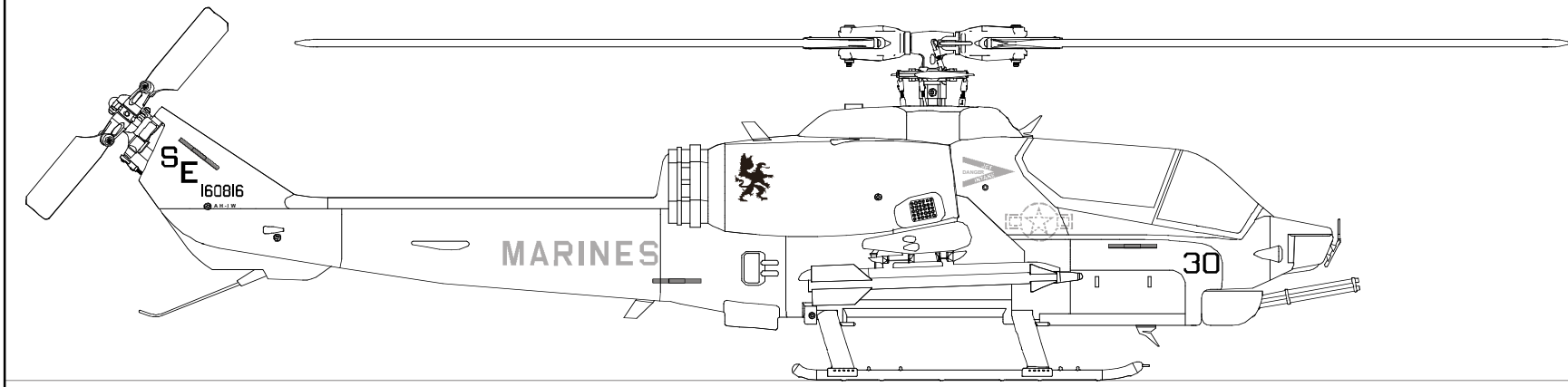
AH-1W SUPER COBRA GUNSHIP mini Titan E325 CONVERSION KIT
AH-1W 超級眼鏡蛇攻擊直昇機 mini Titan E325升級套件



1/20 SCALE

No.3870

This radio-controlled model helicoptor is not a toy! Before assembly, please read this manual thoroughly.
本產品為高性能遙控模型非一般玩具，組裝與操作前請詳閱本產品說明書。

The parts are subject to change without prior notice due to product improvements and specification changes.
本套件所附之零件可能跟圖示有所差異。因產品後續之設計研發或功能不斷改善之原因，我們將保留產品規格變更權力，不再另行通知使用者。

Assembly Manual & Parts Catalogue 組裝說明書及零件包型錄

Introduction 前言

Thank you for purchasing this Thunder Tiger product. This manual includes the steps and instructions required to assemble your AH-1W helicoptor. Please read this manual completely before attempting to start assembly. Follow the directions in this manual closely to reduce problems during operation. We offer online help on our www.acehobby.com or www.thundertiger.com and our product specialists are ready to take your call if you have any technical questions. Have fun and enjoy the exciting world of R/C.

感謝您購買雷虎科技mini Titan E325 AH-1W升級套件。雷虎科技一向以提供最高品質的產品及服務作為持續努力的目標，期望能呈現給您最頂級之工藝產品。本使用說明書包含了組裝及維修本產品前所需注意的重要事項，建議您在開始組裝及維修本產品之前，能詳閱此說明書，並熟悉本產品之組裝步驟及維修程序。若是您在產品的使用上有任何的疑問，歡迎多加利用我們所提供的24小時諮詢留言版或洽詢雷虎科技授權經銷商。雷虎科技的全球英文網址為www.thundertiger.com 中文網址為www.tiger.com.tw，我們將竭誠為您服務！

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INTRODUCTION

Thank you for purchasing the Thunder Tiger AH-1W Super Cobra scale helicopter conversion kit. This conversion kit is designed especially for mini Titan E325. The tail transmission system and PVC body are included in the kit. There are clear body and 3 types of painting scheme for your choices. You need to disassemble the original E325 first then follow the assembly steps to get the AH-1W ready. Please retain the user manual in case you need it for any information or reference.

NOTICE

1. R/C models are not toys. This product is a high-precision flying machine.Possibilities of unexpected crashes may occur due to electronic interference, incorrect operation, or poor mechanical maintenance. Although it is a small-sized helicopter, the rotor blades rotate at high speeds, which may cause serious damage, injury, or death if the model hits people or property. Therefore, extreme caution must be exercised during operation.
2. Thunder Tiger ensures parts packaged in this product is of the highest quality.However, after assembly and usage, parts damaged due to wear or misuse will not be replaced under any circumstances. If you have any questions regarding its operation and repair, Thunder Tigers service agents are able to provide free technical guidance.
3. This product is only recommended for users ages 16 and up. Because flying a R/C helicopter is difficult, beginners must receive guidance and supervision from experienced pilots to minimize unexpected danger. Practice in spacious areas, far away from obstacles such as buildings, trees, electrical towers, or crowds.
4. To decrease the cost of repair and maintenance for beginners, it is recommended to fly the helicopter with a practice rack and to learn basic flying skills with a computer R/C flying simulator. (Crashes in simulators are free to repair!)

Operating a model helicopter requires a high degree of responsibility and skill. If you are a newcomer to the hobby, it is best to seek help and guidance from accomplished model helicopter pilots. This will greatly speed up the learning process and have you flying successfully in a reasonable amount of time. We also would strongly urge you to join the Academy of Model Aeronautics. The AMA is a non-profit organization that provides its members with a liability insurance plan as well as monthly magazine entitled Model Aviation. All AMA charter aircraft clubs require all pilots to hold a current AMA sporting license prior to operation of their models at club fields.

For further information, contact the AMA at:
Academy of Model Aeronautics
5151 East Memorial Drive
Muncie, IN 47302
(317) 287-1256

簡介

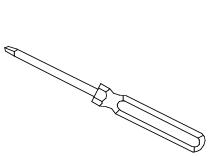
感謝您購買雷虎科技的AH-1W超級眼鏡蛇像真機改裝套件。它是專門為mini Titan E325所設計的像真機殼，套件裡面包含了尾旋翼傳動機構的改裝套件以及PVC材質的像真機身。原廠並提供了包含透明機身、沙漠迷彩、空優迷彩及叢林迷彩等三種塗裝以供選購。請詳閱本說明書，以瞭解拆解與組裝步驟，並妥善保存本說明書，以備查詢。

注意事項

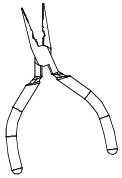
1. 本項遙控直昇機產品並不是玩具，是一項結構精密、高專業度模型產品，如果未經正確組裝與操控，將可能對操控者或其他人造成身體傷害。使用者必須了解，若未確實進行飛行前安全檢查或操控不當，而造成人員受傷或物體損壞，使用者必須負起法律責任。
2. 本產品由高品質零組件組成，雷虎科技對於安裝過程、使用過後..等人為因素造成損壞事件不負損壞賠償之責。如您需要本產品相關組裝、調整或其他協助，可與雷虎科技全省經銷商聯繫。
3. 本項產品禁止十六歲以下青少年與孩童使用。強烈建議初學者應取得技術支援後再進行飛行，以避免危險發生。請於空曠地區操控本產品，並避免於建築物、樹木、電塔..等障礙物區域飛行。
4. 建議初學者可安裝練習架或透過電腦模擬軟體練習，可達到實際練習效果與符合經濟效益。

操控遙控直昇機對於飛行安全要求極高，需要高度的負責任態度配合，以及較高的操控技巧。如果您是一位初學者，您必須向台灣地區專業模型經銷商，或是台灣地區遙控直昇機相關組織以及經驗豐富的玩家尋求相關協助，以獲得您所需要的訊息以及專業知識。如此可有效協助您縮短學習的時間，更容易學會遙控直昇機的組裝、設定與操控技巧。

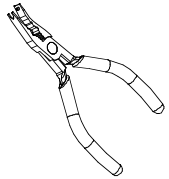
TOOLS REQUIRED FOR ASSEMBLY 組裝工作所需工具



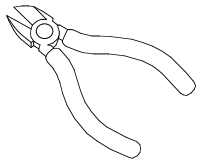
Screw Driver
螺絲起子



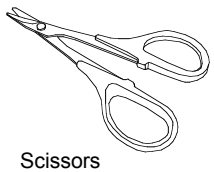
Needle Nose Pliers
尖嘴鉗



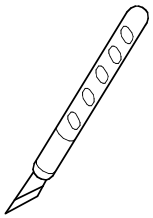
Ball Link Pliers
連桿專用鉗



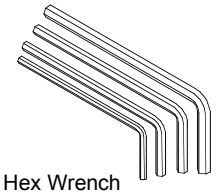
Nipper
斜口鉗



Scissors
剪刀



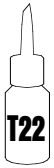
Hobby Knife
模型專用美工刀



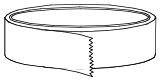
Hex Wrench
六角板手



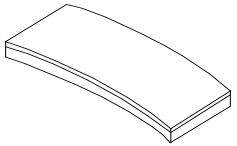
CA Glue
瞬間膠



Threadlocking
螺絲防鬆膠



Clear Tap
透明膠帶



Double Side Tap
雙面膠

SYMBOLS USED THROUGHOUT THE MANUAL 符號說明



Apply C.A Glue
使用快乾膠黏合



Assemble in right order
依標示順序組裝



Drill holes with the specified diameter
依標示尺寸鑽孔



Hint
組裝提示



Must be purchased separately
改裝品需另購



Cut off shaded portion
依標示部分裁切



Ensure smooth, non-binding movement when assembling
確認組件靈活度



Pay close attention here
注意組裝步驟



Apply threadlocker
使用螺絲防鬆膠

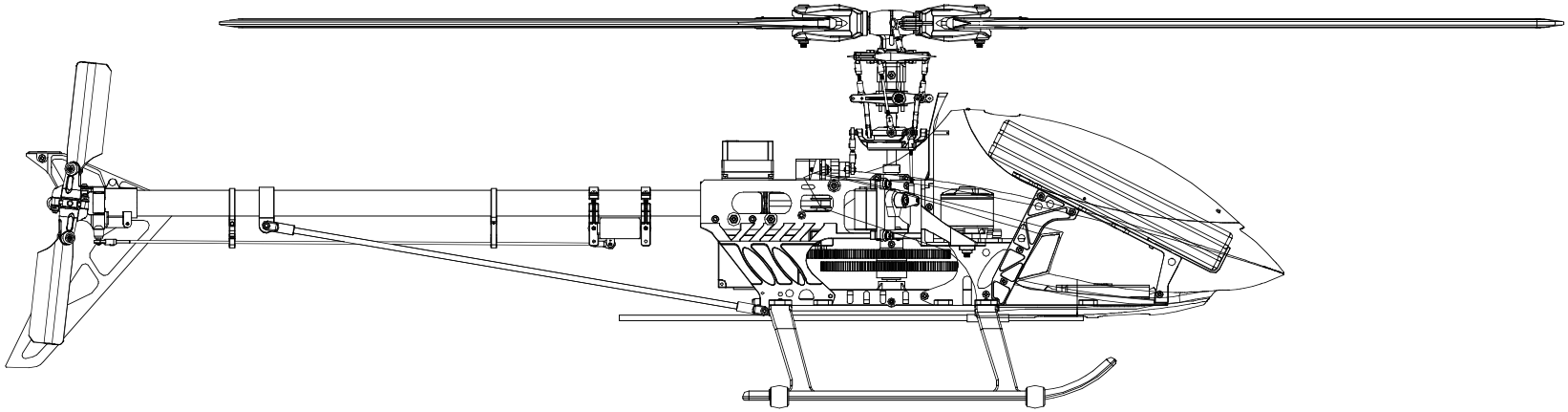


Cut off excess
裁剪多餘部分



Assemble left and right side the same way
左右側組裝方式相同

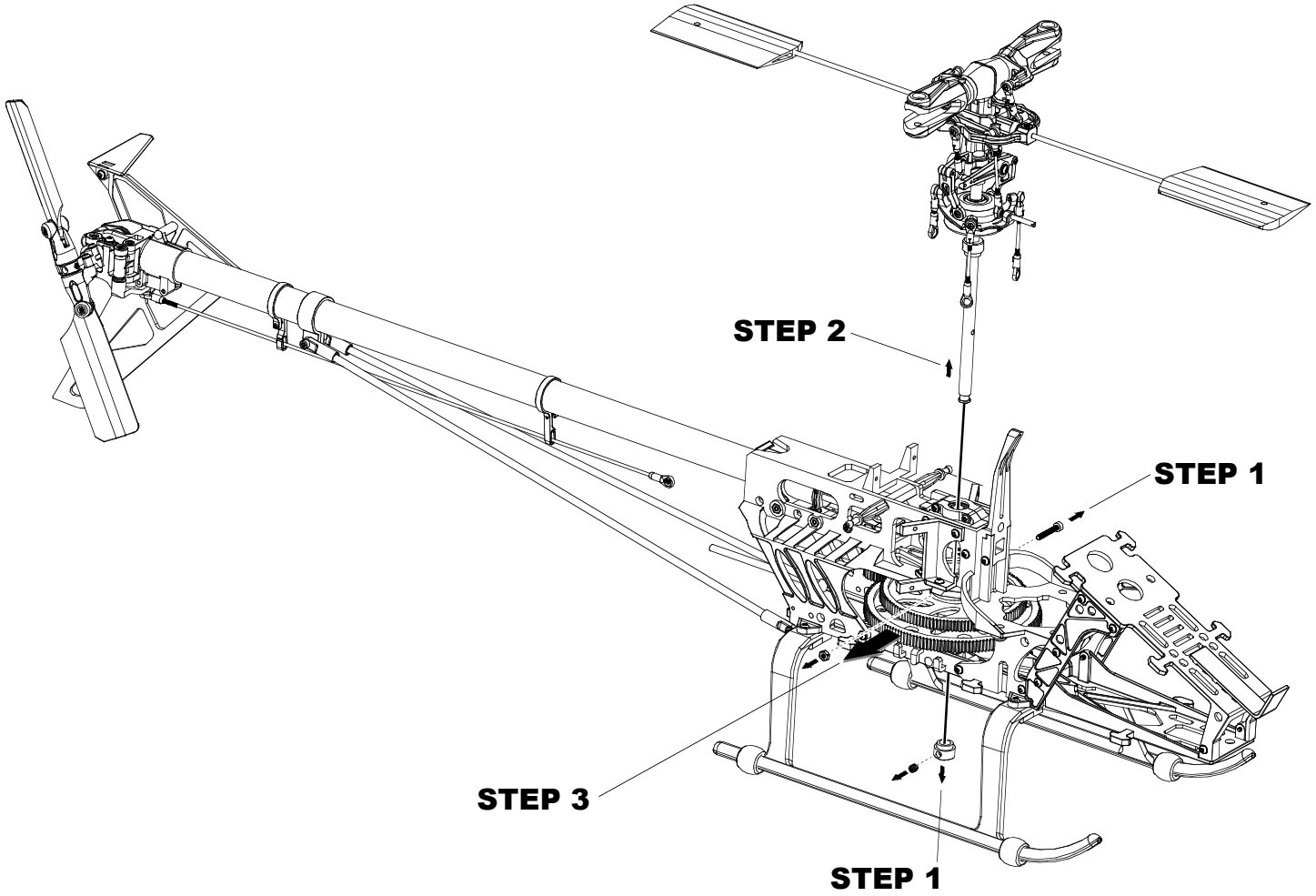
DISASSEMBLY / 原機拆解



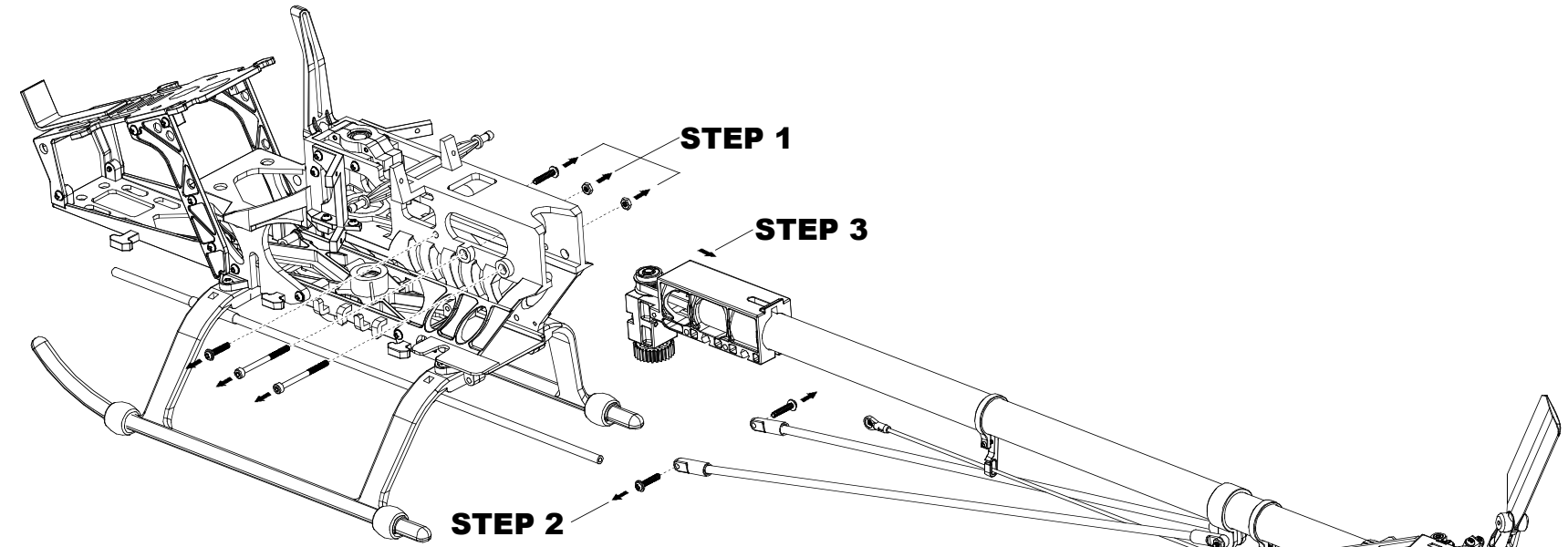
In order to convert the standard E325 into an AH-1W gunship, please follow the steps disassembling the helicopter first. Please collect the disassembled parts and don't get them lost. You need some of them to proceed the assembly later, some would be the spares.

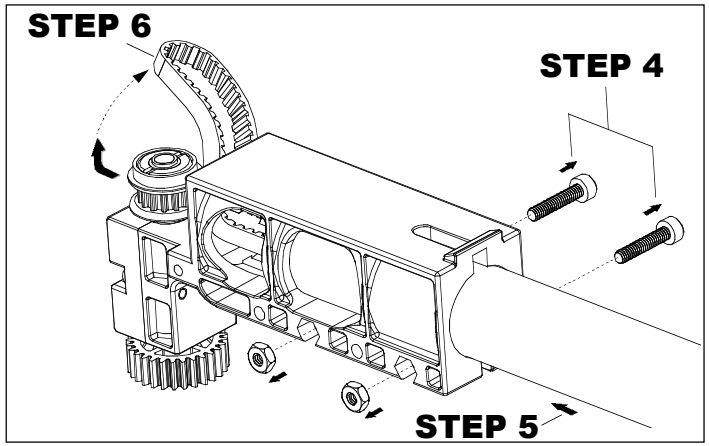
請依照說明書步驟分解直昇機，並妥善保存拆解後的零件，部份零件將重新組回 AH-1W，其餘零件可做為備品使用。

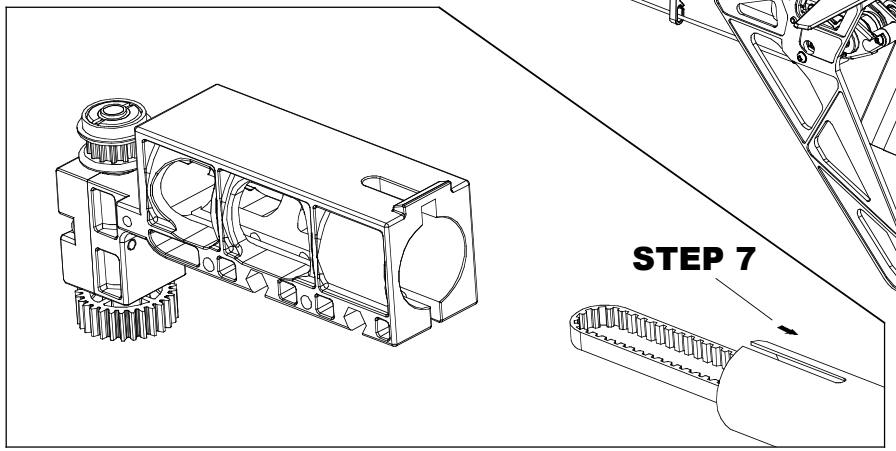
1. MAIN ROTOR HEAD DISASSEMBLY / 主旋翼頭分解



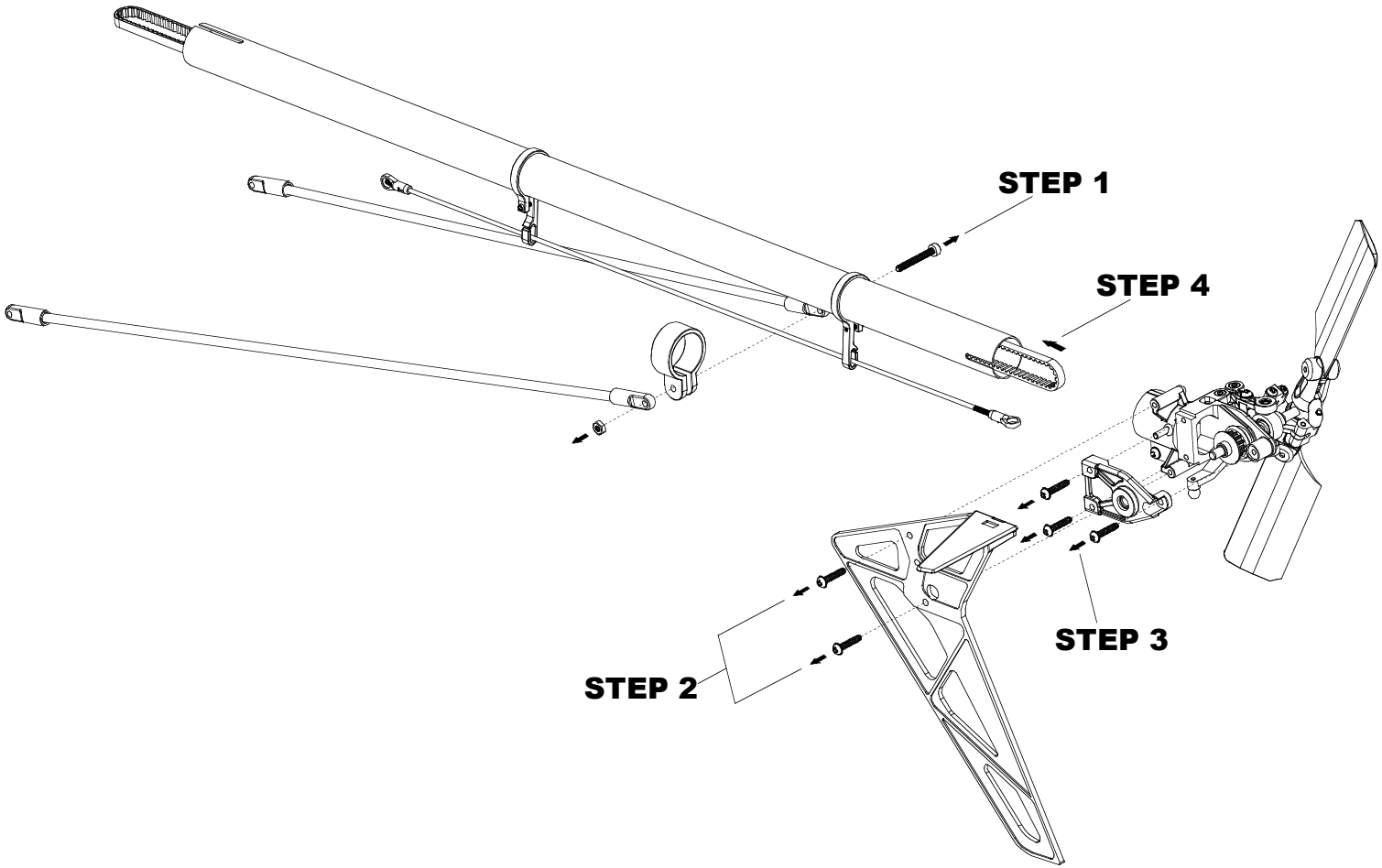
2. TAIL DISASSEMBLY / 機尾分解(1)



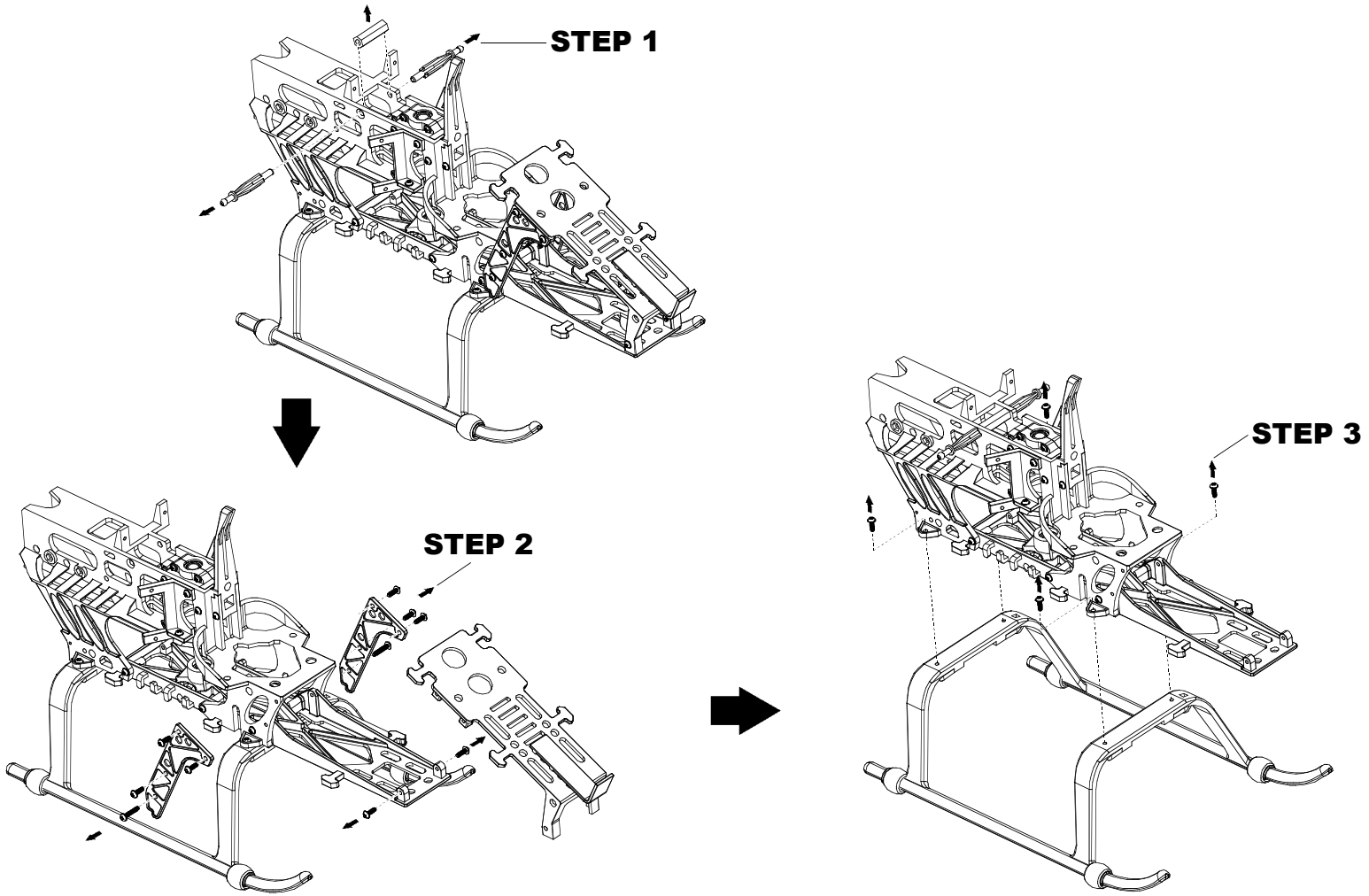




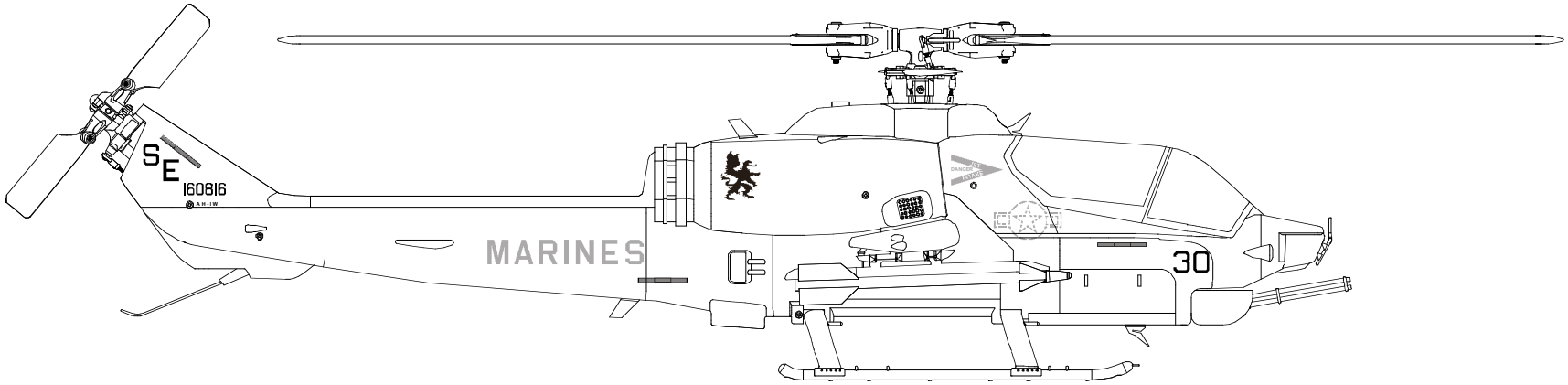
3. TAIL DISASSEMBLY / 機尾分解(2)



4. MAIN CHASSIS DISASSEMBLY / 機身分解

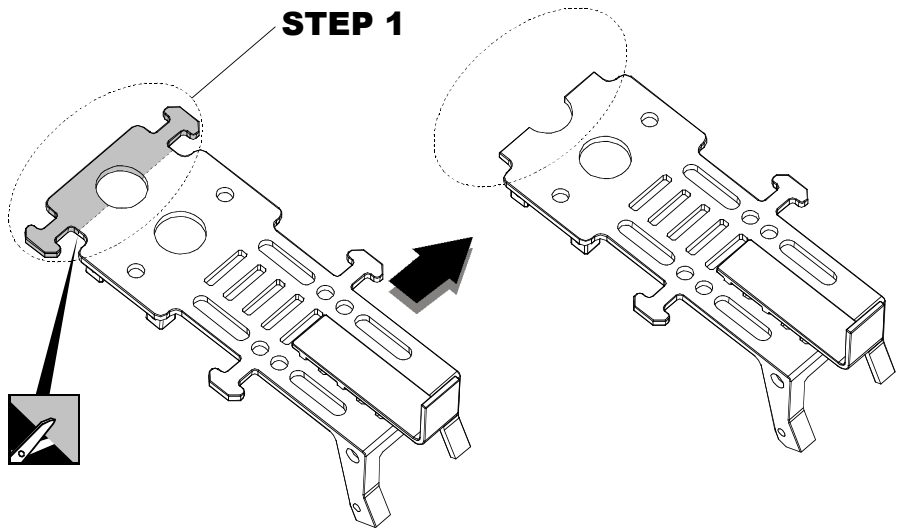


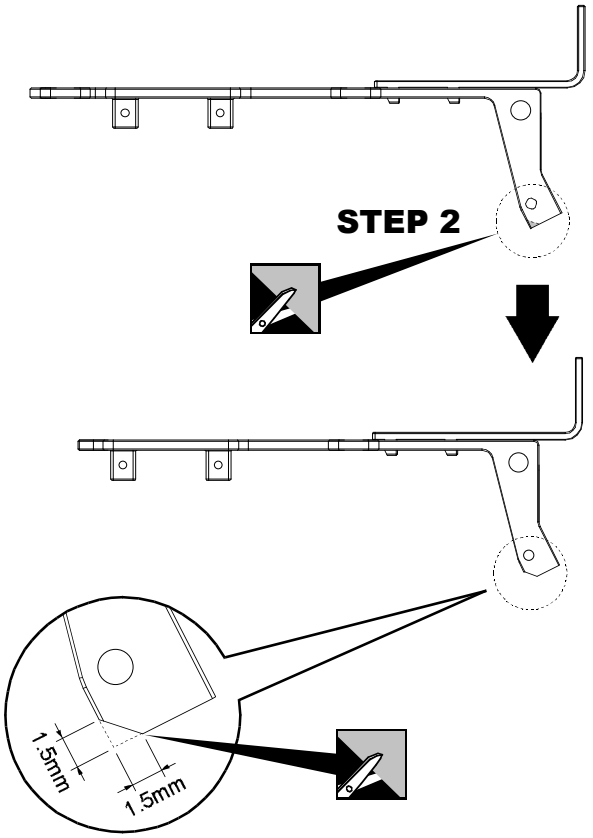
MODIFICATION / 零件加工修改



To proceed the converting, some minor modification is needed.Please modify the parts illustrated carefully.
請依據說明進行零件加工修改。

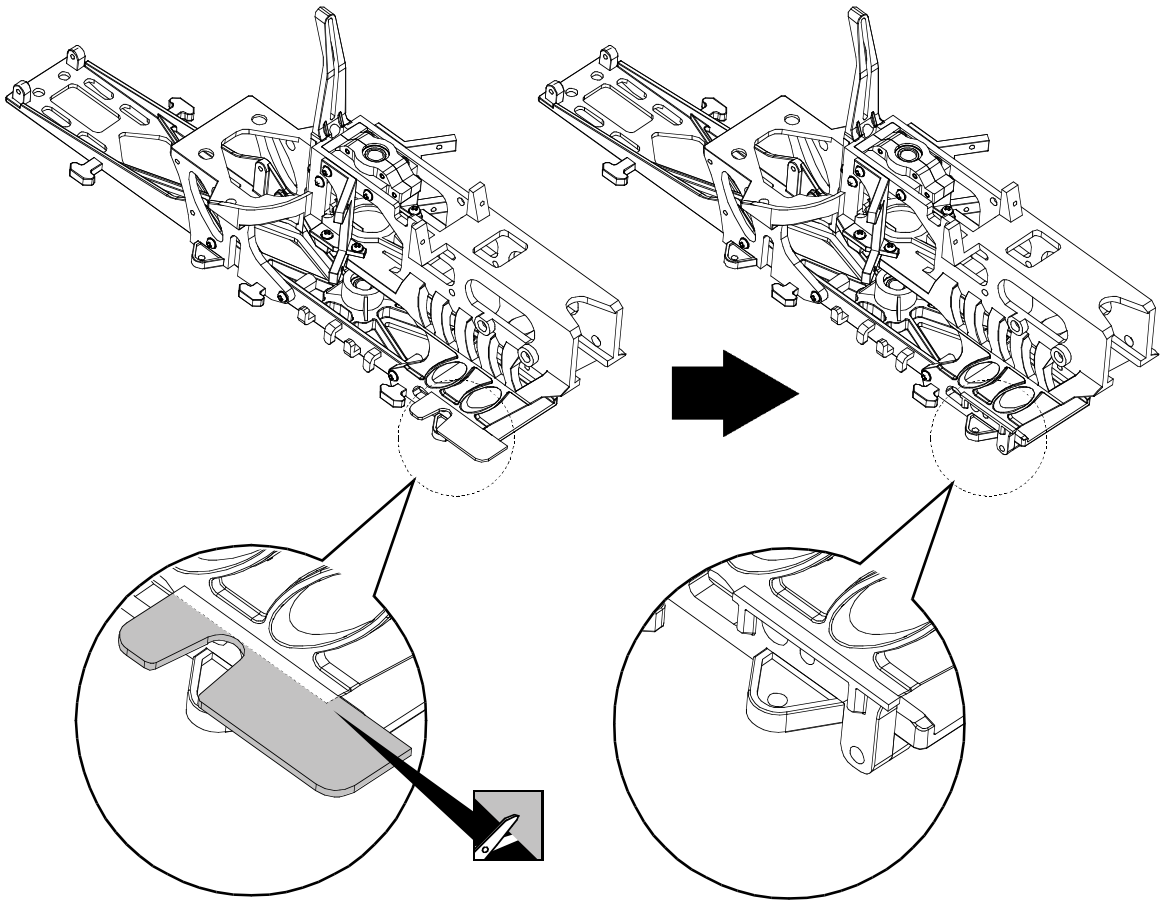
MODIFICATION / 零件加工修改 (1)

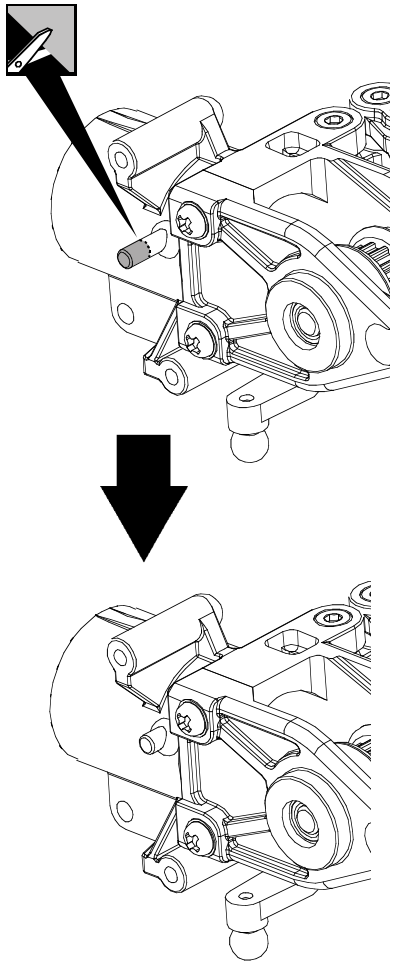




Cut off shaded portion
依標示部分裁切

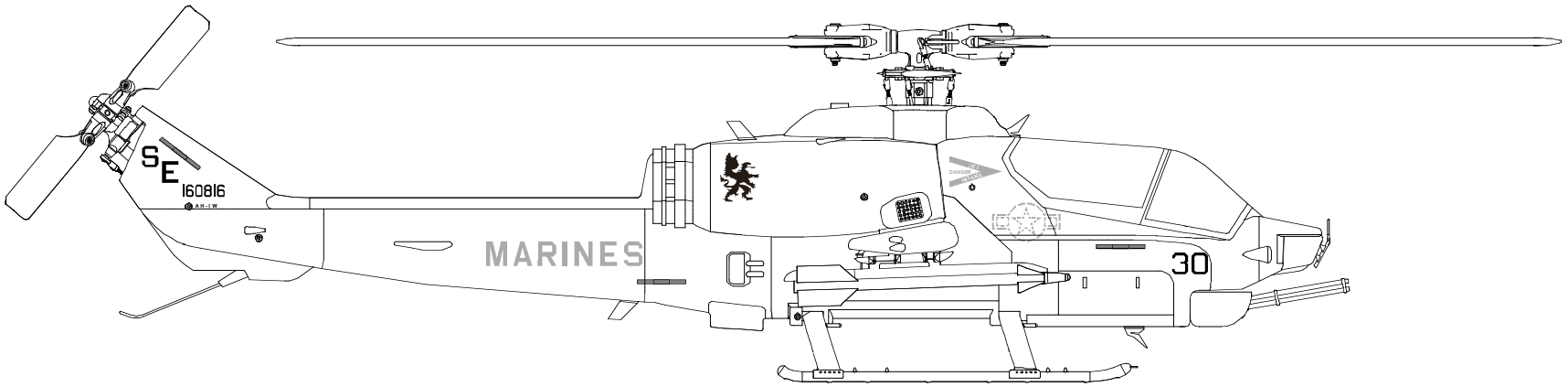
MODIFICATION / 零件加工修改 (2)





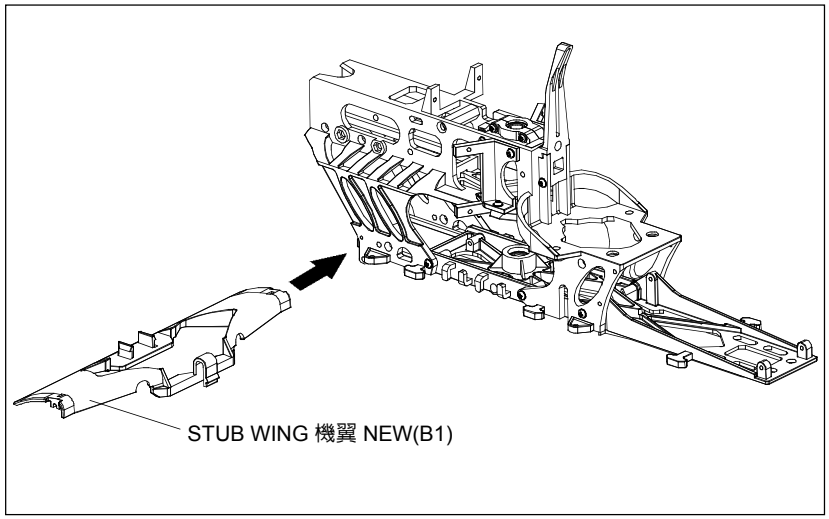
Cut off shaded portion
依標示部分裁切

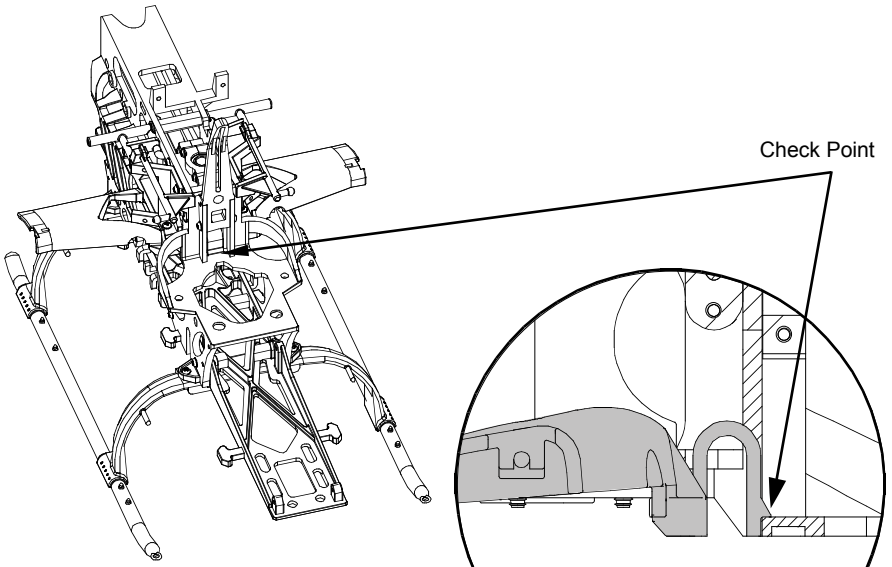
ASSEMBLY / 組裝

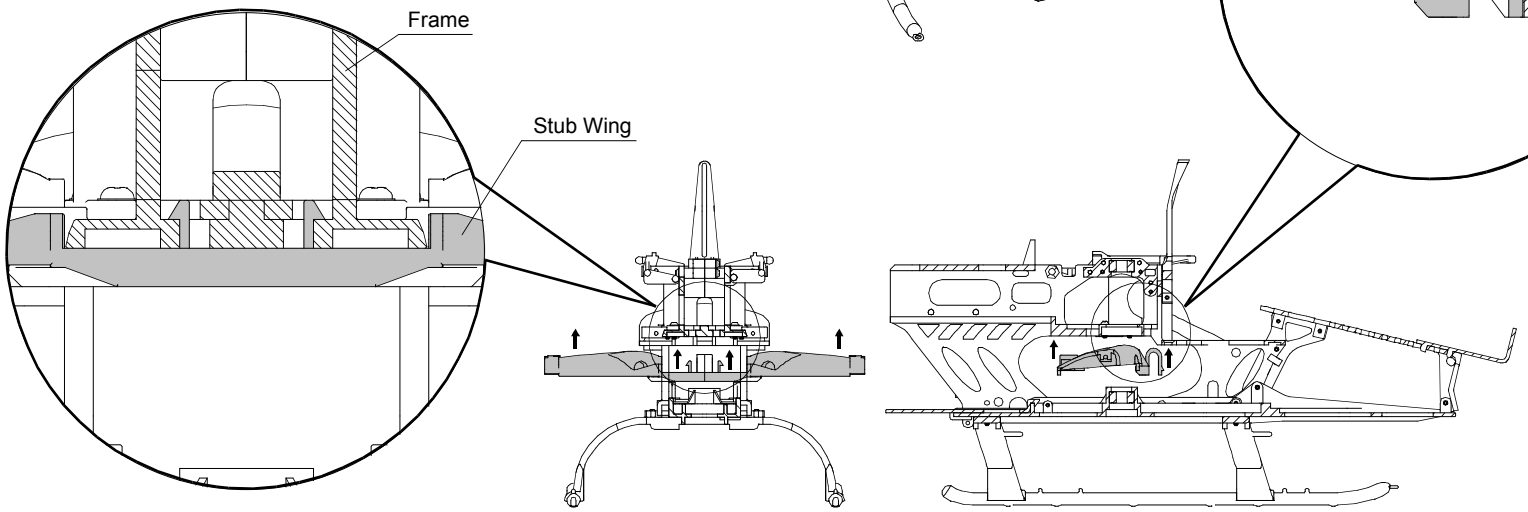


After disassembly and modification, plwase follow the steps to re-build the model. Please also note some of the disassmbled parts are necessities.
在拆解及修改零件後，請依步驟重新組裝直昇機，請注意部份零件須重覆使用。

STUB WING ASSEMBLY / 機翼組裝 (1)





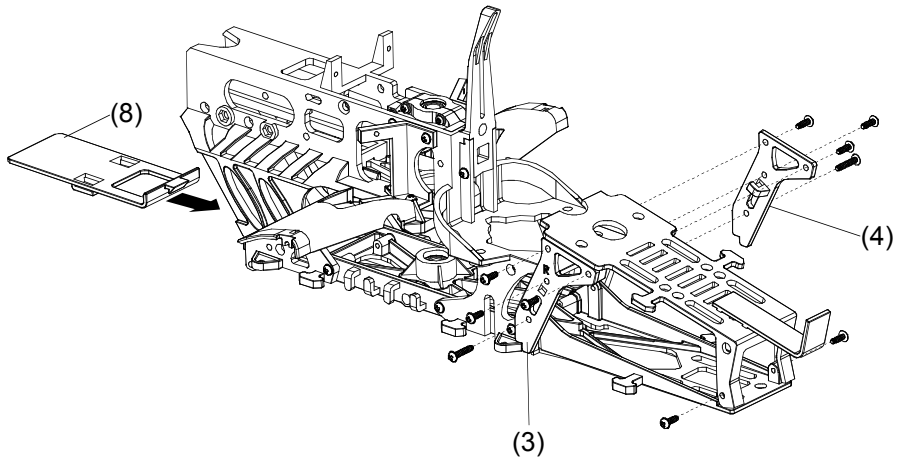


CHASSIS ASSEMBLY / 機體組裝 (2)

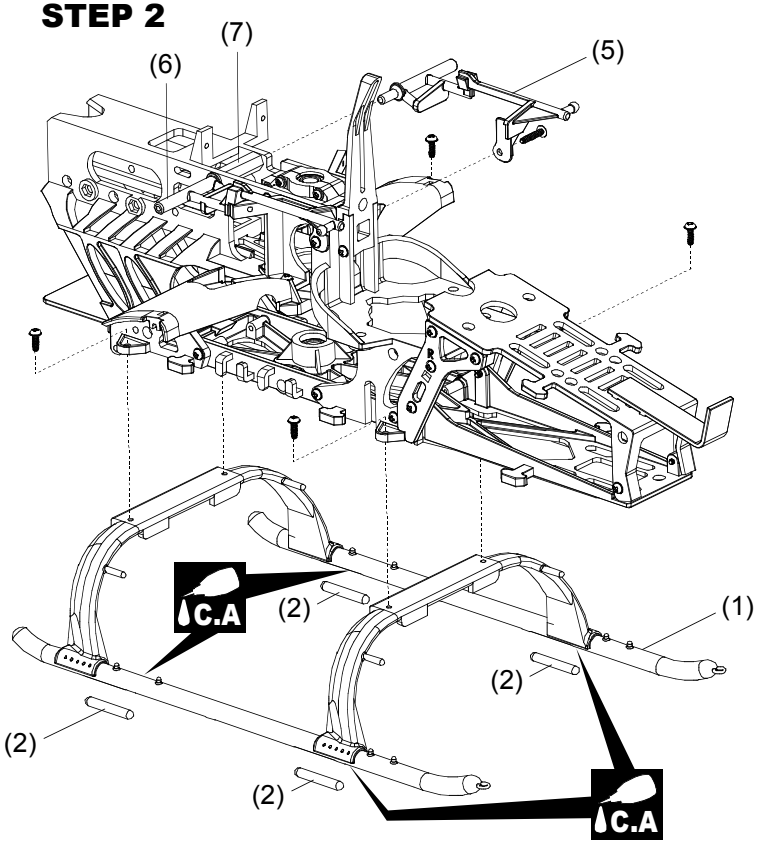
NO.	Description	名稱	Qty	Note
1	LANDING SKID	腳架	1	NEW
2	SKID DAMPER	止滑橡膠條	4	NEW
3	BATTERY SIDE PLATE(R)	電池座側板（右）	1	NEW(A4)
4	BATTERY SIDE PLATE(L)	電池座側板（左）	1	NEW(A5)

NO.	Description	名稱	Qty	Note
5	CANOPY RETAINING POST(L)	機身固定支柱（左）	1	NEW(A3)
6	CANOPY RETAINING POST(R)	機身固定支柱（右）	1	NEW(A2)
7	FRAME SPACER	六角棒	1	NEW(A1)
8	RECEIVER BASE PLATE	接收機座	1	NEW(B12)

STEP 1

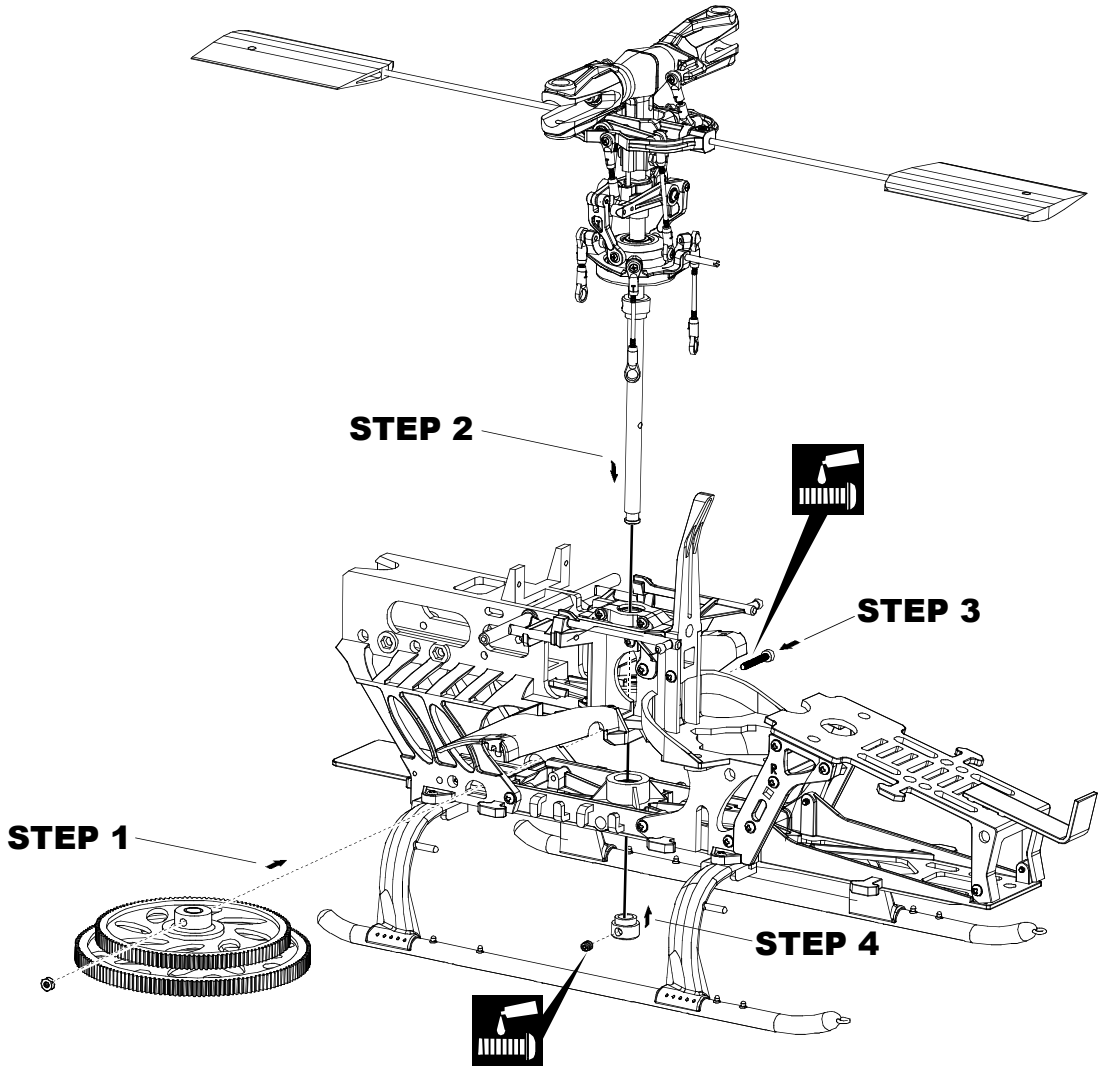


STEP 2



C.A Apply C.A Glue
使用快乾膠黏合

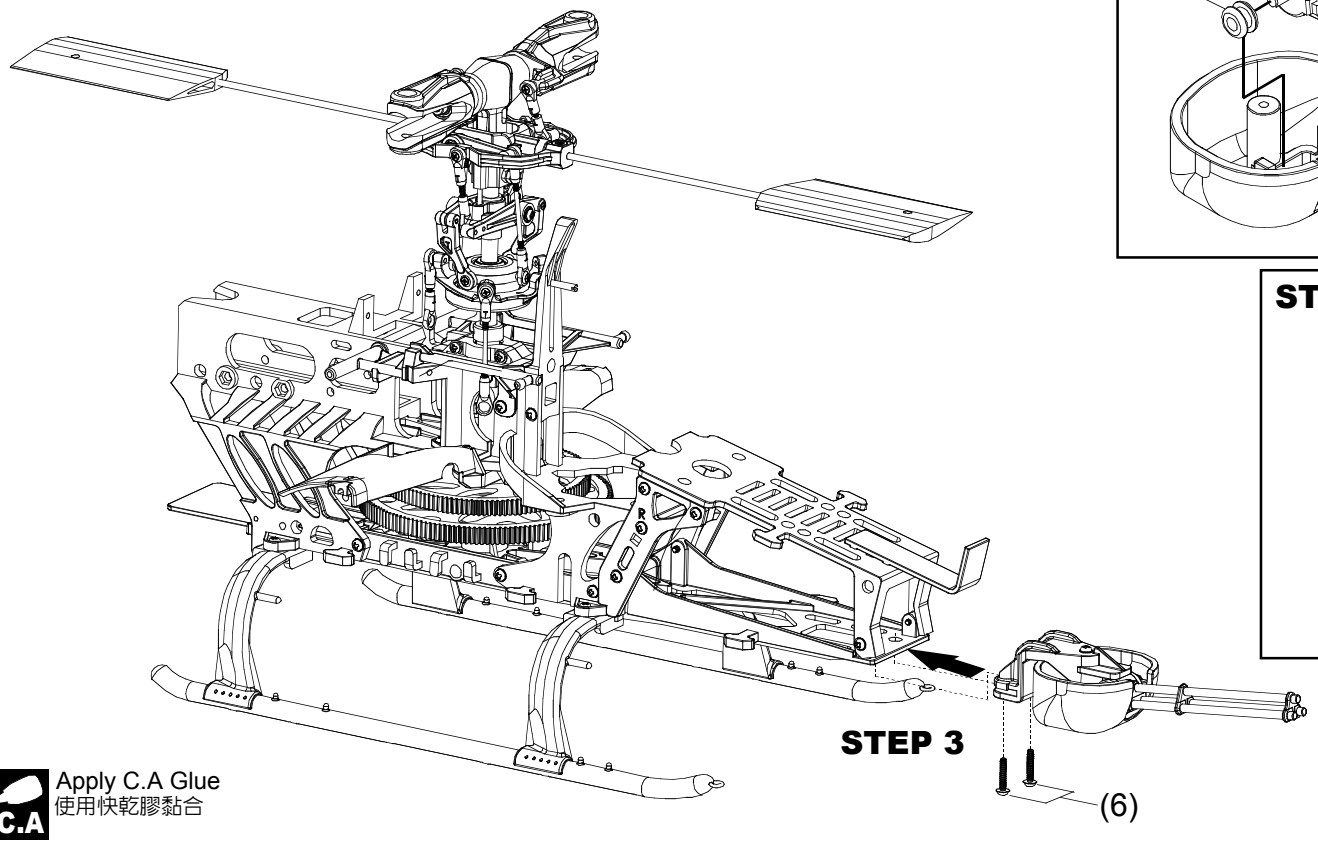
MAIN POTOR HEAD ASSEMBLY / 主旋翼頭組裝



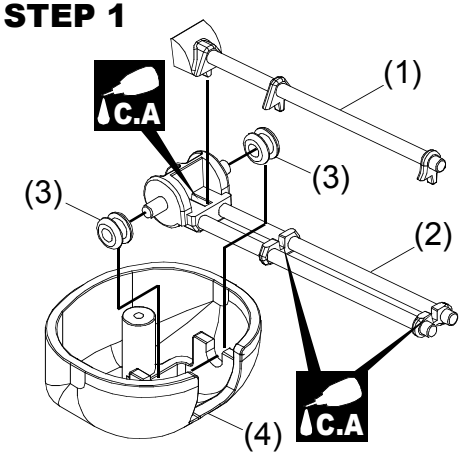
Apply threadlocker
使用螺絲防鬆膠

MACHINE GUN ASSEMBLY / 機槍組裝

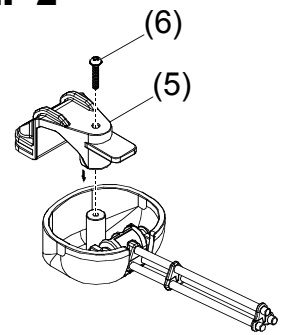
NO.	Description	名稱	Qty	Note
1	GUN TUBE	機槍管	1	NEW(B3)
2	GUN BASE	機槍底座	1	NEW(B4)
3	RUBBER GROMMET	固定墊圈	2	NEW
4	GUN HUB-1	機槍轉向座	1	NEW(B5)
5	GUN HUB-2	機槍固定座	1	NEW(B2)
6	TAPPING SCREW(W/WASHER) M2x10	圓頭墊圈自攻螺絲	3	NEW



STEP 1



STEP 2

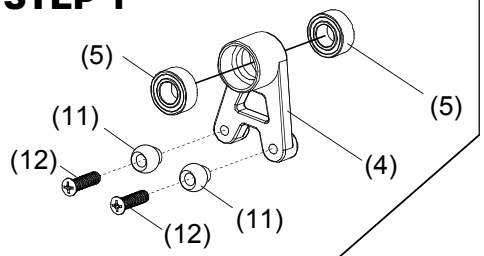


C.A Apply C.A Glue
使用快乾膠黏合

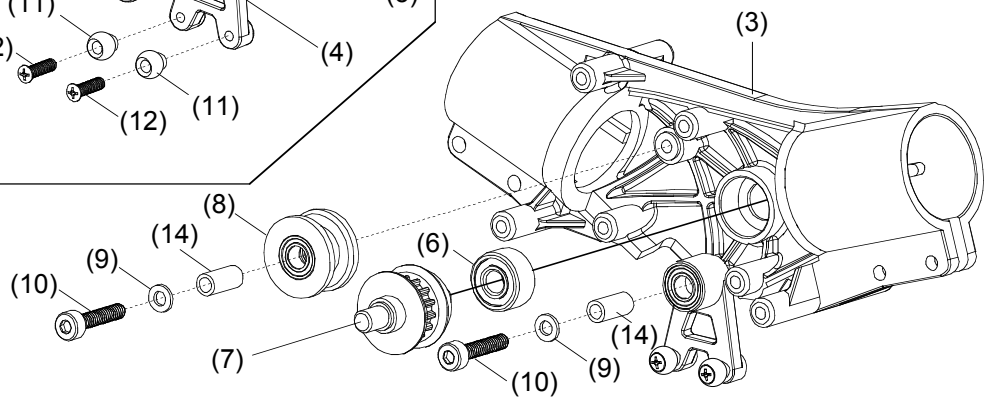
TAIL TRANSMISSION ASSEMBLY / 尾傳動機構組裝（1）

NO.	Description	名稱	Qty	Note
1	BELT MXL-3t (448T)	皮帶	1	NEW
2	TAPPING SCREW (W/WASHER) M2x10	圓頭墊圈自攻螺絲	2	NEW
3	GEAR BOX	轉向座	1	NEW
4	V-BAR	球頭轉接座	1	NEW
5	BEARING d3xD6x2.5t	滾珠軸承	2	NEW
6	BEARING d3xD8x4t	滾珠軸承	1	NEW
7	PULLEY SET	轉向皮帶輪組	1	NEW
8	GUIDE PULLEY SET	導輪組	1	NEW
9	WASHER d2xD3.7x0.5t	墊片	2	NEW
10	SOCKET SCREW M2x10	內六角螺絲	2	NEW
11	LINKAGE BALL (D3.8)	連接頭	2	NEW
12	COUNTERSUNK SCREW M1.6x6	圓頭十字螺絲	2	NEW
13	TAIL BOOM-B (52mm)	尾管B	1	NEW
14	COLLAR d2xD3x6.3t	軸套	2	NEW

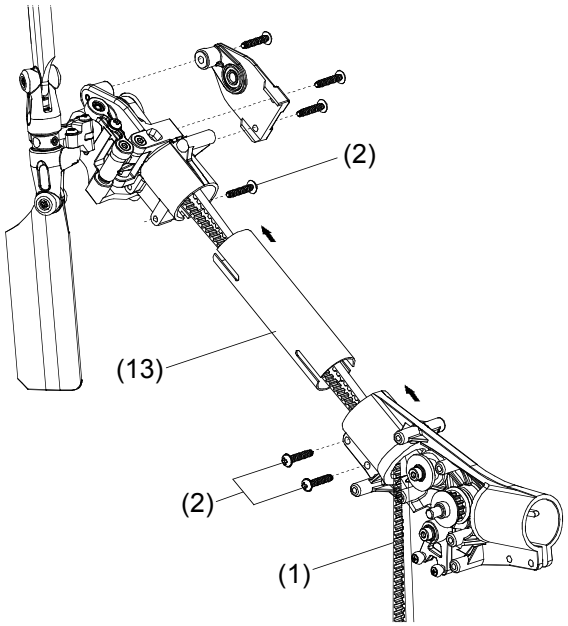
STEP 1

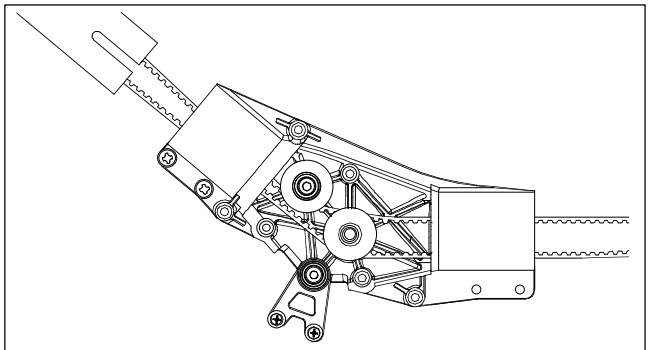


STEP 2



STEP 3

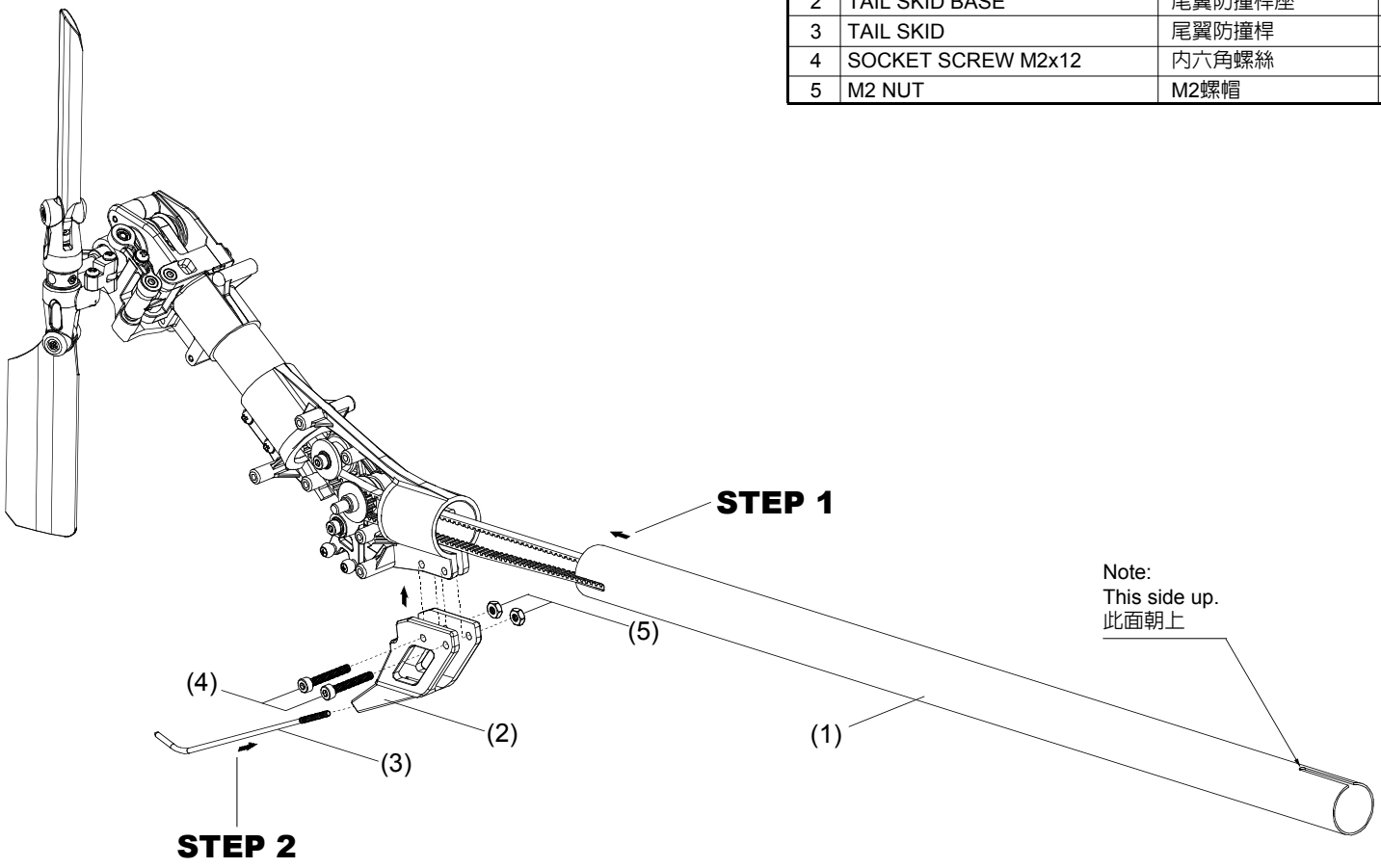




Note the drive belt arrangement
注意皮帶安裝方式

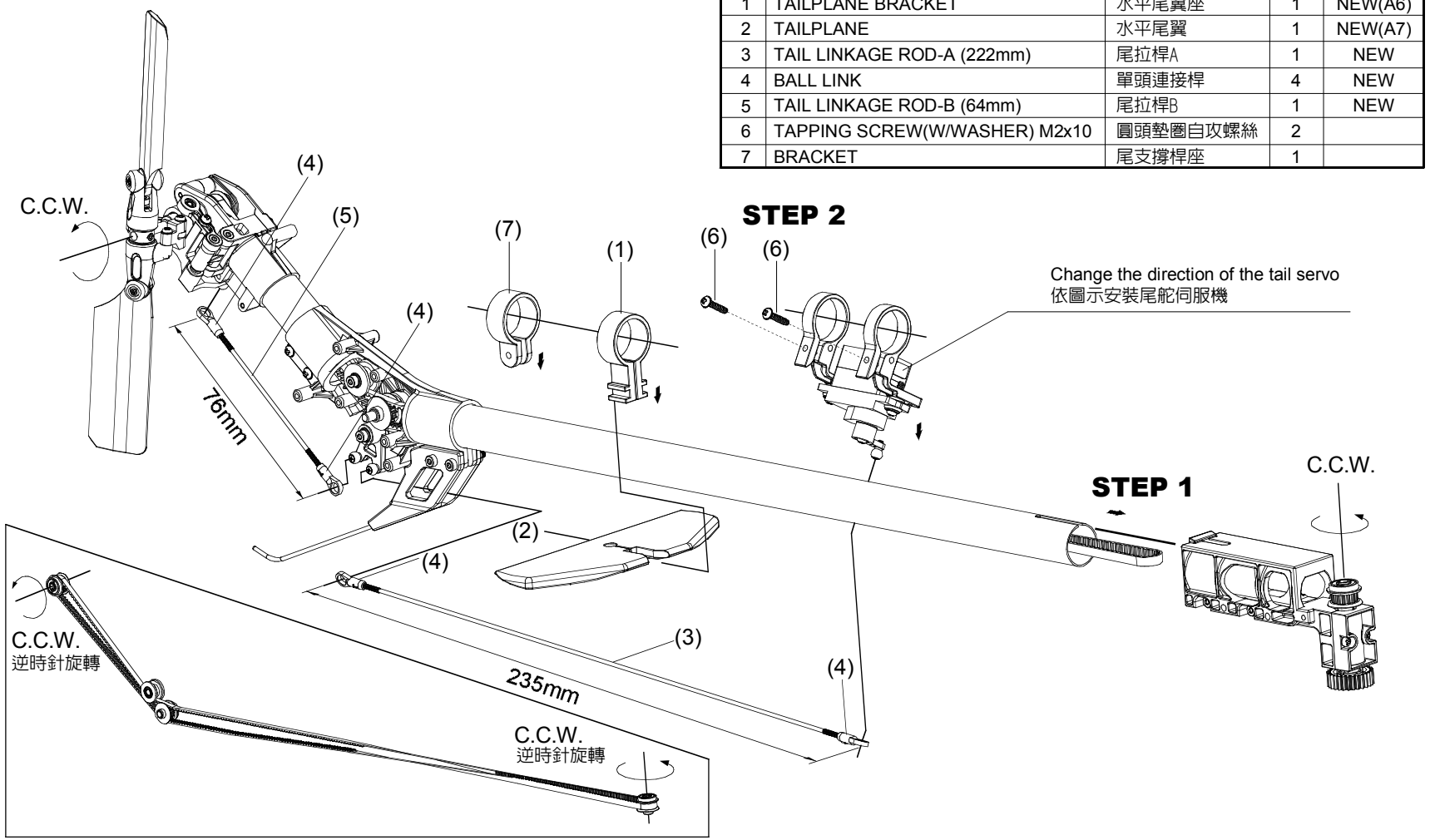
TAIL TRANSMISSION ASSEMBLY / 尾傳動機構組裝（2）

NO.	Description	名稱	Qty	Note
1	TAIL BOOM-A (300mm)	尾管A	1	NEW
2	TAIL SKID BASE	尾翼防撞桿座	1	NEW
3	TAIL SKID	尾翼防撞桿	1	NEW
4	SOCKET SCREW M2x12	內六角螺絲	2	NEW
5	M2 NUT	M2螺帽	2	NEW



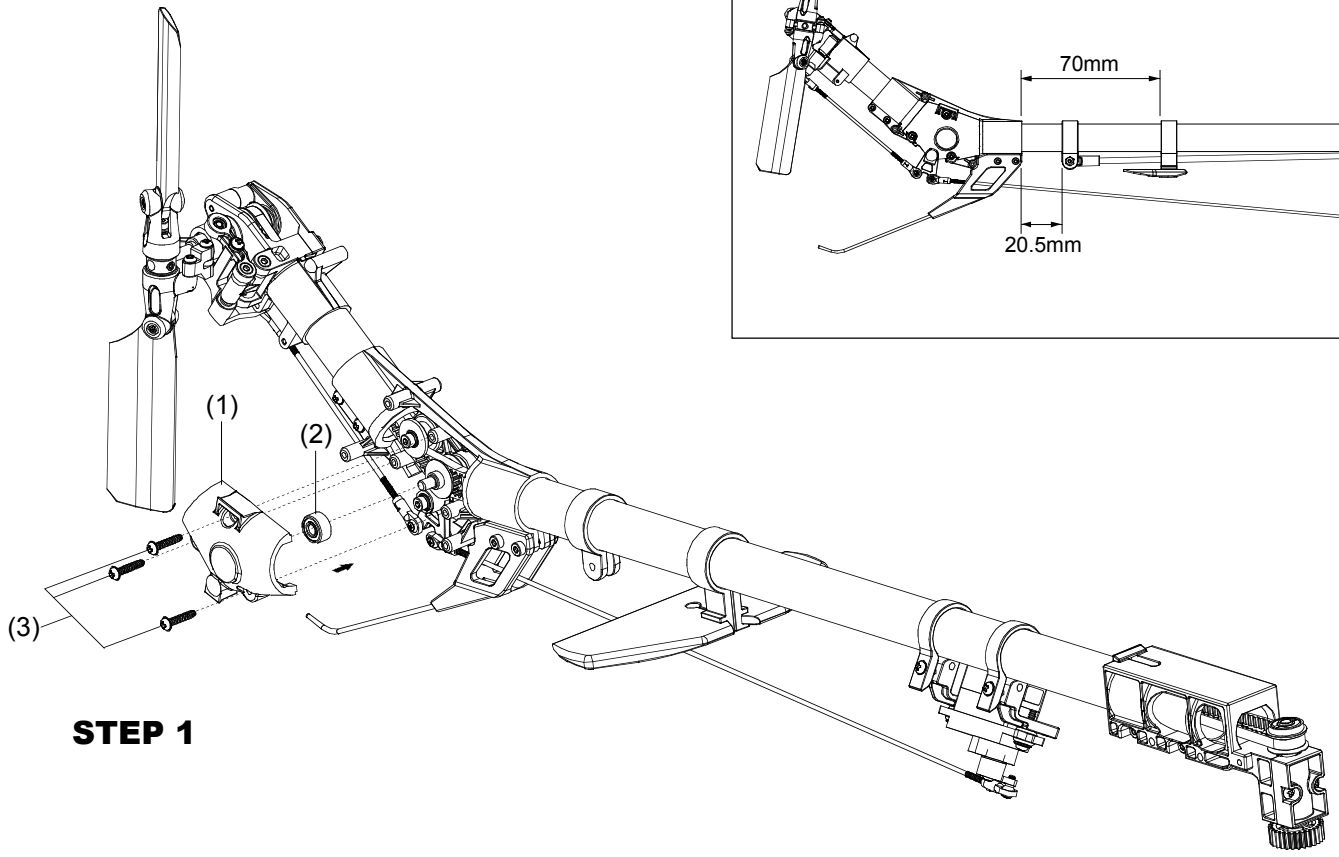
TAIL TRANSMISSION ASSEMBLY / 尾傳動機構組裝（3）

NO.	Description	名稱	Qty	Note
1	TAILPLANE BRACKET	水平尾翼座	1	NEW(A6)
2	TAILPLANE	水平尾翼	1	NEW(A7)
3	TAIL LINKAGE ROD-A (222mm)	尾拉桿A	1	NEW
4	BALL LINK	單頭連接桿	4	NEW
5	TAIL LINKAGE ROD-B (64mm)	尾拉桿B	1	NEW
6	TAPPING SCREW(W/WASHER) M2x10	圓頭墊圈自攻螺絲	2	
7	BRACKET	尾支撐桿座	1	



TAIL TRANSMISSION ASSEMBLY / 尾傳動機構組裝（4）

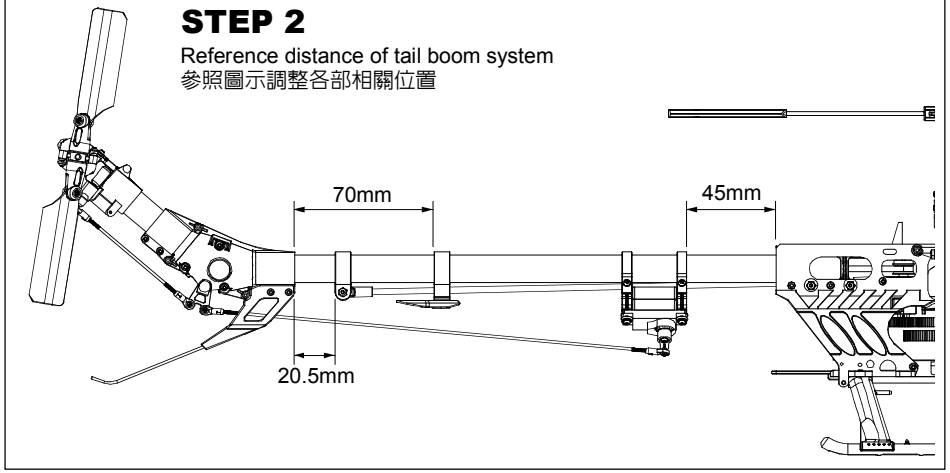
NO.	Description	名稱	Qty	Note
1	GEAR BOX COVER	轉向座側蓋	1	NEW
2	BEARING d3xD8x4t	滾珠軸承	1	NEW
3	TAPPING SCREW(W/WASHER) M2x10	圓頭墊圈自攻螺絲	3	NEW



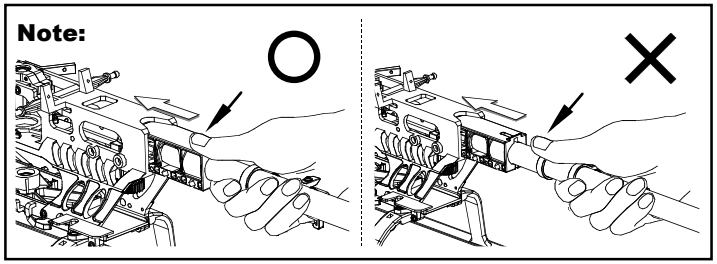
STEP 1

STEP 2

Reference distance of tail boom system
參照圖示調整各部相關位置

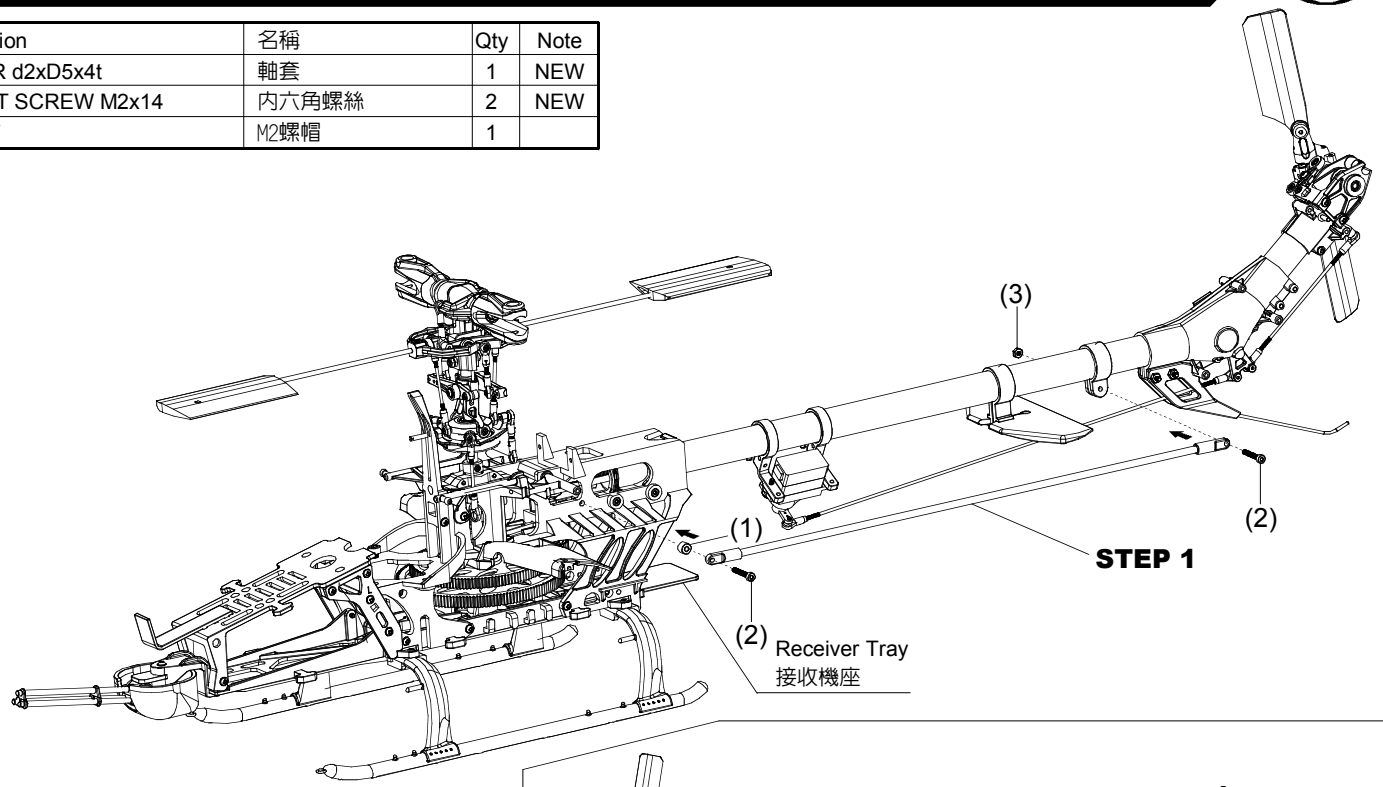


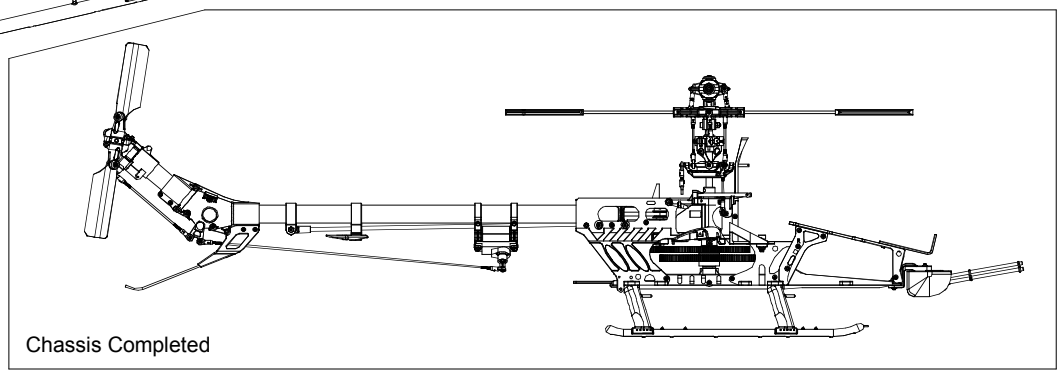
TAIL TRANSMISSION ASSEMBLY / 尾傳動機構組裝（5）



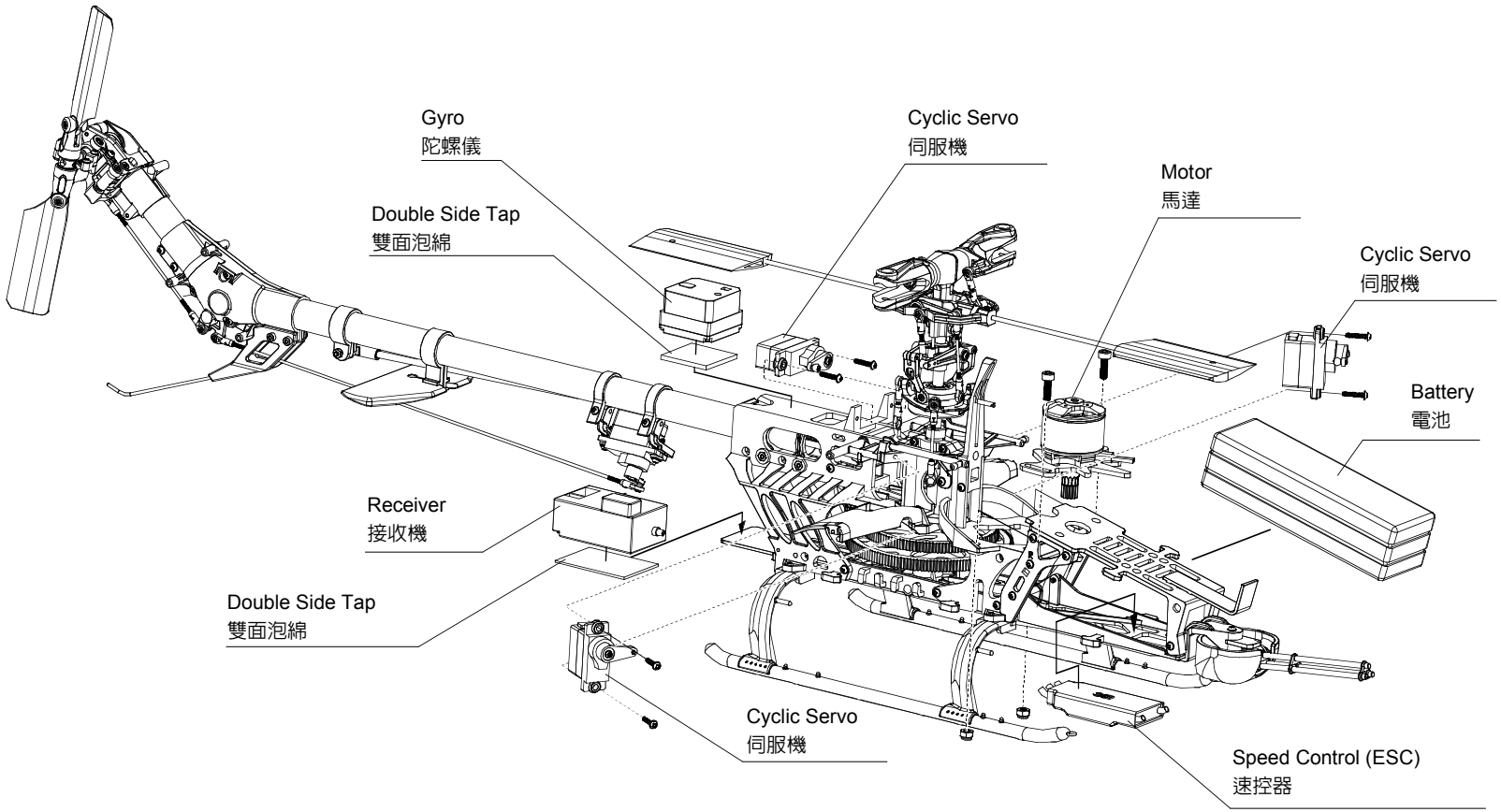
TAIL TRANSMISSION ASSEMBLY / 尾傳動機構組裝（6）

NO.	Description	名稱	Qty	Note
1	COLLAR d2xD5x4t	軸套	1	NEW
2	SOCKET SCREW M2x14	內六角螺絲	2	NEW
3	M2 NUT	M2螺帽	1	

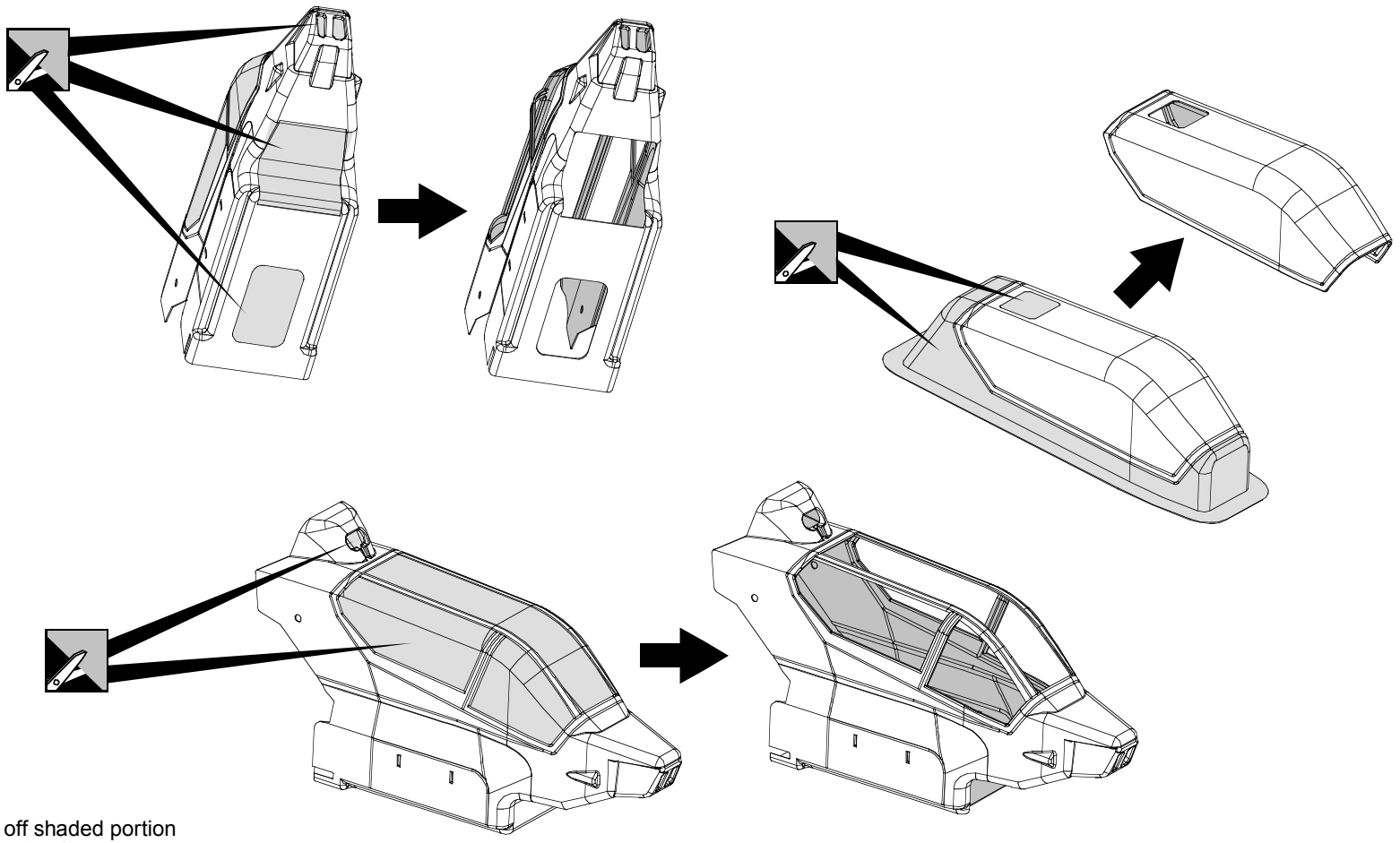



Chassis Completed

ELECTRONIC CONTROL SYSTEM / 電控系統

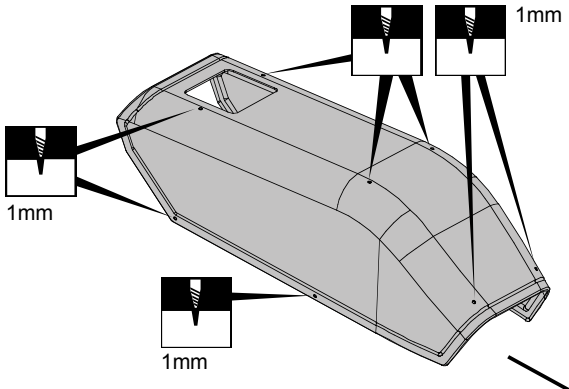


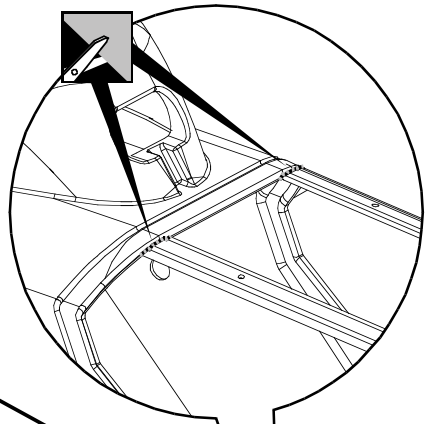
FRONT BODY AND CANOPY CUTING / 前機身及機艙罩裁剪

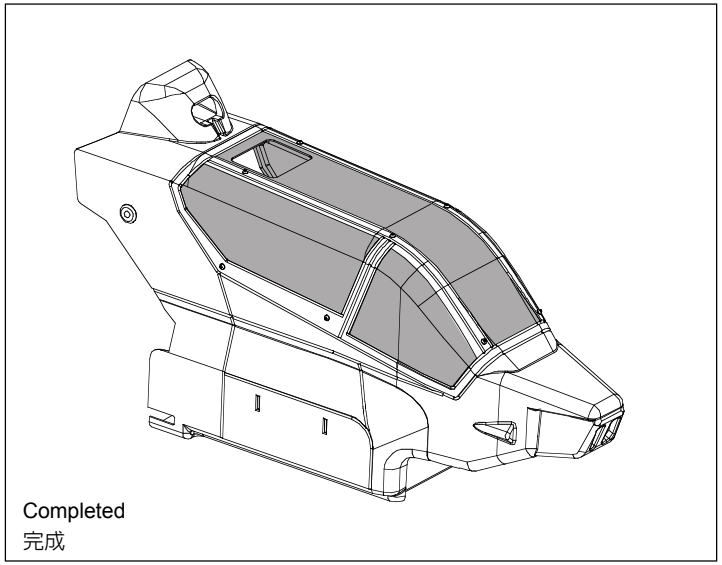


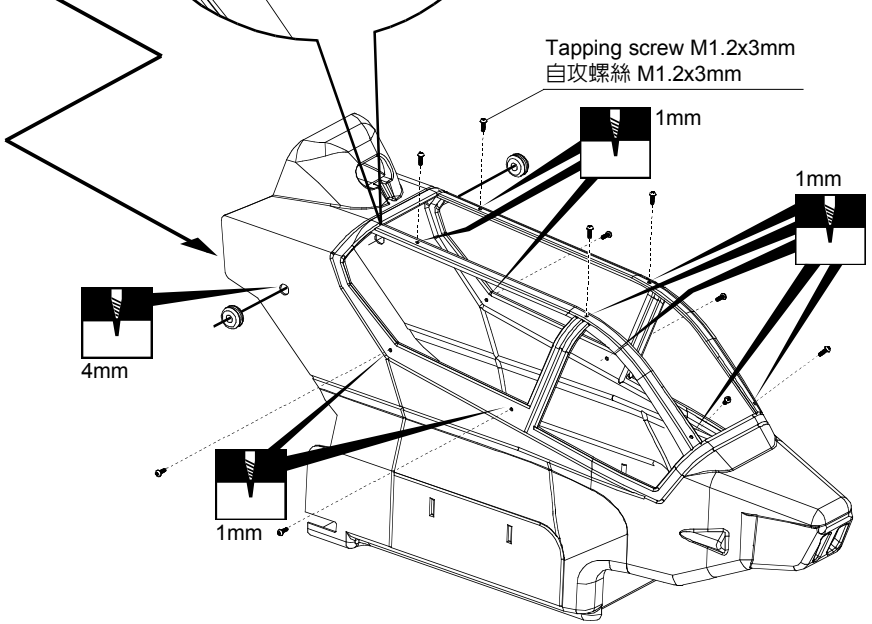
Cut off shaded portion
依標示部分裁切

FRONT BODY ASSEMBLY / 前機身組裝





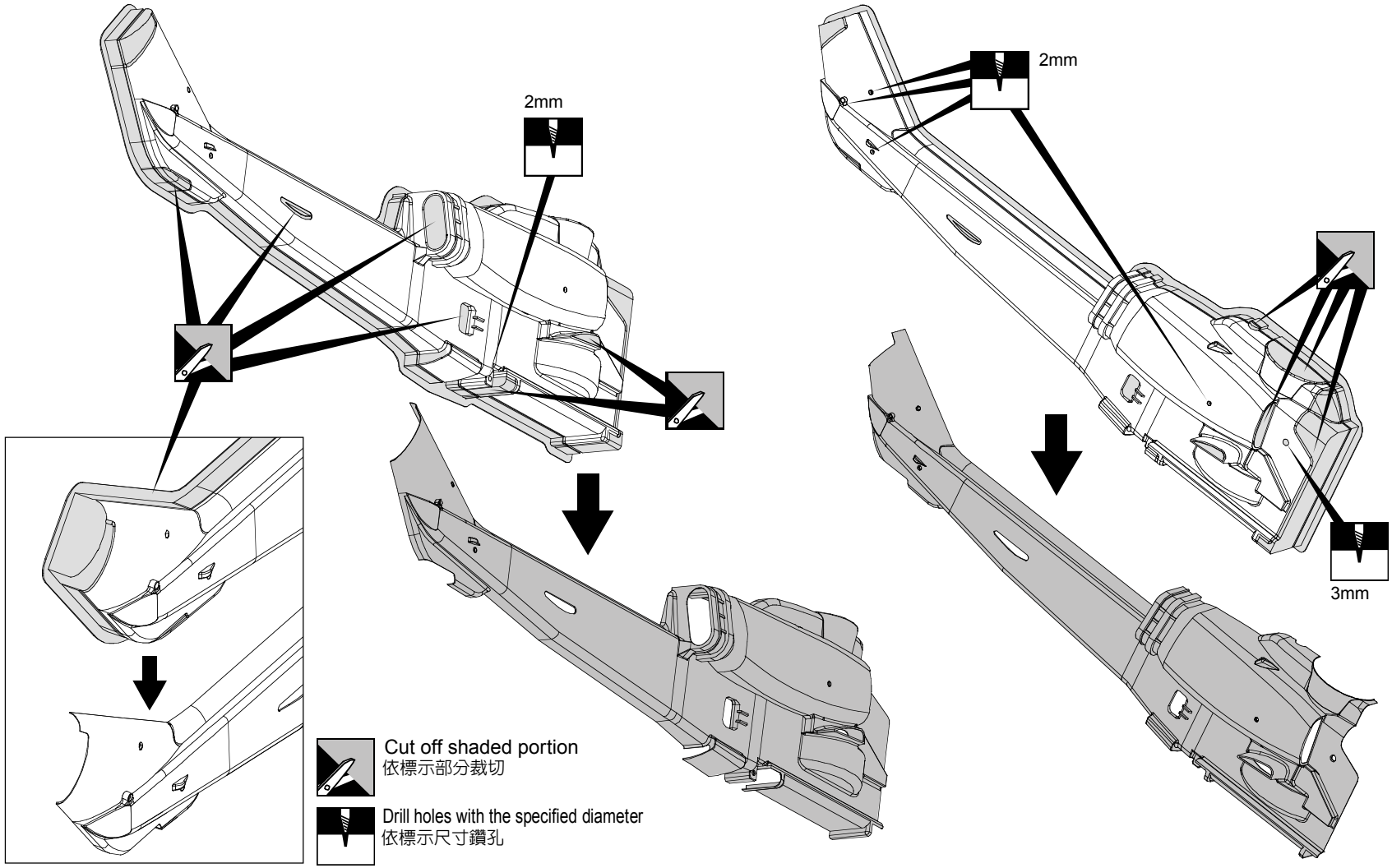




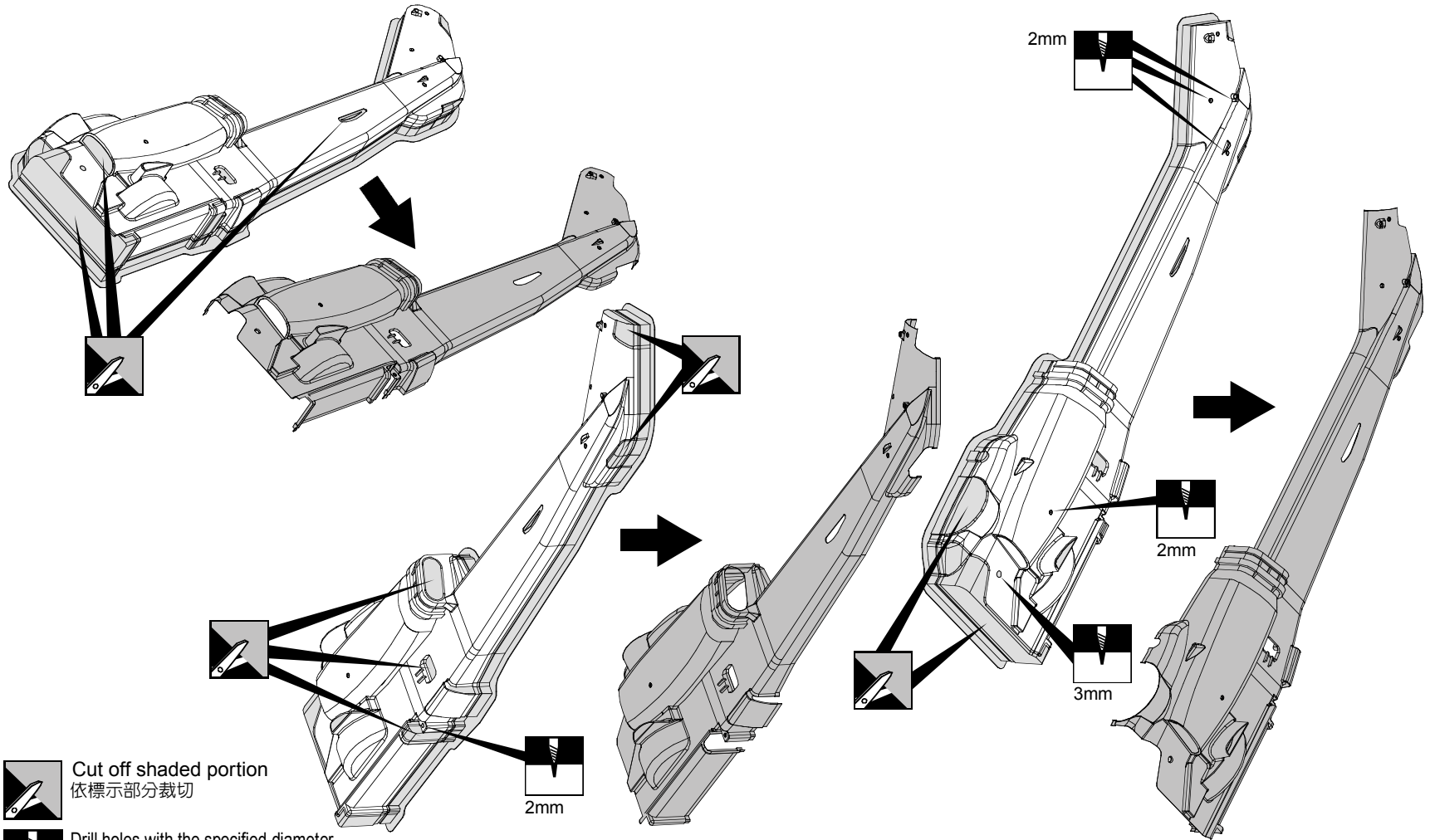
Cut off shaded portion
依標示部分裁切

Drill holes with the specified diameter
依標示尺寸鑽孔

RIGET REAR BODY CUTING / 右機身剪裁



LEFT REAR BODY CUTING / 左機身剪裁

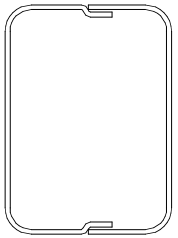


SCALE BODY ASSEMBLY / 像真機殼組裝（1）

NO.	Description	名稱	Qty	Note
1	TAPPING SCREW(W/WASHER) M2x10	圓頭墊圈自攻螺絲	2	NEW
2	TAPPING SCREW(W/WASHER) M2x6	圓頭墊圈自攻螺絲	8	NEW

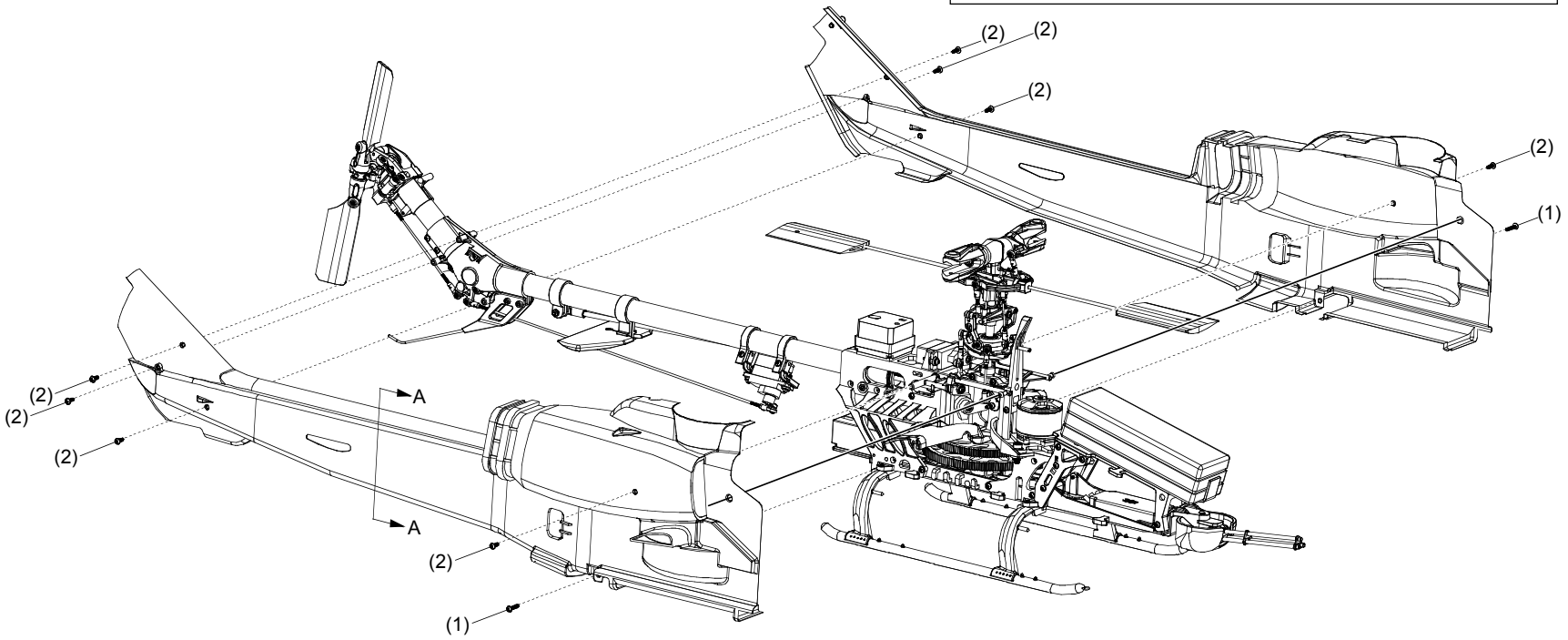
Note:

Left Rear Body



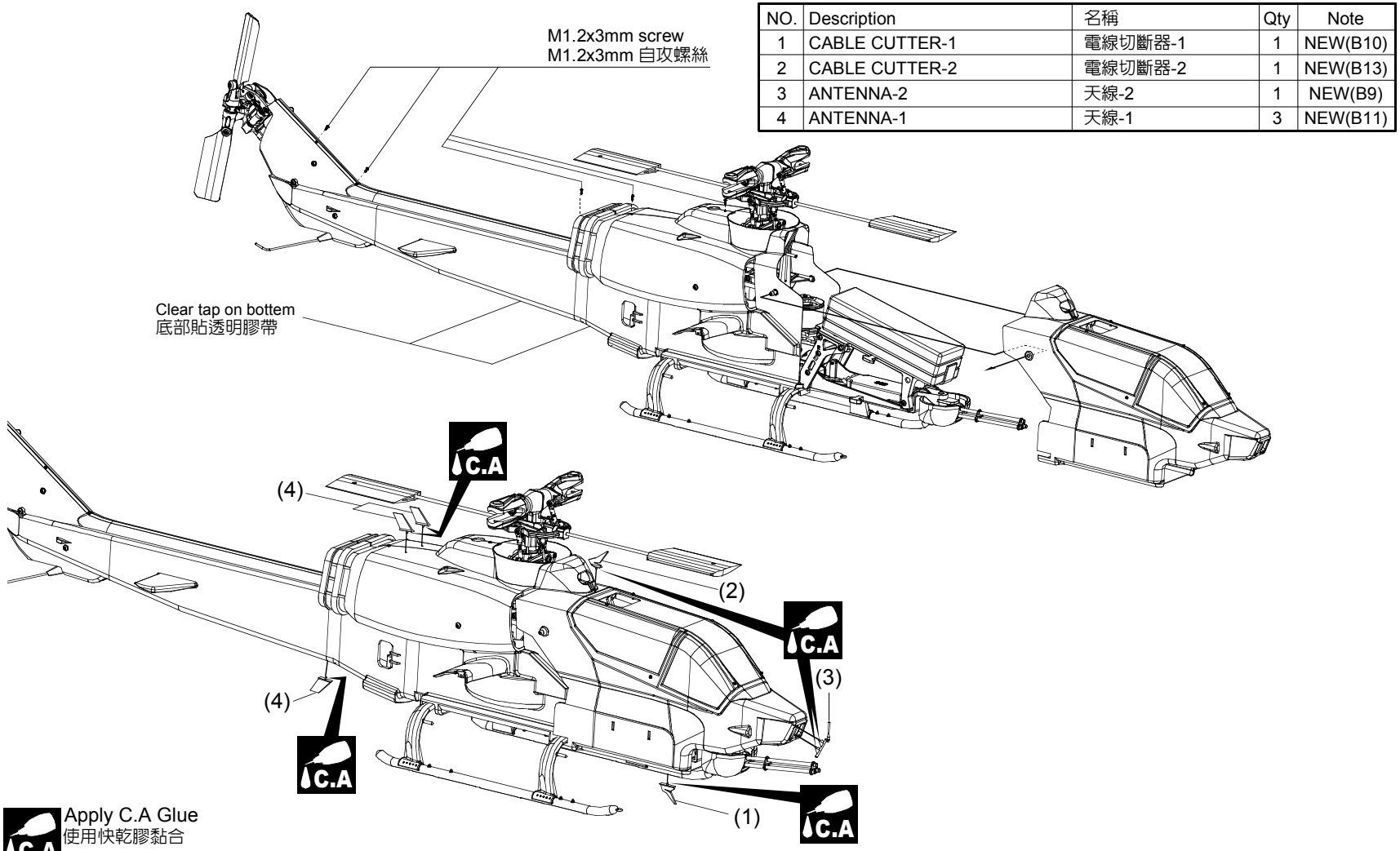
Right Rear Body

Section A-A

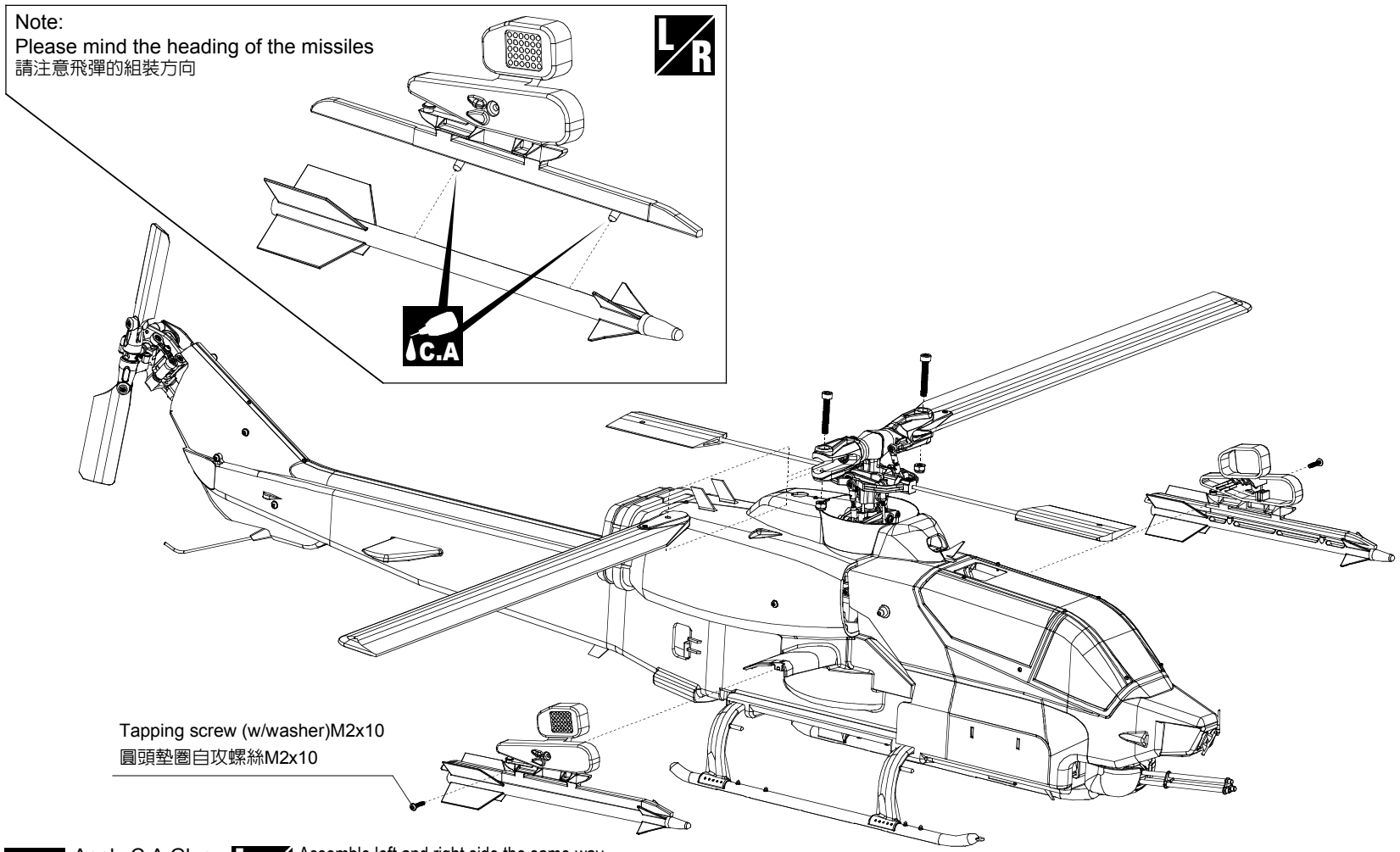


SCALE BODY ASSEMBLY / 像真機殼組裝（2）

NO.	Description	名稱	Qty	Note
1	CABLE CUTTER-1	電線切斷器-1	1	NEW(B10)
2	CABLE CUTTER-2	電線切斷器-2	1	NEW(B13)
3	ANTENNA-2	天線-2	1	NEW(B9)
4	ANTENNA-1	天線-1	3	NEW(B11)



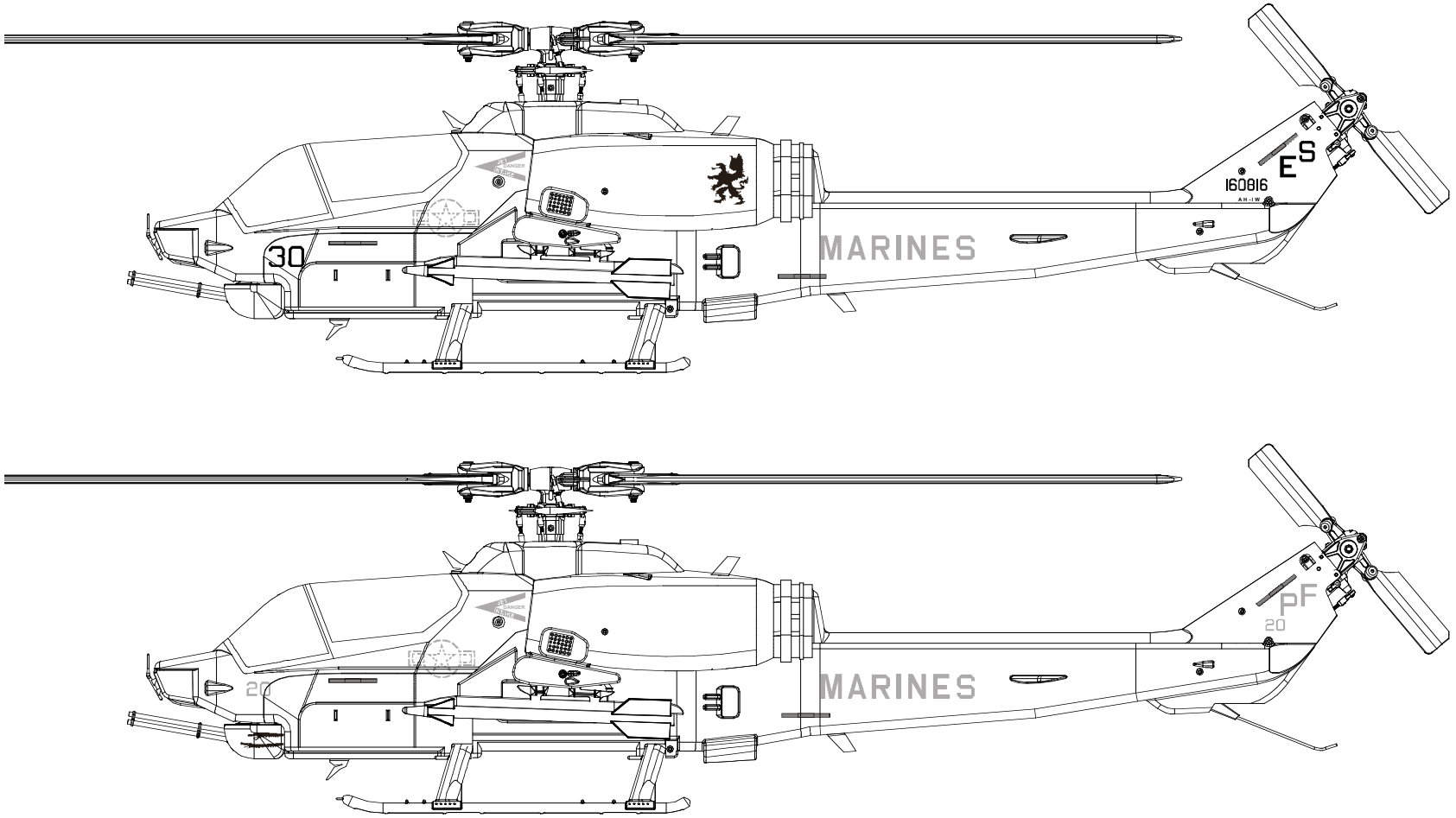
SCALE BODY ASSEMBLY / 像真機殼組裝（3）



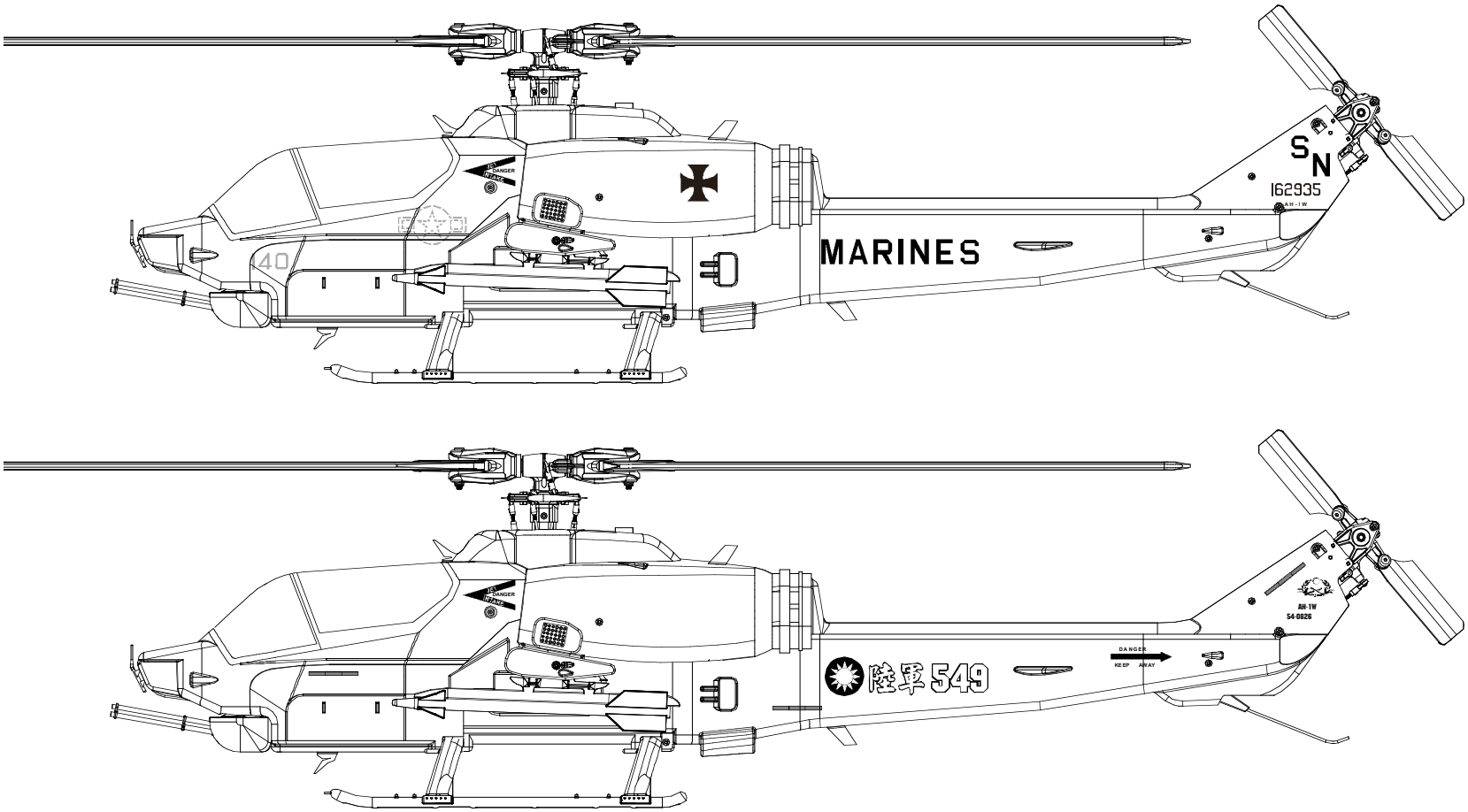
C.A Apply C.A Glue
使用快乾膠黏合

L/R Assemble left and right side the same way
左右側組裝方式相同

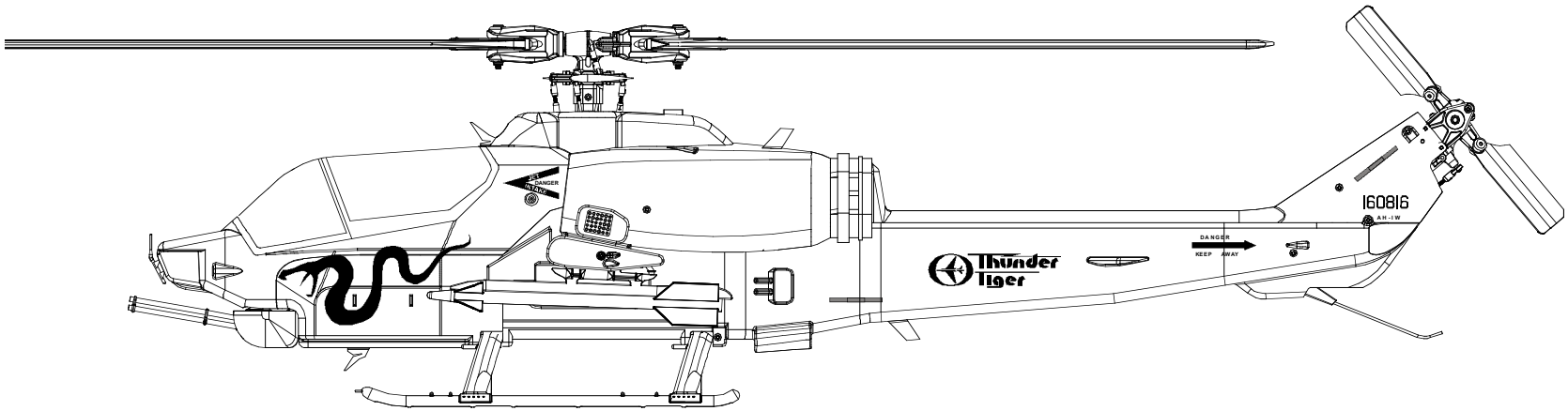
APPLYING DECALS / 機身貼紙（1）



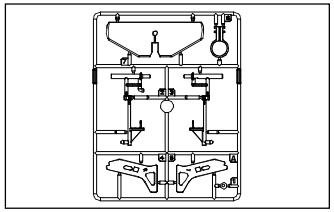
APPLYING DECALS / 機身貼紙（2）



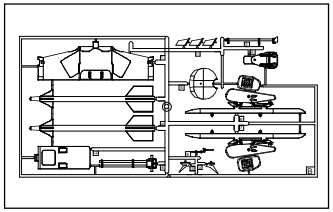
APPLYING DECALS / 機身貼紙（3）



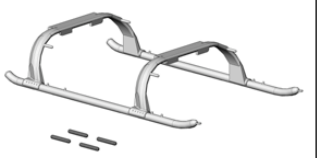
AH-1W CONVERSION KIT SPARE PARTS / 維修零件包



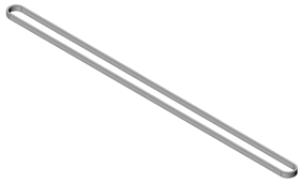
PV0901 TAILPLANE SET
水平尾翼組



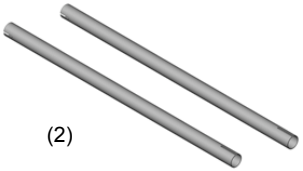
PV0902 WEAPON SET
武器零配件組



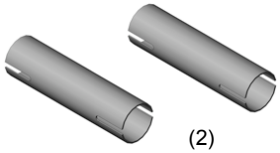
PV0903 LANDING SKID
腳架



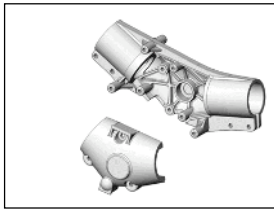
PV0904 DRIVE BELT (448T)
皮帶



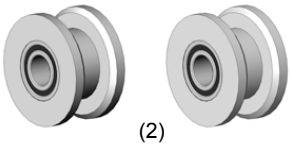
PV0905 TAIL BOOM-A (300mm)
尾管-A



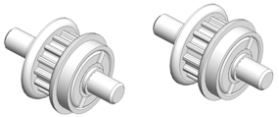
PV0906 TAIL BOOM-B (52mm)
尾管B



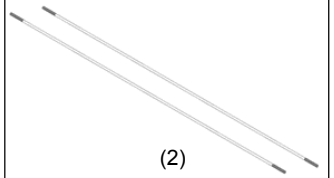
PV0907 TAIL GEAR BOX SET
尾轉折機構組



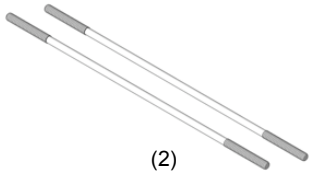
PV0908 GUIDE PULLEY SET
導輪組



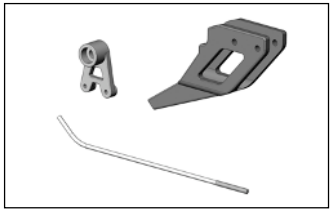
PV0909 PULLEY SET
轉向皮帶輪組



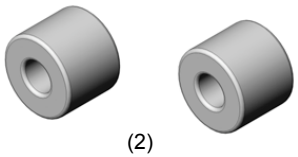
PV0910 LINKAGE ROD-A(222mm)
尾拉桿A



PV0911 T.LINKAGE ROD-B(64mm)
尾拉桿B



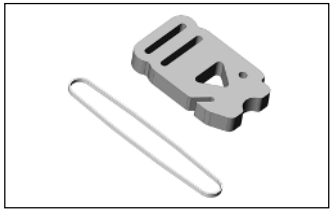
PV0912 TAIL SKID SET
尾翼防撞桿組



PV0913 COLLAR d2xD5x4t
軸套



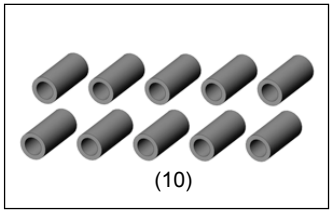
PV0917 AH-1W Decal
AH-1W機身貼紙



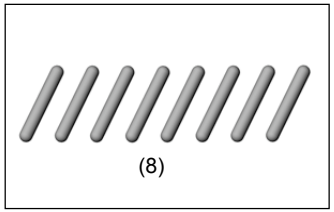
PV0918 BLADE HOLDER
像真機主旋翼固定架



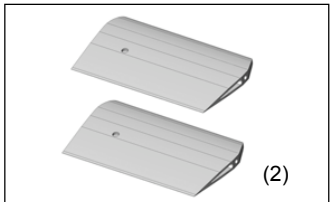
PV0919 BEARING d3xD6x2.5t
軸承d3xD6x2.5t



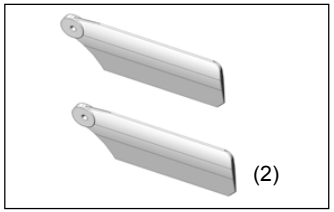
PV0920 COLLAR d2xD3x6.3t
軸環d2xD3x6.3t



PV0921 SKID DAMPER
止滑橡膠條

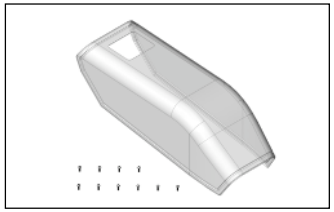


PV0922 FLYBAR PADDLE (BLACK)
穩定翼（黑）

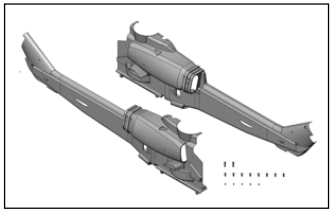


PV0923 TAIL ROTOR(BLACK)
尾旋翼（黑）

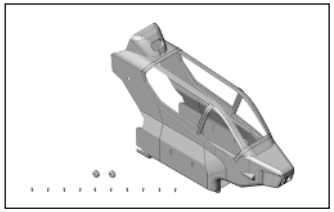
AH-1W CONVERSION KIT SPARE PARTS / 維修零件包



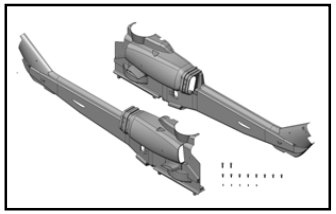
PV0916 CANOPY
機艙罩



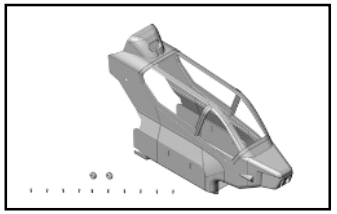
PV0914 REAR BODY SET (CLEAR)
後機身組（透明）



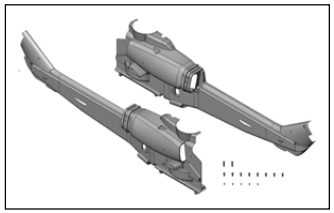
PV0915 FRONT BODY (CLEAR)
前機身（透明）



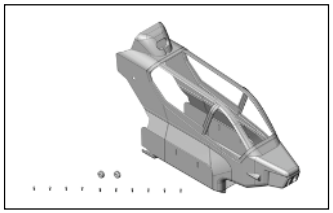
PV0924 REAR BODY SET (BLUE GRAY)
後機身組（空優迷彩）



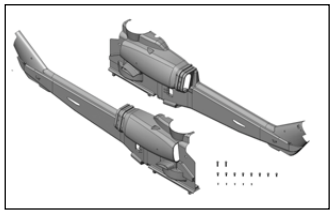
PV0925 FRONT BODY (BLUE GRAY)
前機身（空優迷彩）



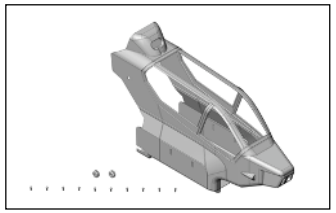
PV0926 REAR BODY SET (DESERT STORM)
後機身組（沙漠迷彩）



PV0927 FRONT BODY (DESERT STORM)
前機身（沙漠迷彩）



PV0928 REAR BODY SET (FIELD GREEN)
後機身組（叢林迷彩）

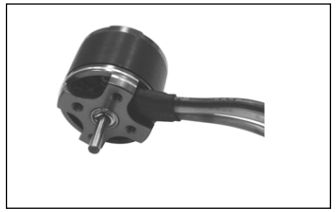


PV0929 FRONT BODY (FIELD GREEN)
前機身（叢林迷彩）

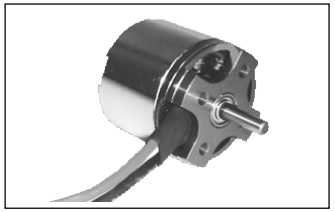
AH-1W ACCESSORIES / 附屬配件



1198 BALL LINK REAMER
D3.8mm球頭擴孔器



2381 BL. MOTOR, OBL 29/35-10H
無刷馬達（3500kv）



2382 BL. MOTOR, OBL 29/37-10H
無刷馬達（3700kv）



2532 Li-Po BATTERY E-CHARGER ELC 4
鋰鎳電池充電器



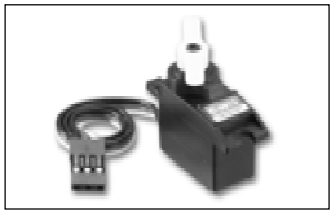
2808 LI-PO BATT,3S1P/2200mAh/20C
鋰鎳電池



8041-H SPEED CONTROL, ACE BLC-40
速控器（40A）



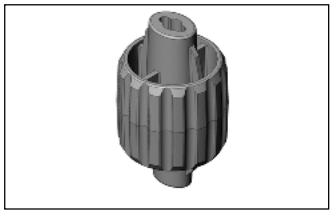
8117 ACE RC MICRO SERVO , C1016
迷你伺服機



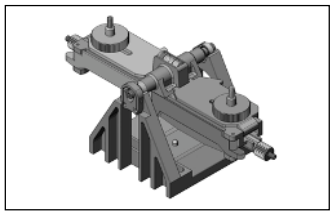
8131 ACE RC MICRO SERVO , C0915
尾舵伺服機



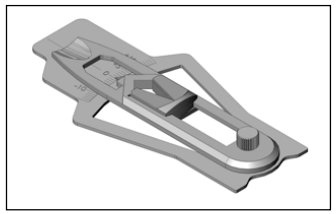
1075 BALL LINK PLIERS
連桿專用鉗（∅3.8mm）



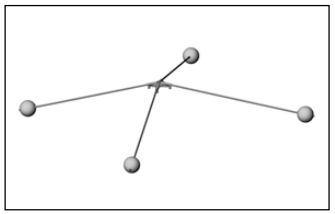
1076 BALL LINK WRENCH
單頭連接桿板手



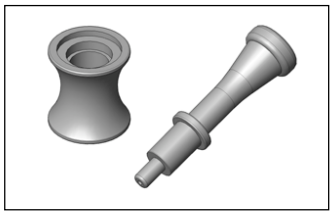
1077 BLADE BALANCER
主旋翼平衡器



1078 PITCH GAUGE
螺距尺

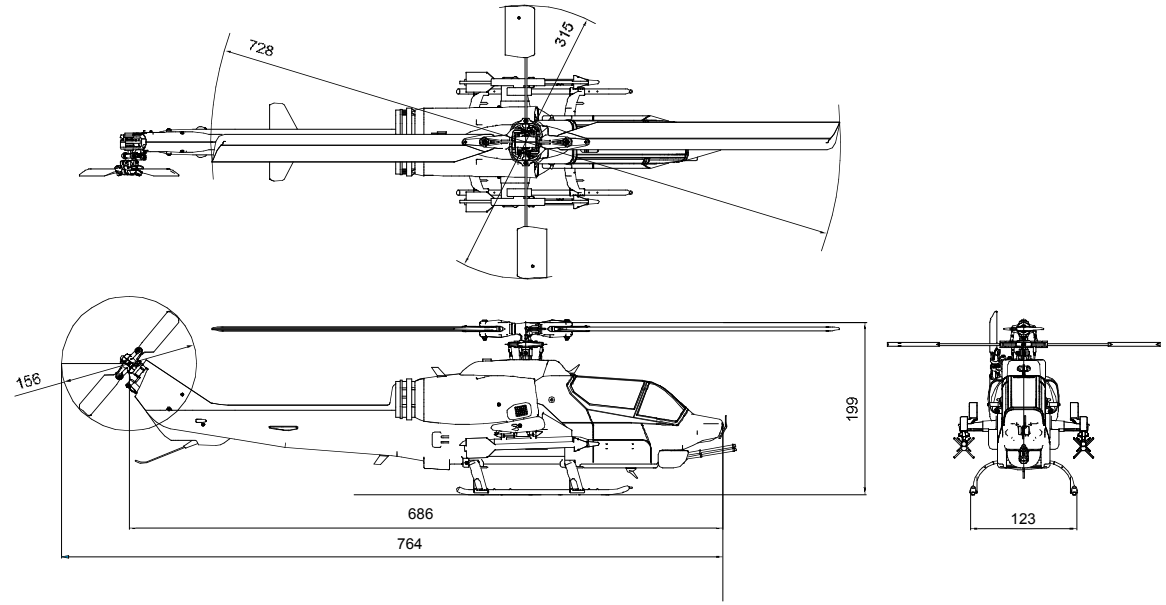


1079 TRAINING GEAR
練習架



1080 ONE WAY BEARING RELEASER
單向軸承退出器

SPECIFICATION / 規格



Fuselage length: 27" (686 mm)
Fuselage width: 4.8" (123mm)
Total height: 7.8" (199mm)
Main rotor dia.: 29.45" (748mm)
Tail rotor dia.: 6.14" (156mm)
Gear ratios: 1 : 11.5 : 4.4
Full equipped weight: 900g (31.7 oz)

FEATURES / 特點

1. High-positioned tail rotor mechanism
2. Tail skid and horizontal tailplane
3. Missiles, machine gun and flare dispenser
4. Scale real-like landing skid, antenna and cable cutter
5. Light PVC body, easy for assembling and painting
6. Clear body and 3 types of painting scheme for your choices



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