

## 1/32 SCALE Kaproni Bulgarski KB-11

## **ASSEMBLY INSTRUCTION**

Designed by Carlo Caligaris of Kaproni Bulgarski at Kazanlak, the KB-11 Fazan /Pheasant/ entered production ror the Vozdushni Vojski /Air Forces/ in 1942. Powered by Polish built Bristol Pegasus XX engine acquired from Germany, the KB-11 was servicing with the 1st Razuznavatelen Polk until the end of WWII. As part of the post WWII reparations to Yugoslavia, Bulgaria transferred 15 KB-11s which were subsequently used for liaison and target-towing tasks until 1958.

The proposed Kb-11 model is comparatively easy to be built but its high level of similarity to the real aircraft requires special attention and high precision during the assembly process.

Study carefully the illustrative drawings, cutouts and present instruction before starting the work on the model. Try to imagine the separate assembly phases and the purpose of each detail.

After the acquaintance with the model, you may start the assemblage. Follow the sequence given in the instruction. Cut the necessary details shortly before using them in order to avoid possible mistakes. Score all fold lines before cutting the details. The places of scoring are marked with small thin lines on the continuation of fold lines outside the parts.

Do not be in a hurry with gluing - carefully check and shape the details until obtaining the exact and correct fit. Before starting the work get hold of the necessary tools: scissors, sharp modeling knife, blunt knife for scoring the fold lines, prickle, ruler, nippers and grinding paper. Additional materials necessary for the assemblage are: sheet of cardboard with thickness approximately 0.5 mm, a piece of wire with diameter 0.5 - 0.8 mm. Supply with proper glue. BISON Clear Adhesive, UHU or similar are recommended as the most appropriate ones. Water based glue is not recommended. Preparation for assembling includes gluing pages 6 and 7 that contains formers and strengthening elements on a cardboard.

Start With the fuselage sections. Due to the interior details, they are designed to be assembled separately, with formers both on their front and back sides, and to be glued former to former to wach other.

Assembly the pilot's cockpit segment 1 as it is shown on the view A of the instruction drawings. Shape carefully the part a to its approximate shape, then glue on it the connecting stripes 1a, 1b, then carefully glue to it's is inside areas the transparent windows 1t and the interior parts 1i. Leave 1 mm distance between the part 1 edges and the interior parts so that the formers can be positioned there without overlapping the interior. Then glue the instrument board 1c, 1i and front and back formers. The formers should be flat and the lines of symmetry should be strictly kept. Now insert the floor 1i3, flight controls 3, 4 and the pilots seat 2, 2a together with belts 2b. Glue also the gun sight 5,5t.

Continue with the next segments 6 and 7 in a same way as it is shown on views B and C.

Prepare the tail and nose segments by classic way, using connecting stripes, following views D and E.

Assembly the engine /View F/. Don't forget to make holes in the centers of formers, where the propeller's shaft will go thought. Then add the engine cowling, following view G. Its front part also uses connecting stripes. The rear former of the 42 is the engine subassembly F.

Now is propellers turn. Its assemblage is classic as you can see in view H. Be sure to position the propellers blades at the 120 degree to each other with constant step. The blades bases and external ends should lay on a flat plain, or in other words, their axes should be perpendicular to the central propeller axe.

Insert the propeller H to the engine subassembly G and fix it in horizontal direction by 53c, gluing it to the propellers shaft, but NOT to G. Thus, the propeller can rotate freely.

Continue with the wing's halves. Probably it is the most tricky and critical phase of the model's assemblage. The wing has an elliptic shape that can't be unfold to a flat cutout without elastic deformations. To achieve good results, you'll have to make some cuts on the leading and tail edges of the wings parts 21, 21b, 22 and 22b.

The recommended sequence of the wing assemblage is as follows:

First assemble the skeletons of the wing's halves.

Then carefully shape the down and upper parts of the wing. When you convinced yourself that lower parts 21 and 22 has complanar edges, glue on them connecting stripes 21a, 22a. Continue to form the parts until during the glue.

Add the preliminary prepared lights 19, 19t and 20,20t to the bottom wing halves and glue the skeleton on them.

After final dry check glue the upper parts on the subassemblies and shape the wing halves edges until complete drying the glue.

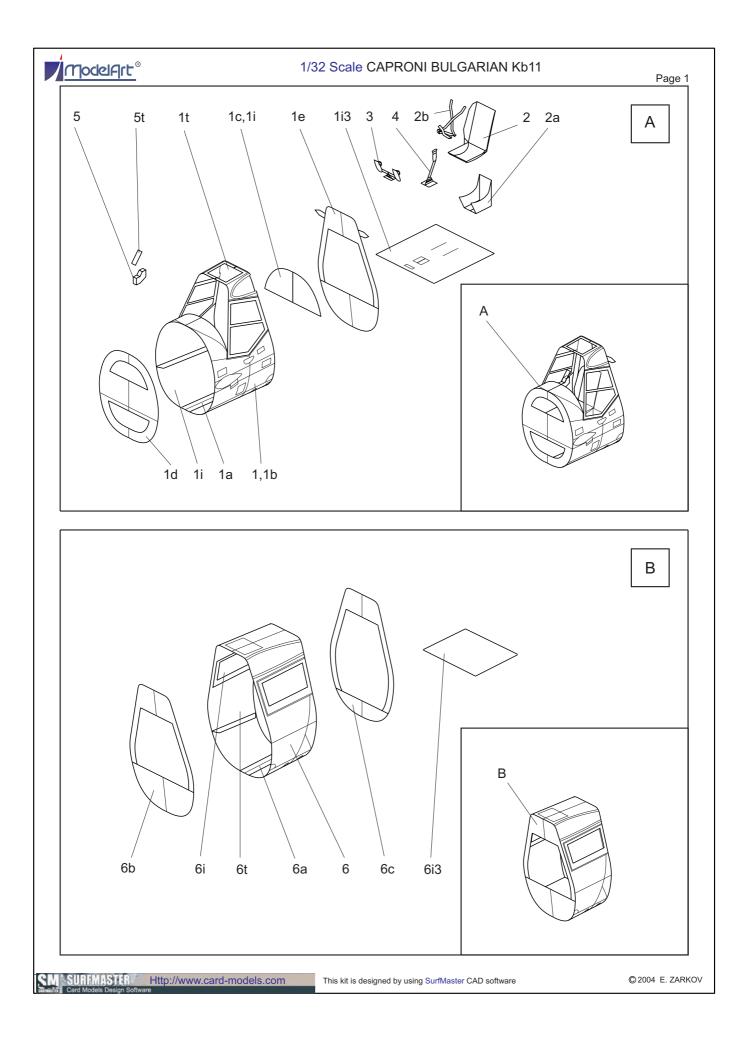
When the wing is ready, continue wit the other subassemblies – undercarriage /view K/, tail machine gun /view L/, cockpit front glassing, under-wings supports, wing to fuselage cowlings, tail stabilizers tail wheel, air intake and exhaust pipe, nose guns, bomb armament and everything else that is shown on the view M.

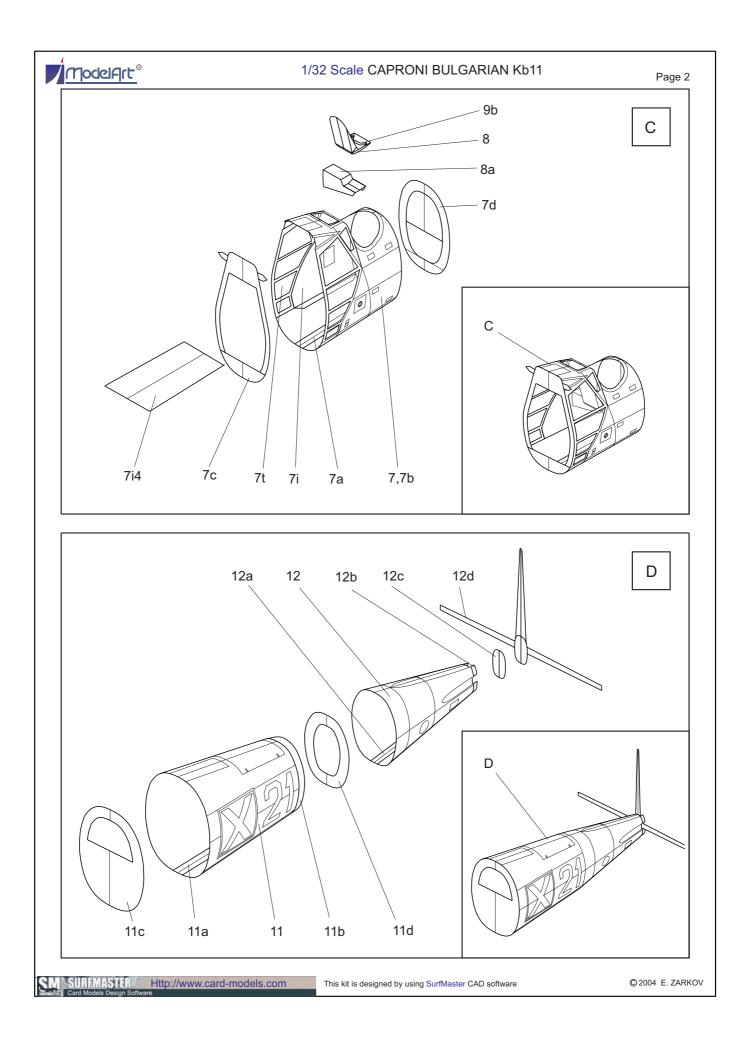
At this stage the all subassemblies, putted in some box are looking very interesting. Enjoy your work to put them together...

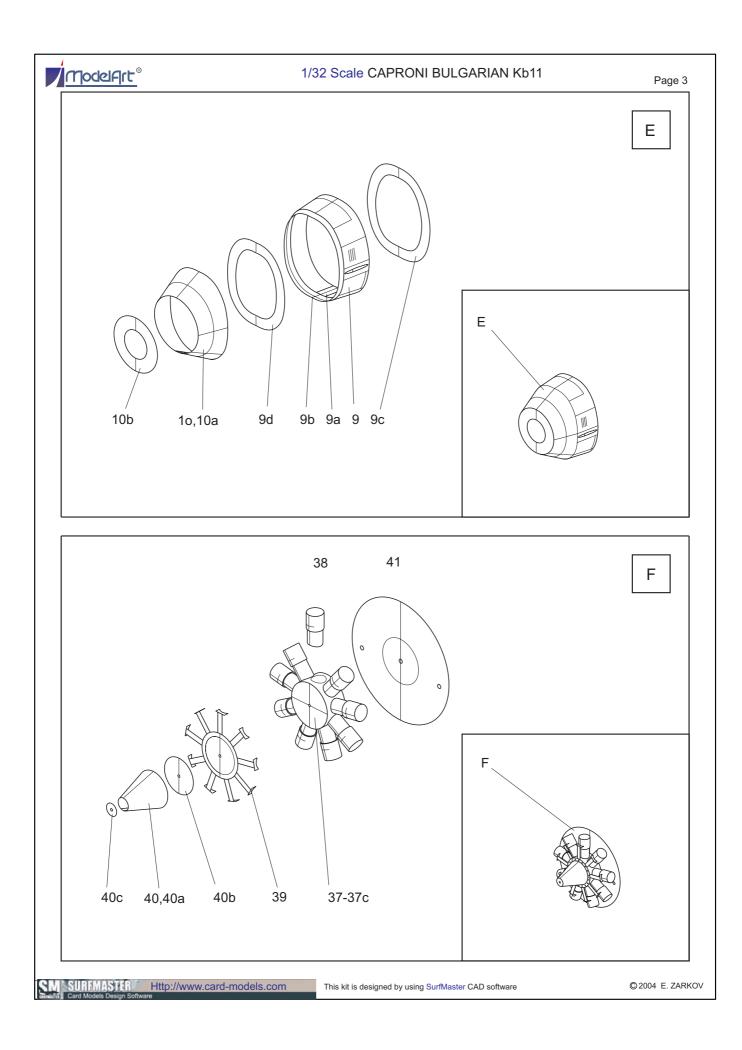
Finish the kit by adding the control surfaces' weight balances, steps' supports and the Pitot tube.

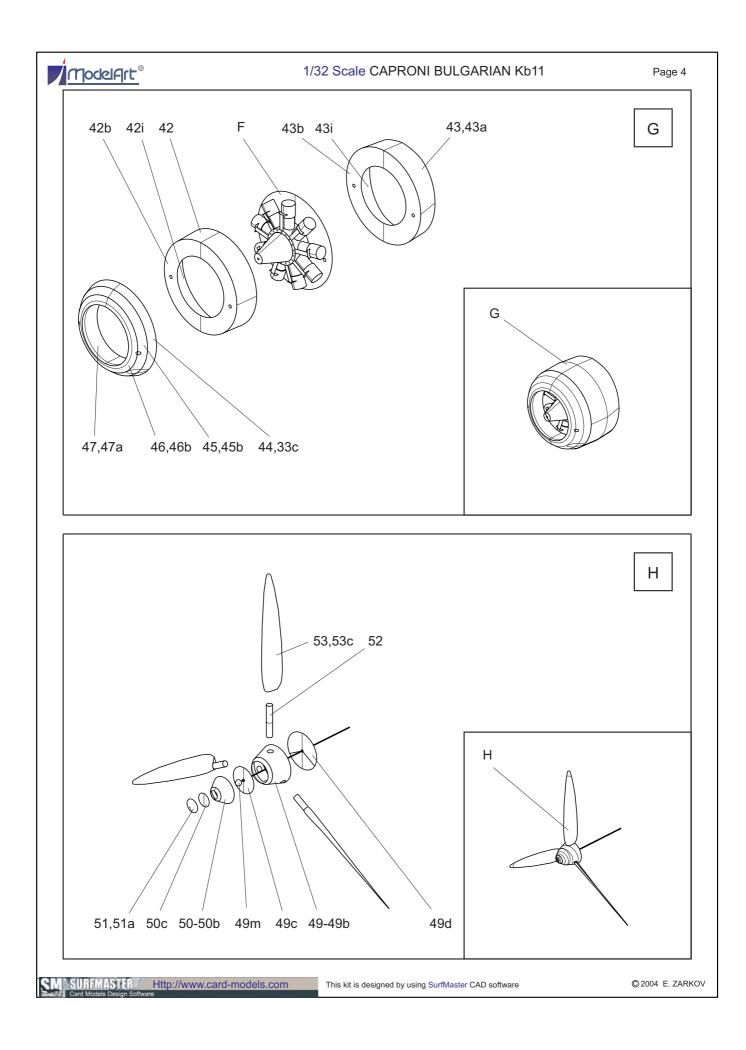
Now your model is ready.

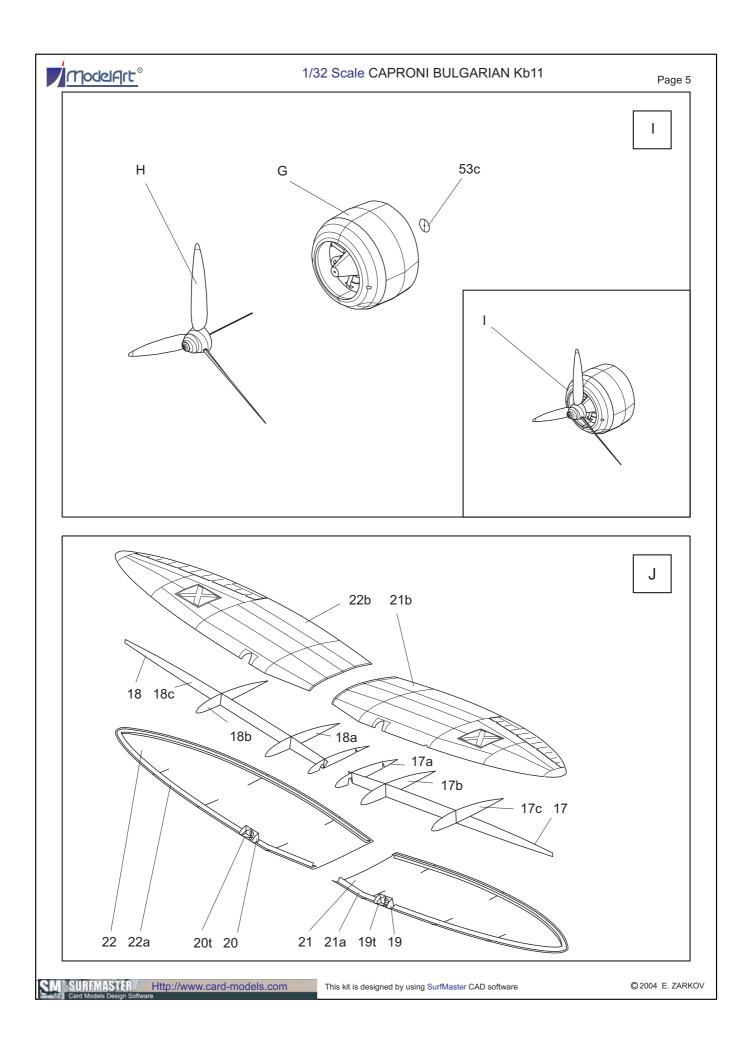
Enjoy!

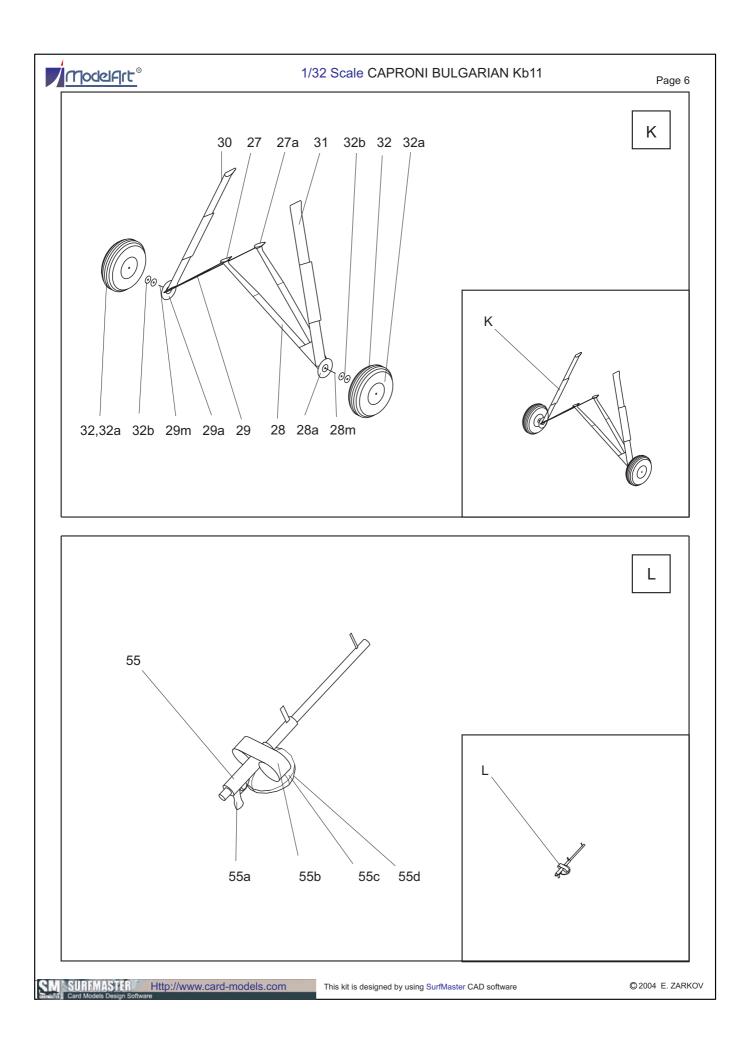


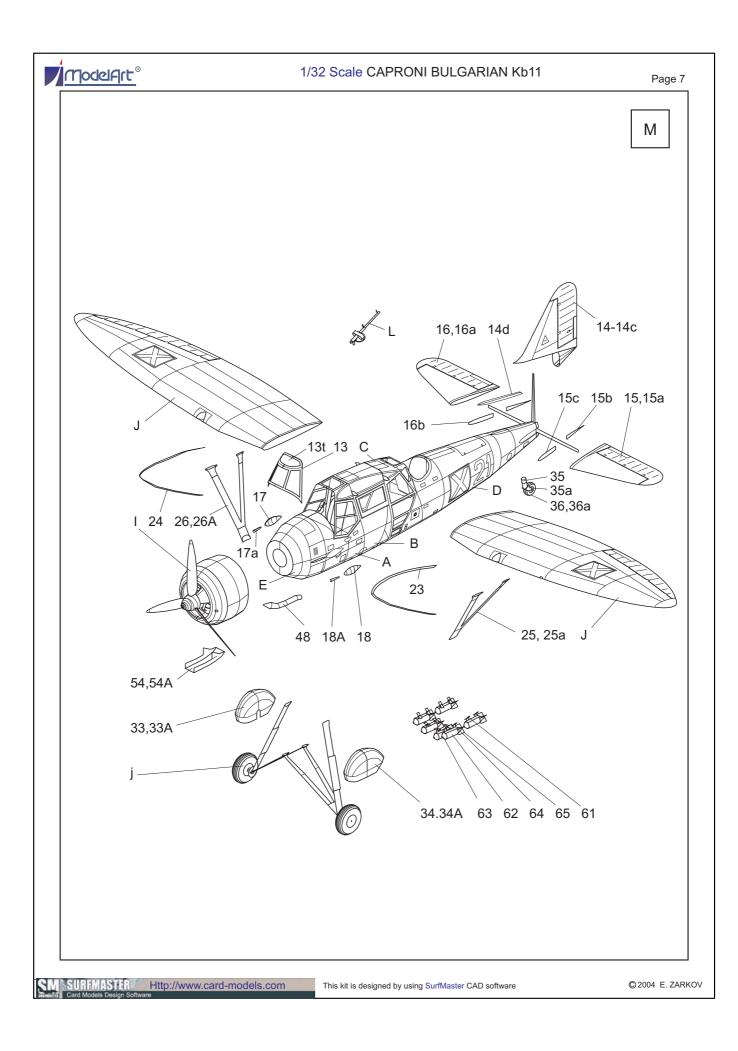


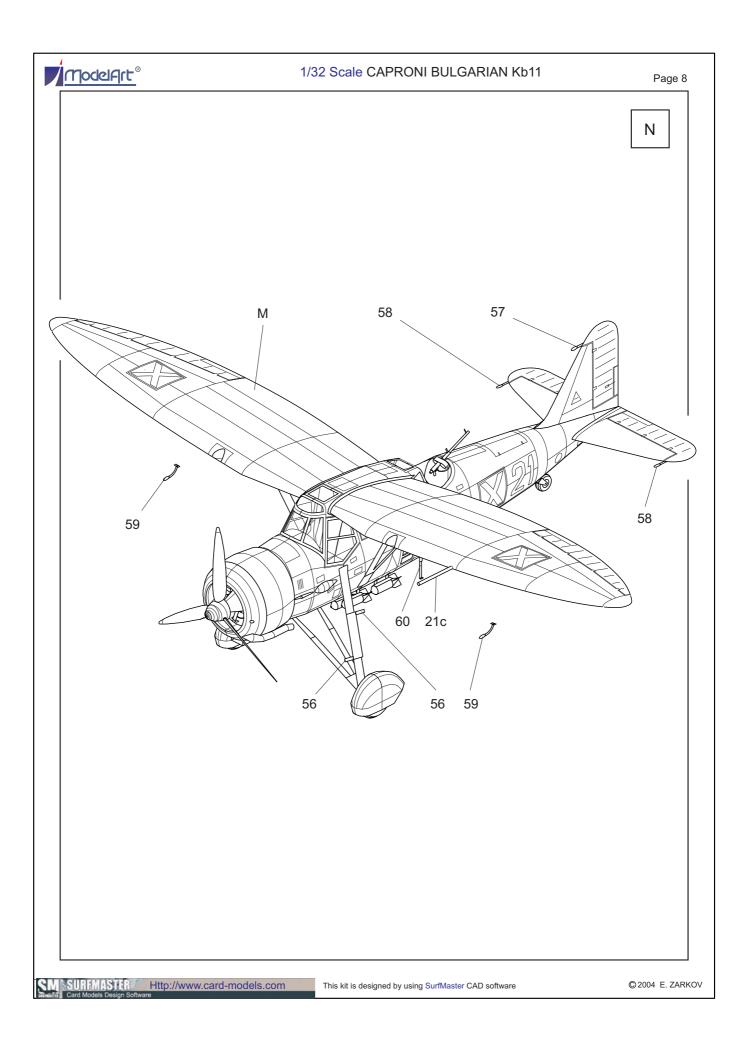


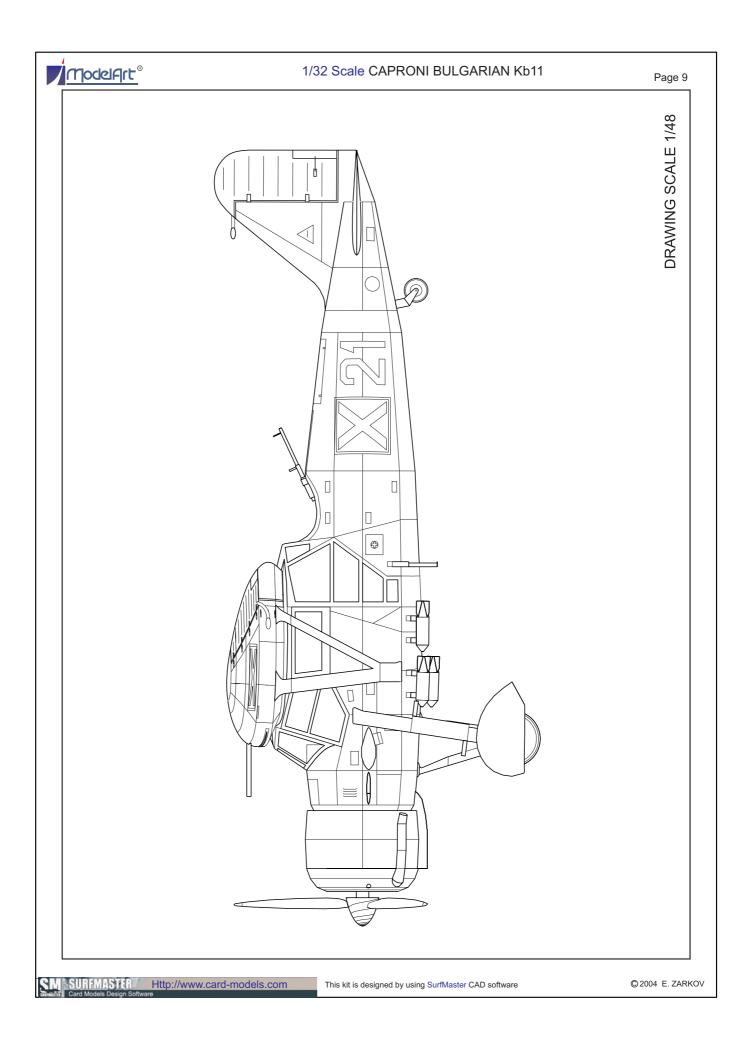


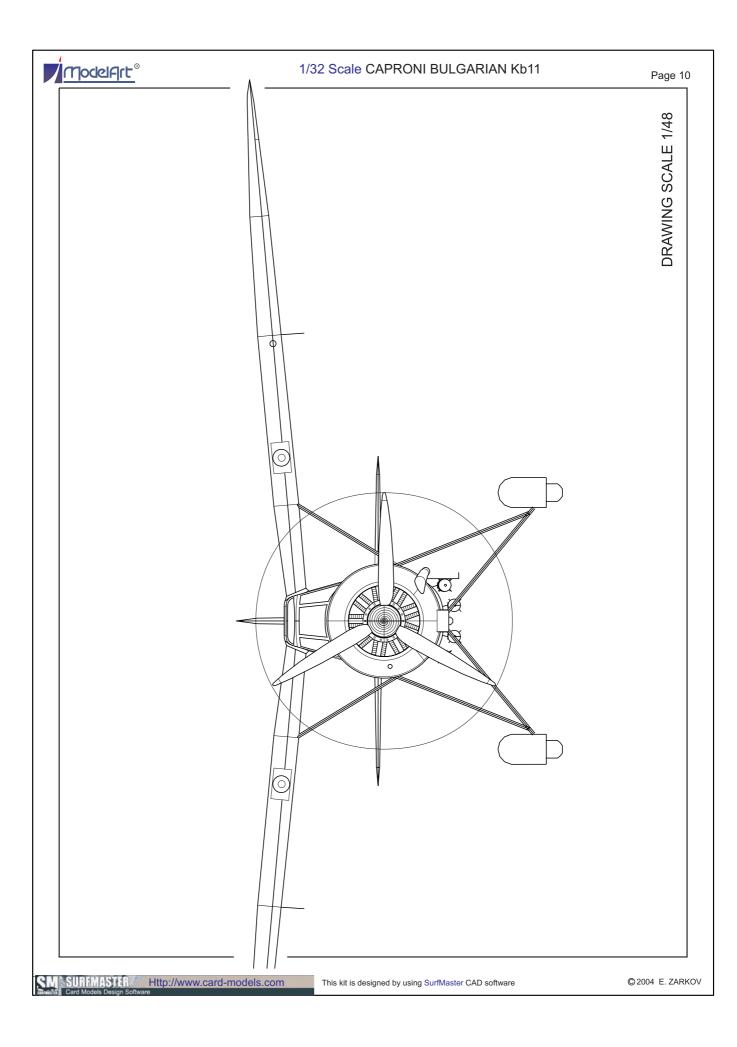


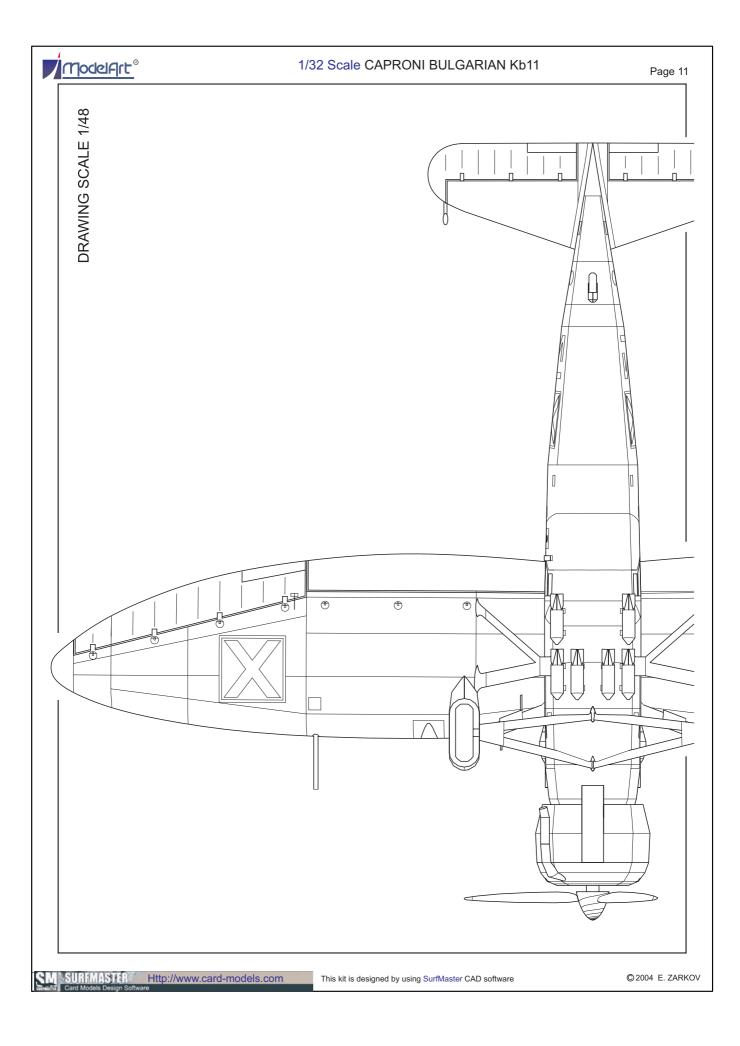


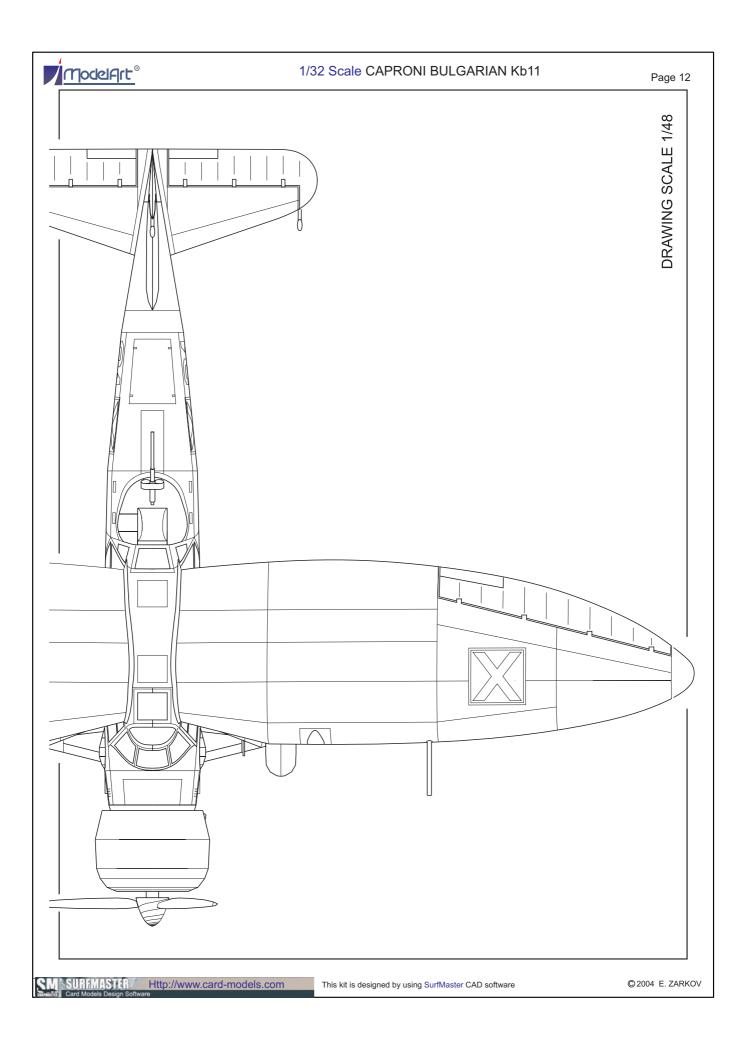


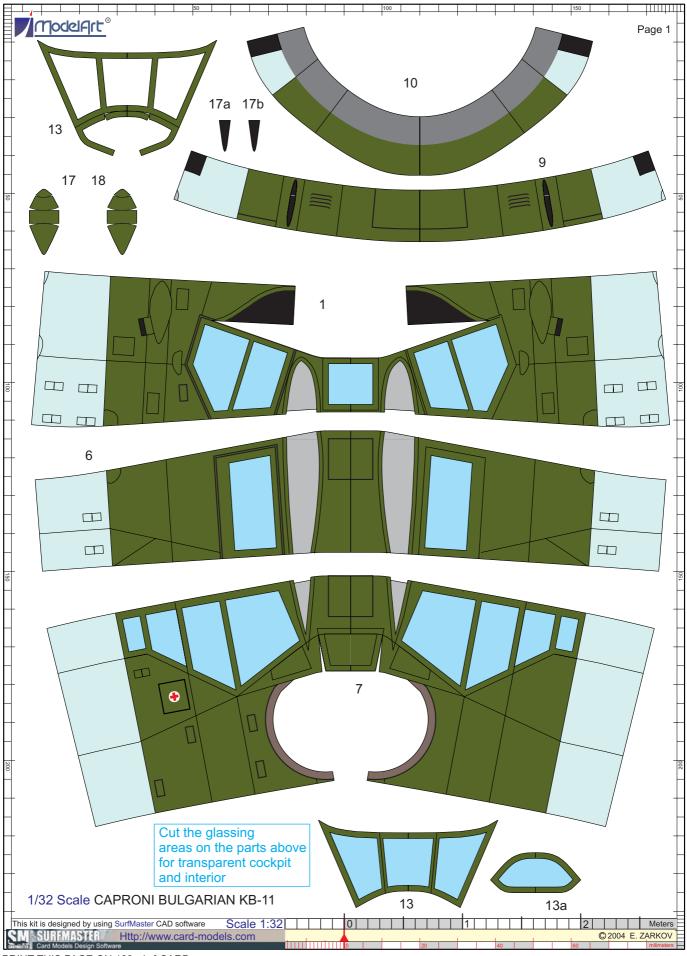




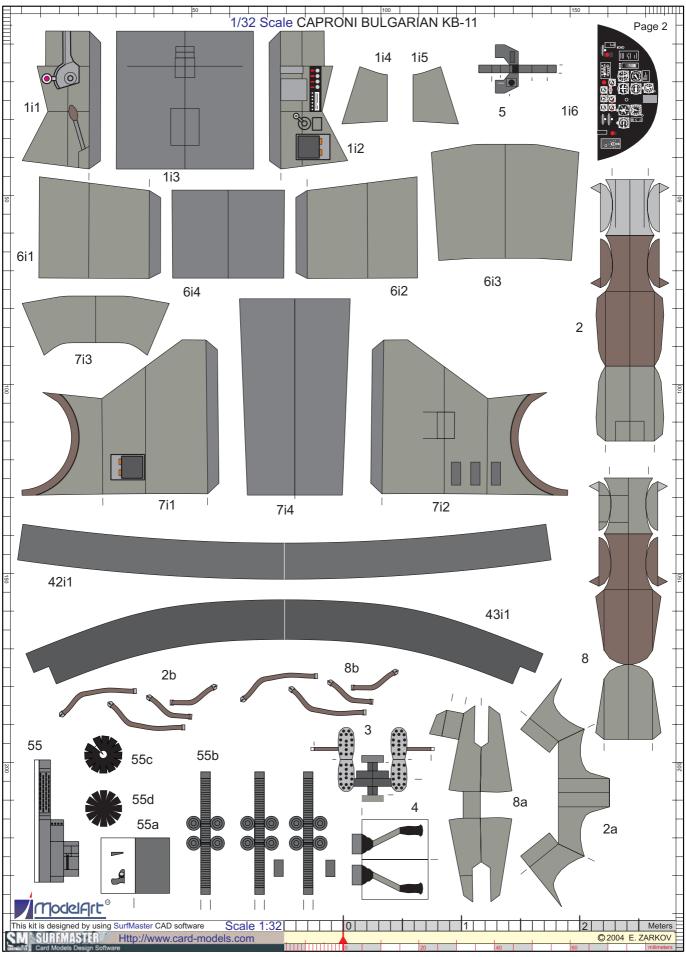




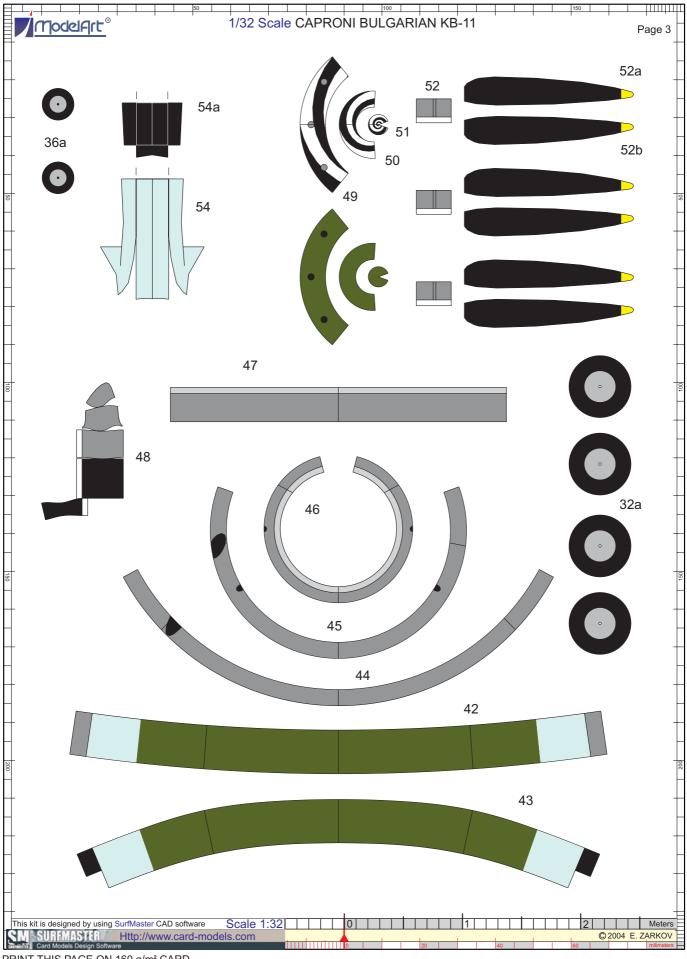




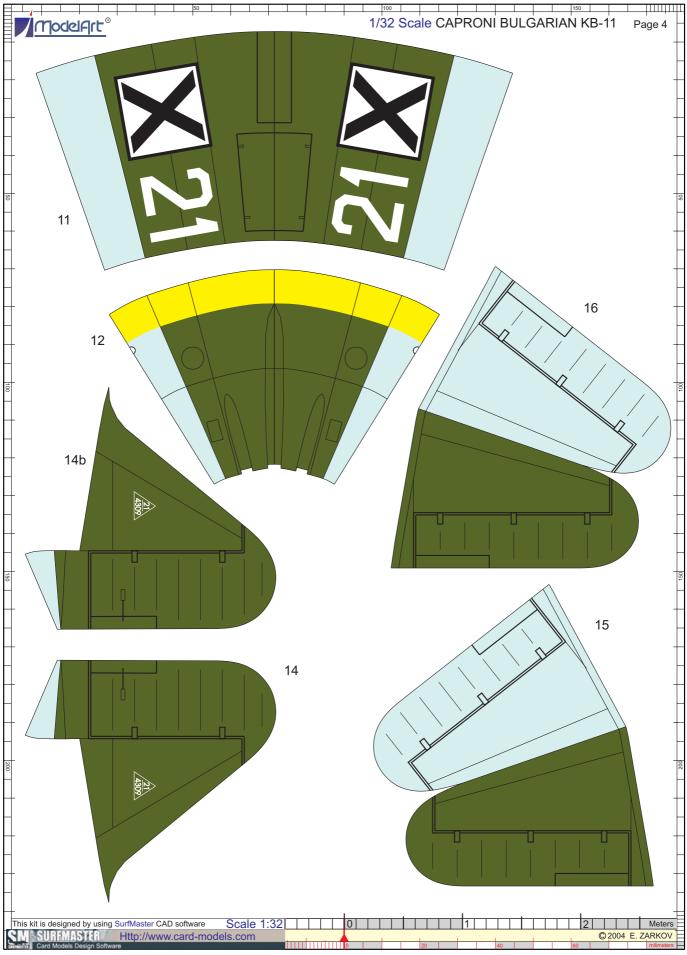
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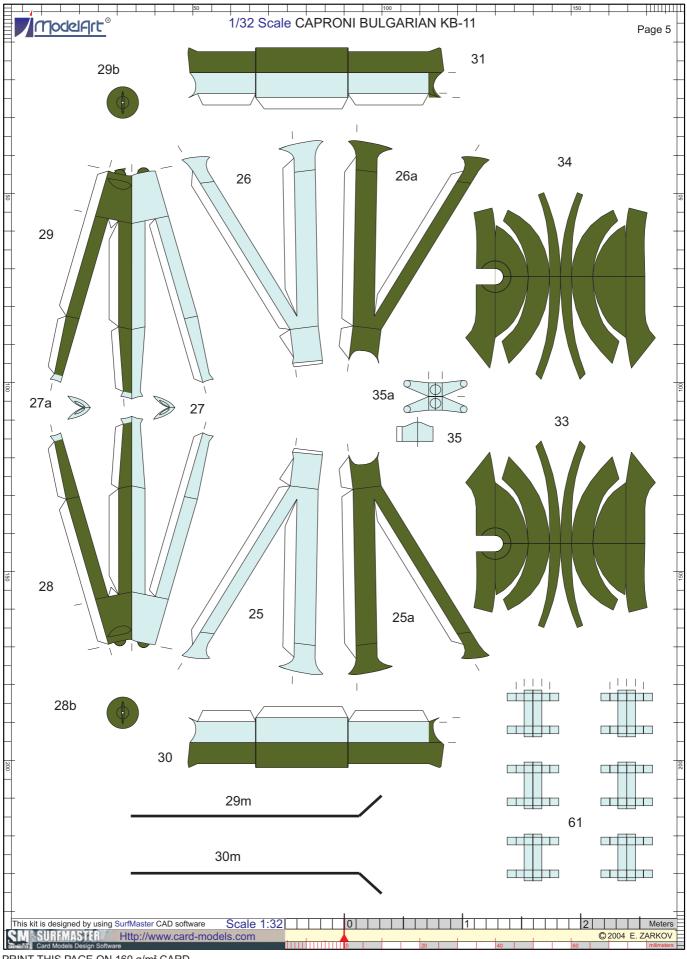
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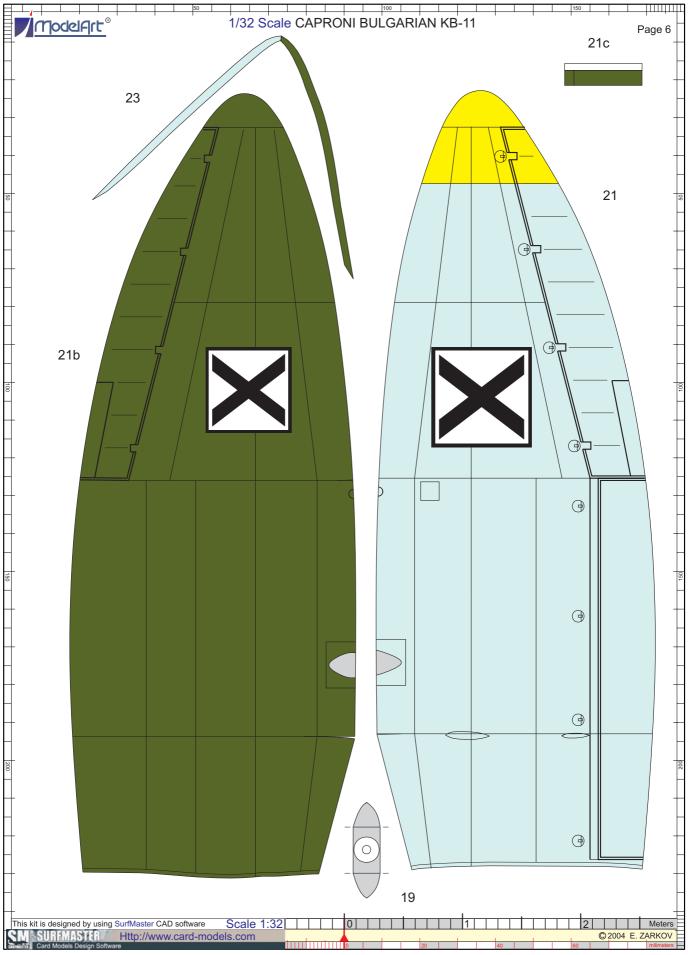
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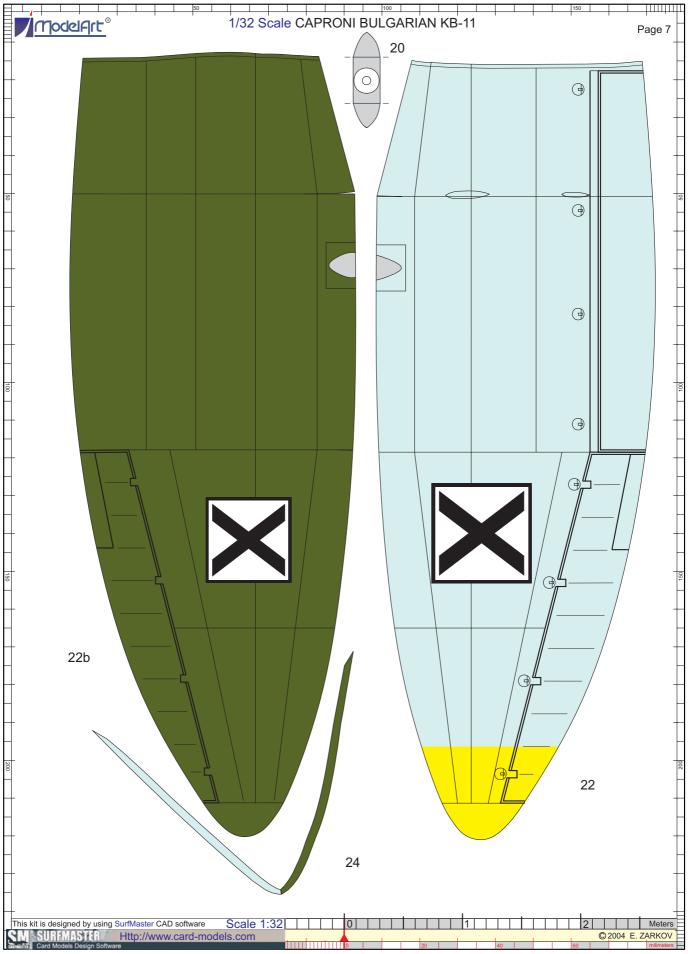
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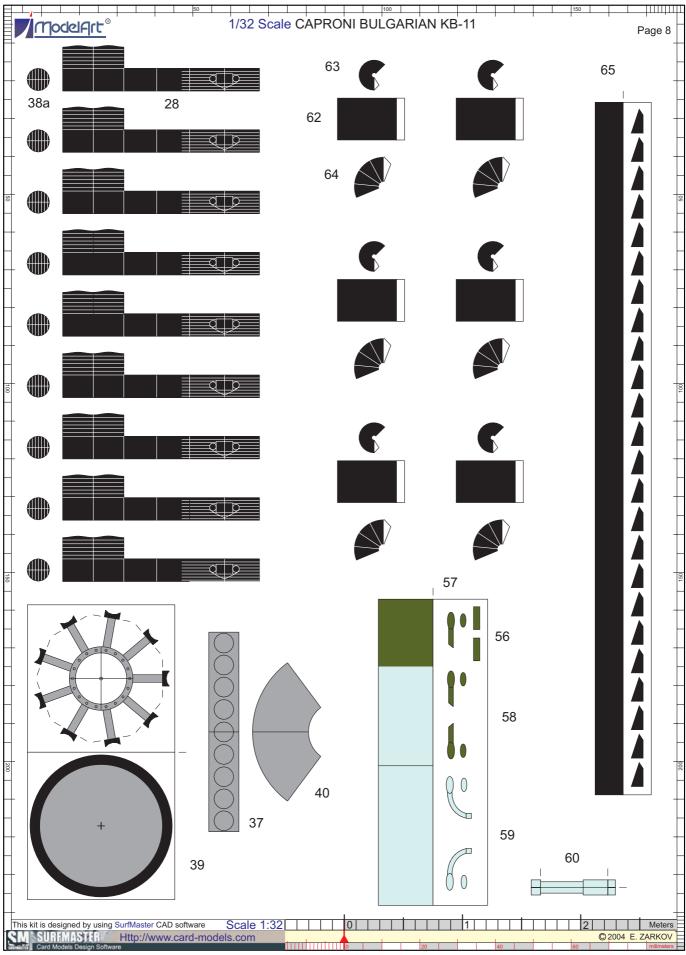
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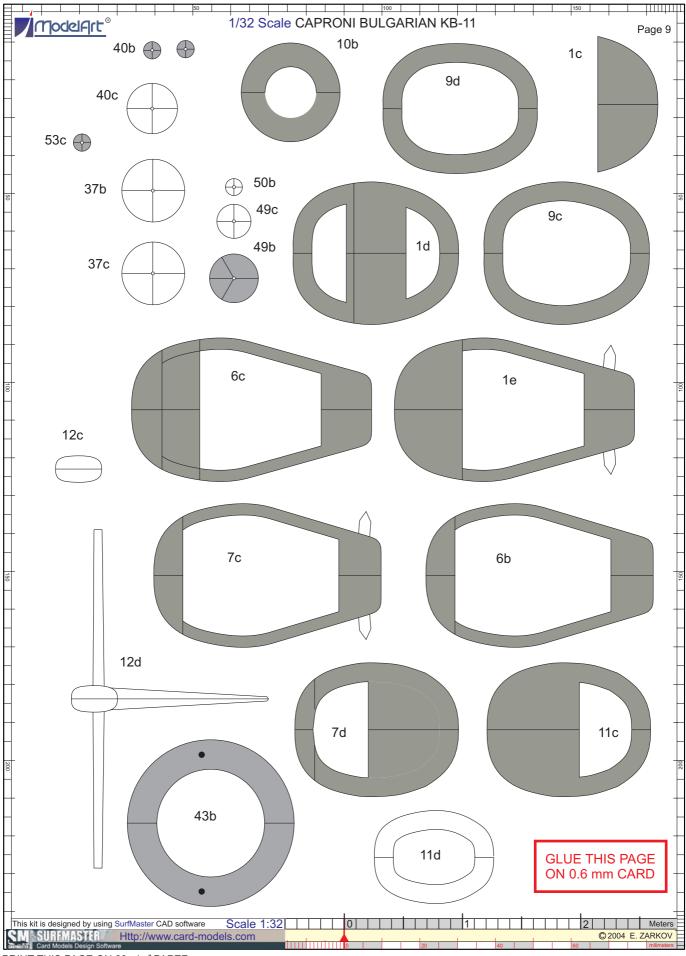
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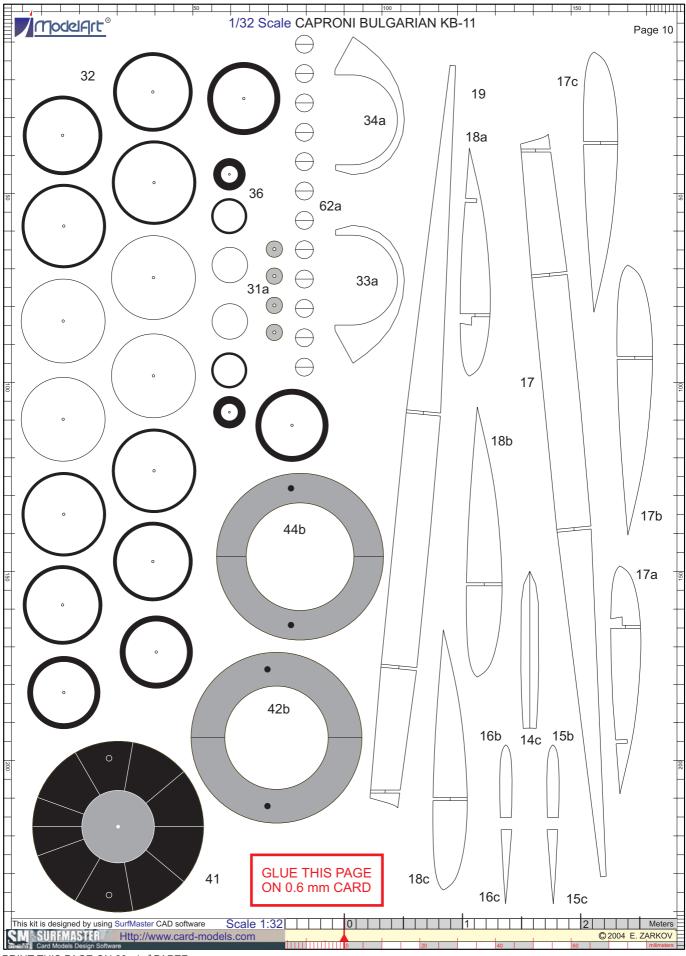
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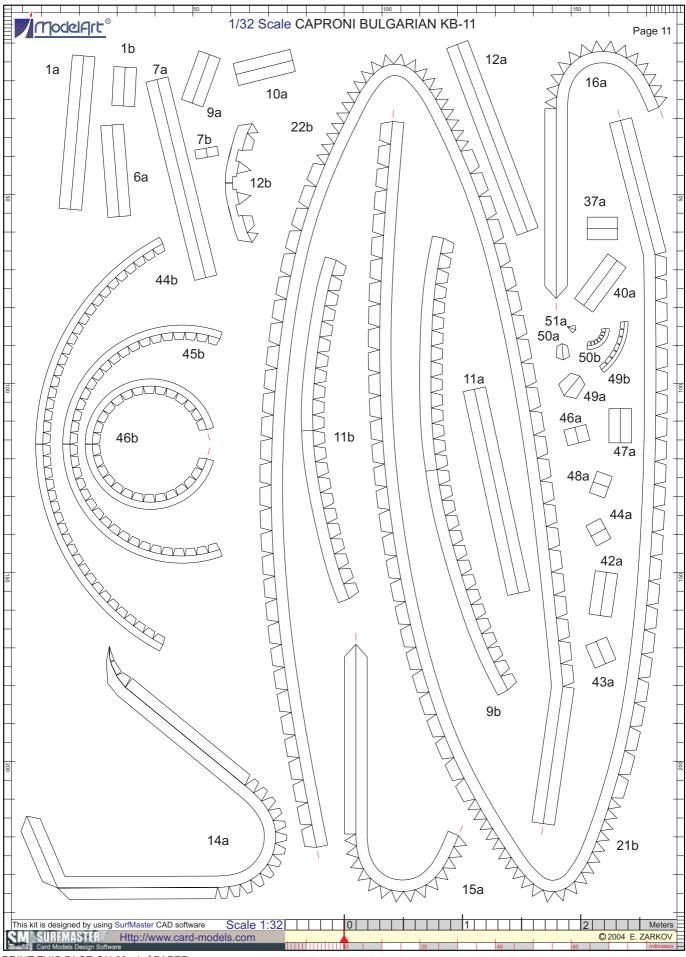
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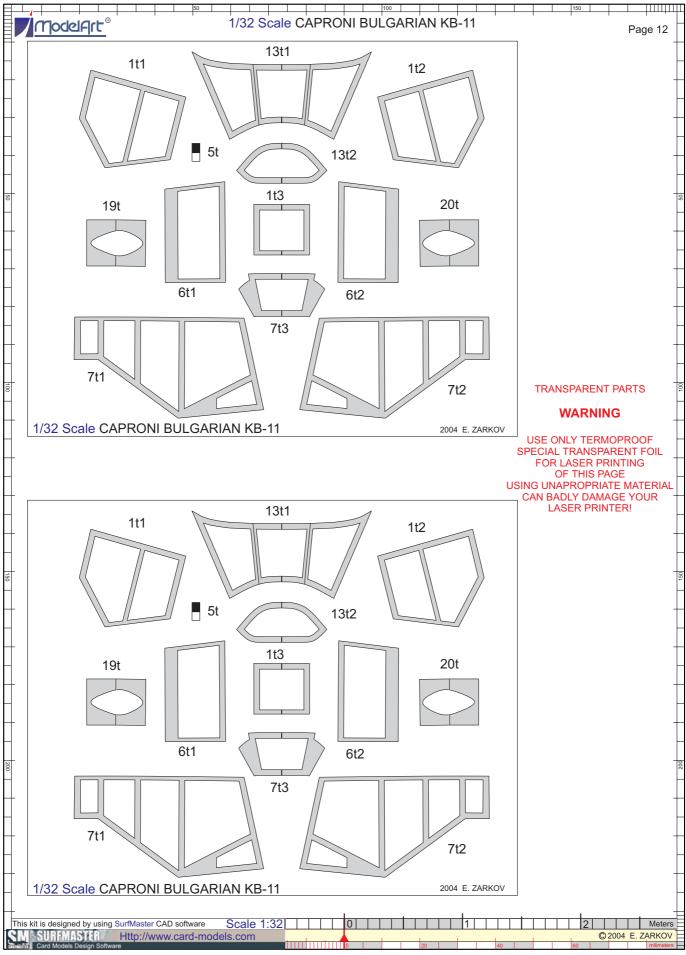
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