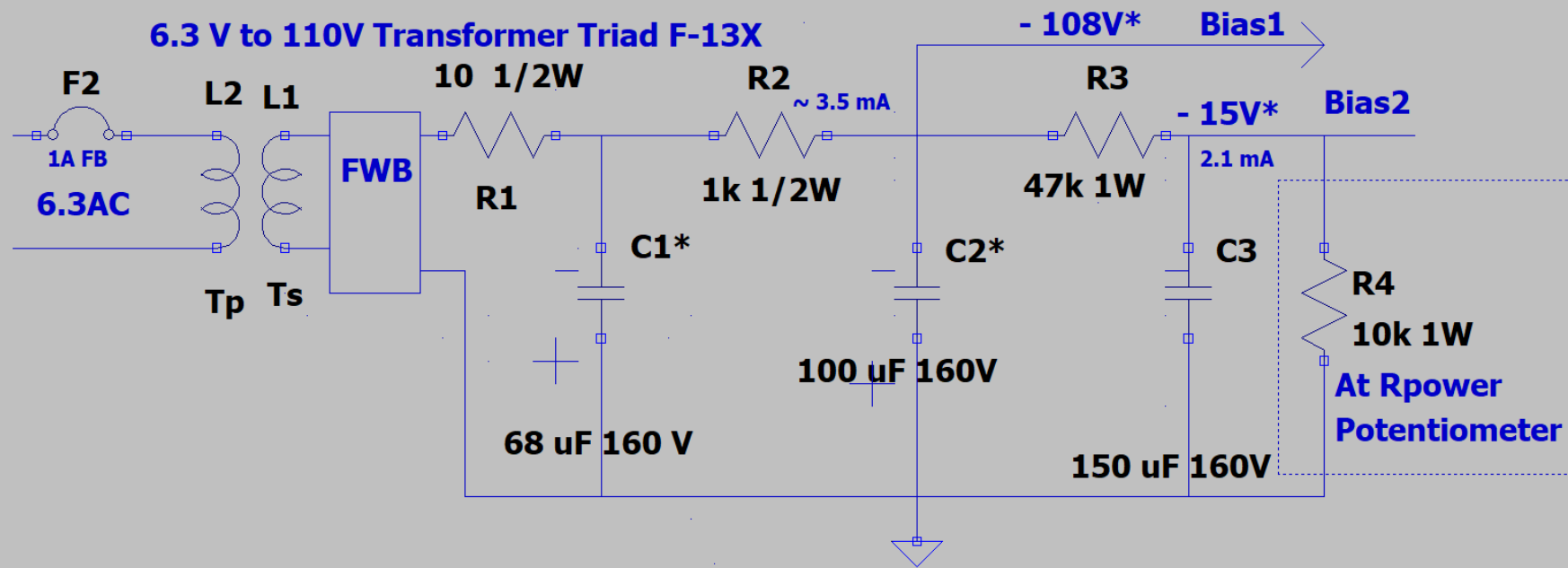


Here is the way I tune my "One-Fifty" (It is an *iterative* process):

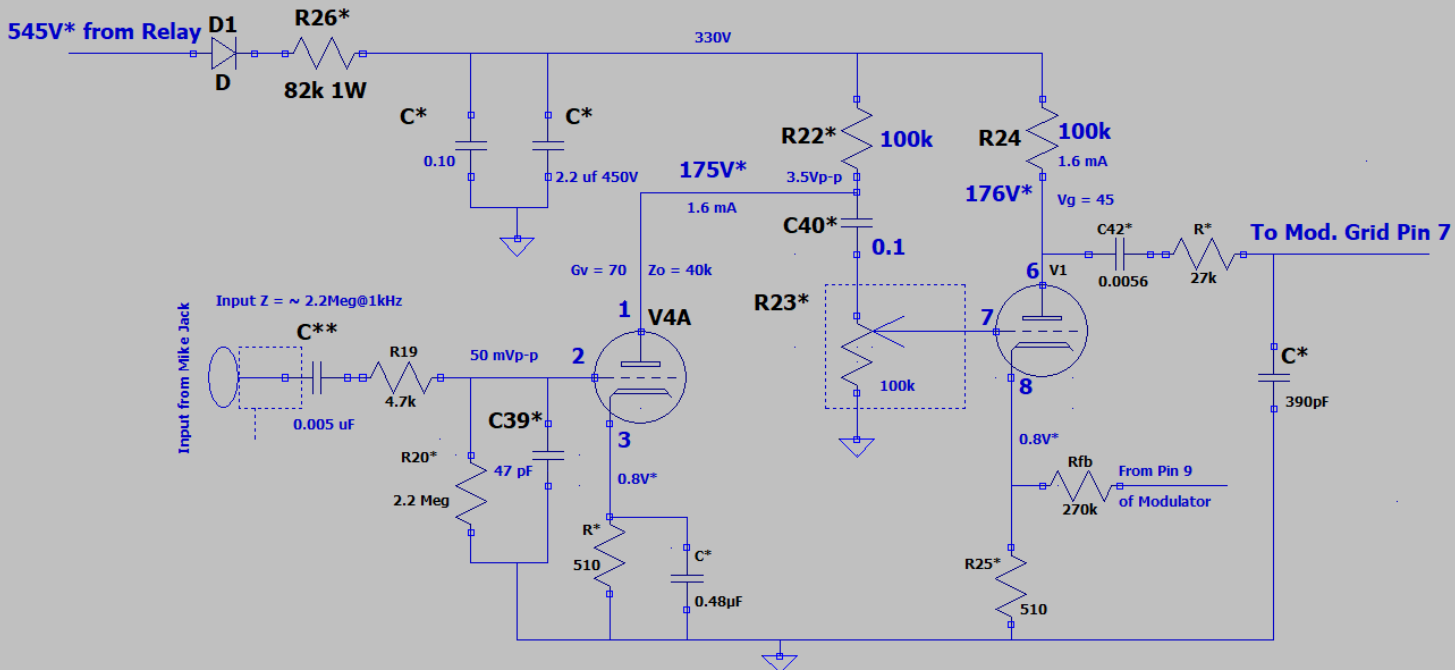
1. First, never let final grid current exceed **6 mA** and the plate current exceed **225 mA**. Use the *Buffer Tune* control to keep both less than or equal to 6 mA and 225 mA, respectively. Keydowns of about 5-10 seconds at a time should be sufficient. Allow a Keyup interval of 15 seconds or so between Keydowns during tuning.
2. Dip the plate current and then use the Load control cap to increase plate current. SG modulated transmitters require max loading to keep audio distortion to a minimum.
3. Switch to *final grid current meter* reading and adjust the Oscillator Tune control cap for an increasing final grid current not to exceed 6 mA.
4. Keep meter reading to *final grid current* and adjust the Buffer Tune control cap for an increasing final grid current not to exceed 6 mA.
5. Repeat steps 2 through 4, keeping the final grid current at or below 6 mA and the final plate current below 225 mA.

Now, if you switch to CW you MUST repeat this procedure since the screen voltage changes and this affects the output impedance.

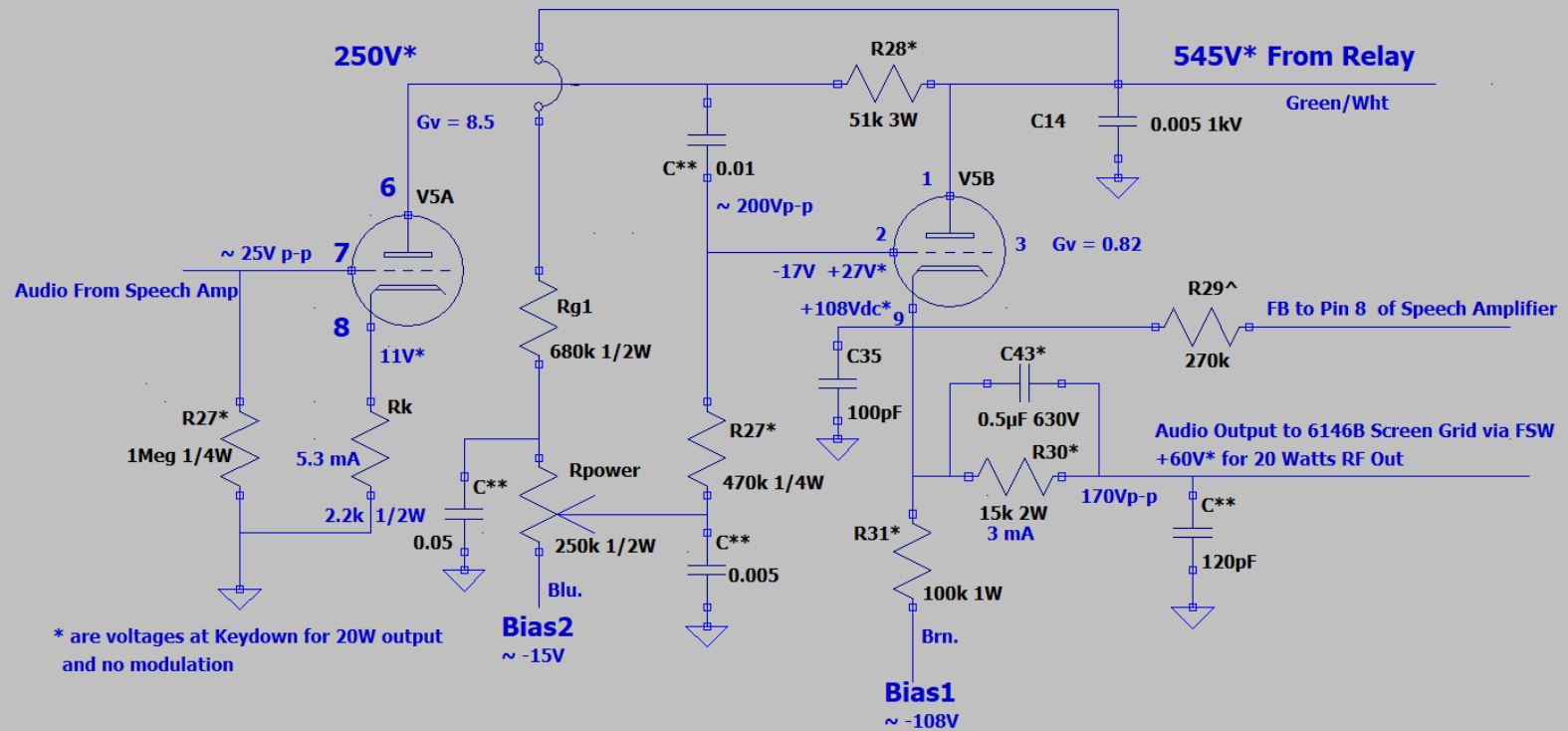
Knight T-150 Bias Supply (added)



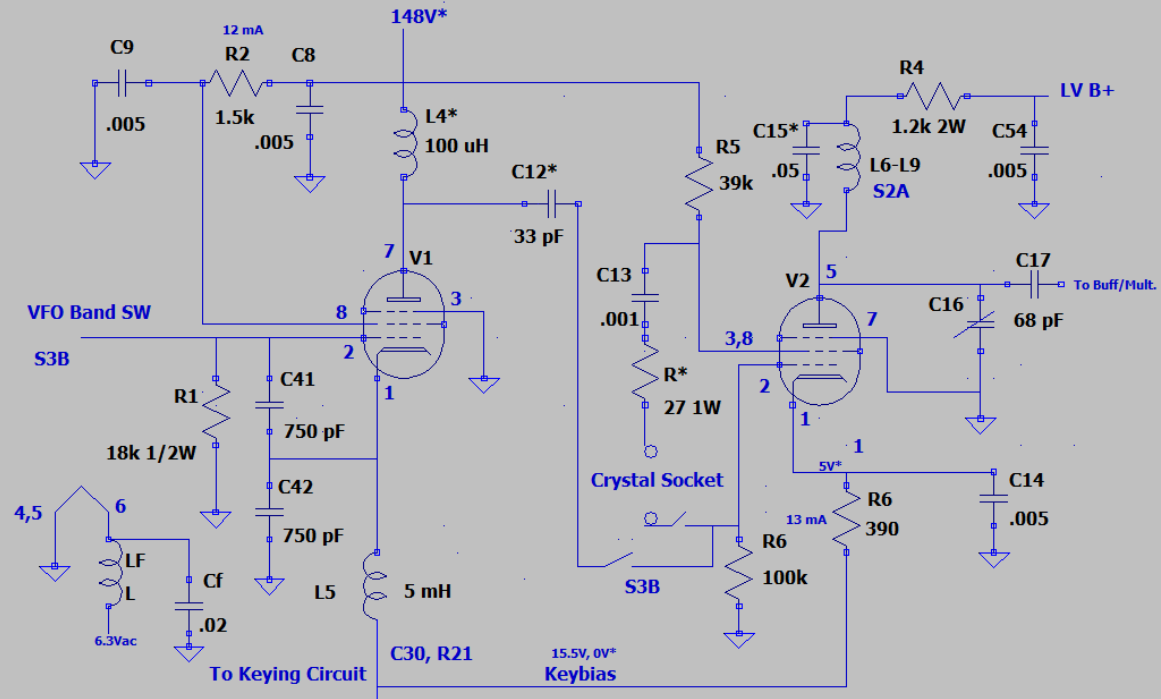
Knight T-150 12AX7A Speech Amp V4 Stage



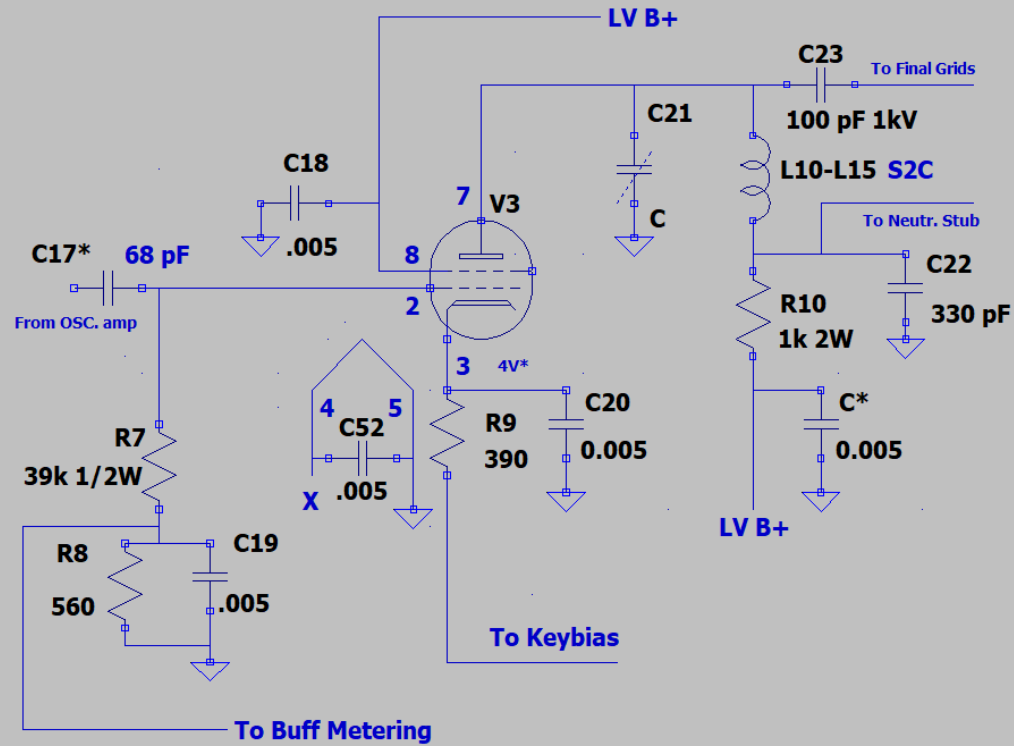
T-150 6EW7 Modulator Circuit for Variable Power CC



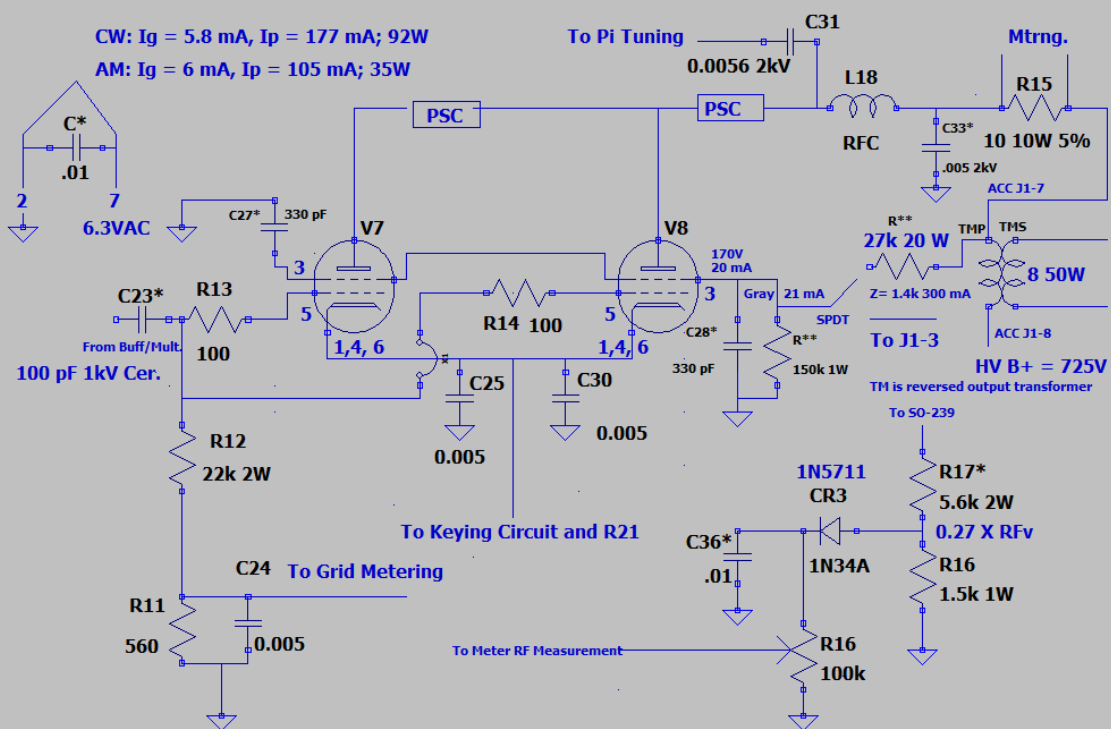
Knight T- 150 Stages V1 and V2 12BY7A VFO and 6CL6 Crystal Osc.Section



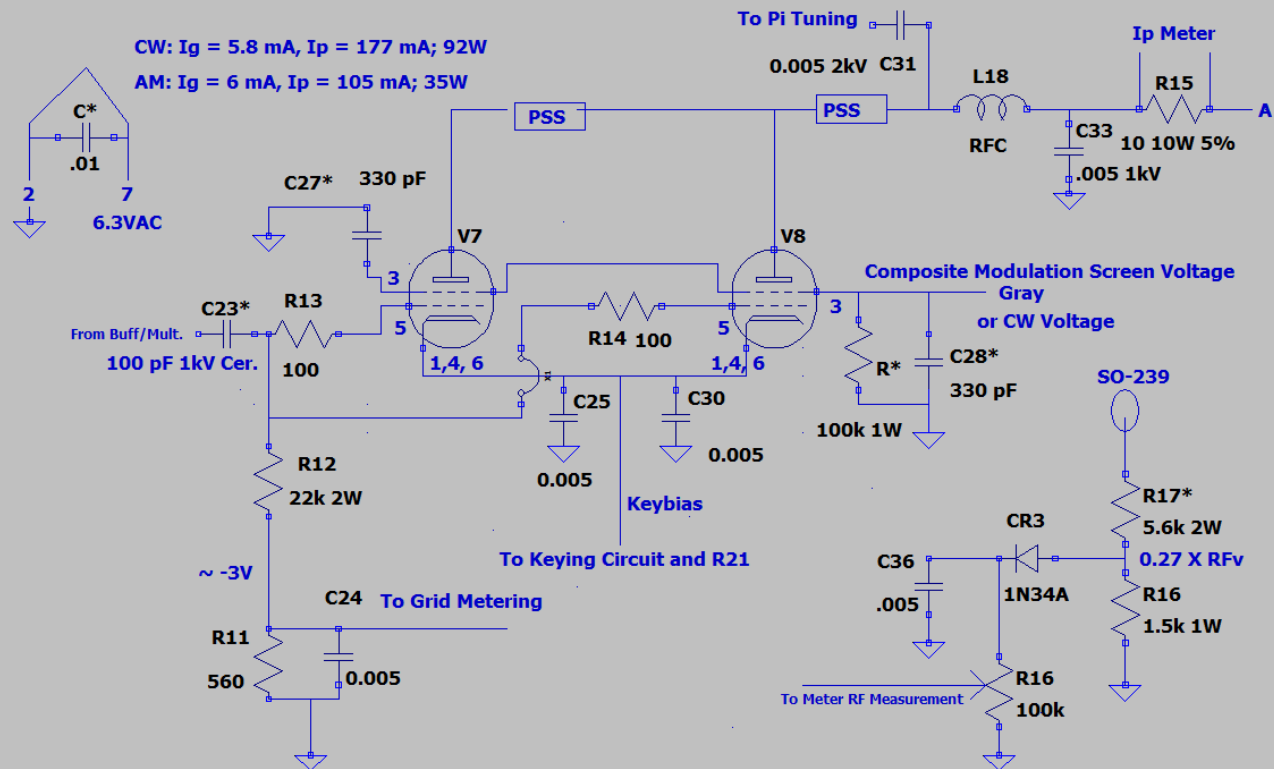
Knight T-150 Stage V3 7189 Buff-Mult.



Knight T-150 Final Stage for External Plate Modulation, SG Modulation and CW



Knight T-150 Final Stages V7 and V8 6146s for SG Modulation and CW



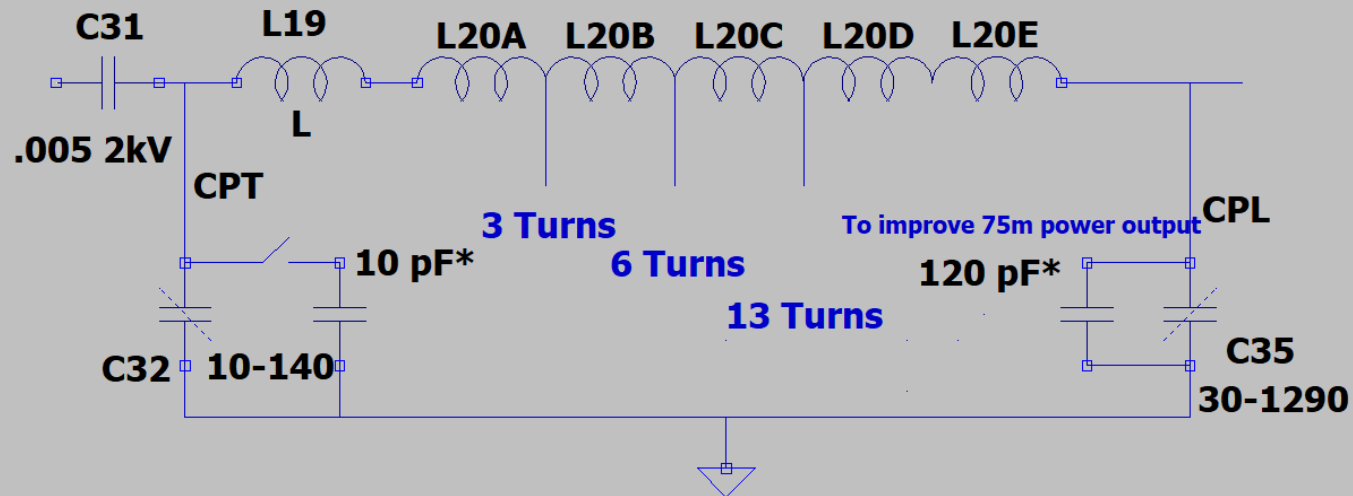
Original Knight T-150 Pi-Net Coils

L19, L = 0.11 uH, 4 Turns, #10, L = 1.5", Dia. = 1/2", widely spaced.

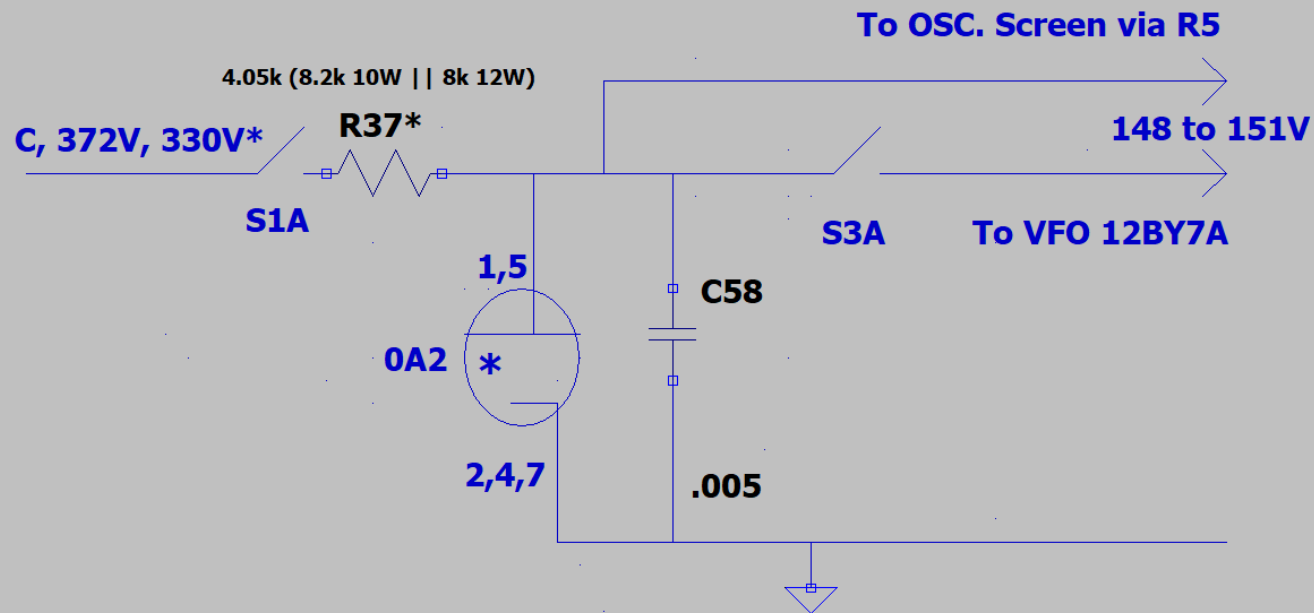
L20 11.5 uH 22 Turns #14 (0.064" 1.63mm)

L = (3.375" 85.73mm , D = 2.0" 51mm)

Spacing = 1/16" (0.0625" 2.5mm)



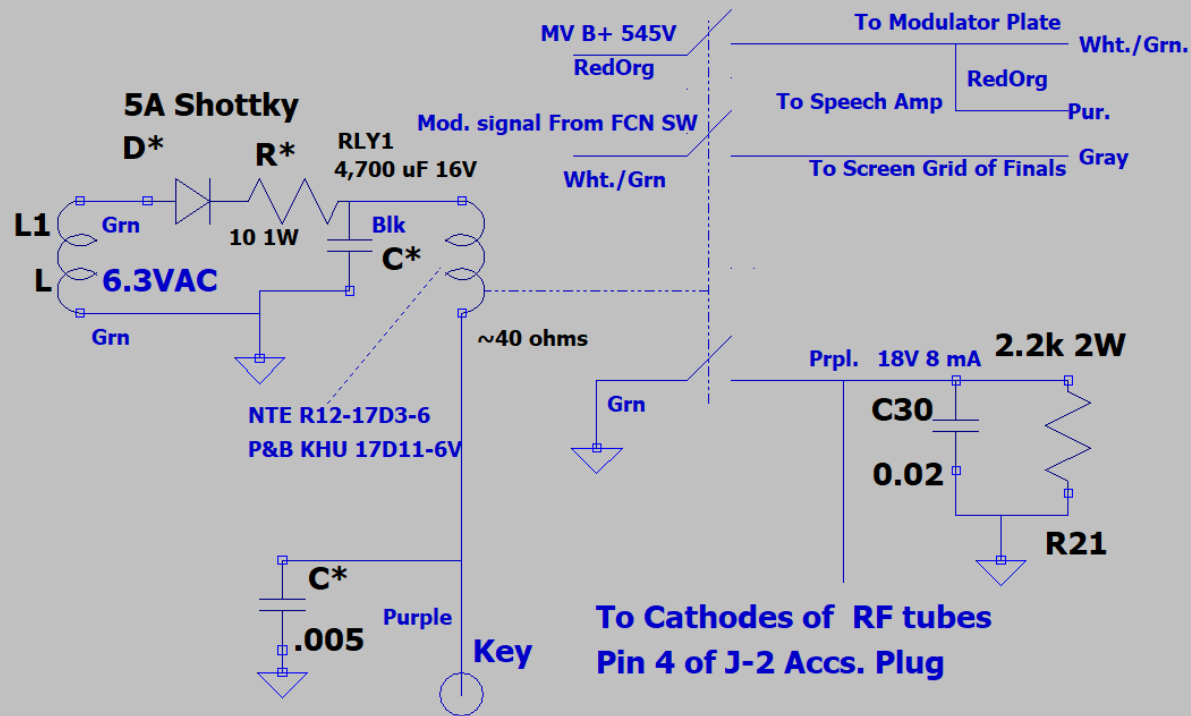
Knight T-150 150V Regulator



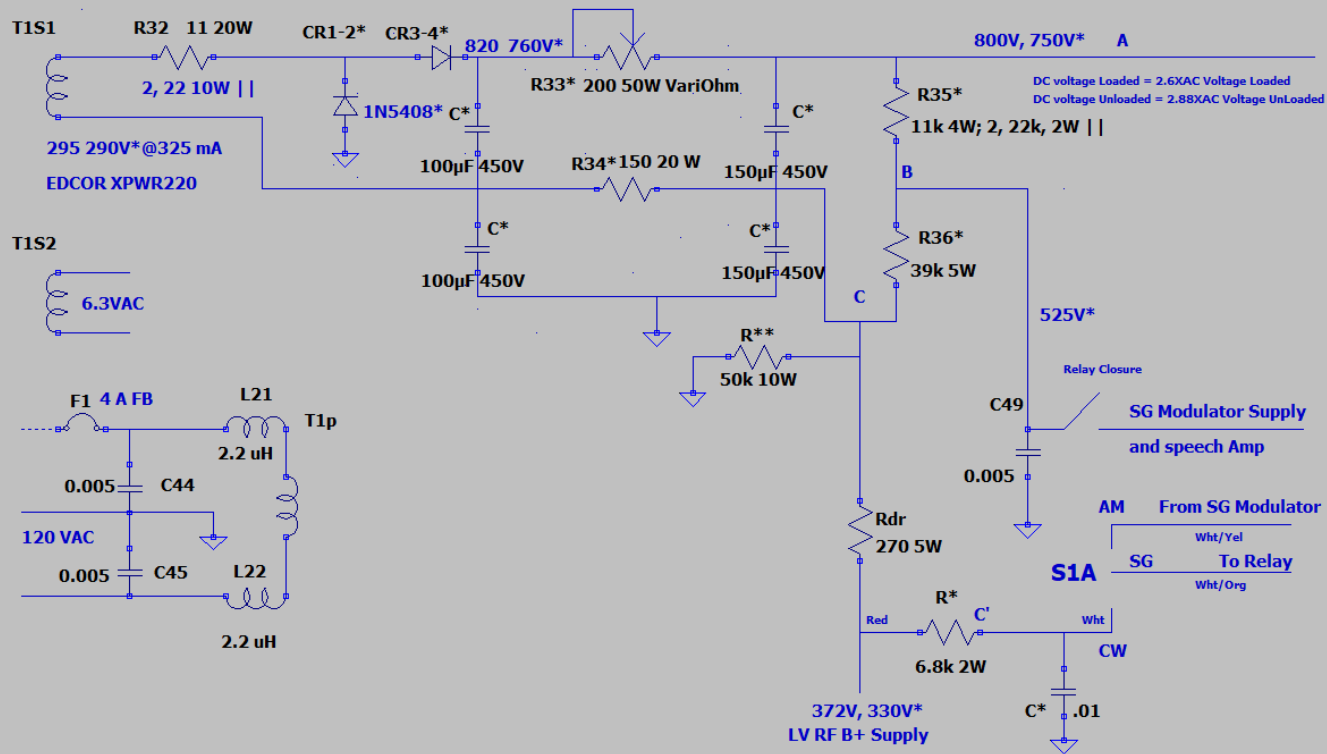
R37* is in contact with Chassis using Heat Transfer Adhesive

Knight T-150 Relay Circuit

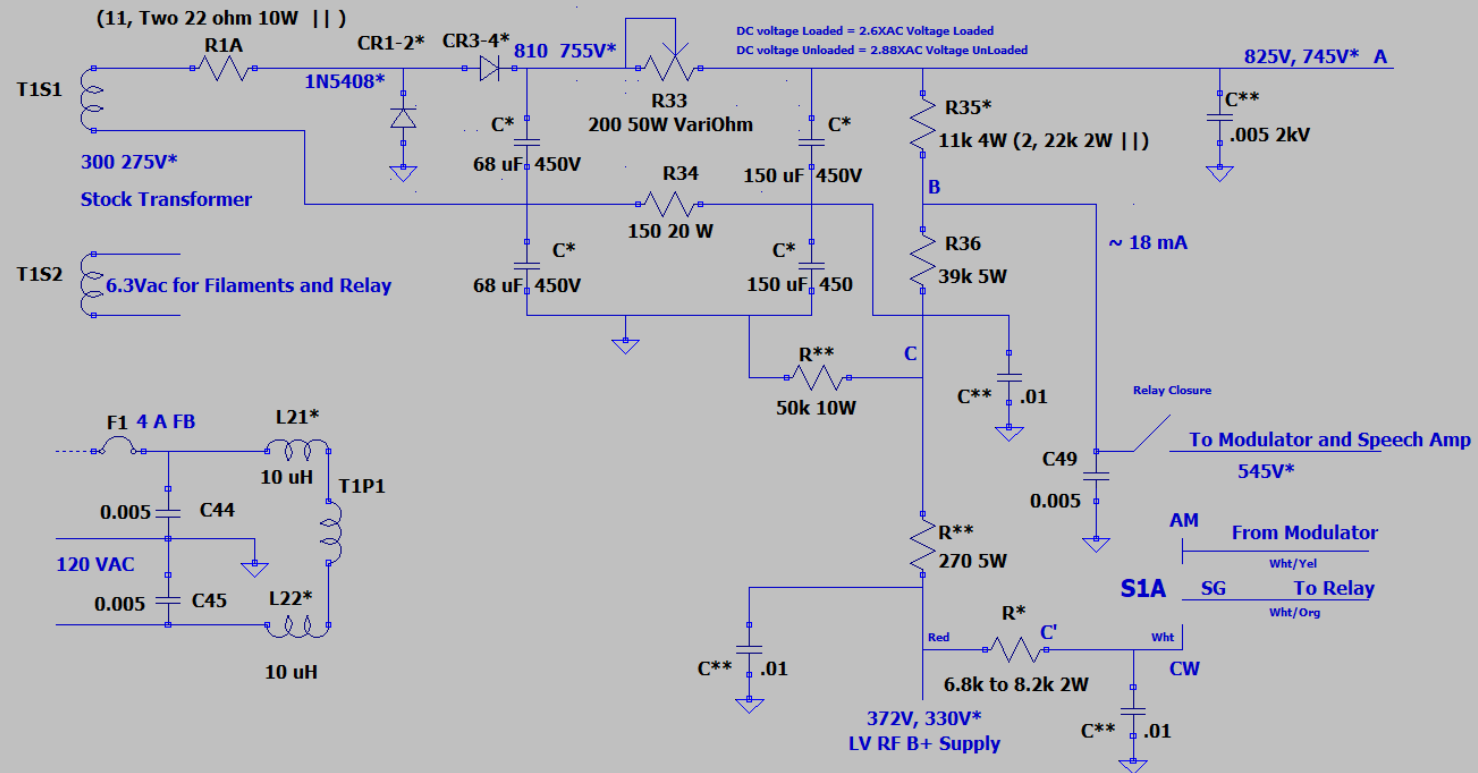
Relay shown in De-energized position



Knight T-150 HV Power Supply for Plate Modulation



Knight T-150 HV Power Supply for SG and CW



Knight OSC. Coils

