

March 14, 2001

Important Builder's Advisory

SPECIAL CAUTION!

To Dealers and Builders of more than one Titan.

Check Your Manual

NOTE:

Wing rib spacing was changed starting with Serial #0385. The wing drawing supplied with Serial #0384 and earlier must not be used with d-cells supplied with kit Serial #0385 and above. The instruction manuals supplied with Serial #0384 and earlier are **not interchangeable** with Serial #0385 and later.

The changes above involve wing rib spacing and rivet spacing. Wing spar damage will occur if the wrong manual is used.

Be especially cautious if you are building more than one aircraft.

Make certain that the serial number in your manual matches the serial number on your kit.

If you have any questions regarding this matter, please call the factory.

Best Regards,

TITAN AIRCRAFT

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President

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INSTRUCTIONAL MANUAL FOR TITAN TORNADO TWO PLACE AIRCRAFT

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CONTENTS

Section 1.....	Introduction, Parts List, Approved Engines
Section 2.....	Fuselage Assembly
Section 3.....	Wing Assembly
Section 4.....	Preflight Checklist Weight & Balance
Section 5.....	Maintenance
Section 6.....	Hardware Identification Cable Mounting Details
Section 7.....	FAA Information
Section 8.....	FAR Part 103 & USUA Information
Section 9.....	Options
Section 10.....	Supplemental



INTRODUCTION

We thank you for purchasing a Titan Tornado aircraft. The following are some general notes and guidelines regarding aircraft assembly.

The first step in the assembly process is to sit down and read through the entire instruction packet. This is necessary for two reasons. First is to familiarize yourself with the aircraft and its assemblies and second, to get comfortable with our somewhat unique style of instructions and to be able to find information from their pages as needed.

A brief description of our part number system is also needed. Here is a sample number:

TG92-16

“T” designates Tornado parts

“G” represents the location on the aircraft:

C = Control System

E = Instrumentation & Wiring

F = Fuselage

G = Landing Gear

H = Hardware

P = Engine and Prop

T = Tail

W = Wing

“92” is the year in which the number was assigned

“16” is the part number

When the construction process has begun, we recommend that every assembly be test fitted with clecos before final assembly. Most instruction pates do no mention this, but it must be done to ensure proper fit and alignment of the parts.

We recommend that a #30 split point drill bit be used for drilling rivet holes. A split point drill will not wander when you begin drilling. We also recommend the purchase of a long #30 split point drill. This will aid in such areas as wing and stablator construction.

All parts, especially drilled holes, must be deburred to prevent stress risers and crack propagation, which could cause part failure. To remove burrs from sheet metal, use a deburring tool or sandpaper, and for drilled holes use a deburring tool or 1/2" drill bit.



INTRODUCTION

(Continued)

All parts that are bonded together with epoxy or Uralane 8089 must have their mating surfaces sanded and degreased. Sanding parts provides a somewhat rough surface for the epoxy or Uralane to grab. Sanding also removes the oxidation layer from aluminum parts that provides a stronger bond. For this reason, aluminum parts can be degreased with either acetone or lacquer thinner. Do not allow acetone, lacquer thinner or other solvents to come in contact with any Lexan, wing D-Cell or other plastic and foam parts, as solvents will destroy most synthetic materials.

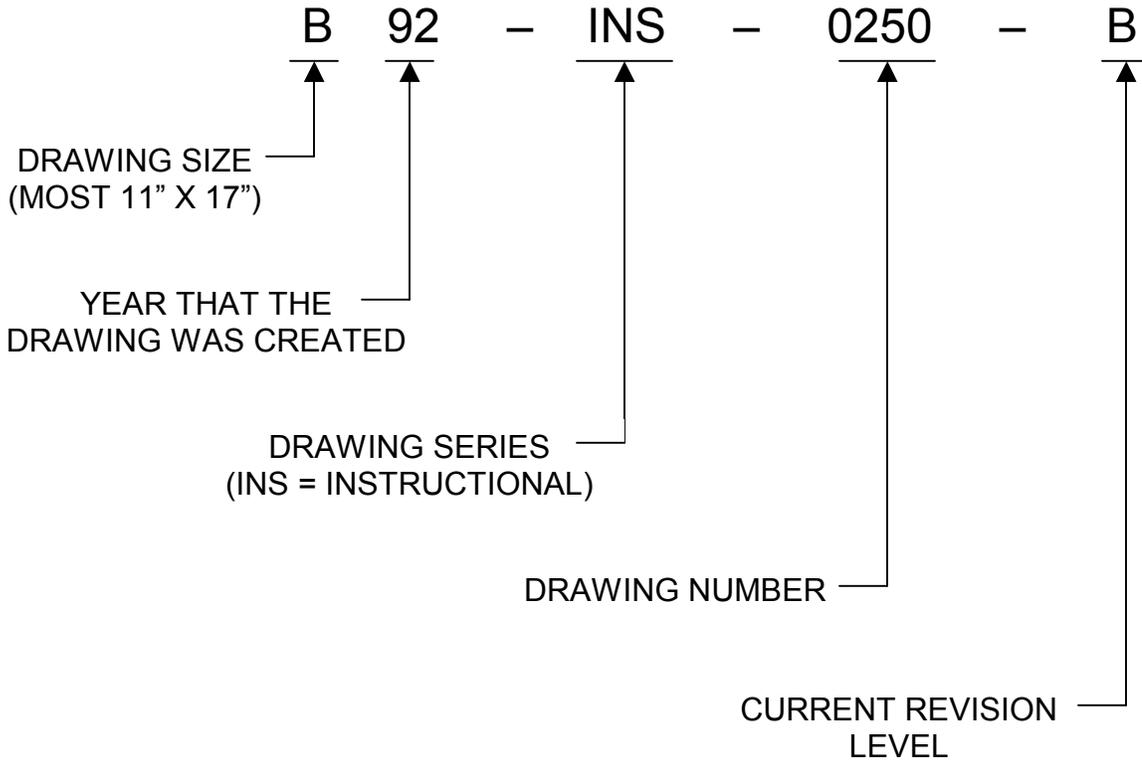
To provide corrosion resistance, all parts maybe painted. For steel, use any rust preventative paint. Aluminum parts should be painted with a two-part epoxy or zinc cromate system.

All moving parts must be lubricated. This includes cables where they ride through their guides, nico thimbles and shackles. This will provide much smoother operation and slow the wearing process of parts.

Once again, please read and understand the instruction packet before beginning to build the aircraft. If you have any questions, do not hesitate to contact us.



DRAWING NUMBER NOMENCLATURE



NOTE!!

As drawings are updated, the revision level is changed. Drawings are updated often to keep the documentation current with manufacturing techniques. Revised or changed drawings replace existing drawings in the manual, and it is possible that the drawing revision level does not match the revision level referenced in the written instructions. This is perfectly acceptable, as the correlation between the written procedure and the drawing does not change.



APPROVED ENGINES FOR TITAN TORNADO II

Rotax:	503
	582
	618
	912
	912S
Jabiru:	2200
	3300

ENGINES THAT HAVE BEEN MOUNTED

Rotax:	583
HKS:	700E
2SI:	UL1102
	690 L7-0
	430 F-40
	460- F-45
Midwest:	AE50R
	AE100R
Subaru:	EA81

VW Conversions: Such as Great Plains, Mosler

