

NASS SPORT JET SPEED Rules, 2-15-2015

All A.M.A. rules from the control line general and control line speed sections shall be applicable, except as follows:

1) **AIRFRAME & CONTROL SYSTEM:**

1.1 Any design configuration and construction method is permissible so long as the contest management considers the model to be safe.

1.2 The control system, consisting of leadouts (if used), bellcrank, pushrod and control horn will be totally exposed and external to normal airplane contours. The leadout wires (or flight wires if no leadouts are used) will not be recessed into the wing, the pushrod will not be mounted inside the fuselage or behind the wing airfoil, nor will the bellcrank be allowed to be mounted or hidden inside the wing or fuselage. The bellcrank must be mounted within 4 inches of the body of the model. The leadout tip guides may be inset into the wing but should not be more than 1/4 inch in length. The entire control system as defined above must be visible when the model is viewed in plain view from top and/or bottom with the controls in neutral

1.3 The maximum weight of the aircraft in ready-to-fly condition including fuel shall be 45 ounces.

2) **LINES & PULL TEST:**

2.1 The model must be flown on two single strand steel control lines of .022 minimum diameter. The distance between the centerline of the fuselage and the center of the control handle grip shall be a minimum of 60 feet.

2.2 The control lines must be connected using either 1" long scissor type connectors (pylon #149) or equivalent or mono line type buttons mounted to the bellcrank. The latter method must be used in conjunction with line leadout guides in order to prevent the lines from rolling off the buttons in the event of a crash. The minimum inside diameter of the buttons must be .125".

2.3 The model and entire control system, lines and handle shall receive a forty two (42) g pull test, engine will receive a 40lb pull test.

3) **ENGINE:**

3.1 The allowed jet engines are the Dyna-Jet, Bailey Sport Jet, Jet Bill Sport Jet, OS II and the Hobby King.

3.2 It is required that the engine shall be in stock condition internally. No material may be removed or added to the engine or the valve retainer except as follows:

a. Engine head: The anodizing MUST be present in the intake throat and the 10 air passages. The last three fins on the head may be machined to a diameter of .020 less than the fin in front in order to receive a mounting strap or ring. Holes may be drilled into the head for purposes of engine mounting. The fins on the head of the engine must be exposed, and all or part of the fins may be removed from the head. Streamlined faring's ahead of the engine, if used, can only be attached to the fuel line. No extension of the front intake is allowed. No Cowlings, either attached to the head or fuselage are permitted. The valve face may be lapped as needed for routine maintenance. De-burring the Hobby

King valve face is permitted so long as the port opening dimensions are not altered.

b. Flowjector: The Flowjector on the Dyna Jet, Hobby King and OS II may be drilled out or filled and re-drilled to .052x2(max) to use the NASS 80/20 fuel. If the JB or Bailey Flowjector's are used, .028x12(max) in these engine's (3.3), they cannot be modified. If a tire pump is used to start the engine then a short piece of metal tubing may be installed into the tire pump connection to facilitate quick removal of the air supply hose. The threads on the tire pump connection may be machined off, or filled in so as to make a smooth surface to facilitate quick removal of the air supply hose.

c. Metering jet: Any metering jet may be used, and may be located anywhere between the tank and the flowjector.

d. Tailpipe: A stock tailpipe with ignition plug in place must be used. (starting ignition may be by means of a starting probe). Repaired tailpipes are permissible, provided, maximum diameter dimensions per rules, have been faithfully adhered to. The front surface of the tailpipe (combustion chamber screw ring) and the lock ring may be lapped.

e. Reed valve: Any commercially available valve may be used.

3.3 Interchanging of parts between the above listed engines are permissible.

3.4 ***Fuel delivery to the engine shall be by suction, no pressure feed is allowed, other than pressure supplied by pointing the tank fill tubes forward into the airstream.***

4) **FUEL:**

4.1 Fuel will be supplied by the contest management, 80% methanol & 20% nitro methane.

5) **OTHER:**

5.1 Scoring of the flight shall be a time of 1/2 mile (7 laps). Timing will start after the pilot has completed two or more laps in the pylon.

5.2 All other general rules for control line speed flying (attempts, number of models, competition flying from pylon, timing of flights, etc.) shall be applicable.

5.3 Entrant of the model shall, in each attempt for flight, participate as the pilot or an active member of the starting crew. The only acceptable exception to this rule would be if the entrant were handicapped and unable to perform pilot or starting crew duties, he must however be present at the field for the flight.

Note:

Pictures below are for examples only for any design configuration and construction method is permissible so long as the contest management considers the model to be safe.

