

MESSERSCHMITT ME 209 A1 (V5)Historical

Designed to overcome the narrow track undercarriage of the Bf 109 series, and to improve upon the wing radiators of the Bf 109 G series wing, and at the same time, to take advantage of the more powerful Daimler-Benz DB 603 G engine or the alternative Junkers Jumo 213 E engine, the prototype Me 209 was something very much of a hybrid design. A Bf 109 G 5 fuselage was considerably modified to take a variety of Daimler-Benz engines in the form of the DB 603, 605 and 628, and further modification was applied to a Bf 109 G wing to suit the new fuselage. The Me 209-II V5 as the first interim prototype, was first flown on the 3rd November 1943, after which further modifications were undertaken to install a more powerful engine; a production type main undercarriage and improved flaps. Swing at take-off continued to be a problem and at least three different types of fin and rudder were tried out before some improvement was achieved. At that stage the V5 had a maximum speed of some 463 mph, but production problems with the DB 603 G engine brought about a demand for a further prototype specifically designed to take the Jumo 213 E engine. This brought a halt to a continuation of development of the V5 and no attempt could be made to install armament and thus the V5 virtually became an engine test bed for the rest of its life; production contracts being issued to the rival Focke-Wulf company for the similar FW 190 D and the Ta 152 high performance fighters.

Colour notes

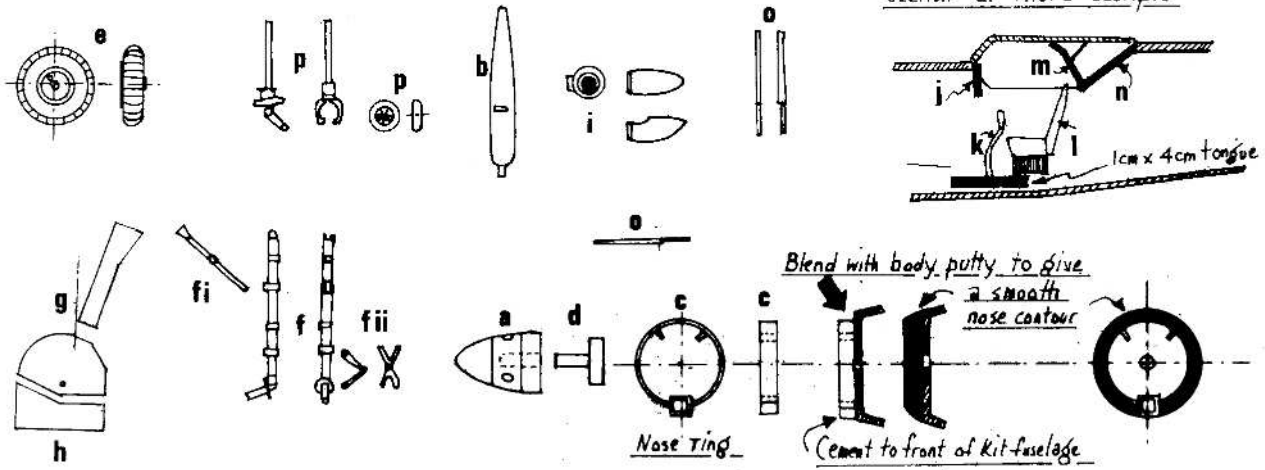
Colourings were as for service fighters for the period and comprised of a two-tone grey splinter for the upper surfaces with Dunkelgrau 74 and Mittelgrau 75. The sides, including the fin and rudder, and the under-surfaces were in Hellgrau 76, with a mottle effect in RLM Grau 02 on the fuselage sides and vertical surfaces. The spinner and propeller blades were finished in Schwarzgrün 70, whilst the armoured front ring surrounding the annular radiator was a dull natural metal finish. The interior of the cockpit was in RLM Grau 02 and the inside of the undercarriage fairings, the legs themselves and the interior of the wheel wells were in Hellgrau 76. The wheels were finished in dull black. Factory code letters were Schwarz 22, as were the national identity markings; these being outlined only in white. Various instructions were stencilled in Rot 23 on parts of the airframe, including a lengthy warning below the ejector exhaust stubs and on the in board portion of the flaps. A Yellow fuel grade triangle appeared on the starboard side of the rear fuselage, aft of the canopy. Brown oil rings were marked on the forward portion of the cowling.

General notes

Parts marked on the assembly drawing in lower case letters require to be made from scrap material, or are made from parts in the spares box. The vacuum forming process does not permit the front intake ring (Part c), to be accurately represented, thus it will be necessary to make this item from thin plastic strip, fairing-in the curve with body putty after assembly to the nose diaphragm.

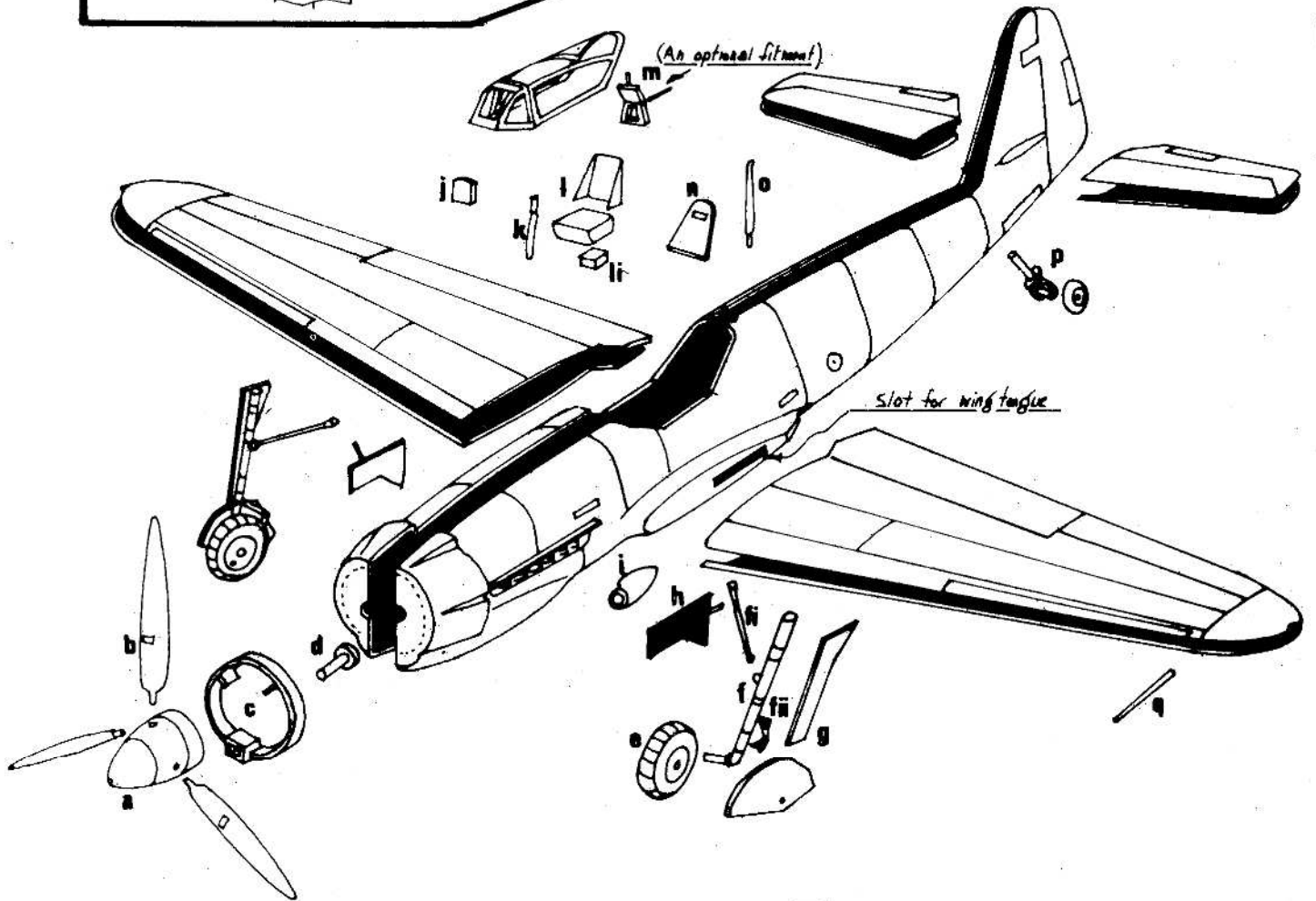
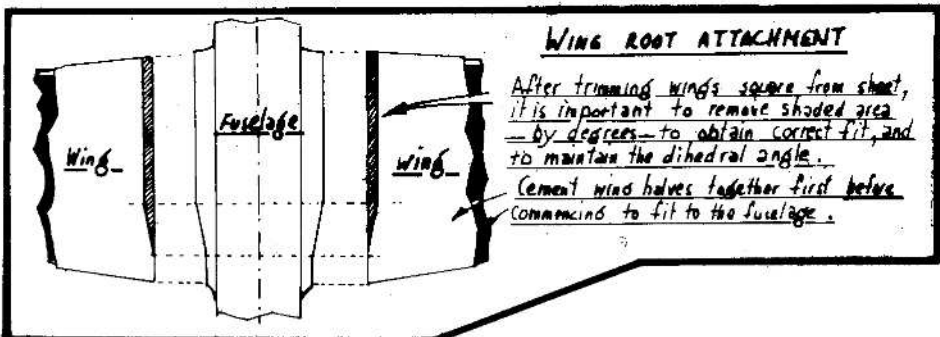
Assembly of the wings to the centre-section will be greatly aided by the insertion of a small plastic tongue 1 cm by 4 cm, cut from scrap, and fitted at the flap spar position. This tongue also will serve as a cockpit floor upon which to mount the pilot's seat. After assembling the wing halves the wing root should be filed carefully to the template shown in DETAIL A, so that the dihedral angle and a good fit to the centre-section can be achieved at the same time.

AIRMODEL - Detail parts

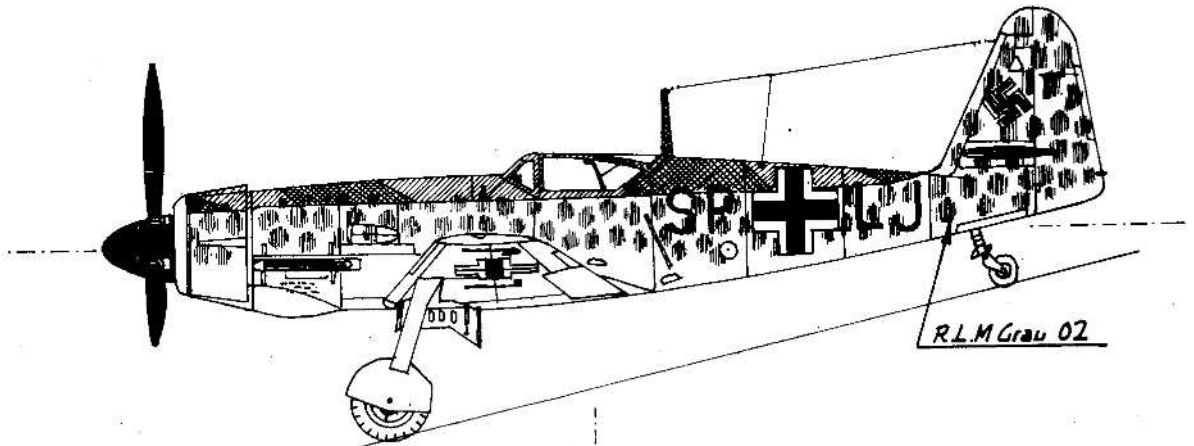


READ ASSEMBLY INSTRUCTIONS ④ AND ⑤ CAREFULLY BEFORE ASSEMBLY

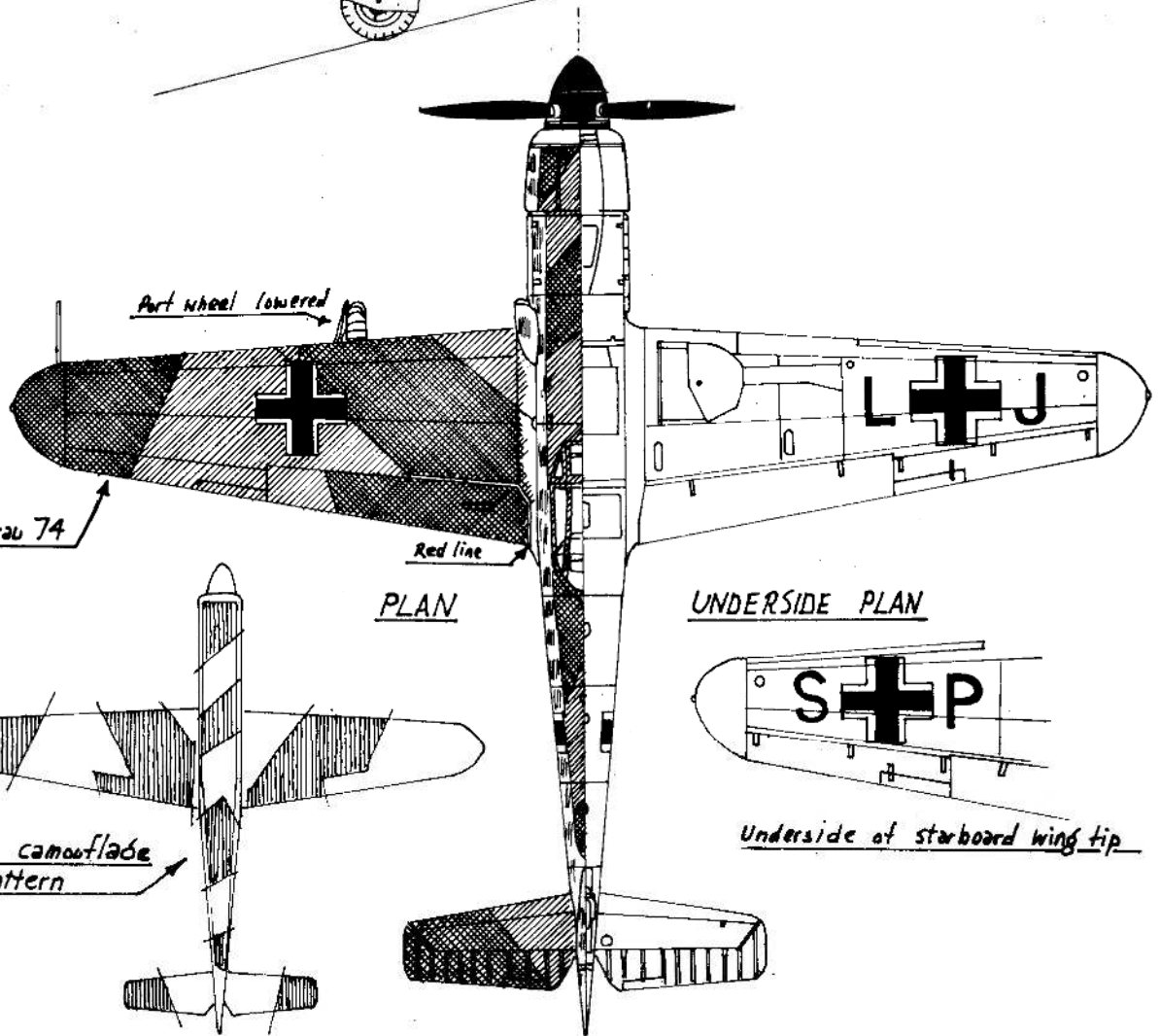
AIRMODEL - Assembly diagram



MESSERSCHMITT Me 209-V5



RLM Grau 02



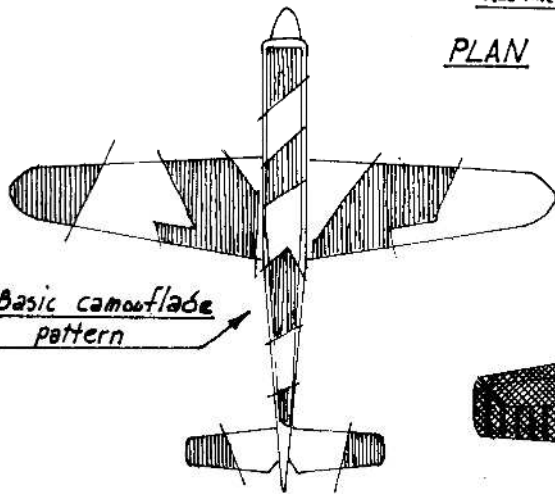
Port wheel lowered

Dunkelgrau 74

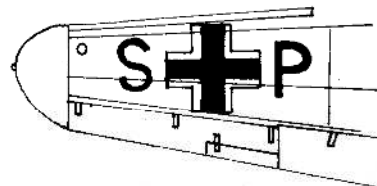
Red line

PLAN

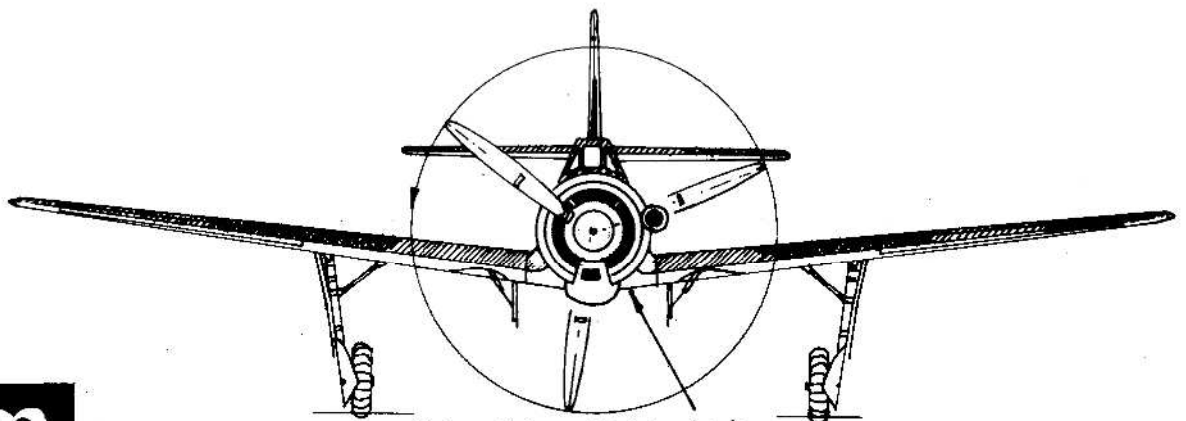
UNDERSIDE PLAN



Basic camouflage pattern



Underside of starboard wing tip



Note radiator and intake detail

Assembly

- (1) After ensuring all kit parts are a good 'dry' fit, and before cementing any parts together try all non-kit parts for fit and appearance in their correct positions.
- (2) Cement pilot's seat (l), to base piece (li), and paint. Also paint interior of cockpit in each fuselage half.
- (3) Carefully file out hole in front diaphragm (holding fuselage halves together), to make a close fit with spigot (d). Cement spigot to rear of spinner (a) and check that the fit is still close. Paint diaphragm in dark grey.
- (4) Cement fuselage halves, insert spigot (d) and press fuselage halves together. Check that the spinner is free to rotate. Fill and rub down joints.
- (5) Paint the front ring dark grey, cement and attach to front diaphragm, ensuring the spinner is still free to rotate. Run a filler of body putty around the ring and diaphragm joint, and when dry, sand to section.
- (6) Cement tongue into centre section. Paint interior portion within cockpit.
- (7) Cement halves of wings (for undercarriage down, cut out leg fairing and fit paper or plastic boxing, first); and tailplanes together. Fill and rub down joints.
- (8) File wing roots according to template (DETAIL A), cement and fit to centre-section.
- (9) Cement tailplanes to rear fuselage. Cement tailwheel assembly (p) to rear fuselage.
- (10) Attach wheel (e) to leg (f) and cement in position in wheel well. Paint leg and well.
- (11) Cement radius rod (fi) and affix, and cement leg fairings to leg. Fix doors (h) to underskin.
- (12) Cement control column (k), pilot's seat and rear diaphragm (h) and affix. Cement instrument panel (j) and fit. Cement head armour (m) to canopy. Complete painting of all cockpit interior parts.
- (13) Cement propeller blades (b) to spinner(a). Affix air intake (i) to cowling; radio mast (o) and pressure head (q). Cement canopy in position.
- (14) Check all joints and seams, fill and rub down, and prepare model for painting.

Special assembly notes

- Propeller - The blades can be cut from thin sheet plastic. Sand to an aerofoil section and taper thickness towards the tip. Twist on the pitch between the fingers. The spinner may be carved from hard balsa or alternatively be made from laminated plastic. Drill a hole in the rear of the spinner to take the spigot.
- Pilot's seat - This can be made from card and paper or plastic sheet. It is best made from three parts.