

Curtiss Jenny JN-4—JN-6H.

drawings by JOSEPH NIETO

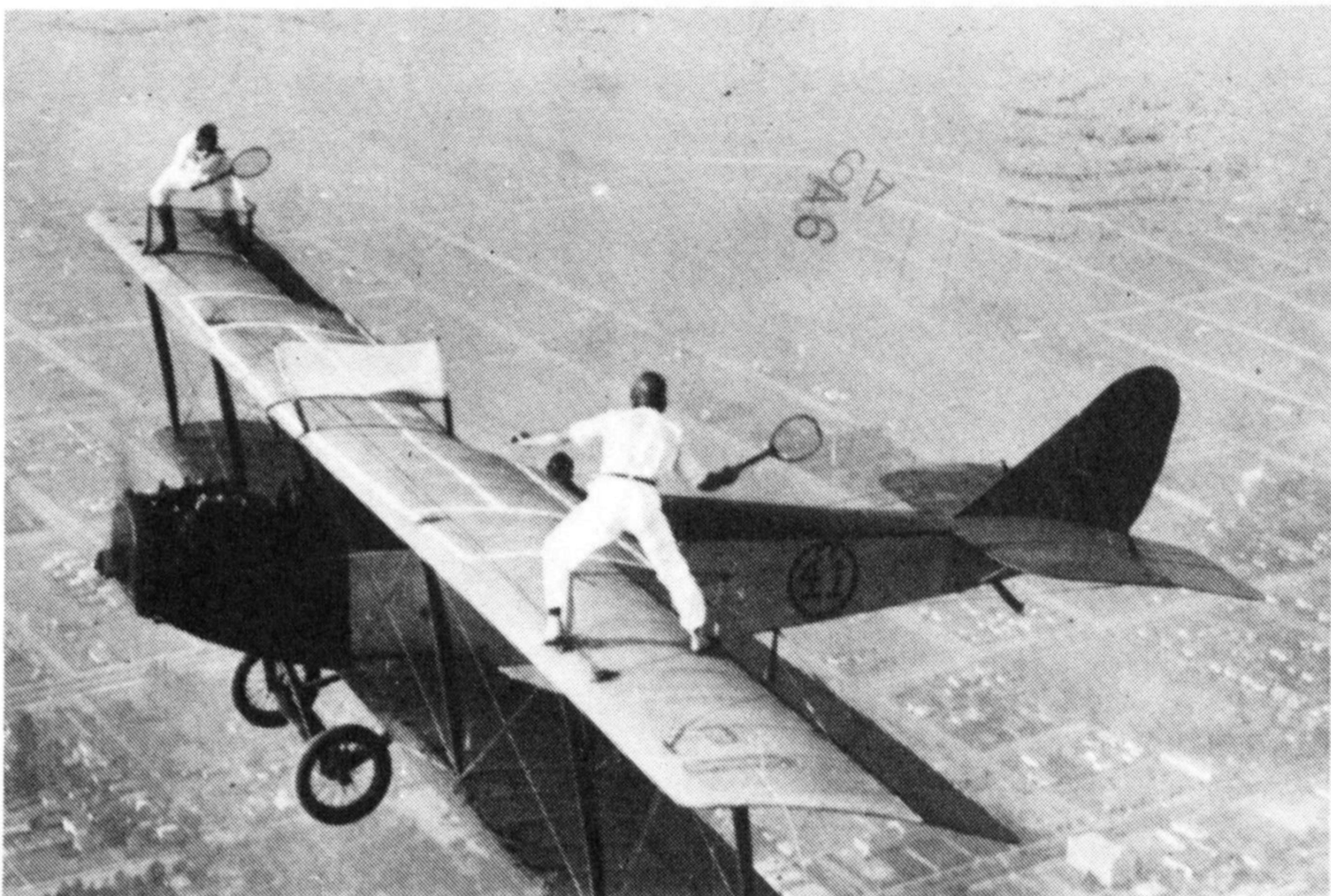
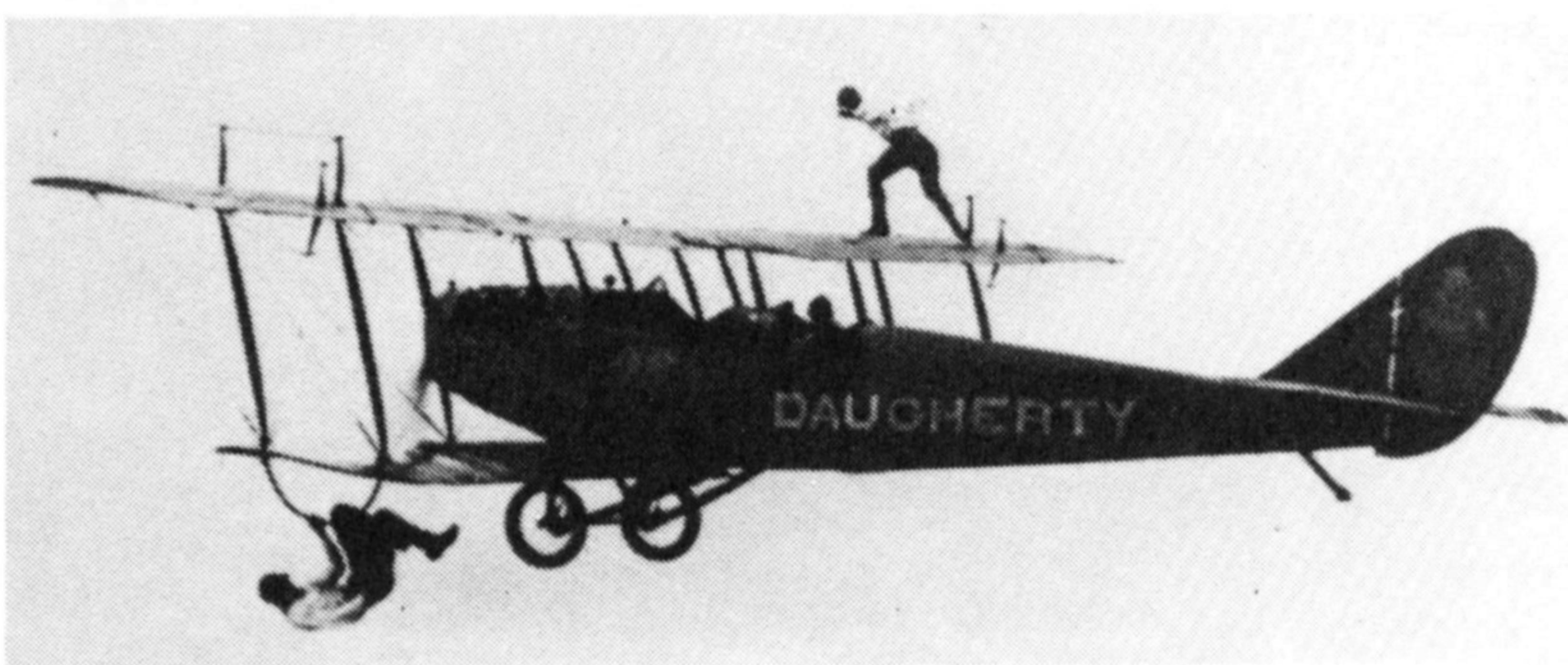


Photo courtesy of UPI.



"Flying the World's Great Aircraft" photo.



"U.S. Airmail Service" photo.

The Curtiss Jenny served as a trainer, a barn stormer, a mailplane, and was used extensively in early Hollywood films.



U.S. Navy photo.

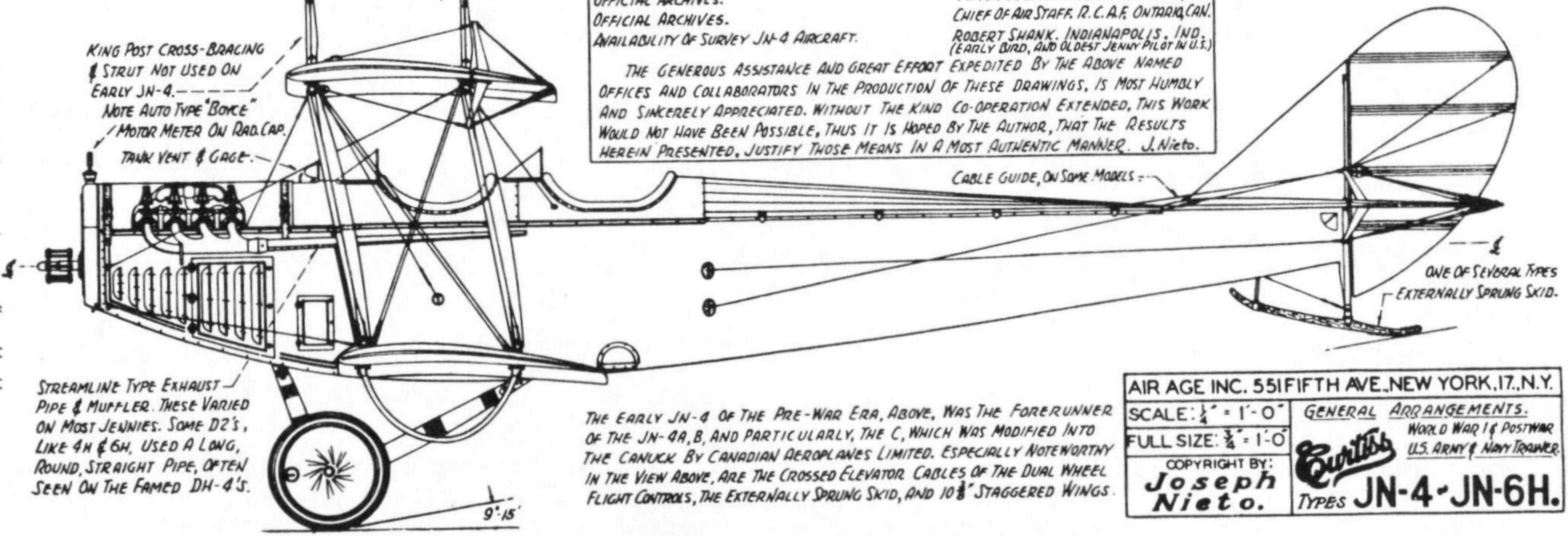
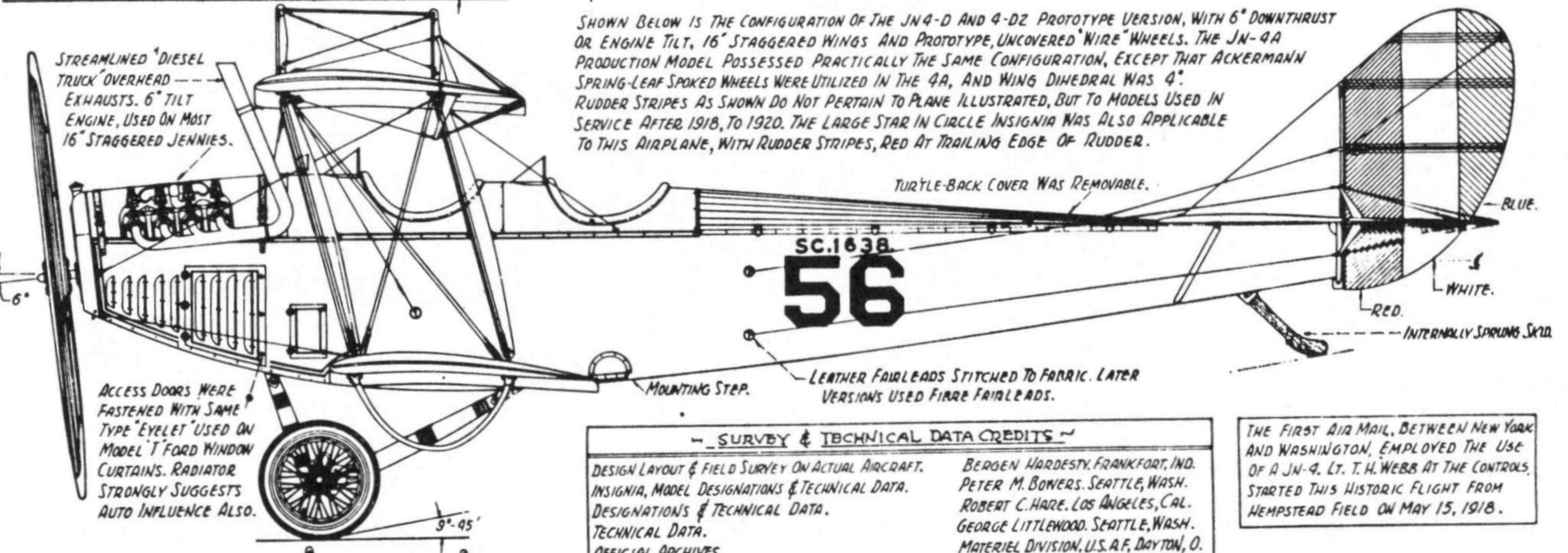
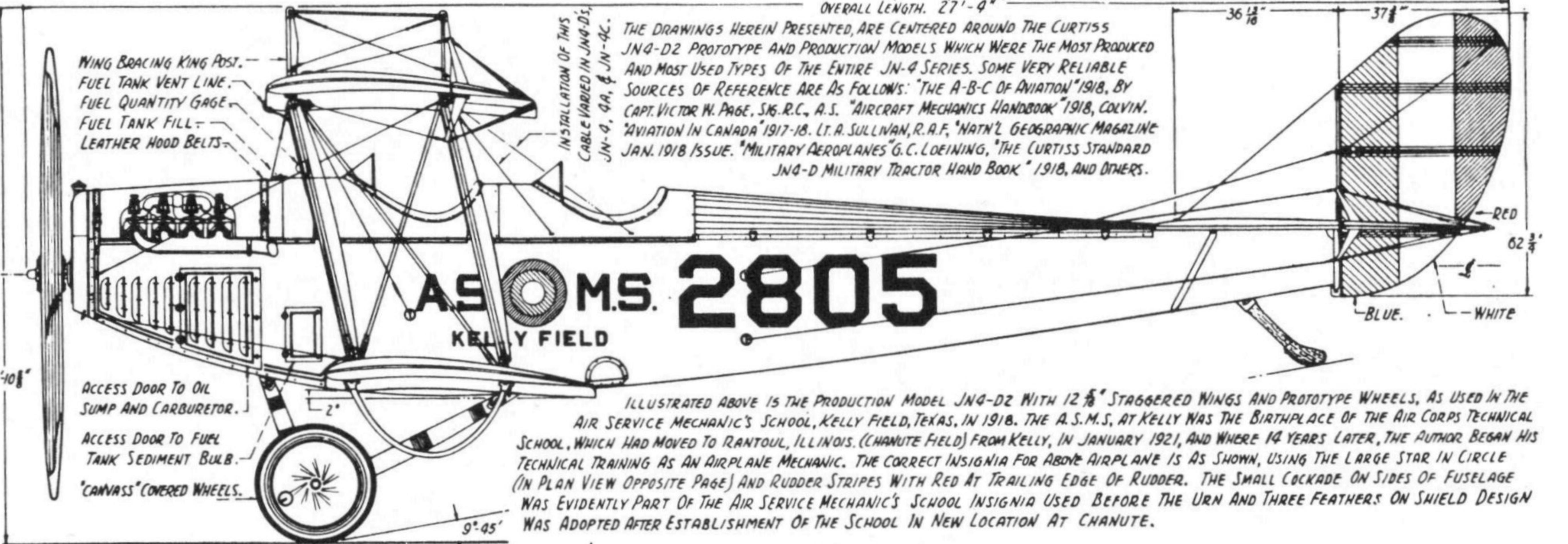
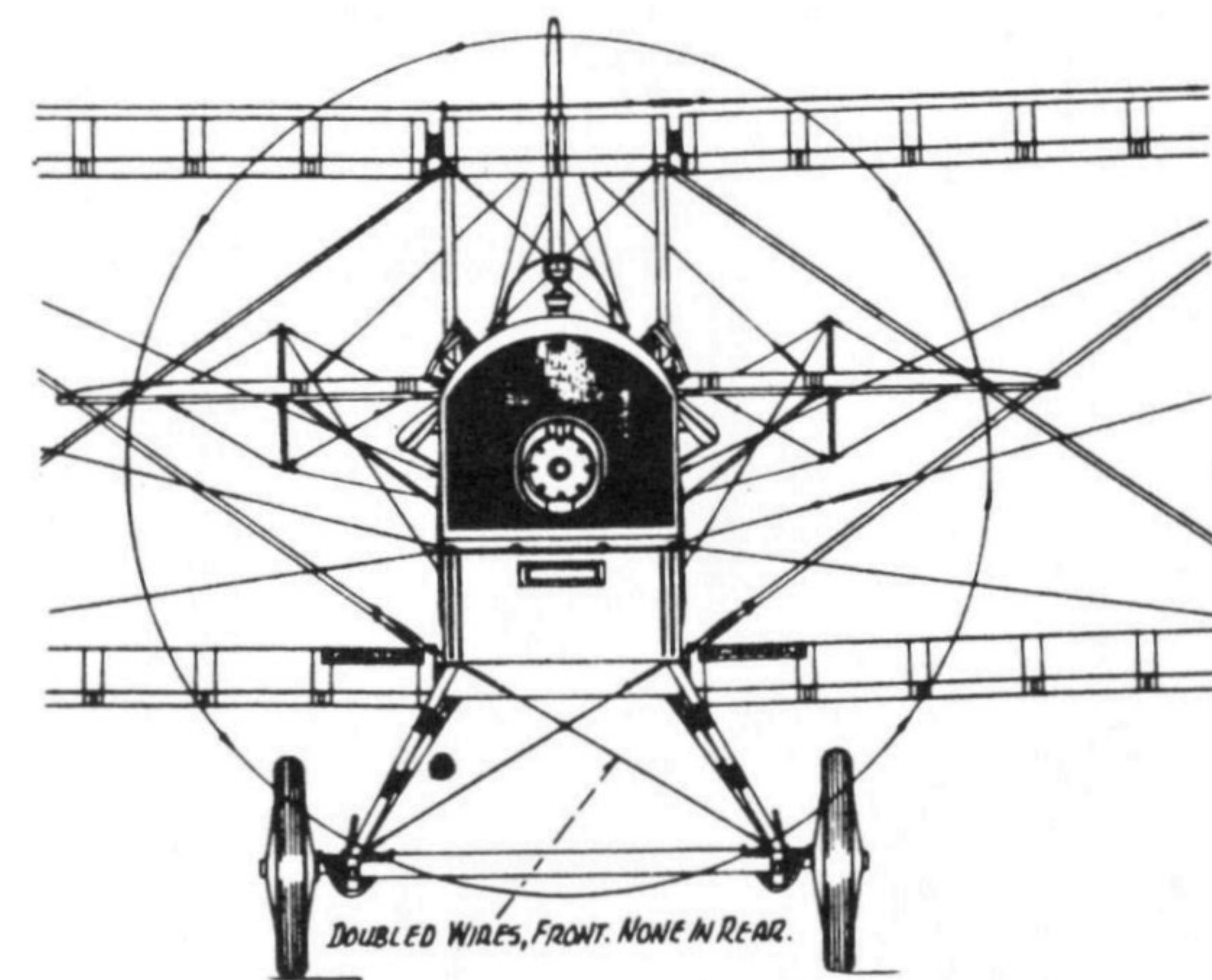
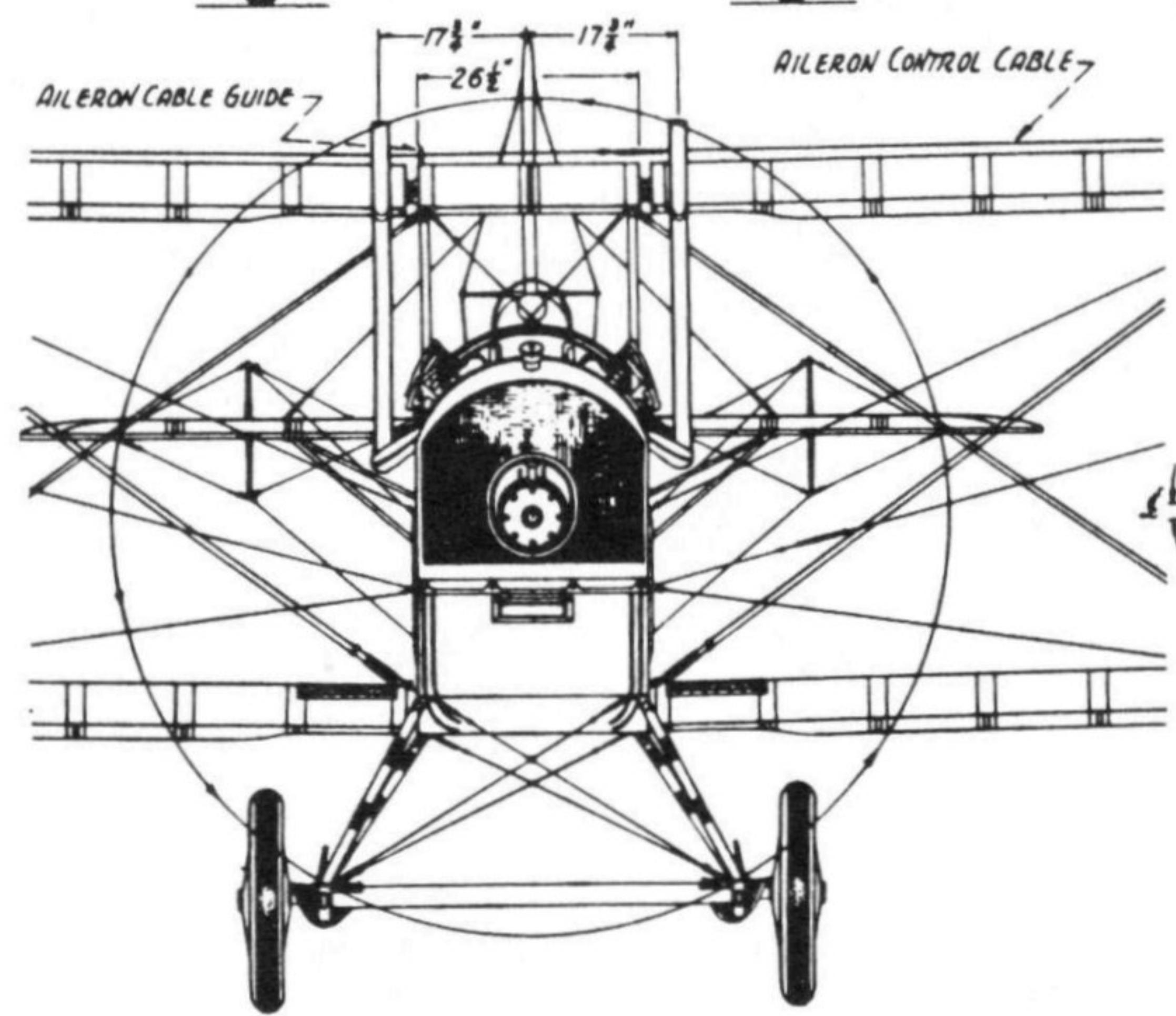
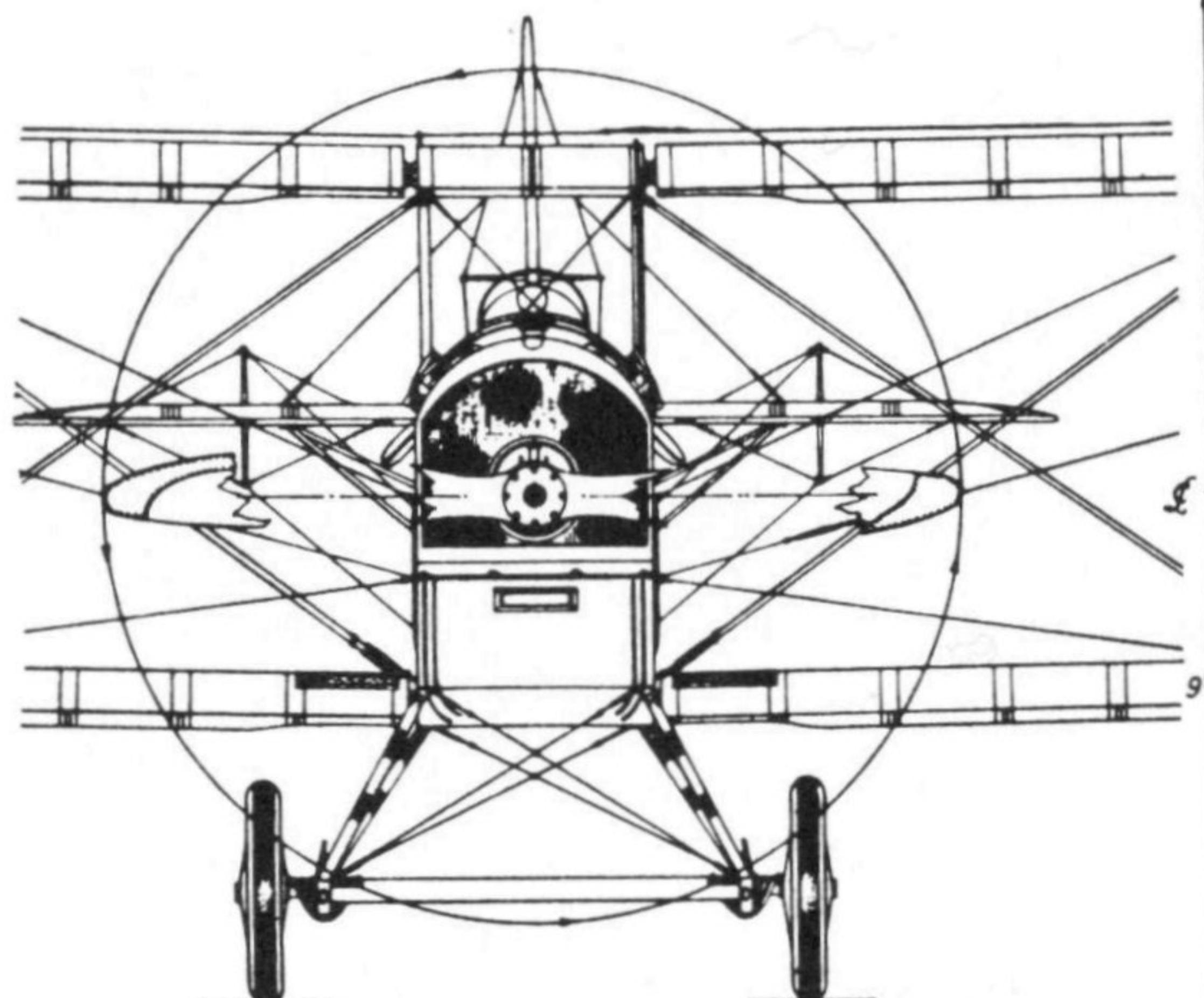
The Jenny was purely American. Produced in great quantities (over 4,500) for that period, Curtiss was helped in the effort by many subcontractors in Canada and the British Empire.

There used to be a saying, "If you can fly a Jenny, you can fly anything." She had her shortcomings, yet she would give novice pilots more than an even break. She was designed to teach men to fly and nothing more was ever expected of her.

However clear-cut the Jenny's wartime purpose may have been, her greatest fame actually came in the post-war years of the 1920s. By sheer numbers she invaded—and took over—the initial phases of American aviation. She flew the first regular airmail schedule and became the first readily available private plane.

To those who teetoned on a Jenny there is something magical in recalling the feel of air pressure on her elevators or rudder, of the throbbing of her OX-5 engine pulling her out of a dirt field, of every rib, strut, and wire vibrating in unison, of fabric dancing to the same beat as she bore her way to history. There is no pilot who has put in time in a Jenny who will not admit, "*Verily, there was an airplane!*"

Many survive—several are still flying. □



FROM THE AUTHOR'S POINT OF VIEW, NO OTHER AIRPLANE IN U.S. AVIATION HAS DONE MORE TO PIONEER AVIATION IN GENERAL, THAN THE CURTISS JN-4, "FIRST LOVE" OF WORLD WAR I PILOTS, AND MANY OF THE AVIATION GREATS OF TODAY. THE FAMED JENNY, THE DEPENDABLE WACK-HORSE OF THE GOOD OLD DAYS, HAS BEEN SEEN PROADING ALONG AVIATION TRAILS IN MANY ODD AND VARIED GARBS, PERFORMING DUTIFULLY TO ALL THE UNLIMITED TASKS TO WHICH SHE WAS HARNESSSED TO PULL, FROM HAULING WOUNDED, TO SURVEYING THE U.S. FOR MANY OF USE PRESENT AIR TERMINALS, FROM AN ACTUAL FRONT-LINE AIR BATTLE OR TWO IN WORLD WAR I, TO MAKING PEOPLE'S HAIR STAND ON END AT BARNSTORMING AIR CIRCUSES AS LATE AS 1950! AND YET TODAY, OVER THIRTY FIVE YEARS SINCE THE JENNY FIRST TRUNDLED OUT OF THE CURTISS STABLES, THERE ARE NUMEROUS OLD TIMERS WHO WILL BE GUIDED CONSIDERABLY BY THESE DRAWINGS IN RECONSTRUCTING FOR FLIGHT, SOME OF THE HULKS OF JN-4'S THAT HAVE LAIN DORMANT BUT NOT FORGOTTEN IN BARN'S AND FIELDS OF YESTER YEAR. IT HAS BEEN TRULY STATED - IN PART, "THEY HAD A FIELD DAY PUTTING TOGETHER WHATEVER WINGS AND FUSELAGES."

CUT OUT CENTER SECTION OF JN-4A(ARAA) MODEL.
CUT ACROSS TRAILING EDGE & C/C OF JN-4A(BEAGLE).
& CANUCK VERSIONS.

SQUARE CUT OUT CENTER SECTION OF JN-4A(ARAN) MODEL.
STRAIGHT ACROSS TRAILING EDGE & C/L OF JN-4, 4B(ARAN).
-4B, 4C & CANUCK VERSIONS.

THEY HAD LAYING AROUND, TIED THEM TOGETHER WITH BALE/ING WIRE, AND CALLED IT THE FIRST JENNY DESIGNATION THAT CAME TO MIND. BUT IT WOULD BE A JENNY, OF SORTS, YET WOULD FLY. HOW SUCCESSFUL WOULD THIS PROVE IF PRACTICED ON PRESENT DAY AIRCRAFT? IMAGINE A MAN WALKING FROM THE WINGTIP OF AN F-94C "STARFIRE" TO ANOTHER, IN FLIGHT! SUCH STUNTS ON JENNIES, WERE ROUTINE STEPS ON MILESTONES OF AVIATION PERFORMED SINCE THE DAYS OF THE GATES AIR CIR

| TABLE OF VARIATIONS. CURTISS BIPLANES TYPE JN-4 THROUGH JN-6H | | | | |
|---|-----------------------|-----------------------|---------------------|-----------------------|
| JN-4. (EARLY WAR) PROTOTYPE. | JN-4A. PRODUCTION. | JN-4B. PRODUCTION. | JN-4C. (CANUCK). | JN-4-D. PROTOTYPE. |
| ✓ | ✓ | ✓ | ✓ | ✓ |

| ~ TABLE OF VARIATIONS. CURTISS BIPLANES TYPE JN-4 THROUGH JN-6H ~ | | | | | |
|---|---------------------------------|-----------------------|-----------------------|---------------------|-----------------------|
| ITEM. | JN-4 (PRE-WAR) PROTOTYPE. | JN-4A. PRODUCTION. | JN-4B. PRODUCTION. | JN-4C. (CANUCK.) | JN-4D. PRODUCTION. |
| WING SPAN. 12' 0" | 43' - 7 1/2" | ✓ | ✓ | ✓ | ✓ |

| GAP. | 6 $\frac{1}{4}$ " | 59 $\frac{1}{2}$ " | 62 $\frac{3}{16}$ " | 61 $\frac{1}{4}$ " | 60 $\frac{1}{2}$ " | 61 $\frac{1}{4}$ " |
|-------------|-------------------|--------------------|---------------------|--------------------|--------------------|--------------------|
| CHORD. | | | | | | |
| HEICR, U.A. | | | | | | |
| 3-102 | | | | | | |
| 3-108 | | | | | | |
| 3-106 | | | | | | |
| 3-104 | | | | | | |
| 3-103 | | | | | | |
| 3-105 | | | | | | |

| | | | | | | | |
|------------|-----|-----|--------------------|--------------------|-----|--------------------|-----|
| STAGGER. | 10° | 16° | 12 $\frac{2}{5}$ ° | 10 $\frac{1}{2}$ ° | 16° | 12 $\frac{2}{5}$ ° | 16° |
| INCIDENCE. | 2° | ✓ | ✓ | ✓ | ✓ | ✓ | ✓ |
| DIMEDRAL. | 1° | 4° | ✓ | ✓ | ✓ | ✓ | ✓ |

| EXHAUSTS . ETC. / TYPE . | HEAD STICKS COLLECTOR. | SHR. PIPES & CLAD CARRIER. | SIZ. PIPES & CLAD CARRIER. |
|--------------------------|-----------------------------|----------------------------|----------------------------|
| FLIGHT CONTROL S. | DEP. WHEEL X EL. CABLES. | ✓ | ✓ |
| STABILIZER SETTING. | 0° | ✓ | ✓ |
| WINGSPAN. | 11' 6" | SINGLE STEEL | VERTICAL |

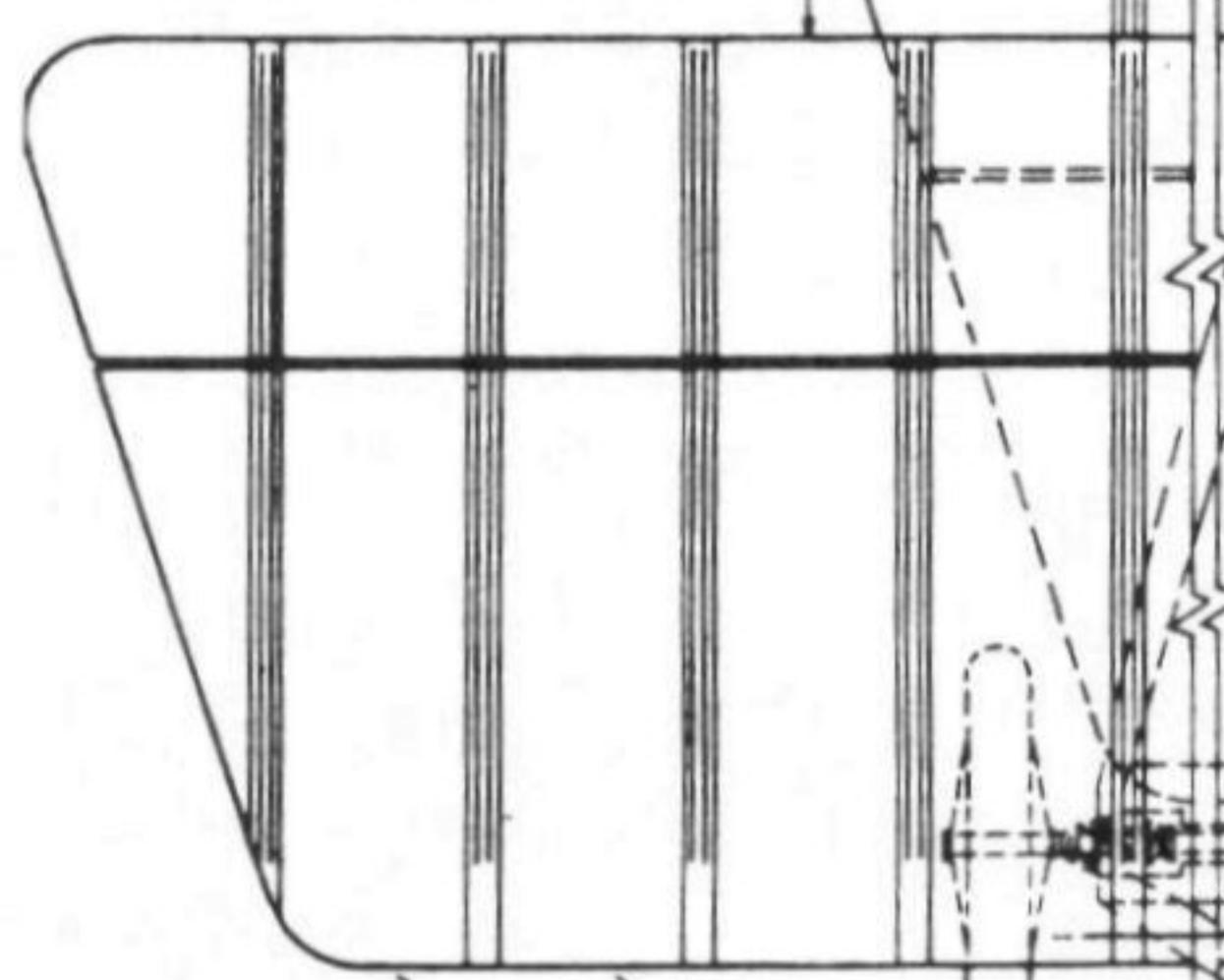
| | | | | |
|--------------------------|--|-------------------|----------------------------|--------------------|
| WING TIP SUBLINE. TOP | POINTED REAR. | POINTED | POINTED | POINTED |
| NO OUTLINE LOWER. | ROUNDED REAR. | POINTED | ROUNDED | ROUNDED |
| STABILIZER OUTLINE. | ROUNDED REAR. EDGE WITH TR. EDGE | PARALLEL. EDGE | SAME AS EARLIER. S/N. 4 | SAME AS S/N. 4. |

| | | |
|----------------------|--|---|
| ELEVATOR OUTLINE. | 7/2. EDGES SWEPT BACK. PARALLEL. NO SWEEP. | JANE AS EARLY SN. & JANE AS N. & R. |
| RUDDER OUTLINE. | COMMA, EXTR. CONVENTIONAL. BELLOW BODY. (SEE DWGS.) | JANE AS EARLY SN. & JANE AS N. & R. 2. |
| TYPE | EXTERIOR INTERNAL | |

| ITEM | DESCRIPTION | STANDARD | OPTIONAL | UPGRADED | UPGRADED |
|-----------------|--------------------|----------|----------------------------------|------------|------------|
| TAIL SKIDS. | SARUNG. | SARUNG. | | | |
| WING TIP SKIDS. | "U" SHAPE WOOD. | ✓ | ✓ | ✓ | ✓ |
| TYPE C. WHEELS | DO SPOKE STANDARD. | ✓ | ACERMAN / SPRING SPARE STANDARD. | ✓ | ✓ |
| NO. OF SEATS | 000605 | BOARD | UPHOLSTERY | UPHOLSTERY | UPHOLSTERY |

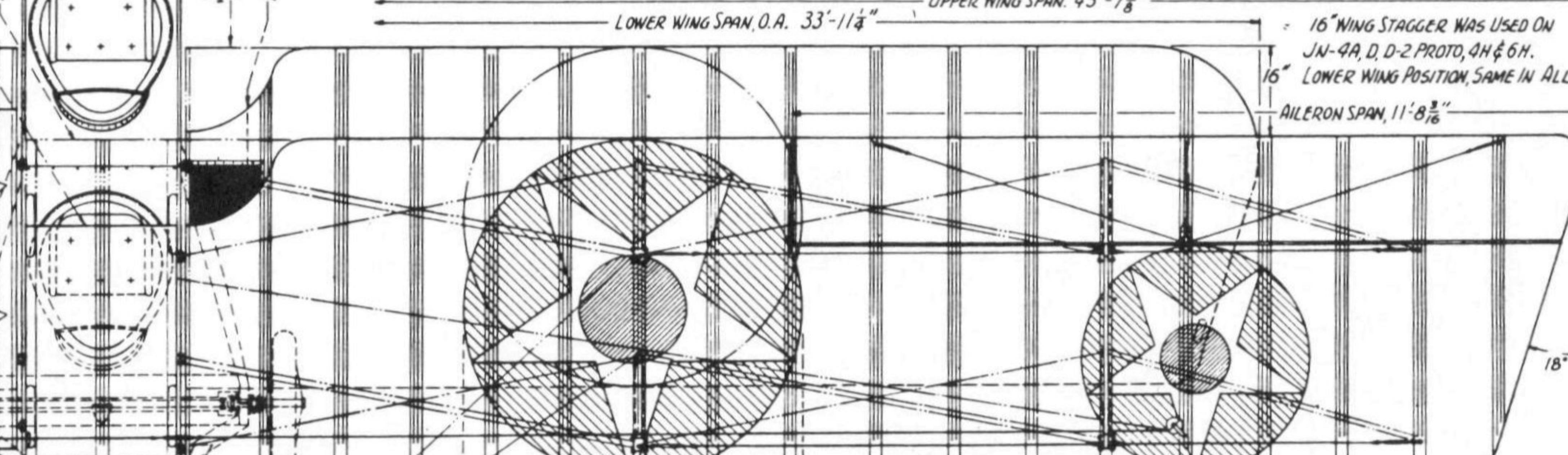
REMARKS: 1. O.A. LENGTH: WAS MUCH AS THE FUSELAGE OF ALL IN MODELS APPEAR TO HAVE BEEN BASICALLY THE SAME, AND THE REPORTED LENGTHS VARIED SO LITTLE, DIFFERENCES IN AIRRA AND O.A.L. IS BELIEVED DUE TO RUDDER SHAPE & TILT OR NO-TILT OR ENGINE. 2. HEIGHT: MEASURED FROM TOPMOST WING KING POST TO GR. LEVEL. DIFFERENCES DUE TO INCREASED DIHEDRAL & EXTERNAL SKID IF MEASURED AT BEST 3. ENGINE EXHAUSTS: THESE ALSO VARIED CONSIDERABLY. L&R SIDES DIFFERED ALSO. SAME UTILIZED HEAT FOR CARBURETOR AIR HEATING. THE JNO-D2 PROD. ARMY MODEL USED SHORT STRAIGHT STACKS LIKE MOST CARRIERS & JNQ-D2 STRENGTHENED FLONERS(?) ONLY.

10 $\frac{3}{8}$ " WING STAGGER SHOWN BELOW
USED ON JN-4, 4C & CAN,
LOWER WING SAME LOC. 10 $\frac{3}{8}$ "



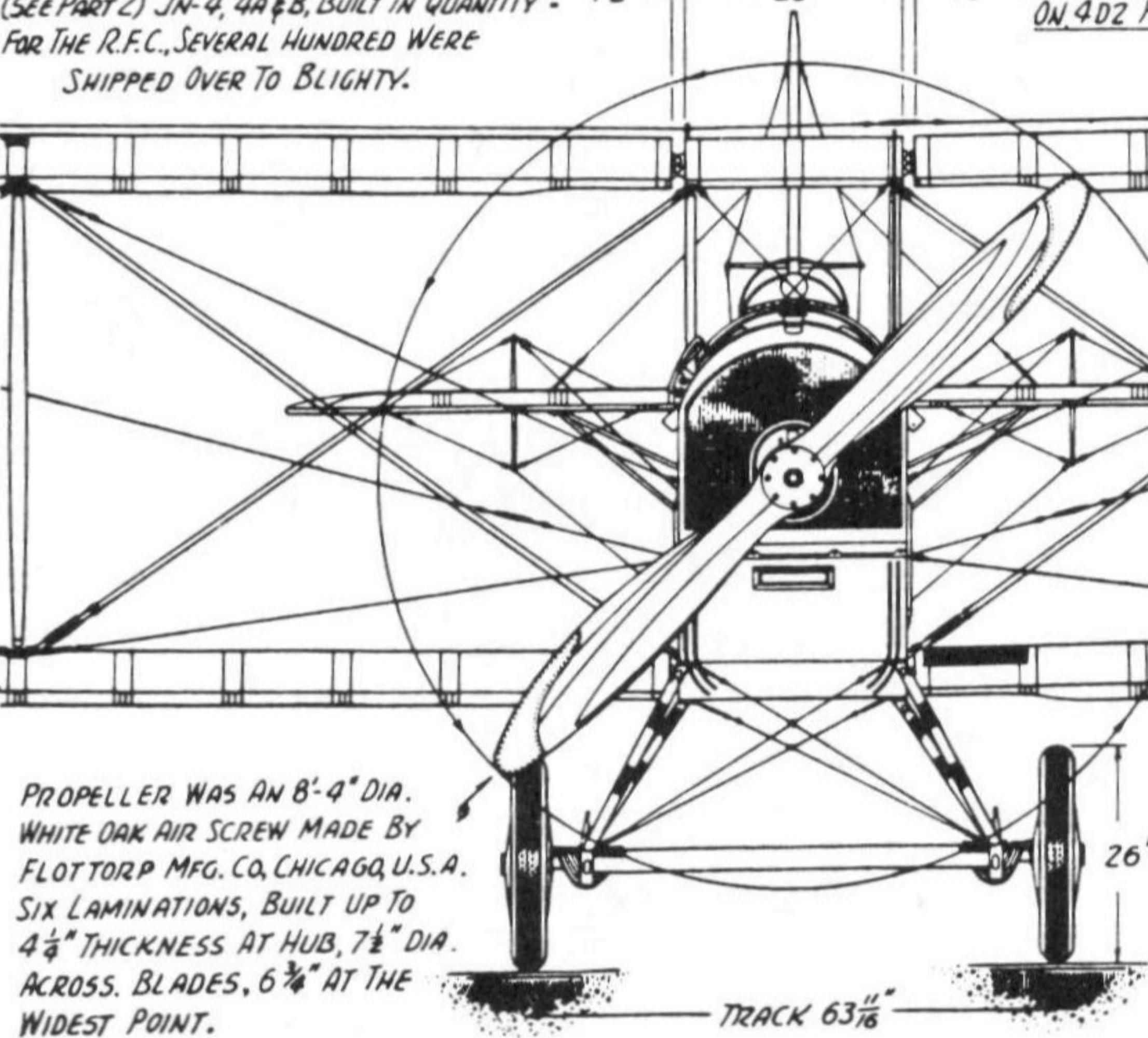
SHOWN ABOVE ARE THE
"POINTED" WING TRAILING TIPS
USED IN THE JN-4A, 4C & CANUCK,
AND JN-6H. STAGGER VARIED IN
ALL ABOVE TYPES. ACTUALLY, THEY ARE THE
JN-4C & CANUCK WINGS. EXHAUSTS AT RIGHT
ARE ALSO CANUCK & ARMY VERSION JN4-D2(PROD.)

THE JN-4D WAS THE MOST PRODUCED & USED JENNY. THE CANADIAN JENNY, CALLED THE "CANUCK", & JN-4C, WAS BUILT IN CANADA (SEE PART 2) JN-4, 4A & B, BUILT IN QUANTITY - FOR THE R.F.C., SEVERAL HUNDRED WERE SHIPPED OVER TO BLIGHTY.



A technical cross-sectional diagram of a composite material structure. The outermost layer is labeled "RED" and has a thickness of $\frac{1}{8}$ DIA. The next layer inward is labeled "BLUE" and has a thickness of $\frac{1}{6}$ DIA. The innermost core is a solid circle with a diameter of $\frac{1}{3}$ DIA. The diagram shows the layers stacked vertically with arrows indicating their relative positions.

INSIGNIA. THE LARGE STAR IN CIRCLE, ON WINGS ONLY, WAS USED ON U.S. "JENNIES" FROM MAY 1917 TO JAN. 1918. & PLACED IN FULL CHORD AT TANGENTS SHOWN ABOVE. ON JN'S WITH NO LOWER AILERONS, INSIGNIA WAS PAINTED UNDER LOWER WINGS DIRECTLY BELOW UPPER STAR. THE SAME APPLIED TO COCKADE, (U.S. & CANUCK) SHOWN AT LEFT. RUDDER STRIPES WERE RED (AT TRAILING EDGE) WHITE & BLUE. IN JAN. 1918, THE U.S. CHANGED TO COCKADES, & REVERSED RUDDER STRIPES. SHIPS BUILT SINCE 1918 TO END OF WAR, USED COCKADES WITH RUDDER STRIPES BLUE AT TRAILING EDGE. IN 1920, THE U.S. WAS BACK TO USING STARS & AGAIN TURNED AROUND RUDDER STRIPES TO ORIGINAL RED AT TRAILING EDGE. THE SIZE & LOCATION OF U.S. POSTWAR STAR INSIGNIA IS ALSO SHOWN ABOVE, APPR. ONE DIAMETER INBOARD FROM TIP.





AFTER THE 1918 CHANGE TO COCKADES, MANY WINGS IN SERVICE WERE LEFT UNCHANGED. WING MAY HAVE HAD ONE INSIGNIA AND THE SHIP ANOTHER. COLOR SCHEMES SPOTTED CLEAR DOPED FABRIC, ALTHOUGH SOME LATE ONES WERE PAINTED. WERE SILVER, WITH YELLOW ON UPPER SURFACES OF TOP WING & HORIZON. YELLOW, OTHERS ALL OLIVE DRAB. (PRIMARY YELLOW, ADVANCED, O.D.²) CO. COWLS WERE GENERALLY O.D., OR LEFT PLAIN METAL. JN'S USED FROM SOME TIMES SMALL SERIAL NUMBERS WERE LOCATED AT TOP OF WHITE R. SIGNAL CORPS. OTHERS USED THE "SC" & SER. NO. SMALL, JUST UNDER UPPER L.

SOME SHIPS EVEN FLEW WITH MIXED INSIGNIA. A SPARE
& MARKINGS: DURING WORLD WAR I, JENNIES
ALL (TRAINER) YELLOW. U.S. NAVY POST WAR JN'S
TAIL PLANE. SOME ARMY JOBS WERE TRAINER
G MATCHED PAINT. ON CLEAR DOPED JOBS,
TO FIVE DIGIT SERIAL NUMBERS ON FUSELAGE SIDES.
2 STRIPE, PRECEDED BY LETTERS "SC" FOR
NOW, WITH LARGE TRAINER NUMBER BELOW.

ALL FLYING WIRES (D) DOUBLE
& SPACED ON 5" CENTERS. LANDING
WIRES (L) SINGLE. LANDING GEARS ON
EARLY JN'S EMPLOYED DOUBLE BRACE
WIRES BETWEEN FRONT STRUTS.

(D) = DRAG WIRE.





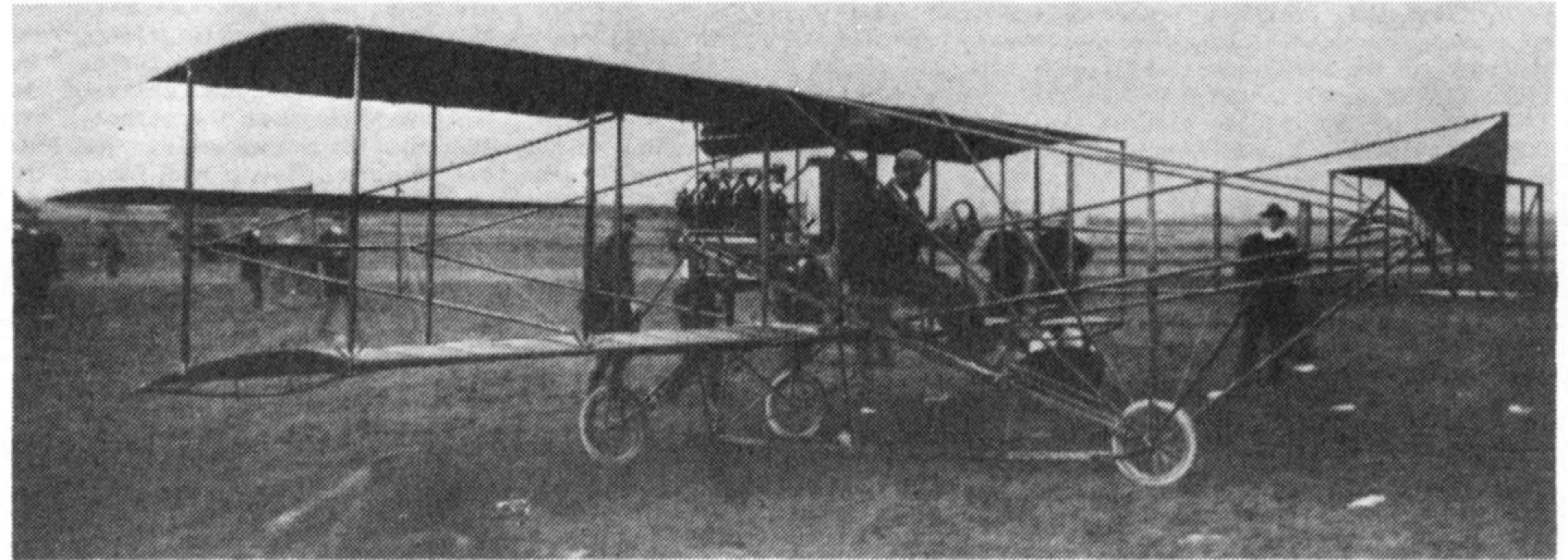
Curtiss Model D

drawing by WILLIAM WYLAN

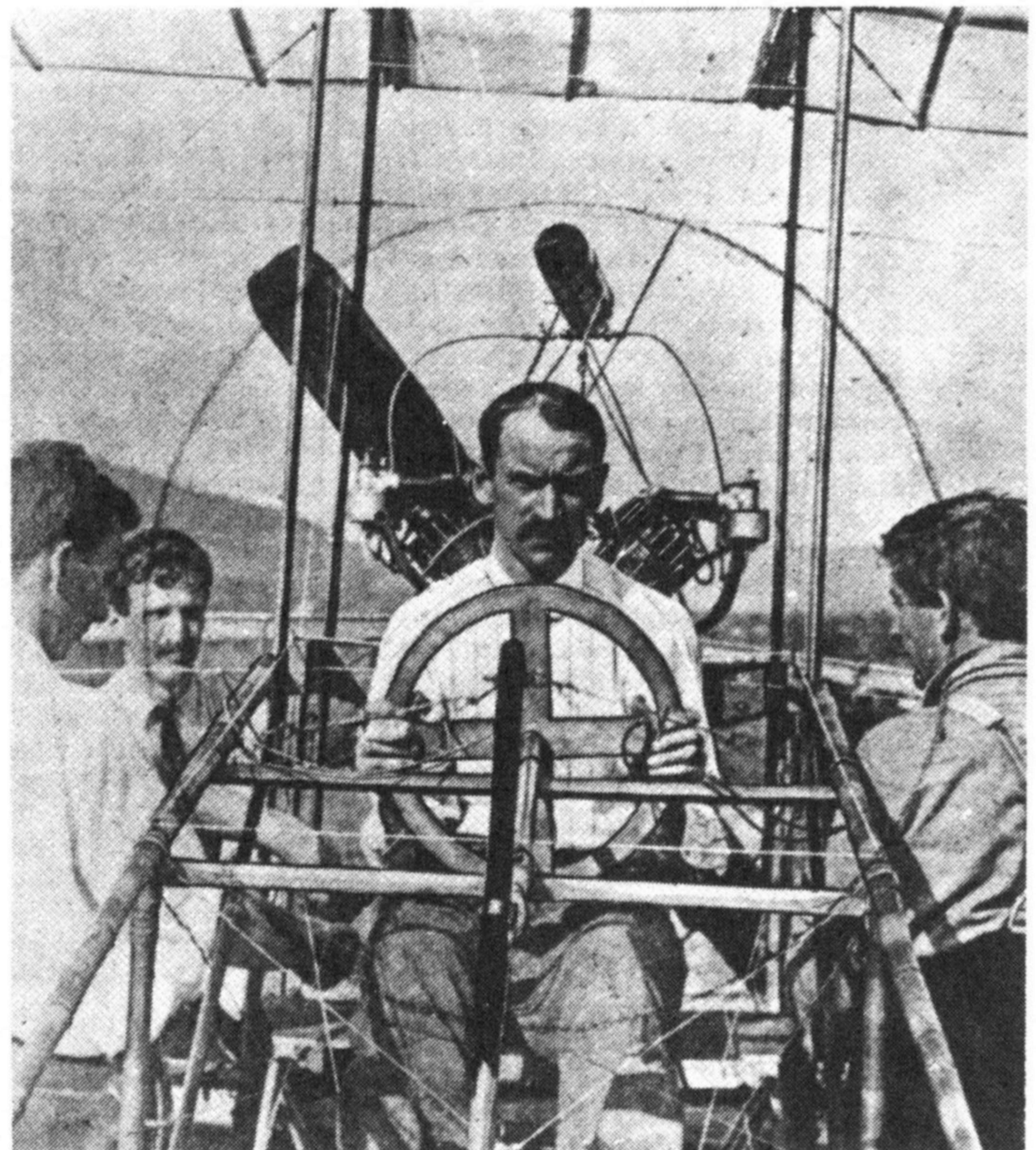
THIS AIRCRAFT was the result of U.S. Signal Corps authorization by Congress to appropriate aircraft for the Army. After a 5-year struggle to prove the practicality of the airplane, the Wright Brothers' flight demonstration had opened the eyes of Army brass to a new spectrum of weaponry. In 1911 Congress approved the first allotment specifically for aeronautics, and the Wright Brothers and Glenn Curtiss received the first two such contracts.

Designated "Signal Corps" sequence numbers, S.C. 1, the first military aircraft of the Wright Brothers was retired to the Air Force Museum that year, and Curtiss' S.C. 2 was the second aircraft to enter testing at Fort Sam Houston in April 1911. G.E.M. Kelly flew the trials on the morning of April 10. He took it up and shortly came in for a landing, hit the ground hard, and bounced back in the air. Climbing slowly, Kelly banked the airplane away from the tent area, suddenly lost control, and plummeted to his death. The S.C. 2 was repaired, however, and was used as a trainer. It was removed from service on February 24, 1914.

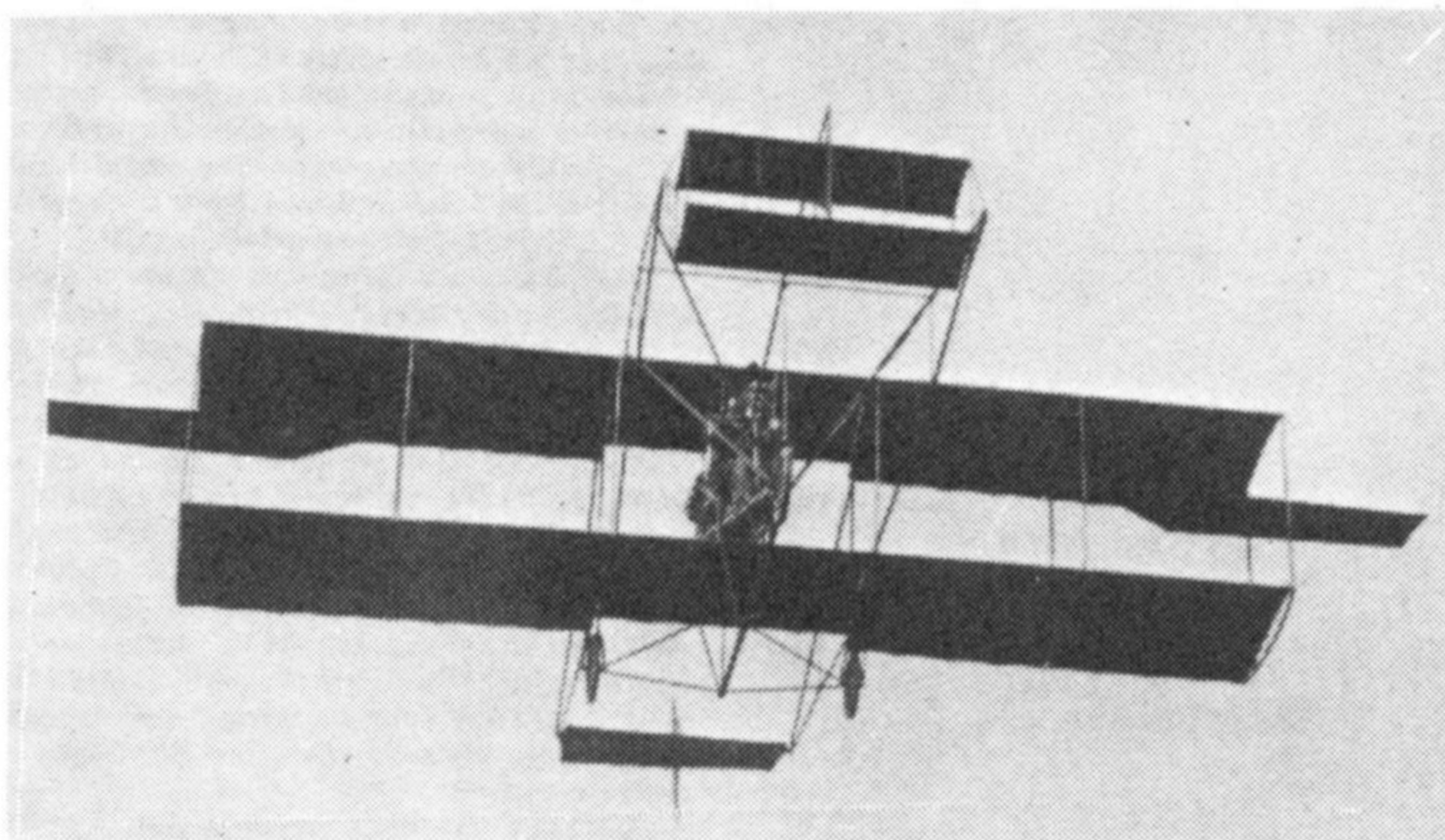
Seven Pushers survive, and many reproductions. □




*The Curtiss S.C. 2
was the second
aircraft to enter the
military inventory.
"A.A.H.S." Journal
photo.*



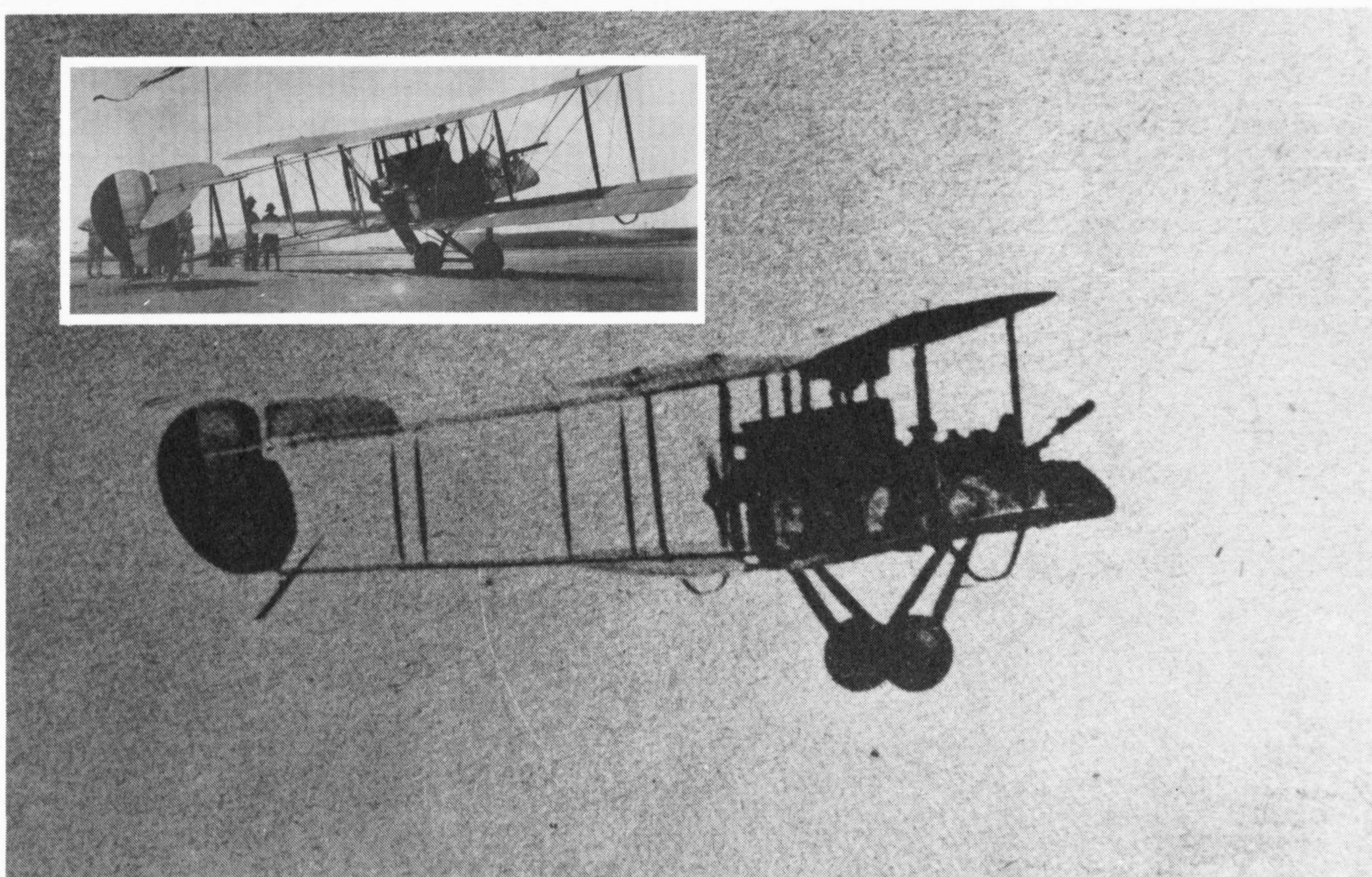
*Glen Curtiss at the controls of his June Bug was determined to prove
the utility of the airplane to the military. "A.A.H.S. Journal" photo.*





DeHavilland D.H.1

drawings by WILLIAM WYLAN



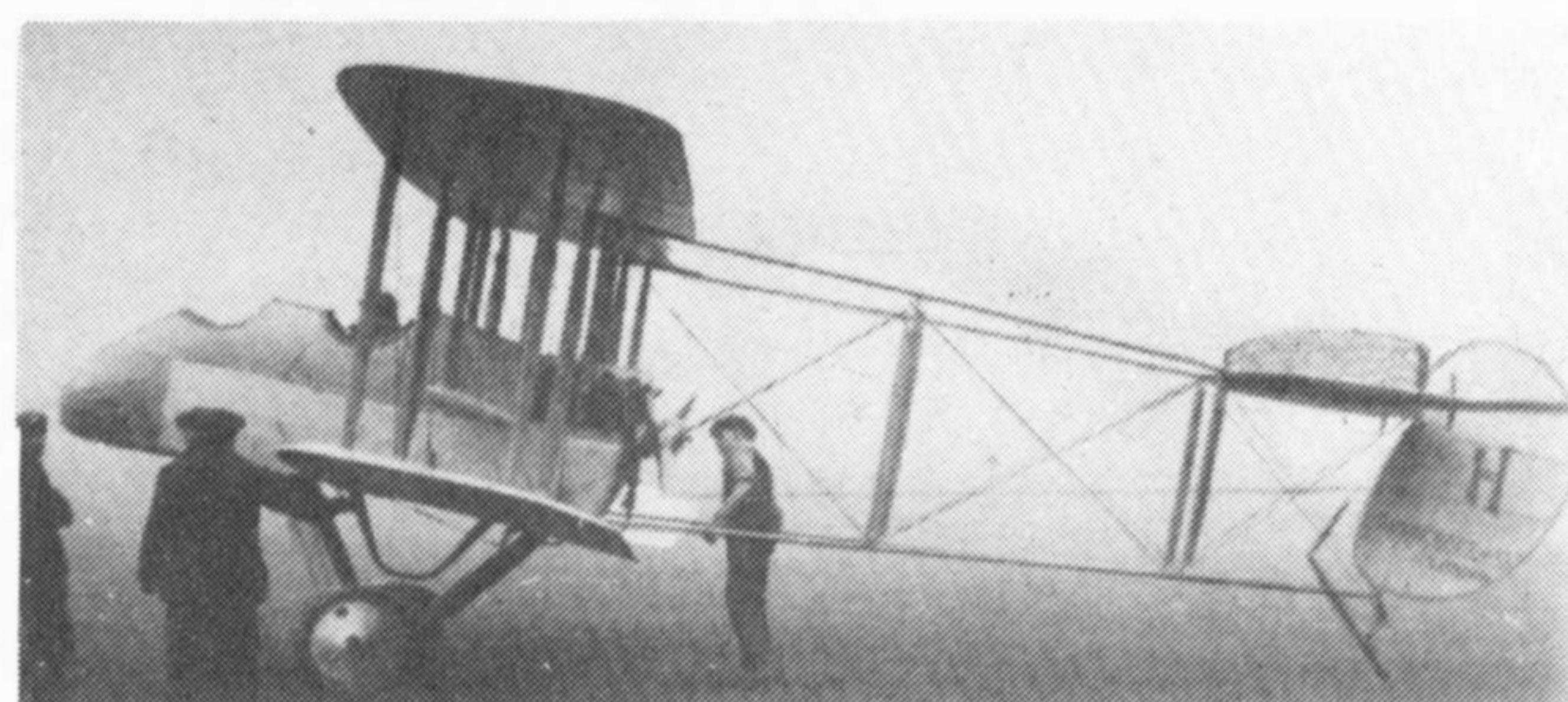
THE deHavilland D.H.1 was a two-bay pusher biplane designed by Geoffrey deHavilland in 1915 while he was with the Aircraft Manufacturing Company, producers of the plane. As simple as they were in those days, aircraft could be designed, built, and test-flown in a matter of just a few months. The D.H.1 was an immediate success and garnered much of that success from the 70-hp Renault V-type air-cooled engine. Its top speed at sea level was 78 mph, and its rate of climb was estimated at something less than 500 fpm.

DeHavilland himself did all the preliminary flight testing on the D.H.1. The lessons he had learned in the application of inherent stability theories to full-size aircraft were incorporated in his new


pusher. He demonstrated these qualities very impressively by flying hands off during tests and on low passes.


Although the D.H.1 was never produced in quantity, it was a very good airplane both performance-wise and structurally.


With a good airplane on their hands but no orders, the makers decided to develop the D.H.1 into a more serviceable military design, thus the D.H.1A evolved, which did reach limited production. There are none left. □



Springboard for the deHavilland aircraft manufacturing firm, the D.H.1 was considered a fine aircraft in its time. Air Age file photos.

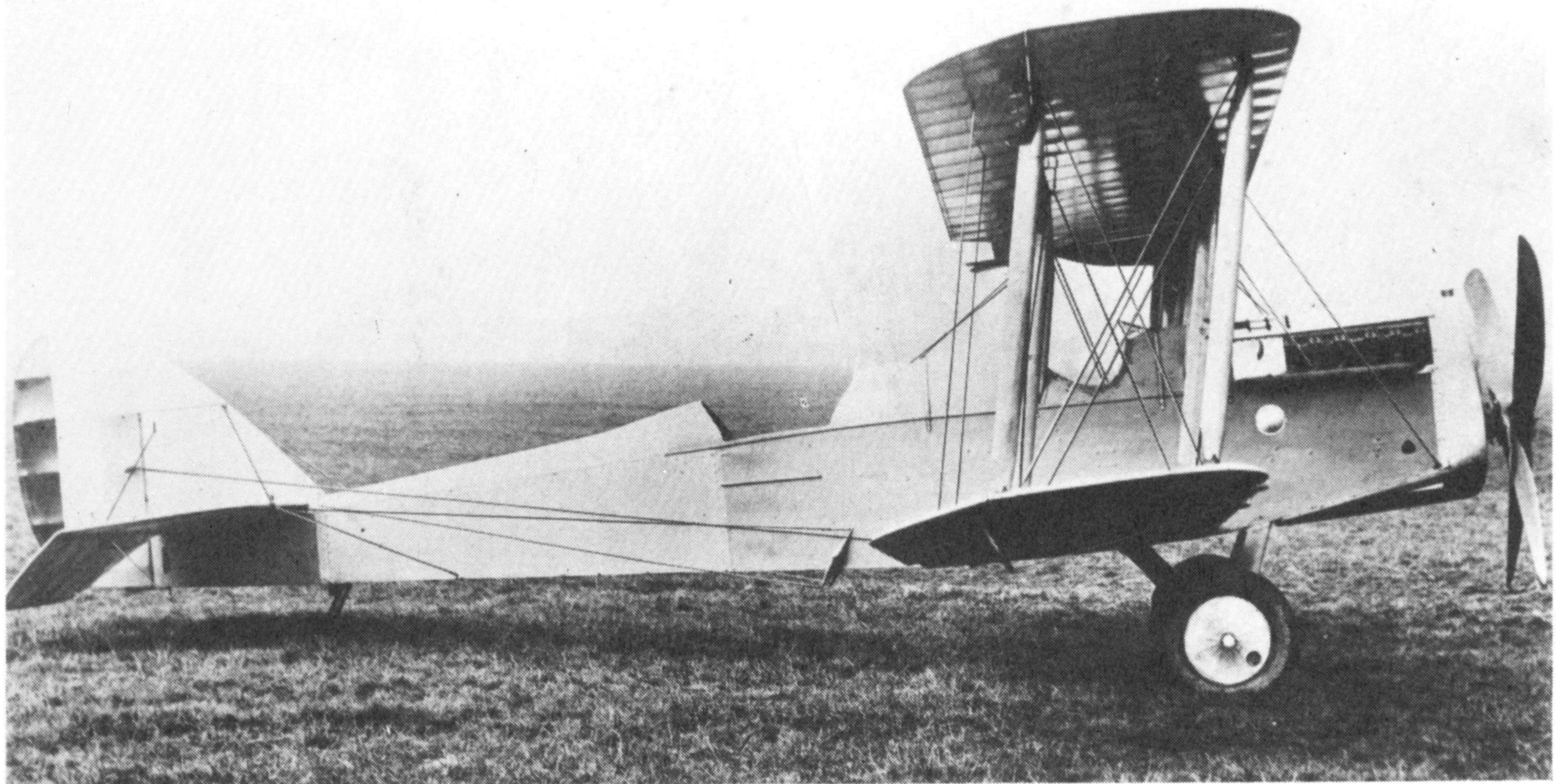






DeHavilland D.H.4

drawings by WILLIAM WYLAN



THE BRITISH firm known as the Aircraft Manufacturing Company was founded by G. Holt Thomas in 1912, and among its talented designers was Geoffrey deHavilland. Credited with many successful designs, deHavilland was prolific. In June 1916 mechanics rolled out the prototype of the now famous D.H.4 biplane, which was later to be both condemned and praised for its characteristics and fighting abilities. The ship was big and beautiful, yet in some respects ungainly and unsafe.

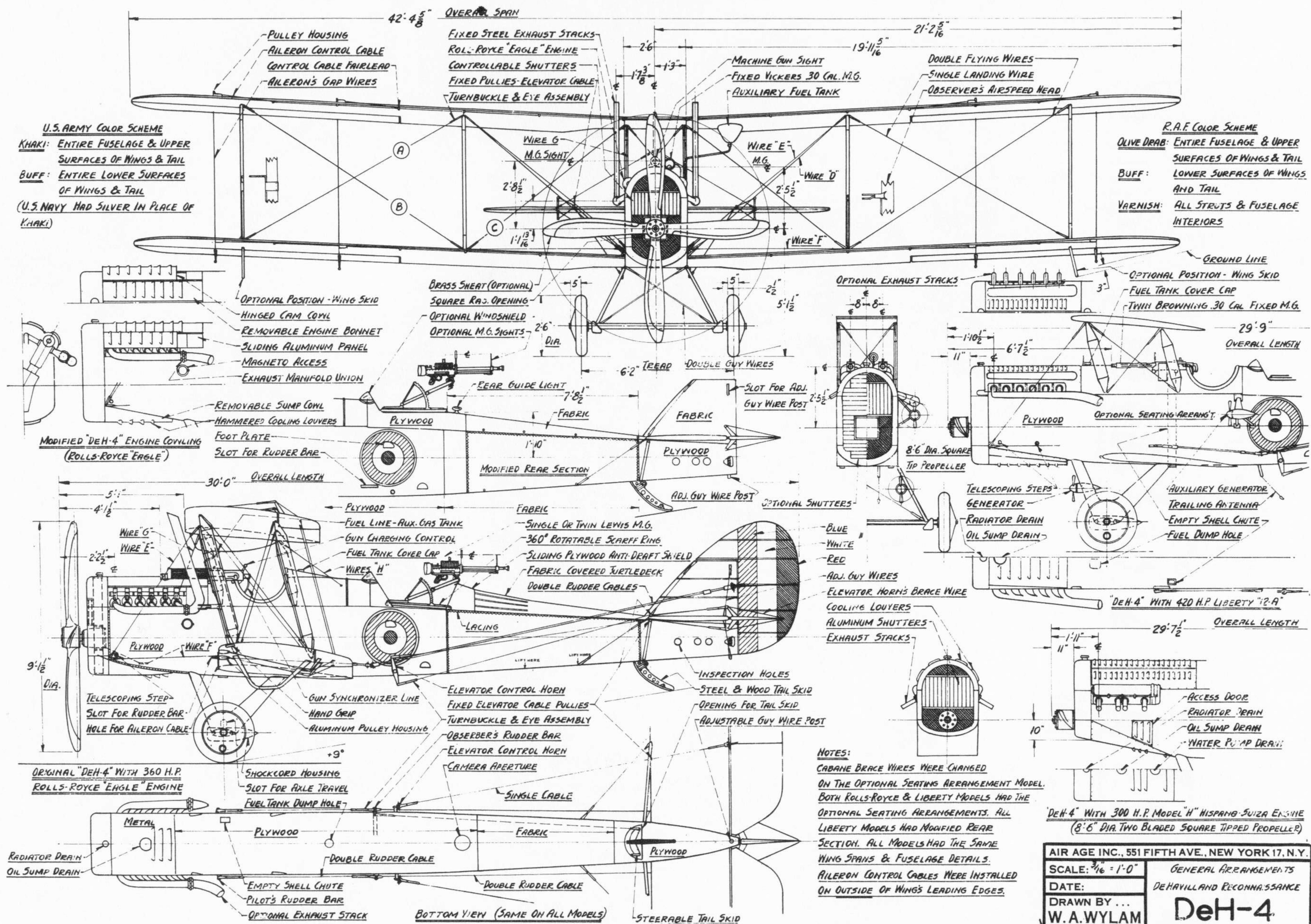
The first production models to go into service in 1916 were fitted with a variety of engines from 200-260 hp. The completely enclosed fuselage with its occupants sitting in tandem was not new, but the fact that the gunner member of the crew sat in the rear seat was. The greatest influence in the change of crew positions was the advent of the synchronized gun on the cowling.

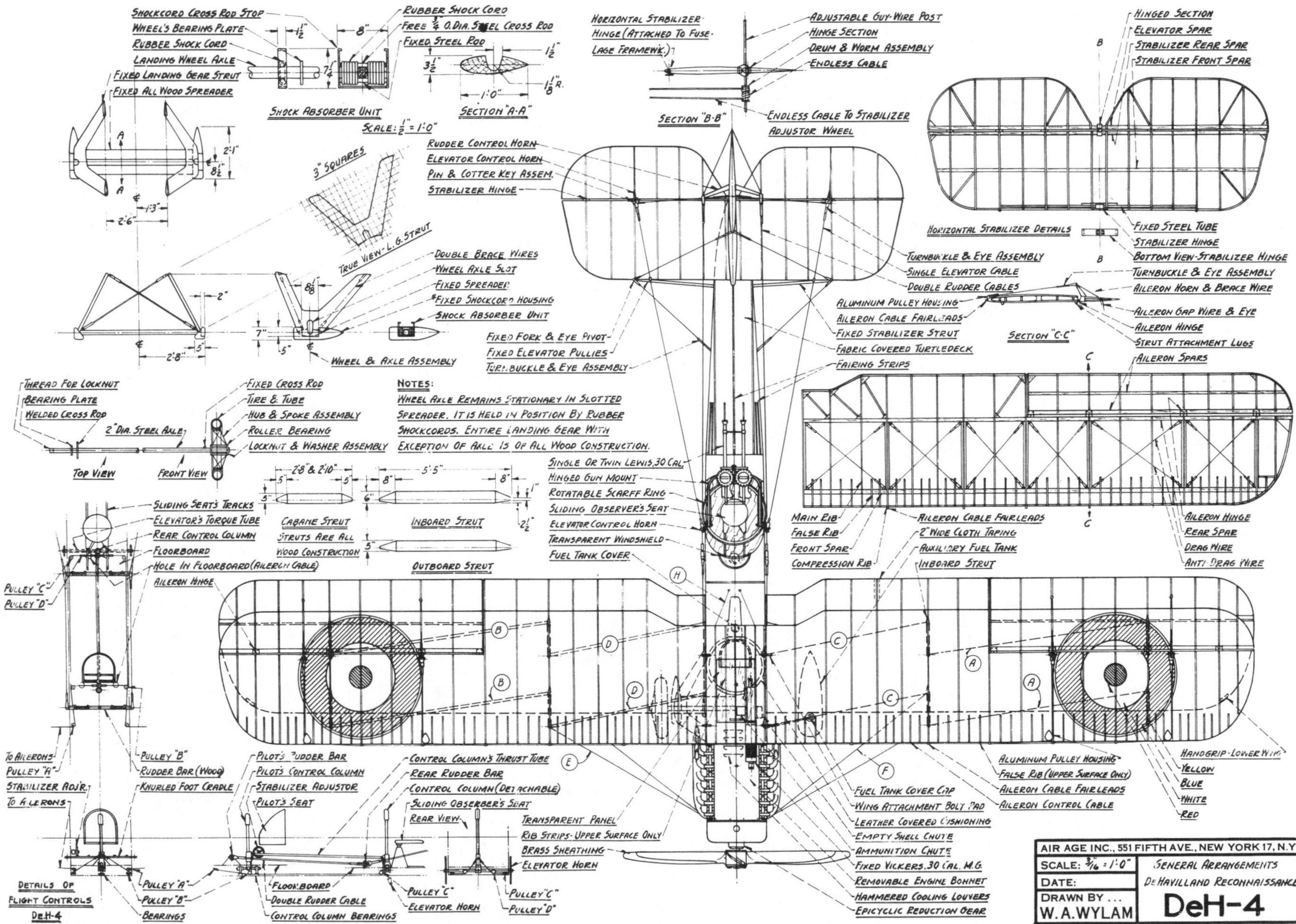
Later versions of the D.H.4 made use of the Rolls-Royce Falcon engine and later still the Eagle engine, which produced 375 hp.

Throughout the history of aviation, airplanes have been given nicknames, most of them of a complimentary nature, and which were supposed to describe the plane's most outstanding characteristics. "Flaming Coffin" was attached to the D.H.4 early in its career, because the fuel tank was positioned between the cockpits. Its excellent handling qualities and large speed range encouraged development, and in the DH-4B (American designation) the pilot was moved back and the tank forward.

Six D.H.4's are left, in various models in various conditions. □

Entered into service in 1916, the D.H.4 had a long and productive life despite its reputation as a "flying death trap." "Model Airplane News" photo.





AIR AGE INC., 551 FIFTH AVE., NEW YORK 17, N.Y.

SCALE: $\frac{3}{16}'' = 1'-0''$ GENERAL ARRANGEMENTS

DE HAVILLAND RECONNAISSANCE

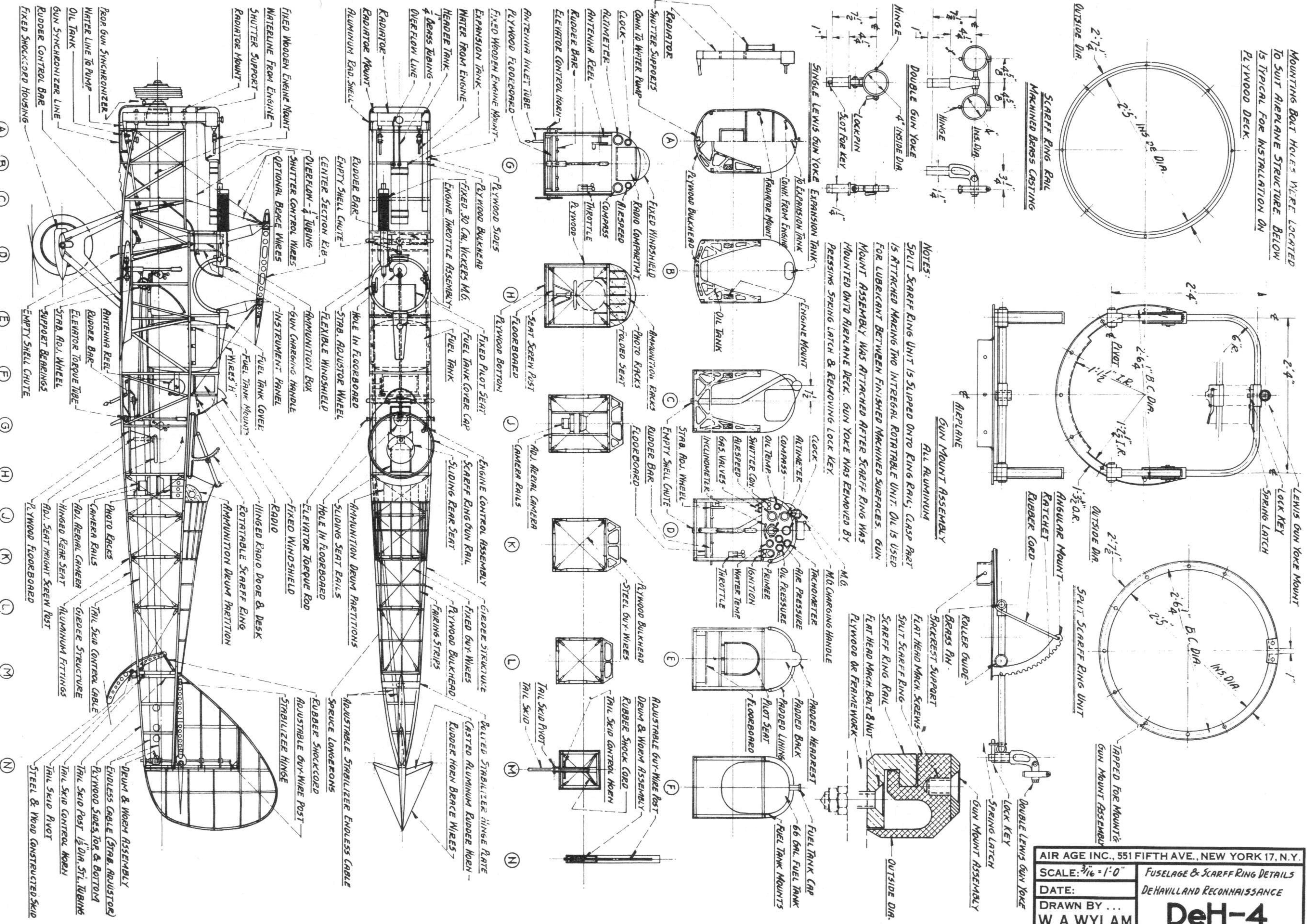
DRAWN BY ...

W.A.WYLAM | Den-4

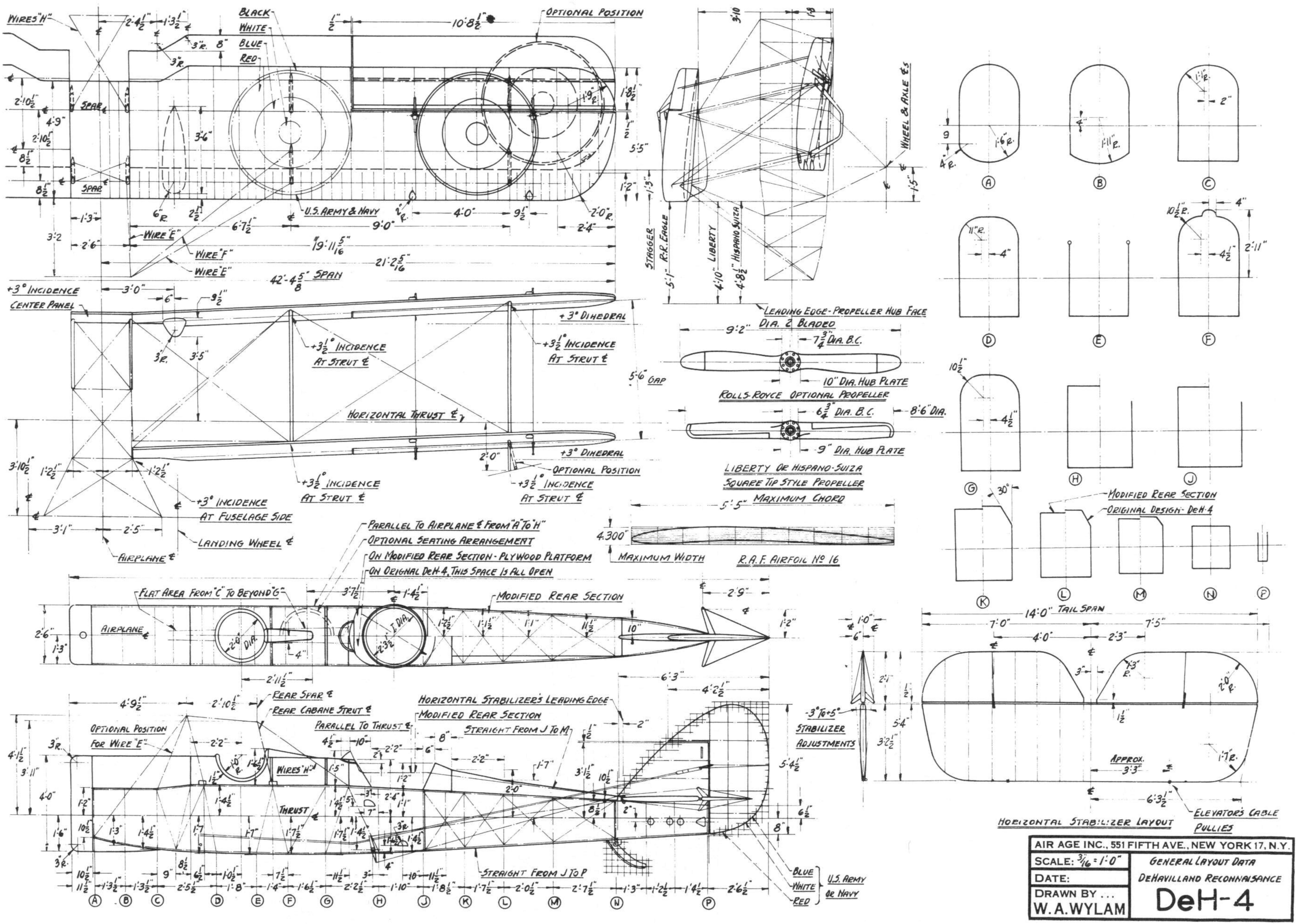
Digitized by srujanika@gmail.com

DeH-4

MOUNTING BOLT HOLES WERE LOCATED
TO SUIT AIRPLANE STRUCTURE. BELOW
IS TYPICAL FOR INSTALLATION ON
PLYWOOD DECK.

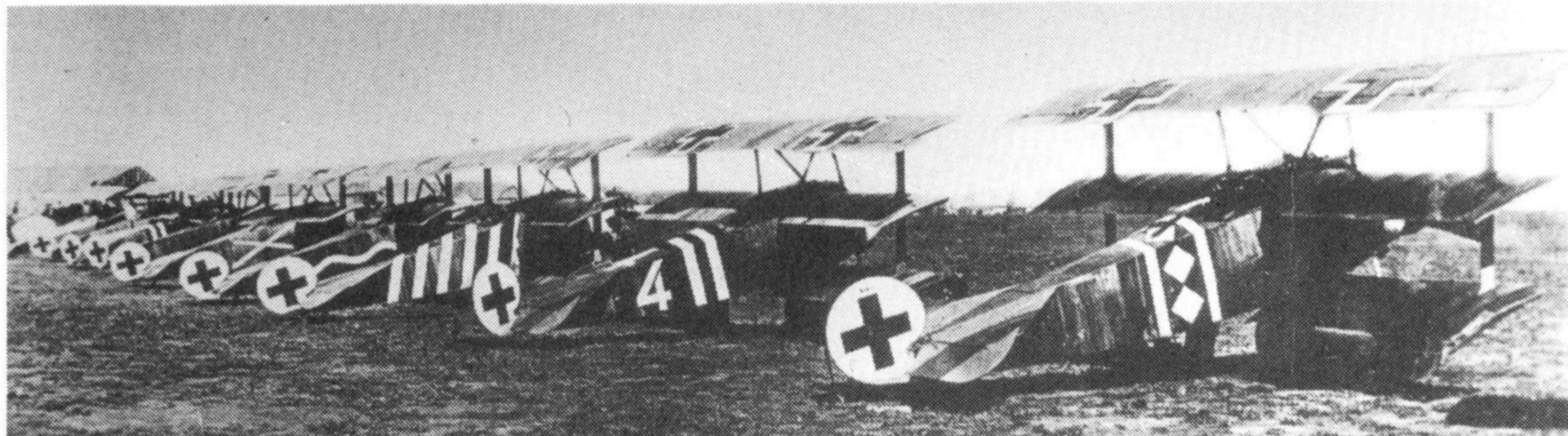


| | |
|---|--------------------------------|
| AIR AGE INC., 551 FIFTH AVE., NEW YORK 17, N.Y. | |
| SCALE: $\frac{3}{16} = 1'-0''$ | FUSELAGE & SCARFF RING DETAILS |
| DATE: | DEHAVILLAND RECONNAISSANCE |
| DRAWN BY ... W.A.WYLAM | DeH-4 |



Fokker Dr.1

drawings by JOSEPH NIETO



An airplane without flying wires, particularly a fighter, was unheard of in 1915. Anthony Fokker proved that self-supporting flying surfaces were not only practical but advantageous in his triplane. Air Age file photos.

ONE OF the most unusual fighters of WW I, the Fokker Triplane was also the most agile fighting machine during that period. Designed for dog fighting, the ship was unequaled in its ability to outmaneuver anything in the air. It quickly became apparent to German fighter pilots that the Dr.1 was the ship to fly when Manfred von Richthofen scored a victory on his first time out with the new design. The second time out he scored another. It also became apparent to British pilots that the Germans had

something to reckon with.


One of the most unusual aspects of this design, other than its being a triplane, was that it had no wires. Today this seems academic, but in 1915 design engineers fully expected the wings to fold on any airplane that had non-supported flying surfaces. This airplane proved that a cantilever wing was not only possible, but practical.


Powered by the Oberursel rotary engine rated at 110 hp, the triplane had a top speed of 97 mph and a ceiling of

18,000 feet. The rate of climb was nearly 2,000 fpm and the landing speed in zero wind was only 30 mph. It was feather light on the controls and could literally turn on a dime, causing a near blackout to the pilot at the controls.

Von Richthofen was shot down in one.

Although the service period of the triplane was only seven months, it remains one of the most remembered aircraft of WW I. No original Triplane survived the war. □





Fokker D.VII

drawings by JOSEPH NIETO



Probably the most famous of German WW I aircraft was the Fokker D.VII. Ernst Udet, shown below, was an advocate of the design, although he preferred the D.VIII. Air Age file photos.

EARLY in May 1918, pilots assigned to the French sector began to meet increasing numbers of a strange new German pursuit plane. They observed it flying with squadrons of Albatros and Pfalz single-seaters, perhaps two or three to a flight. The new ships stayed pretty well back and very seldom engaged in a dog fight, but they impressed Allied pilots by their ability to bound around in the air like a rubber ball. This new plane, the D.VII, was the shot in the arm the Germans were looking for.

Among modelers and WW I aviation enthusiasts, the question always arises as to which was the best plane of that period. The Fokker D.VII certainly will have its supporters in any such discussion. Simplicity was the keynote of the design. The fuselage was of wire-braced welded steel tubing (the Germans did not trust welds in tension); the tail was all-steel. The wings were each built on two massive wooden box-spars, and there was no wire rigging. Most examples




of the aircraft were powered by the Mercedes D.III engine, rated at 160 hp; however, later models were fitted with Daimler and B.M.W. engines for high altitude.

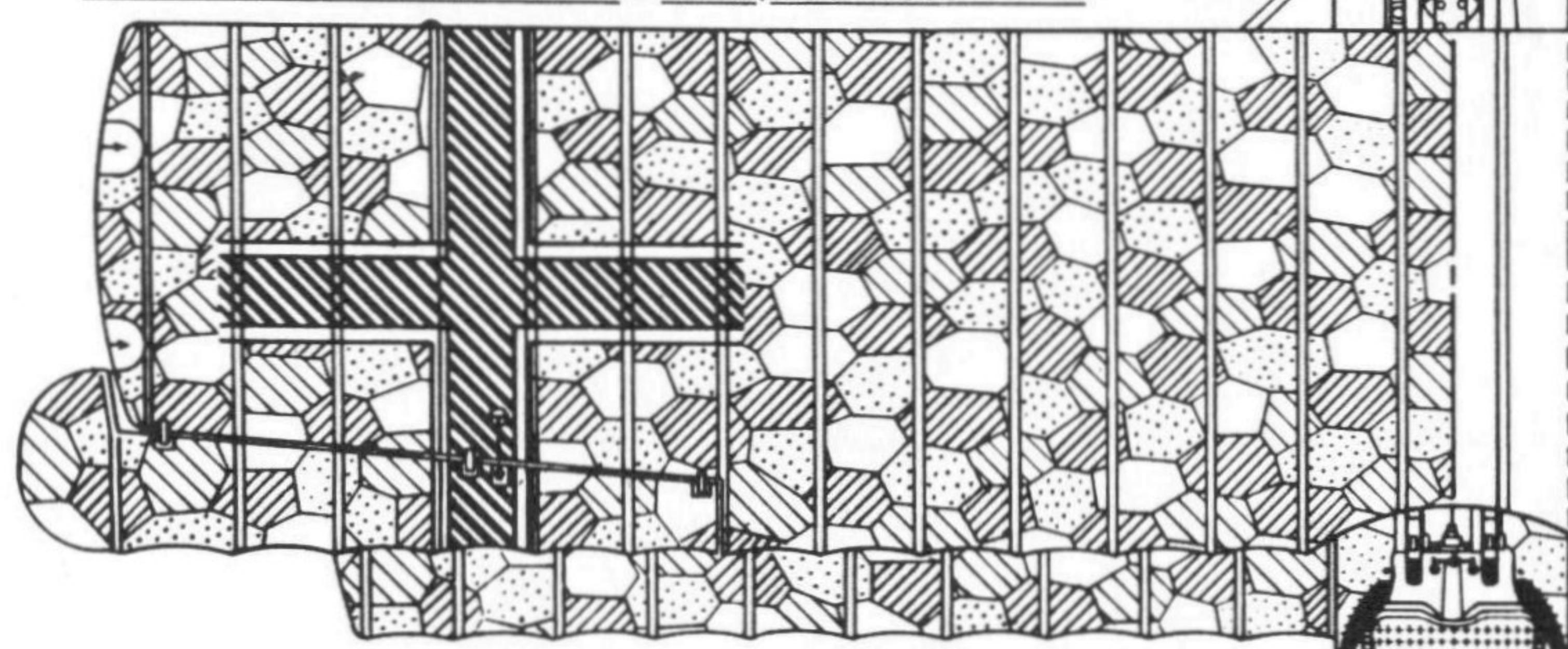
Two Spandau machine guns were mounted directly in front of the pilot, and the combination of pilot, machine, and firepower added up to a formidable

weapon for the Germans. From a historical standpoint, the Fokker D.VII will always hold a special significance as one of the most interesting airplanes ever built: it was the only German airplane by name to be mentioned in the Treaty of Versailles.

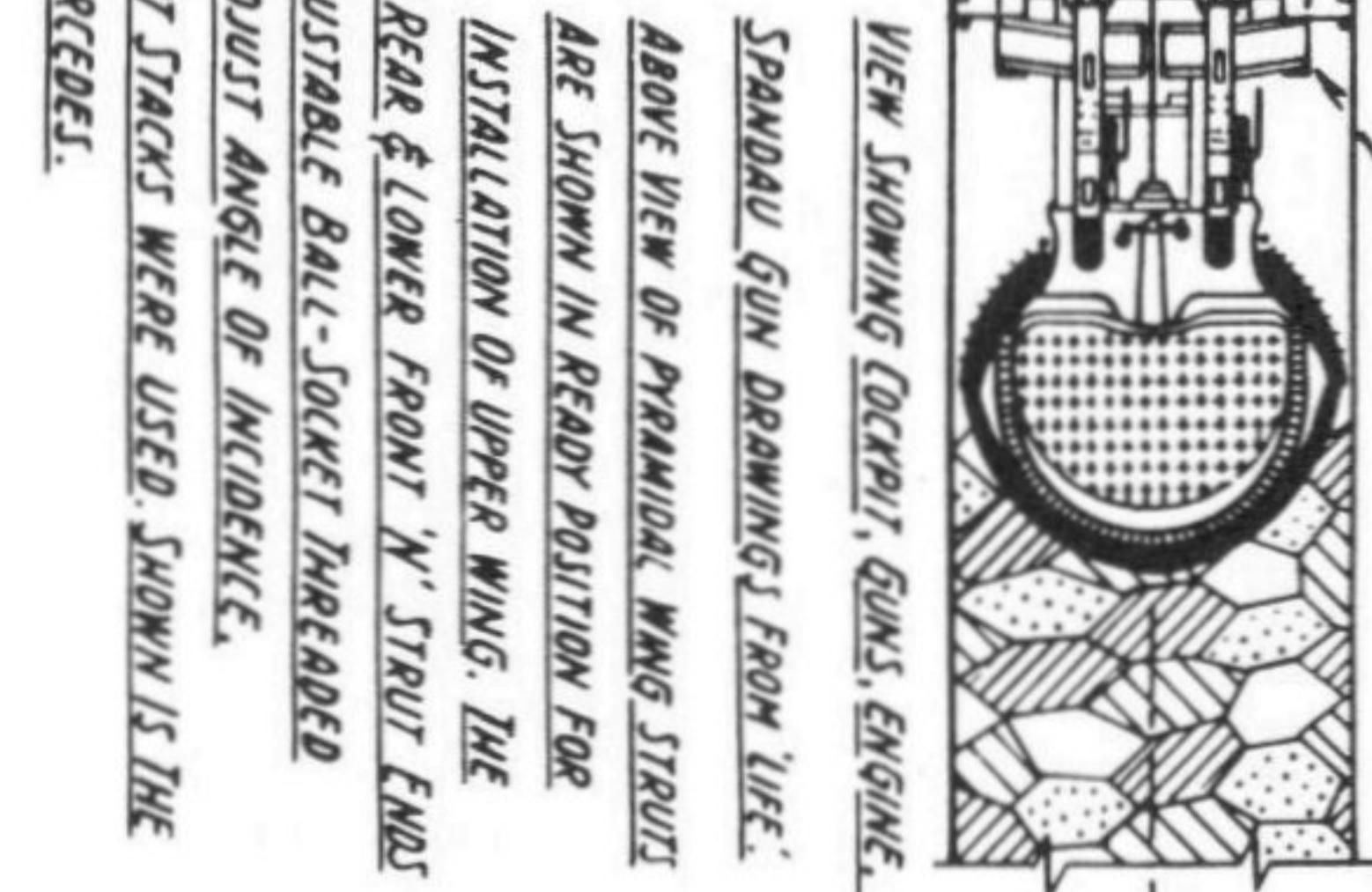
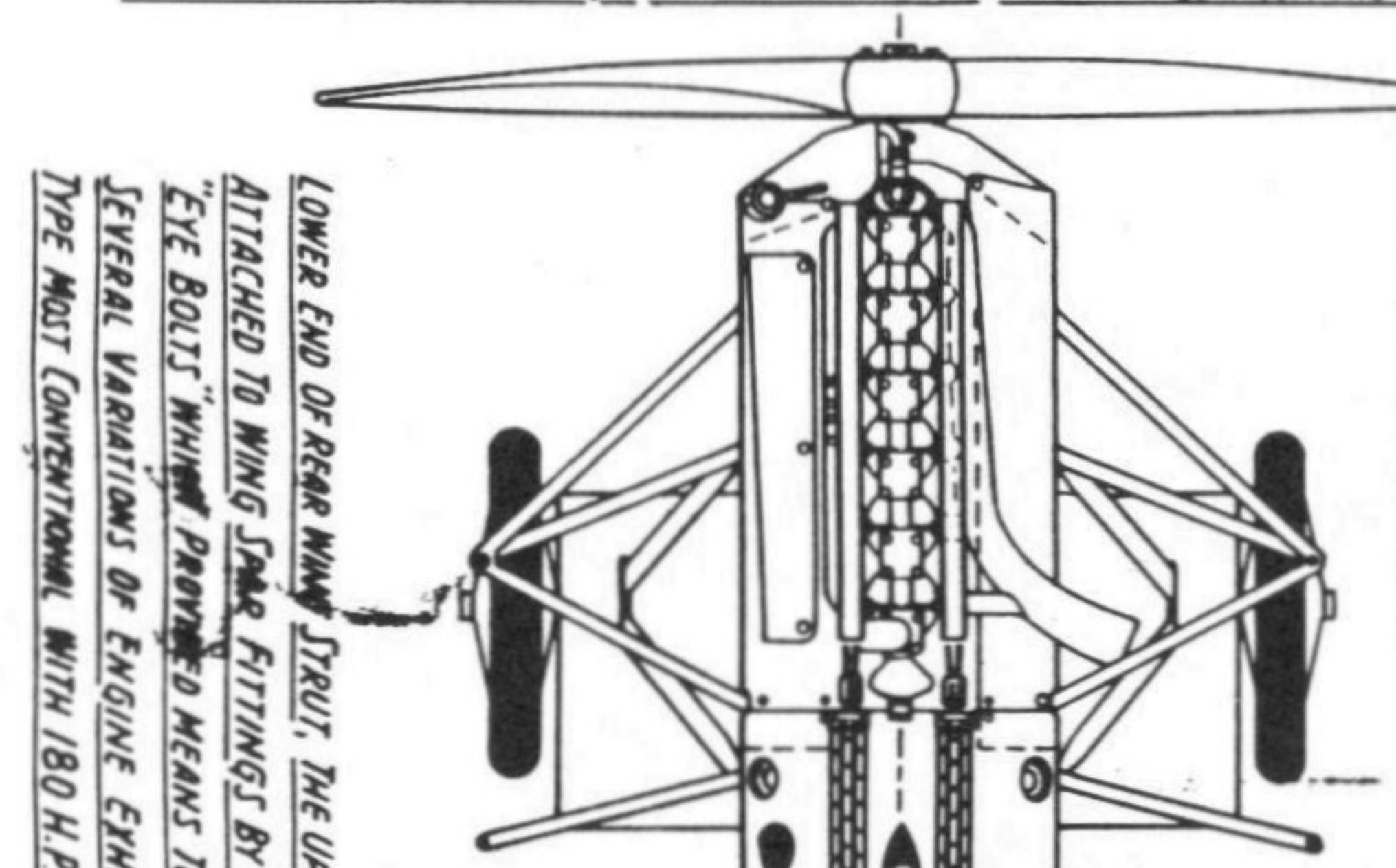
Seven original D.VIIs are in museums all over the world. □



THE VERSATILE FLEXIBILITY OF THE FOKKER D-VII WAS SUCH THAT IT WAS NOT RESTRICTED TO THE USE OF ANY PARTICULAR TYPE OF ENGINE. ORIGINALLY, THE D-VII WAS POWERED WITH THE B.M.W. IIIA ENGINE OF 185/200 H.P. ALTHOUGH THE 160 AND 180 H.P. MERCEDES WERE STANDARD EQUIPMENT, D-VII'S PERFORMED ADMIRABLY WITH SUCH VARIATIONS AS THE 110 H.P. HALL-SCOTT A7-A, THE 225 H.P. 12 CYL. PACKARD 1237, AND THE BRITISH 230 H.P. SIDDELEY "PUMA". THE DEGREE OF INCIDENCE WAS



GENERALLY, THE FOKKER D-VII WAS DECORATED WITH ALL THE COLORS SUITED TO FANCIFUL TASTE. SHOWN IN PART IS THE CHARACTERISTIC STYLE OF GERMAN CAMOUFLAGE WITH COLOR CODE ON OPPOSITE PAGE. ONE CAPTURED D-VII WAS PAINTED FROM THE NOSE TO PILOT'S



DIMENSIONS:

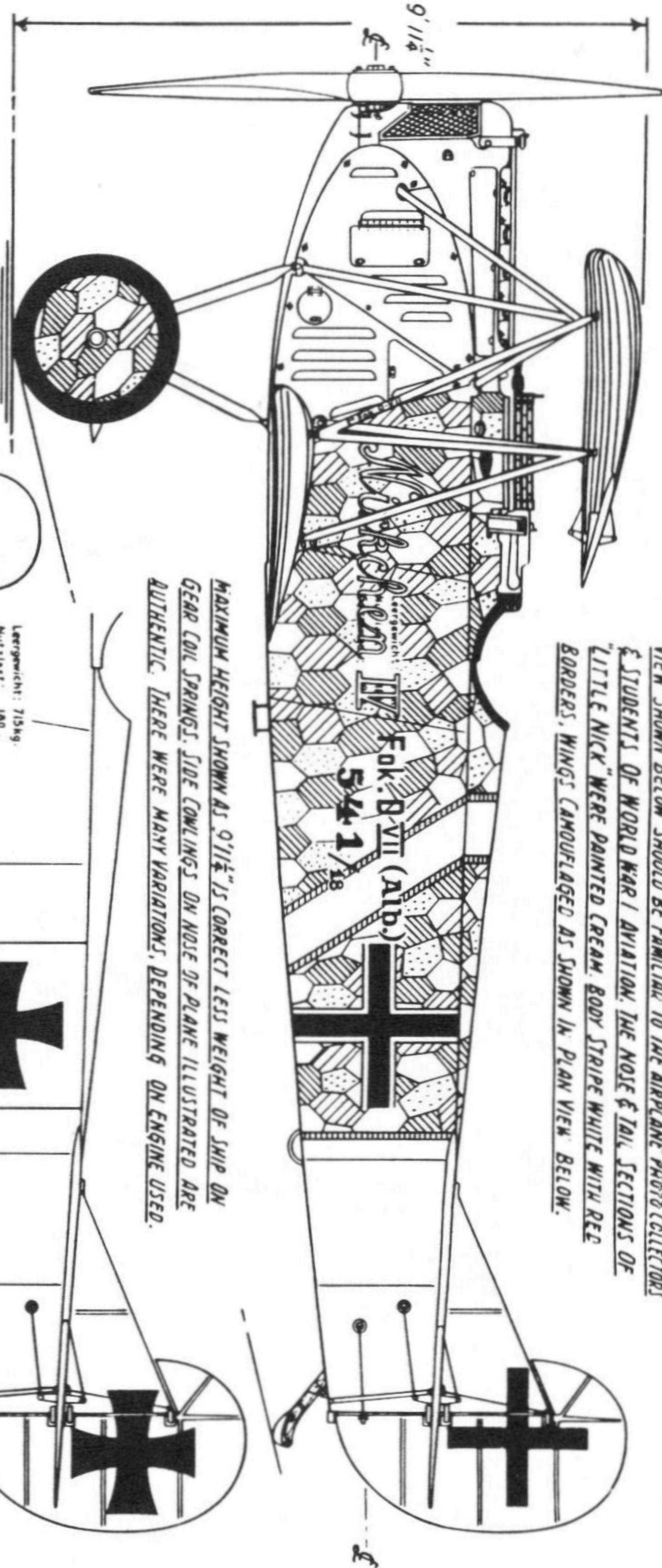
| | |
|------------------------------------|-------------|
| WINGSPAN, UPPER PLANE. | 29' 3 1/2" |
| " " LOWER " | 23' 3 1/2" |
| CHORD, UPPER PLANE. | 5' 3" |
| " " LOWER " | 4' 0" |
| OVERALL LENGTH. | 22' 11 1/2" |
| GAP BETWEEN PLANES (AT BODY SIDE). | 4' 3 1/2" |

AREAS:

| | |
|---------------------------------|---------------|
| UPPER PLANE INCLUDING AILERONS. | 140.7 SQ. FT. |
| LOWER PLANE. | 78.3 .. |
| AILERONS (TOTAL OF TWO). | 11.4 .. |
| BALANCED PART OF AILERONS. | .5 .. |
| STABILIZER. | 21.1 .. |
| ELEVATORS (TOTAL OF TWO). | 15.2 .. |

ADJUSTABLE AND DEPENDED ON TYPE OF ENGINE USED. (WITH THE 180 H.P. MERCEDES, INCIDENCE WAS 0°) FOLLOWING IS A CONCISE SUMMARY OF RESULTS DETERMINED AT WRIGHT FIELD WITH THE 180 H.P. MERCEDES-POWERED D-VII (COURTESY, ARMY AIR FORCE)


| - ALTITUDE (FT.) - | - SPEED - | - TIME - |
|--------------------|-----------|----------|
| 3,281 | 116.6 | 4' 15" |
| 6,552 | 114.1 | 8' 18" |
| 9,843 | 109.7 | 13' 49" |
| 13,124 | 103.5 | 22' 48" |
| 16,405 | 94.9 | 38' 5" |




MAXIMUM HEIGHT SHOWN AS 9' 11 1/4" IS CORRECT LESS WEIGHT OF SHIP ON GEAR COAL SPRINGS. SIDE COALINGS ON NOSE OF PLANE ILLUSTRATED ARE AUTHENTIC. THERE WERE MANY VARIATIONS, DEPENDING ON ENGINE USED.

VIEW SHOWN BELOW SHOULD BE FAMILIAR TO THE AIRPLANE PHOTO COLLECTOR & STUDENTS OF WORLD WAR I AVIATION. THE NOSE & TAIL SECTIONS OF "LITTLE NICK" WERE PAINTED CREAM. BODY STRIPE WHITE WITH RED BORDERS. WINGS CAMOUFLAGED AS SHOWN IN PLAN VIEW BELOW.

THE THIN, STRAIGHT, BLACK CROSS INSIGNIA AS SHOWN IN SIDE VIEW DIRECTLY ABOVE, WAS THE LATE-1 TYPE USED BY GERMANY IN 1918. NARROW WHITE BORDER TRIM.





Fokker E.V/D.VIII

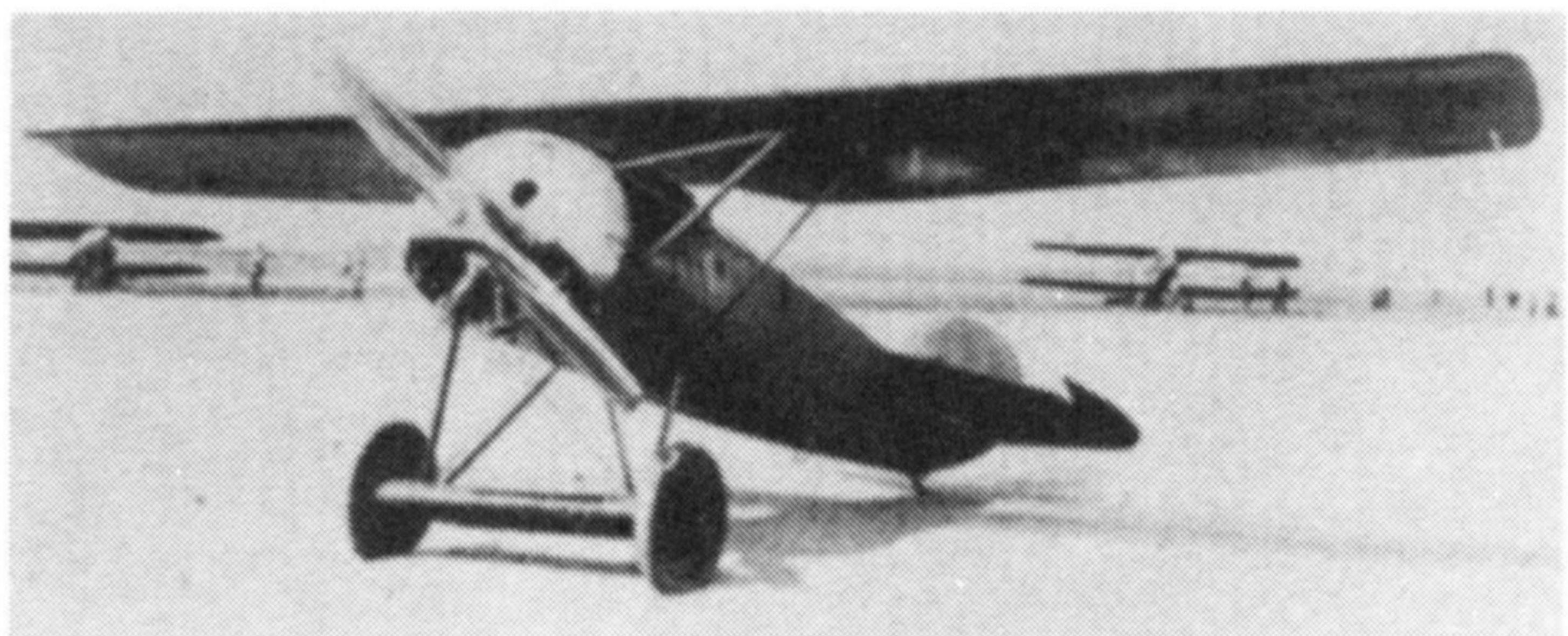
drawings by PHILLIP DREWS



The Fokker D.VIII was unique in several respects. Full cantilever wing, no struts and good performance gave its pilots a tremendous advantage over their foes. Photo courtesy of "Fokker, the Man and the Aircraft."



The 110-hp Oberursel rotary, Siemens-Halske, Goebel, and Le Rhone engines were used on various versions of the D.VIII.



An extremely clean design for WW I, the Fokker D.VIII was a formidable weapon in the hands of German pilots.

DURING the closing weeks of WW I, there appeared over the front lines a nimble little monoplane that is generally credited as being the finest fighter of its day. This was the famous Fokker D.VIII of the German Imperial Air Force.


Powered by a rotary Oberursel engine of 110 hp, the D.VIII had a speed of 127 mph. It climbed at a rate of 1,500 fpm and could ascend over 4 miles high. In its ability to maneuver and dive it was unequaled. The first production E.V's (called D.VIII) were so badly built by the Fokker factory that several crashes resulted, and the type was grounded until the defects could be located and remedied. By the time proper construction procedures were established at the factory, the War was almost over; the D.VIII saw almost no service.


Also known as the Fokker E.V and the "Flying Razor," it gained much of its reputation in the hands of the famous German pilot Ernst Udet. Even after the war Udet toured small German towns giving mock demonstrations of aerial dog fights. Strangely, these illegal performances were not detected by the Allied Occupation authorities.

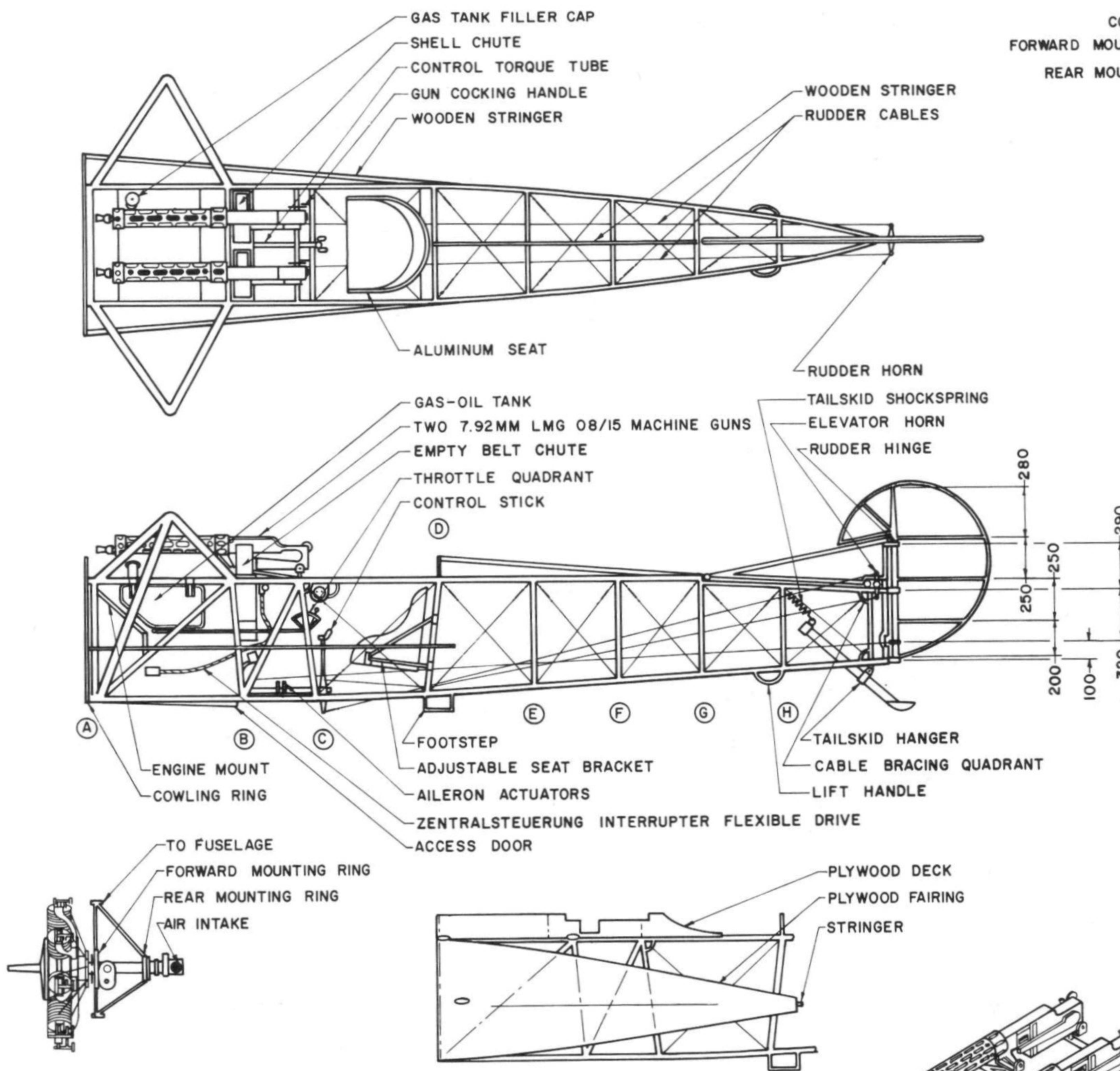
Of the many designs credited to Anthony Fokker, the D.VIII or E.V was probably one of the best—and most controversial.

Note: recent research has shown that the two spars in each wing were not parallel, as in Drews' drawing, but tapered together toward each tip—and each spar was made in one piece.

One D.VIII survives, now on exhibition in Italy. □



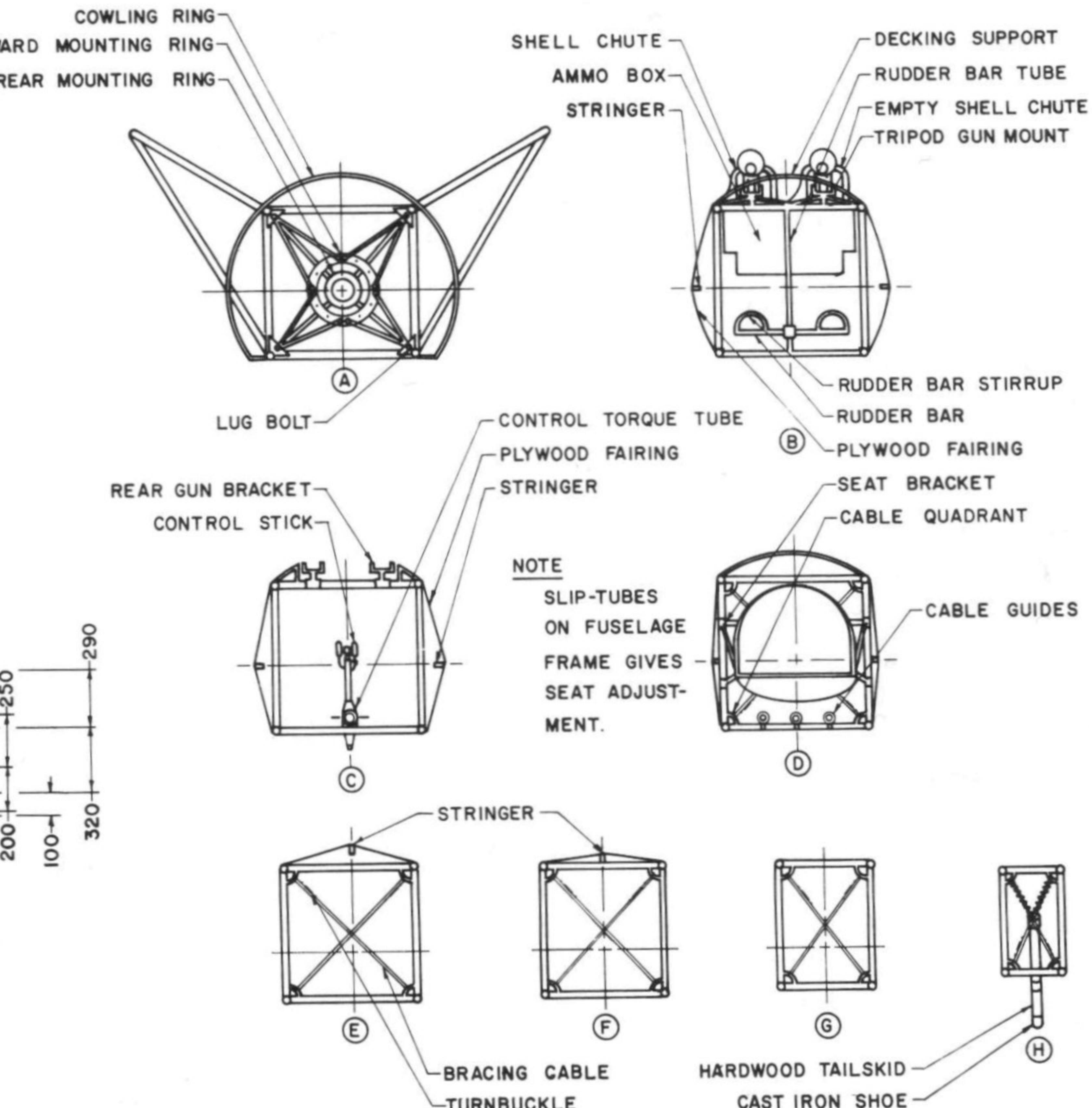
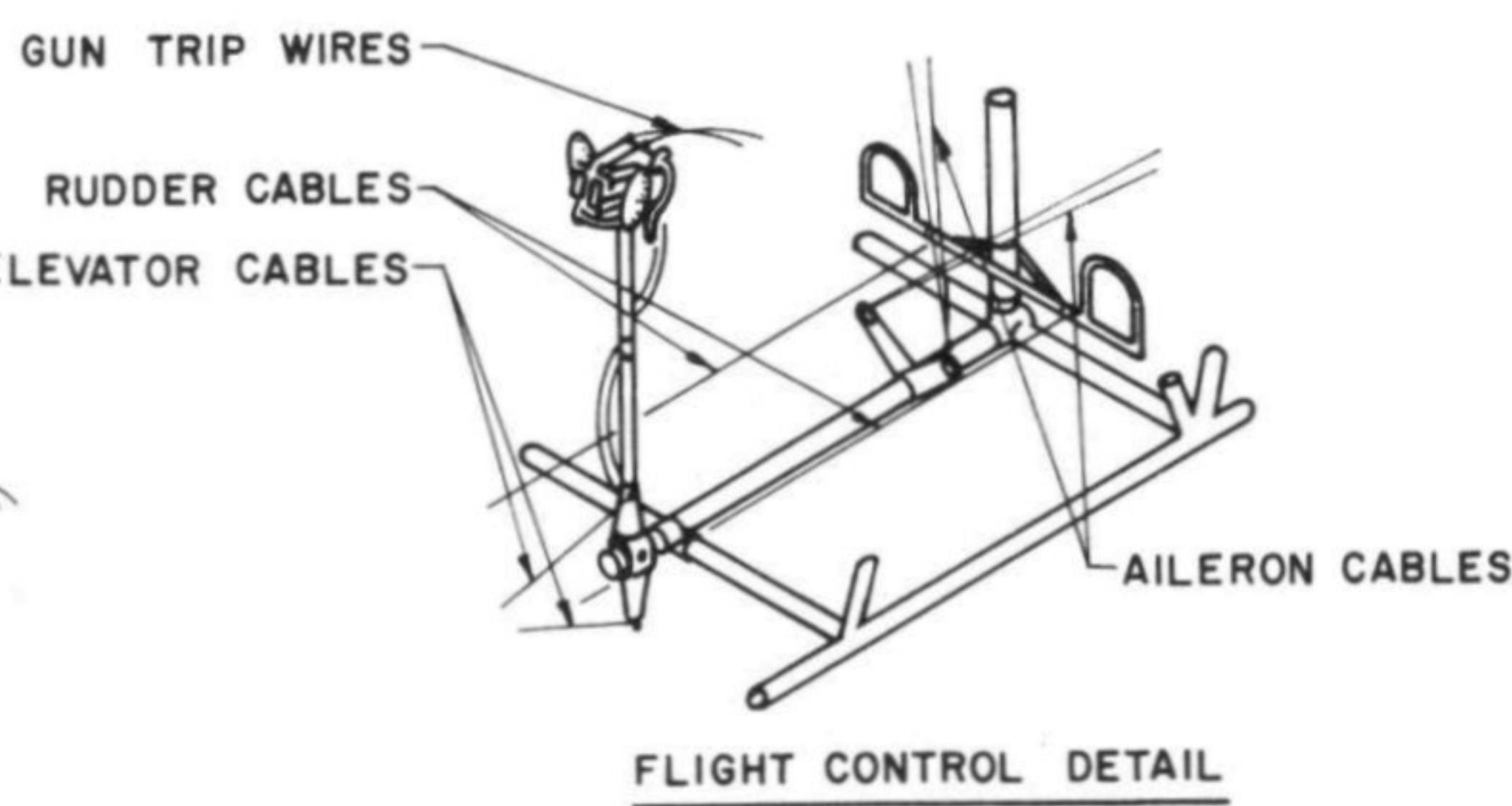




ENGINE INSTALLATION

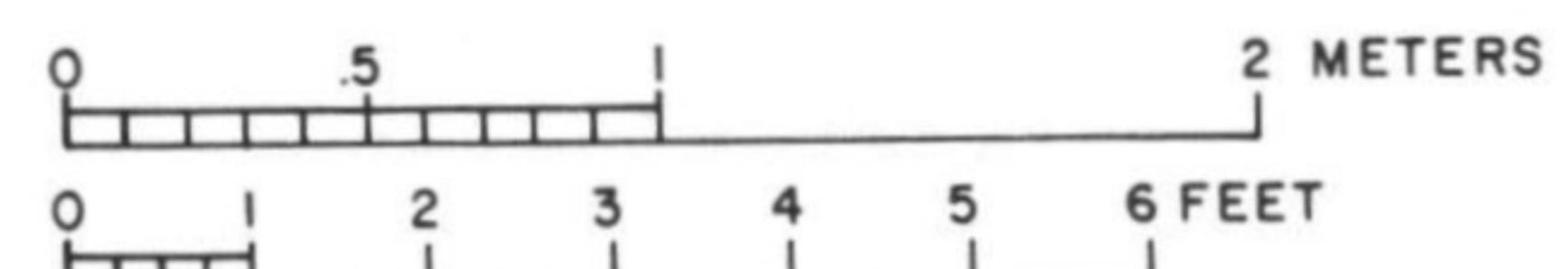
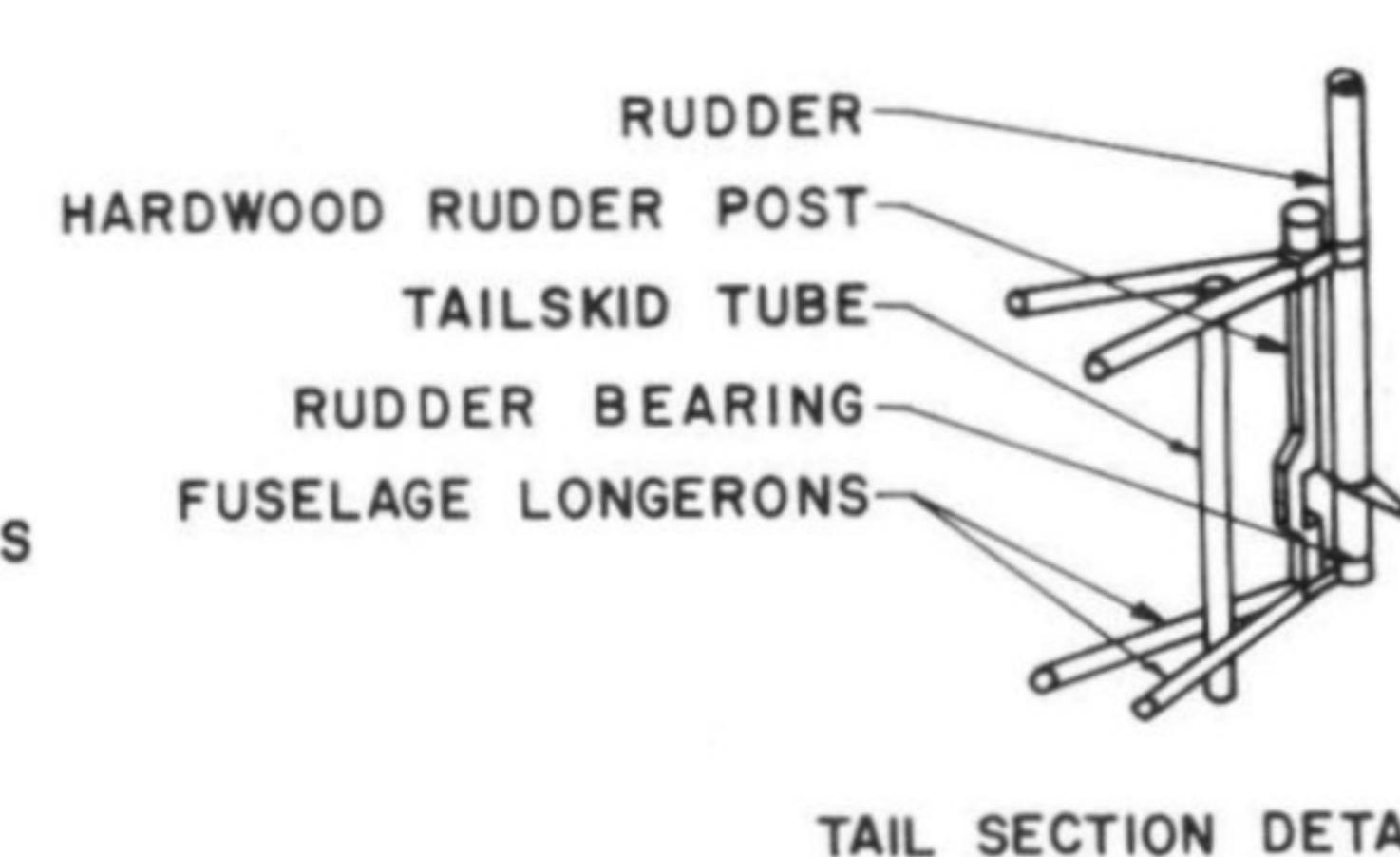
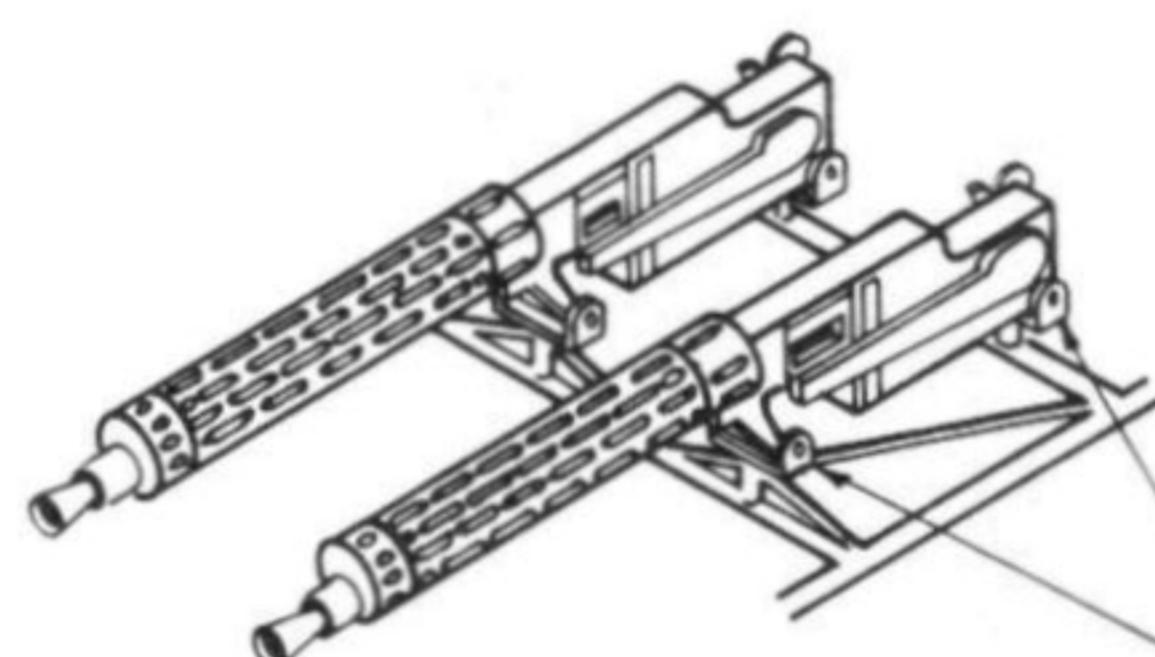
NOTE

ENGINE AND MOUNT WERE REMOVABLE
AS A SINGLE UNIT



REAR GUN BRACKET

NOTE
SINGLE CABLE WAS LOOPED THROUGH CORRESPONDING
QUADRANTS AND MATED TO A SINGLE TURNBUCKLE. NO
ANCHORING CLEVIS WAS NEEDED.



| | |
|---------------------------|--|
| DRAWN BY PHILLIP DREWS | 1918 FOKKER EV/DVIII FUSELAGE DETAILS |
| DATE: FEBRUARY 1973 | |