



# TRUMPET

Even if you tune your instrument correctly, there are still some factors that will cause it to play out of tune. There are MANY factors that will affect pitch, but here is a summary of the most common:

FACTOR	AFFECT
Vowel Shape	An incorrect tongue position, or voicing," can greatly affect pitch. To correct <b>sharpness</b> in pitch, open up the space inside your mouth by saying "TAH." To correct <b>flatness</b> in pitch, arch your tongue by thinking of the syllable "TEE." Focus on increasing your air support and aiming the air stream forward.
Air Support	Slow, weak air speed will cause unsupported tone which may cause <b>sharp</b> pitch. Fast, over-blown air speed will cause wide, uncontrolled tone which may cause <b>flat</b> pitch.
Endurance Strength	As an individual plays over a period of time, the pitch may go <b>sharp</b> . However, playing when overtired will create flatness in <b>pitch</b> .
Temperature	<b>Warm</b> air temperature will cause the pitch to be <b>sharp</b> . <b>Cold</b> air temperature will cause the pitch to be <b>flat</b> . For best results, play in a space that is around 72 degrees Fahrenheit.
Dynamics	Playing <b>louder</b> dynamics will cause the pitch to be <b>sharp</b> . Playing <b>softer</b> dynamics air temperature will cause the pitch to be <b>flat</b> .
Equipment	An instrument that is not in good working order will cause poor pitch overall. Dents and mechanism misalignment are all signs of an instrument in need of a repair. Have the instrument checked by an instrument repair shop once a year.
Partials	Brass instruments are built off something called the harmonic series. Due to this configuration, different partials have different pitch tendencies: 1st, 2nd, 4th, 8th, 9th, 11th- okay in pitch 3rd, 6th, 12th partials: slightly <b>sharp</b> 5th, 10th partials: moderately <b>flat</b> 7th partial: very <b>flat</b>
Valve Combinations	The construction of the instrument causes different pitch tendencies with different valve combinations: 0, 2, 1 - okay in pitch 12- moderately <b>sharp</b> 23- moderately <b>flat</b> 13, 123- very <b>sharp</b>