

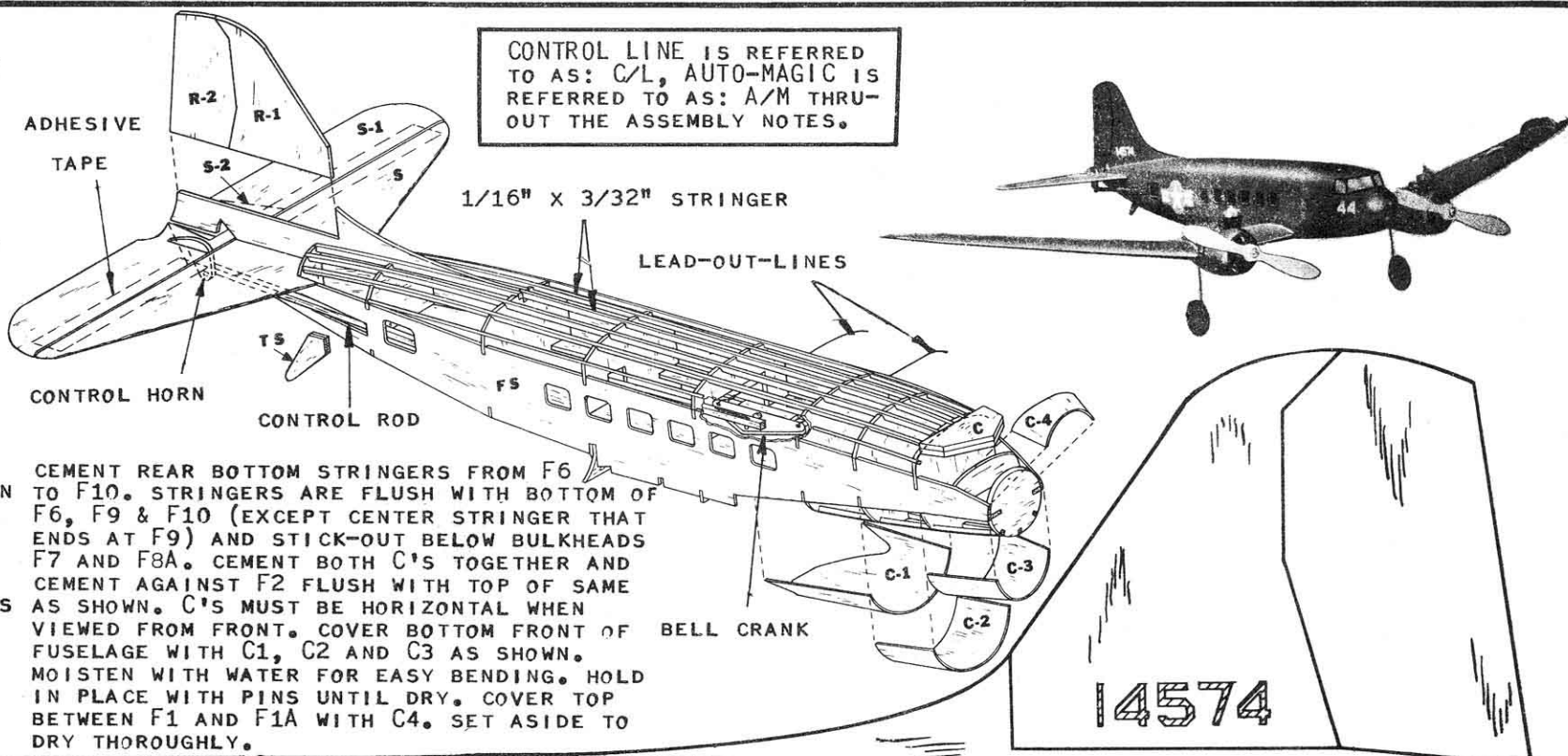
STEP 1

CEMENT REAR OF D'S TOGETHER. CEMENT F6A TO F6 SO THAT TOP IS FLUSH WITH LOWER SIDE NOTCH. SLIP BULKHEADS INTO NOTCHES BETWEEN D'S FROM F1 TO F8. DO NOT CEMENT BULKHEADS TO D'S UNTIL SIDES ARE INSTALLED IN STEP 2. ADD F9 TO REAR OF D'S. CEMENT R FROM CENTER NOTCH IN TOP OF F7 THROUGH NOTCH IN F8, DOWN ON D'S. FOR CONTROL LINE OR AUTO-MAGIC (SEE NOTE) FLYING CEMENT CP TO TOP OF CP1, GRAIN OPPOSITE. DRILL HOLE FOR 2-56 BOLT (SEE CONTROL LINE NOTE) AND CEMENT BETWEEN D'S AGAINST F5.

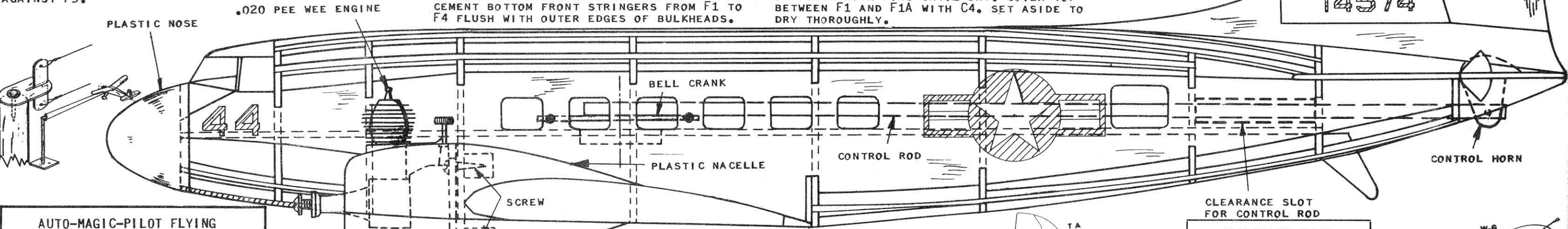
STEP 2

PIN FS'S TO BOTH SIDES OF FUSELAGE. CEMENT JOINTS AFTER SIDES ARE IN PLACE. TO BEND EASILY, MOISTEN WITH WATER. CEMENT TS'S TOGETHER AND INSTALL INTO NOTCH BETWEEN R AND F9. SAND SMOOTH R & R1 AND S & S1 ROUNDING OUTER EDGES. FOR C/L OR A/M FLYING, CEMENT GUSSET S2 TO BOTTOM OF S1. WHEN DRY ROUND EDGES OF S2. DRILL SMALL HOLES THROUGH PUNCH MARKS IN PLYWOOD BELL-CRANK AND CONTROL-HORN. CEMENT HORN INTO NOTCH IN S1. ASSEMBLE S TO S1 WITH ADHESIVE TAPE AS SHOWN, LEAVING 1/16" SPACE BETWEEN UNITS. CEMENT ASSEMBLY INTO SLOT IN R AGAINST F9, RESTING ON F10. CUT OUT SLOT IN RIGHT REAR SIDE FOR CONTROL ROD. MAKE AND INSTALL CONTROL SYSTEM (SEE NOTE). CEMENT R2 TO R1 (ANGLED) 1/2" TOWARDS RIGHT. CEMENT TO TOP OF R. SELECT 1/16" X 3/32" STRIPS FROM STRIP-SHEET AND CEMENT INTO NOTCHES FROM F2 TO F9. MOISTEN STRINGERS WITH WATER TO MAKE BENDING EASIER. CENTER STRINGER STOPS AT F7. TRIM STRINGERS FLUSH WITH FRONT OF F2. CEMENT STRINGERS INTO NOTCHES ON EACH SIDE OF R FROM BULKHEAD F7 TO F9. NOTE THAT STRINGERS ARE FLUSH WITH TOP OF BULKHEAD F2 & F9 BUT STICK-OUT ON ALL OTHER BULKHEADS. LOWER SIDE STRINGER CONTINUES PAST F7 AND IS CEMENTED FLUSH WITH OUTER EDGE OF F8. CEMENT BOTTOM FRONT STRINGERS FROM F1 TO F4 FLUSH WITH OUTER EDGES OF BULKHEADS.

CONTROL LINE IS REFERRED TO AS: C/L, AUTO-MAGIC IS REFERRED TO AS: A/M THROUGHOUT THE ASSEMBLY NOTES.



CEMENT REAR BOTTOM STRINGERS FROM F6 TO F10. STRINGERS ARE FLUSH WITH BOTTOM OF F6, F9 & F10 (EXCEPT CENTER STRINGER THAT ENDS AT F9) AND STICK-OUT BELOW BULKHEADS F7 AND F8A. CEMENT BOTH C'S TOGETHER AND CEMENT AGAINST F2 FLUSH WITH TOP OF SAME AS SHOWN. C'S MUST BE HORIZONTAL WHEN VIEWED FROM FRONT. COVER BOTTOM FRONT OF FUSELAGE WITH C1, C2 AND C3 AS SHOWN. MOISTEN WITH WATER FOR EASY BENDING. HOLD IN PLACE WITH PINS UNTIL DRY. COVER TOP BETWEEN F1 AND F1A WITH C4. SET ASIDE TO DRY THOROUGHLY.



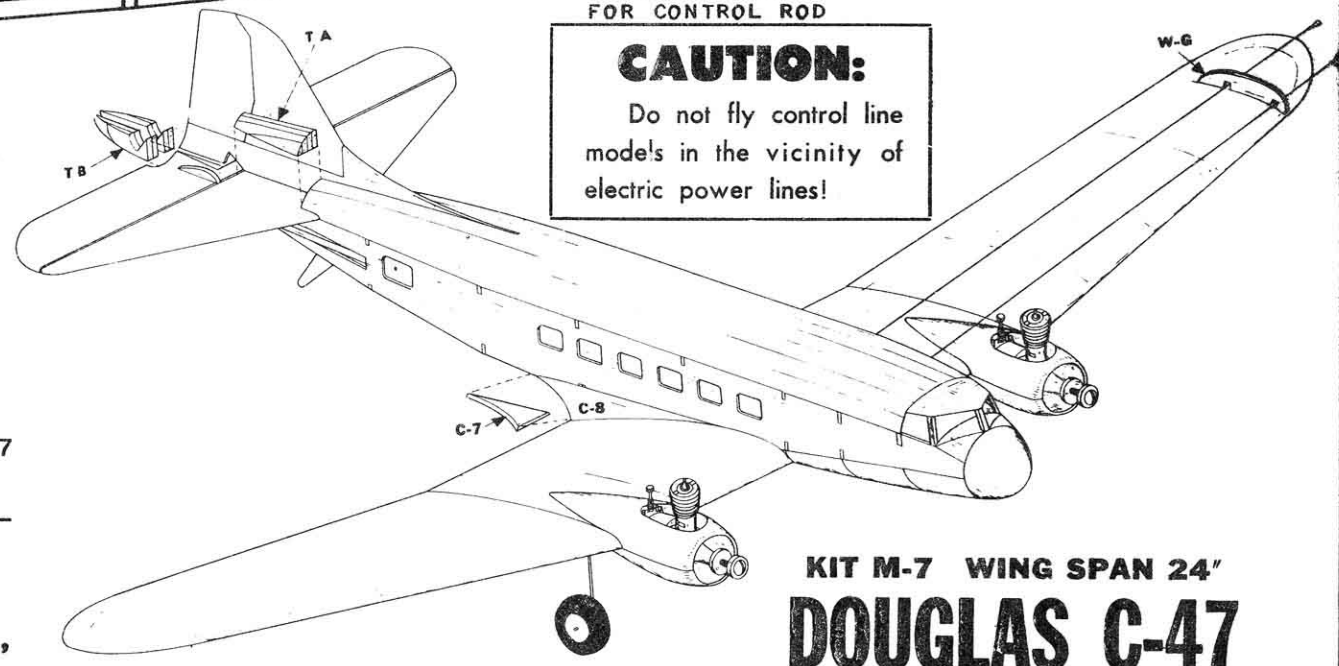
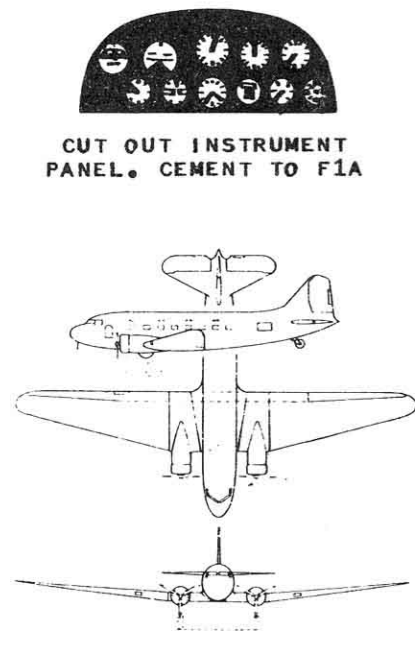
FINAL ASSEMBLY

TRIM C TO CURVE OF F2. CEMENT TWO EACH TB'S TO EITHER SIDE OF REAR OF FUSELAGE AGAINST F10. WHEN DRY, TRIM TO CURVE OF F10 AND TAPER SMOOTHLY TO POINT AT REAR AS SHOWN. CEMENT TWO ASSEMBLIES OF FOUR TA'S TOGETHER. WHEN DRY, TRIM TO SHAPE OF F9 TAPERING TO FOLLOW TOP VIEW CURVE OF FUSELAGE. SAND FUSELAGE STRUCTURE SMOOTH. COVER WITH TISSUE WHICH HAS BEEN DAMPENED WITH WATER. GIVE ENTIRE STRUCTURE TWO COATS OF CLEAR DOPE. INSTALL FINISHED WING BY CEMENTING FUSELAGE BETWEEN CENTER WING RIBS. WING MUST BE PRESSED UP FIRMLY SO THAT TRAILING EDGE RESTS AGAINST F6A AND IS FLUSH WITH BOTTOM OF F6. SPARS REST AGAINST TOP OF NOTCHES IN FUSELAGE SIDES. USE TWO COATS OF CEMENT AND ALLOW TO DRY THOROUGHLY. MOISTEN C8'S TO BEND EASILY AND CEMENT BETWEEN REAR OF WING AND FUSELAGE AS SHOWN. C7'S ARE CEMENTED TO REAR OF TRAILING EDGE DIRECTLY UNDER C8'S. CEMENT THE WG'S TOGETHER, ROUND OUTER EDGES, THEN INSTALL ON TOP OF W6 AS SHOWN USING TWO COATS OF CEMENT. CEMENT LENGTH OF 1/16" SQ. BETWEEN FUSELAGE AND BOTTOM OF C TO FORM WINDSHIELD STRUCTURE AS SHOWN. USING TINY WOOD SCREWS, SECURE ENGINE TO MOTOR MOUNT.

FINAL ASSEMBLY CONTINUED

CUT MOLDED ENGINE NACELLE HALVES AND NOSE FROM PLASTIC SHEET. TRIM TOP OF NACELLE FOR ENGINE CLEARANCE AS INDICATED. CUT OUT HOLE FOR LANDING GEAR IN BOTTOM NACELLE. CHECK NACELLES FOR FIT, TRIMMING WHERE NECESSARY AND THEN CEMENT IN PLACE AS SHOWN. USE CEMENT SPARINGLY. CEMENT PLASTIC NOSE TO FRONT OF FUSELAGE. PLASTIC MAY BE TRIMMED SMOOTH WITH SAND PAPER, WHEN DRY, SEAM IN CENTER OF NACELLE IS SANDED SMOOTH. ALL WOOD OR PAPER SURFACES SHOULD HAVE TWO COATS OF CLEAR DOPE BEFORE MODEL IS PAINTED. IT IS UNNECESSARY TO CLEAR DOPE PLASTIC PARTS. COLOR SCHEME OF C-47 IS OPTIONAL. C-47'S WERE PAINTED OLIVE DRAB; CAMOFLAGED, BOTTOM BEING LIGHT BLUE; LIGHT GREY FOR NAVY. CIVILIAN VERSIONS (DC-3) STILL BEING FLOWN IN AIRLINES THE WORLD OVER ARE PAINTED SILVER WITH INDIVIDUAL AIRLINE MARKINGS. ON MILITARY VERSION APPLY DECALS WHERE INDICATED. OUTLINE SCALEAILERONS, RUDDER, ETC., DOORS, WINDOWS, NACELLE FLAPS, ETC. WITH INDIA INK OR THIN STRIPS OF BLACK SCOTCH TAPE. WHEELS ARE RETAINED ON AXLES WITH DROP OF SOLDER. BE CERTAIN WHEELS SPIN FREELY. CUT CELLULOID TO SIZE AND CEMENT TO BOTH SIDES OF CABIN, AND FRONT WINDSHIELD. SEE NOTE FOR AUTO-MAGIC PILOT FLYING. GOOD LUCK!!! GOOD FLYING!!!

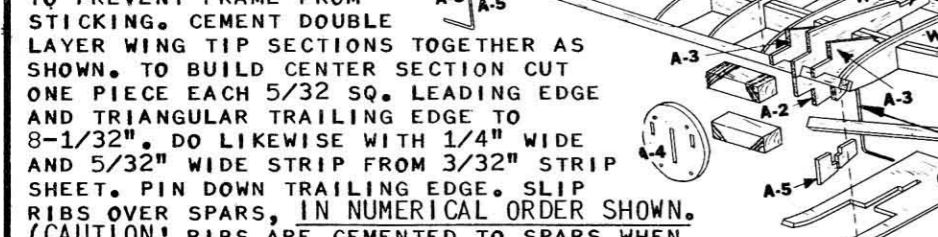
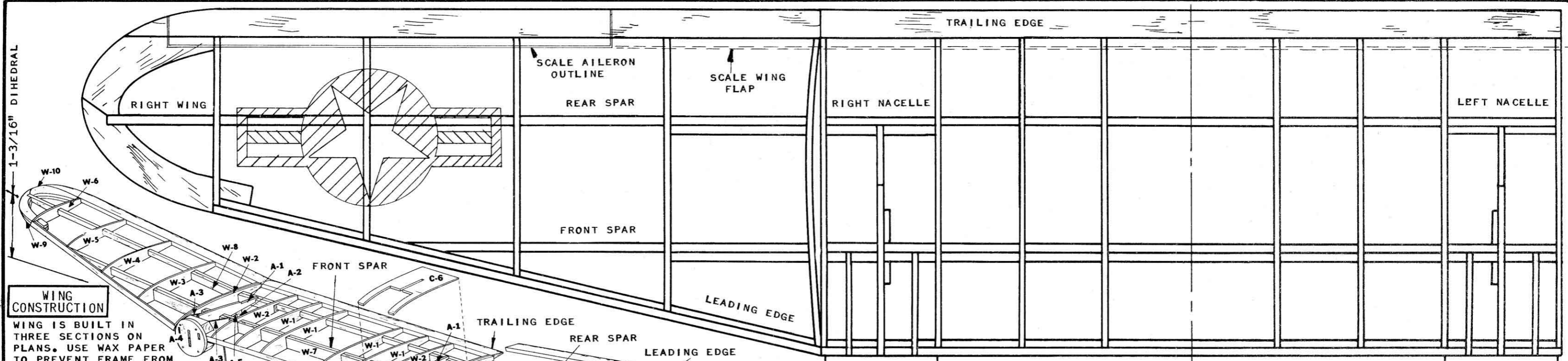
CAUTION:
Do not fly control line models in the vicinity of electric power lines!



KIT M-7 WING SPAN 24'
DOUGLAS C-47

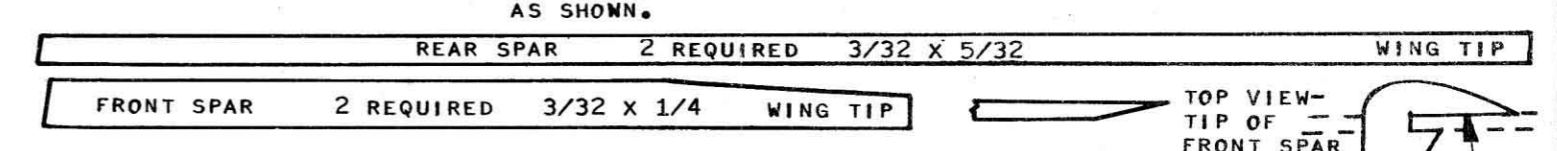
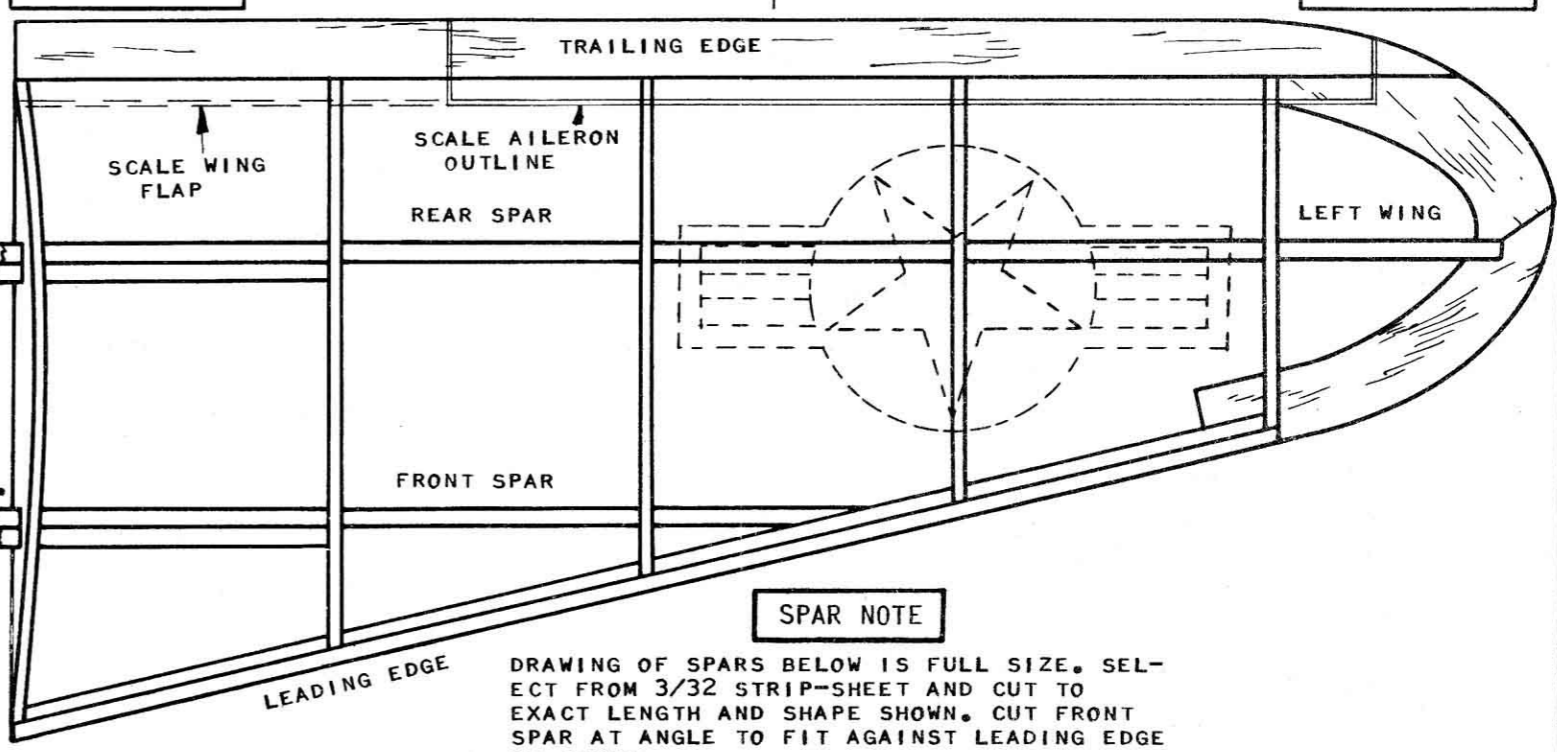
Sterling models
Phila. Pa., U.S.A.

*.020 Engine Only Recommended for Control Line or "Auto-Magic" Pilot



WING CONSTRUCTION
 WING IS BUILT IN THREE SECTIONS ON PLANS. USE WAX PAPER TO PREVENT FRAME FROM STICKING. CEMENT DOUBLE LAYER WING TIP SECTIONS TOGETHER AS SHOWN. TO BUILD CENTER SECTION CUT ONE PIECE EACH 5/32 SQ. LEADING EDGE AND TRIANGULAR TRAILING EDGE TO 8-1/32". DO LIKEWISE WITH 1/4" WIDE AND 5/32" WIDE STRIP FROM 3/32" STRIP SHEET. PIN DOWN TRAILING EDGE. SLIP RIBS OVER SPARS, IN NUMERICAL ORDER SHOWN. (CAUTION: RIBS ARE CEMENTED TO SPARS WHEN FRAME IS COMPLETED) CEMENT RIBS TO TRAILING EDGE. ALL RIBS ARE VERTICAL. ALLOW TO DRY THOROUGHLY. PREPARE TWO EACH SPARS FOR OUTER (TIP) SECTIONS. (SEE NOTE). CONSTRUCT THE OUTER SECTIONS IN THE SAME MANNER AS CENTER SECTION. LEADING EDGE ENDS FLUSH WITH W6. END RIB W2 IS BENT OVER ON ANGLE MATCHING ANGLE ON END OF SPARS, OTHER RIBS ARE VERTICAL. CEMENT WING TIP SECTIONS TOGETHER AND IN PLACE, RAISING TIP FLUSH WITH TOP OF SPAR. WHEN DRY, REMOVE FROM PLAN AND SAND WING TIPS ROUND TO BLEND SMOOTHLY INTO LEADING AND TRAILING EDGE. LEADING & TRAILING EDGES AND SPARS ARE TRIMMED FLUSH AT JOINING ENDS OF WING SECTIONS. CEMENT GUSSET W7 TO FRONT CENTER SECTION SPAR, WITH LANDING GEAR SANDWICHED BETWEEN THE TWO AND INTO CREASE FOR SAME IN W7. CEMENT GUSSETS W8 FLUSH WITH TOP OF SPAR AND INSIDE OF W2, ON BOTH SIDES OF REAR SPAR. NOTCH FALLS HALF WAY BETWEEN RIBS W2. USING CEMENT GENEROUSLY JOIN OUTER SECTIONS TO CENTER OF WING BY INSERTING SAME INTO PROTRUDING WING GUSSETS W7 AND W8. TOP OF OUTER SECTION SPARS SHOULD BE FLUSH WITH TOP OF W7 AND W8 TO ALLOW WING TO ASSUME THE PROPER 1-3/16" MEASUREMENT (DIHEDRAL ANGLE) UNDER EACH TIP. ADD A SECOND COAT OF CEMENT AND ALLOW TO DRY THOROUGHLY, CHECKING FRAME FOR WARPS. CONSTRUCT NACELLES BY CEMENTING A1 TO TOP OF LEADING EDGE AND INTO NOTCHES FOR SAME IN W7 AND W8. ADD A2 DIRECTLY BENEATH. CEMENT BOTH A3'S BETWEEN LEADING EDGE AND INTO NOTCH IN W7. USING CEMENT GENEROUSLY, INSTALL A4 AGAINST FRONTS OF A1, A2 & A3; AGAINST LEADING EDGE. CEMENT A5 AGAINST BOTTOM OF A2 SO THAT LANDING GEAR IS SANDWICHED IN CREASE. TRIM HARDWOOD MOTOR MOUNTS TO CURVE OF A4 AND CEMENT INTO NOTCHES DIRECTLY BEHIND TOP AND BOTTOM OF A4. USE TWO HEAVY COATS OF CEMENT ON INSTALLATION FOR STRENGTH. CEMENT C5 TO BOTTOM OF WING BETWEEN RIBS W2 AND AGAINST LEADING EDGE. ADD C6 TO TOP OF WING. CONSTRUCT OPPOSITE NACELLE IN SAME MANNER. ALLOW STRUCTURE TO DRY THOROUGHLY, THEN SAND SMOOTH TO PREPARE FOR COVERING. COVER EACH WING SECTION WITH TISSUE, MOISTENED WITH WATER BEFORE APPLYING. WHEN DRY TRIM TISSUE AND APPLY TWO COATS OF CLEAR DOPE, CHECKING STRUCTURE CONSTANTLY AGAINST WARPS. IF WARP OCCURS - APPLY CLEAR DOPE AND TWIST IN OPPOSITE DIRECTION, UNTIL DRY. WING IS INSTALLED IN FINAL ASSEMBLY.

AUTO-MAGIC-PILOT FLYING
 SEE ILLUSTRATION ON OTHER SIDE
 NEW METHOD OF CAPTIVE FLYING FOR SMALL AREAS. HAND CONTROLLING AS IN U-CONTROL NOW UNNECESSARY. PREVENTS CHASING AND POSSIBLE LOSS OF MODEL, OR COLLISION DAMAGE, AS EXPERIENCED IN FREE-FLYING. MODEL AUTOMATICALLY FLIES TO PRE-DETERMINED HEIGHT UNTIL GRACEFUL LANDING IS MADE. INSTALL CONTROLS IN MODEL AS DESCRIBED IN CONTROL SYSTEM NOTE. DRILL OUT SMALL HOLE (IN VERTICAL) AND LARGE HOLE (IN HORIZONTAL) PLYWOOD A/M UNITS AND SECURELY CEMENT TOGETHER. SECURE A POST (BROOMSTICK) APPROXIMATELY 4 FT. HIGH. DRIVE POST INTO GROUND OR NAIL BOARD TO BOTTOM AND WEIGHT SAME TO PREVENT POST FROM SHIFTING. FASTEN A/M PILOT UNIT TO TOP OF POST WITH NAIL. USE WASHERS ABOVE AND BELOW UNIT. BE CERTAIN HOLE IS LARGE ENOUGH SO THAT IT SWINGS FREELY AND EASILY. TIE 12 FT. TO 15 FT. NYLON (OR STRONG THREAD) LINES FROM A/M UNIT TO LINES COMING FROM MODEL. BE CERTAIN LINES ARE SAME LENGTH. WHEN LINES ARE TAUT, AND MODEL IS HELD AT SAME LEVEL AS A/M UNIT, ELEVATOR IS NEUTRAL. WHEN MODEL IS LOWERED ELEVATOR GOES UP; WHEN RAISED, ELEVATOR GOES DOWN. RUDDER "R" MUST BE ANGLED 3/8" TOWARDS OUTSIDE OF CIRCLE. TO FLY MODEL, START ENGINE, PULL MODEL AWAY FROM POST UNTIL LINES ARE TIGHT, THEN RELEASE FOR TAKE-OFF.



SPAR NOTE
 DRAWING OF SPARS BELOW IS FULL SIZE. SELECT FROM 3/32 STRIP-SHEET AND CUT TO EXACT LENGTH AND SHAPE SHOWN. CUT FRONT SPAR AT ANGLE TO FIT AGAINST LEADING EDGE AS SHOWN.

CONTROL SYSTEM NOTE
 CONTROL SYSTEM SHOWN FULL SIZE. CUT 1/8 SQ. BALSA CONTROL-ROD TO LENGTH. DRILL SMALL HOLES THROUGH PUNCH MARKS IN PLYWOOD BELL-CRANK. DRILL CENTER HOLE FOR 2-56 MACHINE SCREW (NOT PROVIDED IN KIT), WHICH ALLOWS BELL-CRANK TO PIVOT FREELY. BEND TWO STRAIGHT PINS TO SHAPE SHOWN. INSERT THROUGH HOLE IN BELL-CRANK OPPOSITE MACHINE SCREW. PUSH SPUR INTO 1/8 SQ. CONTROL-ROD. WRAP WITH THREAD AND CEMENT SECURELY. THERE MUST BE CLEARANCE BETWEEN ROD AND BELL-CRANK TO ALLOW FREE MOVEMENT. PLACE ROD IN FUSELAGE INSERTING THROUGH HOLES IN BULKHEADS. DRILL HOLE THROUGH PUNCH MARK IN CP AND CP1 FOR MACHINE SCREW. PLACE WASHER BETWEEN BELL CRANK AND CP. SLIP WASHER AND TWO NUTS ON MACHINE SCREW. RUN-UP NUTS CLOSE TO CP1 (SO THAT BELL CRANK STILL PIVOTS FREELY) AND TIGHTEN TOWARDS EACH OTHER. A COAT OF CEMENT OR DROP OF SOLDER WILL PREVENT NUTS FROM LOOSENING. ATTACH REAR OF ROD TO CONTROL HORN BY INSERTING BENT PIN THROUGH HORN AND CEMENTING TO REAR OF ROD IN SAME MANNER AS FRONT. CONTROLS SHOULD BE NEUTRAL SO THAT WHEN ASSEMBLY IS COMPLETE STRAIGHT SIDE OF BELL CRANK SHOULD BE PARALLEL WITH FUSELAGE SIDE

CONTROL ROD STRAIGHT PIN HORN
 (TOP VIEW) AND ELEVATOR IS FLAT (SIDE VIEW). MOVEMENT OF BELL CRANK SHOULD MOVE ELEVATOR UP AND DOWN FREELY AND EASILY. ANY STICKING TENDENCIES MUST BE REMOVED. TIE A LENGTH OF NYLON (OR STRONG THREAD) LINES TO HOLES ON BOTH SIDES OF BELL CRANK. CUT OUT SMALL HOLES IN SIDE OF CABIN SHOWN ON FULL SIZE SIDE VIEW. LINES COME THROUGH FUSELAGE SIDE AND NOTCHES IN (WG) WING GUIDE. TIE SECURE LOOPS IN END OF LINES 3" PAST WING TIP. BOTH LINES SHOULD BE THE SAME LENGTH.