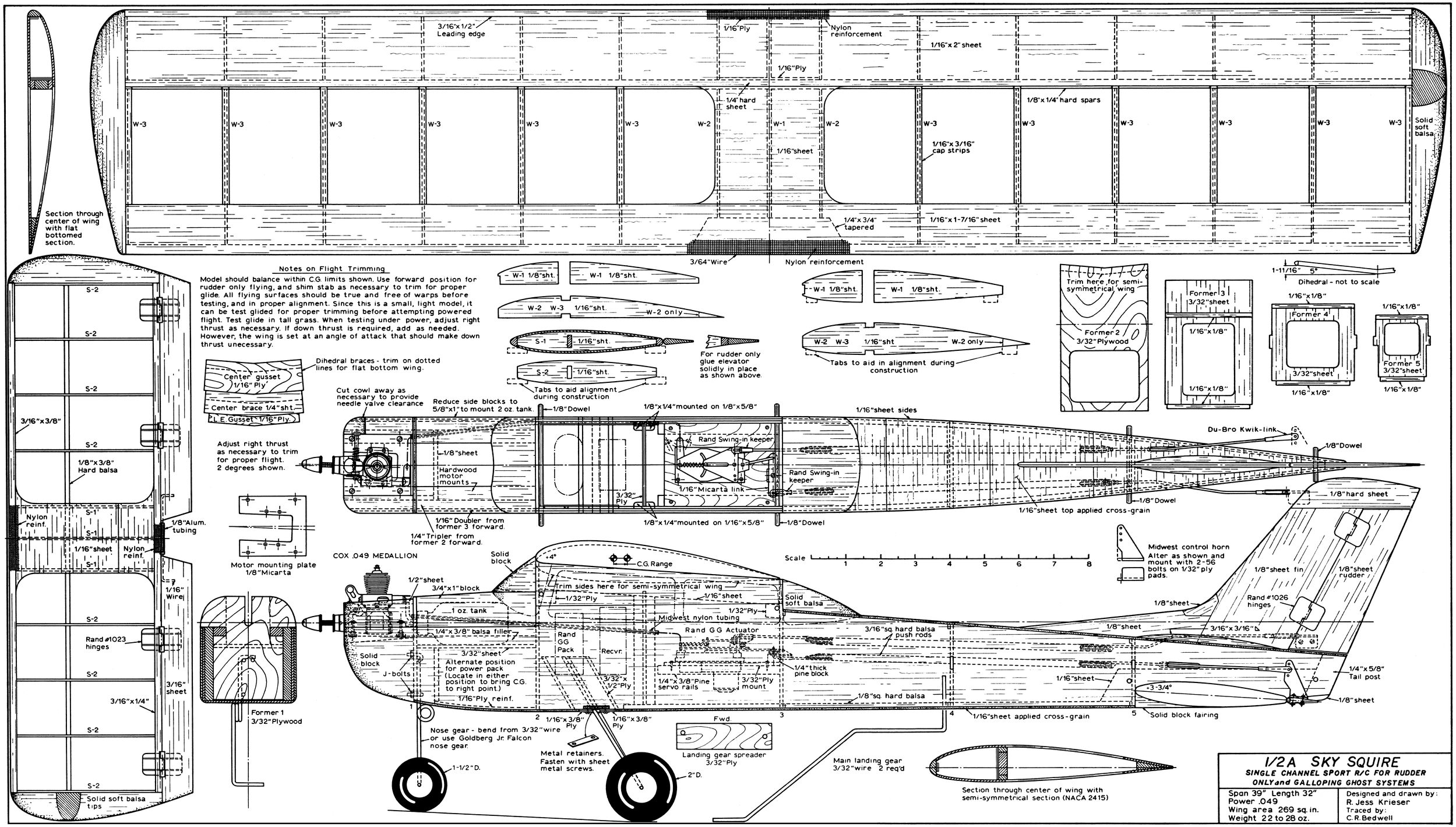
3/16"x1/2" Leading edge
1/16"Ply
Nylon reinforcement
1/16"x 2" sheet
1/16"Ply
1/4" hard sheet
1/8"x1/4" hard spars
W-3
W-2
W-1
1/16"sheet
1/16"x 3/16" cap strips
Solid soft balsa
Section through center of wing with flat bottomed section.
1/4"x 3/4" tapered
1/16"x 1-7/16" sheet
3/64" Wire
Nylon reinforcement
Notes on Flight Trimming
Model should balance within C.G. limits shown. Use forward position for rudder only flying, and shim stab as necessary to trim for proper glide. All flying surfaces should be true and free of warps before testing, and in proper alignment. Since this is a small, light model, it can be test glided for proper trimming before attempting powered flight. Test glide in tall grass. When testing under power, adjust right thrust as necessary. If down thrust is required, add as needed. However, the wing is set at an angle of attack that should make down thrust unecessary.
W-1 1/8"sht.
W-2 W-3 1/16"sht.
W-2 only
S-1
1/16"sht.
S-2
Tabs to aid alignment during construction
For rudder only glue elevator solidly in place as shown above.
W-2 only
Tabs to aid in alignment during construction
Trim here for semi-symmetrical wing
Former 2 3/32" Plywood
Former 3 3/32" sheet
1/16"x1/8"
1-11/16"
5°
Dihedral - not to scale
Former 4
3/32" sheet
Former 5 3/32" sheet
Dihedral braces - trim on dotted lines for flat bottom wing.
Center gusset 1/16" Ply
Center brace 1/4" sht.
L.E. Gusset 1/16" Ply.
Cut cowl away as necessary to provide needle valve clearance
Reduce side blocks to 5/8"x1" to mount 2 oz. tank.
1/8" Dowel
1/8"x1/4" mounted on 1/8"x5/8"
1/16" sheet sides
Adjust right thrust as necessary to trim for proper flight. 2 degrees shown.
1/8" sheet
Hardwood motor mounts
Rand Swing-in keeper
1/16" Micarta link
3/32" Ply
1/8"x1/4" mounted on 1/16"x5/8"
1/16" Doubler from former 3 forward.
1/4" Tripler from former 2 forward.
1/16" sheet top applied cross-grain
Du-Bro Kwik-link
1/8" Dowel
1/8" hard sheet
S-2
3/16"x3/8"
1/8"x3/8" Hard balsa
Nylon reinf.
S-1
1/8" Alum. tubing
1/16" sheet
1/16" Wire
Rand #1023 hinges
3/16" sheet
3/16"x1/4"
Solid soft balsa tips
Motor mounting plate 1/8" Micarta
COX .049 MEDALLION
Solid block
1/2" sheet
3/4"x1" block
1 oz. tank
1/4"x3/8" balsa filler
3/32" sheet
Alternate position for power pack (Locate in either position to bring C.G. to right point.)
J-bolts
1/16" Ply reinf.
Former 1 3/32" Plywood
+4°
C.G. Range
Trim sides here for semi-symmetrical wing
1/32" Ply
1/16" sheet
Midwest nylon tubing
Rand GG Pack
Recvr.
Rand GG Actuator
3/32"x 1/2" Ply
1/4"x3/8" Pine servo rails
3/32" Ply mount
1/16"x3/8" Ply
Nose gear - bend from 3/32" wire or use Goldberg Jr. Falcon nose gear.
Metal retainers. Fasten with sheet metal screws.
Fwd.
Landing gear spreader 3/32" Ply
1-1/2" D.
2" D.
Main landing gear 3/32" wire 2 req'd
Scale 1 2 3 4 5 6 7 8
Midwest control horn
Alter as shown and mount with 2-56 bolts on 1/32" ply pads.
Solid soft balsa
1/32" Ply
3/16"sq. hard balsa push rods
1/4" thick pine block
1/8"sq. hard balsa
1/16" sheet applied cross-grain
Solid block fairing
1/8" sheet fin
1/8" sheet rudder
1/8" sheet
Rand #1026 hinges
3/16"x3/16"
1/4"x5/8" Tail post
+3-3/4°
Section through center of wing with semi-symmetrical section (NACA 2415)
1/2A SKY SQUIRE
SINGLE CHANNEL SPORT R/C FOR RUDDER ONLY and GALLOPING GHOST SYSTEMS
Span 39" Length 32"
Power .049
Wing area 269 sq. in.
Weight 22 to 28 oz.
Designed and drawn by: R. Jess Krieser
Traced by: C.R. Bedwell