~ GUITAR ACTION & SETUPS ~

Measurements are all sensible *median* target numbers.

Workshop Humidity is best for repair & building on the drier side at 37-40%

1- Check that radius of fingerboard and saddle(s) match.
2- Check Relief and neck hump(s) at body join.

INTONATION

Pitch of open string should match pitch of string fretted at 12th fret WITHIN **5 cents** (common hearing)

Too *SHARP* - Move break angle of string over saddle **BAC*KWARD***

Too *FLAT* - Move break angle of string over saddle ***FORWARD***

1 Cent pitch difference = 0.014" break angle movement back/forward on saddle

on all common scale lengths (from standard Gibson 24.750 to Classical 650mm (25.656")

ACOUSTIC ACTION

Steel string guitar
High E: - 5/64th
Low E: 5 to 6- /64th
Relief: Straight to 0.008"

Classical guitar
High E: 3mm
Low E: 4mm
Relief: 0.010"
Strings above top at bridge: 12mm

Banjo: Strings above fret board at 12th fret: 1/8"

Ukulele
High E: 2.5mm
High: G- 2.5mm-3mm
Relief: 0.010"

Flamenco Guitar
High E: 2.5mm
Low E: 3mm
Relief: 0.010"- 0.015"
Strings above top at bridge: 8mm.

Mandolin
Treble: 1mm-1.5mm (1/16th)
Bass: Slightly higher than treble side.
Relief: 0.005" at 8th fret

Martin Bridge Thicknesses:
5/16" (7.9mm)- Low
11/32" (8.7mm)- Standard
3/8" (9.5mm)- Higher

ELECTRIC ACTION & PICKUP HEIGHT

Guitar: 2/32nd ~ Bass: 3/32nd

Les Paul
Neck- 3/32nd both sides
Bridge- 1/16th both sides

Strat
Neck- 1/8" bass, 3/32nd treble
Bridge- 1/8" bass, 3/32nd treble

Tele
Neck- 3/32 bass, 5/64th treble
Bridge- 3/32 bass, 5/64th treble

Bass
Neck- 3mm bass, 2mm treble
Bridge- 3mm bass, 2mm treble

STRING TENSIONS (Mostly D'Addario Strings)

- John Pearse Folk 16-43 PJ116 **85 lb**
- 10-47 (EJ15)- **133 lb**
- 11-47- (EJ40 Silk & Steel)- **127lb**
- 11-52 (EJ26's)- **148 l**b
- 12-53 (EJ16's) - **160 l**b
- 13-56 (EJ17's)- **185 lb**
- Classical strings low **80lb,** high **90lb**