

# GERMAN WWII FIGHTER 1:48 SCALE PLASTIC KIT



eduard

## intro

**ProfiPACK**



No other aircraft of the German Luftwaffe is so intimately connected with its rise and fall in the course of the Second World War than the Messerschmitt Bf 109. This type, by whose evolution outlived the era in which it was conceptualized, bore the brunt of Luftwaffe duties from the opening battles of Nazi Germany through to her final downfall. The history of the aircraft begins during 1934-35, when the Reich Ministry of Aviation formulated a requirement for the development of a single-engined monoplane fighter. Proposals were submitted by Arado, Heinkel, Focke-Wulf and Bayerische Flugzeugwerke. The last mentioned firm featured a technical director named Professor Willy Messerschmitt, who was riding a wave of popularity based on the success of his recent liaison aircraft, the Bf 108. His goal was to conceive of an aircraft with the best possible performance for the specified weight, size, and aerodynamic qualities. Over the subsequent months, several prototypes were built that served first and foremost in development flights and further modifications. The aircraft was relatively small, and compared to the prevailing trends of the time, docile with revolutionary features such as low wing design, the use of a retractable landing gear, a wing with a very narrow profile, wing slats, landing flaps, weapons firing through the prop hub, and so on. Even the enclosed cockpit and the method of construction were not very common just four years prior to the beginning of the Second World War. At its conception, the Bf 109 was a very promising asset despite some powerplant troubles. These were solved by the introduction of the DB601. This engine, together with its extrapolated development DB 605, is umbilically connected to the types success. These two-row, twelve cylinder inverted V engines powered several tens of thousands of '109s in over 25 versions and variants.

The first combat use was by three developmental Bf 109s in the Spanish Civil War, where they were delivered in December, 1936. The pre-series airframes were to, first of all, validate the aircraft's abilities in modern aerial combat. Shortly thereafter, production machines in the form of the Bf 109B-1 began to reach 2./J.88, the Legion Condor. The desire of Germany to demonstrate her aerial prowess to potential foes was advanced further in international sport meets. The triumphs attained in Zurich in the summer of 1937 were complemented several months later by grabbing the speed record of 610.95 kph. In very short order, the progressive developments represented by the C, D and E versions appeared. Despite this, the delivery of the types to combat units did not sustain a rate that was desired by military brass. Even by August, 1938, the Bf 109 accounted for less than half of the 643 front line fighters in service. The later months saw an increase in these rates. By the time of the invasion of Poland (which saw the participation of only a little more than 200 aircraft) the Luftwaffe possessed the best fighter produced in continental Europe. With both a qualitative and quantitative advantage, the fighter wing of the Luftwaffe entered the Polish campaign, the first defenses of the Fatherland, Blitzkrieg against the West, and the Battle for France. With one foot in the door that was the English Channel, the Luftwaffe embarked on the attacks on Britain in the summer months of 1940. Here, the first weakness of the Bf 109 was revealed: the inability to carry drop tanks that would have enabled the type to effectively escort bombers to England. This was one of the factors that made the defeat of the Luftwaffe in the Battle of Britain possible. Experiences gained in 1940 led to the development of the 'F' version prior to the spring of 1941. The elegance of the Bf 109 crested with the 'Friedrich'. Following a largely defensive stance over the Channel and northern France, the Bf 109F took on a more offensive role in Operation Barbarossa in the east, and in northern Africa. In later duties with the 'Jagdwaaffe' during the second phase of the war in the east, and in the 'Defense of the Reich' from 1943 to 1945, the Bf 109 served in the form of the 'G' version, followed by the 'K'. Even if by the end of the war it was clear that the development of the Bf 109 was exhausted, during its combat career, the type was able to keep pace with the foes that it encountered. Besides its primary function as fighter, the Bf 109 also appeared as a fighter-bomber, reconnaissance platform, night fighter, trainer and rammjäger.

The disappearance of the Bf 109 from the skies over Europe was not spelled out by the end of the war. Several examples were in Swiss service up to 1949, and many flew in the air force of Czechoslovakia in both original form with a DB 605 powerplant and as aircraft built out of necessity with surplus Jumo 211s. The latter type also served as the first fighter to fight for the independence of the newly formed state of Israel. Finland retired the type as recently as 1954, and Spain didn't retire its HA-1109-1112, re-engined Bf 109s, until 1967. The legendary low-wing fighter of Professor Willy Messerschmitt survived the state that developed it.

## úvodem

Žádný jiný stroj německé Luftwaffe není výrazněji spojen s jejím vzestupem a pádem ve 2. světové válce, než stíhací Messerschmitt Bf 109. Letoun, který svou koncepcí výrazně předběhl dobu, ve které vznikl, se stal tahounem stíhacího letectva od prvních válečných konfliktů nacistického Německa, až do jeho hořkého konce. Historie letounu se začíná v období let 1934-35, kdy Říšské ministerstvo letectví formulovalo specifikace zakázky na vývoj jednomotorové jednoplošné stíhačky. Projektu se zúčastnily firmy Arado, Heinkel, Focke-Wulf a Bayerische Flugzeugwerke. V poslední jmenované působil na postu technického ředitele profesor Willy Messerschmitt, jehož popularita se nesla na vlně úspěchu nedávno dokončeného kurýrního Bf 108. Jeho cílem bylo vytvořit letoun s co největším poměrem výkonu k celkové hmotnosti, velikosti a aerodynamickým vlastnostem. V průběhu následujících měsíců vzniklo několik prototypů, které sloužily zejména ke zkouškám a dalšímu vývoji. Letoun byl poměrně malý, oproti stávajícím zvyklostem relativně jemný, s revolučními konstrukčními prvky jako byla dolnokřídla koncepce, použití zatahovacího podvozku, křídlo s velmi štíhlým profilem, pohyblivé sloty, vztlakové klapky, zbraně střílející osou vrtule, atd.

Dokonce uzavíratelný překryt kabiny nebo skořepinová konstrukce nebyly čtyři roky před začátkem 2. světové války tak obvyklým jevem, jak by se z dnešního pohledu mohlo zdát. Bf 109 byl již z počátku svého vývoje, i přes problémy s pohonnou jednotkou, velmi nadějným projektem. Problémy s pohonem vyřešila až zástavba motoru DB 601. Ten je spolu s pozdějším DB 605 neodmyslitelně spojen s úspěchy Bf 109. Řadový invertní dvanáctiválec do V poháněl několik desítek tisíc vyprodukovaných „stodevitek“ ve více než 25 verzích a variantách. K prvnímu bojovému nasazení tři zkušební kusy Bf 109 došlo za občanské války ve Španělsku, kam byly odeslány v prosinci 1936. Stroje z předseriové výroby měly především ukázat schopnosti letounu v moderní letecké válce. Následně se do bojového nasazení u 2./J.88 Legion Condor začaly dostávat i seriové stroje varianty Bf 109B-1. Snaze Německa ukazovat svou leteckou sílu potenciálním protivníkům napomáhala i sportovní klání. Triumf letounů Bf 109 na leteckém mítinku v Curychu v létě 1937 byl doplněn o několik měsíců později ustanovením rychlostního rekordu 610,95 km/h. Ve velmi krátkých časových úsecích následovaly verze C, D a E. Přesto však doplňování nových strojů k bojovým útvarům nepokračovalo tempem, který by si velení mohlo přát. Ještě v srpnu roku 1938 tvořila výzbroj letouny Bf 109 méně než polovinu z 643 stíhačů první linie. Ovšem během následujících měsíců roku se tempo dodávek k bojovým útvarům zrychlilo. V okamžik předpadení Polska (kterého se však zúčastnilo jen o málo více než dvě stě Bf 109) tak Luftwaffe disponovala zajisté nejlepší stíhačkou, jaká byla v kontinentální Evropě vyrobena. S technickou i množstevní převahou tak stíhací část Luftwaffe absolvovala polskou kampaň, první obranu Vaterlandu, Blitzkrieg proti západu i bitvu o Francii. S jednou nohou vykročenu přes kanál La Manche zahájila Luftwaffe v letních měsících roku 1940 útoky na Británii. V tu dobu se mj. projevil jeden vážný nedostatek Bf 109 - nepřipravenost konstrukce stroje na nesení přídavné nádrže, která by zvýšila dolet letounu při doprovodu bombardérů nad Británií. Tato zdánlivá maličkost byla jedním z faktorů, které zapříčinily porážku Luftwaffe v Bitvě o Británii. Zkušenosti z bojů v r. 1940 napomohly při vývoji verze F, která se začala k bojovým útvarům dostávat během předjaří 1941. Elegance Bf 109 u „Friedricha“ dosáhla vrcholu. Po bojích nad Kanálem a severní Francií, spíše již defenzivního charakteru, se Bf 109F zapojily i do útočných akcí, a to zejména při operaci Barbarossa na východě nebo v severní Africe. Do pozdějších úkolů Jagdwaaffe ve druhé fázi války na východě i do obrany Říše v letech 1943 - 1945 se zapojovaly především Bf 109 verze G a v posledních měsících války pak také verze K. Ačkoli na konci války bylo jasné, že koncepce letounu Bf 109 se po deseti letech služby dostala na hranici možnosti, po celou dobu své bojové činnosti dokázaly jednotlivé varianty držet krok se svými stíhacími protivníky. Kromě svého prioritního určení stíhacího letounu se Bf 109 objevily i v rolích stíhací-bombardovací, průzkumná, noční stíhací, palubní stíhací, cvičné nebo jako rammjäger.

Nebe se pro Bf 109 nezavřelo ani po skončení války. Několik strojů sloužilo až do roku 1949 ve Švýcarsku, mnohé létaly v balkánských zemích, v osvozeném Československu, a to jak v původní podobě s motory DB 605, tak v přestavěné variantě s motory Jumo 211. Zejména tyto stroje později tvořily základ letectva bráničů svobodu nově budovaného státu Izrael. Finsko zrušilo Bf 109 až v roce 1954 a Španělsko opustilo své HA-1109 a 1112 dokonce až v roce 1967.

ATTENTION



UPOZORNĚNÍ



ACHTUNG



ATTENTION



注意



Carefully read instruction sheet before assembling. When you use glue or paint, do not use near open flame and use in well ventilated room. Keep out of reach of small children. Children must not be allowed to suck any part, or pull vinyl bag over the head.



Před započatím stavby si pečlivě prostudujte stavební návod. Při používání barev a lepidla pracujte v dobře větrané místnosti. Lepidla ani barvy nepoužívejte v blízkosti otevřeného ohně. Model není určen malým dětem, mohlo by dojít k požití drobných dílů.

INSTRUCTION SIGNS \* INSTR. SYMBOLS \* INSTRUKTION SINNBILDEN \* SYMBOLES \* 記号の説明

OPTIONAL  
VOLBABEND  
OHNOUTOPEN HOLE  
VYVRTAT OTVORSYMMETRICAL ASSEMBLY  
SYMETRICKÁ MONTÁŽREMOVE  
ODŘÍZNOUTREVERSE SIDE  
OTOČITAPPLY EDUARD MASK  
AND PAINT  
POUŽÍT EDUARD MASK  
NABARVIT

PARTS



DÍLY



TEILE

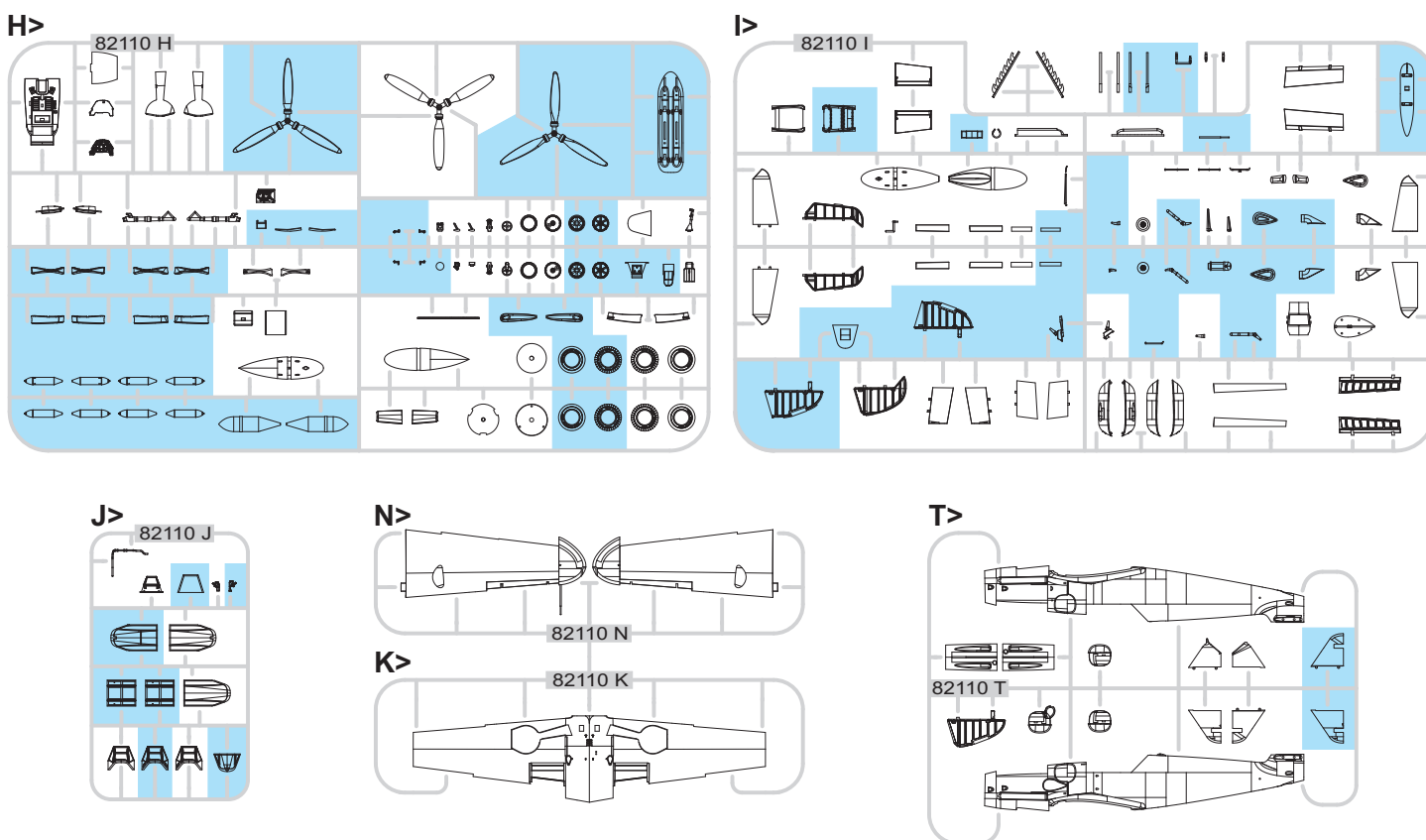
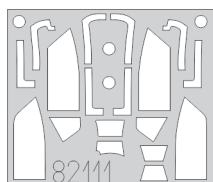


PIÈCES

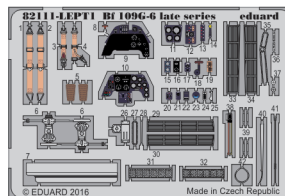


部品

## PLASTIC PARTS

eduard  
MASK

## PE - PHOTO ETCHED DETAIL PARTS



-Parts not for use. -Teile werden nicht verwendet. -Pièces à ne pas utiliser. -Tyto díly nepoužívejte při stavbě. - 使用しない部品

COLOURS



BARVY



FARBEN



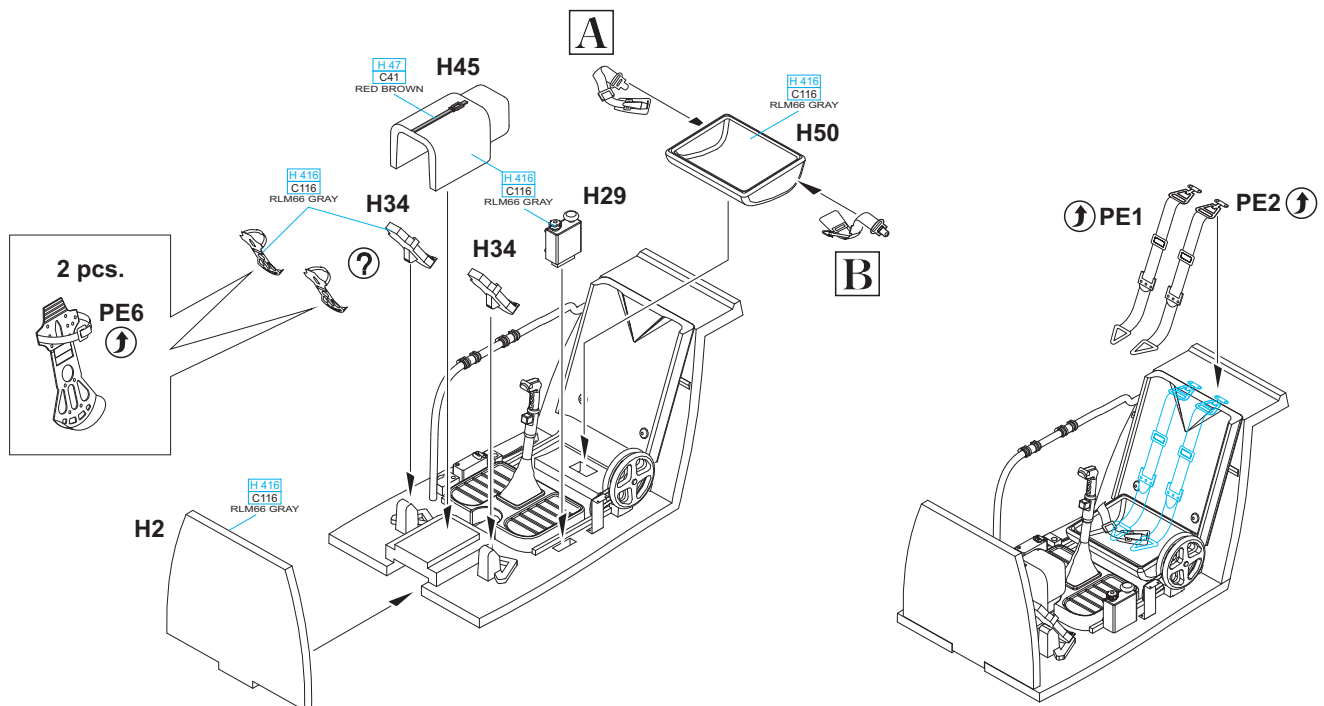
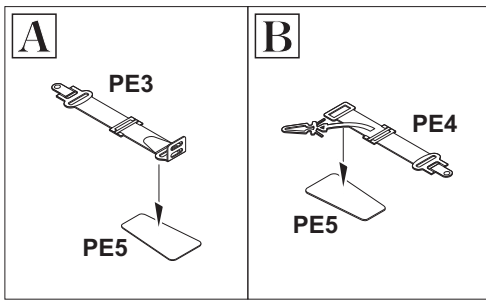
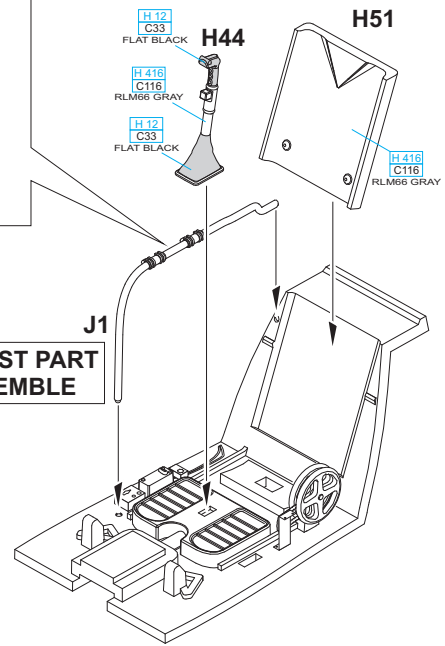
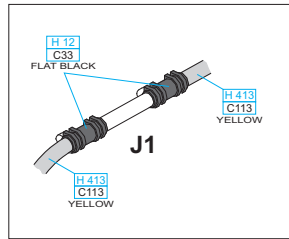
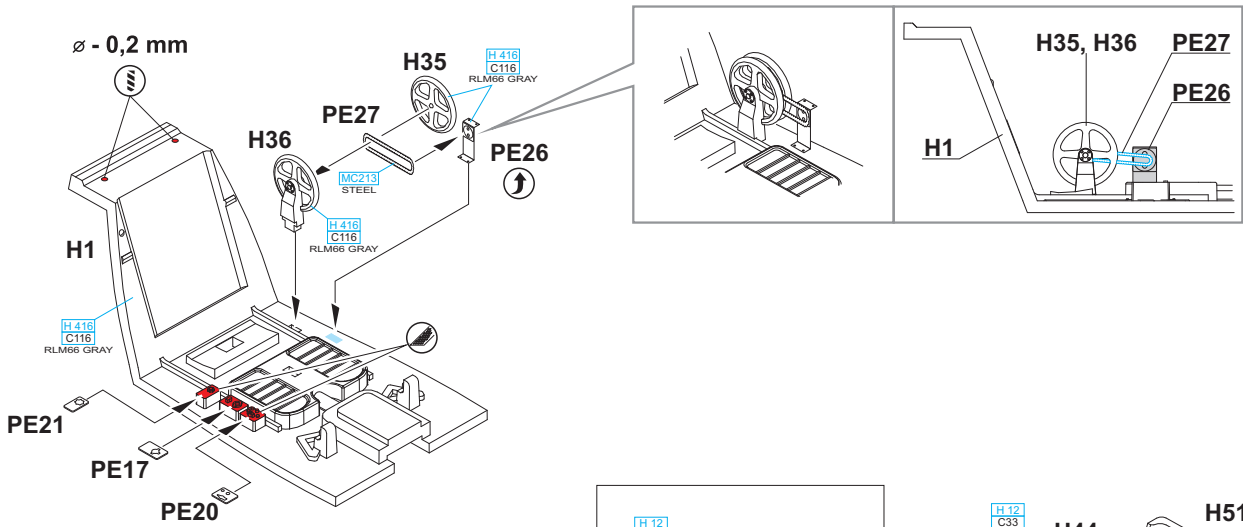
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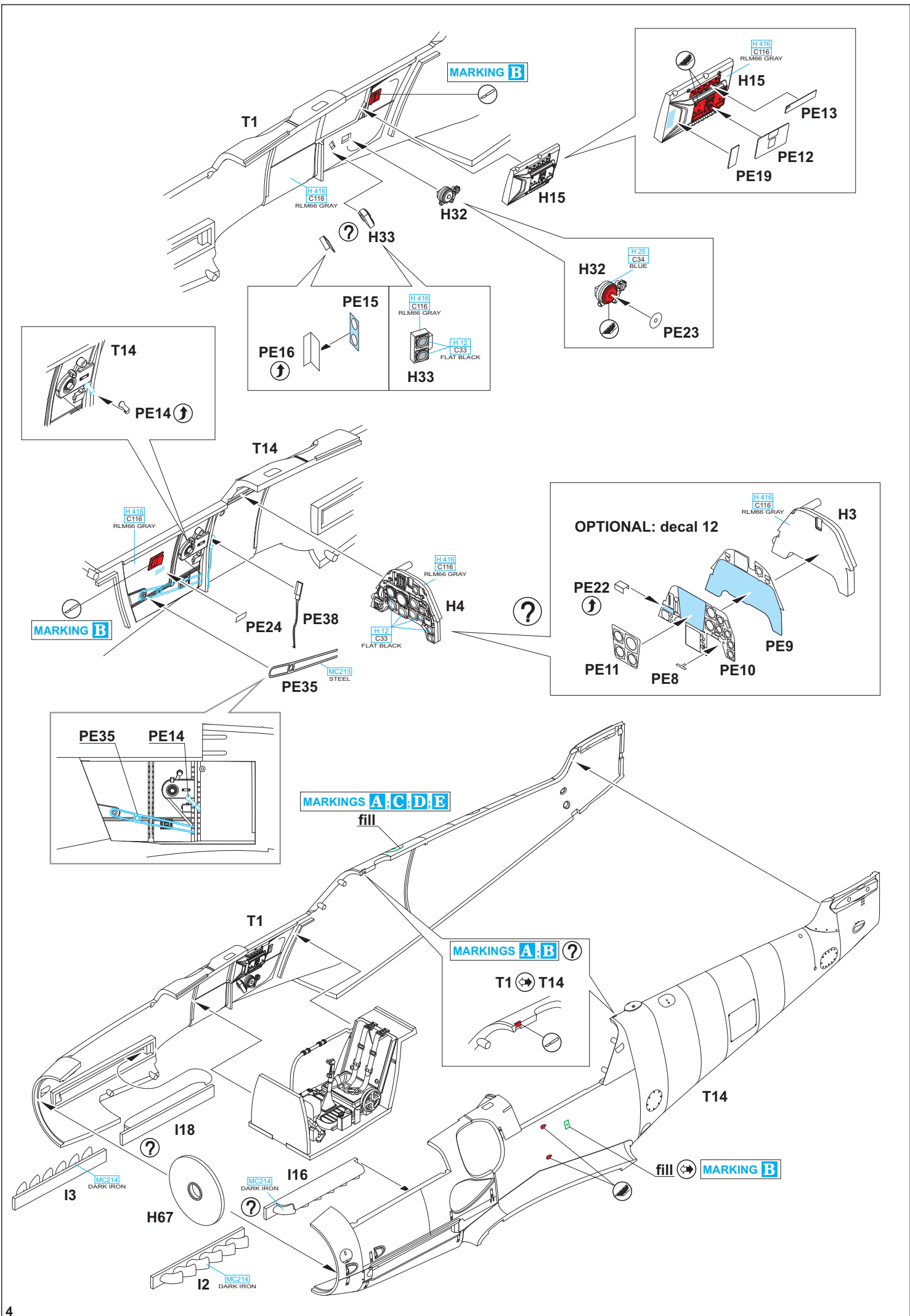


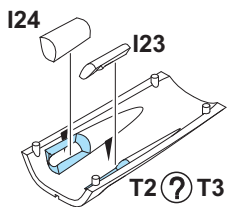
色

GSI Creos (GUNZE)			
AQUEOUS	Mr.COLOR		
[H 2]	[C2]	BLACK	
[H 3]	[C3]	RED	
[H 8]	[C8]	SILVER	
[H 11]	[C62]	WHITE	
[H 12]	[C33]	FLAT BLACK	
[H 25]	[C34]	SKY BLUE	
[H 26]	[C66]	BRIGHT GREEN	
[H 47]	[C41]	RED BROWN	
[H 65]	[C18]	BLACK GREEN	RLM70
[H 68]	[C36]	DARK GRAY	RLM74
[H 69]	[C37]	GRAY	RLM75

AQUEOUS	Mr.COLOR		
[H 70]	[C60]	GRAY	RLM02
[H 77]	[C137]	TIRE BLACK	
[H 90]	[C47]	CLEAR RED	
[H 94]	[C138]	CLEAR GREEN	
[H 113]	[C113]	YELLOW	RLM04
[H 114]	[C114]	RED	RLM23
[H 116]	[C116]	BLACK GRAY	RLM66
[H 117]	[C117]	LIGHT BLUE	RLM76
Mr.METAL COLOR			
[MC213]		STAINLESS	
[MC214]		DARK IRON	

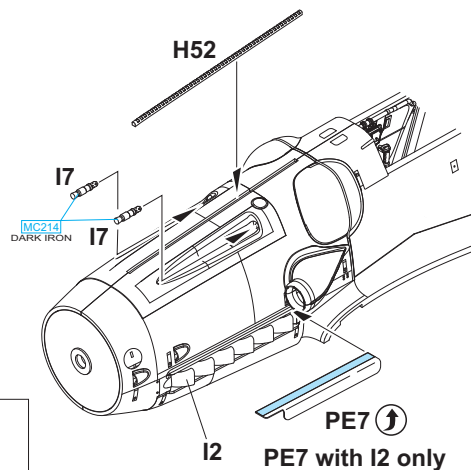
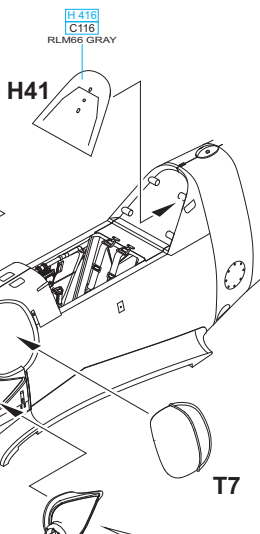






T2 - MARKINGS B;C;D  
T3 - MARKINGS A;E

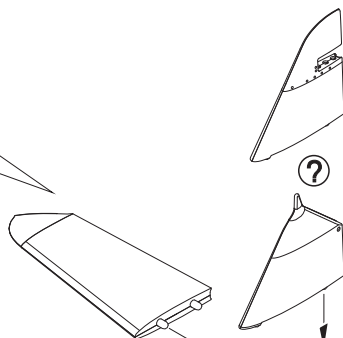
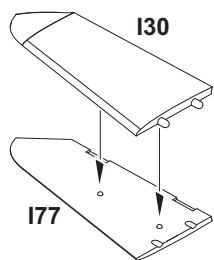
T5 - MARKINGS B;C;D  
T6 - MARKINGS A;E



I55

I54

I26



MARKINGS A;B;D

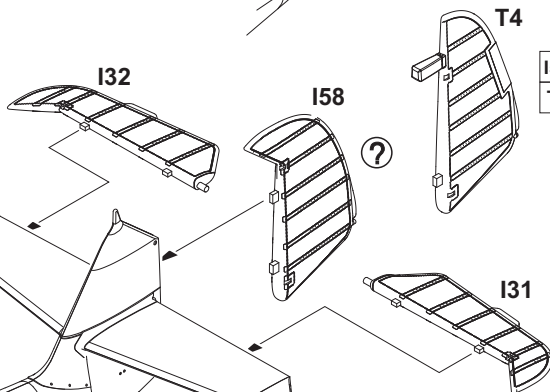
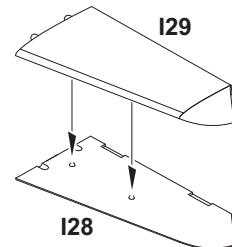
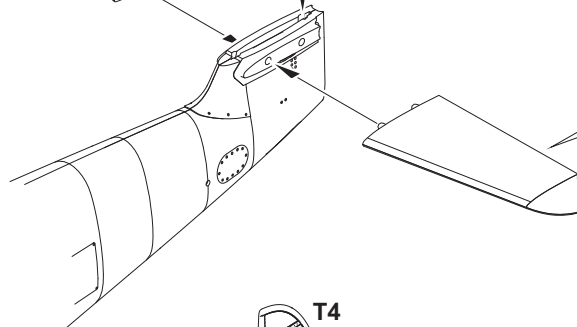
MARKINGS C;E

T10

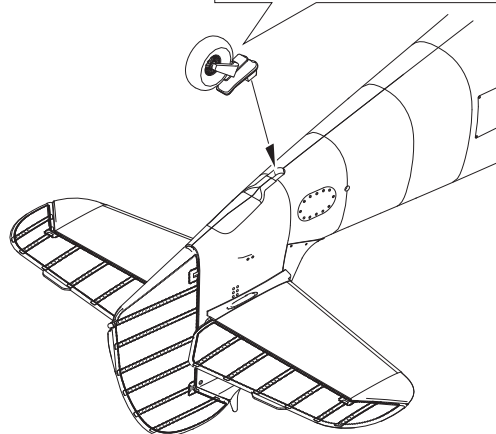
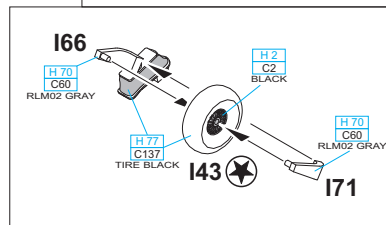
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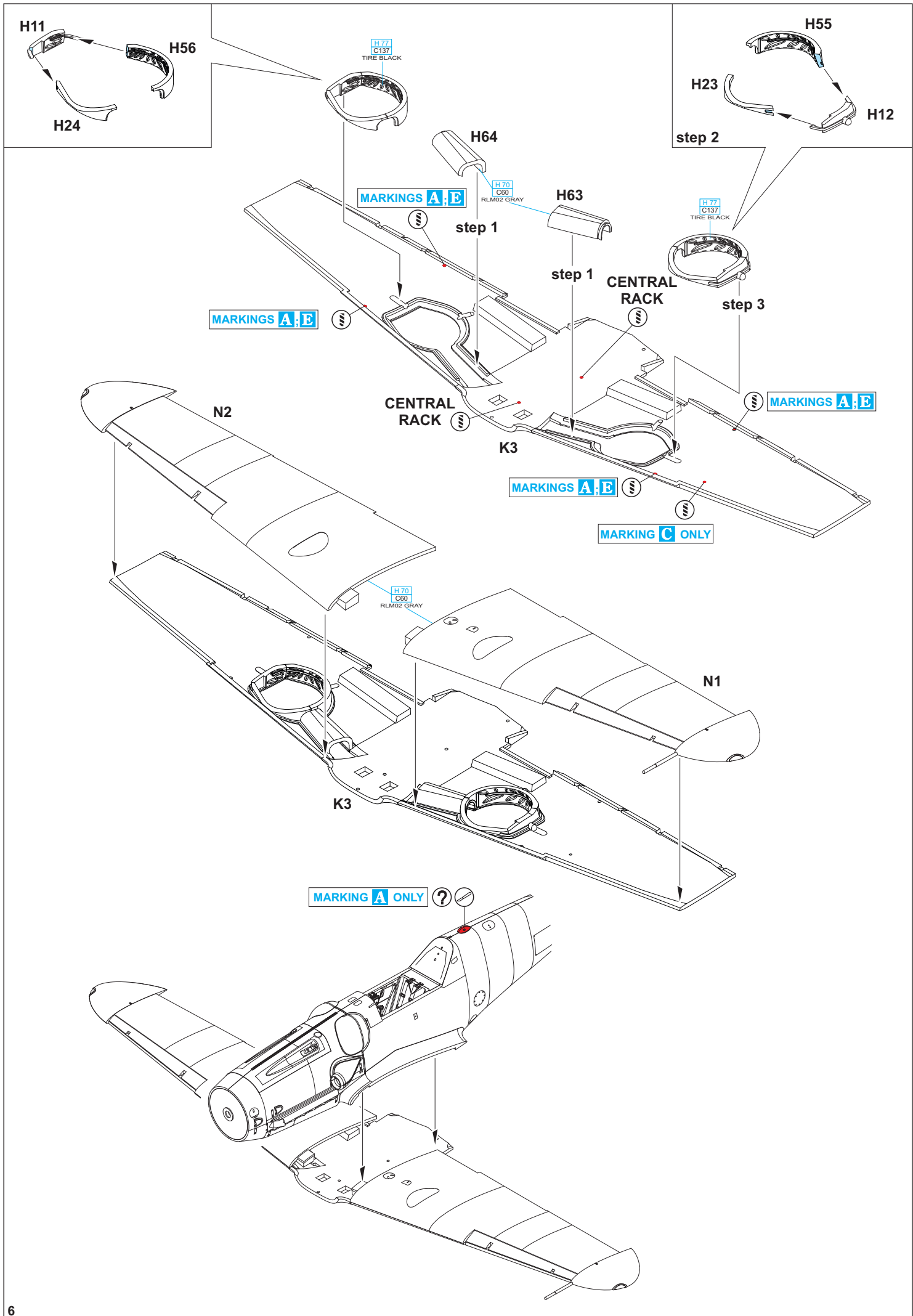
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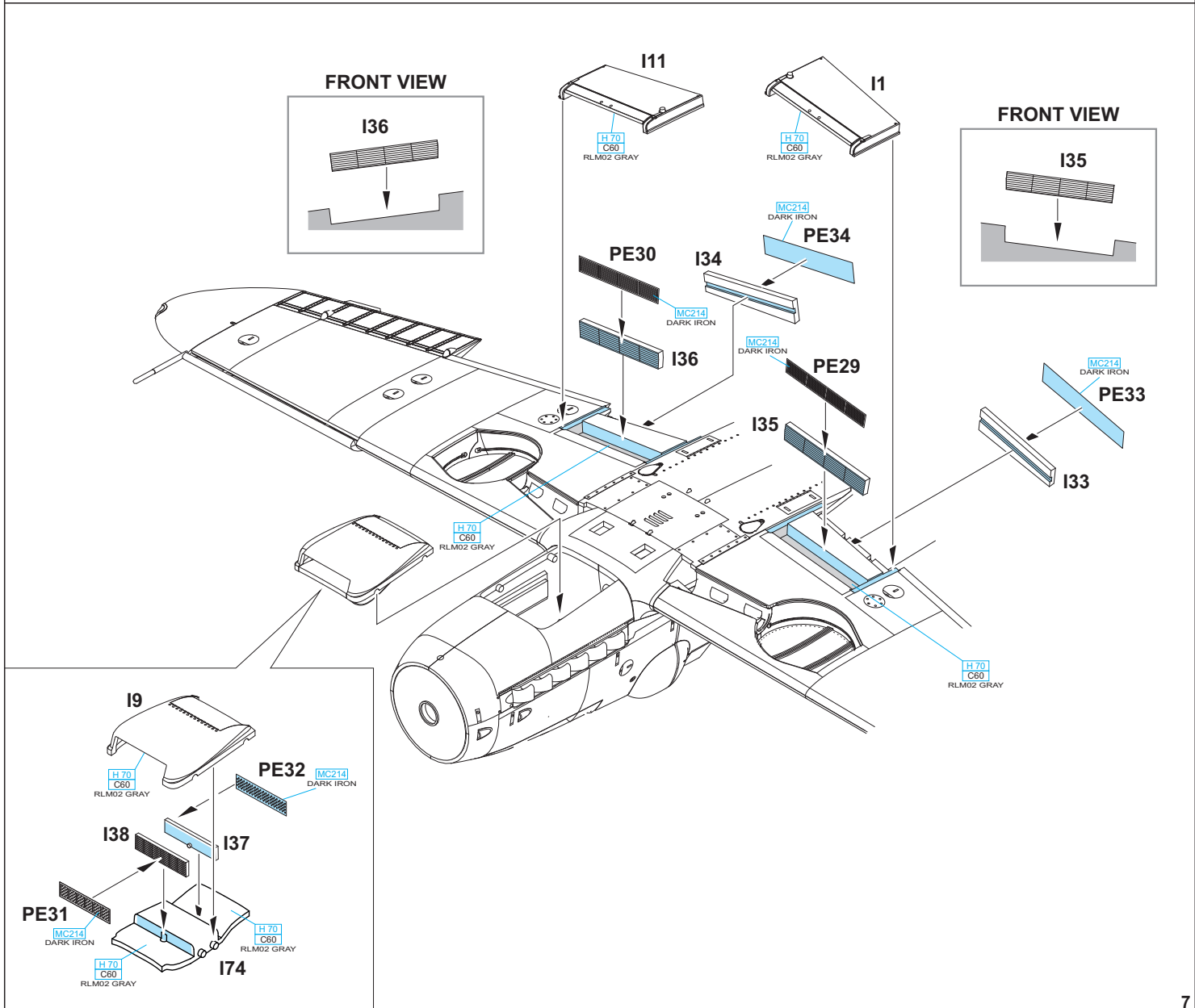
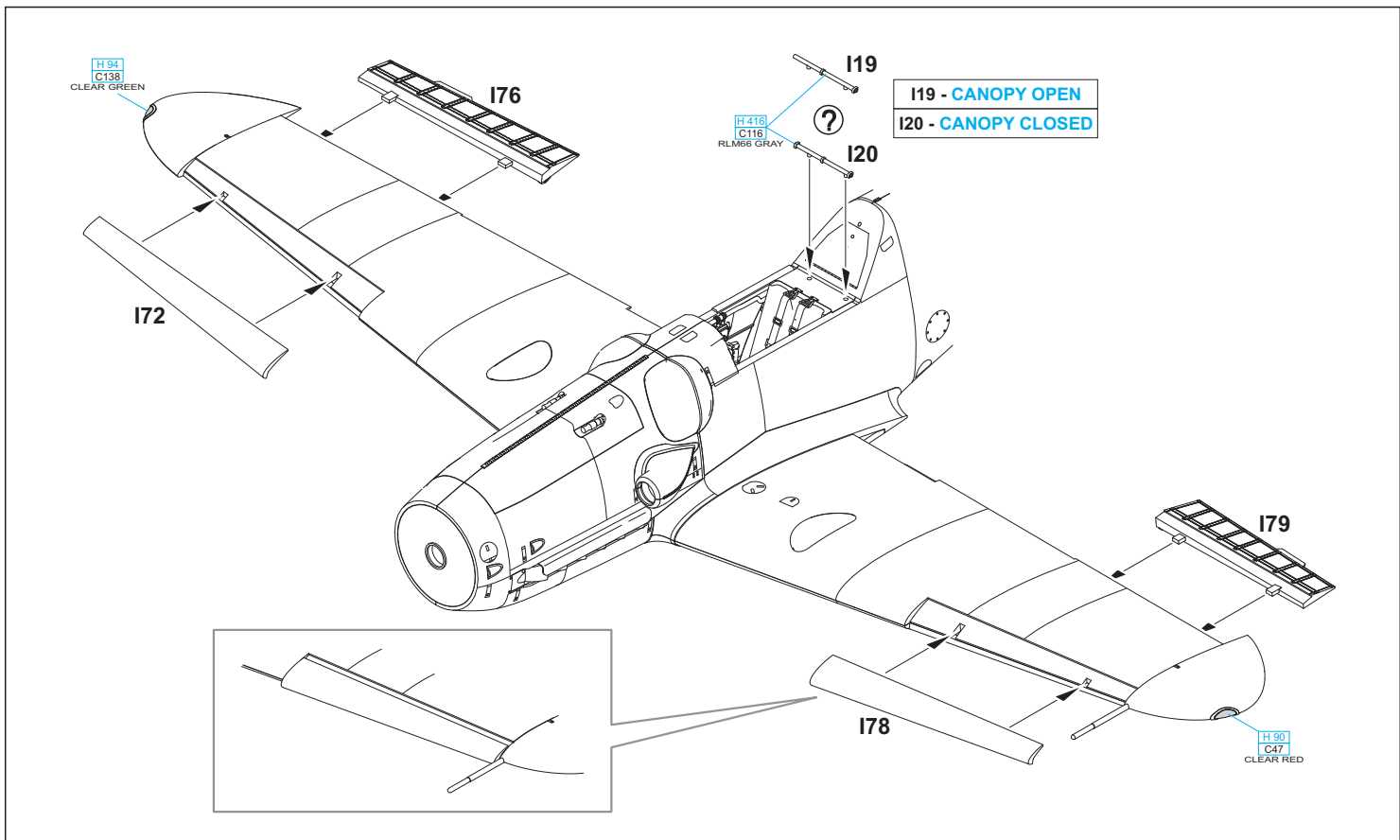
T11

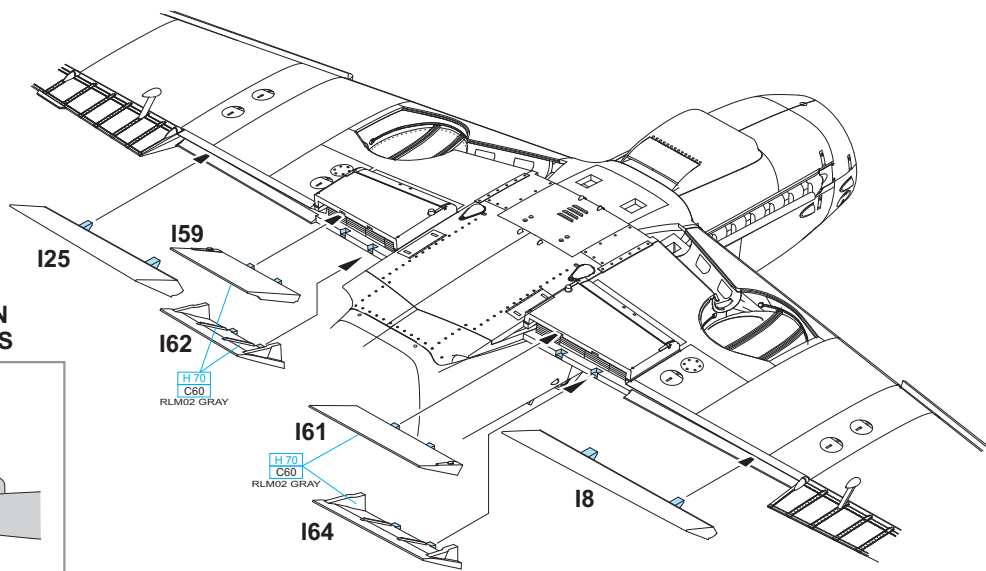


I58 - MARKINGS A;B;D  
T4 - MARKINGS C;E

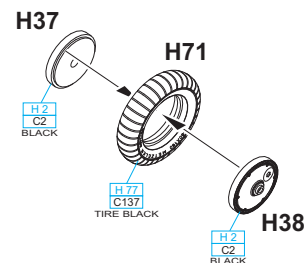
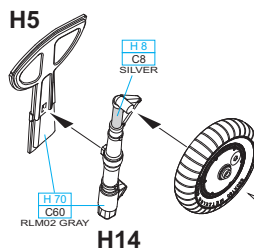
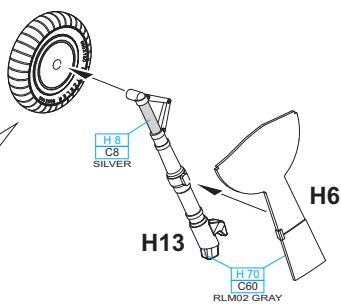
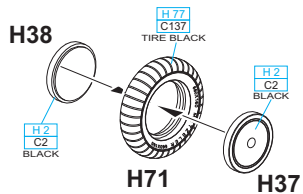
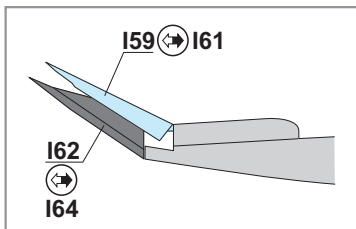




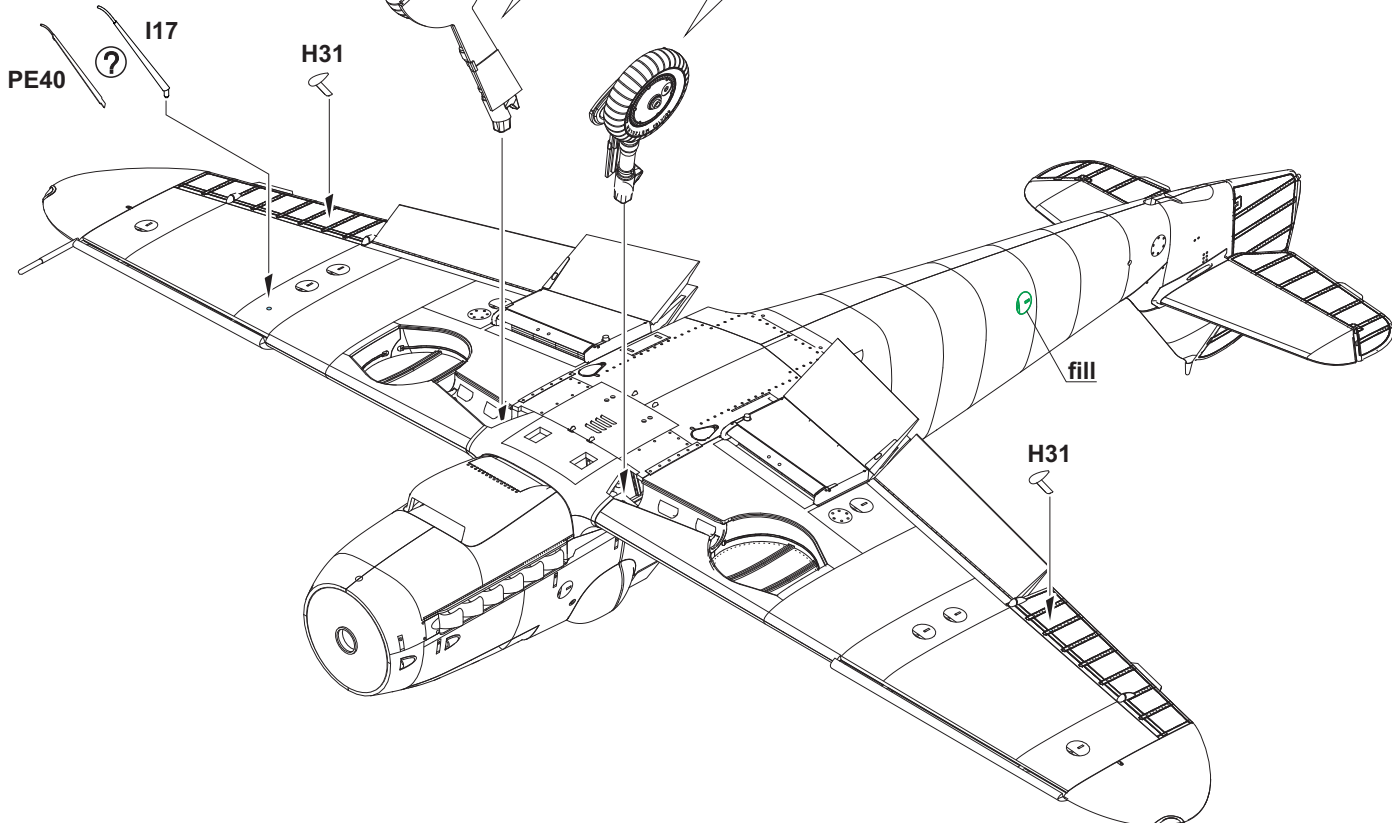




**CORRECT POSITION OF RADIATOR FLAPS**

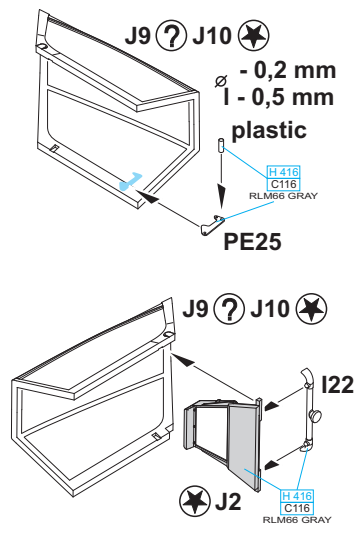
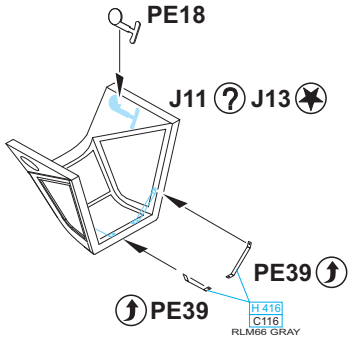
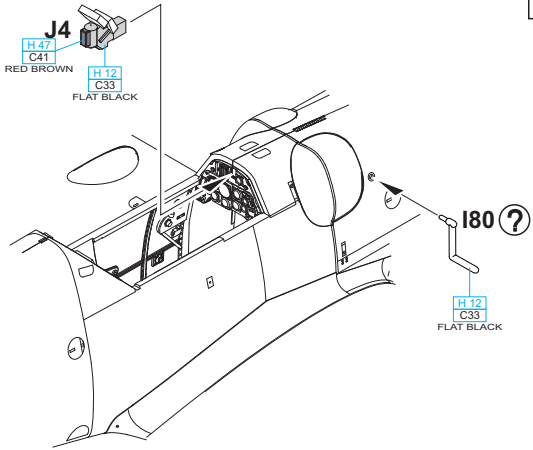


I17 ? PE40 - MARKING C ONLY





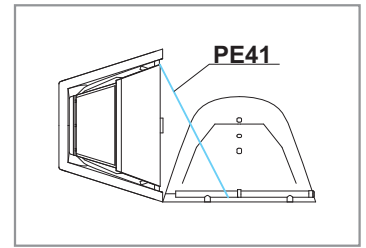
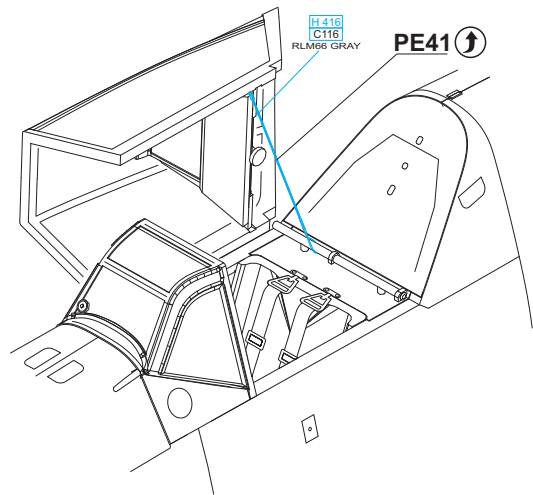
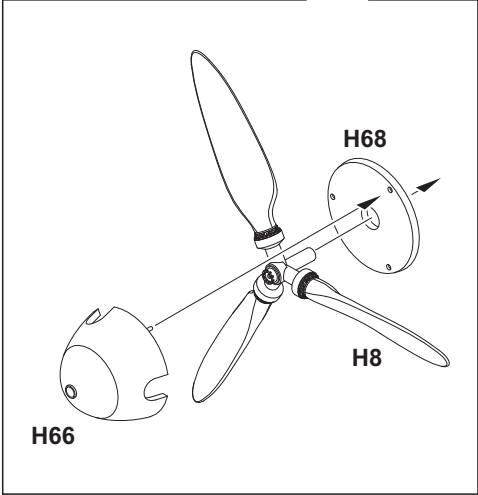
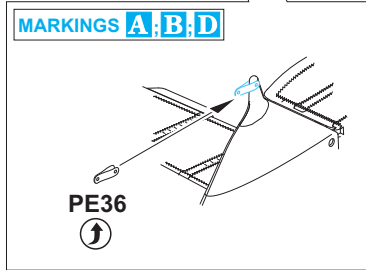
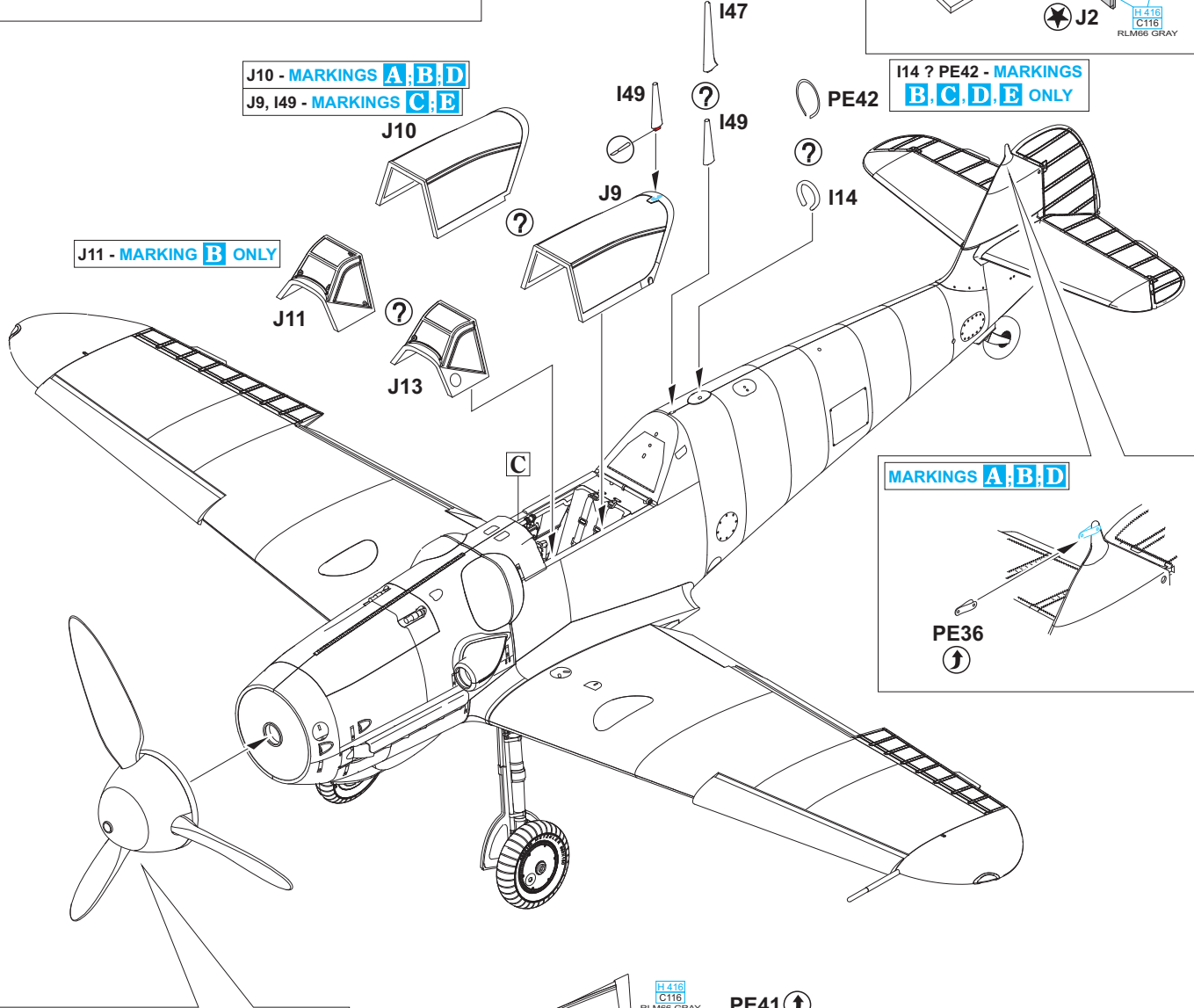
**C**

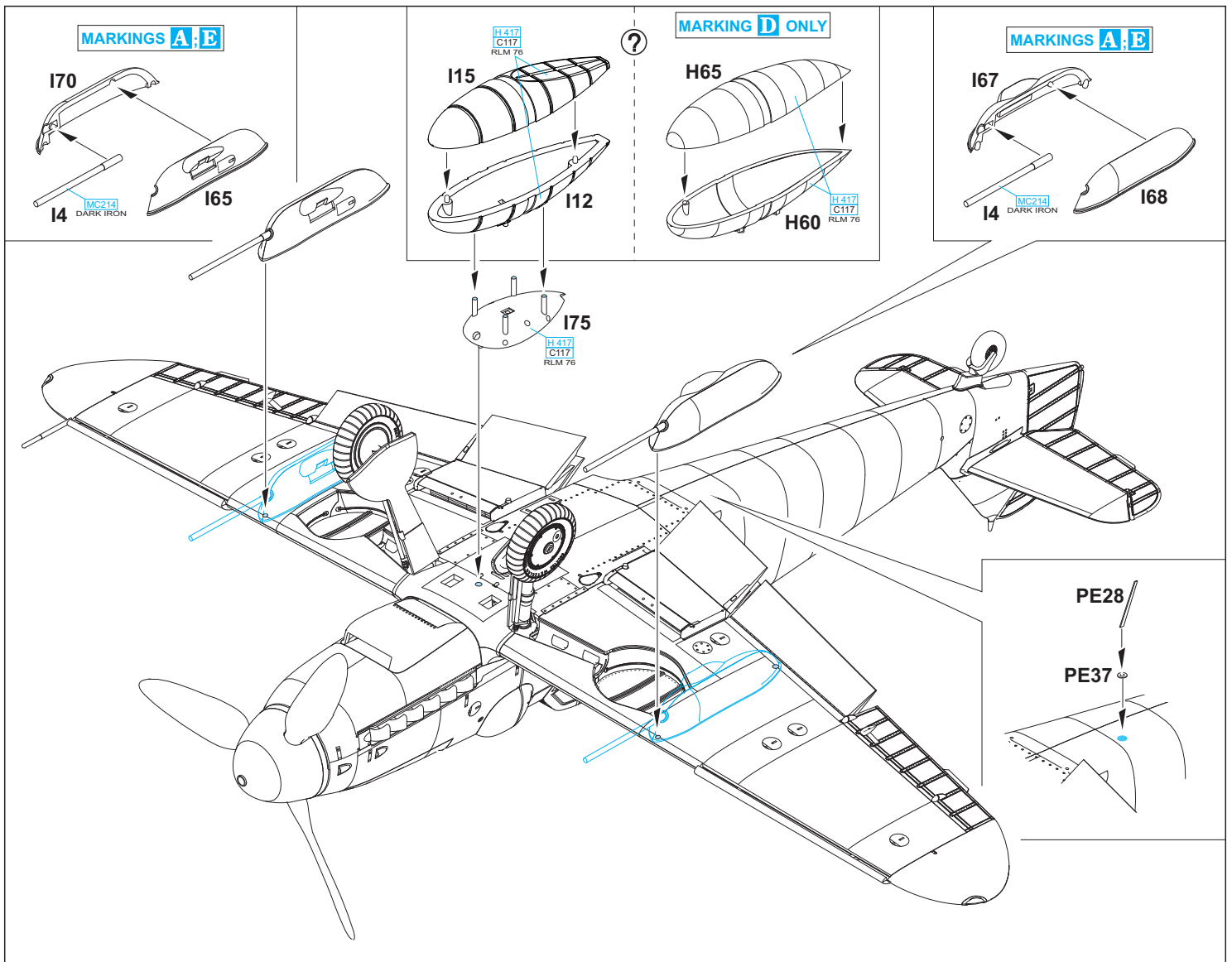


I47 - MARKING **A**  
I49 - MARKINGS **B;D**

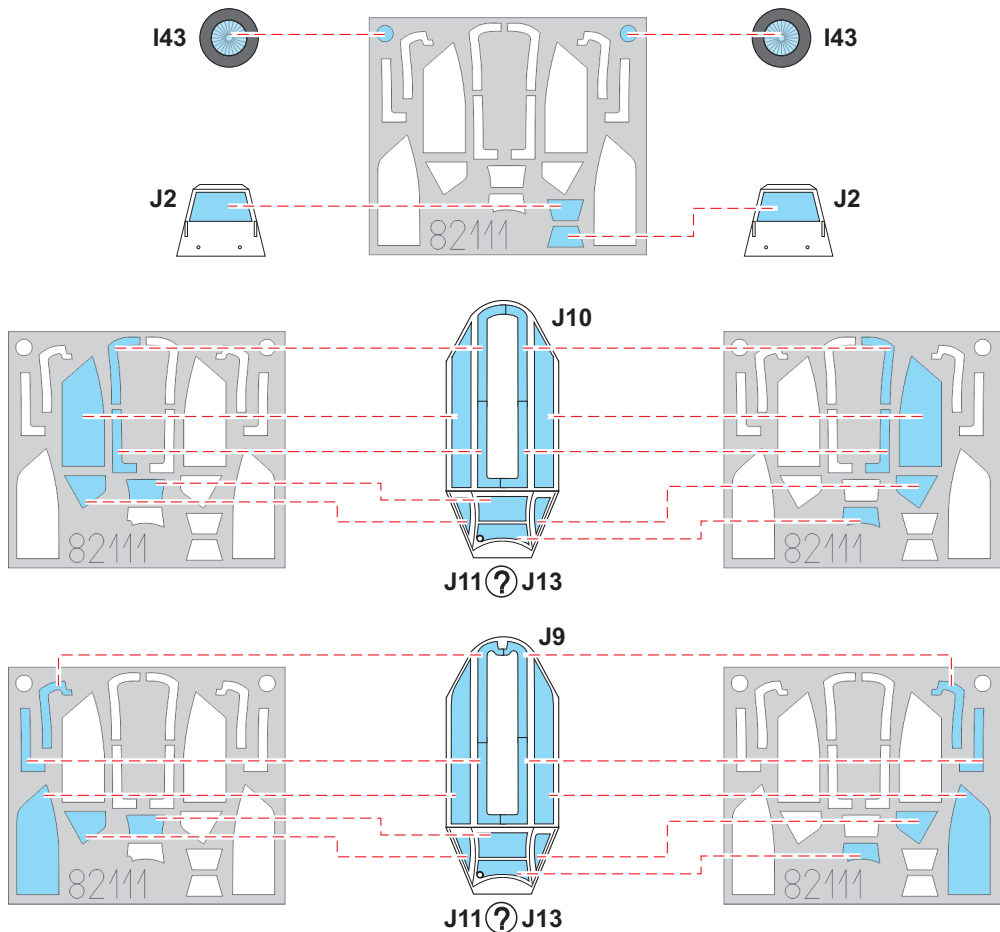
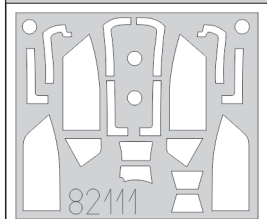
J10 - MARKINGS **A;B;D**  
J9, I49 - MARKINGS **C;E**

I14 ? PE42 - MARKINGS **B;C;D;E ONLY**



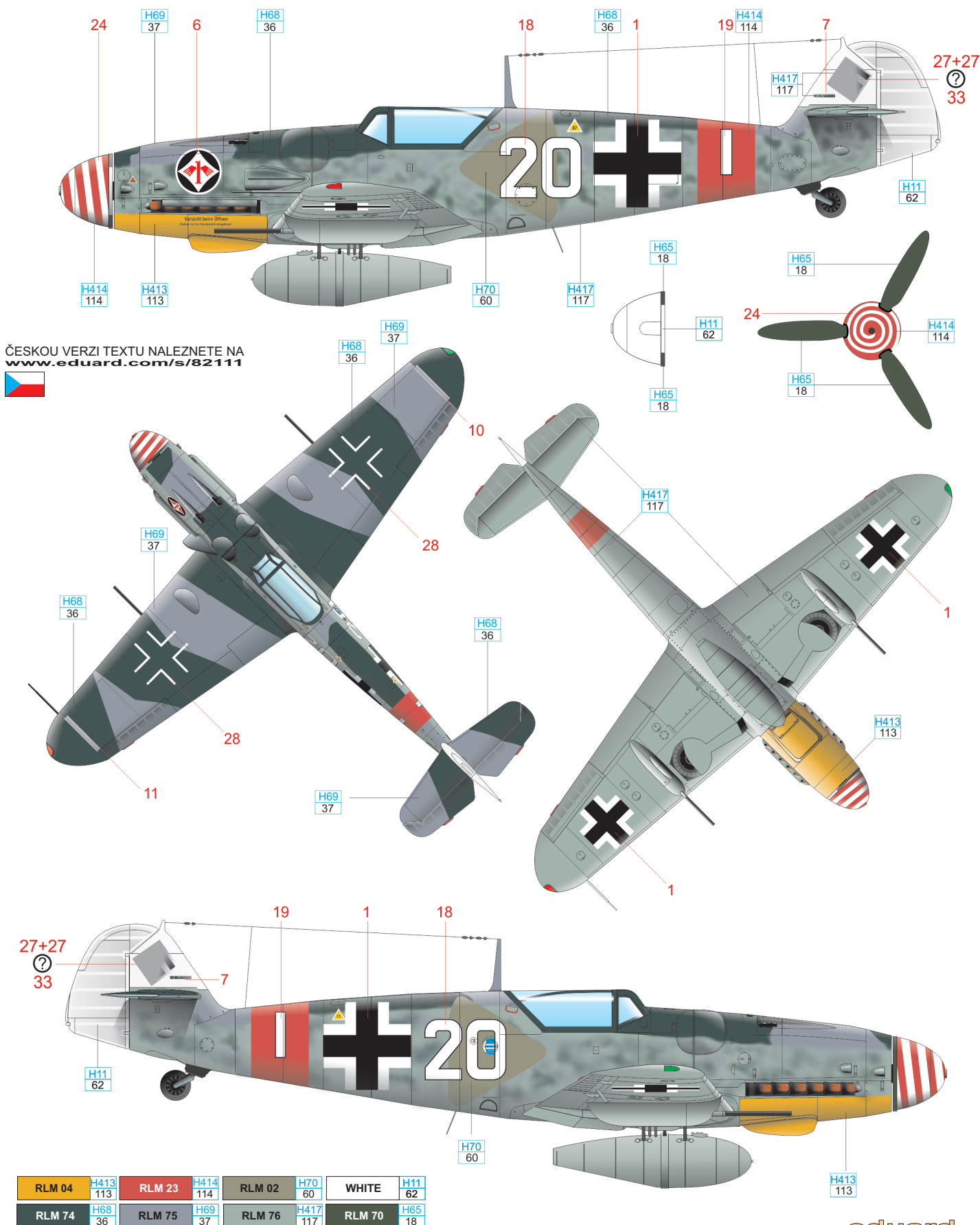


**eduard**  
**MASK**  
**82111**



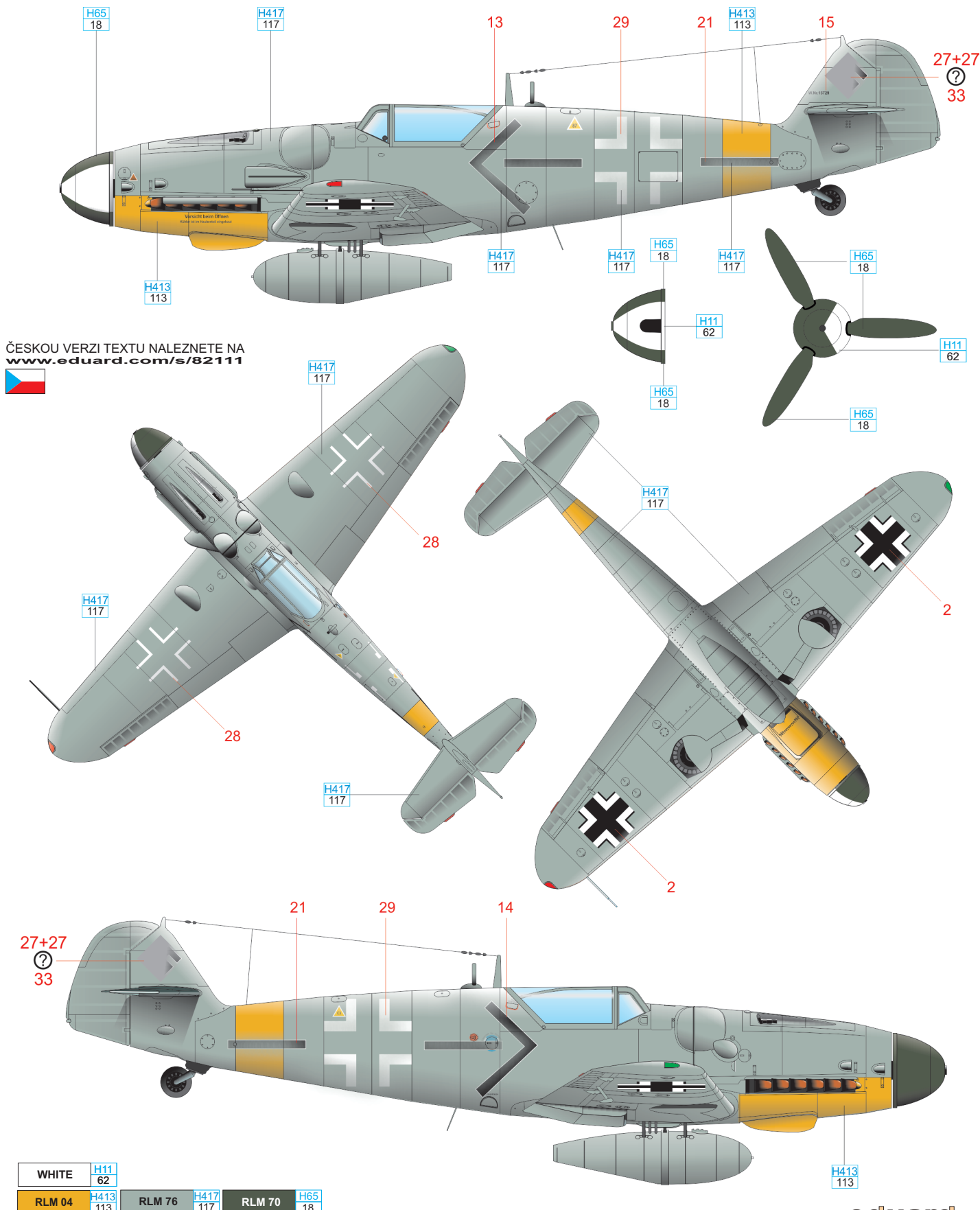
# A W.Nr.160303, flown by Hptm. Friedrich Eberle, the CO of III./JG 1, Volkel, November, 1943

Friedrich Eberle, the commanding officer of III. Gruppe of JG 1, was downed in this Bf 109G-6 on January 30, 1944. The man who recorded the kill was a P-47D Thunderbolt jockey, Lt. Robert Booth, of the 369th FS / 359th FG, a fighter ace with a total of eight kills to his credit. Booth himself was downed a few months later, on June 8, 1944 and became a POW. Eberle was injured but survived the encounter with Booth and led III. Gruppe until April 27, 1944. In July 1944, he was appointed the CO of III./JG 4. Eberle led his unit in Operation Bodeplatte, the attack on Allied airfields on January 1, 1945. He was court martialled for cowardice but finally was acquitted of the charge and survived the war with 33 kills. Eberle's aircraft had been marked with a double chevron but in accordance with temporary orders, this marking was painted over and the commander's aircraft was marked with a number. The JG 1 crest was painted on the left side of the cowling only. The rear part of the fuselage was partially overpainted with RLM 76 to tone it down.



# B W.Nr. 15729, flown by Obstlt. Hermann Graf, Stab./JG11, Jever, early 1944

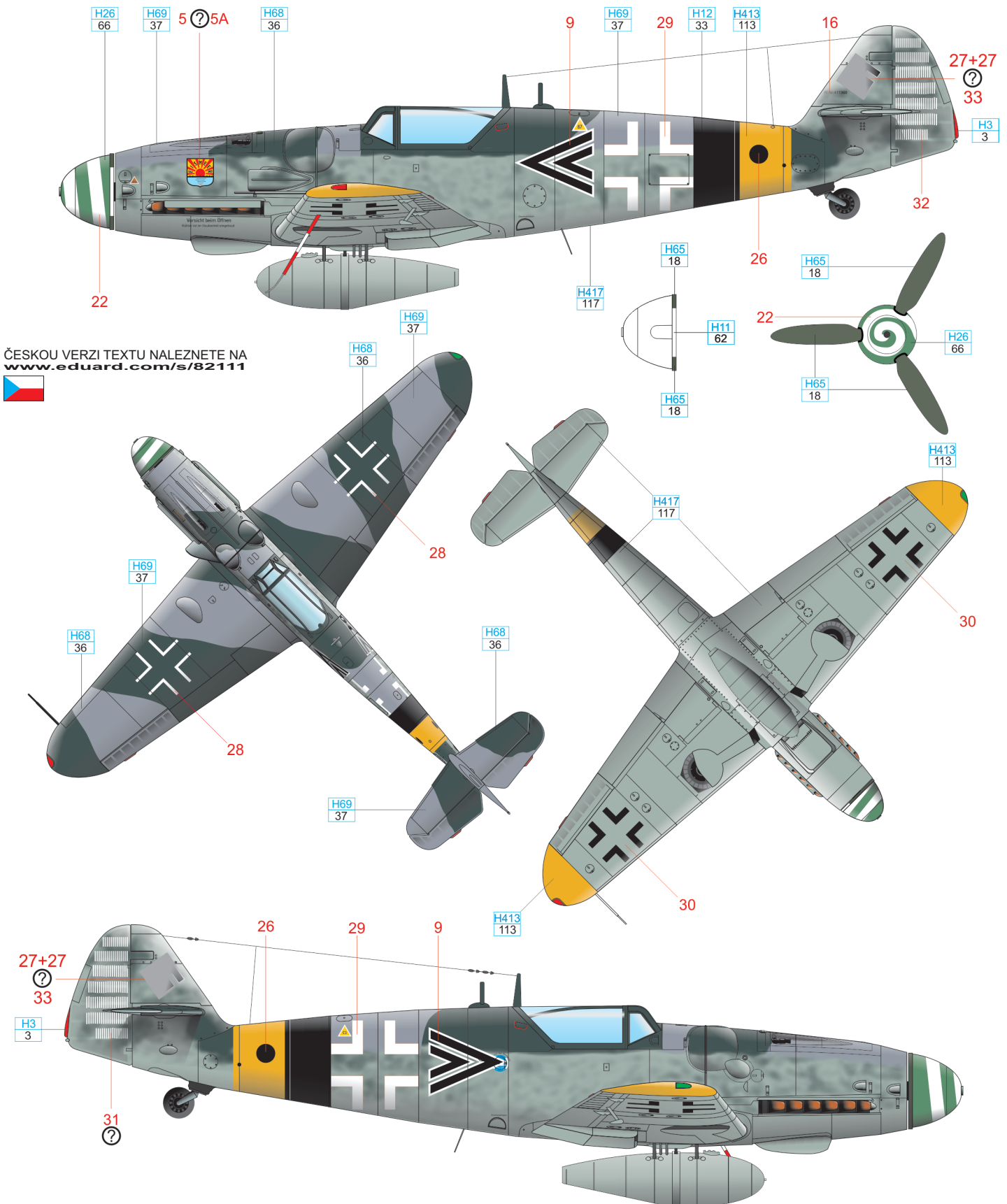
This aircraft was manufactured by the Erla factory as a Bf 109G-5 high-altitude fighter, but was converted to G-6 standard later. What was typical for the G-5 and retained during the conversion was the anti-fog capsule in the windscreen. The camouflage scheme is unusual – the former camouflage including the Stab marking was oversprayed with a light grey colour, probably RLM 76. Hermann Graf commanded JG 11 from November 11, 1943 till March 29, 1944 and despite the fact that he was officially banned from flying, he managed to down seven aircraft – amounting to the final kills of his career. He is credited with 212 victories in total (the majority of which were with JG 52 and three with JGr 50). He was awarded for his successes during the war as well as after. He received Diamonds to his Ritterkreuz with Oak Leaves and Swords, the fifth recipient of this honour, on September 29, 1942. Graf participated in propaganda campaigns, and he was a member of the Luftwaffe soccer team. At the end of the war, Graf led JG 52 and retreated from East Prussia via Silesia to Bohemia and surrendered to US forces at Pisek on May 8, 1945. He was promptly handed over to the Russians and spent more than four years in Russian captivity.



WHITE	H11 62	RLM 04	H413 113	RLM 76	H417 117	RLM 70	H65 18
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# C W.Nr. 411960, flown by Hptm. Franz Dörr, the CO of III./JG 5, Gossen, Norway, May, 1945

Franz Dörr downed his first victim, a British Wellington bomber, on September 29, 1941 as a member of 1.(Erg.)/JG 3. This unit was redesignated 7./JG 5 on January 1, 1942. In early May 1944, Dörr took command of III. Gruppe of JG 5 and led this unit till the end of war. Dörr was awarded the Ritterkreuz on August 19, 1944. He managed to down 122 enemy aircraft – his score is marked on the rudder of his personal Bf 109G-6, W. Nr. 411960. This aircraft was manufactured at the Erla factory and sports all its typical characteristics such as the small bulge on the right side of the cowl and different gun troughs. The exact colour of the spinner is inconclusive from photographic evidence but can be black with a white spiral. The small disc on the rear fuselage identified III. Gruppe aircraft.



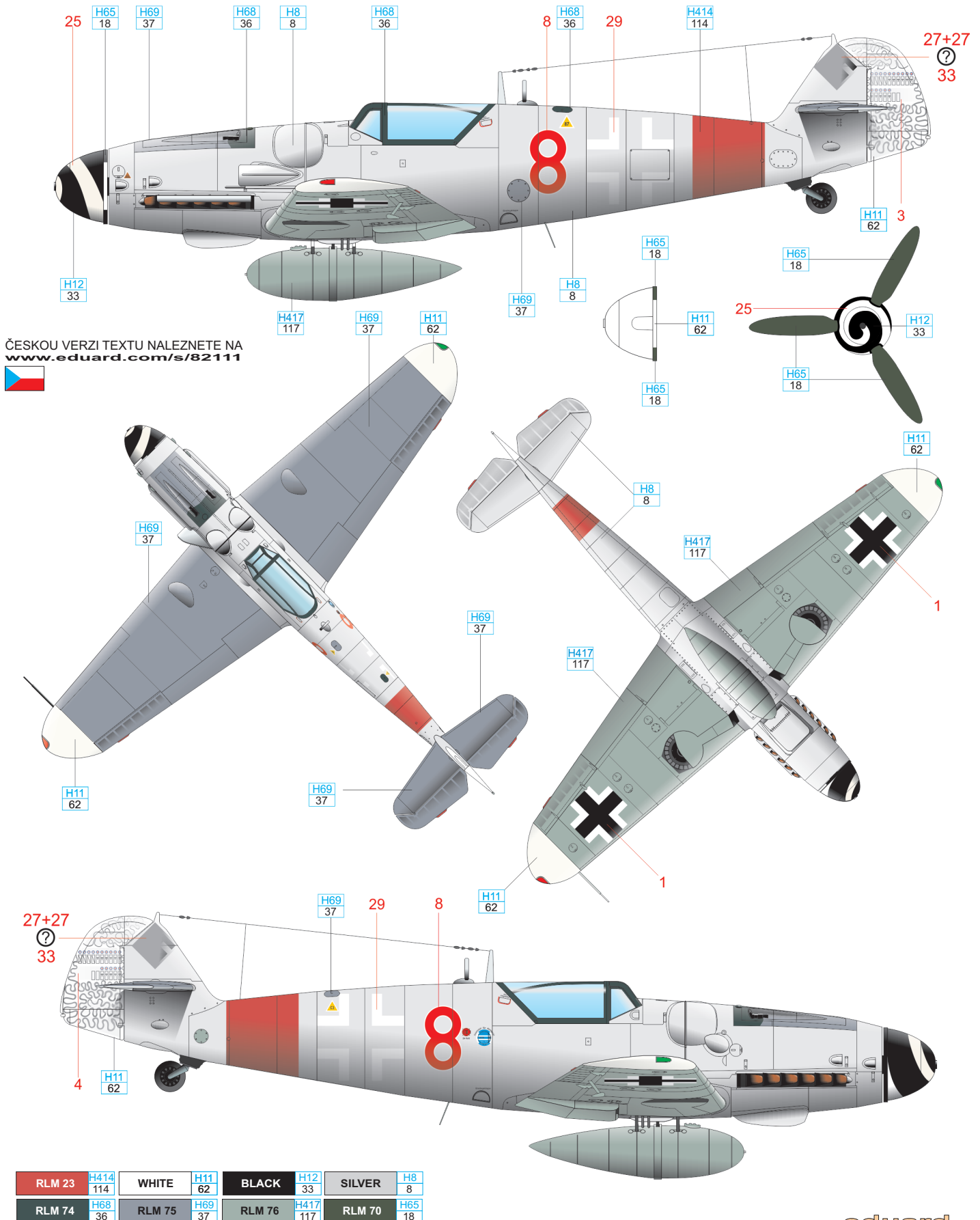
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RLM 04	H413 113	BLACK	H12 33	RLM 25	H26 66	RED	H3 3
RLM 74	H68 36	RLM 75	H69 37	RLM 76	H417 117	RLM 70	H65 18

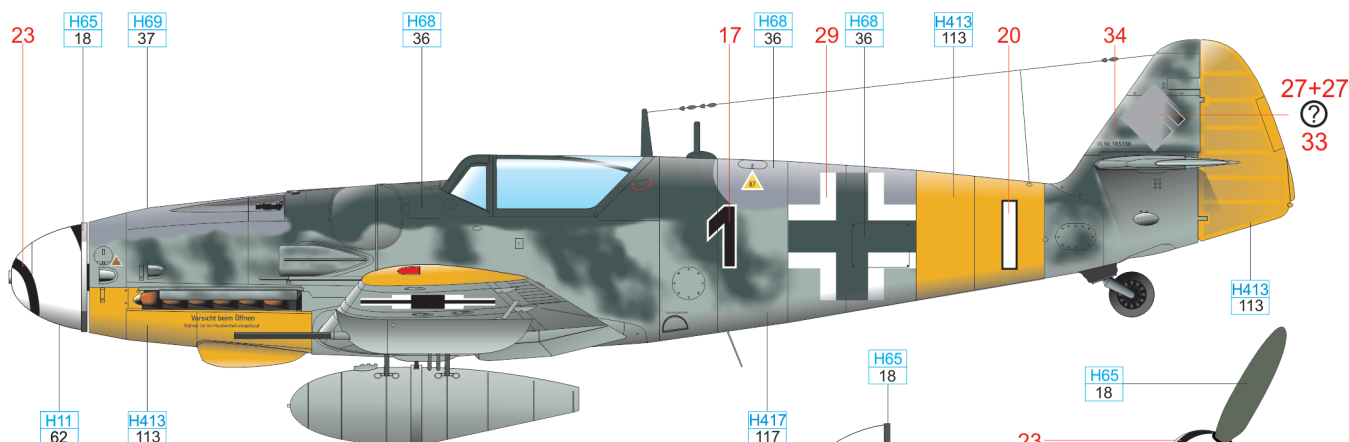
# D flown by Oblt. Kurt Gabler, 8./JG 300, Jüterbog – Waldlager Air Base, Germany, July, 1944

The personal aircraft of Oblt. Kurt Gabler flew without camouflage. This saved on weight, reduced drag, and made the aircraft more effective in the pursuit of the fast Mosquitos. The white tail and wingtips identified the leader's aircraft since Gabler provisionally led III./JG 300 from June 20, 1944. The wide red tailband was common to JG 300 aircraft at the time. Gabler's tally of 17 kills is depicted on the rudder. Gabler was wounded in action in late September, 1944 and flew no further combat sorties through to the end of the war. The camouflage was stripped off the aircraft to lower aerodynamic drag and help the pilot in the aforementioned pursuit of RAF Mosquitos. The wings seem to be oversprayed with one color, likely RLM 75. The national insignia on the lower wings surface is not confirmed by photos. The upper cowling, canopy framing and some access panels could be either camouflaged or made of a darker metal.

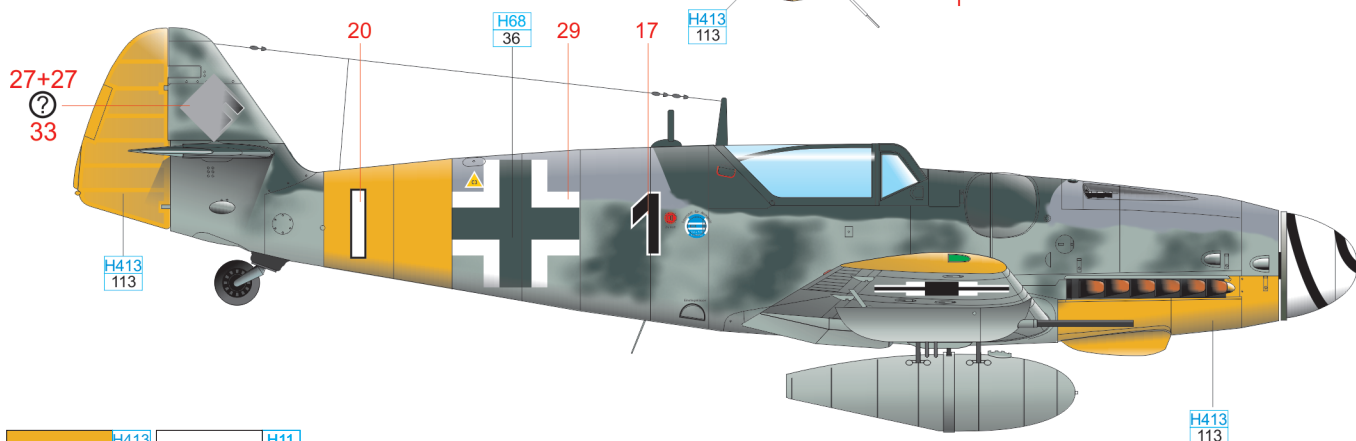
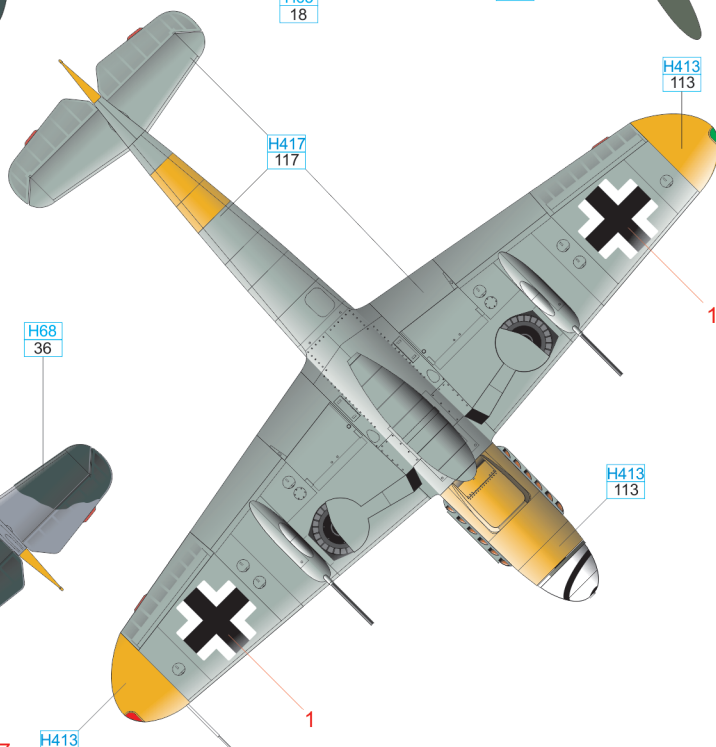
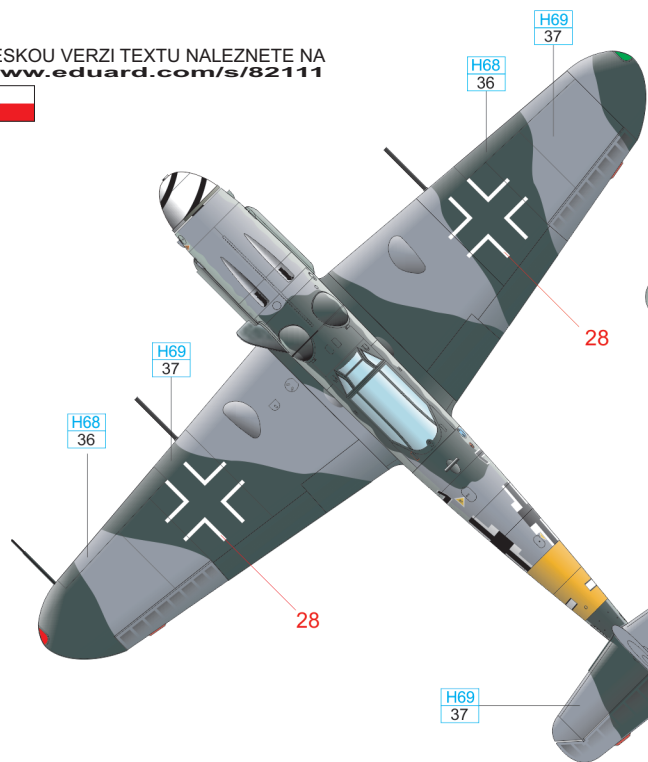


# E W.Nr. 165350, flown by Lt. Anton Hafner, the CO of 8./JG 51, Tilsit-Ost, August, 1944

Hafner was photographed in the cockpit of this particular aircraft in August, 1944, when his unit was based at an airfield close to Tilsit in East Prussia (today Sovetsk, a city on the Russian-Lithuanian border). Anton Hafner is credited with a total of 204 victories, all of them achieved as a JG 51 pilot. He served with JG 51 not only on the Eastern Front where he downed the majority of his opponents, but in North Africa as well, where he was shot down and injured. He met up with his destiny on October 14, 1944. During a dogfight with his 204th and final victim, a Yak-9, Hafner hit some trees and succumbed to his resulting injuries. He was awarded the Ritterkreuz on August 23, 1943 and Oak Leaves were added on April 11, 1944. The appearance of this aircraft was partially reconstructed from existing photos. It could have the standard rudder. The fuselage is darkened with blotches of RLM 74 and 75.



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RLM 04	H413 113	WHITE	H11 62
RLM 74	H68 36	RLM 75	H69 37
		RLM 76	H417 117
		RLM 70	H65 18

