

section 2

DEFINITIONS AND ABBREVIATIONS

TIRE NAME SIZE CLASSIFICATION

- Three Part Type** All new sizes being developed are in this classification. This group was developed to meet the higher speeds and loads of today's aircraft. NOTE: Some sizes have a letter such as "H" in front of the diameter. This is to identify a tire that is designed for a higher percent deflection.
- Radial** Radial size nomenclature is the same as Three Part except an "R" replaces the "-" (dash) before the wheel/rim diameter.
- Metric Type** This size designation is the same as Three Part except the diameter and section width dimensions are in millimeters, and the wheel/rim diameter is in inches.
- Type I** Oldest type/description giving outside diameter only.
- Type III** This type was one of the earliest size designations used for early piston-prop type aircraft. Its characteristic is low pressure for cushioning and flotation.
- Type VII** This type covers most of the older sizes and was designed for today's jet aircraft with its higher load capacity.

Tire Name Type	Tire Size Example	Nominal Diameter (Inches)	Nominal Section Width (Inches)	Nominal Wheel/Rim Diameter (Inches)
Three Part	49x19.0-20	49	19.0	20
Metric	670x210-12	670(mm)	210(mm)	12(in)
Type I	27	27	—	—
Type III	8.50-10	—	8.50	10
Type VII	49x17	49	17	—
Radial	32x8.8R16	32	8.8	16

- Ply Rating** The term "Ply Rating" is used to identify a given tire with its maximum recommended load when used in a specific type of service. It is an index of tire strength and does not necessarily represent the number of carcass plies in the tire.
- TT or TL** Designates whether the tire is tube-type or tubeless construction.
- Rated Speed** The maximum speed to which the tire is qualified.
- Rated Load** The maximum load rating in lbs.
- Rated Inflation** The rated inflation pressure required for the tire to support the rated load.
- Maximum Braking Load** The maximum steady braking load which may be applied to a tire.
- Maximum Bottoming Load** Approximate load required to bottom the tire on the rim at rated inflation pressure.
- Plant** The plant at which the tire was produced. *BRA – Brazil; DAN – Danville; *LUX – Luxembourg; THL – Thailand
*Goodyear no longer manufactures aircraft tires in Luxembourg.

Tread Design/ Trademark	RIB – Rib SMO – Smooth AW – All Weather G27 – Rib All Weather DT – Deflector Type DDT – Dual Deflector Type FLE – Flight Eagle	FLC II – Flight Custom II FLC III – Flight Custom III FLS II – Flight Special II FLDR – Flight Leader FLRAD – Flight Radial RS700 – Red Streak 700 Twin Contact
Part Number	The part number assigned to the tire if applicable.	
Weight	Calculated weight of approved construction.	
Inflated Dimensions	The dimensions of a new tire inflated to rated inflation pressure.	
Static Loaded Radius	Loaded Radius is the distance from the center of the axle to the deflected tread surface under normal load and inflation pressure.	
Flat Tire Radius	Flat Tire Radius is the distance from the center of the axle to the deflected tread surface when subjected to bottoming load.	
Aspect Ratio	Aspect Ratio is the ratio of tire section height to tire section width.	
Wheel	The dimensions of the wheel on which the tire is to be used.	