

AB40

Interior Upgrade Kit MN 3501



MM35006
1931-45 SERIES
1 / 35

Autoblinda ITALIAN ARMORED CAR AB40

Veicolo blindato italiano Ab40
意大利AB40装甲侦察车
イタリアのAB40装甲偵察車



LANMO
MODEL
蘭模型



AB40简介

AB40装甲车是意大利皇家陆军(Regio Esercito, 英语: Royal Italian Army)在二战前研发的最具创新性的侦察车。菲亚特和安萨尔多合作响应了两项新型装甲车的需求:一是替换意大利皇家陆军中服役的旧式蓝旗亚I2M、菲亚特-特尔尼-的黎波里和菲亚特611装甲车;二是替换意大利非洲警察(Polizia dell'Africa Italiana, 英语: PAI)中服役的蓝旗亚I2M。

The AB40 armored car was the most innovative reconnaissance vehicle of the Regio Esercito (Eng: Royal Italian Army) developed before the Second World War. FIAT and Ansaldo collaborated to respond to two requests for new armored cars: the first was to replace the old Lancia I2M, FIAT-Terni-Tripoli and FIAT 611 armored cars in service in the Royal Italian Army; whilst the second, was to replace the Lancia I2M in service in the 'Polizia dell'Africa Italiana' or PAI (Eng: Italian Police in Africa).

AB40的研发

意大利皇家陆军最高统帅部认为装甲车是其现代战争理论的基础,首先是远程侦察能力,其次是步兵支援能力。意大利陆军是首批测试装甲车的部队之一,1912年菲亚特军械库就曾测试过装甲车。后来,在第一次世界大战期间,蓝旗亚和菲亚特装甲车的性能给意大利人留下了深刻的印象。

20世纪30年代中期,意大利皇家陆军意识到,第一次世界大战期间生产的Lancia I2M和FIAT-Terni-Tripoli装甲车虽然在步兵支援方面仍然具有一定的效力,但装备较差,防护能力较差,越野驾驶性能也不达标。

1932年,菲亚特611投入生产。这款装甲车基于菲亚特611底盘,时速28公里/小时,续航里程180公里,但如此低速和短距离的设计并未给最高统帅部留下深刻印象,最终产量不足50辆。1937年,十辆蓝旗亚I2M被派往西班牙内战中支援国民军。当时,虽然这些车辆作为支援车辆仍然有效,但它们显然已无法执行侦察任务。1937年末,皇家陆军决定下令研发一款用于远程侦察的新型装甲车。

20世纪30年代,负责意大利殖民地安全的警察部队PAI仍在使用老式的蓝旗亚I2M,这种车不太适合沙漠作战,同时还改装了装甲运兵车来对抗利比亚和埃塞俄比亚的反殖民主义团体。1935年至1936年,PAI测试了一些轻型坦克,但由于射程短,被认为不适合执行所需的任务,因此并未受到重视。1937年,PAI领导层主动向意大利公司请求研制一种用于远程侦察的装甲车原型。

Development of the AB40

The High Command of the Royal Italian Army considered armored cars fundamental to its modern warfare doctrine, firstly in the long-range reconnaissance role and, secondly, for infantry support tasks. The Italian Army was one of the first armies to test armored cars, with the FIAT Arsenal in 1912. Later, during World War I, the Italians were positively impressed by the capabilities of the Lancia and FIAT armored cars.

In the mid '30s, the PAI, the police corps in charge of the security of the Italian colonies, still used the old Lancia I2M and FIAT-Terni-Tripoli armored cars produced during the First World War, while still moderately effective in the infantry support role, were by now poorly armed, poorly protected and with substandard off-road driving characteristics.

In 1932, the FIAT 611 was produced. This armored truck was based on the FIAT 611C chassis with a speed of 28 km/h and a range of 180 km, but this low speed and short-range did not impress the High Command and less than 50 were produced. In 1937, ten Lancia I2M were sent to assist the Nationalists in the Spanish Civil War, where it was clear that, although still efficient as support vehicles, they could no longer carry out reconnaissance activities. In late 1937, the Royal Army decided to issue an order for the development of a new armored car for long-range reconnaissance.

In the 1930s, the PAI, the police corps in charge of the security of the Italian colonies, still used the old Lancia I2M, which were not very suitable for desert use, and also improvised armored cargo trucks to face the anti-colonialist groups in Libya and Ethiopia. In 1935-1936, the PAI tested some light tanks, but they were not appreciated for their short-range, which was considered unsuitable for the required tasks. In 1937, out of their own accord, the command of the PAI requested Italian companies the development of an armored car prototype for long-range reconnaissance.

原型的历史

菲亚特和安萨尔多公司合作开展了该项目,决定将两个需求结合起来,生产一款能够同时满足意大利皇家陆军和意大利皇家空军需求的车辆。AB40就这样诞生了。1938年4月11日,陆军军官们在参观热那亚的安萨尔多工厂时,收到了这款装甲车的第一个木制模型。该模型与最终的车辆非常相似。采用四轮驱动,四个独立悬架转向轮,汽油发动机,武器包括三挺8毫米机枪,乘员四人。

木制模型生产完成后,又制造了两辆这种装甲车的原型车,当时称为AutoBlindoMitragliatrice,或ABM(英语:机枪装甲车)。第一辆原型车的制造日期不详,但现有的照片显示其拍摄于1939年5月5日,原型车注册为“Autoblinda RE”(代表Regio Esercito)。这辆原型车以及交付给PAI的装甲车原型车(最初注册为“Polizia Coloniale 0021”)的前装甲配置与最终型号相同。然而,车头灯尚未安装在车顶结构内的整流罩内,发动机罩上的维修舱口也没有进气口。

1939年5月15日,菲亚特在都灵米拉非里工厂落成之际,向殖民地警察和军队正式展示了两辆装甲车原型。随后,这两辆原型车首次向贝尼托·墨索里尼、陆军最高统帅部和意大利航空部队(PAI)指挥官展示。墨索里尼对这辆车印象深刻,并对其外形赞不绝口。当时的一些意大利报纸写道,意大利领导人将这辆车描述为“意大利优雅的典范”。

两辆车在一些细节上有所不同。殖民地警察版配备了一个固定在炮塔顶部的大型前照灯,并在车体右前方固定了一个垂直无线电天线。车体后部安装了警报器,备用轮胎上覆盖着装甲板。陆军版(临时重新注册为“Test TO.64”)的特点是车体前部装甲倾斜,且备用轮胎未受保护。与1939年5月5日照片中识别出的原型车相比,在1939年5月/6月的测试中,皇家陆军版的原型车的进气口位于发动机甲板上。两辆车的车前照灯都装有装甲。目前尚不清楚1939年5月5日的原型车和贴有“Test TO.64”牌照的原型车是否是同一辆车,但都灵的非亚特档案馆没有提及及其他原型车的生产情况。

History of the Prototype

FIAT and Ansaldo collaborated on the project, deciding to combine the two requests and to produce a single vehicle that would meet the needs of the PAI and of the Royal Italian Army. Thus, the AB40 was born. A first wooden model of the armored car was presented to Army officers during their visit to the Ansaldo factory in Genoa on 11 April 1938. The mockup was very similar to the final vehicle, with four-wheel drive, 4 steered wheels with independent suspension, petrol engine, armament composed of three 8 mm machine guns, and 4 crew members.

After the production of the wooden mock-up, two prototypes of the armored car, then called AutoBlindoMitragliatrice, or ABM (Eng: Machine gun Armored Car), were built. There is no precise date for the construction of the first prototype, but available photos are dated 5 May 1939 and the prototype was registered as 'Autoblinda RE' (for the Regio Esercito). The configuration of the front armor on this first prototype and on the prototype of the armored car destined for the PAI (initially registered 'Polizia Coloniale 0021') would be the one maintained on the final model. However, the headlights were not yet in the fairings inside the superstructure and the maintenance hatches on the engine hood were without air intakes.

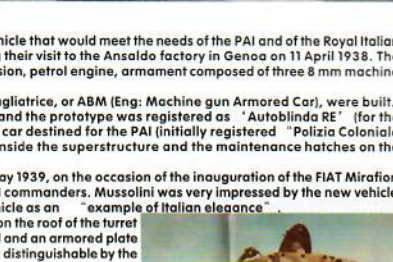
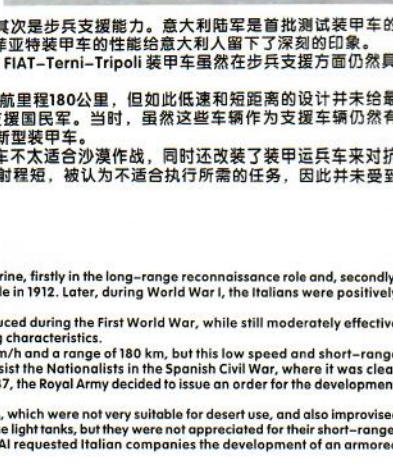
The official presentation of the two armored car prototypes for the colonial police and the army took place on 15 May 1939, on the occasion of the inauguration of the FIAT Mirafiori plant in Turin. Then, these were shown for the first time to Benito Mussolini, the Army High Command and the PAI commanders. Mussolini was very impressed by the new vehicle and appreciated its silhouette. Some Italian newspapers of the time wrote that the Duce of Italy defined the vehicle as an "example of Italian elegance".

The two vehicles differed in some details. The colonial police version was equipped with a large headlamp fixed on the roof of the turret and had a vertical radio antenna fixed on the front right of the superstructure, a siren on the rear part of the hull and an armored plate covering the spare wheels. The version intended for the army, provisionally re-registered as 'Test TO.64', was distinguishable by the inclination of the armor at the front of the superstructure and the fact that the spare wheels were unprotected.

Compared to the prototype identified in the photos of 5 May 1939, during the test in May/June 1939, the Royal Army prototype had the air intakes on the engine deck. On both vehicles, all headlights were fitted with armor. It is not clear if the prototype of 5 May 1939 and the one with the "Test TO.64" plate are the same vehicle, but the FIAT archives in Turin do not mention the production of other prototypes.

炮塔

AB40的炮塔被称为Mod. 1940,由安萨尔多公司研发和生产,与L6/40原型车(称为M6T)上的炮塔相同。这款单座炮塔呈八角形,炮塔顶部有一个舱口,供车长/炮手使用。炮塔侧面有三个舱口,后部有一个舱口,并有两个进气口,以避免车组成员中毒,因为该车没有风扇或排烟装置。顶部舱口旁边有一个坦克车长的潜望镜,可以360度旋转,方便观察战场情况。



Turret

The turret of the AB40 was called Mod. 1940, developed by Ansaldo. It was octagonal, with one hatch on top for the commander/gunner to avoid the risk of intoxication of the crew members by the exhaust gases which allowed a view of the battlefield.

武器

武器装备包括三挺8毫米达姆弹37中型步兵机枪。机枪安装在球形支架上,与坦克上使用的相同。然而,从

Armament

The armament was composed of three 8 mm DPM machine guns. The machine gun was placed on top. This machine gun was elevated on the machine guns in the elevation of the vehicle, oriented on the right side of the vehicle, oriented and fitted on an anti-aircraft support. However, it can be seen

弹药

总共有2,040发8x59毫米达姆弹,但机枪还是配备装甲板。标准弹药在相同初速,这种武器装备并不理想,

Ammunition

In total, there were 2,040 rounds of 8x59 mm DPM ammunition, but the machine gun was still equipped with armor. Standard ammunition at the same muzzle velocity, this type of weapon was not ideal, especially

轮胎

AB40使用的轮胎由倍耐力工厂生产。倍耐力为TM40运输车辆了多款轮胎。

使用了三种轮胎。在非洲战场,(25x60厘米)轮胎。在欧洲,例如(2.8x60英寸)(22.8x60厘米)第三种是用在“Ferroviana”版AB40轮胎。

Tires

The tires used on the AB40 were produced by Pirelli. Pirelli produced several types of tires for the TM40 transport vehicle. Three types of tires were used. In Africa, (25x60 cm) tires were used. For Europe, (2.8x60 inches) (22.8x60 cm) tires were used. The third type was used on the "Ferroviana" version of the AB40 tires, which were modified by FIAT to adapt them

组装图标 ASSEMB



弯折
BEND
折り曲げ
Изгиб



贴上水贴
APPLY DECAL
水貼貼貼
Наклеивание
Лейкунавод



把孔填平
Fill the hole flat
穴を平らに埋め
Занеделит
отверстия

组色色块 ASSEMB



粘接位置
Bonding position
結合位置
Позиция
склеивания



意大利陆军是首批测试装甲车的部队，意大利人留下了深刻的印象。这款车虽然在步兵支援方面仍然具

低速和短距离的设计并未给这些车辆作为支援车辆仍然有

时还改装了装甲运兵车来对抗行军所需的任务，因此并未受到

reconnaissance role and, secondly, during World War I, the Italians were positively

car, while still moderately effective

but its low speed and short-range made it unsuitable for the Spanish Civil War, where it was clear that an order for the development

for desert use, and also improvised that appreciated for their short-range, the development of an armored

models of the PAI and of the Royal Italian Army in Genoa on 11 April 1938. The car was composed of three 8 mm machine

gun Armored Car), were built. It was registered as "Autoblinda RE" (for the Italian registered "Polizia Coloniale" and the maintenance hatches on the

the inauguration of the FIAT Mirafiori factory, he was very impressed by the new vehicle and its Italian elegance"

Turret

The turret of the AB40 was called Mod. 1940, was developed and produced by Ansaldo and was the same used on the L6/40 prototype, called M6T. The single-seater turret was octagonal, with one hatch on the turret roof for the vehicle commander/gunner. On the sides, the turret had three slots on the sides and one in the rear and two air intakes to avoid the risk of intoxication of the crew, as the vehicle did not have fans or smoke extractors. On the roof, there was a periscope of the tank commander next to the hatch, which allowed a view of the battlefield and could rotate 360°.

武器

武器装备包括三挺8毫米口径布雷达Mod. 38机枪。机枪顶部配有24发弧形弹匣。该机枪源自布雷达Mod. 37中型步兵机枪。机枪在炮塔内的最大仰角为+18°，俯角为-9°。第三挺机枪位于车辆右侧后方，并安装在球形支架上。后机枪可以拆卸并安装在炮塔顶部的防空支架上，该支架与“M”系列坦克上使用的相同。然而，从照片中可以看出，只有量产前的装甲车配备了防空支架。

Armament

The armament was composed of three 8 mm caliber Breda Mod. 38 machine guns. These had curved 24 round magazines placed on top. This machine gun was derived from the Breda Mod. 37 medium infantry machine gun. The maximum elevation of the machine guns in the turret was +18° while the depression was -9°. The third machine gun was positioned on the right side of the vehicle, oriented to the back, and placed on a ball mount. The rear machine gun could be dismounted and fitted on an anti-aircraft support, the same as that used on the "M" series tanks, on the roof of the turret. From the photographs, however, it can be seen that only the pre-series armored cars received the anti-aircraft mount.

弹药

总共有2,040发8x59毫米RB Breda弹药，装入85个机枪弹匣中，存放在白色漆成的木架上。45个存放在车体右侧，40个存放在车体左侧。虽然很少使用，但机枪还是配备了M.39 AP（穿甲弹）弹。这种弹重12克，初速780米/秒，可以在100米距离上以90°穿透16毫米RHA（轧制均质装甲）装甲板。标准弹药在相同初速下，在100米距离上穿透11毫米装甲。

这种武器装备并不理想，尤其是弹匣只能容纳24发子弹，无法进行持续压制火力。

Ammunition

In total, there were 2,040 rounds of 8 x 59 mm RB Breda ammunition loaded in 85 machine gun magazines stored in wooden racks painted in white. 45 were stored on the right side of the hull and 40 on the left side. Although hardly ever used, the M.39 AP (Armor Piercing) shells were available for the machine gun. The bullet weighed 12 grams and, with a muzzle velocity of 780 m/s, could penetrate a 16 mm RHA (Rolled Homogeneous Armor) plate at 90° at a distance of 100 m. Standard ammunition with the same muzzle velocity penetrated 11 mm at 100 m. This armament was not ideal, especially because the magazines carried only 24 rounds, which did not allow for continued suppressing fire.

轮胎

AB40使用的轮胎由倍耐力米兰工厂生产，几乎所有意大利车辆的轮胎也都由倍耐力工厂生产。倍耐力为TM40运输车辆和AB系列装甲车使用的60厘米（24英寸）轮胎生产了多款轮胎。

使用了三种轮胎。在非洲战场，使用的是“Libia”（英语：利比亚）9.75 x 24英寸（25 x 60厘米）轮胎。在欧洲，例如意大利和巴尔干地区，则使用了“Artiglio”（英语：爪）9 x 24英寸（22.8 x 60厘米）轮胎。

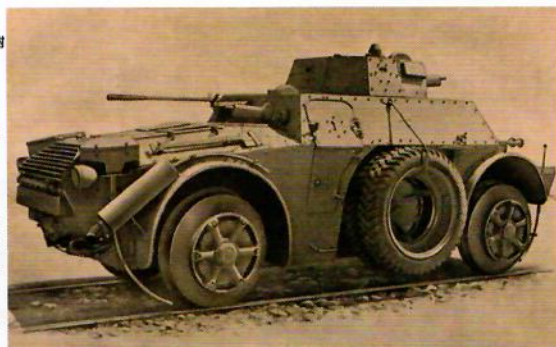
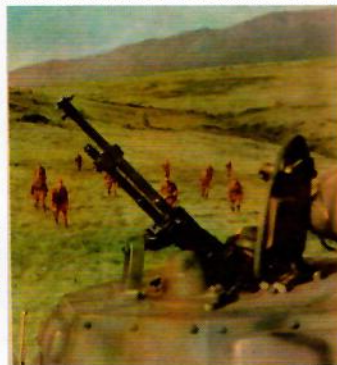
第三种是用在“Ferroviaria”版上，所用的车轮是菲亚特改装的火车车轮，以适应AB40轮胎。

Tires

The tires used on the AB40 were produced by the Pirelli Factory in Milan, as were almost all the tires on Italian vehicles. Pirelli produced several tires for the 60 cm (24") rims used on the TM40 transport vehicles and also AB series armored cars.

Three types of tires were used. In the African theatre, "Libia" (Eng: Libya) 9.75 x 24" (25 x 60 cm) tires were used. For use in Europe, such as Italy and the Balkans, "Artiglio" (Eng: Claw) 9 x 24" (22.8 x 60 cm) tires were used.

The third type was used on the "Ferroviaria" version, the wheels used were train wheels modified by FIAT to adapt them to the AB40 rim.



组装图标 ASSEMBLY ICONS



弯折
BEND
折り曲げ
Изгиб



钻孔
OPEN HOLE
穴をあける
Бурениескважин



胶水
GLUE
せつちやくざい
Клей



瞬间接著剂
INSTANT CEMENT
瞬間接着剂
Мгновенное
лучение



贴水上贴纸
APPLY DECAL
水シールを貼る
Наклеивание
декальводы



选择
OPTIONAL
せんたく
Выбор



制作2组
MAKE 2
2グループ作成
Производство
групп



注意注意
BE CAREFUL
に注意
Внимание!



把孔填平
Fill the hole flat
穴を平らに埋める
Заполните
отверстие



切除
REMOVE
カットアウト
Удаление



不使用胶水
DO NOT CEMENT
接着剂不使用
Неиспользовать
клей



镜像制作2组
MIRROR PRODUCTION 2 GROUPS
ミラー作成2グループ
Изготовление зеркал 2 группы

组装色块 ASSEMBLING COLOR BLOCKS



粘接位置
Bonding position
結合位置
Позиция
склеивания



选择粘接/可活动
Bonding/non-bonding
結合/非結合
Склеивание/
несклеивание



准备制作新部分
New parts to prepare
準備する新しい部品
Новая деталь
подготовлена
к производству



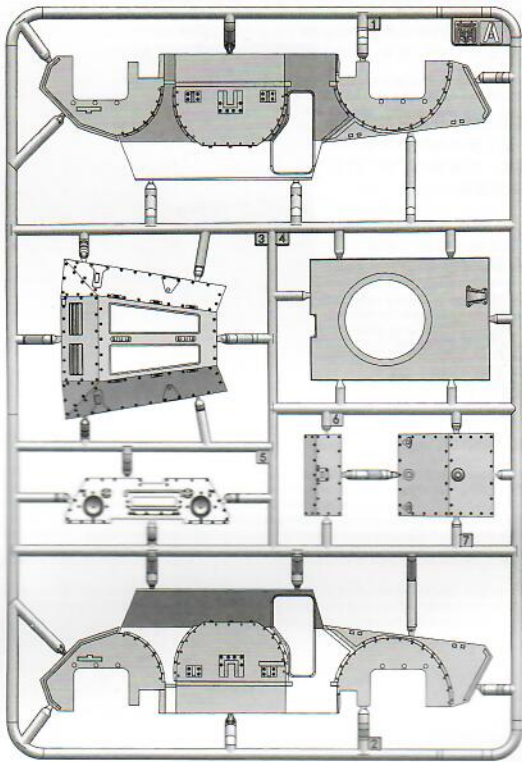
已完成的部份
Completed Part
完了した部分
Завершенная часть



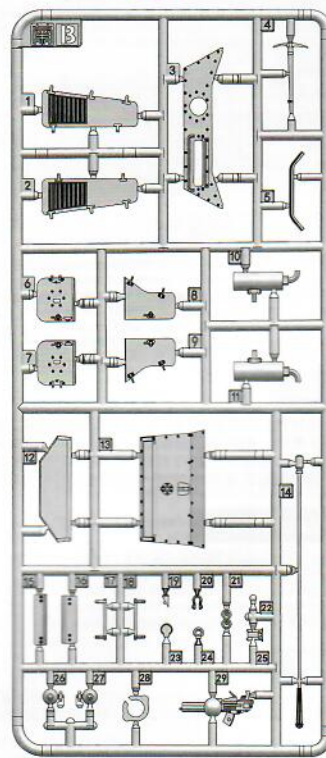
金属蚀刻片
photo-etched
フォトエッチング
фототравление

板件说明 PARTS DRAWING

Ax1



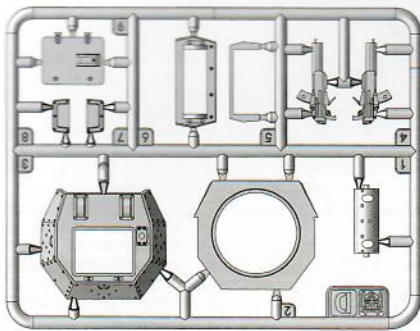
Bx1



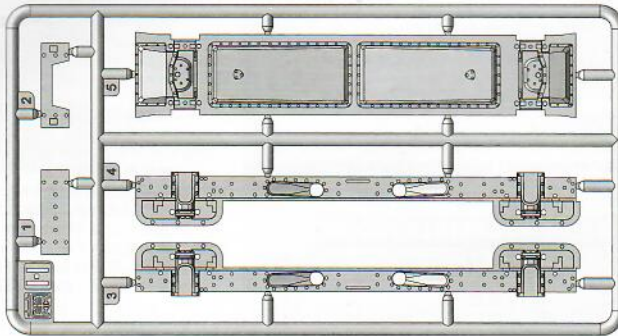
铜管 x 3
Copper Tube x 3

金属弹簧 x 4
Metal spring

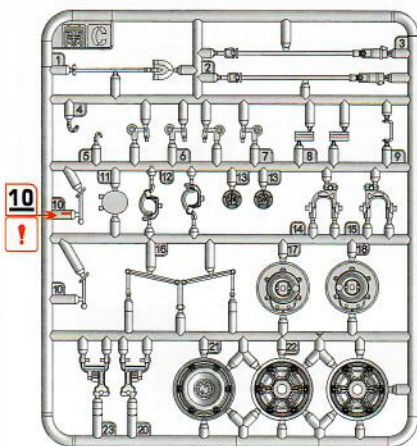
Dx1



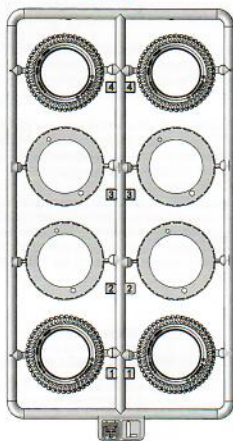
Hx1



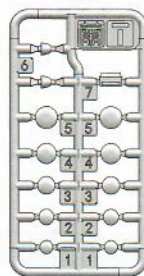
Cx1



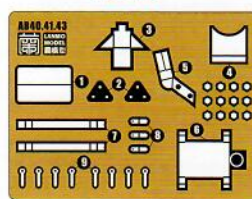
Lx3



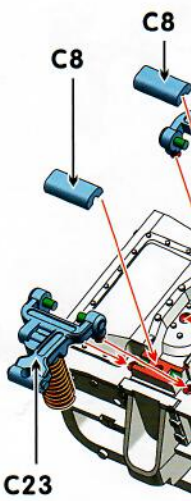
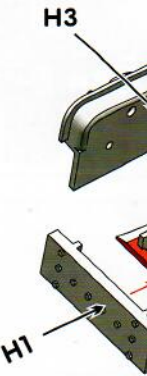
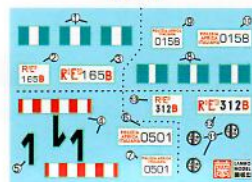
Tx1



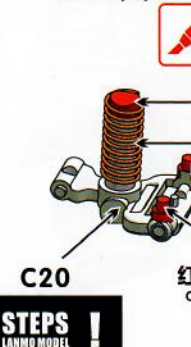
Pex1



贴纸
DECAL

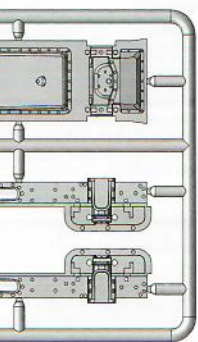
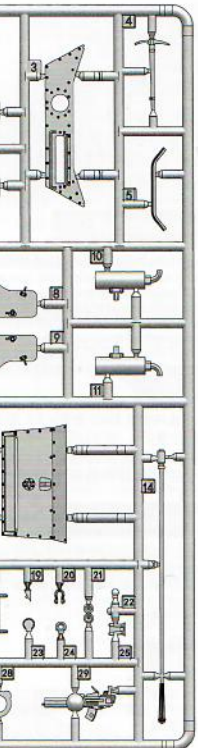


*活动悬挂改
Activity suspensi
for new players to

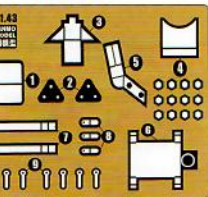


STEPS !
LANMO MODEL

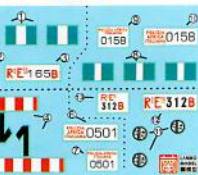
B x1



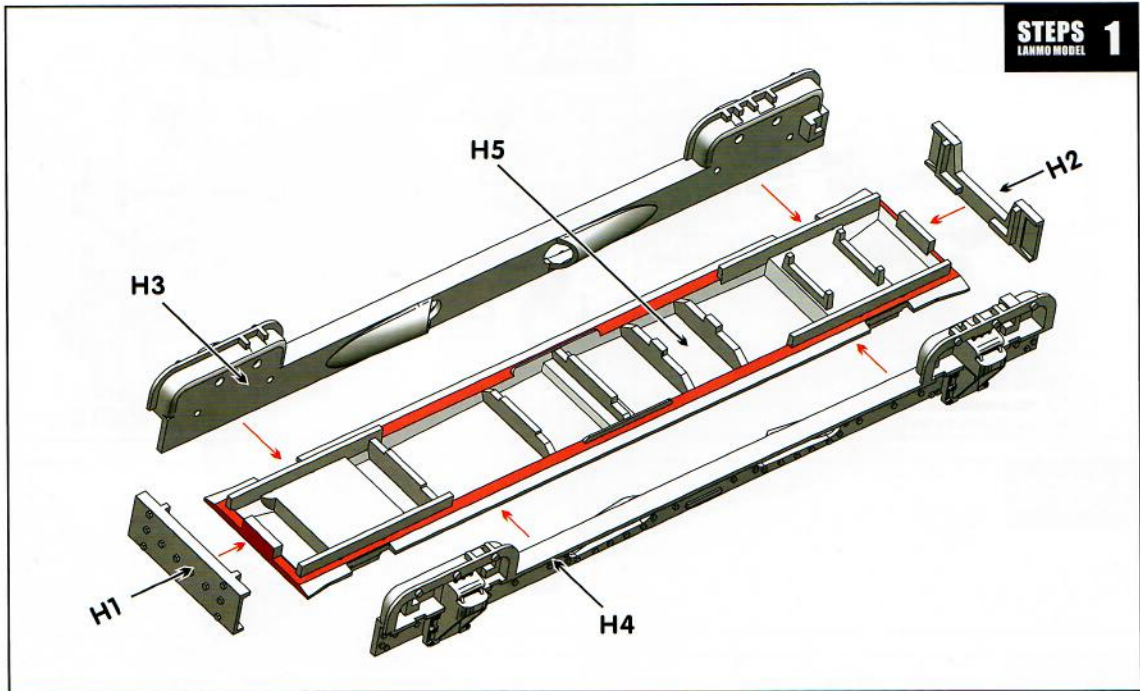
Pe x1



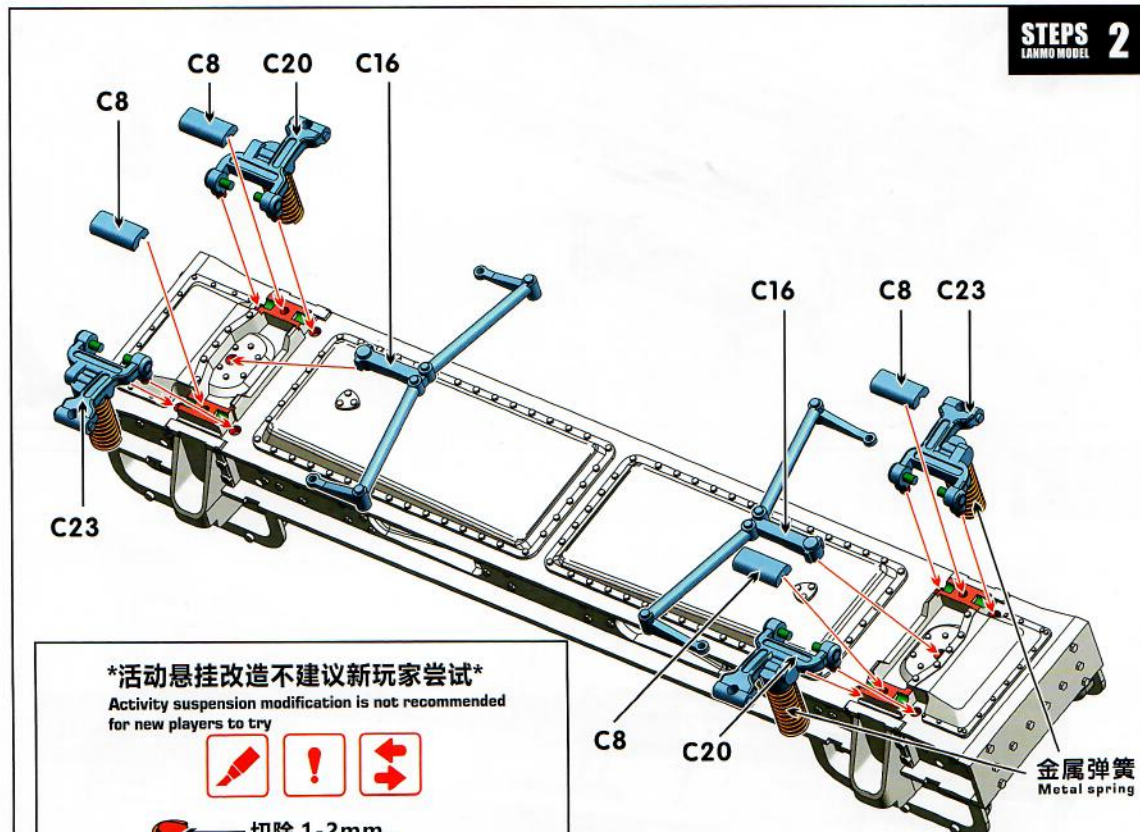
贴纸
DECAL



STEPS 1
LANMO MODEL



STEPS 2
LANMO MODEL



活动悬挂改造不建议新玩家尝试
Activity suspension modification is not recommended for new players to try

切除 1-2mm
Cut 1-2mm

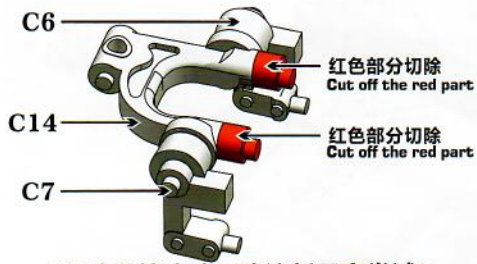
金属弹簧
Metal spring

红色部分切除
Cut off the red part

C20 C23

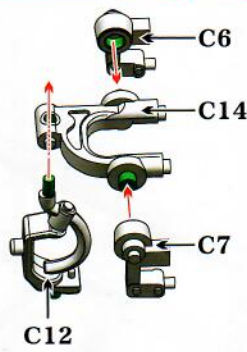
STEP 1
LANMO MODEL

STEPS
LANMO MODEL

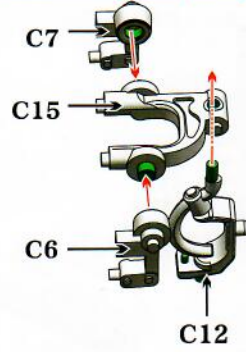


活动悬挂改造不建议新玩家尝试
Activity suspension modification is not recommended for new players to try

STEPS
LANMO MODEL

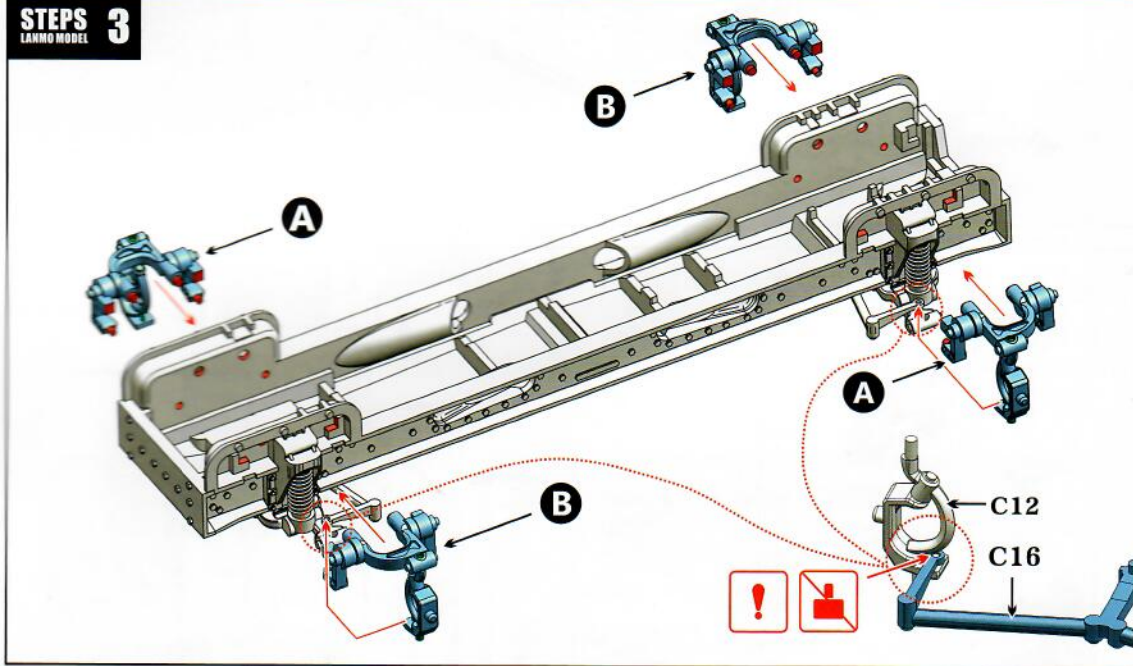


STEPS
LANMO MODEL



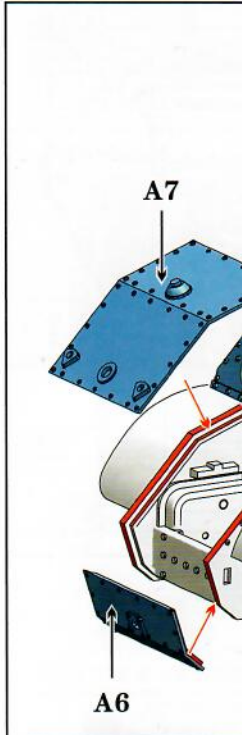
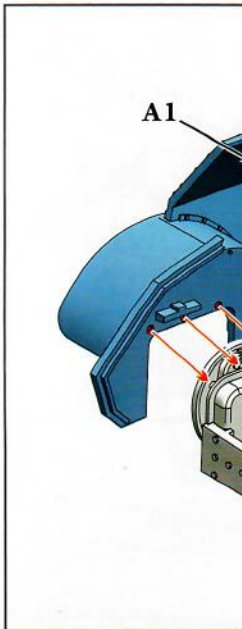
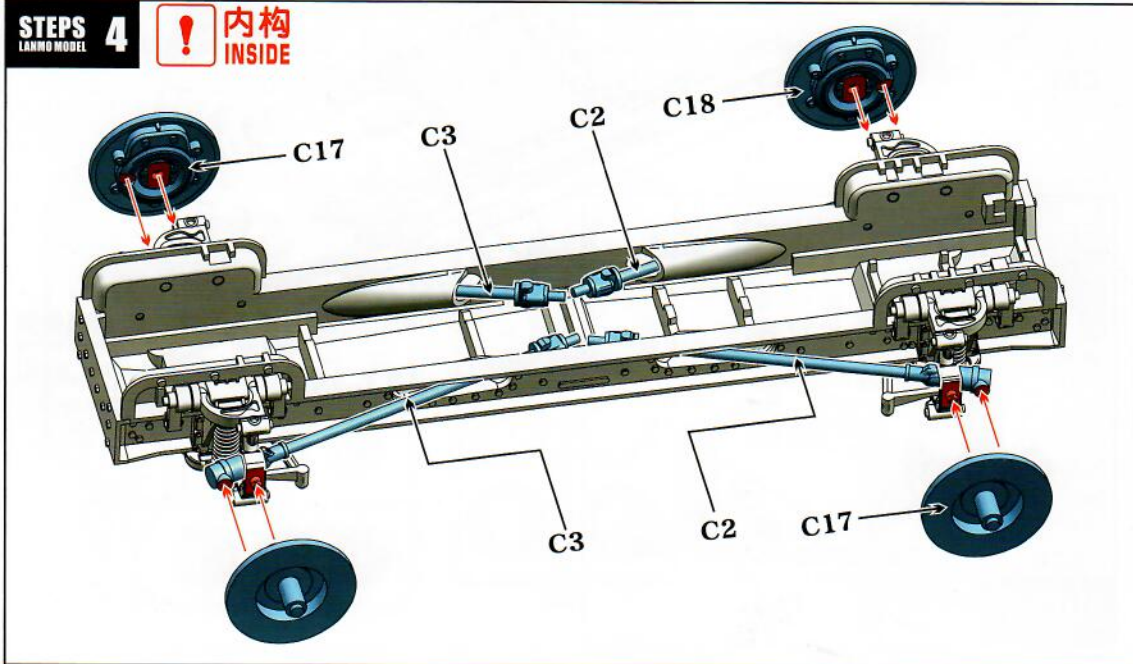
STEPS
LANMO MODEL

3



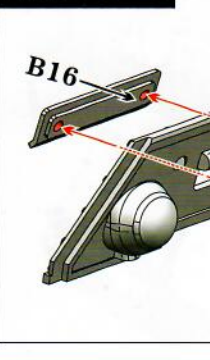
STEPS
LANMO MODEL

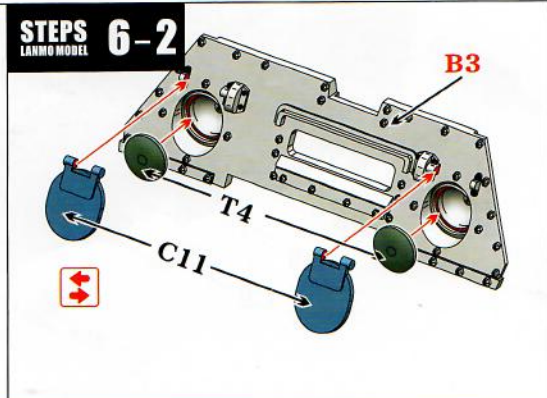
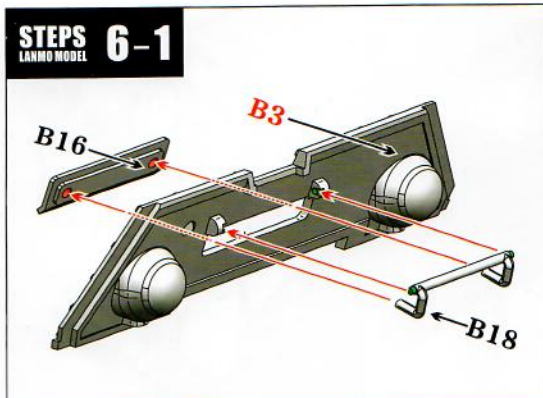
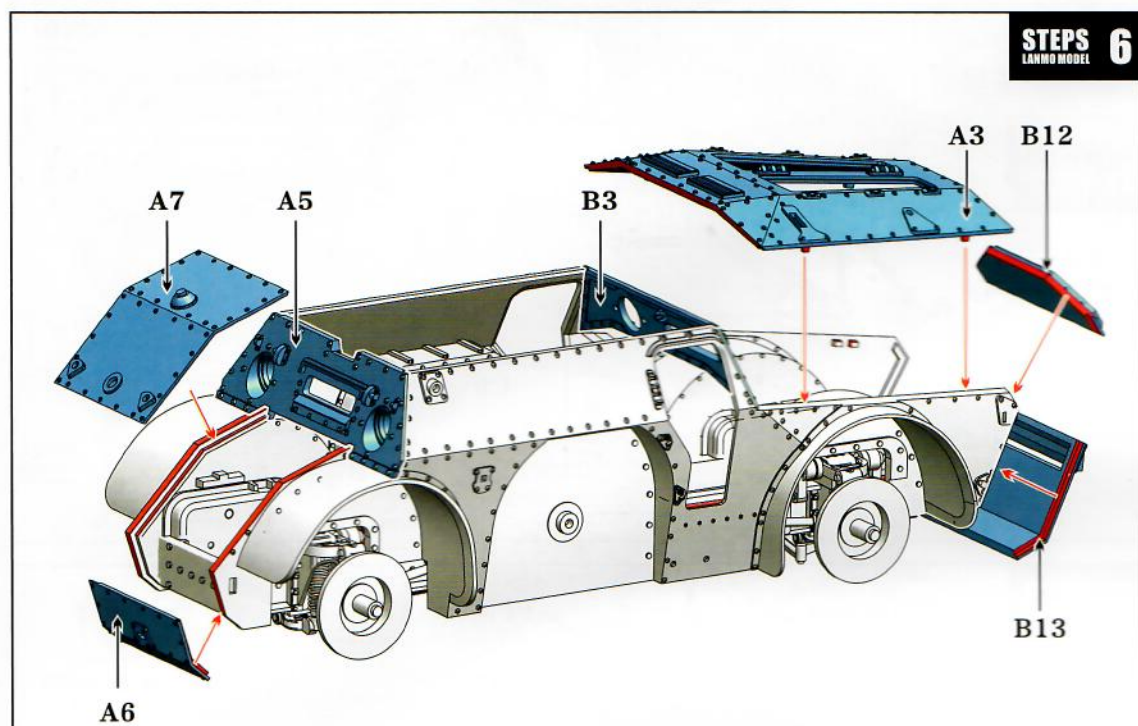
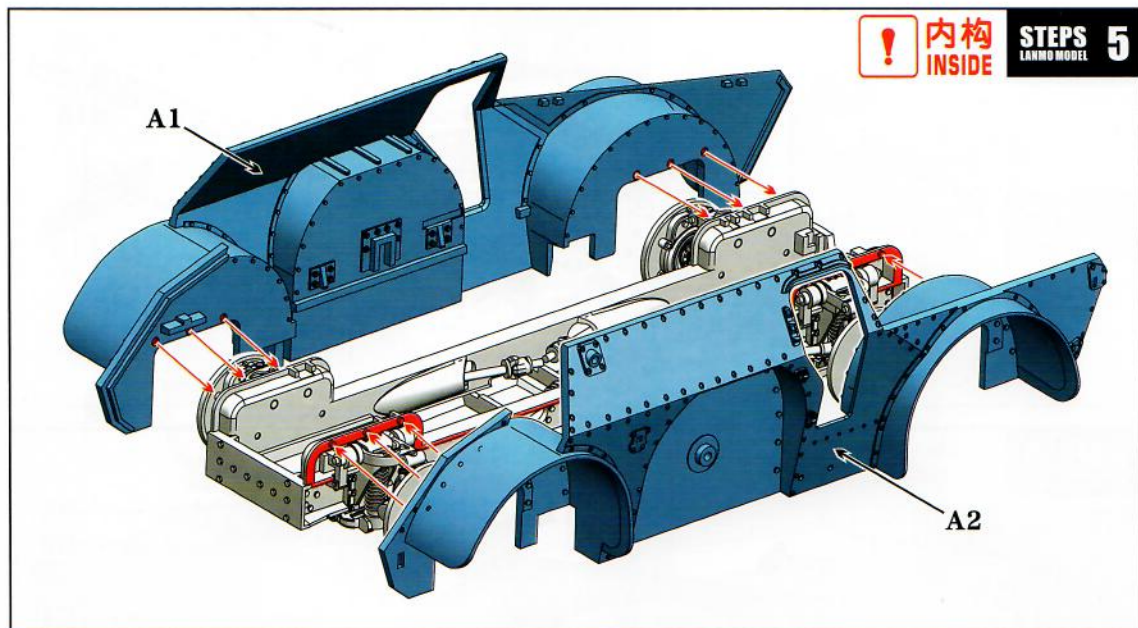
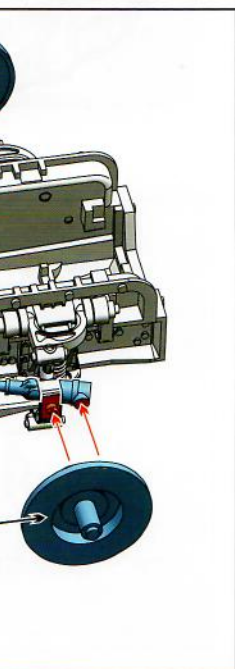
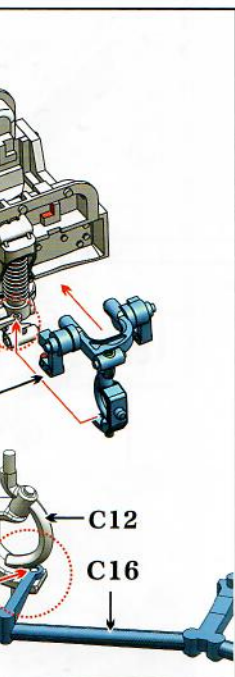
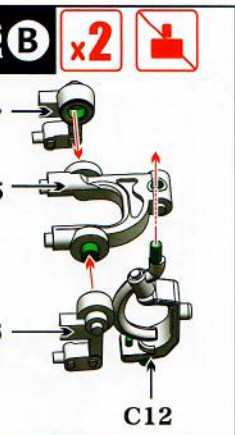
4 内构
INSIDE



STEPS
LANMO MODEL

6-1





STEPS
LANMO MODEL **C**

B25 B21

STEPS
LANMO MODEL **D**

B10 B11

STEPS
LANMO MODEL **6-3**

B3 B28 B29 B17 B15

3.5mm copper tube
3.5mm 铜管

STEPS
LANMO MODEL **7**

T7 A4 B5 C1 B1 B2 C1 C10 C10 C4 B22 B24 C4 C10 B19 B9 B7 C9

反向打孔定位
Reverse drilling positioning

距离边界
Distance Boundary
1MM

垂直朝上
Vertically upwards

STEPS
LANMO MODEL **8**

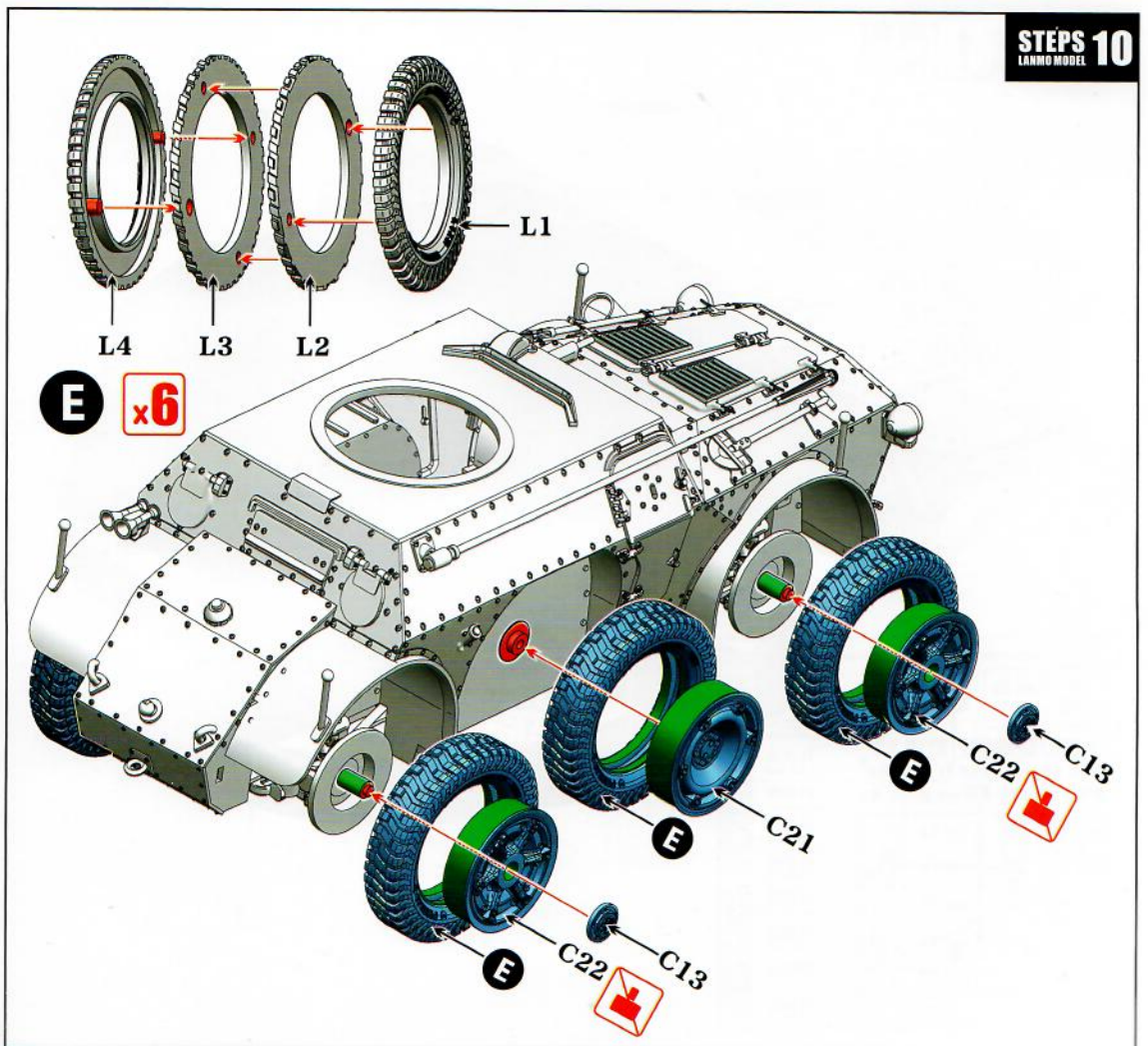
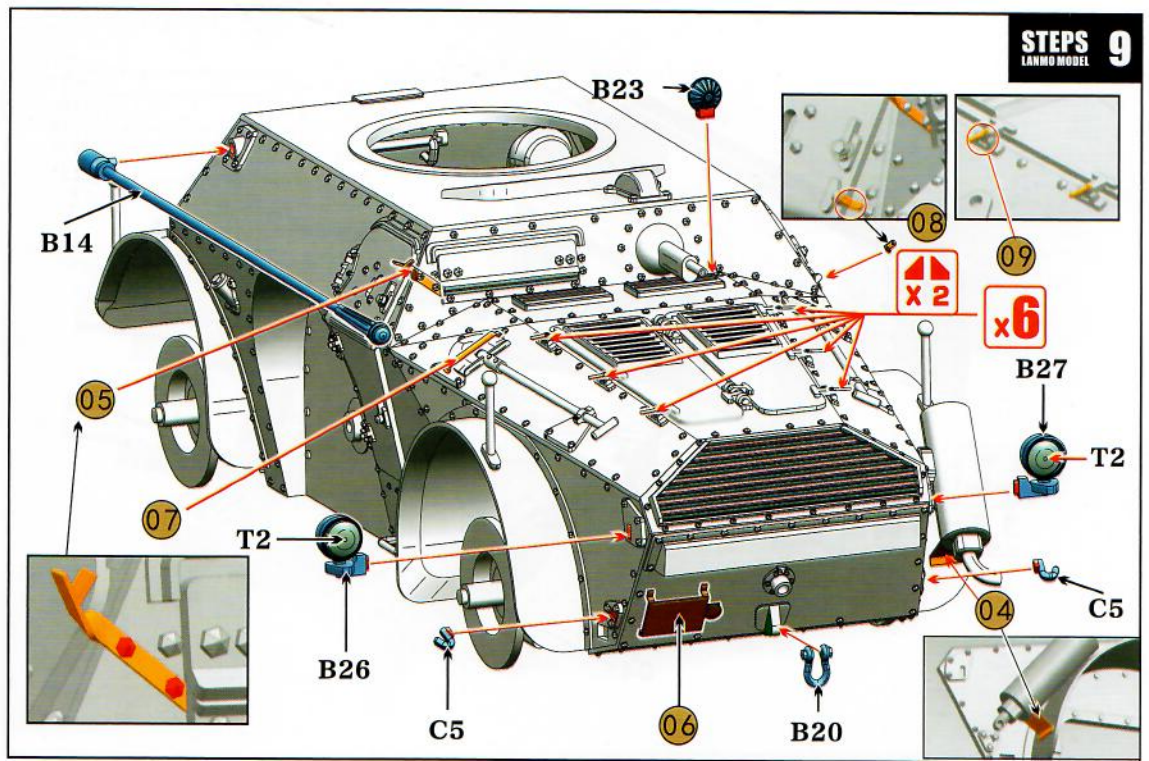
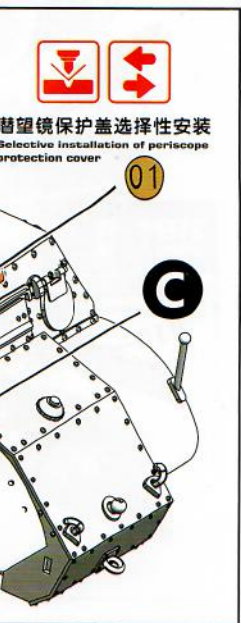
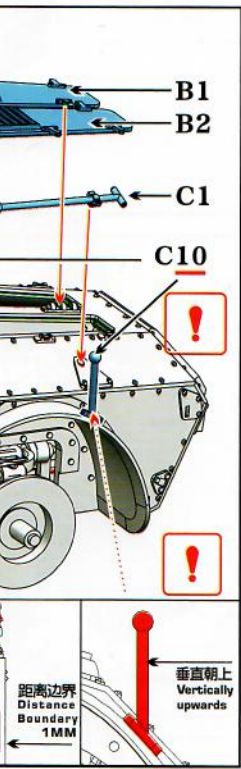
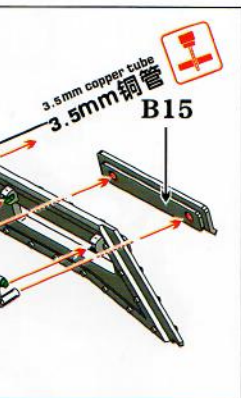
D B6 B8 C9 B4 Pe7 C

潜望镜保护盖选择性安装
Selective installation of periscope protection cover

B14 05 07

L4 L3

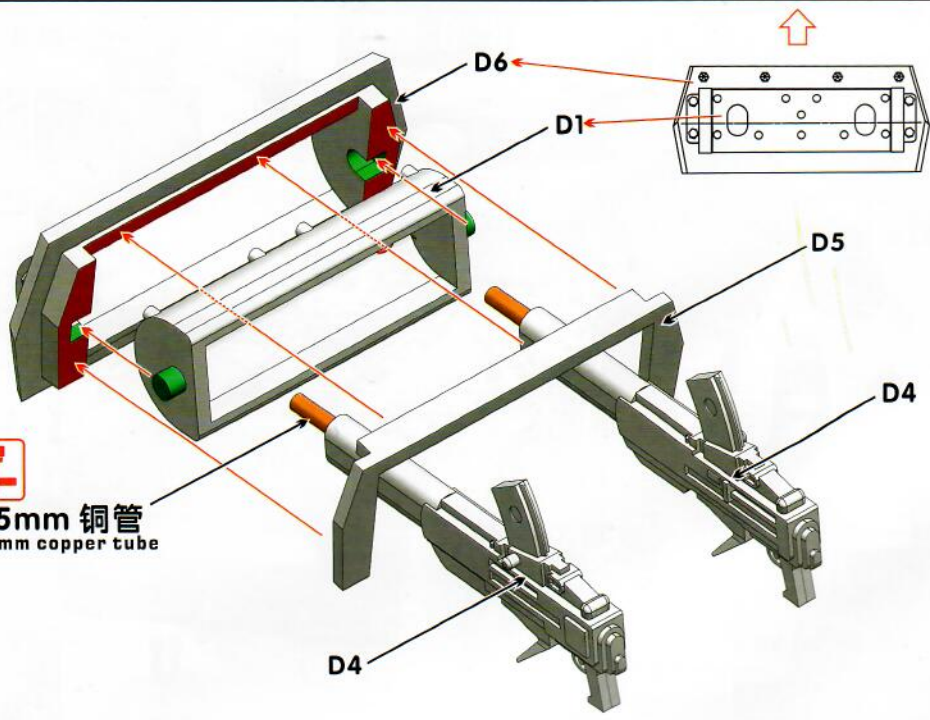
E **x6**



STEPS 11
LANMO MODEL



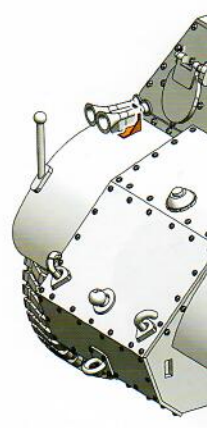
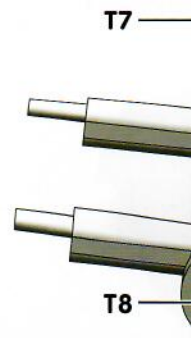
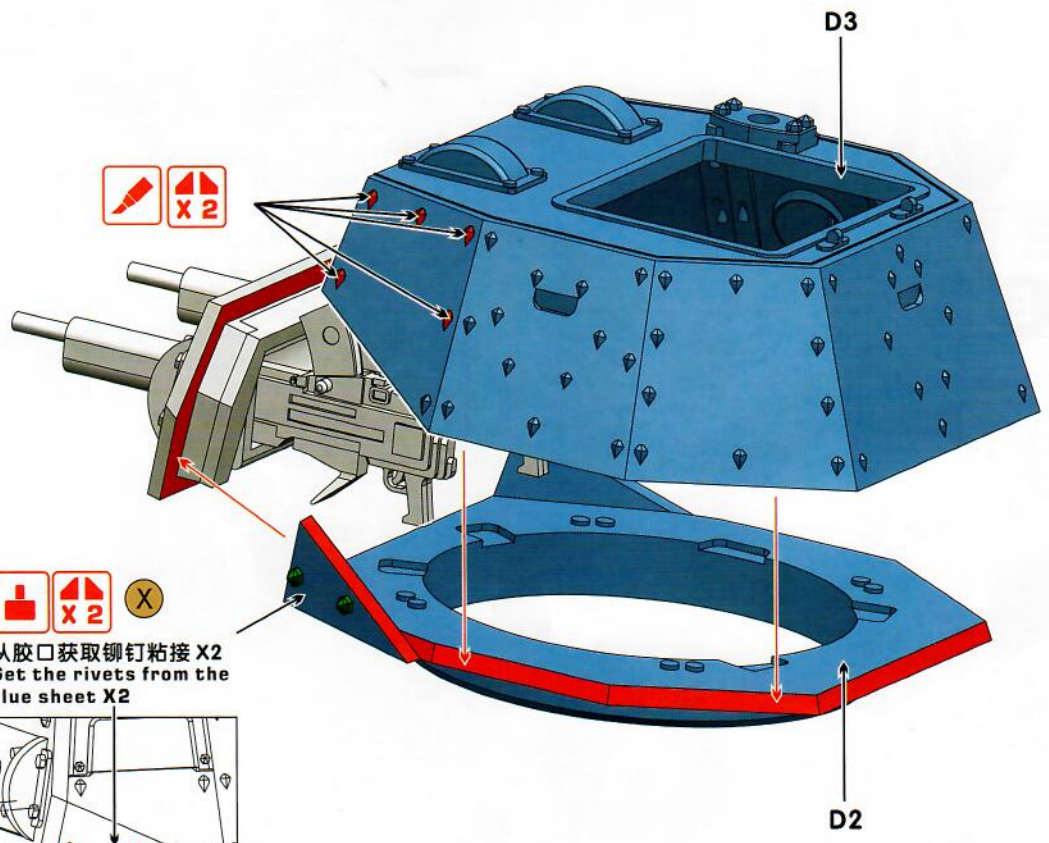
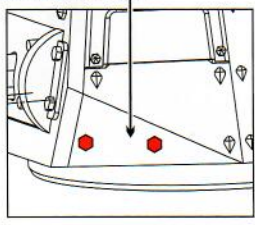
3.5mm 铜管
3.5mm copper tube

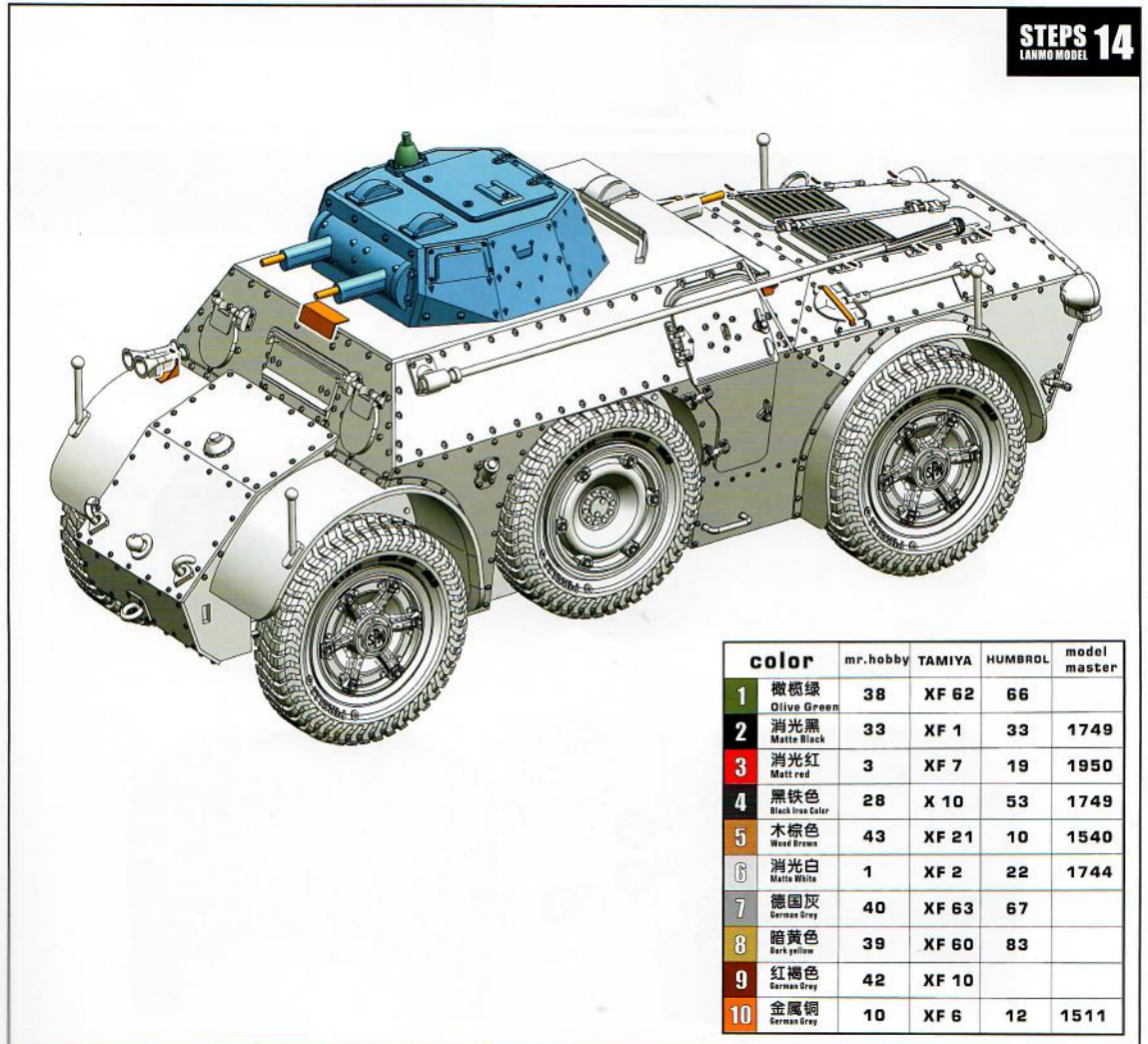
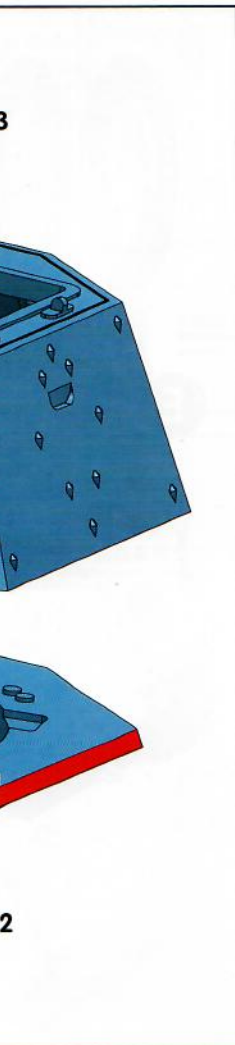
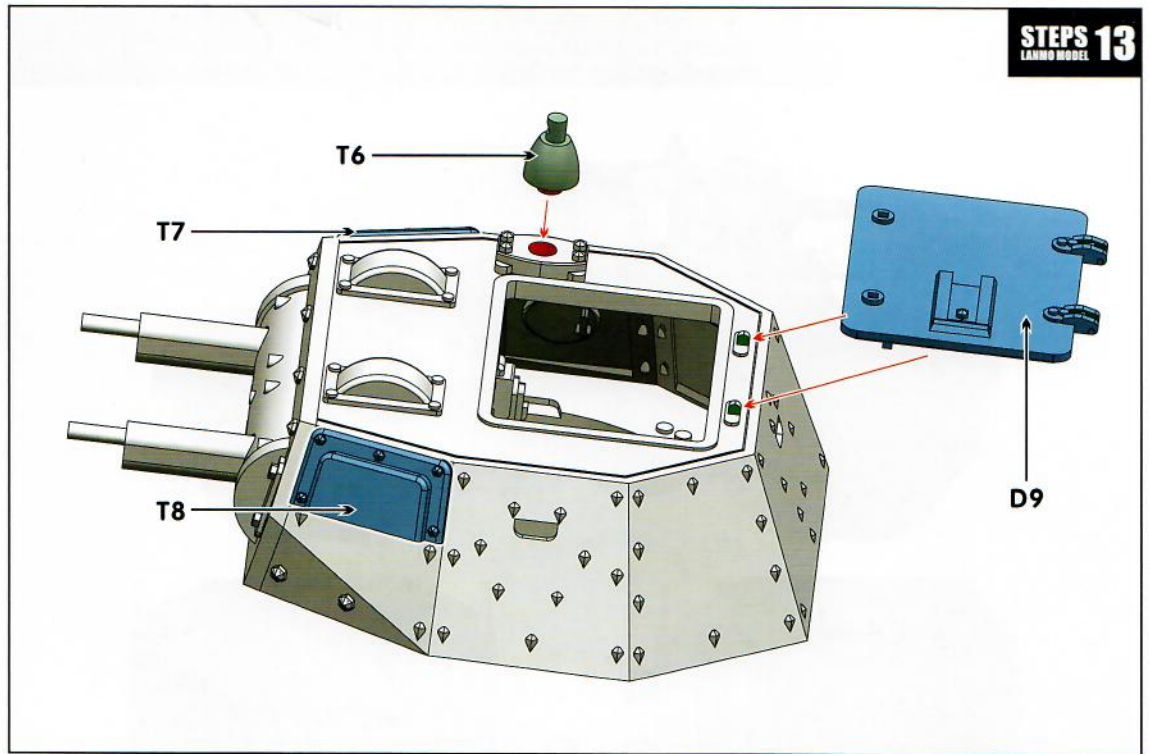


STEPS 12
LANMO MODEL

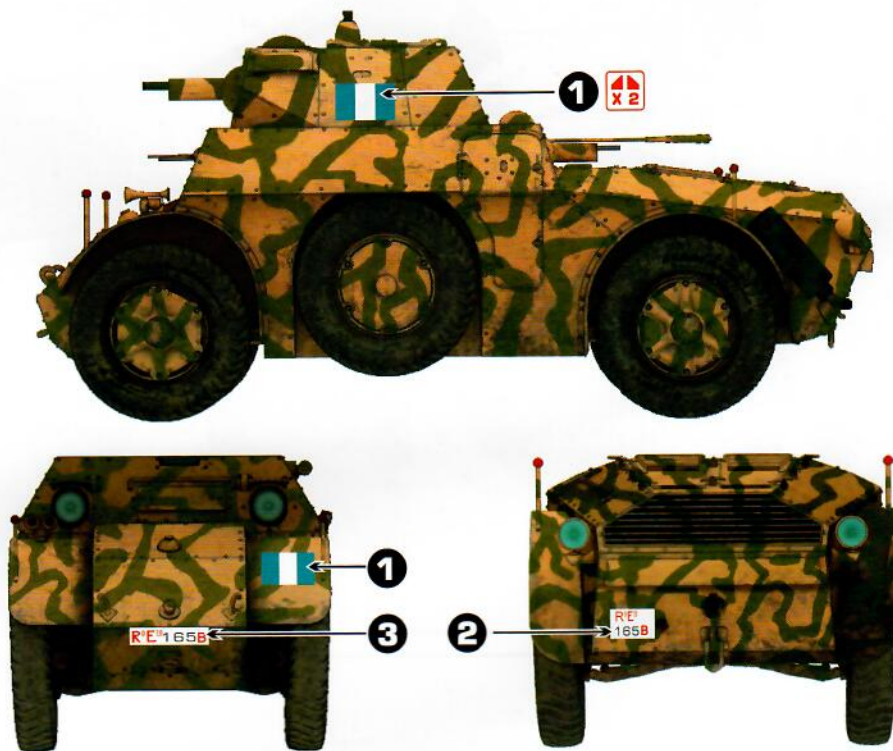


从胶口获取铆钉粘接 X2
Get the rivets from the glue sheet X2





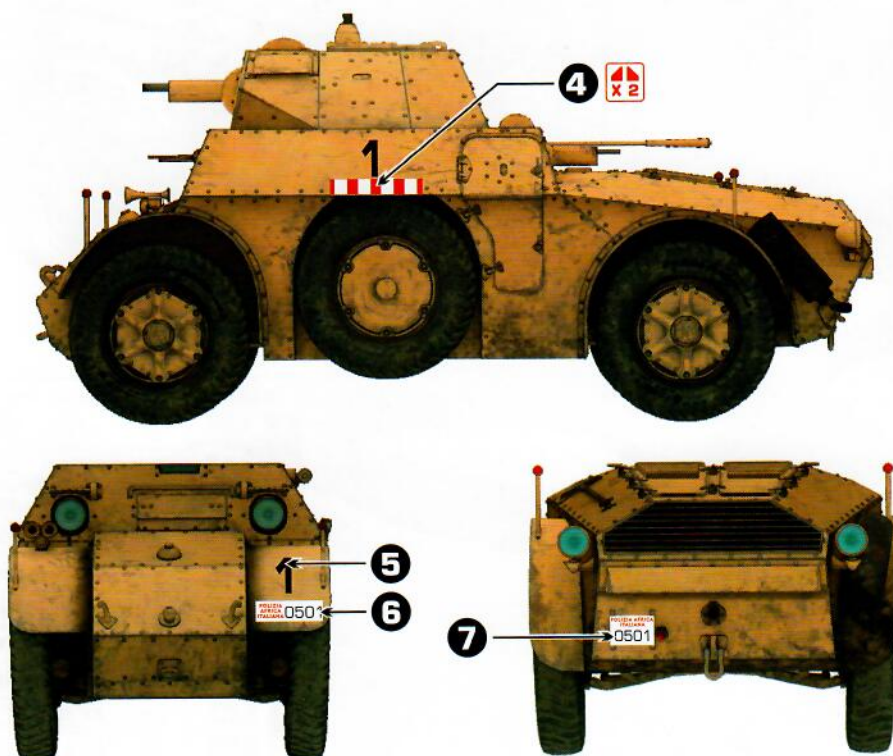
1940年12月，利比亚。这是首批装备AB40投入战斗的部队之一
 December 1940, Libya. One of the very first units equipped with AB40s committed in operations.



1941年利比亚
 Autoblinda AB40, u



1941-1942年冬季，AB40在黎波里，巴基斯坦空军注册号为0501
 winter 1941-42, AB40 registered 0501 of the PAI in Tripoli

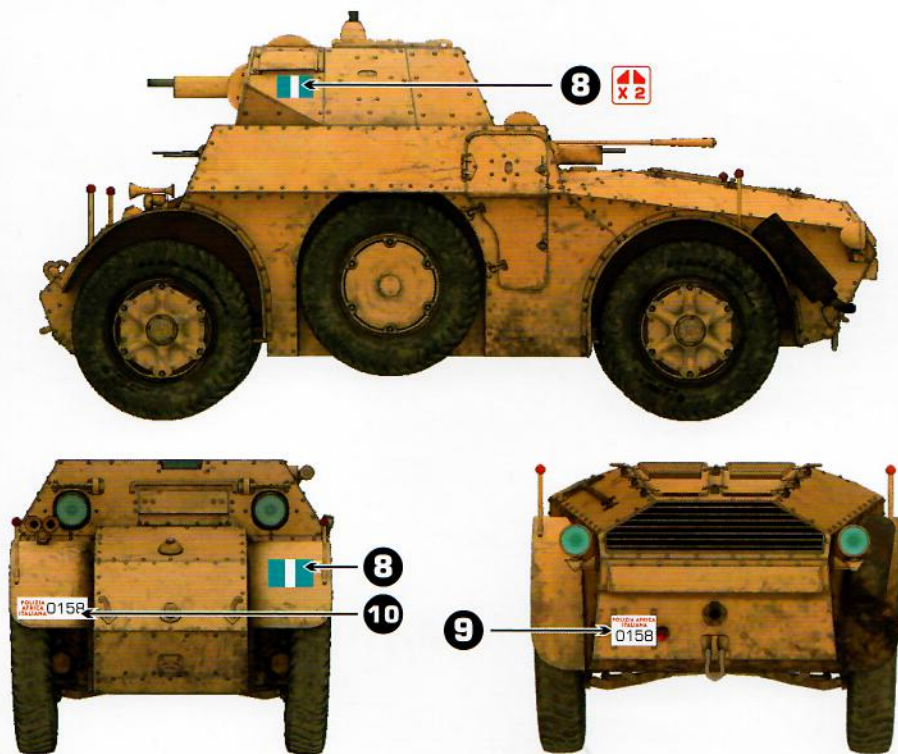


1941年利比亚
 Libya AB40 reconn

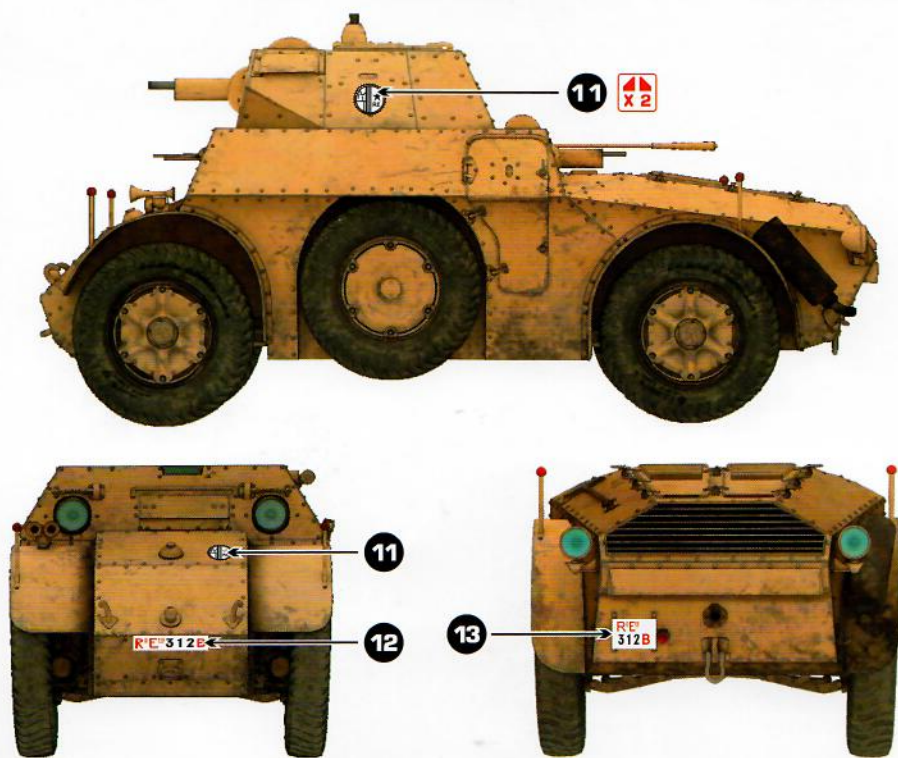


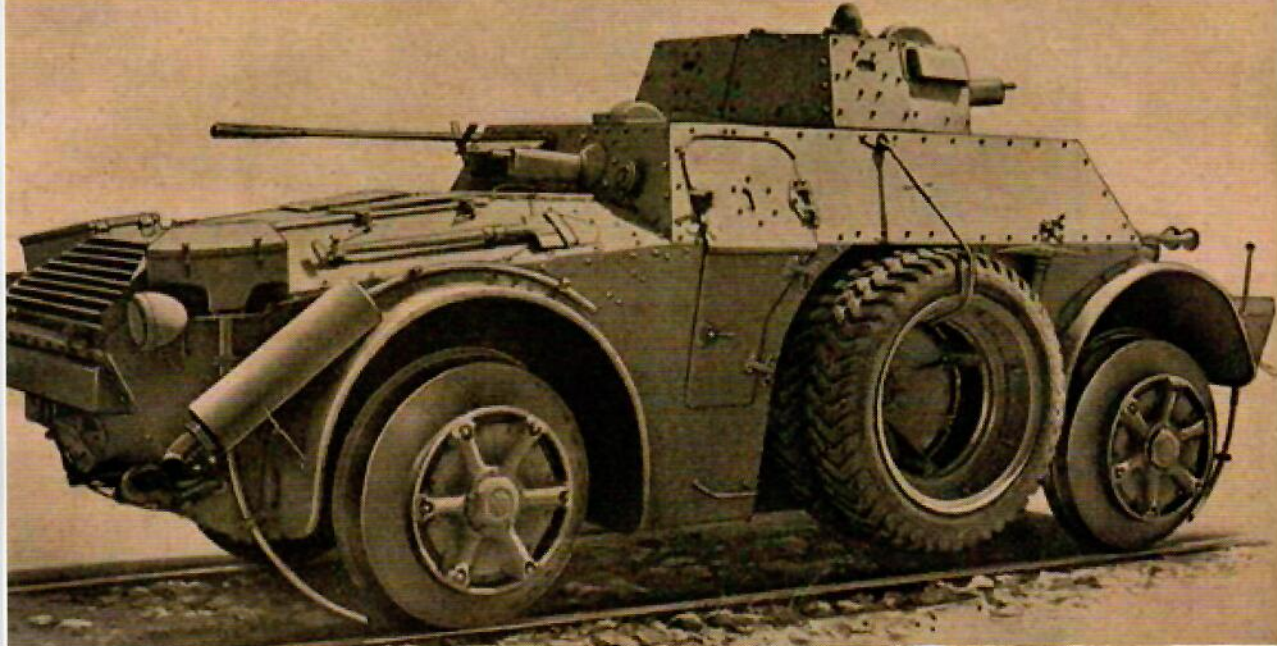
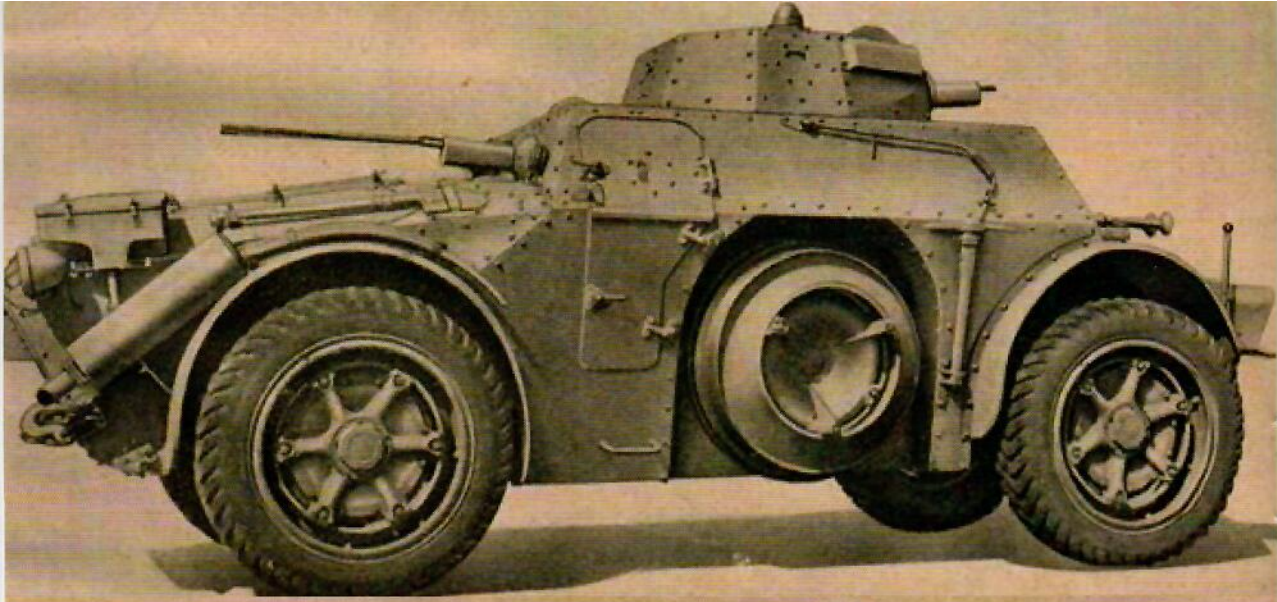


1941 年利比亚 cAB40未知骑兵侦察部队.
Autoblinda AB40, unknown cavalry reconnaissance unit, Libya 1941

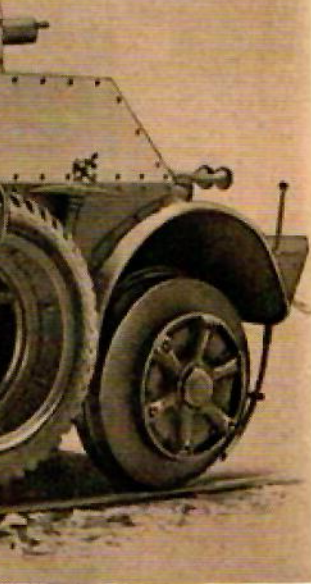


1941 年利比亚 AB40侦察部队.
Libya AB40 reconnaissance unit, 1941.





 **CO**
DEL
ARR



**CORPO • DI • POLIZIA
DELL' AFRICA • ITALIANA**

ARRUOLAMENTI

dal cartello di M. MELIS

internal structure kit

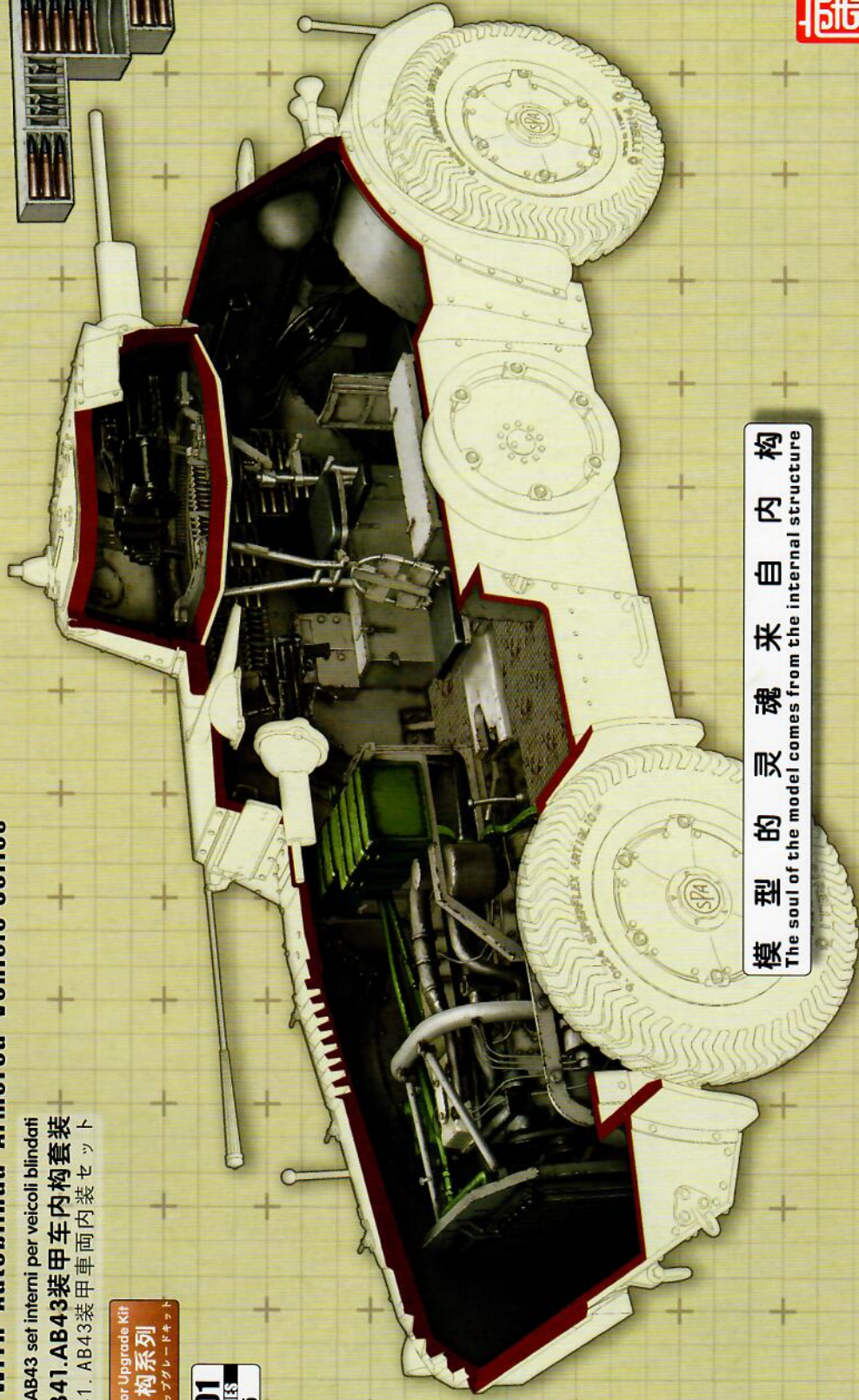
Autoblinda AB40 · AB41 · AB43

WORKS WITH Autoblinda Armored Vehicle Series

AB40, AB41, AB43 set interni per veicoli blindati
AB40, AB41, AB43装甲车内构套装
AB40, AB41, AB43装甲车両内装セット



NM 3501
1981-45 SERIES
1 / 35



模型的灵魂来自内构
The soul of the model comes from the internal structure



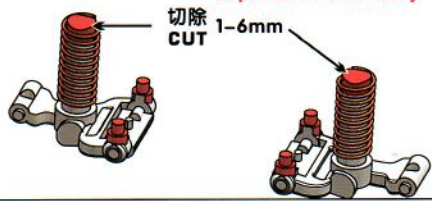
LANMO
MODEL
蘭模型

活动悬挂改造不建议新玩家尝试

Activity suspension modification is not recommended for new players to try

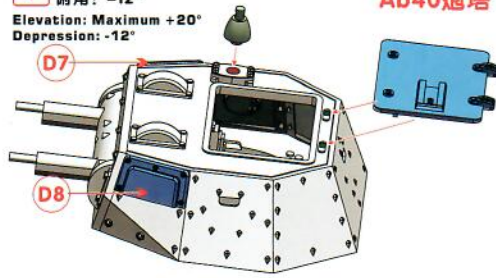


切除深度取决于弹性
The depth of resection depends on elasticity



仰角: 最大 +20°
俯角: -12°
Elevation: Maximum +20°
Depression: -12°

**AB40 TURRET
Ab40炮塔**

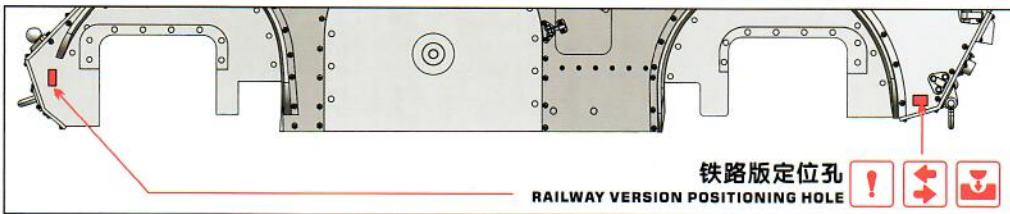


**ORIGINAL ARMOR PLATES
外嵌装甲板**

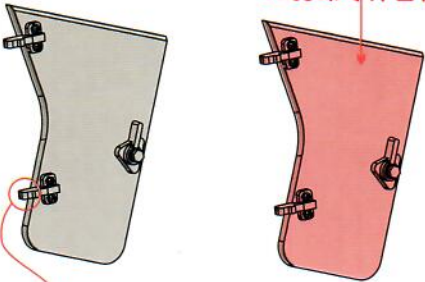


优先选择原装甲板
内嵌式需要硬粘接
ORIGINAL PARTS ARE PREFERRED;
EMBEDDED PARTS REQUIRE HARD BONDING.

**EMBEDDED ARMOR PLATES
内嵌装甲板**

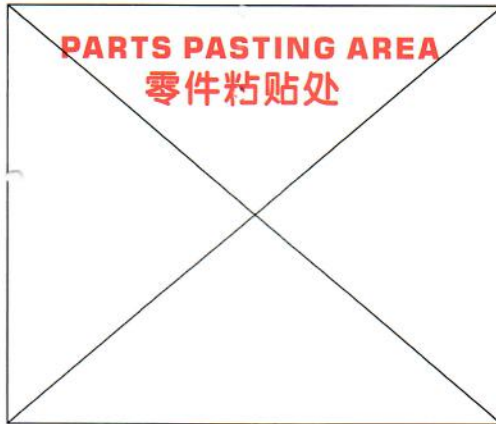


**3D PRINTED PARTS ALTERNATIVES
3D打印零件替代品**



此处有断的可能性
A PORTION MAY BE MISSING HERE.

**PARTS PASTING AREA
零件粘贴处**



MAUZAN



*Fate tutti
il vostro dovere!*

LE SOTTOSCRIZIONI AL **PRESTITO** SI RICEVONO PRESSO IL
CREDITO ITALIANO

G. MODIANO & C. - MILANO