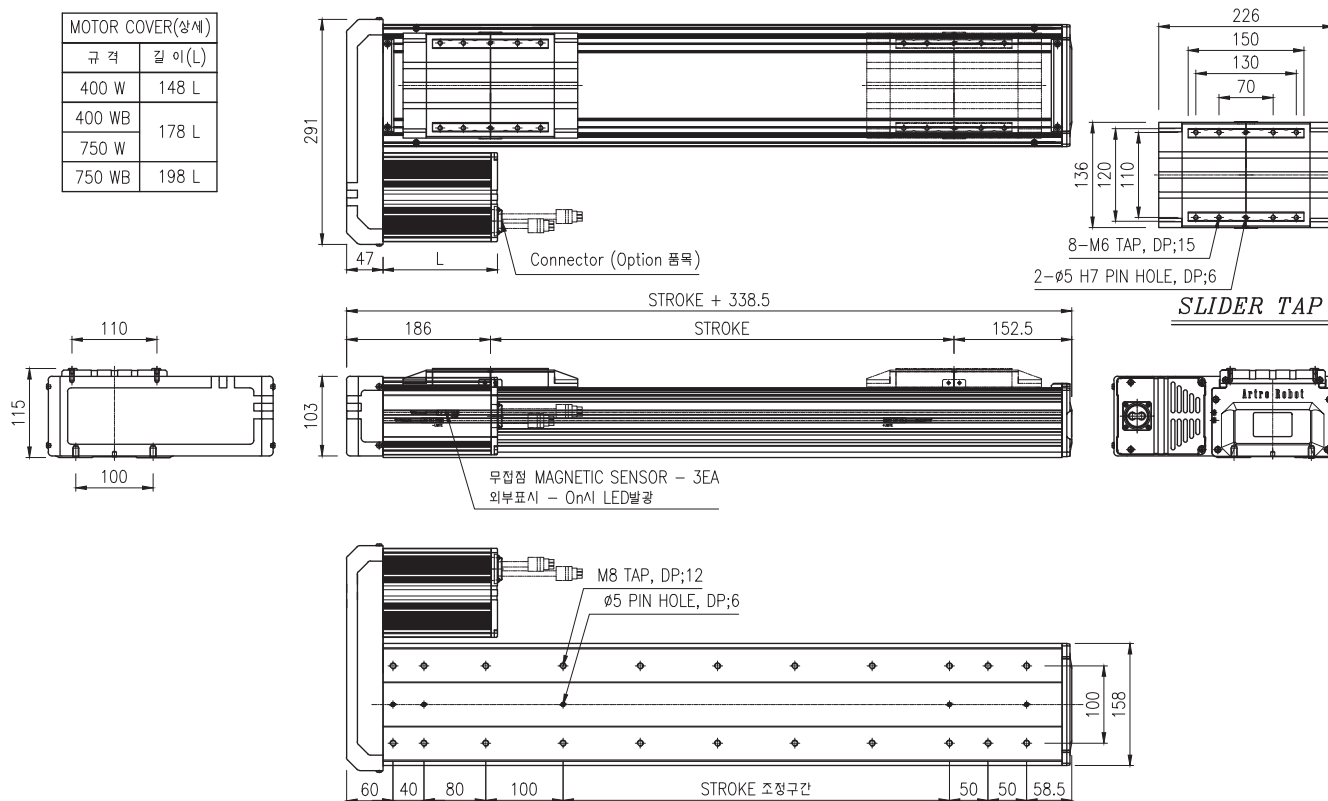
Servo Motor Output/rpm		400w/3000rpm	750w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø20 Lead 20mm(10mm)	
Liner motion guide		Two way, No.20w, 2 block	
Repeatability		±0.02mm	
Payload(kg) Ta = 0.2s	Lead 20mm	H : 50	H : 60
		V : 18	V : 24
	Lead 10mm	H : 80	H : 80
		V : 32	V : 40
Moment of inertia of area		Ix=1.56E+06, Iy=1.11E+07	



ACS-160R

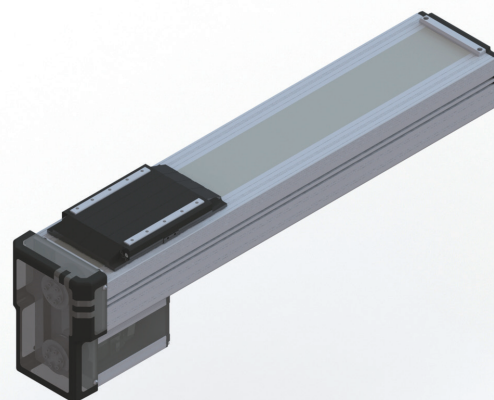
Stroke(mm)		100	200	300	400	500	600	700	800	900	1000	1100	1200	1300	1400
Max. Speed (mm/sec)	Lead 20mm	1000								840	700	580	480	420	360
	Lead 10mm	500								420	350	290	240	210	180
Weight(kg)		18.24	19.72	21.2	22.68	24.16	25.64	27.12	28.6	30.08	31.56	32.04	34.52	36	37.48
		The weight of the model equipped with a brake is 1kg more heavier then this value.													
Base & Slide		Aluminum Profile, 백색전착 유광													

Dimension(mm)



ACS-160U Specification

Servo Motor Output/rpm		400w/3000rpm	750w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø20 Lead 20mm(10mm)	
Liner motion guide		Two way, No.20w, 2 block	
Repeatability		±0.02mm	
Payload(kg) Ta = 0.2s	Lead 20mm	H : 50	H : 60
		V : 18	V : 24
	Lead 10mm	H : 80	H : 80
		V : 32	V : 40
Moment of inertia of area		Ix=1.56E+06, Iy=1.11E+07	



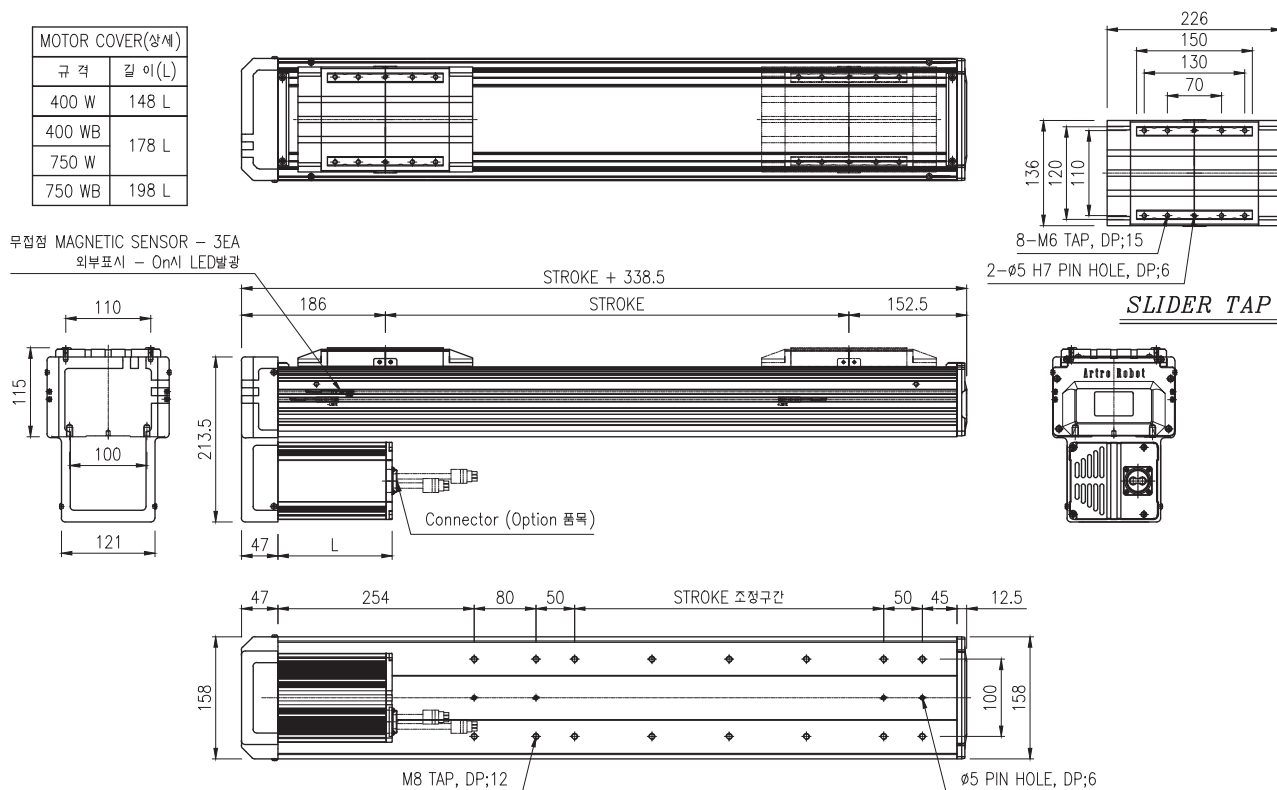
ACS-160U

Stroke(mm)		100	200	300	400	500	600	700	800	900	1000	1100	1200	1300	1400
Max. Speed (mm/sec)	Lead 20mm	1000								840	700	580	480	420	360
	Lead 10mm	500								420	350	290	240	210	180
Weight(kg)		18.24	19.72	21.2	22.68	24.16	25.64	27.12	28.6	30.08	31.56	32.04	34.52	36	37.48
		The weight of the model equipped with a brake is 1kg more heavier then this value.													
Base & Slide		Aluminum Profile, 백색전착유광													

Dimension(mm)

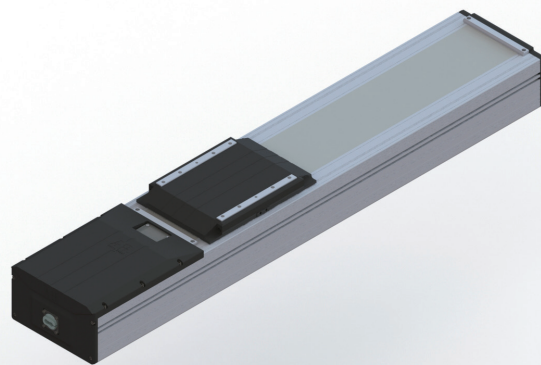
MOTOR COVER(상세)	
규격	길이(L)
400 W	148 L
400 WB	178 L
750 W	178 L
750 WB	198 L

무접점 MAGNETIC SENSOR - 3EA
외부표시 - On시 LED발광



ACS-200S Specification

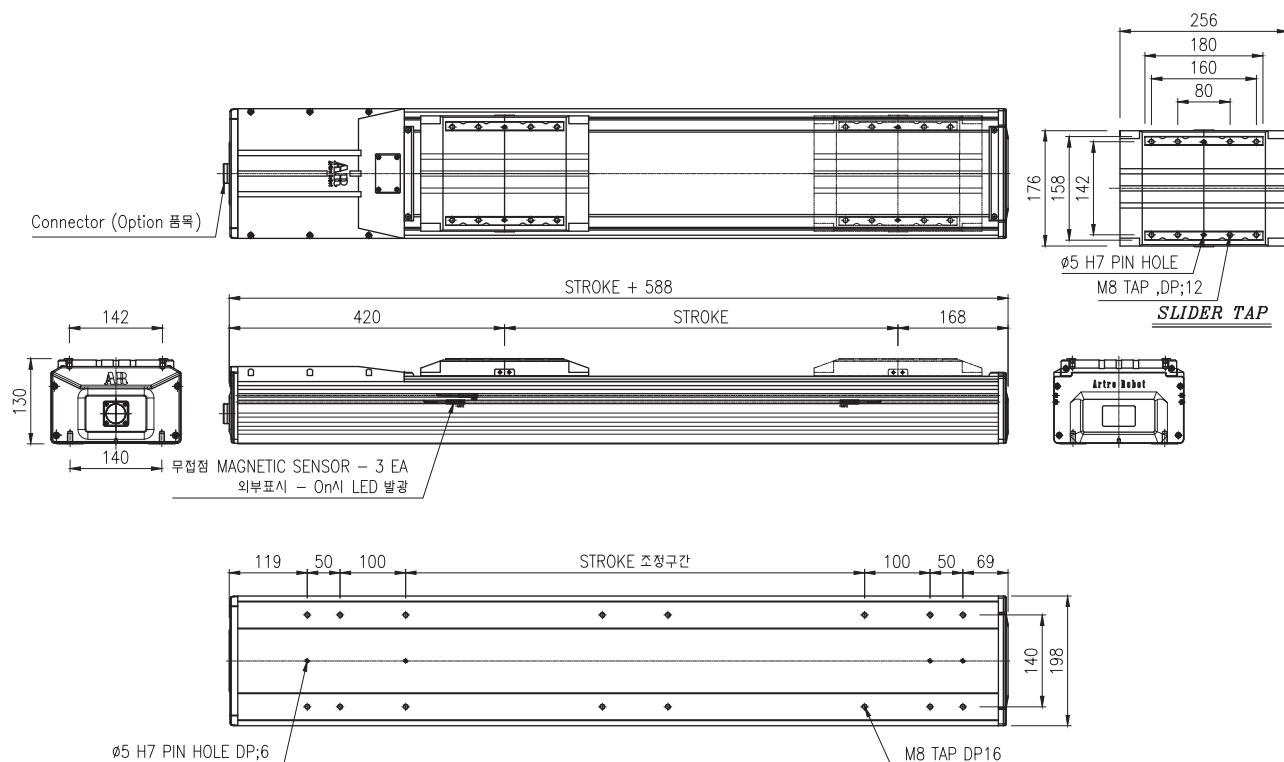
Servo Motor Output/rpm		750w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø20 Lead 20mm(10mm)
Liner motion guide		Two way, No.25w, 2 block
Repeatability		±0.02mm
Payload(kg) Ta = 0.2s	Lead 20mm	H : 100
		V : 30
	Lead 10mm	H : 120
		V : 55
Moment of inertia of area		Ix=2.39E+06, Iy=2.66E+07



ACS-200S

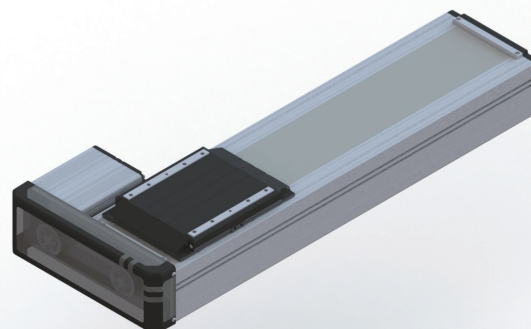
Stroke(mm)		100	200	300	400	500	600	700	800	900	1000	1100	1200	1300	1400
Max. Speed (mm/sec)	Lead 20mm	1000								840	700	580	480	420	360
	Lead 10mm	500								420	350	290	240	210	180
Weight(kg)		26.59	28.77	30.95	33.13	35.31	37.49	39.07	41.85	44.03	46.21	48.39	50.57	52.75	54.93
		The weight of the model equipped with a brake is 1kg more heavier then this value.													
Base & Slide		Aluminum Profile, 백색전착 유광													

Dimension(mm)



ACS-200L Specification

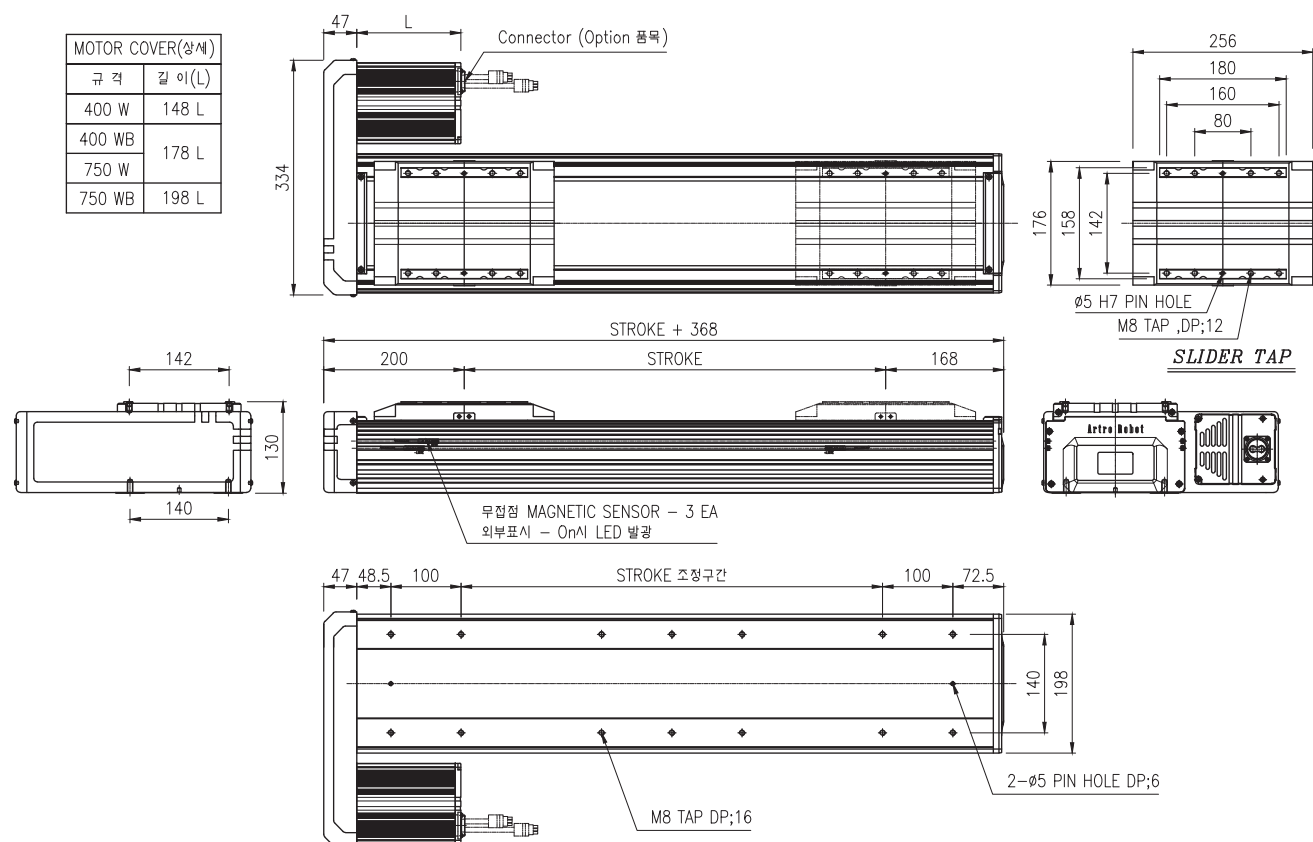
Servo Motor Output/rpm		750w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø20 Lead 20mm(10mm)
Liner motion guide		Two way, No.25w, 2 block
Repeatability		±0.02mm
Payload(kg) Ta = 0.2s	Lead 20mm	H : 100
		V : 30
	Lead 10mm	H : 120
		V : 55
Moment of inertia of area		Ix=2.39E+06, Iy=2.66E+07



ACS-200L

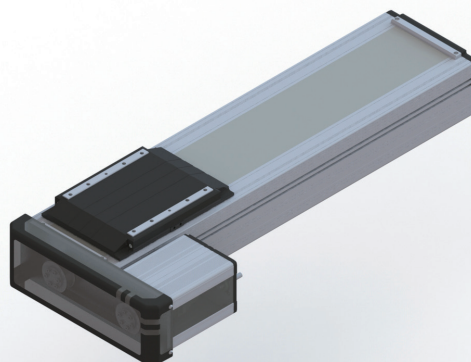
Stroke(mm)		100	200	300	400	500	600	700	800	900	1000	1100	1200	1300	1400
Max. Speed (mm/sec)	Lead 20mm	1000								840	700	580	480	420	360
	Lead 10mm	500								420	350	290	240	210	180
Weight(kg)		26.65	27.83	30.01	32.19	34.37	36.55	38.73	40.91	43.09	45.27	47.45	49.63	51.81	53.99
		The weight of the model equipped with a brake is 1kg more heavier then this value.													
Base & Slide		Aluminum Profile, 백색전착유광													

Dimension(mm)



ACS-200R Specification

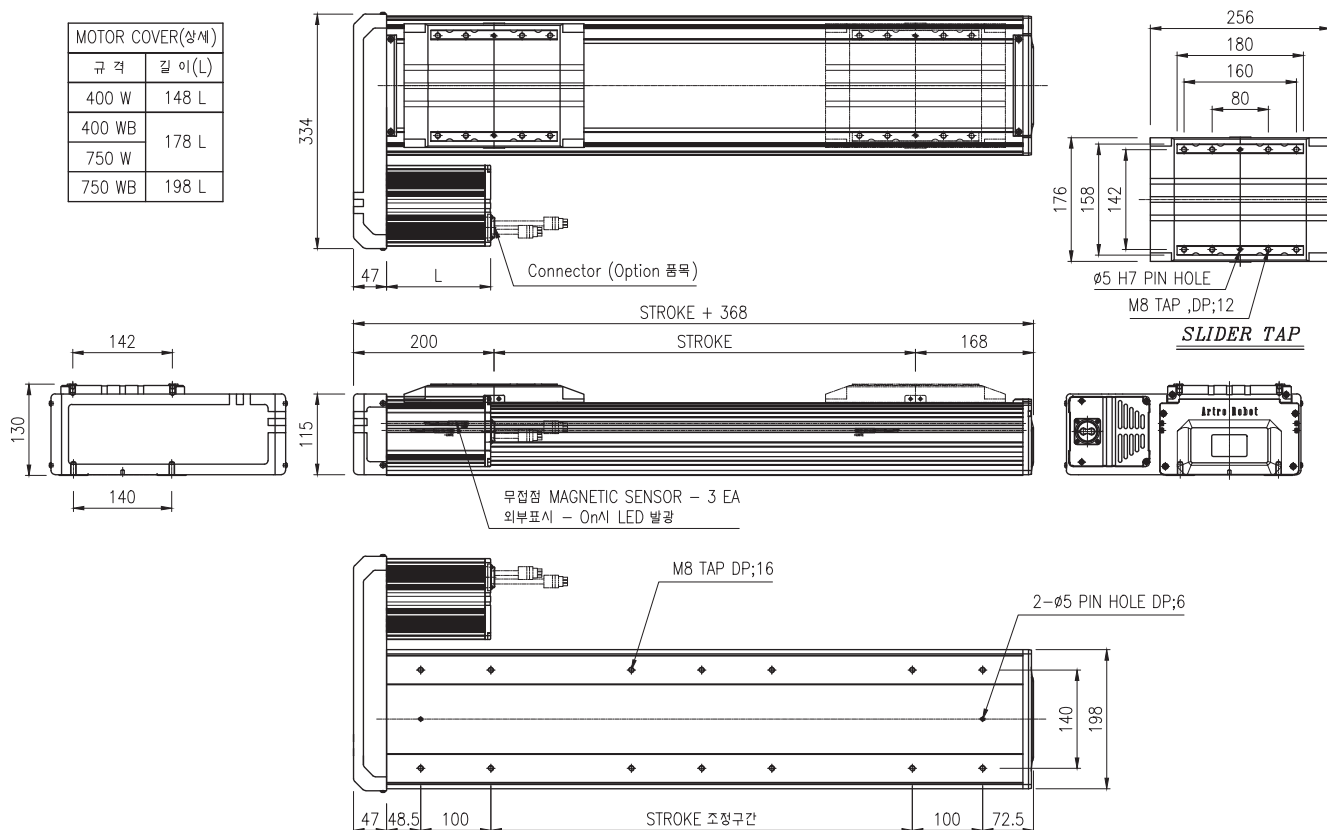
Servo Motor Output/rpm		750w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø20 Lead 20mm(10mm)
Liner motion guide		Two way, No.25w, 2 block
Repeatability		±0.02mm
Payload(kg) Ta = 0.2s	Lead 20mm	H : 100
		V : 30
	Lead 10mm	H : 120
		V : 55
Moment of inertia of area		Ix=2.39E+06, Iy=2.66E+07



ACS-200R

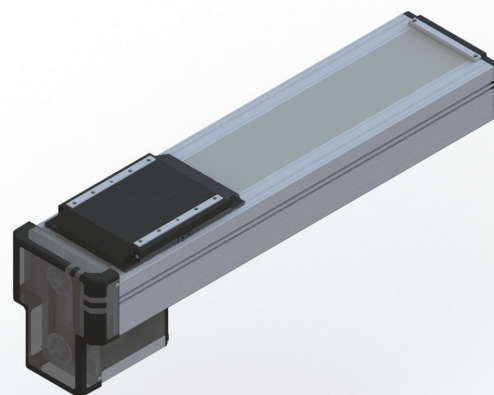
Stroke(mm)		100	200	300	400	500	600	700	800	900	1000	1100	1200	1300	1400
Max. Speed (mm/sec)	Lead 20mm	1000								840	700	580	480	420	360
	Lead 10mm	500								420	350	290	240	210	180
Weight(kg)		26.65	27.83	30.01	32.19	34.37	36.55	38.73	40.91	43.09	45.27	47.45	49.63	51.81	53.99
		The weight of the model equipped with a brake is 1kg more heavier then this value.													
Base & Slide		Aluminum Profile, 백색전착 유광													

Dimension(mm)



ACS-200U Specification

Servo Motor Output/rpm		750w/3000rpm
Drive mechanism		Ball screw(C7, 연삭), Ø20 Lead 20mm(10mm)
Liner motion guide		Two way, No.25w, 2 block
Repeatability		±0.02mm
Payload(kg) Ta = 0.2s	Lead 20mm	H : 100
		V : 30
	Lead 10mm	H : 120
		V : 55
Moment of inertia of area		Ix=2.39E+06, Iy=2.66E+07

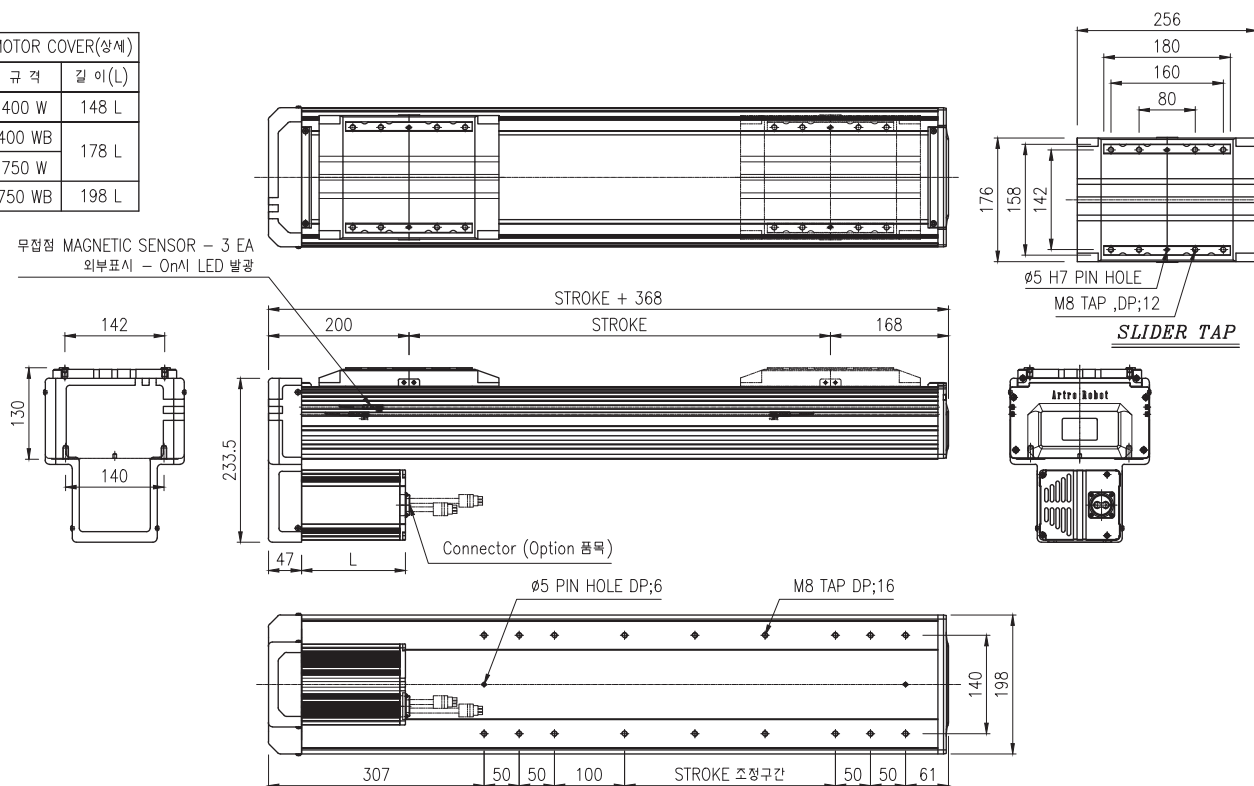


ACS-200U

Stroke(mm)		100	200	300	400	500	600	700	800	900	1000	1100	1200	1300	1400
Max. Speed (mm/sec)	Lead 20mm	1000								840	700	580	480	420	360
	Lead 10mm	500								420	350	290	240	210	180
Weight(kg)		26.65	27.83	30.01	32.19	34.37	36.55	38.73	40.91	43.09	45.27	47.45	49.63	51.81	53.99
		The weight of the model equipped with a brake is 1kg more heavier then this value.													
Base & Slide		Aluminum Profile, 박색전착유광													

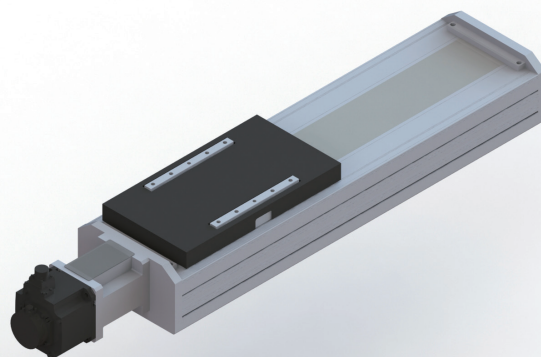
MOTOR COVER(상세)	
규격	길이(L)
400 W	148 L
400 WB	178 L
750 W	178 L
750 WB	198 L

무접점 MAGNETIC SENSOR - 3 EA
외부표시 - On시 LED 발광



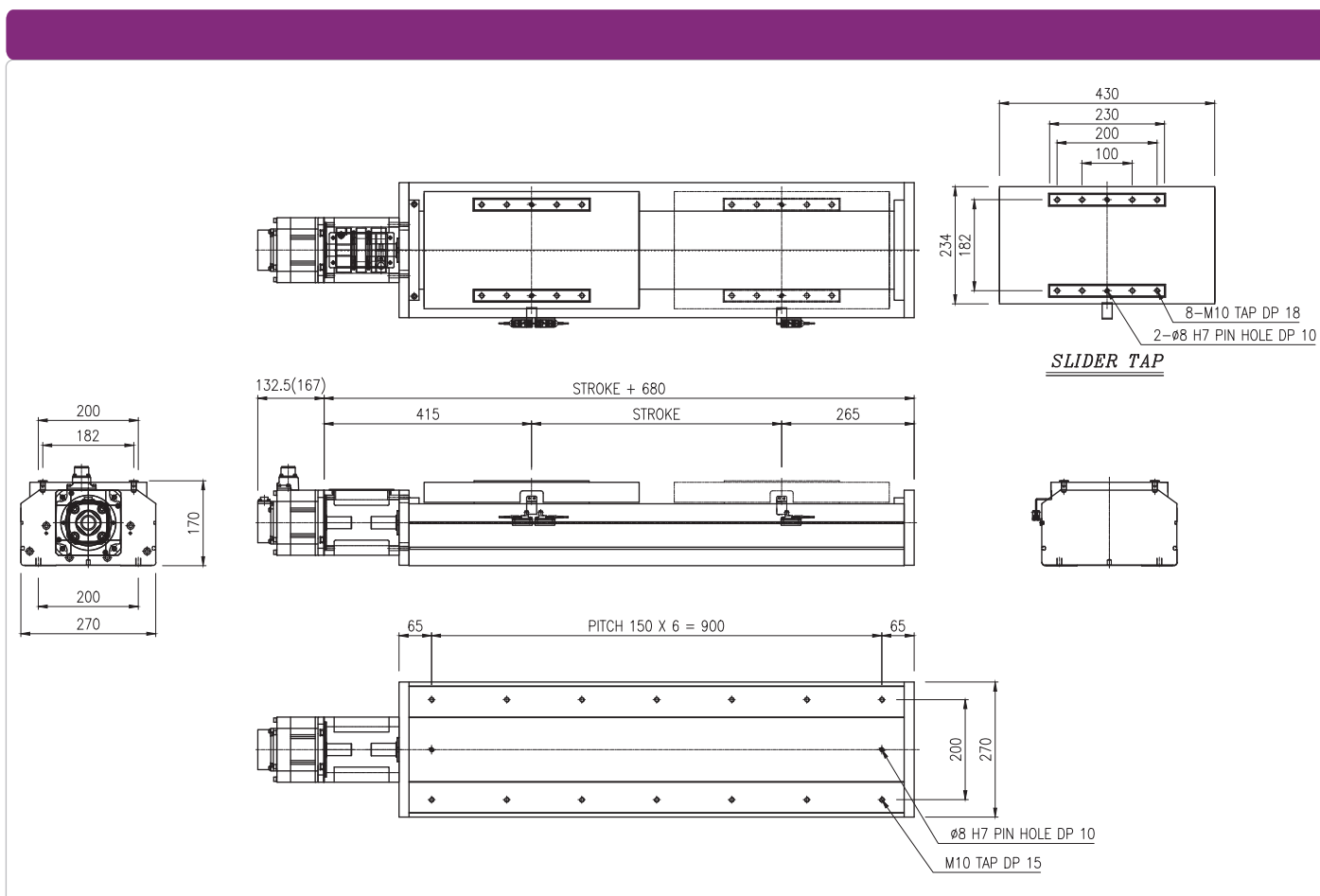
ACS-270N Specification

Servo Motor Output/rpm		1kw/2000rpm
Drive mechanism		Ballscrew(C7, 전조), Ø40 Lead 40mm(10mm)
Liner motion guide		Two way, No.35r, 4 block
Repeatability		±0.02mm
Payload(kg) Ta = 0.2s	Lead 40mm	H : 200
		V : 10
	Lead 10mm	H : 200
		V : 100
Moment of inertia of area		Ix=2.39E+06, Iy=2.66E+07

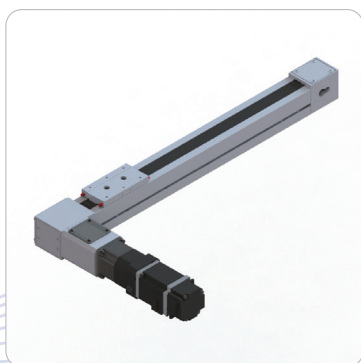


ACS-270N

Stroke(mm)		100	200	300	400	500	600	700	800	900	1000	1100	1200	1300	1400
Max. Speed (mm/sec)	Lead 40mm	800													
	Lead 10mm	300													
Weight(kg)		78.8	81.91	85.02	88.13	91.24	94.35	97.46	100.57	103.68	106.79	109.9	113.01	116.12	119.23
		The weight of the model equipped with a brake is 1kg more heavier then this value.													
Base & Slide		Aluminum Profile, 백색전착유광													



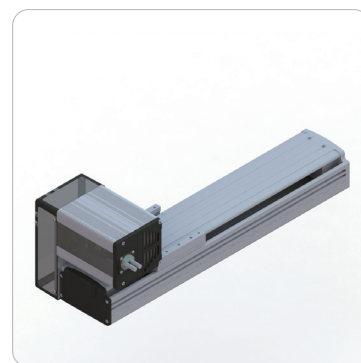
AB-SERIES



AB-040



AB-090DL/DR/UL/UR/FL/FR



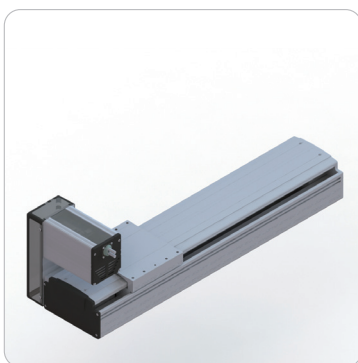
AB-120DL/DR/UL/UR/FL/FR



Artro Robot
Development & Motion Control



AB-160DL/DR/UL/UR/FL/FR



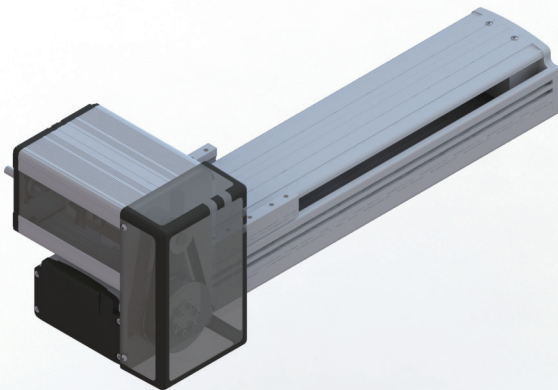
AB-200DL/DR/UL/UR/FL/FR

AB-SERIES

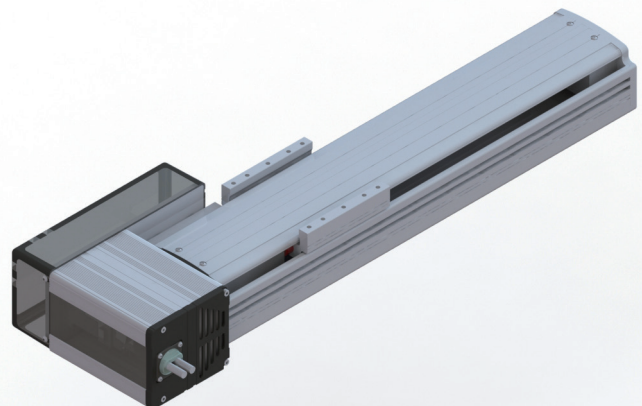
AB-Series Model Info.

AB	090F* L(R) **	0300	10	Option.
AB-Series	040 : 40 body 090 : 90 body 120 : 120 body 160 : 160 body 200 : 200 body *Motor joint Info. D : Top of axis F : Front of axis U : Under of axis **Motor direction Info. L : Right To Left R : Left To Right	Stroke	Motor OutPut 10 : 100W 20 : 200W 40 : 400W 70 : 750W	

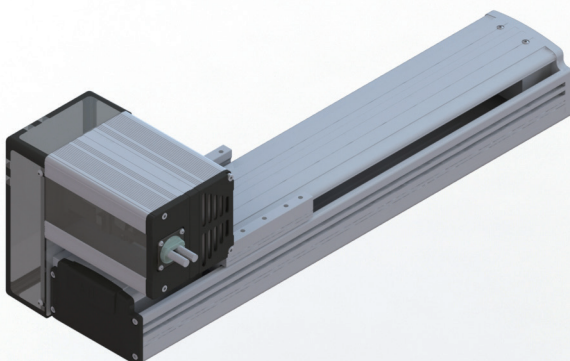
Top of Axis



Front of Axis



Under of Axis

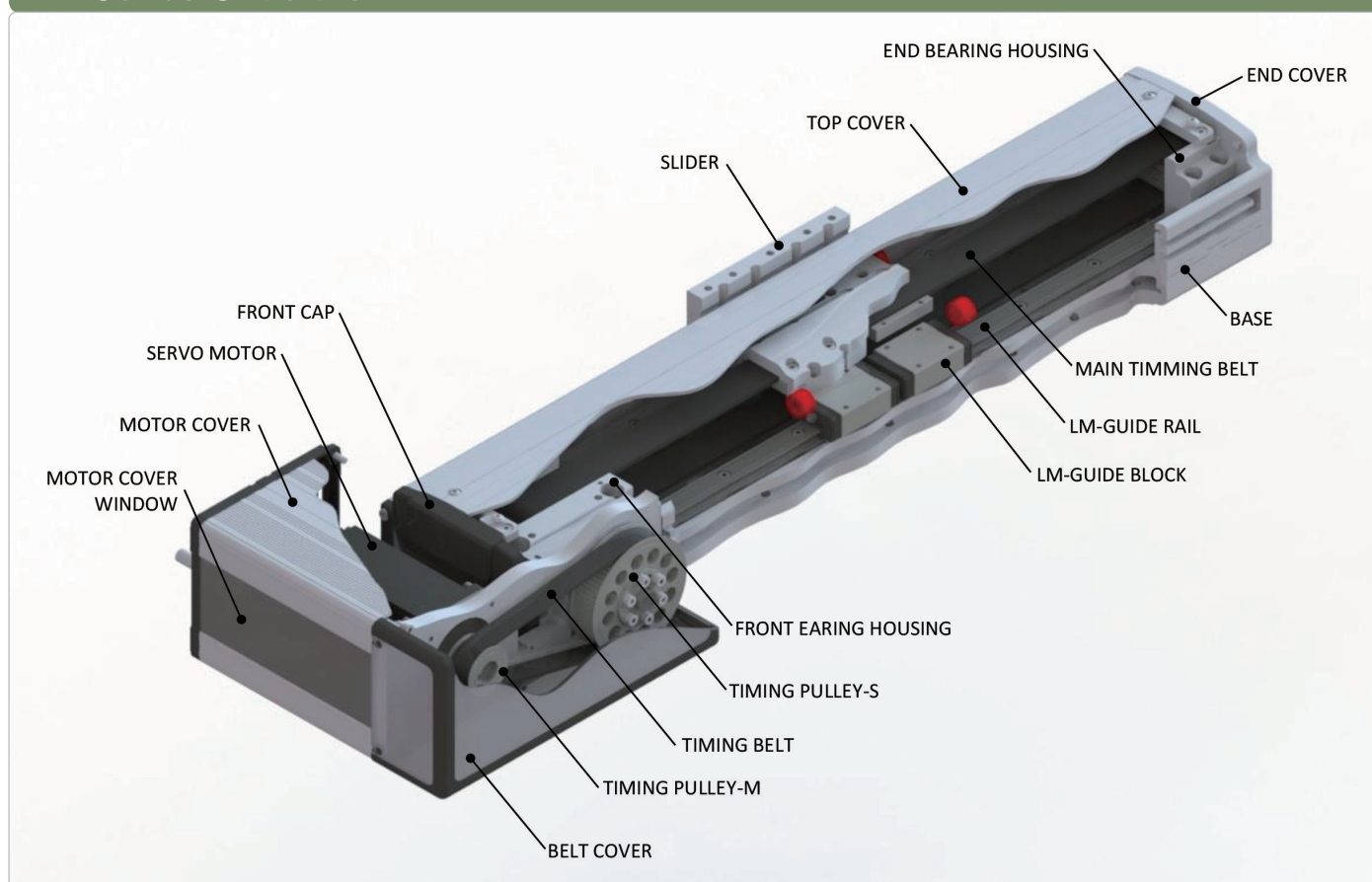


Timing Belt Robot Table

※ Max Load & Stroke Chart

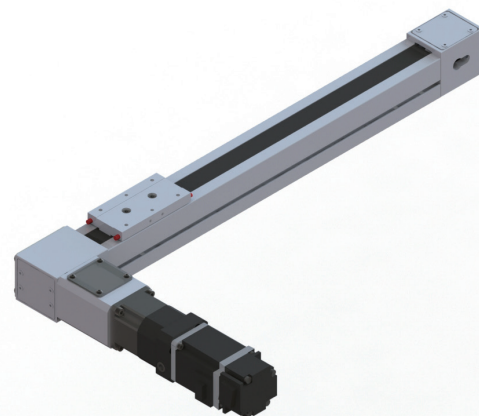
Product		Power Info			Max Speed	Max Load(H)											Max Stroke	
		Motor Output	Applied Ratio	Drive Pulley P.C.D		mm/s	0	10	20	30	40	50	60	70	80	90	100	Kg
A B S E R I E S	40	200W / 3000 rpm	1 / 5	30,24	950												2	900
	90	200W / 3000 rpm	1 / 2	23,87	1800												14	1500
		400W / 3000 rpm	1 / 2	23,87	1800												24	1500
	120	400W / 3000 rpm	1 / 2,5	33,42	2000												17	2000
		750W / 3000 rpm	1 / 2,5	33,42	2000												45	2000
	160	400W / 3000 rpm	1 / 2,5	33,42	2000												16	2500
		750W / 3000 rpm	1 / 2,5	33,42	2000												40	2500
	200	400W / 3000 rpm	1 / 3	42,97	2200												23	3000
		750W / 3000 rpm	1 / 3	42,97	2200												31	3000

AB-Series Structure



AB-040 Specification

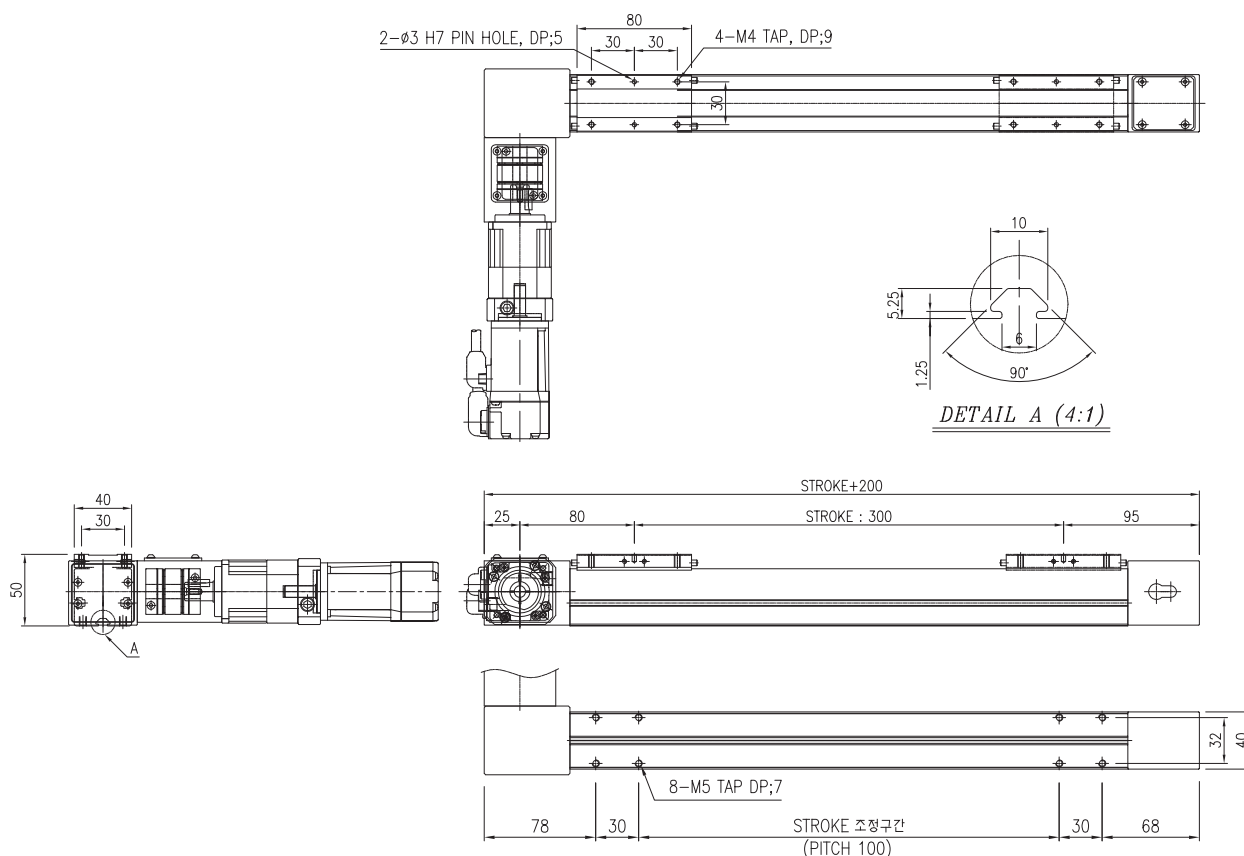
Servo Motor Output/rpm	100w/3000rpm
Drive mechanism	Drive Pulley & Belt
Joint Pully Ratio / rpm	1 : 5 / 600rpm
Drive Pully P.C.D	30.24
Belt Info.	T5, 18W
Liner Guide(LM-Guide)	One way, No.14, 2 block
Repeatability(mm)	±0.1
Payload(kg)	Lead 20mm
Moment of inertia of area	H : 2 $I_x=9.84E+04, I_y=1.19E+05$



AB-040

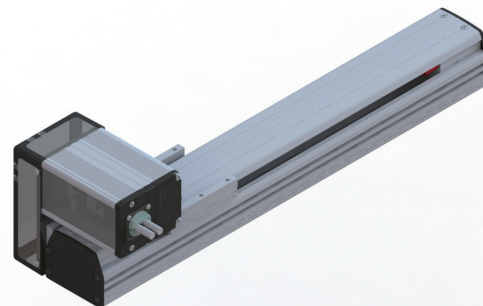
Stroke(mm)	100	200	300	400	500	600	700	800	900
Weight(kg)	2.94	3.17	3.40	3.63	3.86	4.09	4.32	4.55	4.78
	The weight of the model equipped with a brake is 0.2kg more heavier then this value.								
Base & Slide	Aluminum Profile, 백색전착 유광								

Dimension(mm)



AB-090DL Specification

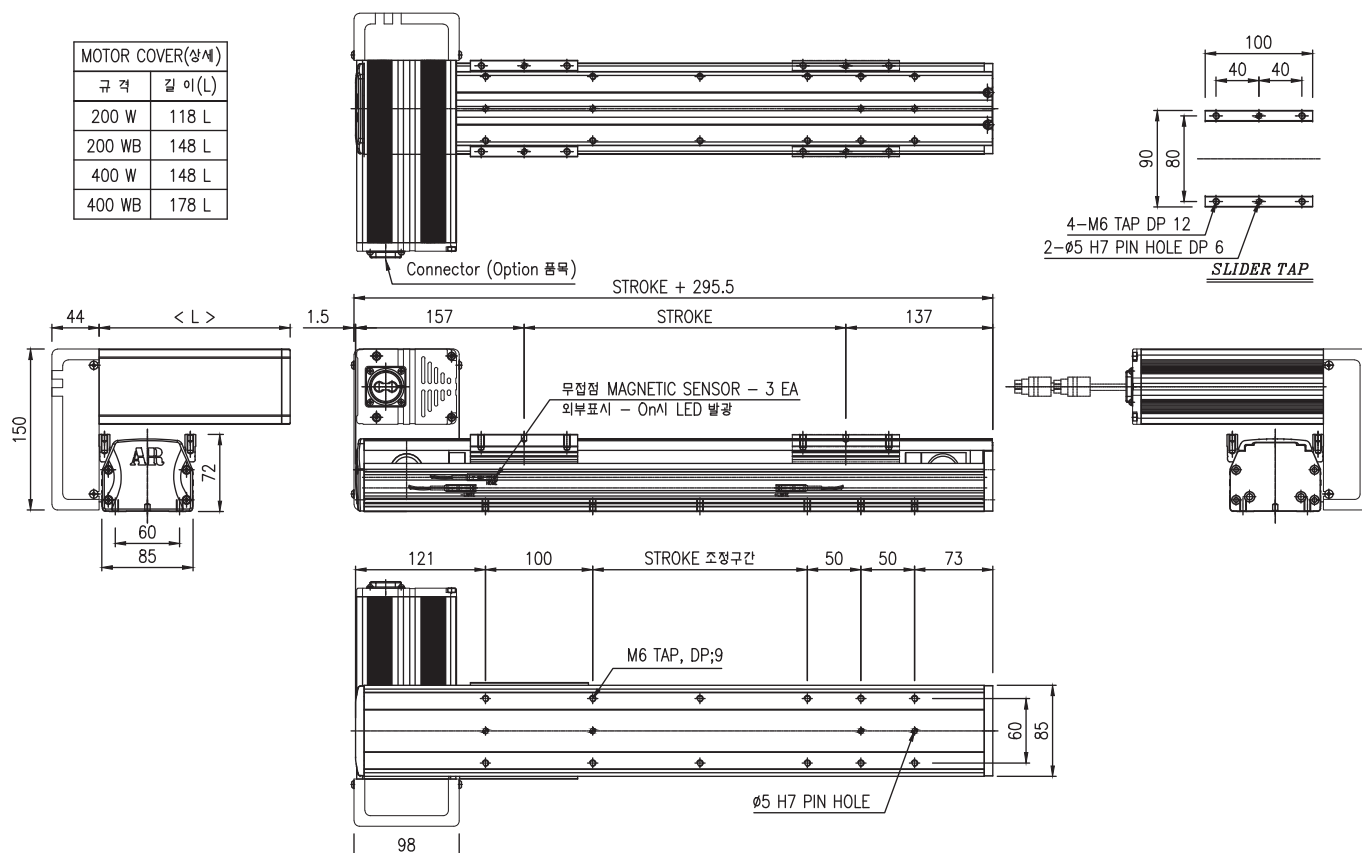
Servo Motor Output/rpm	200w/3000rpm	400w/3000rpm
Drive mechanism	Joint Timing Pulley Drive Pulley & Belt	
Joint Pulley Ratio / rpm	1 : 2 / 1500rpm	
Drive Pulley P.C.D	23.87	
Belt Info.	T5, 25W	
Liner Guide(LM-Guide)	One Way, 42-2UU	
Repeatability(mm)	±0.1	
Payload(kg)	H : 14.2	H : 24.8
Moment of inertia of area	I _x = 1.65E+05, I _y = 4.84E +05	



AB-090DL

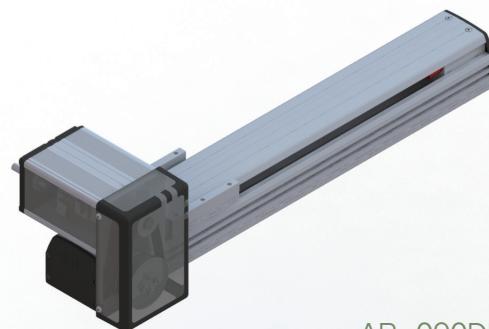
Stroke(mm)	1000	1100	1200	1300	1400	1500	1600	1700	1800	1900	2000
Weight(kg)	11.5	12.2	12.9	13.6	14.3	15.9	16.3	17	17.7	18.4	19.1
The weight of the model equipped with a brake is 0.35kg more heavier then this value.											
Base & Slide	Aluminum Profile, 백색전착 유광										

Dimension(mm)



AB-090DR Specification

Servo Motor Output/rpm	200w/3000rpm	400w/3000rpm
Drive mechanism	Joint Timing Pulley Drive Pulley & Belt	
Joint Pulley Ratio / rpm	1 : 2 / 1500rpm	
Drive Pulley P.C.D	23.87	
Belt Info.	T5, 25W	
Liner Guide(LM-Guide)	One Way, 42-2UU	
Repeatability(mm)	±0.1	
Payload(kg)	H : 14.2	H : 24.8
Moment of inertia of area	I _x = 1.65E+05, I _y = 4.84E +05	

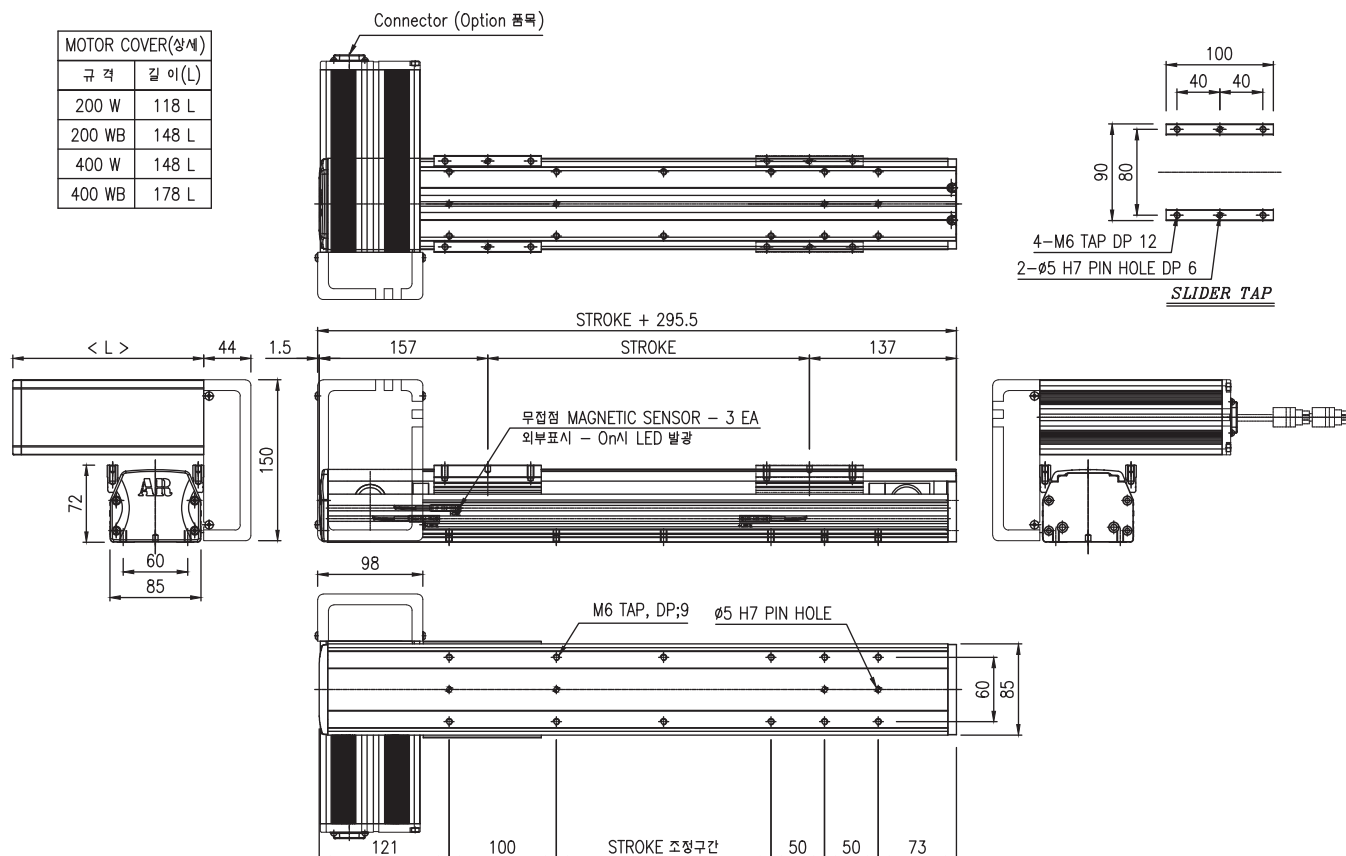


AB-090DR

Stroke	1000	1100	1200	1300	1400	1500	1600	1700	1800	1900	2000
Weight(kg)	11.5	12.2	12.9	13.6	14.3	15.9	16.3	17	17.7	18.4	19.1
The weight of the model equipped with a brake is 0.35kg more heavier then this value.											
Base & Slide	Aluminum Profile, 백색전착 유광										

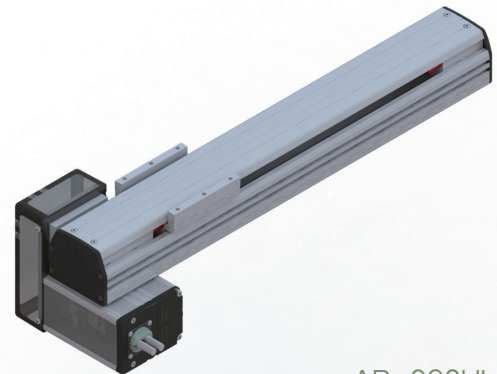
Dimension(mm)

MOTOR COVER(상세)	
규격	길이(L)
200 W	118 L
200 WB	148 L
400 W	148 L
400 WB	178 L



AB-090UL Specification

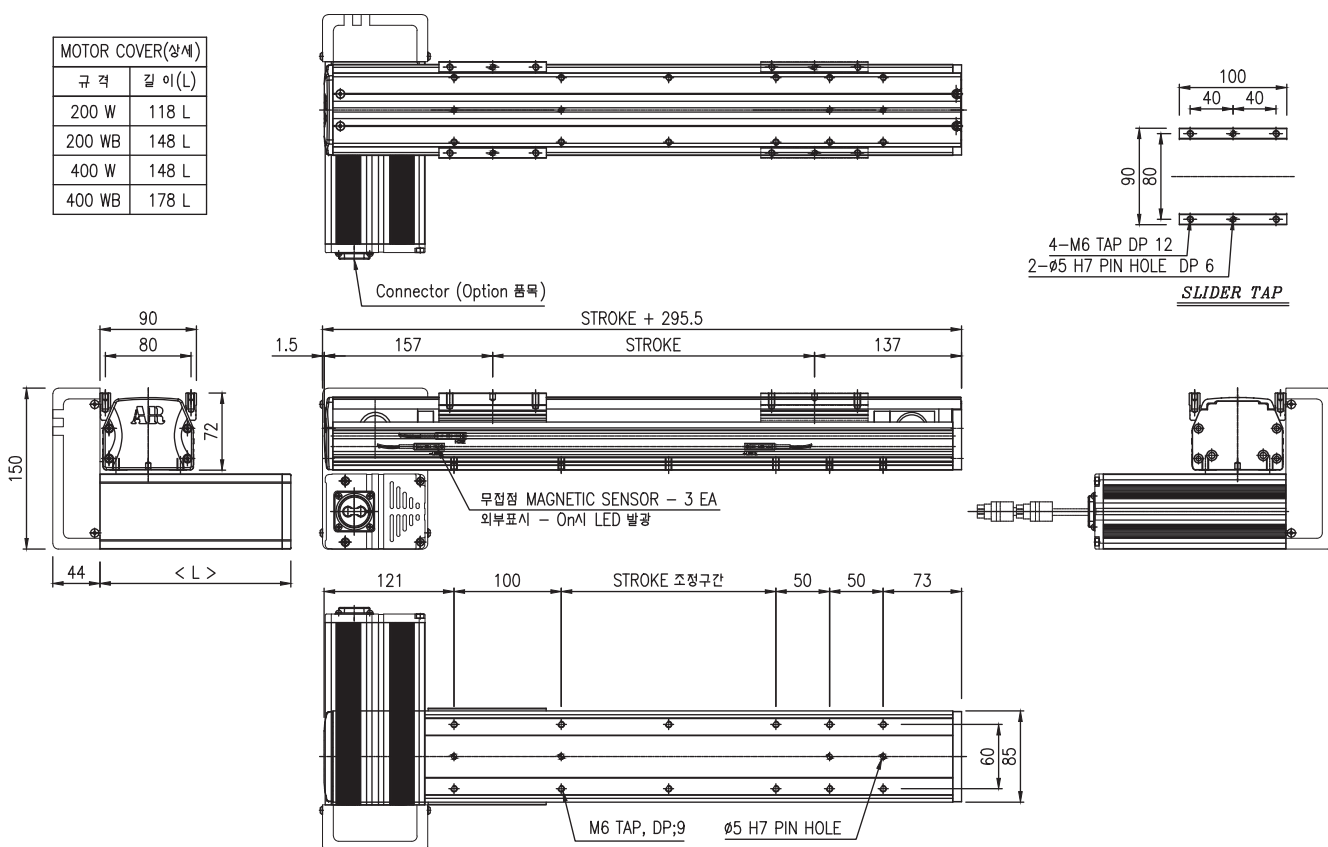
Servo Motor Output/rpm	200w/3000rpm	400w/3000rpm
Drive mechanism	Joint Timing Pulley Drive Pulley & Belt	
Joint Pulley Ratio / rpm	1 : 2 / 1500rpm	
Drive Pulley P.C.D	23.87	
Belt Info.	T5, 25W	
Liner Guide(LM-Guide)	One Way, 42-2UU	
Repeatability(mm)	±0.1	
Payload(kg)	H : 14.2	H : 24.8
Moment of inertia of area	$I_x = 1.65E+05, I_y = 4.84E+05$	



AB-090UL

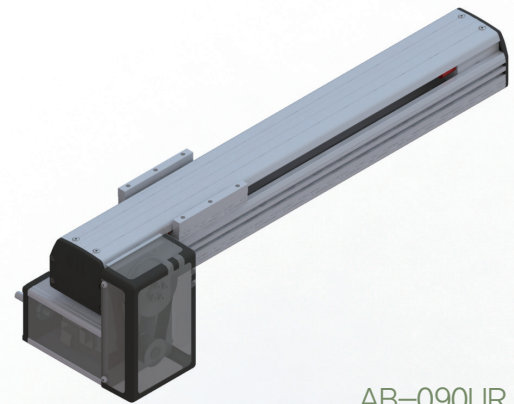
Stroke	1000	1100	1200	1300	1400	1500	1600	1700	1800	1900	2000
Weight(kg)	11.5	12.2	12.9	13.6	14.3	15.9	16.3	17	17.7	18.4	19.1
The weight of the model equipped with a brake is 0.35kg more heavier then this value.											
Base & Slide	Aluminum Profile, 백색전착 유광										

Dimension(mm)



AB-090UR Specification

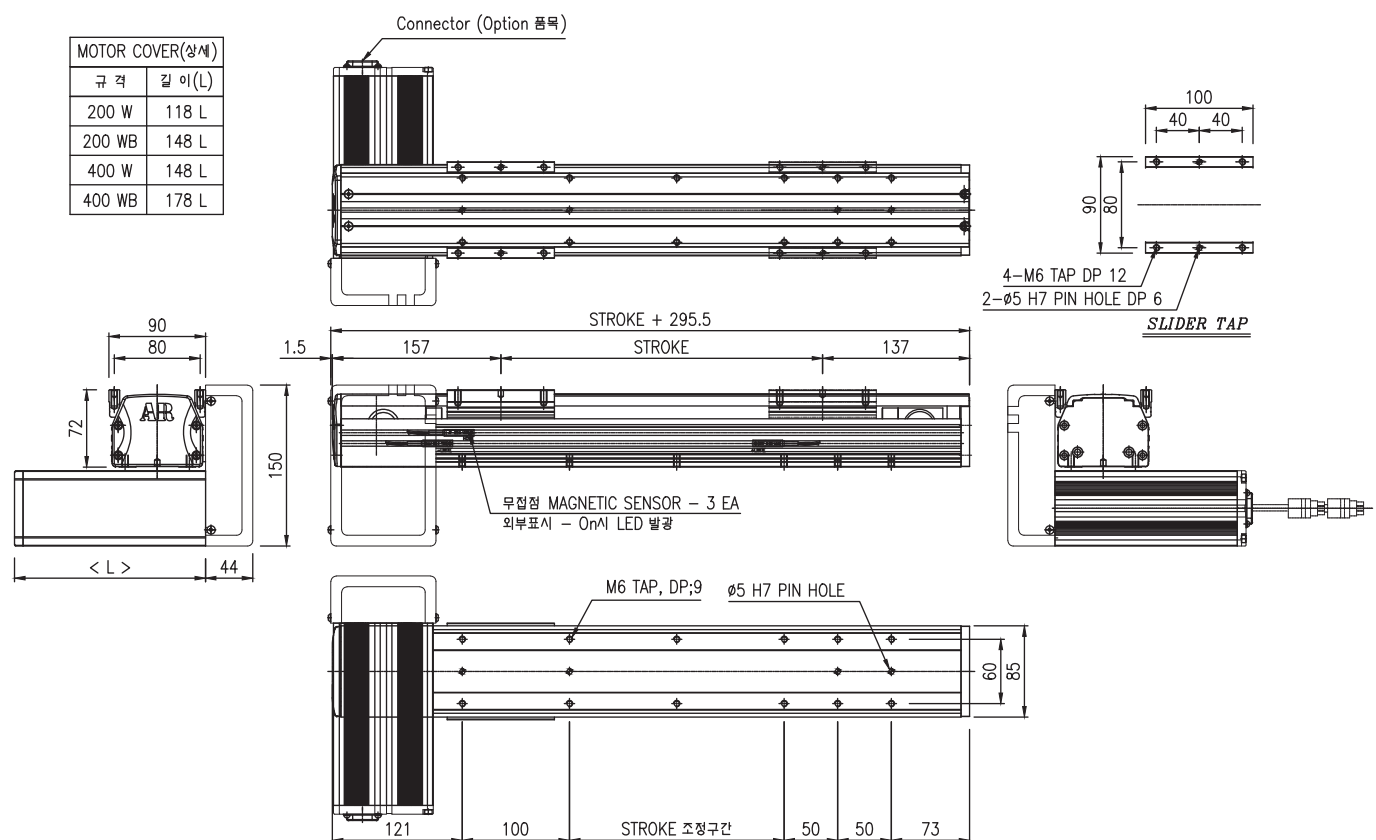
Servo Motor Output/rpm	200w/3000rpm	400w/3000rpm
Drive mechanism	Joint Timing Pulley Drive Pulley & Belt	
Joint Pulley Ratio / rpm	1 : 2 / 1500rpm	
Drive Pulley P.C.D	23.87	
Belt Info.	T5, 25W	
Liner Guide(LM-Guide)	One Way, 42-2UU	
Repeatability(mm)	±0.1	
Payload(kg)	H : 14.2	H : 24.8
Moment of inertia of area	I _x = 1.65E+05, I _y = 4.84E +05	



AB-090UR

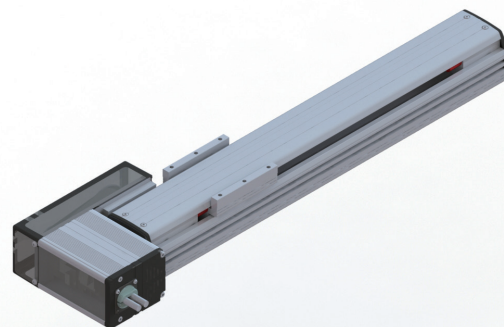
Stroke(mm)	1000	1100	1200	1300	1400	1500	1600	1700	1800	1900	2000
Weight(kg)	11.5	12.2	12.9	13.6	14.3	15.9	16.3	17	17.7	18.4	19.1
	The weight of the model equipped with a brake is 0.35kg more heavier then this value.										
Base & Slide	Aluminum Profile, 백색전착 유광										

Dimension(mm)



AB-090FL Specification

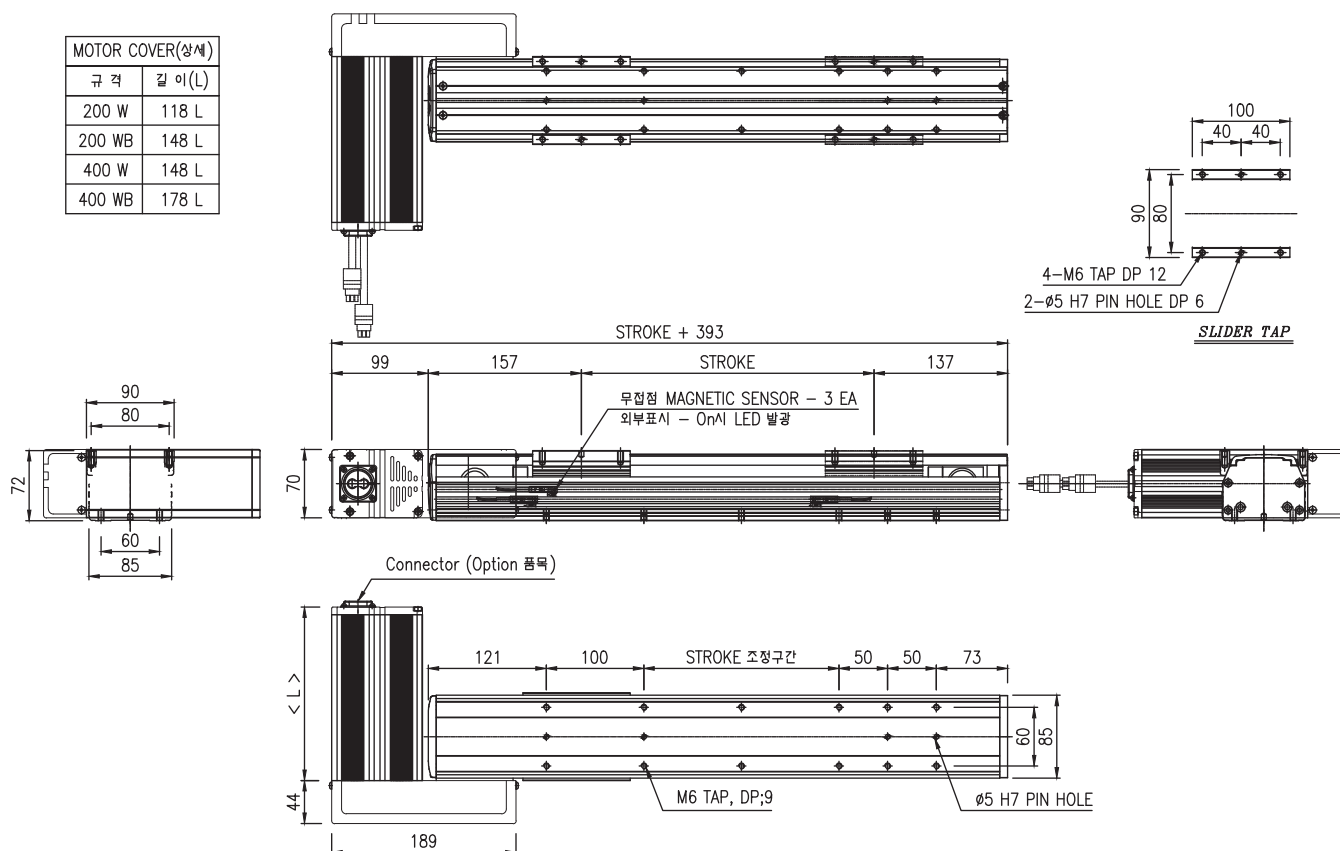
Servo Motor Output/rpm	200w/3000rpm	400w/3000rpm
Drive mechanism	Joint Timing Pulley Drive Pulley & Belt	
Joint Pulley Ratio / rpm	1 : 2 / 1500rpm	
Drive Pulley P.C.D	23.87	
Belt Info.	T5, 25W	
Liner Guide(LM-Guide)	One Way, 42-2UU	
Repeatability(mm)	±0.1	
Payload(kg)	H : 14.2	H : 24.8
Moment of inertia of area	I _x = 1.65E+05, I _y = 4.84E +05	



AB-090FL

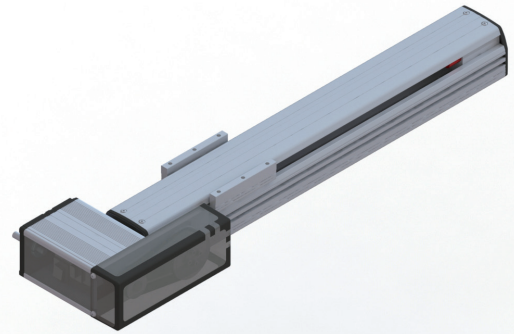
Stroke(mm)	1000	1100	1200	1300	1400	1500	1600	1700	1800	1900	2000
Weight(kg)	11.5	12.2	12.9	13.6	14.3	15.9	16.3	17	17.7	18.4	19.1
The weight of the model equipped with a brake is 0.35kg more heavier then this value.											
Base & Slide	Aluminum Profile, 백색전착 유광										

Dimension(mm)



AB-090FR Specification

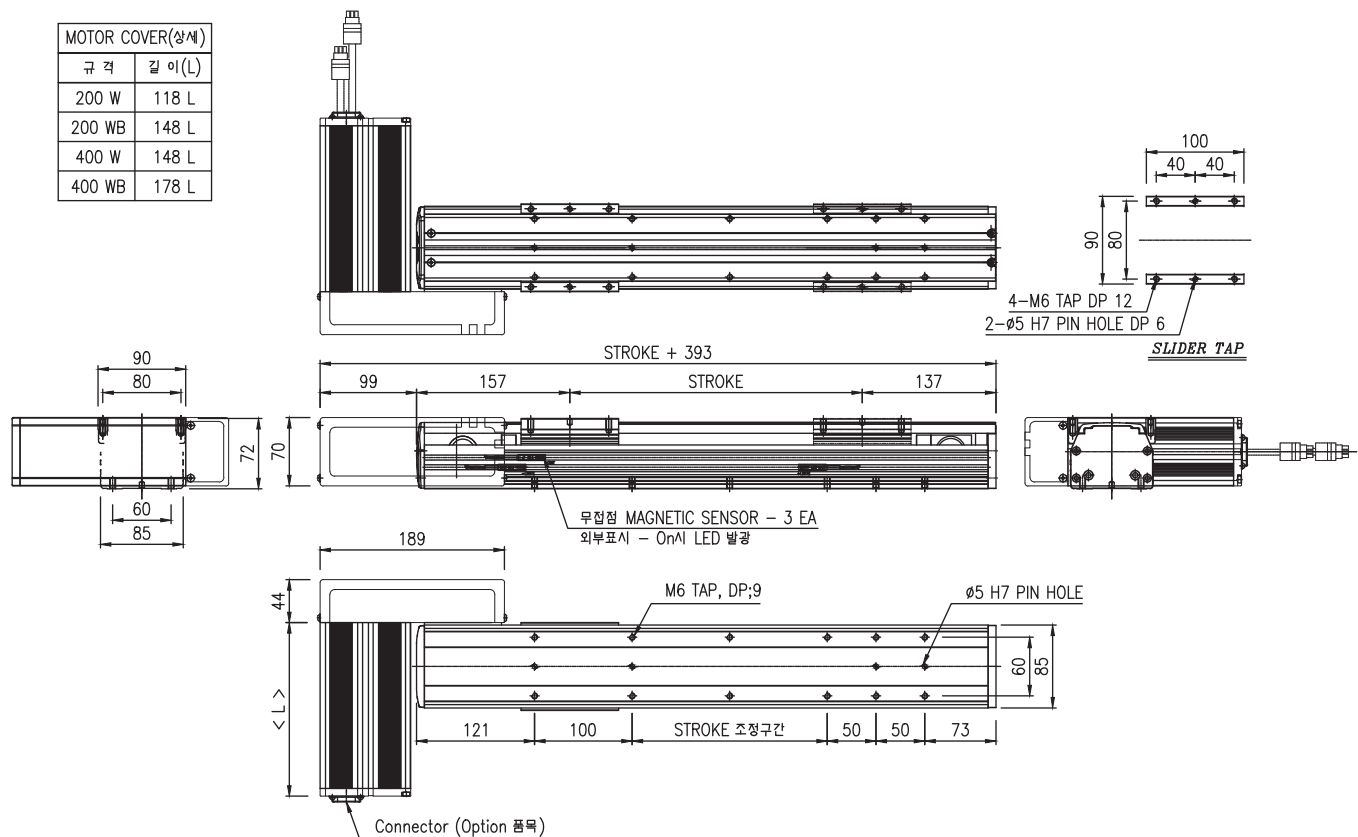
Servo Motor Output/rpm	200w/3000rpm	400w/3000rpm
Drive mechanism	Joint Timing Pulley Drive Pulley & Belt	
Joint Pulley Ratio / rpm	1 : 2 / 1500rpm	
Drive Pulley P.C.D	23.87	
Belt Info.	T5, 25W	
Liner Guide(LM-Guide)	One Way, 42-2UU	
Repeatability(mm)	±0.1	
Payload(kg)	H : 14.2	H : 24.8
Moment of inertia of area	I _x = 1.65E+05, I _y = 4.84E +05	



AB-090FR

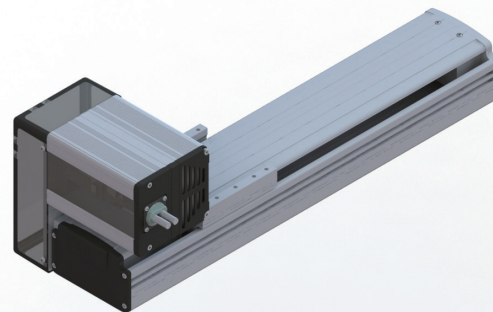
Stroke(mm)	1000	1100	1200	1300	1400	1500	1600	1700	1800	1900	2000
Weight(kg)	11.5	12.2	12.9	13.6	14.3	15.9	16.3	17	17.7	18.4	19.1
	The weight of the model equipped with a brake is 0.35kg more heavier then this value.										
Base & Slide	Aluminum Profile, 백색전착 유광										

Dimension(mm)



AB-120DL Specification

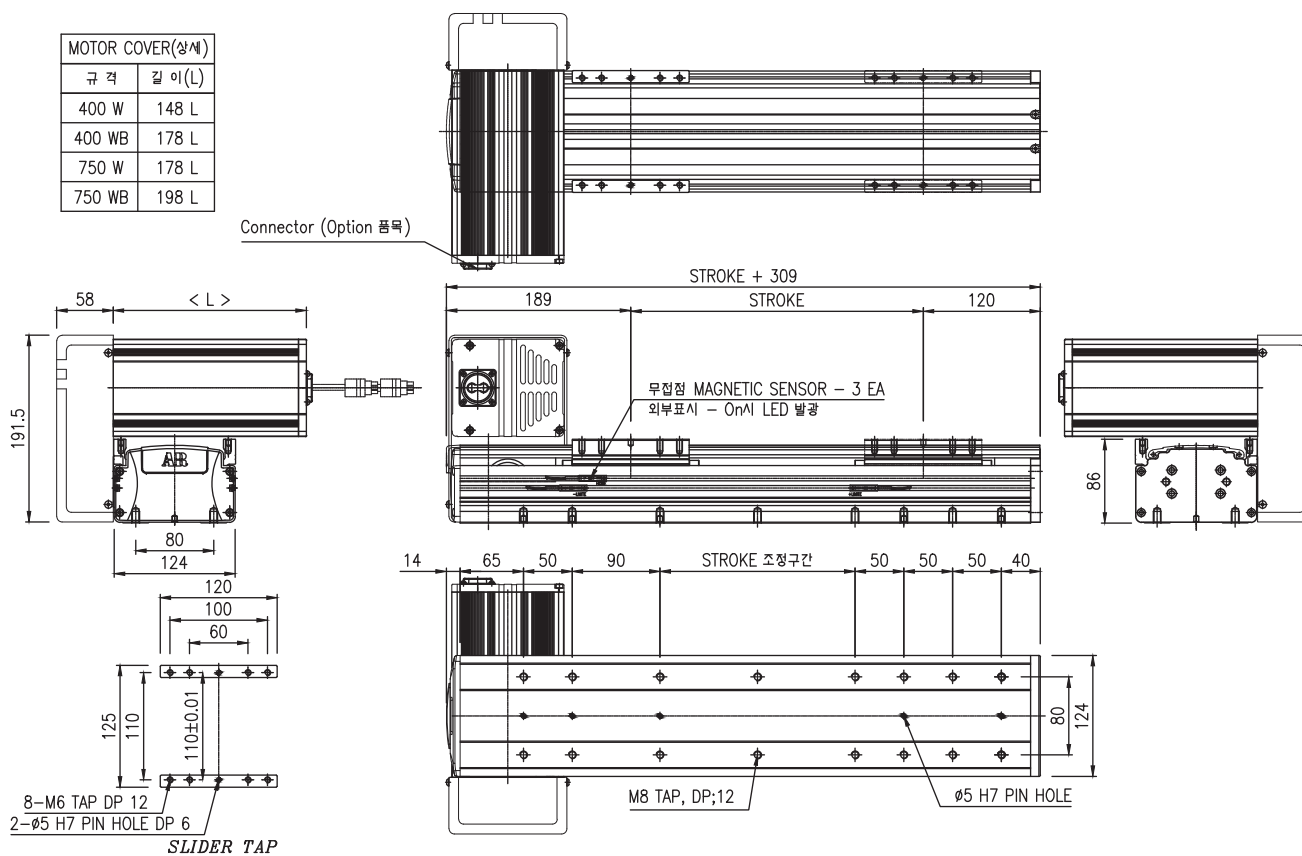
Servo Motor Output/rpm	400w/3000rpm	750w/3000rpm
Drive mechanism	Joint Timing Pulley Drive Pulley & Belt	
Joint Pulley Ratio / rpm	1 : 2.5 / 1200rpm	1 : 2 / 1500rpm
Drive Pulley P.C.D	Ø33.42	
Belt Info.	S5M, 25W	
Liner Guide(LM-Guide)	Two Way, 15W-2UU	
Repeatability(mm)	±0.1	
Payload(kg)	H : 16.7	H : 40.7
Moment of inertia of area	I _x = 4.86E+05, I _y = 4.45E +06	



AB-120DL

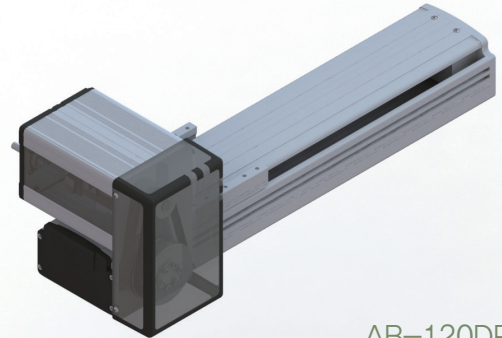
Stroke	1000	1100	1200	1300	1400	1500	1600	1700	1800	1900	2000
Weight(kg)	17.5	18.5	19.5	20.4	21.4	22.4	23.4	25.3	26.3	27.2	28.2
The weight of the model equipped with a brake is 0.61kg more heavier then this value.											
Base & Slide	Aluminum Profile, 백색전착 유광										

Dimension(mm)



AB-120DR Specification

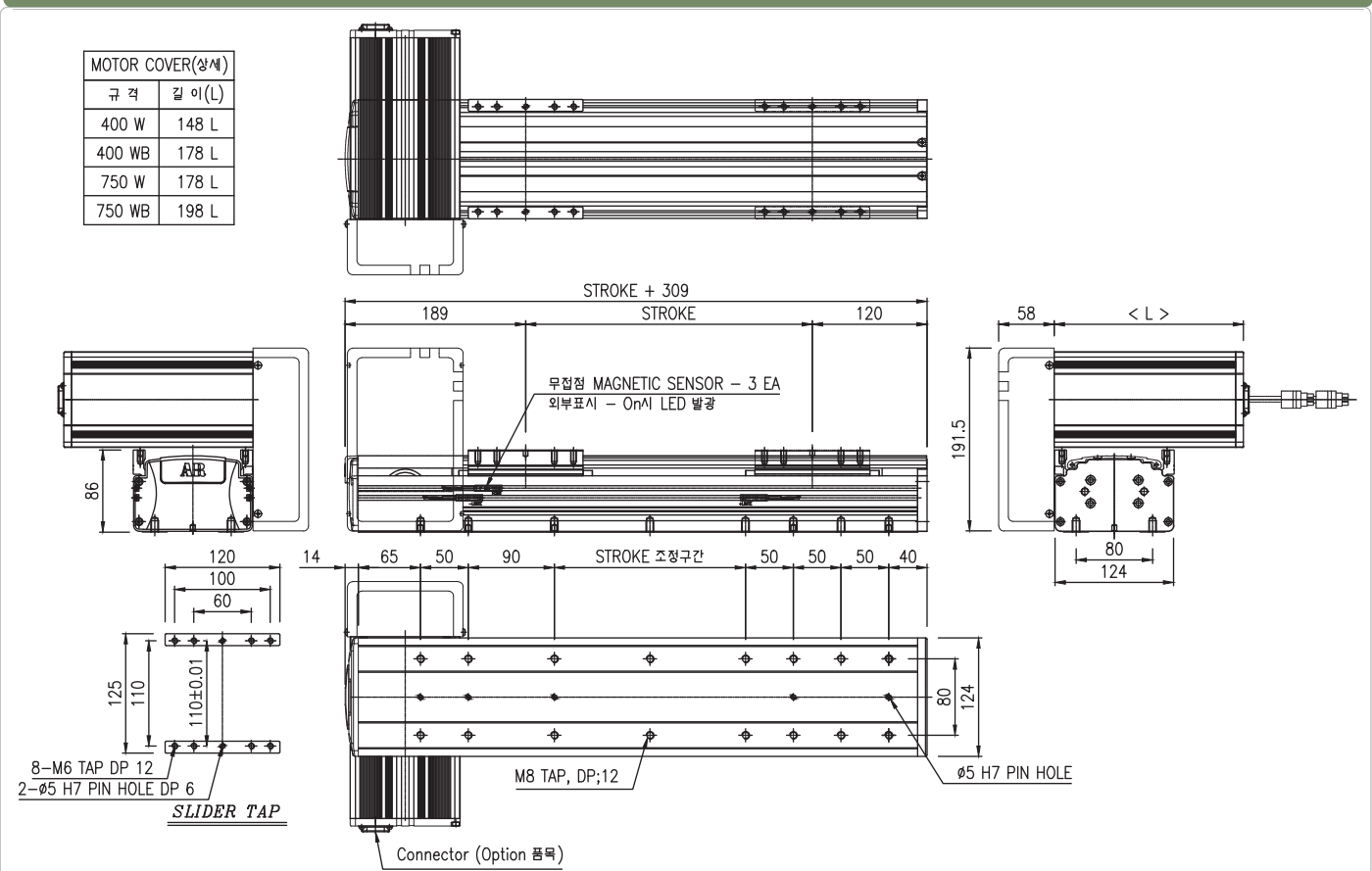
Servo Motor Output/rpm	400w/3000rpm	750w/3000rpm
Drive mechanism	Joint Timing Pulley Drive Pulley & Belt	
Joint Pulley Ratio / rpm	1 : 2.5 / 1200rpm	1 : 2 / 1500rpm
Drive Pulley P.C.D	Ø33.42	
Belt Info.	S5M, 25W	
Liner Guide(LM-Guide)	Two Way, 15W-2UU	
Repeatability(mm)	±0.1	
Payload(kg)	H : 16.7	H : 40.7
Moment of inertia of area	I _x = 4.86E+05, I _y = 4.45E +06	



AB-120DR

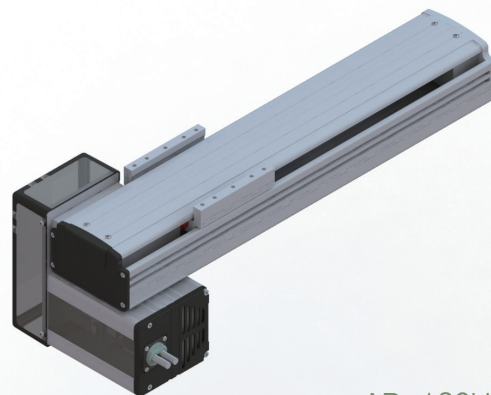
Stroke	1000	1100	1200	1300	1400	1500	1600	1700	1800	1900	2000
Weight(kg)	17.5	18.5	19.5	20.4	21.4	22.4	23.4	25.3	26.3	27.2	28.2
The weight of the model equipped with a brake is 0.61kg more heavier then this value.											
Base & Slide	Aluminum Profile, 백색전착 유광										

Dimension(mm)



AB-120UL Specification

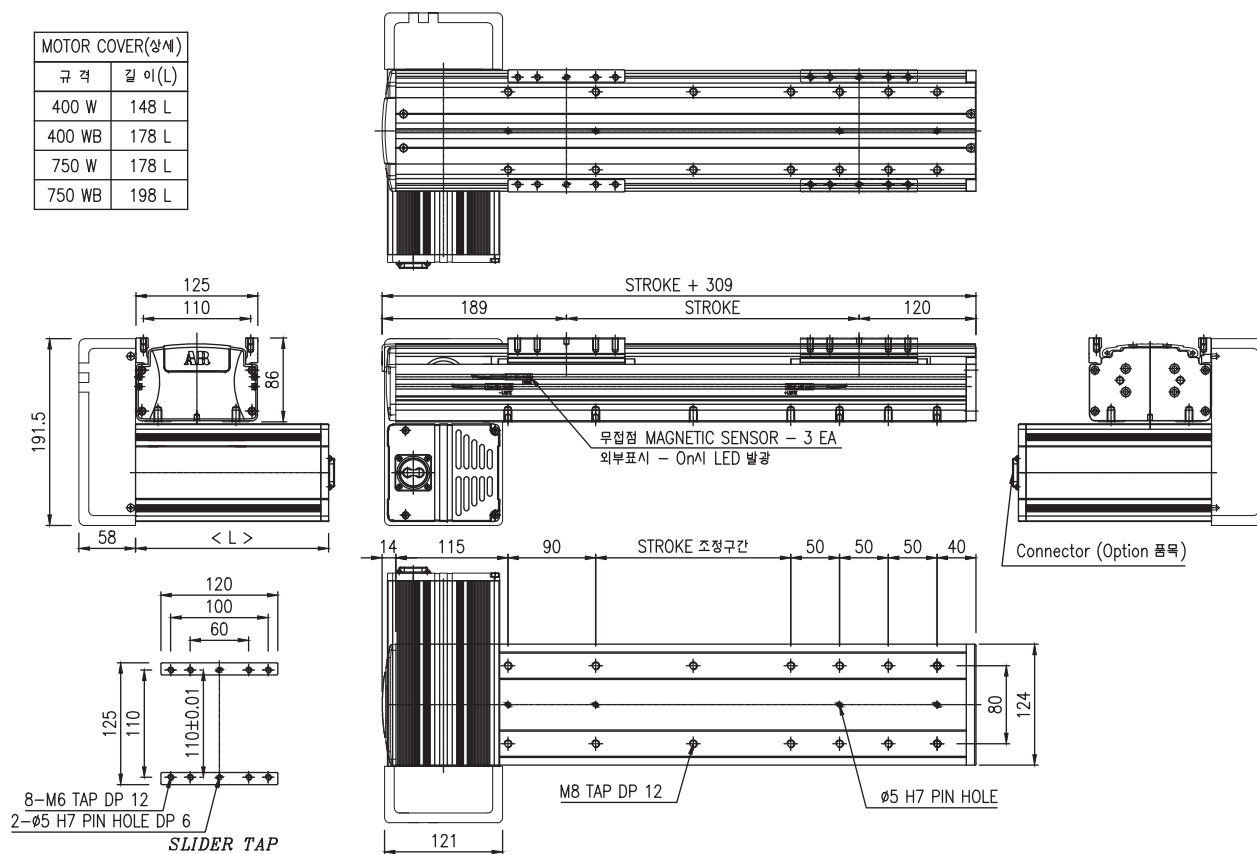
Servo Motor Output/rpm	400w/3000rpm	750w/3000rpm
Drive mechanism	Joint Timing Pulley Drive Pulley & Belt	
Joint Pulley Ratio / rpm	1 : 2.5 / 1200rpm	1 : 2 / 1500rpm
Drive Pulley P.C.D	Ø33.42	
Belt Info.	S5M, 25W	
Liner Guide(LM-Guide)	Two Way, 15W-2UU	
Repeatability(mm)	±0.1	
Payload(kg)	H : 16.7	H : 40.7
Moment of inertia of area	I _x = 4.86E+05, I _y = 4.45E +06	



AB-120UL

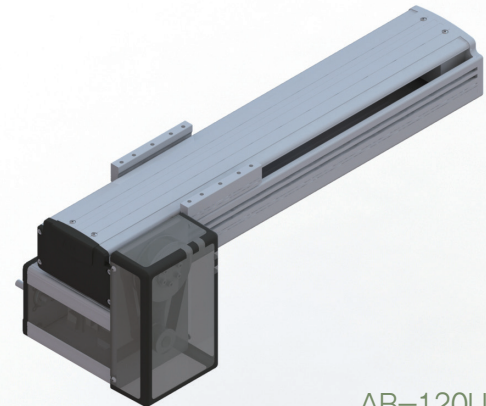
Stroke	1000	1100	1200	1300	1400	1500	1600	1700	1800	1900	2000
Weight(kg)	17.5	18.5	19.5	20.4	21.4	22.4	23.4	25.3	26.3	27.2	28.2
The weight of the model equipped with a brake is 0.61kg more heavier then this value.											
Base & Slide	Aluminum Profile, 백색전착 유광										

Dimension(mm)



AB-120UR Specification

Servo Motor Output/rpm	400w/3000rpm	750w/3000rpm
Drive mechanism	Joint Timing Pulley Drive Pulley & Belt	
Joint Pulley Ratio / rpm	1 : 2.5 / 1200rpm	1 : 2 / 1500rpm
Drive Pulley P.C.D	Ø33.42	
Belt Info.	S5M, 25W	
Liner Guide(LM-Guide)	Two Way, 15W-2UU	
Repeatability(mm)	±0.1	
Payload(kg)	H : 16.7	H : 40.7
Moment of inertia of area	I _x = 4.86E+05, I _y = 4.45E +06	

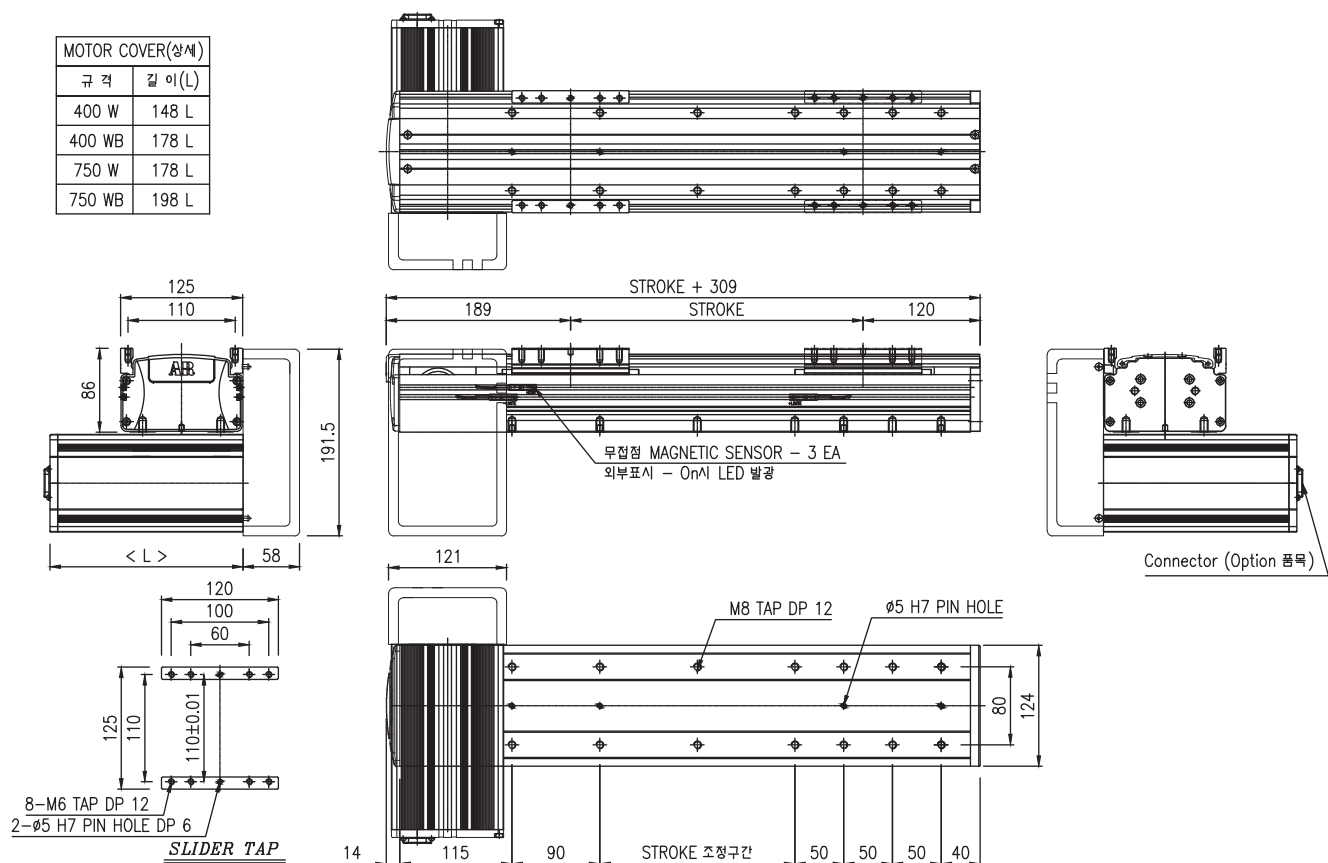


AB-120UR

Stroke	1000	1100	1200	1300	1400	1500	1600	1700	1800	1900	2000
Weight(kg)	17.5	18.5	19.5	20.4	21.4	22.4	23.4	25.3	26.3	27.2	28.2
The weight of the model equipped with a brake is 0.61kg more heavier then this value.											
Base & Slide	Aluminum Profile, 백색전착 유광										

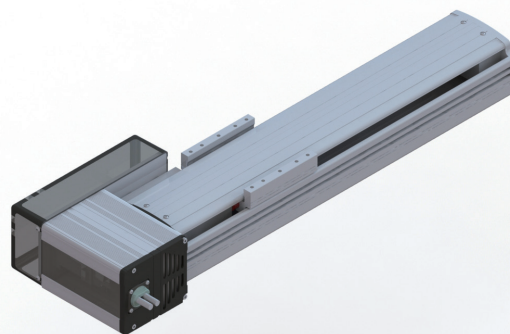
Dimension(mm)

MOTOR COVER(상세)	
규격	길이(L)
400 W	148 L
400 WB	178 L
750 W	178 L
750 WB	198 L



AB-120FL Specification

Servo Motor Output/rpm	400w/3000rpm	750w/3000rpm
Drive mechanism	Joint Timing Pulley Drive Pulley & Belt	
Joint Pulley Ratio / rpm	1 : 2.5 / 1200rpm	1 : 2 / 1500rpm
Drive Pulley P.C.D	Ø33.42	
Belt Info.	S5M, 25W	
Liner Guide(LM-Guide)	Two Way, 15W-2UU	
Repeatability(mm)	±0.1	
Payload(kg)	H : 16.7	H : 40.7
Moment of inertia of area	I _x = 4.86E+05, I _y = 4.45E +06	

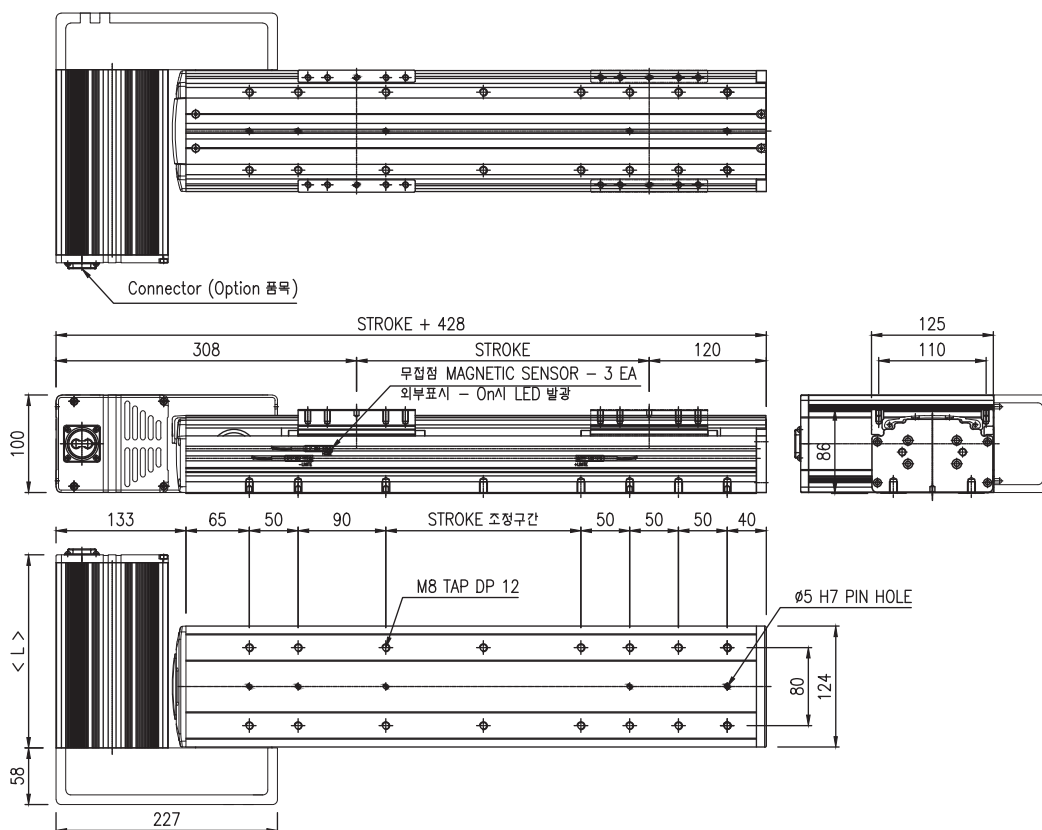


AB-120FL

Stroke	1000	1100	1200	1300	1400	1500	1600	1700	1800	1900	2000
Weight(kg)	17.5	18.5	19.5	20.4	21.4	22.4	23.4	25.3	26.3	27.2	28.2
The weight of the model equipped with a brake is 0.61kg more heavier then this value.											
Base & Slide	Aluminum Profile, 백색전착 유광										

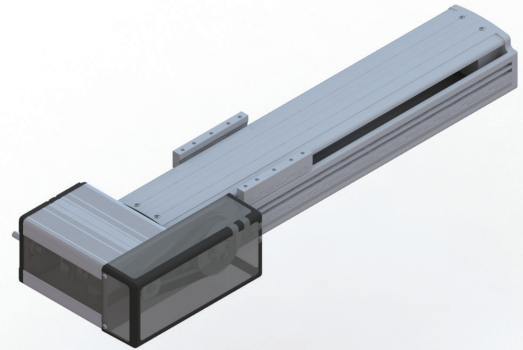
Dimension(mm)

MOTOR COVER(상세)	길이(L)
400 W	148 L
400 WB	178 L
750 W	178 L
750 WB	198 L



AB-120FR Specification

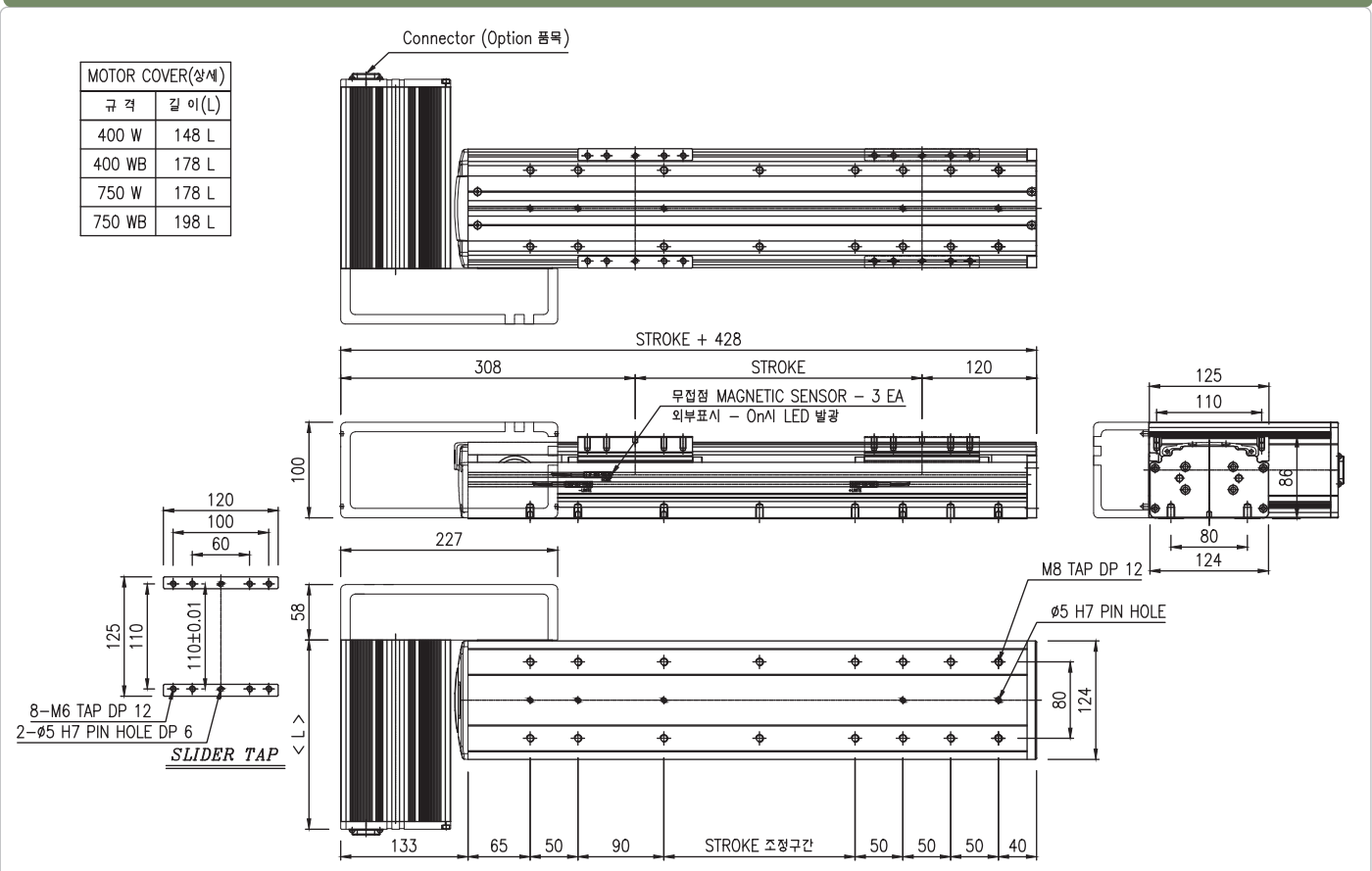
Servo Motor Output/rpm	400w/3000rpm	750w/3000rpm
Drive mechanism	Joint Timing Pulley Drive Pulley & Belt	
Joint Pulley Ratio / rpm	1 : 2.5 / 1200rpm	1 : 2 / 1500rpm
Drive Pulley P.C.D	Ø33.42	
Belt Info.	S5M, 25W	
Liner Guide(LM-Guide)	Two Way, 15W-2UU	
Repeatability(mm)	±0.1	
Payload(kg)	H : 16.7	H : 40.7
Moment of inertia of area	I _x = 4.86E+05, I _y = 4.45E +06	



AB-120FR

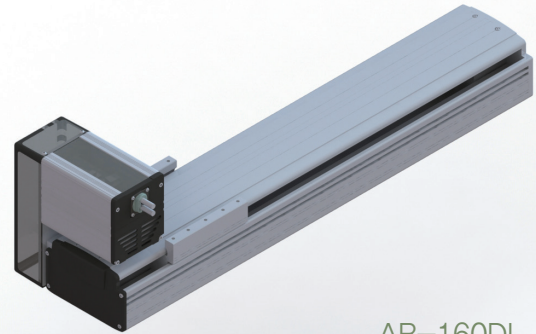
Stroke	1000	1100	1200	1300	1400	1500	1600	1700	1800	1900	2000
Weight(kg)	17.5	18.5	19.5	20.4	21.4	22.4	23.4	25.3	26.3	27.2	28.2
The weight of the model equipped with a brake is 0.61kg more heavier then this value.											
Base & Slide	Aluminum Profile, 백색전착 유광										

Dimension(mm)



AB-160DL Specification

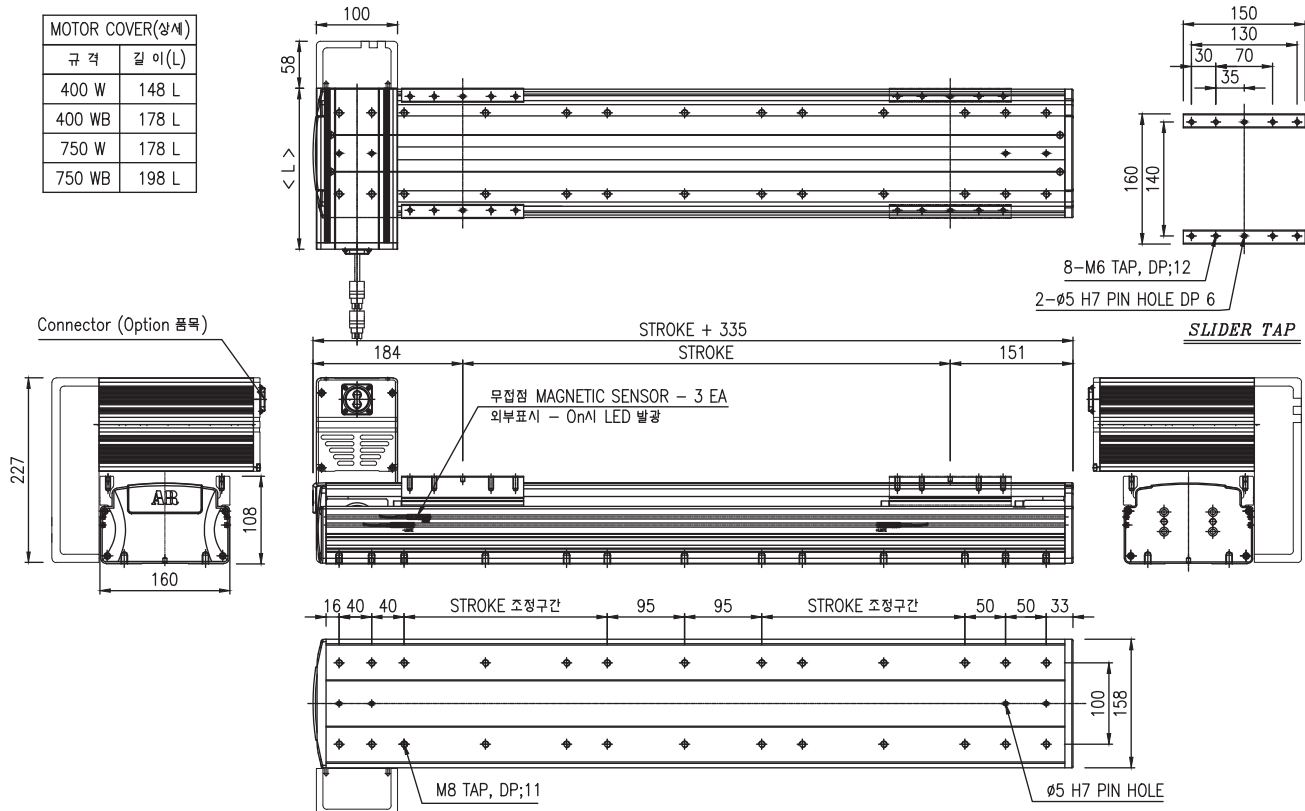
Servo Motor Output/rpm	400w/3000rpm	750w/3000rpm
Drive mechanism	Joint Timing Pulley Drive Pulley & Belt	
Joint Pulley Ratio / rpm	1 : 2.5 / 1200rpm	
Drive Pulley P.C.D	Ø33.42	
Belt Info.	S5M, 30W	
Liner Guide(LM-Guide)	Two Way, 20W-2UU	
Repeatability(mm)	±0.1	
Payload(kg)	H : 17.4	H : 45.5
Moment of inertia of area	I _x = 9.38E+05, I _y = 1.05E +07	



AB-160DL

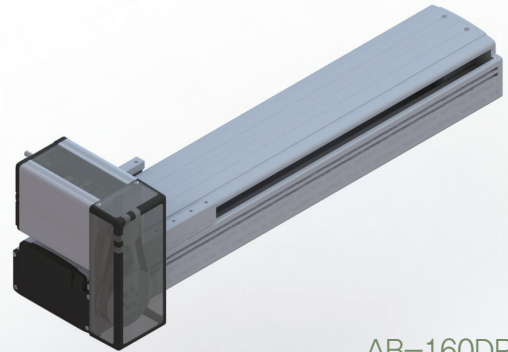
Stroke	1000	1100	1200	1300	1400	1500	1600	1700	1800	1900	2000
Weight(kg)	26.2	27.6	29.1	30.6	32	33.6	35.1	36.6	38.1	41.1	42.6
The weight of the model equipped with a brake is 0.61kg more heavier then this value.											
Base & Slide	Aluminum Profile, 백색전착 유광										

Dimension(mm)



AB-160DR Specification

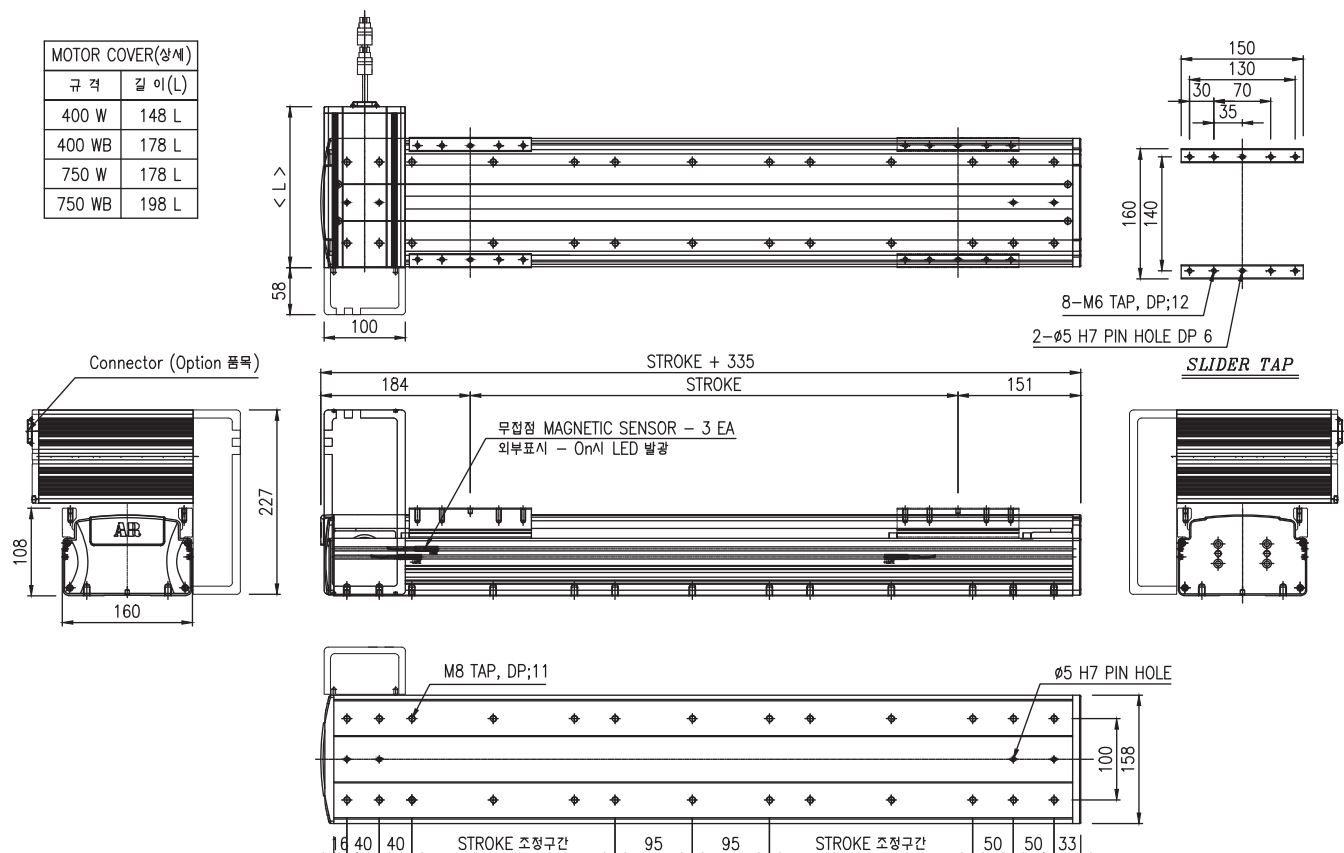
Servo Motor Output/rpm	400w/3000rpm	750w/3000rpm
Drive mechanism	Joint Timing Pulley Drive Pulley & Belt	
Joint Pulley Ratio / rpm	1 : 2.5 / 1200rpm	
Drive Pulley P.C.D	Ø33.42	
Belt Info.	S5M, 30W	
Liner Guide(LM-Guide)	Two Way, 20W-2UU	
Repeatability(mm)	±0.1	
Payload(kg)	H : 17.4	H : 45.5
Moment of inertia of area	I _x = 9.38E+05, I _y = 1.05E +07	



AB-160DR

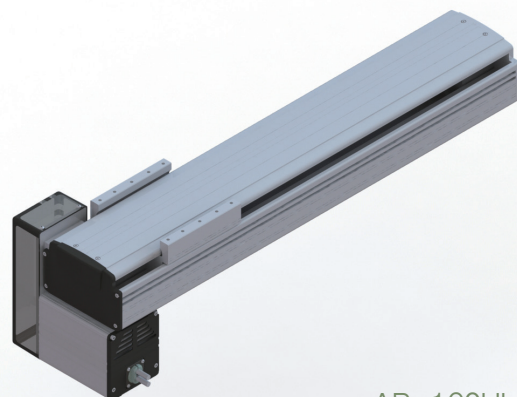
Stroke	1000	1100	1200	1300	1400	1500	1600	1700	1800	1900	2000
Weight(kg)	26.2	27.6	29.1	30.6	32	33.6	35.1	36.6	38.1	41.1	42.6
The weight of the model equipped with a brake is 0.61kg more heavier then this value.											
Base & Slide	Aluminum Profile, 백색전착 유광										

Dimension(mm)



AB-160UL Specification

Servo Motor Output/rpm	400w/3000rpm	750w/3000rpm
Drive mechanism	Joint Timing Pulley Drive Pulley & Belt	
Joint Pulley Ratio / rpm	1 : 2.5 / 1200rpm	
Drive Pulley P.C.D	Ø33.42	
Belt Info.	S5M, 30W	
Liner Guide(LM-Guide)	Two Way, 20W-2UU	
Repeatability(mm)	±0.1	
Payload(kg)	H : 17.4	H : 45.5
Moment of inertia of area	I _x = 9.38E+05, I _y = 1.05E +07	

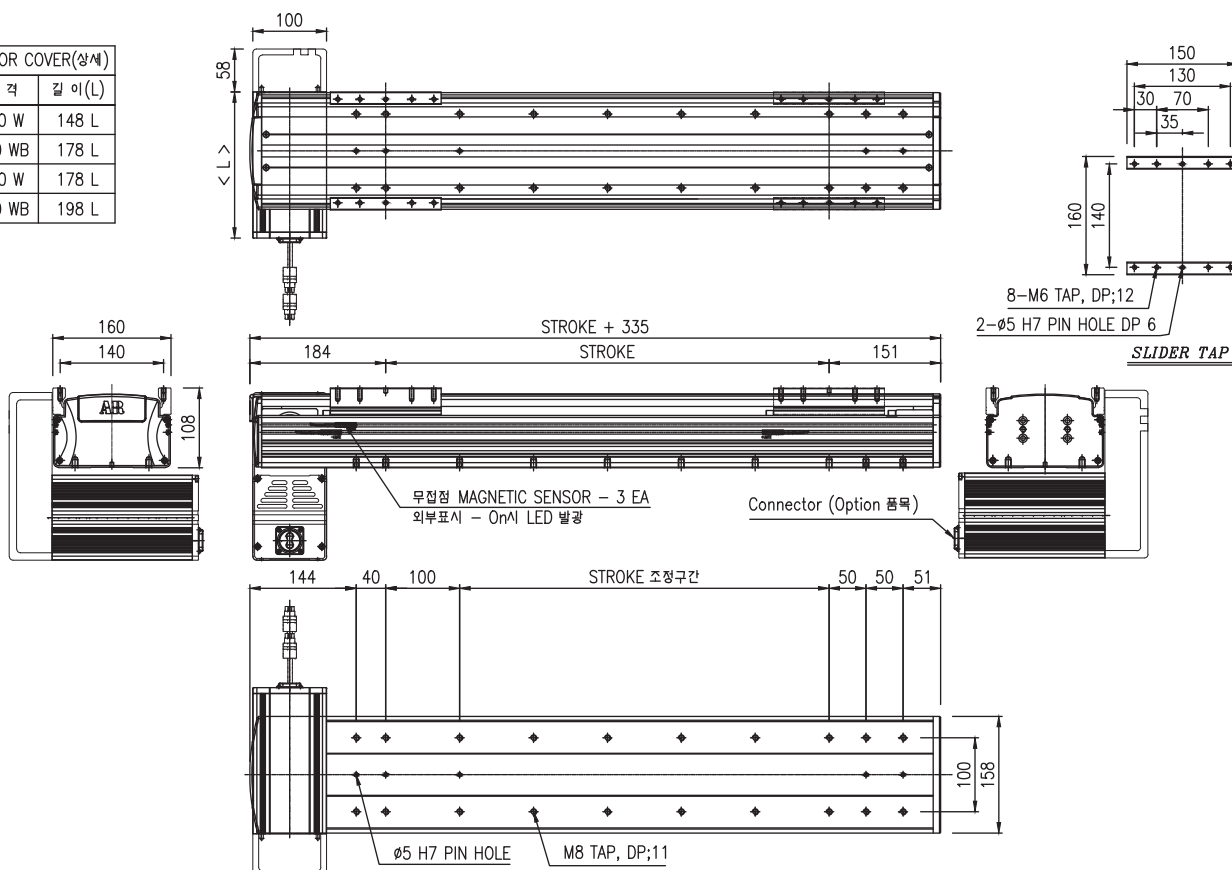


AB-160UL

Stroke	1000	1100	1200	1300	1400	1500	1600	1700	1800	1900	2000
Weight(kg)	26.2	27.6	29.1	30.6	32	33.6	35.1	36.6	38.1	41.1	42.6
The weight of the model equipped with a brake is 0.61kg more heavier then this value.											
Base & Slide	Aluminum Profile, 백색전착 유광										

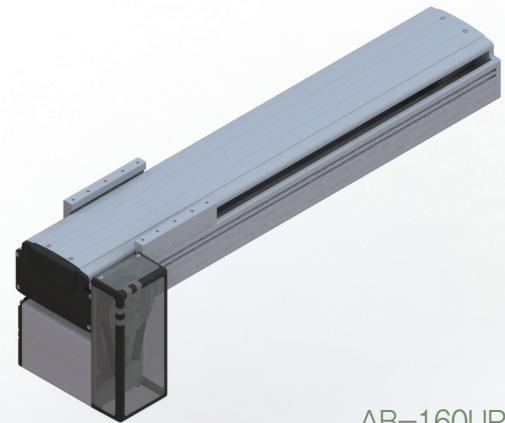
Dimension(mm)

MOTOR COVER(상세)	
규격	길이(L)
400 W	148 L
400 WB	178 L
750 W	178 L
750 WB	198 L



AB-160UR Specification

Servo Motor Output/rpm	400w/3000rpm	750w/3000rpm
Drive mechanism	Joint Timing Pulley Drive Pulley & Belt	
Joint Pulley Ratio / rpm	1 : 2.5 / 1200rpm	
Drive Pulley P.C.D	Ø33.42	
Belt Info.	S5M, 30W	
Liner Guide(LM-Guide)	Two Way, 20W-2UU	
Repeatability(mm)	±0.1	
Payload(kg)	H : 17.4	H : 45.5
Moment of inertia of area	I _x = 9.38E+05, I _y = 1.05E +07	

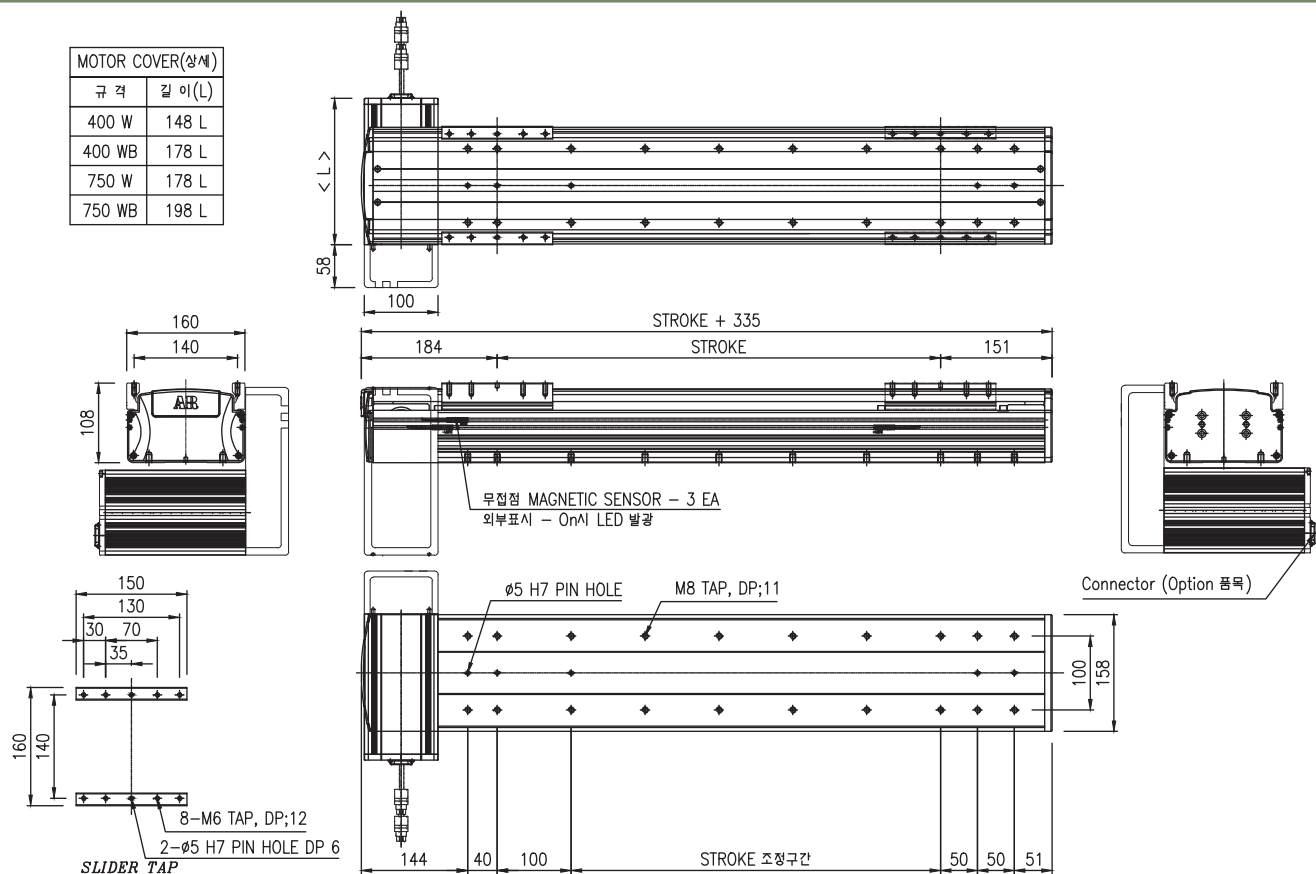


AB-160UR

Stroke	1000	1100	1200	1300	1400	1500	1600	1700	1800	1900	2000
Weight(kg)	26.2	27.6	29.1	30.6	32	33.6	35.1	36.6	38.1	41.1	42.6
The weight of the model equipped with a brake is 0.61kg more heavier then this value.											
Base & Slide	Aluminum Profile, 백색전착 유광										

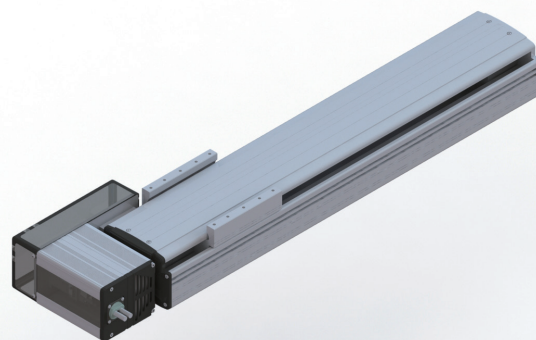
Dimension(mm)

MOTOR COVER(상세)	
규격	길이(L)
400 W	148 L
400 WB	178 L
750 W	178 L
750 WB	198 L



AB-160FL Specification

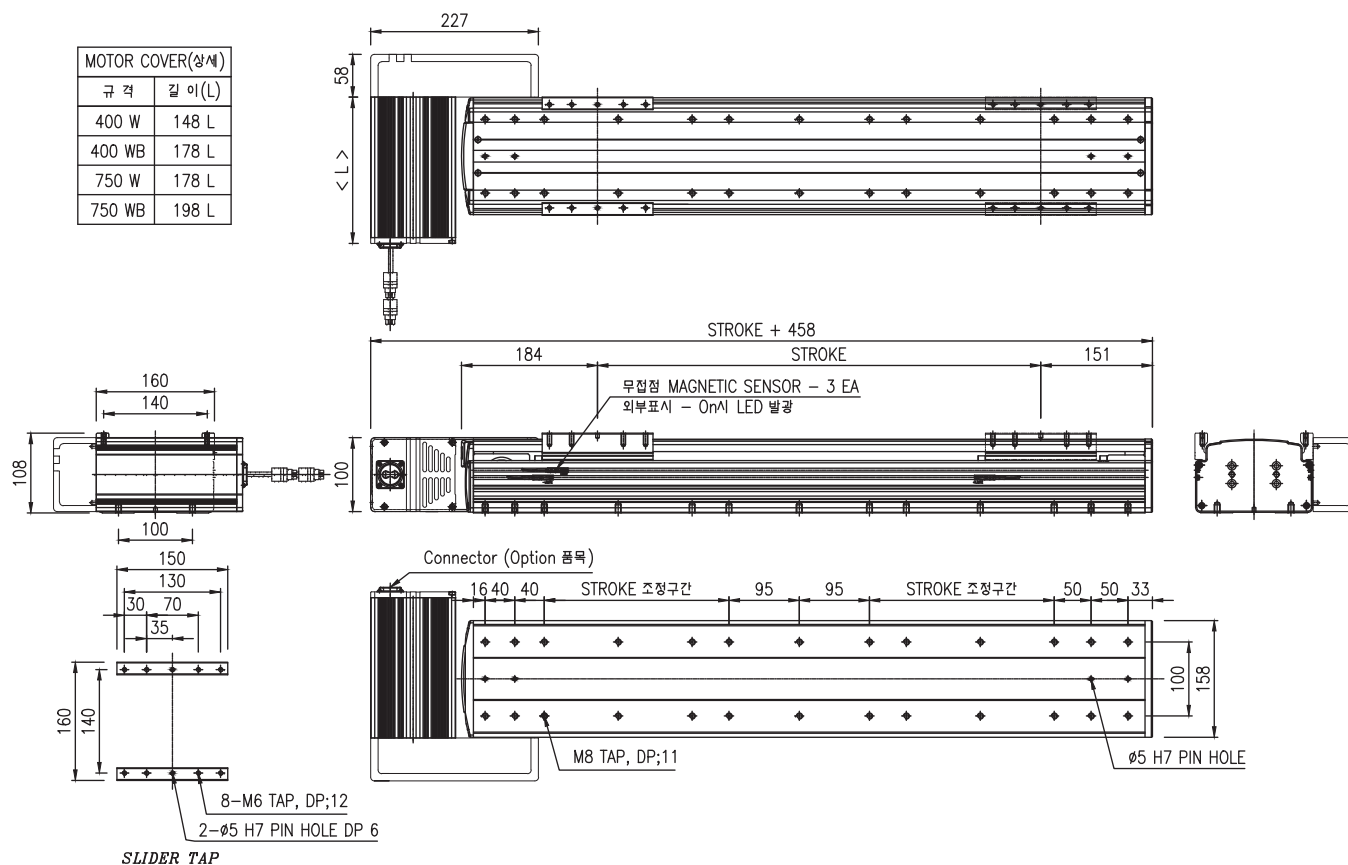
Servo Motor Output/rpm	400w/3000rpm	750w/3000rpm
Drive mechanism	Joint Timing Pulley Drive Pulley & Belt	
Joint Pulley Ratio / rpm	1 : 2.5 / 1200rpm	
Drive Pulley P.C.D	Ø33.42	
Belt Info.	S5M, 30W	
Liner Guide(LM-Guide)	Two Way, 20W-2UU	
Repeatability(mm)	±0.1	
Payload(kg)	H : 17.4	H : 45.5
Moment of inertia of area	I _x = 9.38E+05, I _y = 1.05E +07	



AB-160FL

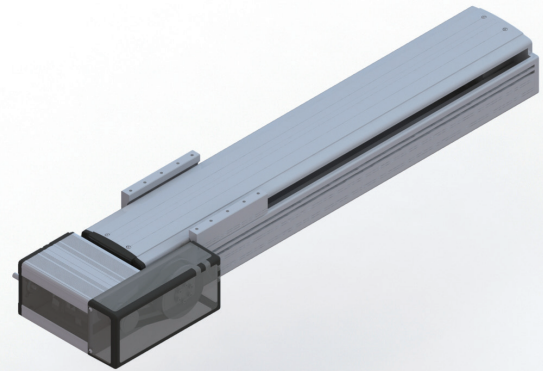
Stroke	1000	1100	1200	1300	1400	1500	1600	1700	1800	1900	2000
Weight(kg)	26.2	27.6	29.1	30.6	32	33.6	35.1	36.6	38.1	41.1	42.6
The weight of the model equipped with a brake is 0.61kg more heavier then this value.											
Base & Slide	Aluminum Profile, 백색전착 유광										

Dimension(mm)



AB-160FR Specification

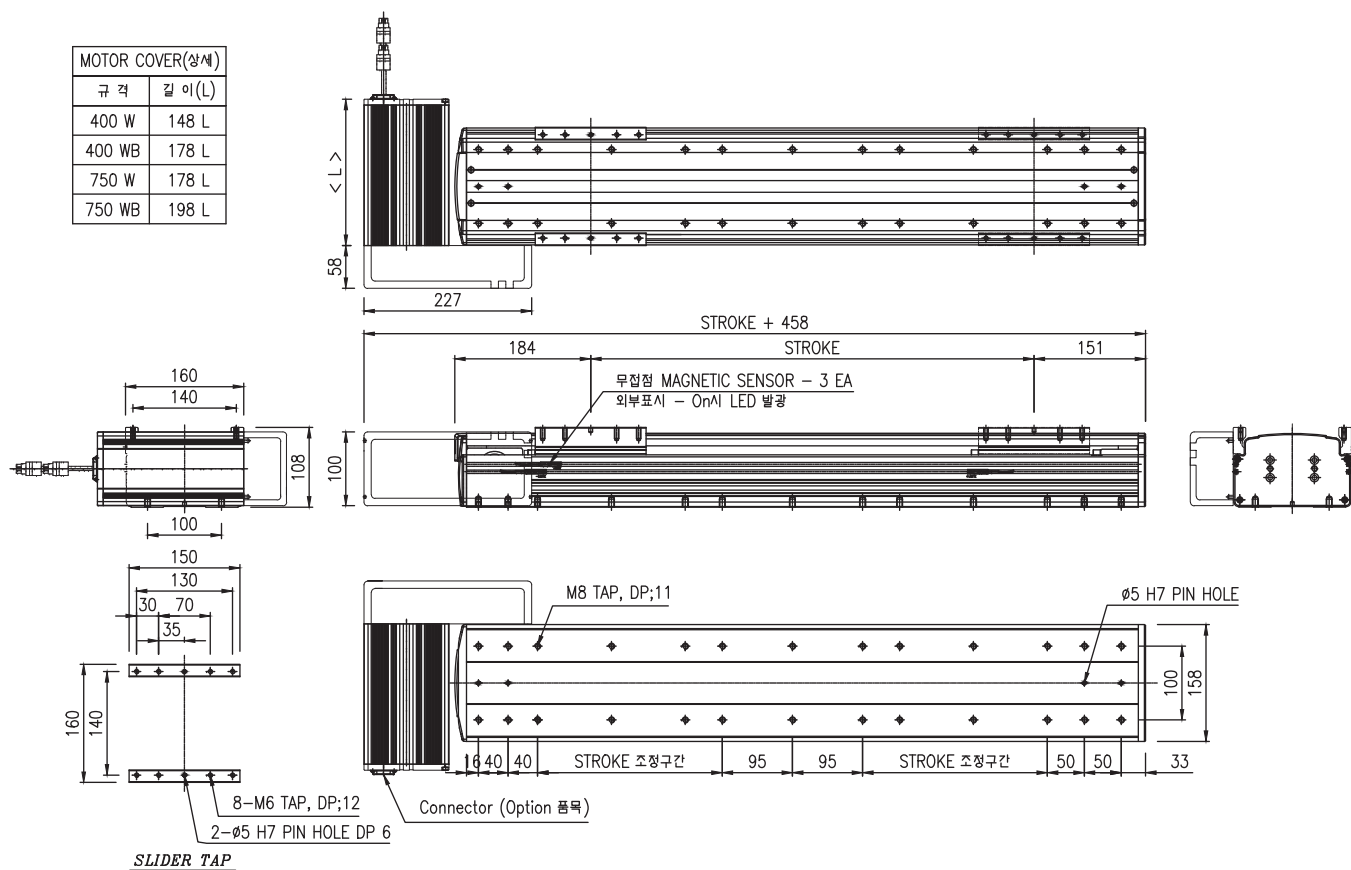
Servo Motor Output/rpm	400w/3000rpm	750w/3000rpm
Drive mechanism	Joint Timing Pulley Drive Pulley & Belt	
Joint Pulley Ratio / rpm	1 : 2.5 / 1200rpm	
Drive Pulley P.C.D	Ø33.42	
Belt Info.	S5M, 30W	
Liner Guide(LM-Guide)	Two Way, 20W-2UU	
Repeatability(mm)	±0.1	
Payload(kg)	H : 17.4	H : 45.5
Moment of inertia of area	I _x = 9.38E+05, I _y = 1.05E +07	



AB-160FR

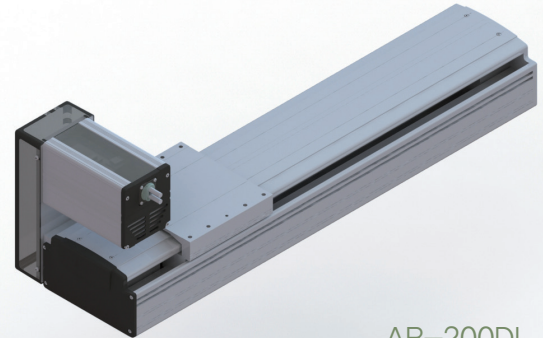
Stroke	1000	1100	1200	1300	1400	1500	1600	1700	1800	1900	2000
Weight(kg)	26.2	27.6	29.1	30.6	32	33.6	35.1	36.6	38.1	41.1	42.6
The weight of the model equipped with a brake is 0.61kg more heavier then this value.											
Base & Slide	Aluminum Profile, 백색전착 유광										

Dimension(mm)



AB-200DL Specification

Servo Motor Output/rpm	400w/3000rpm	750w/3000rpm
Drive mechanism	Joint Timing Pulley Drive Pulley & Belt	
Joint Pulley Ratio / rpm	1 : 3 / 1000rpm	
Drive Pulley P.C.D	42.97	
Belt Info.	S5M, 50W	
Liner Guide(LM-Guide)	Two Way, 25W-2UU	
Repeatability(mm)	±0.1	
Payload(kg)	H : 23.6	H : 31.5
Moment of inertia of area	I _x = 1.79E+06, I _y = 2.63E +07	

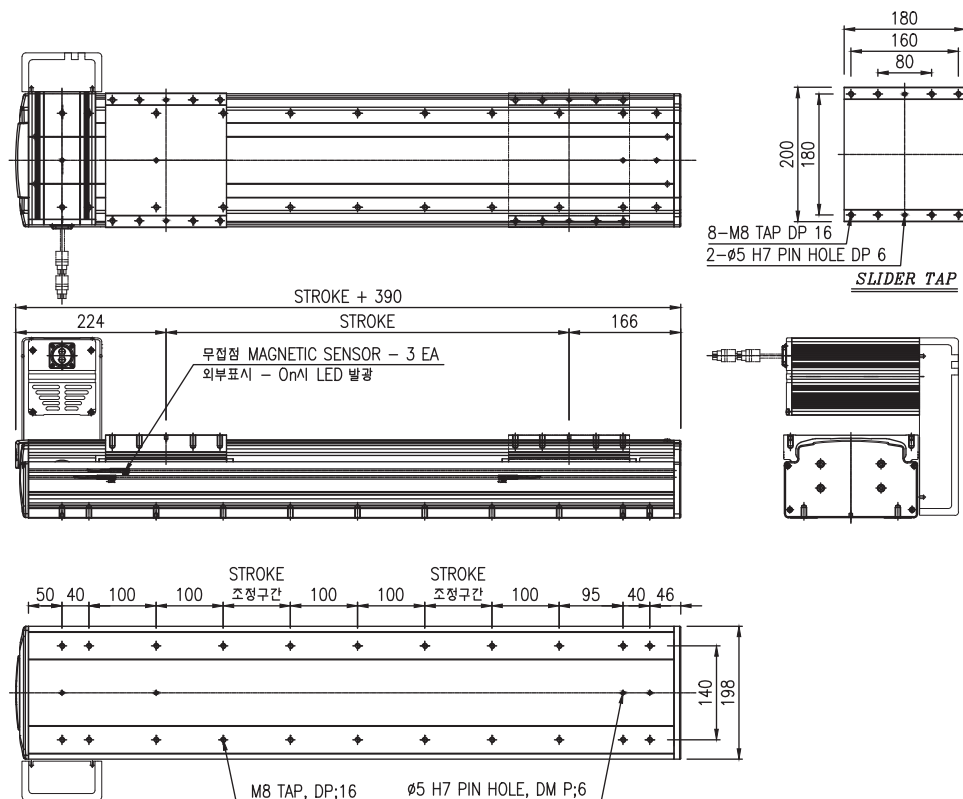
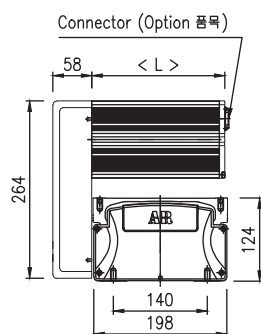


AB-200DL

Stroke	1000	1100	1200	1300	1400	1500	1600	1700	1800	1900	2000
Weight(kg)	45	47.3	49.6	51.9	54.2	56.5	58.8	61.1	63.4	65.7	68
The weight of the model equipped with a brake is 0.35kg more heavier then this value.											
Base & Slide	Aluminum Profile, 백색전착 유광										

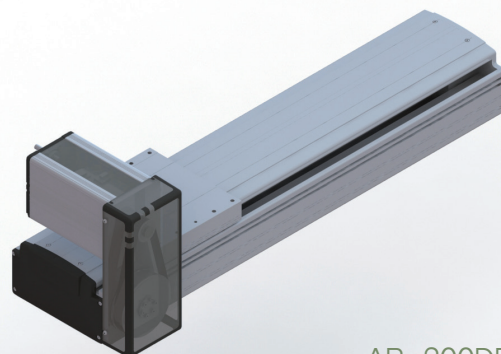
Dimension(mm)

MOTOR COVER(상세)	
규격	길이(L)
400W	148 L
400WB	178 L
750W	178 L
750WB	198 L



AB-200DR Specification

Servo Motor Output/rpm	400w/3000rpm	750w/3000rpm
Drive mechanism	Joint Timing Pulley Drive Pulley & Belt	
Joint Pulley Ratio / rpm	1 : 3 / 1000rpm	
Drive Pulley P.C.D	42.97	
Belt Info.	S5M, 50W	
Liner Guide(LM-Guide)	Two Way, 25W-2UU	
Repeatability(mm)	±0.1	
Payload(kg)	H : 23.6	H : 31.5
Moment of inertia of area	I _x = 1.79E+06, I _y = 2.63E +07	

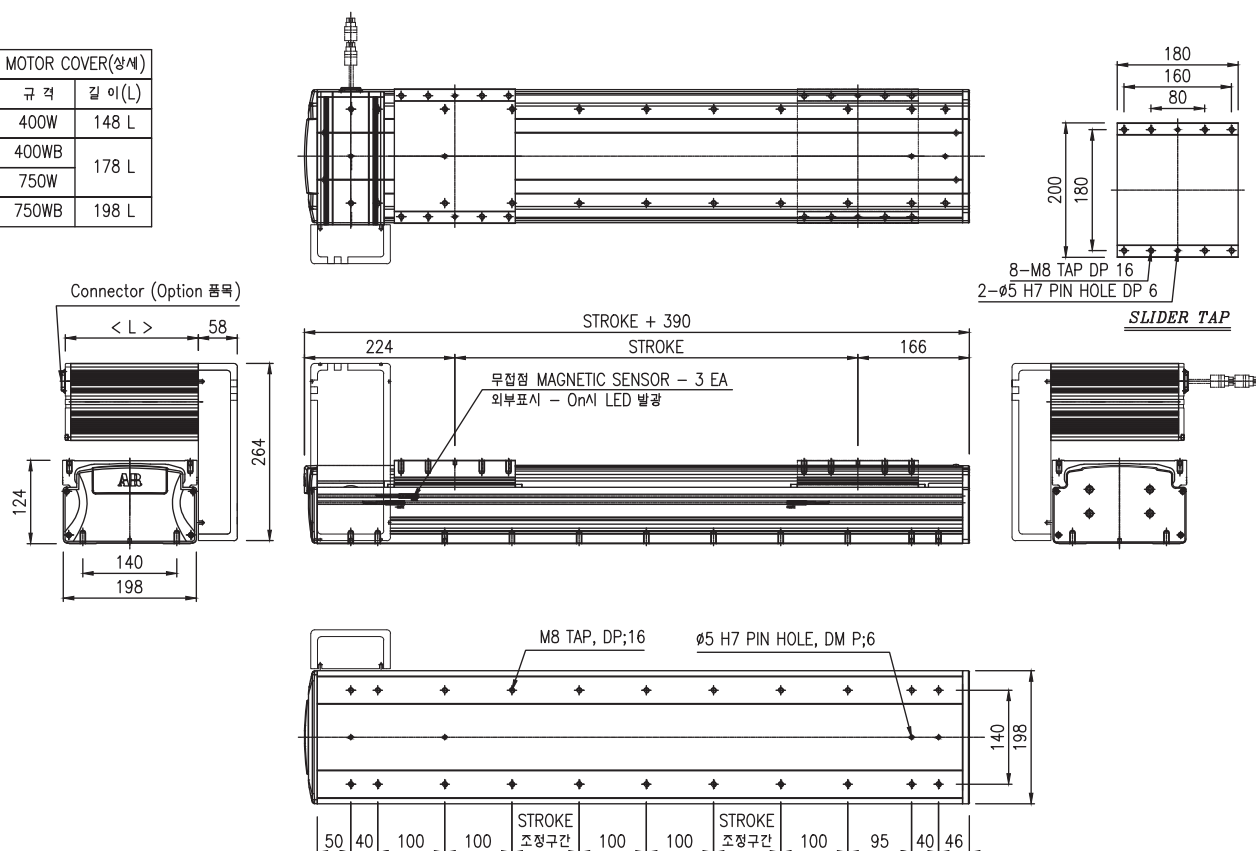


AB-200DR

Stroke	1000	1100	1200	1300	1400	1500	1600	1700	1800	1900	2000
Weight(kg)	45	47.3	49.6	51.9	54.2	56.5	58.8	61.1	63.4	65.7	68
The weight of the model equipped with a brake is 0.35kg more heavier then this value.											
Base & Slide	Aluminum Profile, 백색전착 유광										

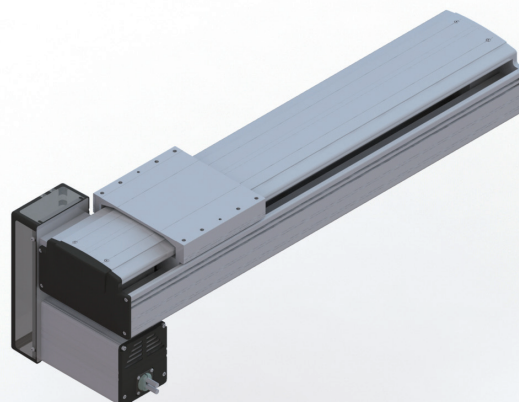
Dimension(mm)

MOTOR COVER(상세)	
규격	길이(L)
400W	148 L
400WB	178 L
750W	178 L
750WB	198 L



AB-200UL Specification

Servo Motor Output/rpm	400w/3000rpm	750w/3000rpm
Drive mechanism	Joint Timing Pulley Drive Pulley & Belt	
Joint Pulley Ratio / rpm	1 : 3 / 1000rpm	
Drive Pulley P.C.D	42.97	
Belt Info.	S5M, 50W	
Liner Guide(LM-Guide)	Two Way, 25W-2UU	
Repeatability(mm)	±0.1	
Payload(kg)	H : 23.6	H : 31.5
Moment of inertia of area	$I_x = 1.79E+06, I_y = 2.63E+07$	

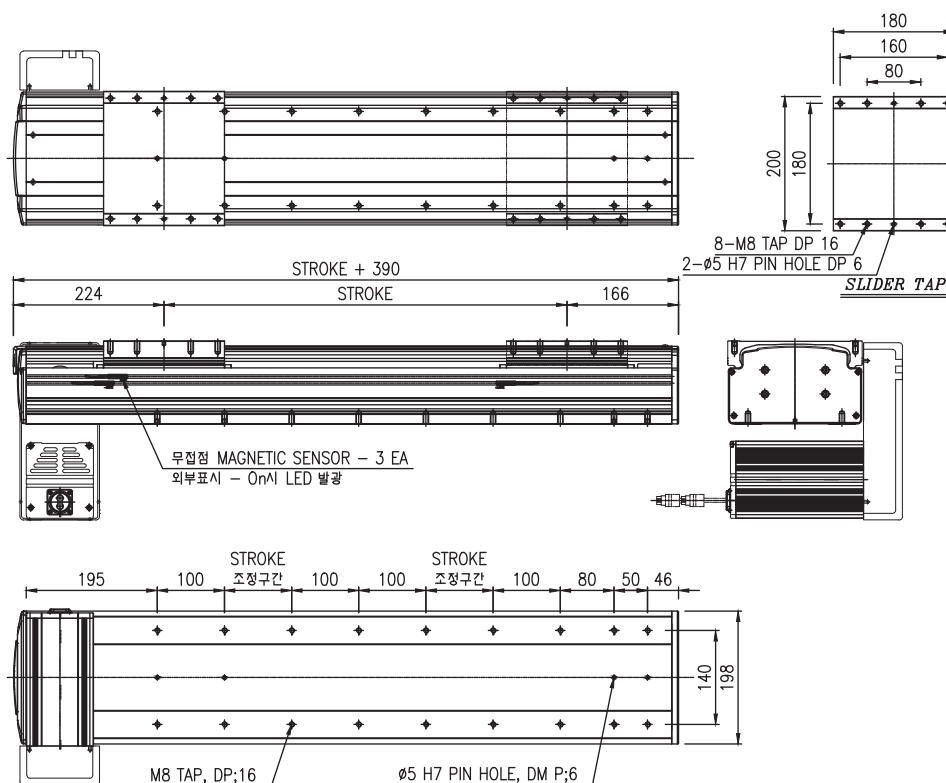
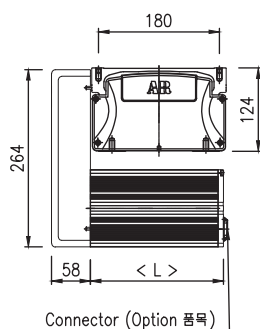


AB-200UL

Stroke	1000	1100	1200	1300	1400	1500	1600	1700	1800	1900	2000
Weight(kg)	45	47.3	49.6	51.9	54.2	56.5	58.8	61.1	63.4	65.7	68
The weight of the model equipped with a brake is 0.35kg more heavier then this value.											
Base & Slide	Aluminum Profile, 백색전착 유광										

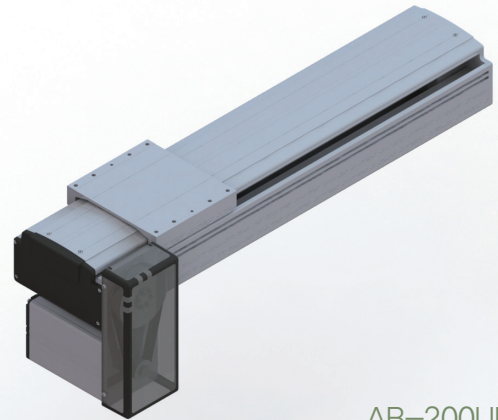
Dimension(mm)

MOTOR COVER(상세)	
규격	길이(L)
400W	148 L
400WB	178 L
750W	178 L
750WB	198 L



AB-200UR Specification

Servo Motor Output/rpm	400w/3000rpm	750w/3000rpm
Drive mechanism	Joint Timing Pulley Drive Pulley & Belt	
Joint Pulley Ratio / rpm	1 : 3 / 1000rpm	
Drive Pulley P.C.D	42.97	
Belt Info.	S5M, 50W	
Liner Guide(LM-Guide)	Two Way, 25W-2UU	
Repeatability(mm)	±0.1	
Payload(kg)	H : 23.6	H : 31.5
Moment of inertia of area	I _x = 1.79E+06, I _y = 2.63E +07	

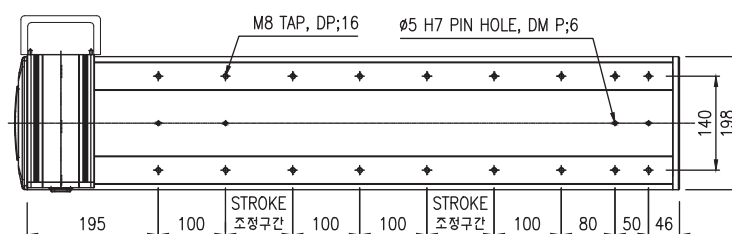
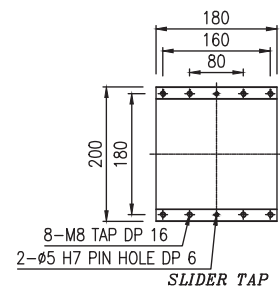
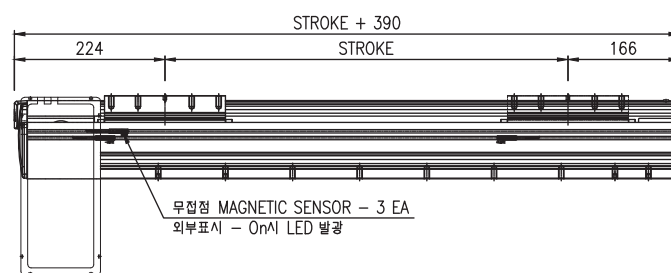
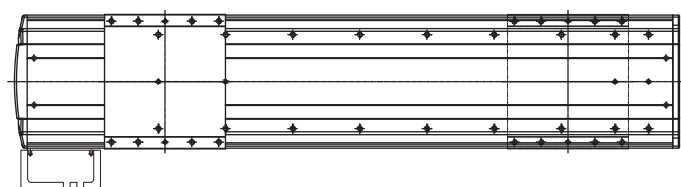
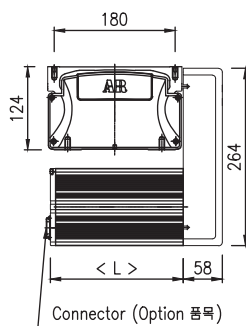


AB-200UR

Stroke	1000	1100	1200	1300	1400	1500	1600	1700	1800	1900	2000
Weight(kg)	45	47.3	49.6	51.9	54.2	56.5	58.8	61.1	63.4	65.7	68
The weight of the model equipped with a brake is 0.35kg more heavier then this value.											
Base & Slide	Aluminum Profile, 백색전착 유광										

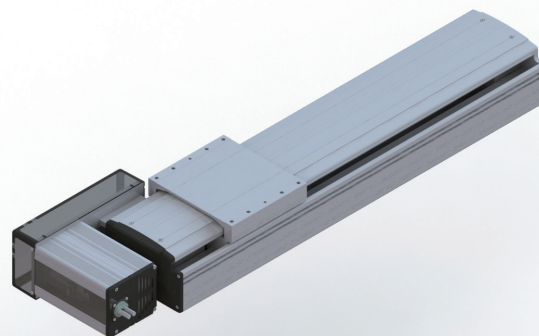
Dimension(mm)

MOTOR COVER(상세)	
규격	길이(L)
400W	148 L
400WB	178 L
750W	178 L
750WB	198 L



AB-200FL Specification

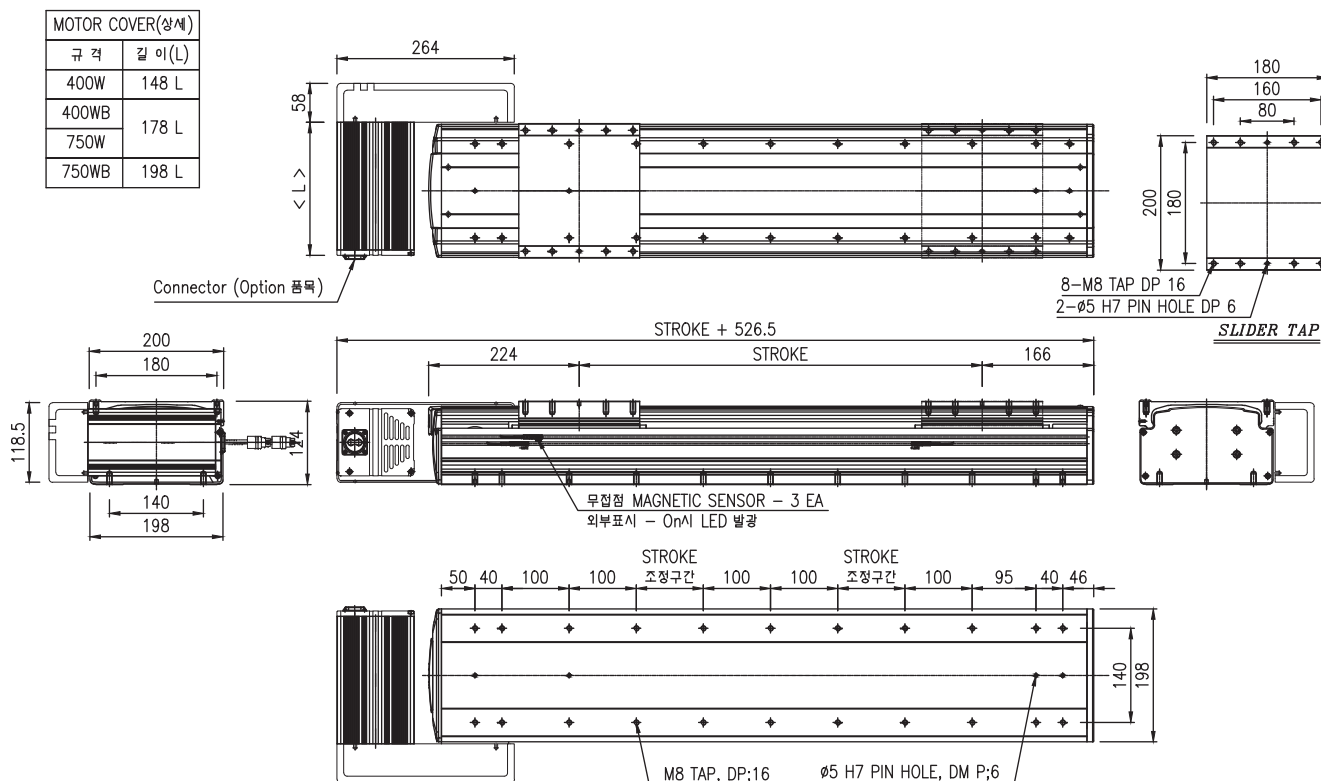
Servo Motor Output/rpm	400w/3000rpm	750w/3000rpm
Drive mechanism	Joint Timing Pulley Drive Pulley & Belt	
Joint Pulley Ratio / rpm	1 : 3 / 1000rpm	
Drive Pulley P.C.D	42.97	
Belt Info.	S5M, 50W	
Liner Guide(LM-Guide)	Two Way, 25W-2UU	
Repeatability(mm)	±0.1	
Payload(kg)	H : 23.6	H : 31.5
Moment of inertia of area	I _x = 1.79E+06, I _y = 2.63E +07	

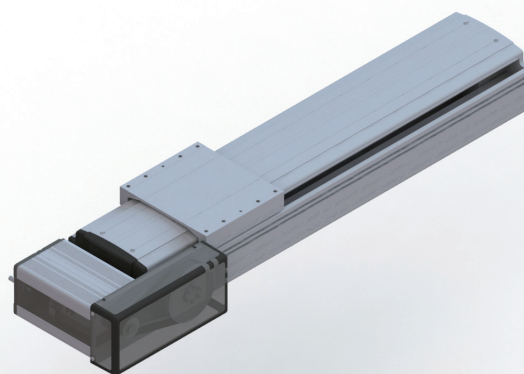


AB-200FL

Stroke	1000	1100	1200	1300	1400	1500	1600	1700	1800	1900	2000
Weight(kg)	45	47.3	49.6	51.9	54.2	56.5	58.8	61.1	63.4	65.7	68
The weight of the model equipped with a brake is 0.35kg more heavier then this value.											
Base & Slide	Aluminum Profile, 백색전착 유광										

Dimension(mm)





AB-200FR

AB-SERIES

CONTENTS

INTRO

AS-SERIES

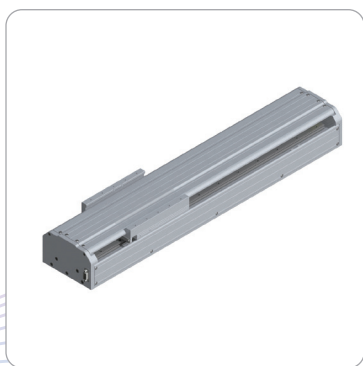
ACS-SERIES

AB-SERIES

AL-SERIES

AC-COMBINATION

AL-SERIES



AL-150



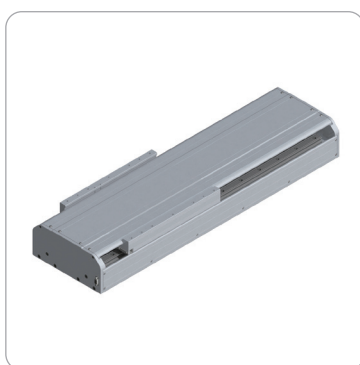
AL-180



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AL-220



AL-300

AL-SERIES

AL-Series Model Info.

AL	150	A	0300	**S **10 ***W	Option.
AL-Series	Body Size 150 180 220 300	Core Type A- Core P/F-190N B- Core P/F-325N C- Core P/F-587N D- Core P/F-1074N E- Core P/F-1761N F- Core P/F-1061N G- Core P/F-1366N H- Core P/F-2123N I- Core P/F-2731N J - Core P/F- 3184N K- Core P/F-4097N L- Core P/F-2478N M- Core P/F-4955N N- Core P/F-7433N	Stroke	*Slide Table Q'ty S-Single Slide Table D-Dual Slide Table T-Triple Slide Table Q-Quarter Slide more... **Encoder Info.(Grating Pitch) 1.10-Encoder GP-100μm 2.04-Encoder GP-40μm 3.02-Encoder GP-20μm ***Body Color B-Black W-White	



AL-Series Linear Motor Info.

구 분	SEWOO 社			YASKAWA 社			MITSUBISHI 社		
	MODEL	Max. Force(N)	Cont. Force(N)	MODEL	Max. Force(N)	Cont. Force(N)	MODEL	Max. Force(N)	Cont. Force(N)
AL-150	SWL-PMI-10C	56	19	SGLFW-20A090AP	86	25	LM-H2P1A-06M-4SS0	150	60
	SWL-PMI-20C	114	38	SGLFW-20A120AP	125	40			
	SWL-PMI-30C	171	57						
	SWL-PMI-40C	226	75						
AL-180	SWL-PMI-10C	56	19	SGLFW-20A090AP	86	25	LM-H2P1A-06M-4SS0	150	60
	SWL-PMI-20C	114	38	SGLFW-20A120AP	125	40	LM-H2P2A-12M-1SS0	300	120
	SWL-PMI-30C	171	57	SGLFW-35A120AP	220	80	LM-H2P2B-24M-1SS0	600	240
	SWL-PMI-40C	226	75	SGLFW-35A230AP	440	160	LM-H2P2C-36M-1SS0	900	360
	SWL-PS-10C	126	42				LM-H2P2D-48M-1SS0	1,200	480
	SWL-PS-20C	254	85						
	SWL-PS-30C	375	125						
	SWL-PS-40C	500	167						
	SWL-PM-10C	235	78						
	SWL-PM-20C	472	157						
	SWL-PM-30C	709	236						
	SWL-PM-40C	946	315						
	SWL-PS-10C	126	42	SGLFW-35A120AP	220	80	LM-H2P1A-06M-4SS0	150	60
	SWL-PS-20C	254	85	SGLFW-35A230AP	440	160	LM-H2P2A-12M-1SS0	300	120
	SWL-PS-30C	375	125	SGLFW-50A200BP	600	280	LM-H2P2B-24M-1SS0	600	240
AL-220	SWL-PS-40C	500	167	SGLFW-50A380BP	1,200	560	LM-H2P2C-36M-1SS0	900	360
	SWL-PM-10C	235	78				LM-H2P2D-48M-1SS0	1,200	480
	SWL-PM-20C	472	157						
	SWL-PM-30C	709	236						
	SWL-PM-40C	946	315						
	SWL-PL-10C	488	163						
	SWL-PL-20C	958	319						
	SWL-PL-30C	1,442	481						
	SWL-PL-40C	1,918	639						
	SWL-PL-10C	488	163	SGLFW-50A200BP	600	280	LM-H2P3A-24M-1SS0	600	240
AL-300	SWL-PL-20C	958	319	SGLFW-50A380BP	1,200	560	LM-H2P3B-48M-1SS0	1,200	480
	SWL-PL-30C	1,442	481	SGLFW-1ZA200BP	1,200	560	LM-H2P3C-72M-1SS0	1,800	720
	SWL-PL-40C	1,918	639	SGLFW-1ZA380BP	2,400	1,120	LM-H2P3D-96M-1SS0	2,400	960
	SWL-PE-10C	1,205	402						
	SWL-PE-20C	2,468	823						
	SWL-PE-30C	3,695	1,232						
	SWL-PE-40C	4,915	1,638						

CONTENTS

INTRO

AS-SERIES

ACS-SERIES

AB-SERIES

AL-SERIES

AC-COMBINATION

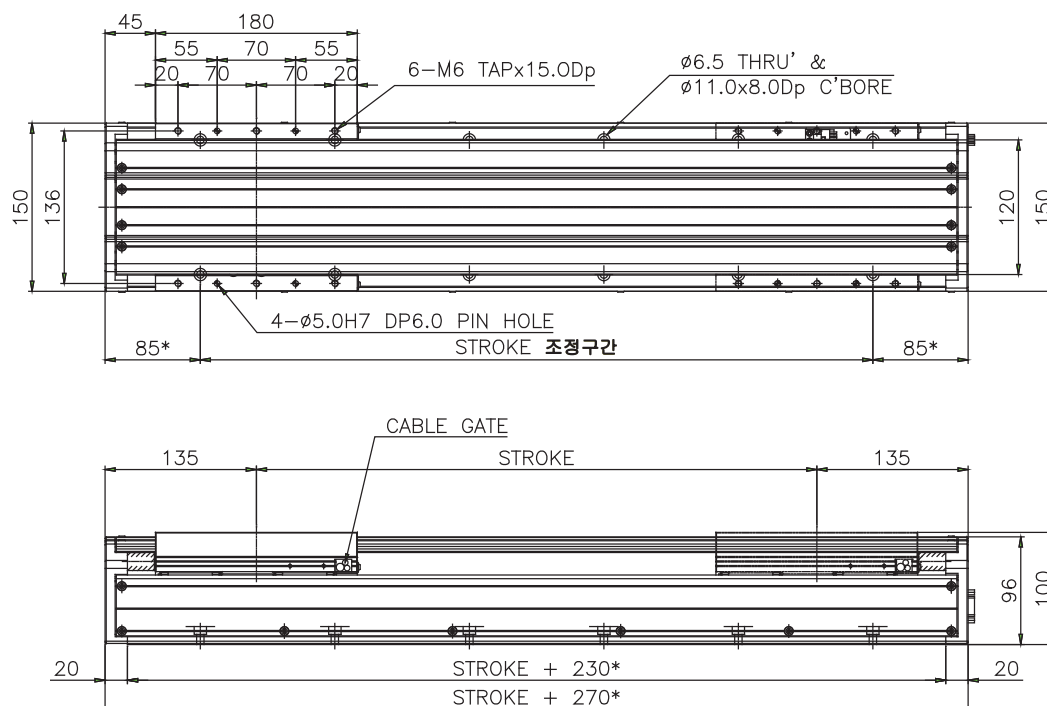
AL-150 Specification

Motor Info.	Continuous Force	75.2N
	Peak Force	225.7N
Accuracy(um/mm)		± 10um/300mm
Repeatability(um)	± 1um(Resolution 1um)	
	± 0.5um(Resolution 0.1um)	
Flaness / Straightness(um)		± 20um/1000mm
Payload(Kg) & Acceleration		15Kg & A=0.5G
Max speed & Acceleration		5000mm/sec & A=4G
Moment of inertia of area		Ix = 1.79E+06, Iy = 2.63E+07



AL-150

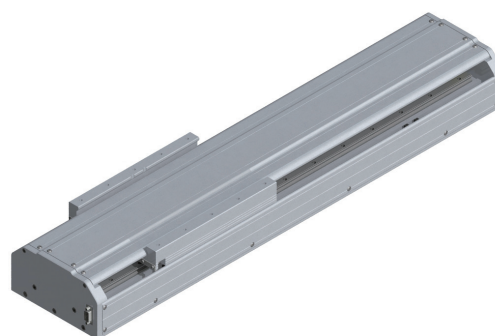
Dimension(mm)



*STROKE 별 상이함.

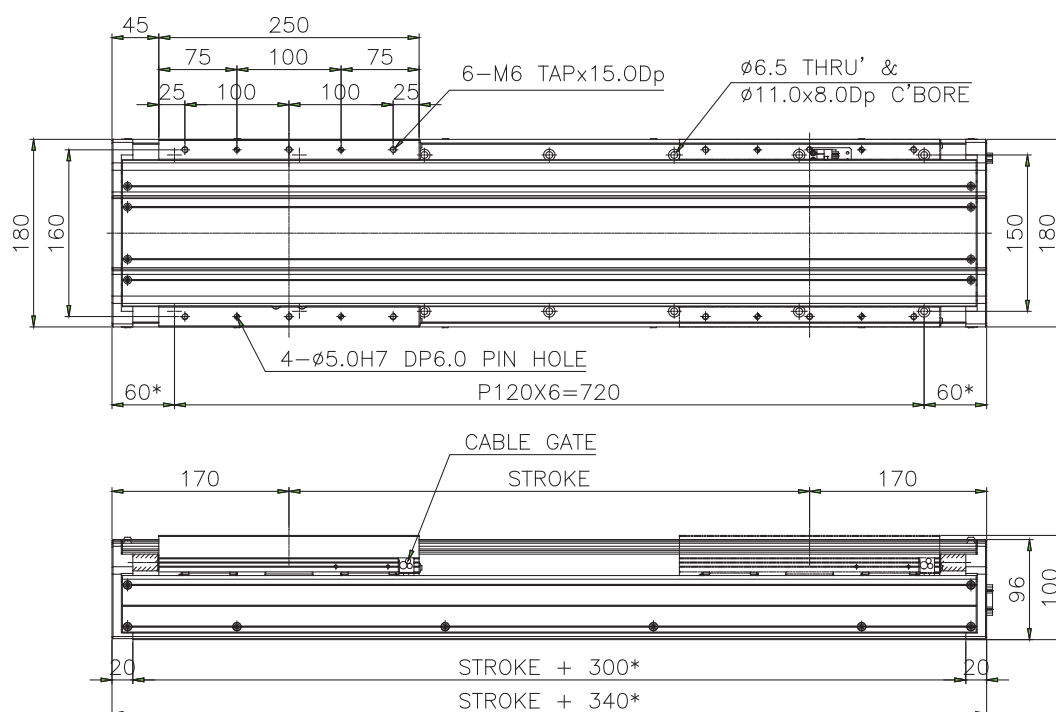
AL-180 Specification

Motor Info.	Continuous Force	166.7N
	Peak Force	500.1N
Accuracy(um/mm)		± 10um/300mm
Repeatability(um)	± 1um(Resolution 1um)	
	± 0.5um(Resolution 0.1um)	
Flaness / Straightness(um/mm)		± 20um/1000mm
Payload(Kg) & Acceleration		30Kg & A=0.5G
Max speed & Acceleration		5000mm/sec & A=4G
Moment of inertia of area		Ix = 1.79E+06, Iy = 2.63E+07



AL-180

Dimension(mm)



*STROKE 별 상이함.

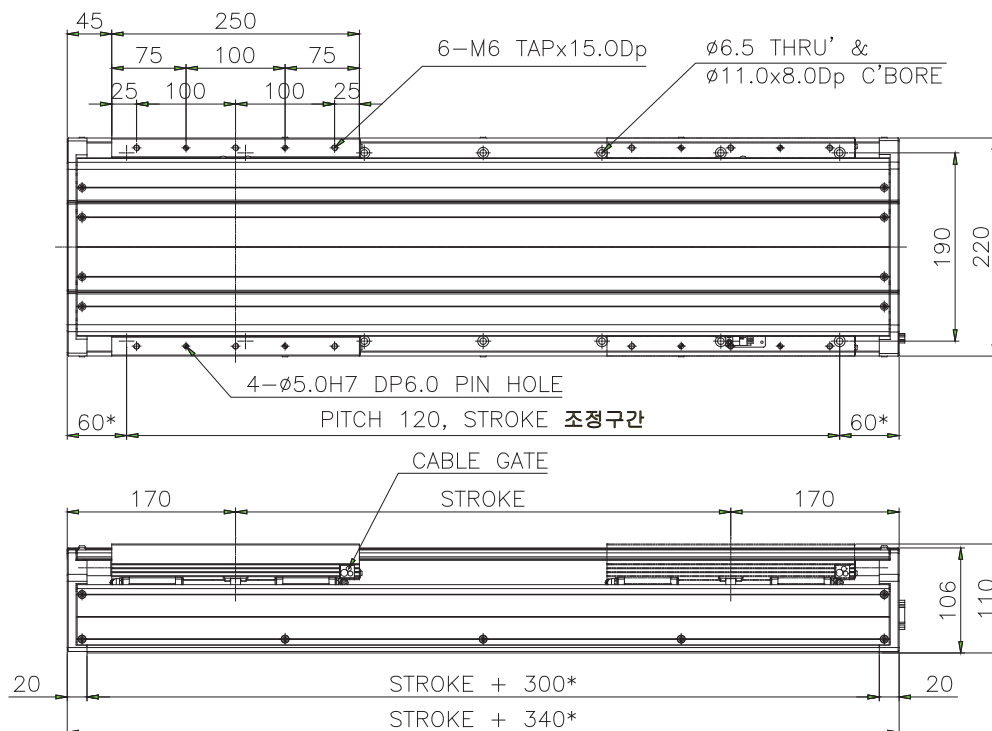
AL-220 Specification

Motor Info.	Continuous Force	236.2N
	Peak Force	708.6N
Accuracy(um/mm)		± 10um/300mm
Repeatability(um)	± 1um(Resolution 1um)	
	± 0.5um(Resolution 0.1um)	
Flaness / Straightness(um/mm)		± 20um/1000mm
Payload(Kg) & Acceleration		80Kg & A=0.5G
Max speed & Acceleration		5000mm/sec & A=4G
Moment of inertia of area		Ix = 1.79E+06, Iy = 2.63E+07



AL-220

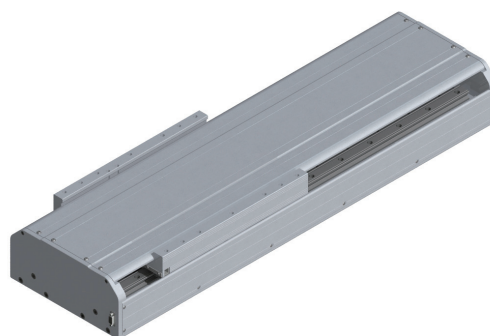
Dimension(mm)



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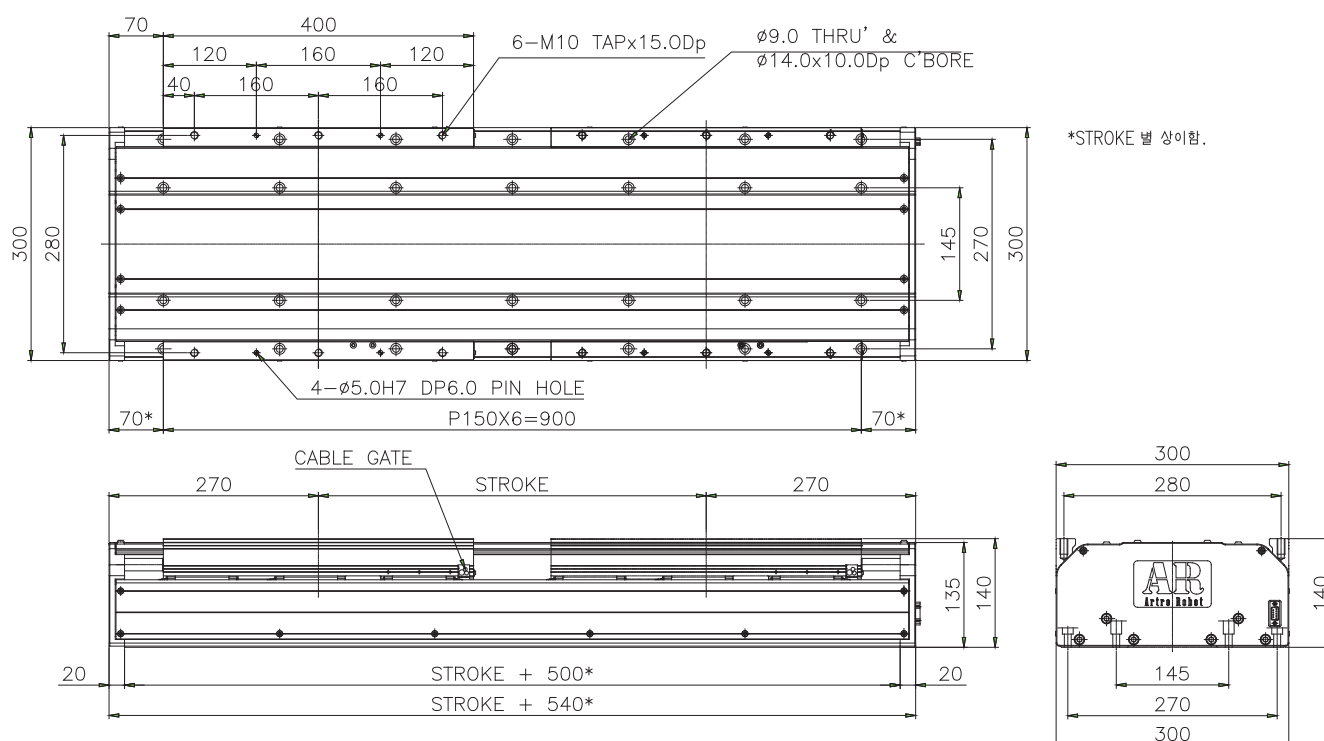
AL-300 Specification

Motor Info.	Continuous Force	480.5N
	Peak Force	1441.5N
Accuracy(um/mm)		± 10um/300mm
Repeatability(um)	± 1um(Resolution 1um)	
	± 0.5um(Resolution 0.1um)	
Flatness / Straightness(um/mm)		± 20um/1000mm
Payload(Kg) & Acceleration		140Kg & A=0.5G
Max speed & Acceleration		5000mm/sec & A=4G
Moment of inertia of area		Ix = 1.79E+06, Iy = 2.63E+07



AL-300

Dimension(mm)



AC-COMBINATION



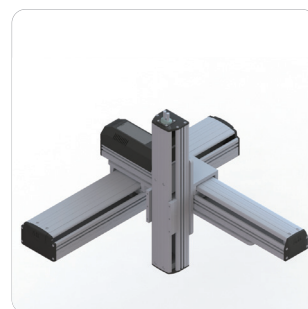
AC-A Combination



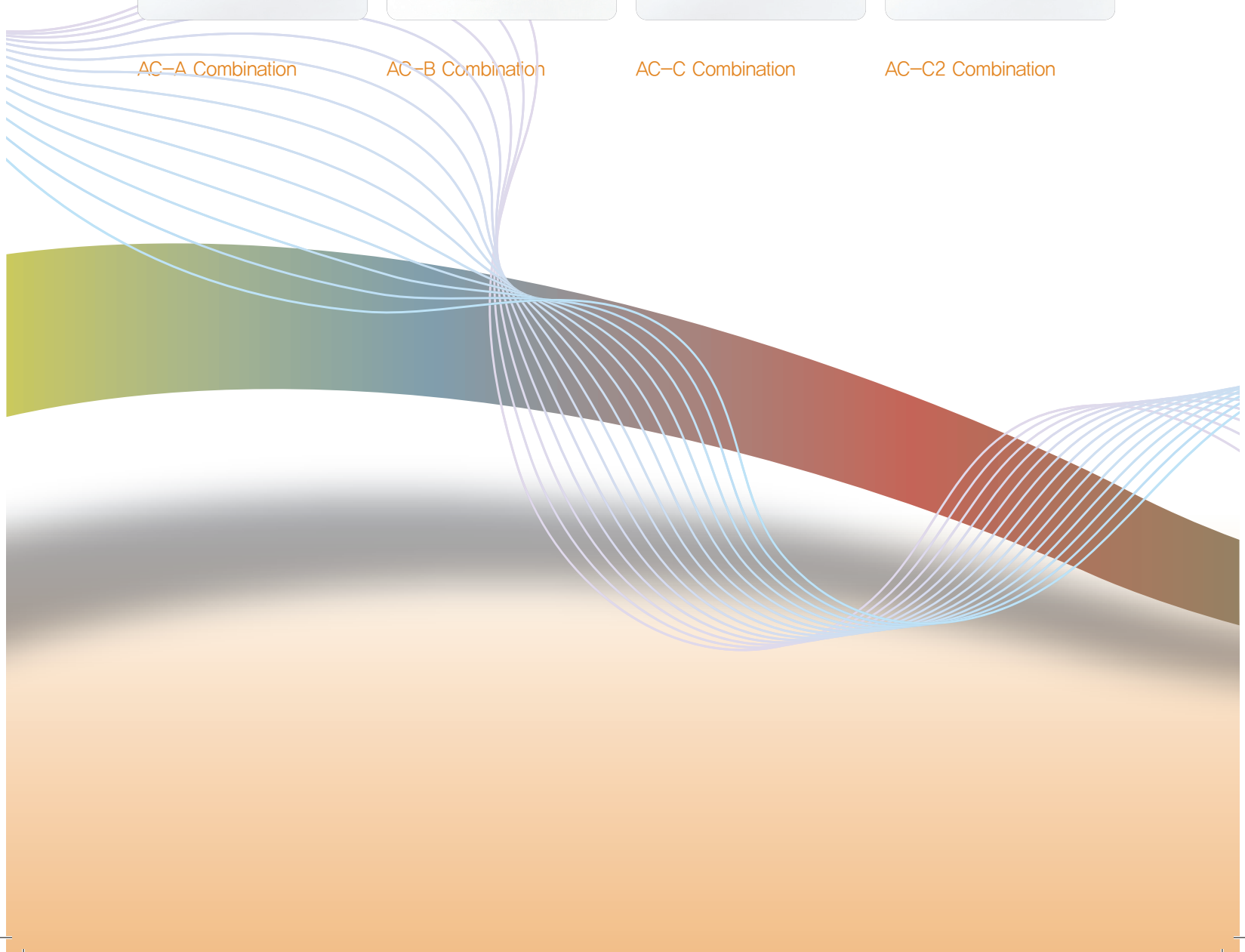
AC-B Combination



AC-C Combination



AC-C2 Combination

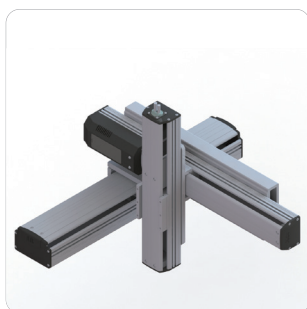




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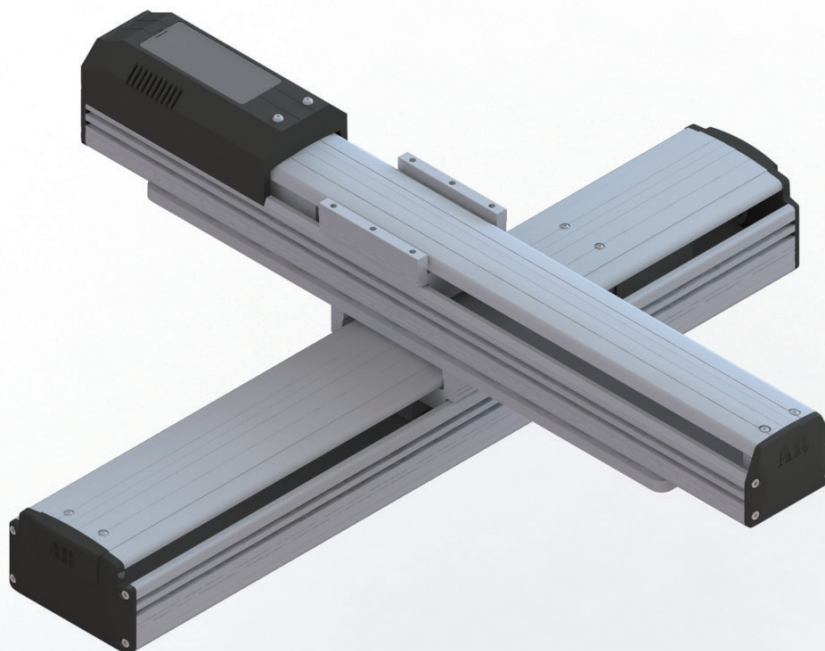
AC-D Combination



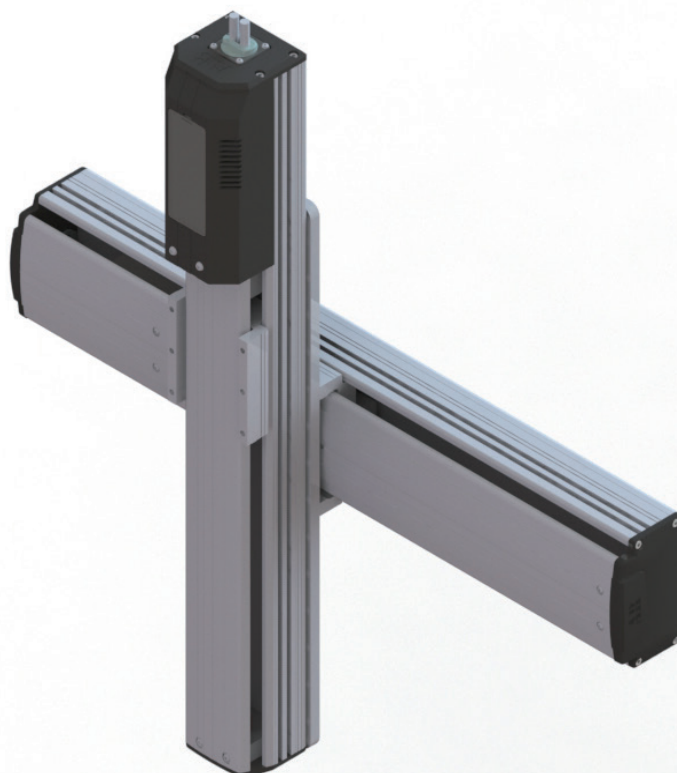
AC-D2 Combination

AC-COMBINATION

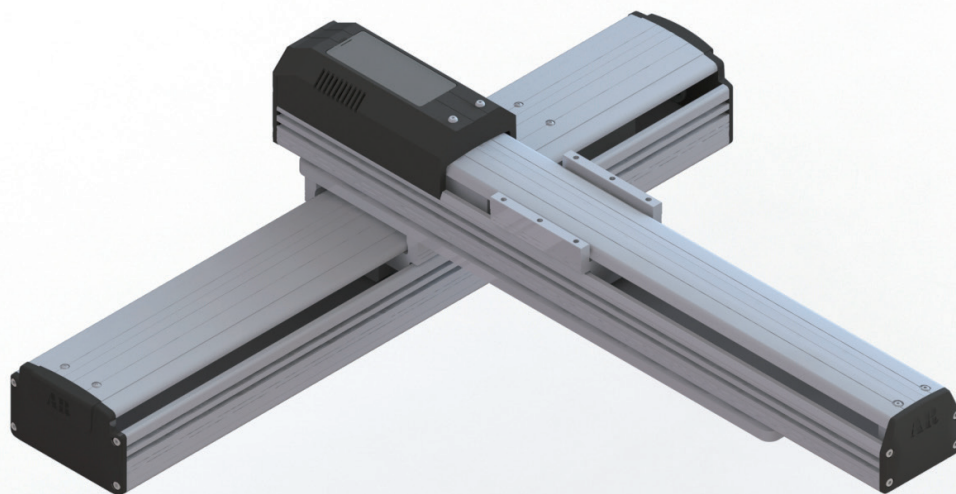
AC-A Combination



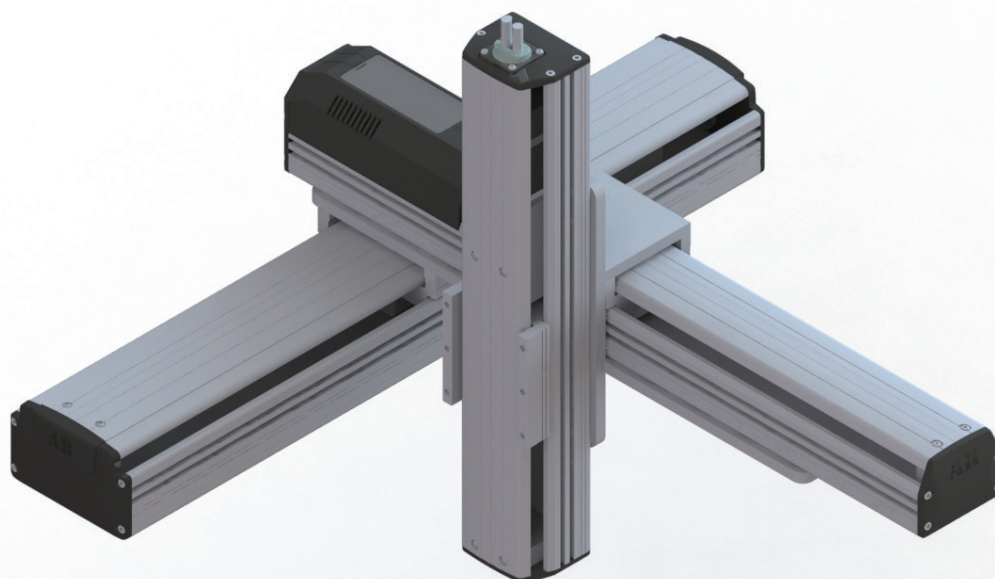
AC-B Combination



AC-C Combination



AC-C2 Combination



CONTENTS

INTRO

AS-SERIES

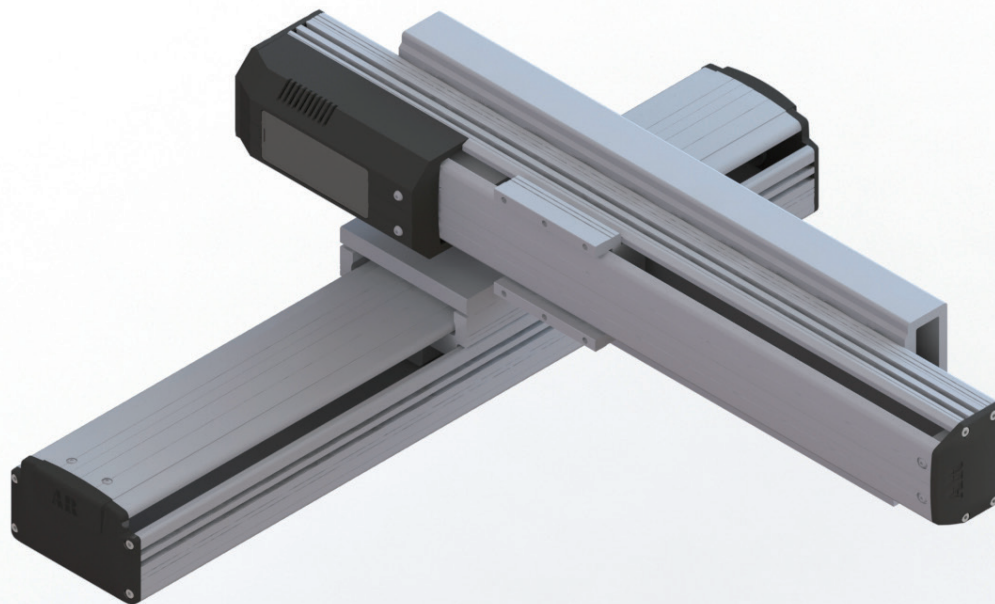
ACS-SERIES

AB-SERIES

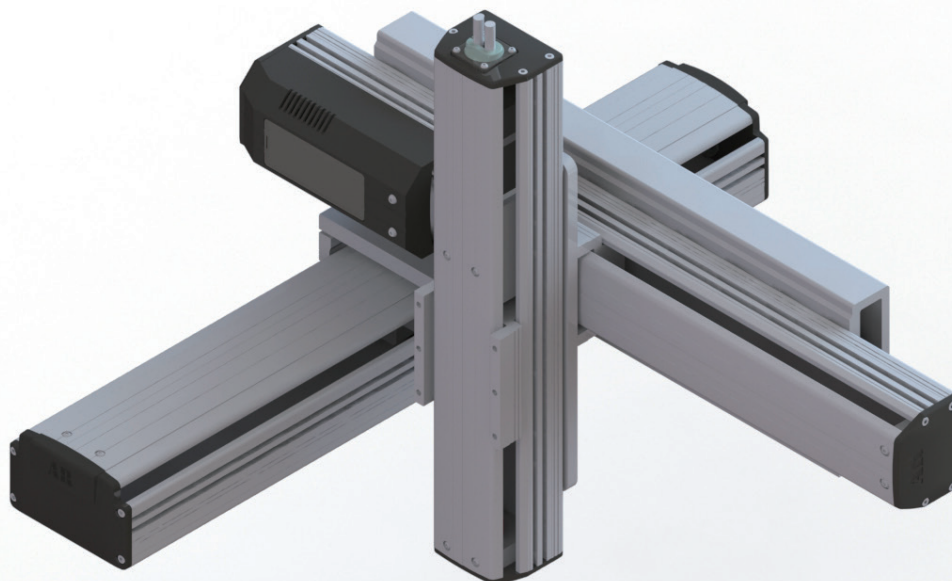
AL-SERIES

AC-COMBINATION

AC-D Combination



AC-D2 Combination

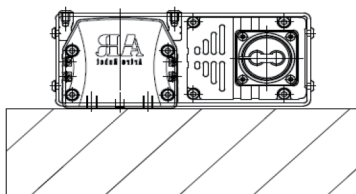


ROBOT 선정 필요자료

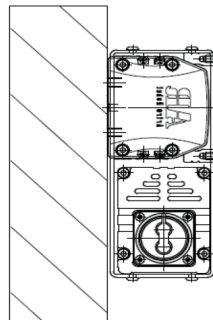
ROBOT 선정 시 필요자료			
1) 취부방식	2) 워크물의 무게중심 이격거리		3) 사용조건
			사용속도 mm/s
수직	D1	mm	가감속시간 sec
수평	D2	mm	휴지시간 sec
벽면	D3	mm	워크물 무게 Kg

1) 취부방식

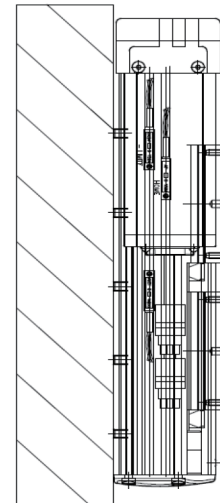
수평취부



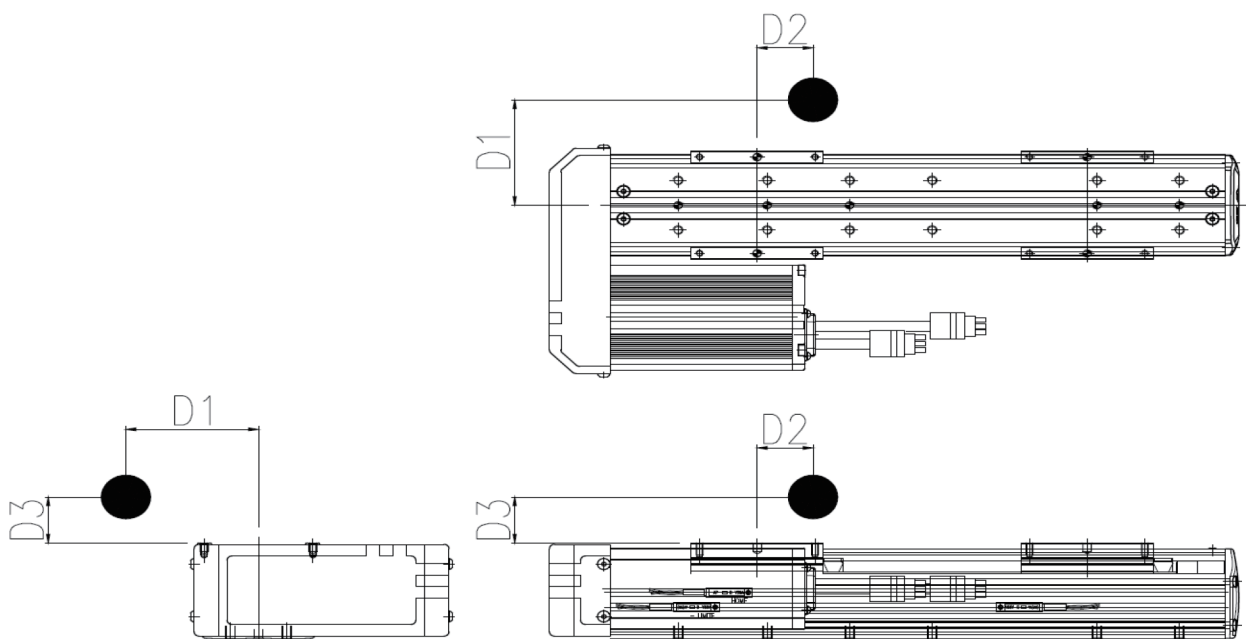
벽면취부



수직취부



2) 워크물의 무게중심 이격거리



결 재	담 당	검 토	승 인

회 사 명		취 급 점		납품 업체	
날 짜	20 . . .	담 당 자		E-MAIL	

외 관	외형 색상	WHITE ()		형 태	조 합		
		BLACK ()			단 축		
	CABLEVEYOR	유 / 무		CABLE	유 / 무	SENSOR	AUTO / PHOTO
		TYPE		기 타			

SPEC							
X- AXIS			Y- AXIS			Z- AXIS	
가반 하중	Kg		가반 하중	Kg		가반 하중	Kg
STROKE	mm		STROKE	mm		STROKE	mm
SPEED	mm/s		SPEED	mm/s		SPEED	mm/s
가감속 시간	sec		가감속 시간	sec		가감속 시간	sec
SERVO MOTOR	MODEL :		SERVO MOTOR	MODEL :		SERVO MOTOR	MODEL :
	MIT[]YAS[]기타[]			MIT[]YAS[]기타[]			MIT[]YAS[]기타[]
	BRAKE	유 / 무		BRAKE	유 / 무		BRAKE
감 속 비	:		감 속 비	:		감 속 비	:
RAYDENT	유 / 무		RAYDENT	유 / 무		RAYDENT	유 / 무
SLIDE 형태			SLIDE 형태			SLIDE 형태	

[illegible]

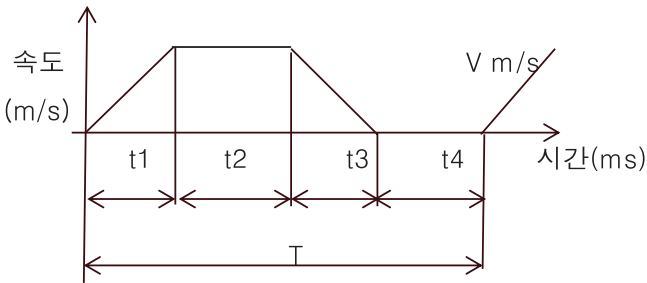
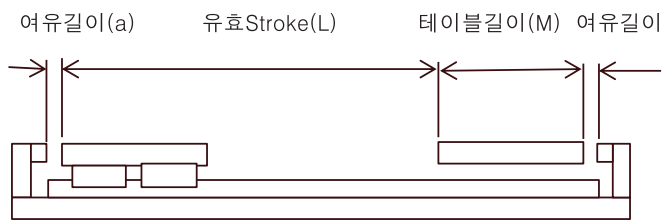
Linear Robot 사양 상담서

결	담 당	검 토	승 인
재			

회 사 명		취 급 점		납품 업체	
날 짜	20 . . .	담 당 자		E-MAIL	

외 관	외형 색상	WHITE ()		형 태	조 합			
		BLACK ()			단 축			
	CABLEVEYOR	유 / 무		CABLE	유 / 무	SENSOR	PHOTO	
		TYPE		기 타				

S P E C					
X- AXIS		Y- AXIS		Z- AXIS	
가반 하중	Kg	가반 하중	Kg	가반 하중	Kg
STROKE	mm	STROKE	mm	STROKE	mm
SPEED	mm/s	SPEED	mm/s	SPEED	mm/s
가속도	sec	가속도	sec	가속도	sec
MOTOR	MODEL :	MOTOR	MODEL :	MOTOR	MODEL :
	SW[]YAS[]기타[]		SW[]YAS[]기타[]		SW[]YAS[]기타[]
RAYDENT	유 / 무	RAYDENT	유 / 무	RAYDENT	유 / 무
SLIDE 형태		SLIDE 형태		SLIDE 형태	

항 목	검 토 내 용	사 양	비 고
사용조건	a. 속도선도 	t1(가속) : sec t2(정속) : sec t3(감속) : sec t4(휴지시간) : sec	
	b.slide 형태 	M : mm L : mm a+b : mm	

운동조건	a. Accuracy(절대 정밀도) : Slider가 일정 방향으로 이동할때 지령과 실제 이동한 거리와의차		um	
	b. Repeatability (반복정밀도) : 어떤 위치에 같은 방향으로 위치 결정시 재현성	±	um	
	c. Straightness(진직도) : 테이블의 움직임이 이상직선에 대하여 어느정도 떨어져 있는지를 표시	±	um/300mm	
	d. Flatness(평탄도) : 기존면에 대하여 테이블이 어느정도 평행 이동하는지를 표시	±	um/300mm	
	e. Ecoder Resolution		um	

상 담 내 용

