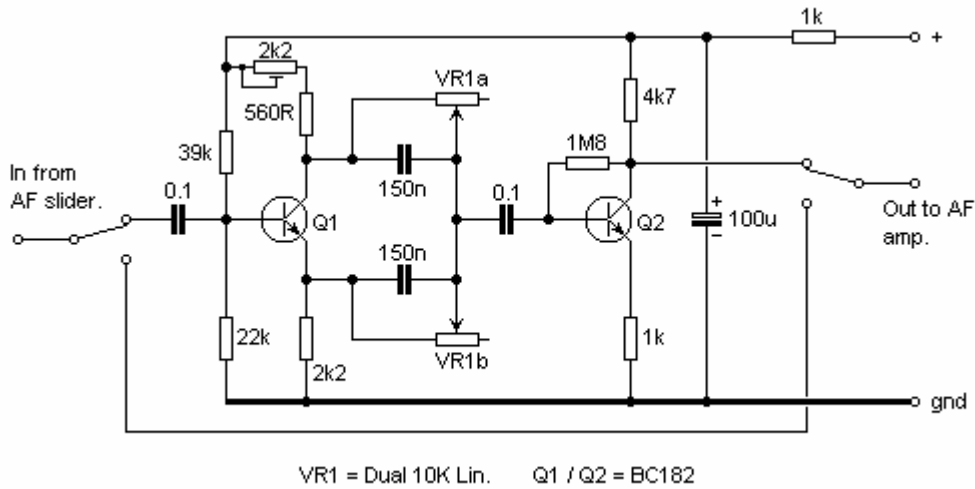


Audio Notch Filter

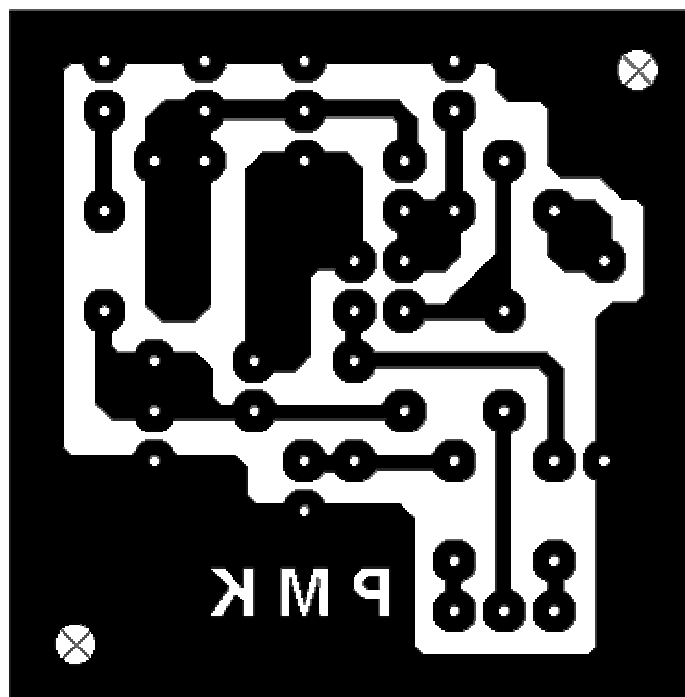


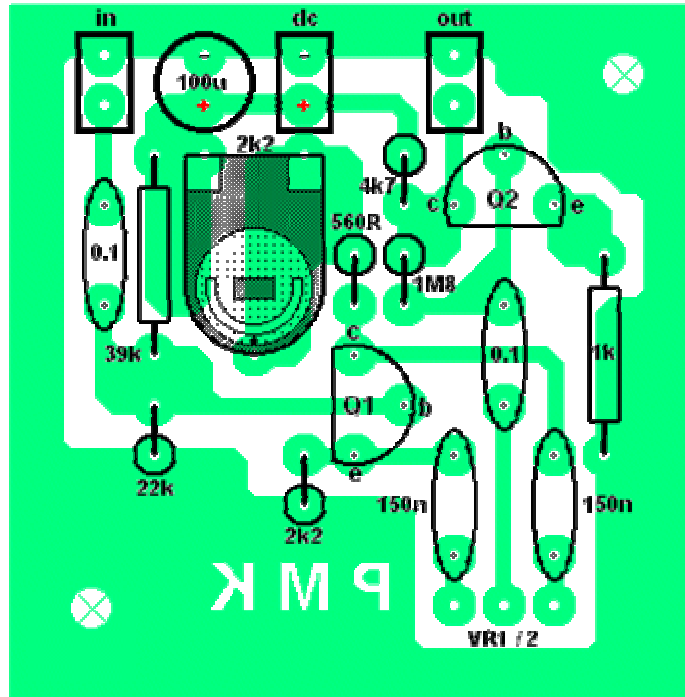
Heterodynes are the most frequent type of interference on the Short-Wave bands. They are usually caused, for example, by two AM stations on very close frequencies. It's possible to virtually eliminate this type of interference by using a notch filter. This type of filter allows most frequencies to pass but blocks signals which lay near or at the notch's operating frequency. Being tunable makes it possible to block frequencies over a range of approx. 100Hz to 5kHz.

Although the filter is an active type there is a substantial loss through it, and needs to feed a high impedance in order for good results to be obtained. Here, Q2 acts as a buffer amplifier and this provides a high load impedance and compensates for any losses.

I'd recommend using low-tolerance capacitors (150nF, 5% or better) around the the T-network for best results. Good results should be obtained with the components shown.

Using the filter is child's play - adjust the 2k2 preset for optimum rejection and leave in this position. Now it's a simple matter of adjusting VR1 to minimise any offending heterodynes.





See the page [Resizing Your Artwork](#) for the correct printout component spacing.

Best Regards... Pete

<http://www.keirle.fsnet.co.uk>