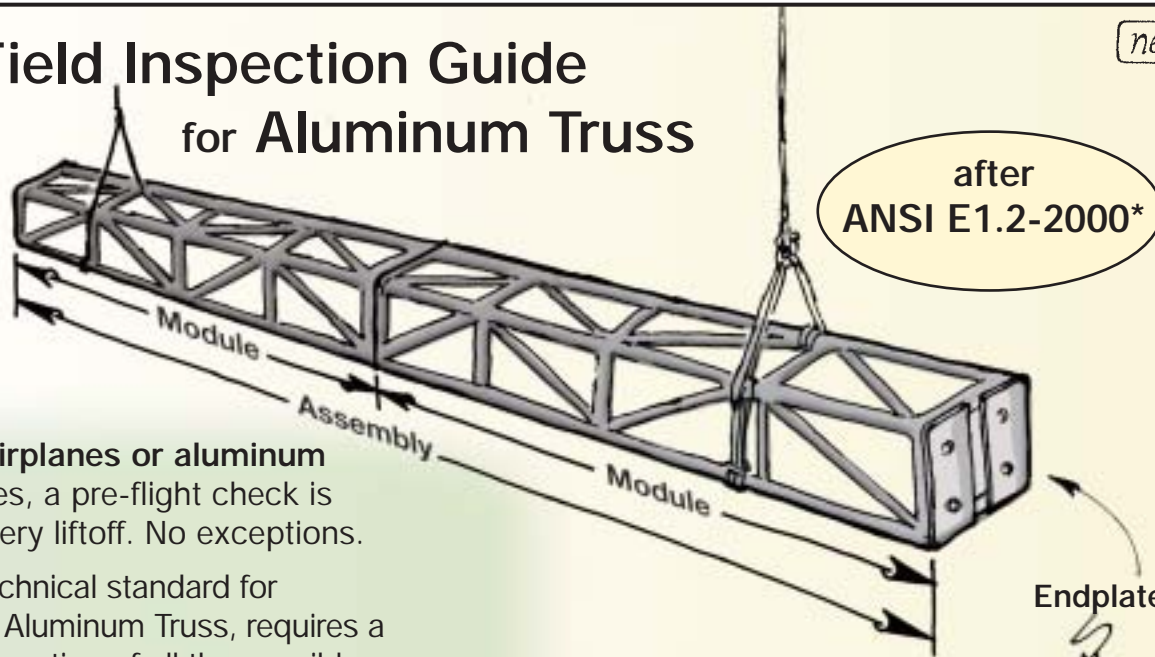
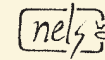


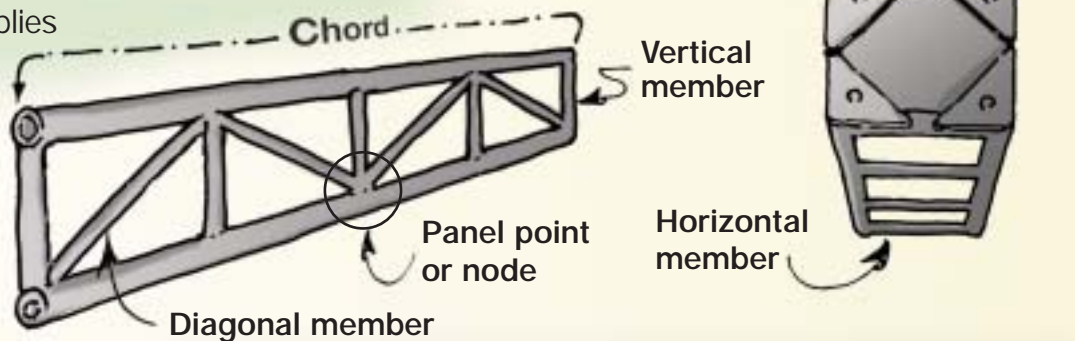
# User Field Inspection Guide for Aluminum Truss



**Whether it's airplanes or aluminum truss**, if it flies, a pre-flight check is required before every liftoff. No exceptions.

**ANSI E1.2\***, the technical standard for Entertainment Use Aluminum Truss, requires a thorough visual inspection of all the possible indicators of structural weakness on truss modules and truss assemblies prior to every use.

**Competent Person:** a person who is capable of identifying existing and predictable hazards in the work-place and who is authorized to take prompt corrective measures to eliminate them.



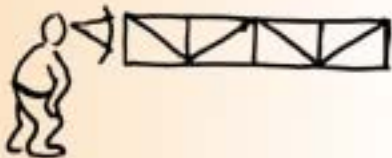
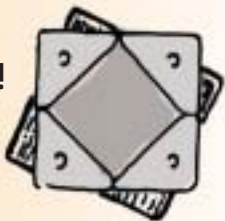
**Chord:** truss element that carries the axial (lengthwise) forces.

**Panel point (aka Node):** junction of one or more lacing members with a chord.

## Checking for Twist

Sight down the length of truss—  
See if the plates line up.

**Twist!**



The **Frequent Truss Inspection**, should be performed by a **competent person**, but it doesn't hurt for every technician that handles truss on its way from the truck to liftoff to know how to recognize the early signs of truss deterioration. Everyone will be safer if a lighting tech is able to spot a crack near a wiggle light she's hanging and can point it out to the head rigger.

The Checklist at right can be copied, laminated, and carried as a quick reference when performing the pre-flight check. Customize the Checklist by inserting CADs of the truss in your inventory.

\*For a copy of the complete standard, **ANSI E1.2-2000, Entertainment Technology – Design, Manufacture, and Use of Aluminum Trusses and Towers**, and all ESTA-developed Technical Standards, go to [www.estafoundation.org/pubs/browse.htm](http://www.estafoundation.org/pubs/browse.htm)

## Aluminum Truss Pre-Flight Checklist

Frequent Visual Inspection per ANSI E1.2-2000

### Chords

- ✓ Dents
- ✓ Bends
- ✓ Abrasion

### Diagonals

- ✓ Dents
- ✓ Bends
- ✓ Abrasion
- ✓ Missing

### Connecting plates

- ✓ Flatness
- ✓ Holes-deformation
- ✓ Holes-excessive wear

### Pinned connectors

- ✓ Deformation

### Welds

- ✓ Cracks
- ✓ Abrasion

### Fasteners

- ✓ Proper grading
- ✓ Deformation
- ✓ Excessive wear

### Geometry of truss

- ✓ Twisting of truss
- ✓ Squareness of truss
- ✓ Bending of truss



Replace w/ CADs of your truss

Truss model \_\_\_\_\_

Notes

Attach tape here for writing notes.

### Instructions:



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