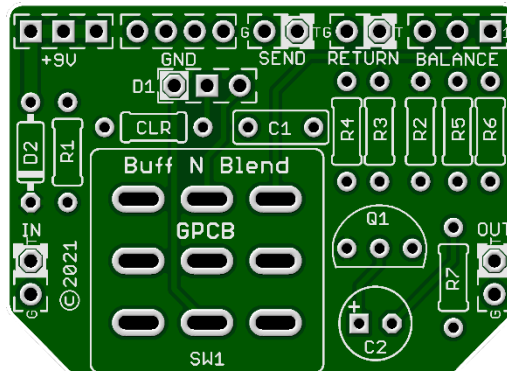


Buff N' Blend v2 2021

Add tonal superiority to your guitar pedal builds with our Buff N Blend circuit. Join the ranks of professional builders everywhere by adding a variable blend to your tone.

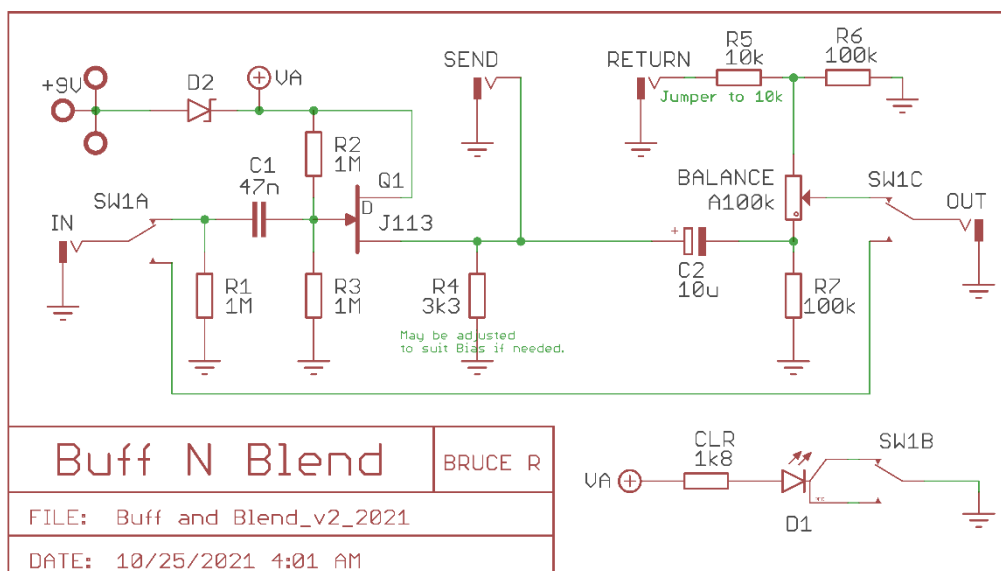
- Improves the definition and complexity of your tone.
- Create huge sounding riffs simulating two separate amp tones at the same time.
- Bass guitarists can add more bottom end into their mix making all their favorite pedals Bass friendly.
- Blend in the natural warmth of your amplifier.
- The Buffer extends your tone over long cable lengths and multiple pedals.
- Fits in the same space as your On/Off 3PDT foot switch and includes circuit protection.



Dimensions: 1.56" x 1.12"

Part	Value
R1	1M
R2	1M
R3	1M
R4	3k3
*R5	10k
R6	100k
R7	100k
CLR	1k8

Part	Value
C1	47n
C2	10u
**Q1	J113
BALANCE	A100k
D1	Status LED
D2	1N5817
SW1	3PDT-FS



Build Notes

***R5:** If the output from the effect(s) in the loop overpowers the input signal, replace the jumper with a resistor value somewhere between 1K and 10K. I have not experienced needing anything above 10k but you may go higher if needed.

**** Q1 - J113 or MPF102 are both excellent choices for a transparent buffer.**

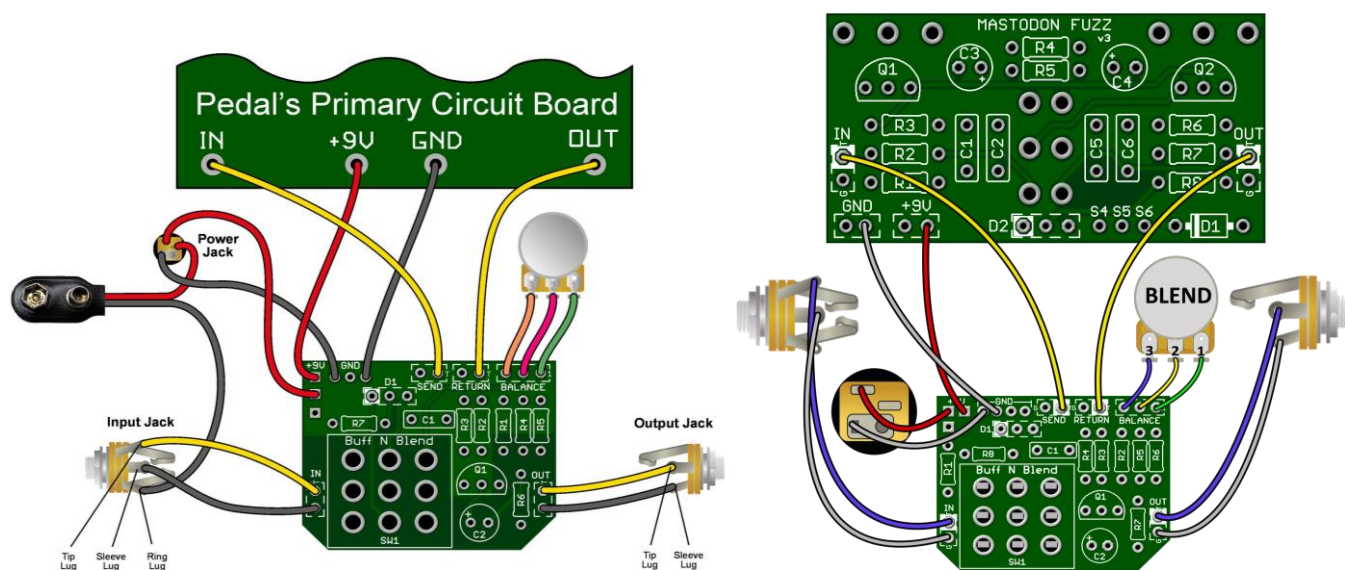
The **Buff N Blend** splits the original signal into two paths. One path sends a non-inverted signal to the blend pot. The other path routes the signal through a Send and Return loop that permits the injection of 1 or more external effects.” When these two paths are recombined at the Blend pot if there is a difference in phase, phase cancellations **"may"** result.

There is much information to help answer “Phase” questions. The discussion thread below has a decent list for circuits that invert the phase. That said a vast majority of popular circuits do not invert the phase. For more information read below.

[Pedals that invert the phase.](#)

For pedals that do invert the phase you can still use a Buff N Blend: Since the **Stage 3 circuit** inverts a signal you may add a **Stage 3** in the effects loop of the Buff N’ Blend. That will change an inverting circuit signal back to a non-inverting signal. Or add any other inverting effect to the loop. Two inverting effects equal one non-inverting signal. Be sure to also read our [Phase Follies Guide](#).

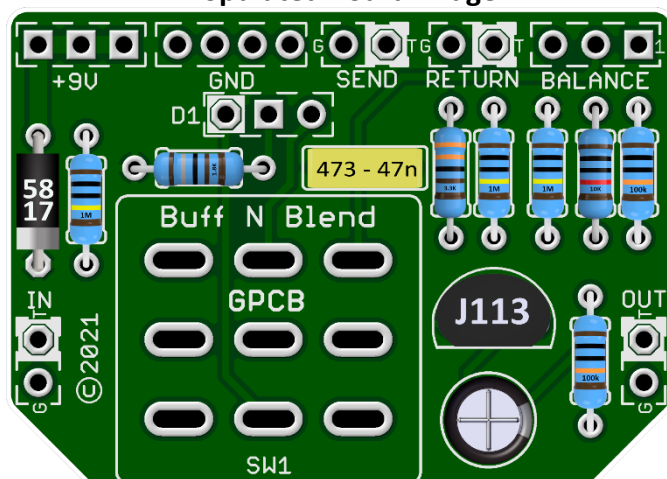
GuitarPCB also carries the larger and feature rich **Paramix** board for putting many pedal circuits in a loop w/ Mix and Phase function.



STATUS LED

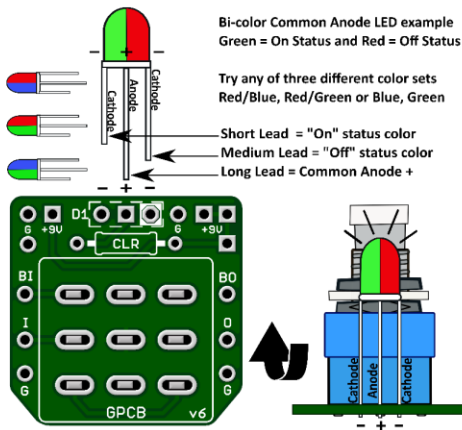
Note: If wiring the LED to the Buff N Blend board no need to connect S4, S5 & S6 or populate the LED or (CLR) on the main board since you are wiring your LED directly to our Buff N Blend board.

Populated Board Image

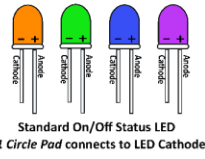
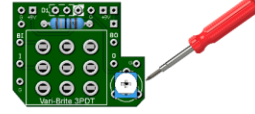




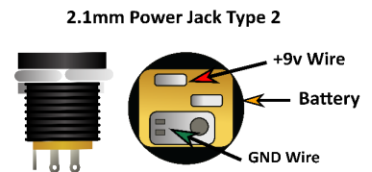
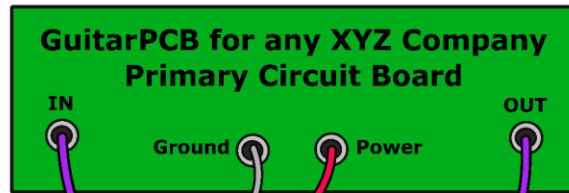
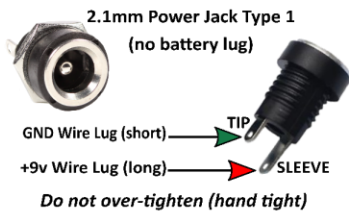
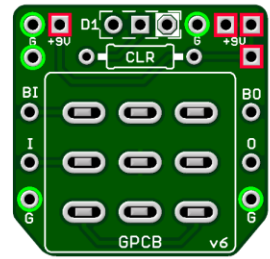
GuitarPCB Tip Sheet



Try our 3PDT Vari-Bright version w/ on-board Trimmer to adjust brightness

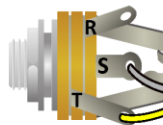


- Green = Ground Pads (5)
- Red = +9v Power Pads (4)
- D1 = LED Pads
- CLR = Current Limiting Resistor
- BI = From Main Board IN
- BO = From Main Board OUT
- I = To Jack Tip IN
- O = To Jack Tip OUT

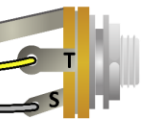


T = Tip
R = Ring
S = Sleeve

Stereo Jack (T-R-S)

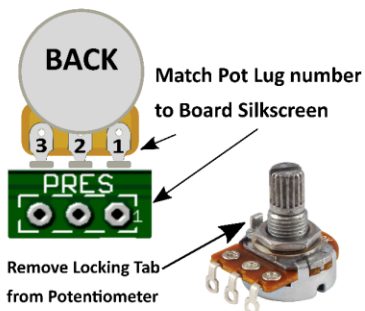


Mono Jack (T-S)

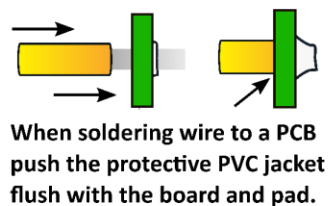
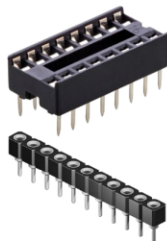


T = Tip
S = Sleeve

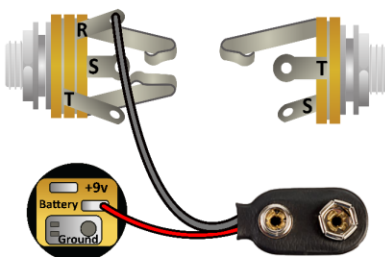
Multiple +9v and Ground Pads are convenient hookup points for additional circuits within the same enclosure. This also allows for diverse wiring schemes to suit individual needs.



Sockets make troubleshooting easier



Main Board IN/OUT Pads



Input/Output Jack Wiring T = Tip | R = Ring | S = Sleeve

A Stereo Jack is only needed if using a Battery. Otherwise use a Mono Jack
Battery Strap RED wire is connected to Power Jack
Battery Strap Black wire is connected to RING (stereo jack)
If wiring an LED to our 3PDT Wiring Board then S4, S5 & S6 are not needed



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