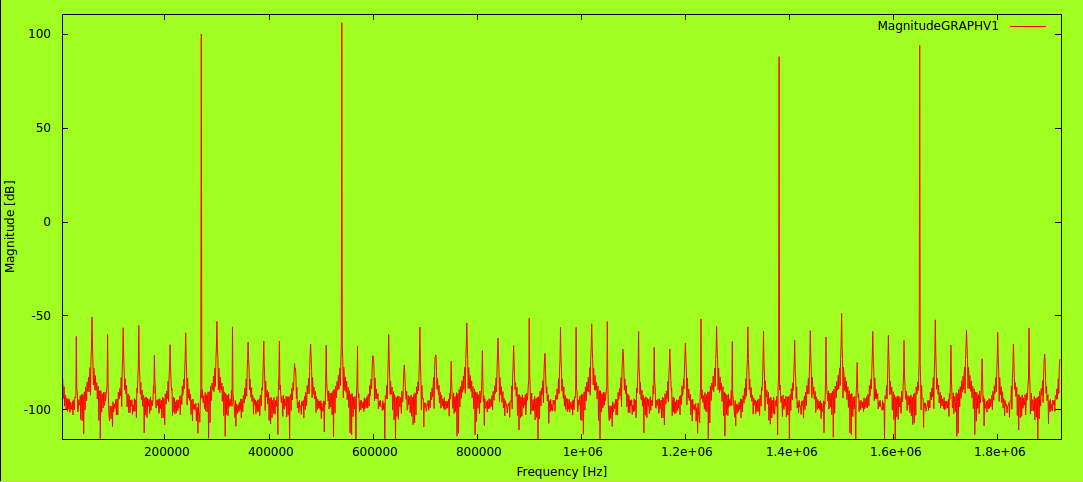
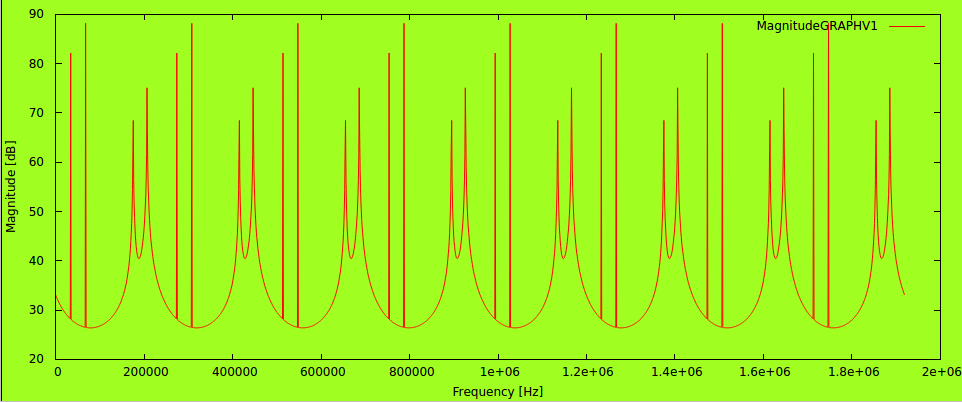
**DUC Test**

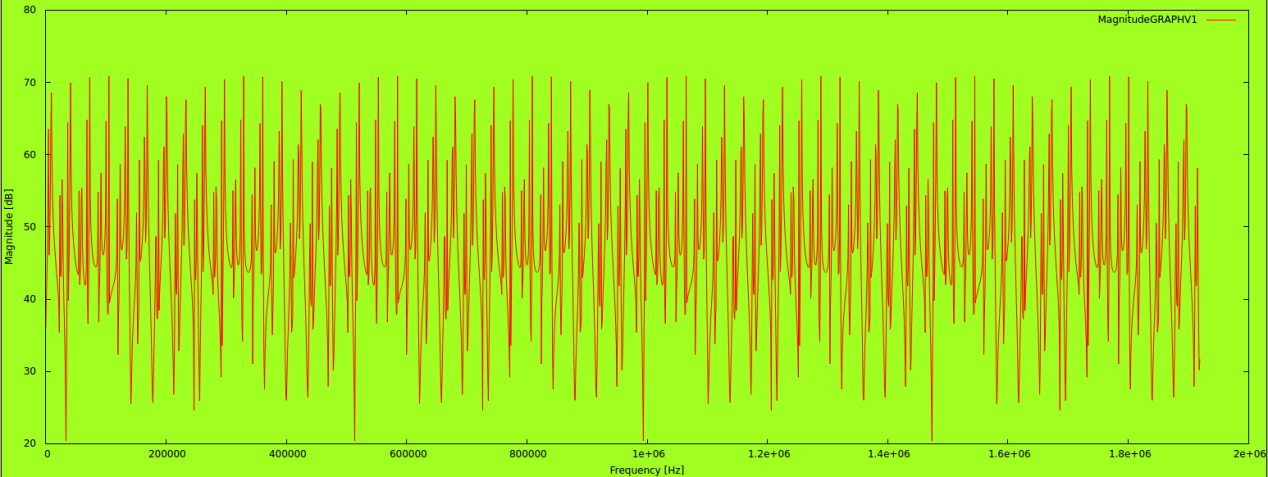
Input Signal: Four tones at -13000Hz, -6700Hz, 6750Hz and 13500Hz. Each with different power levels and distributed to occupy the relative LTE bandwidth. Sampling frequency 1.92MHz.



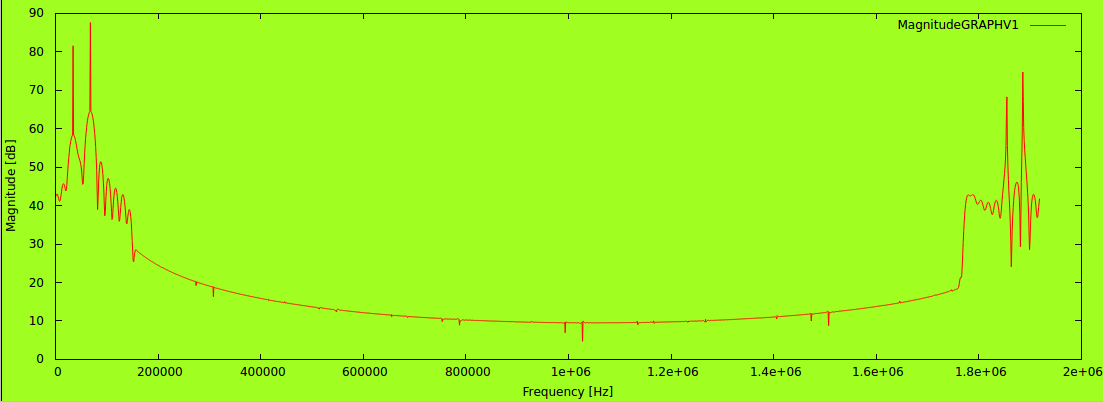
Interpolation Output. Complex signal with I and Q components. Interpolation done through zero padding plus digital filtering. Interpolation level = 8.

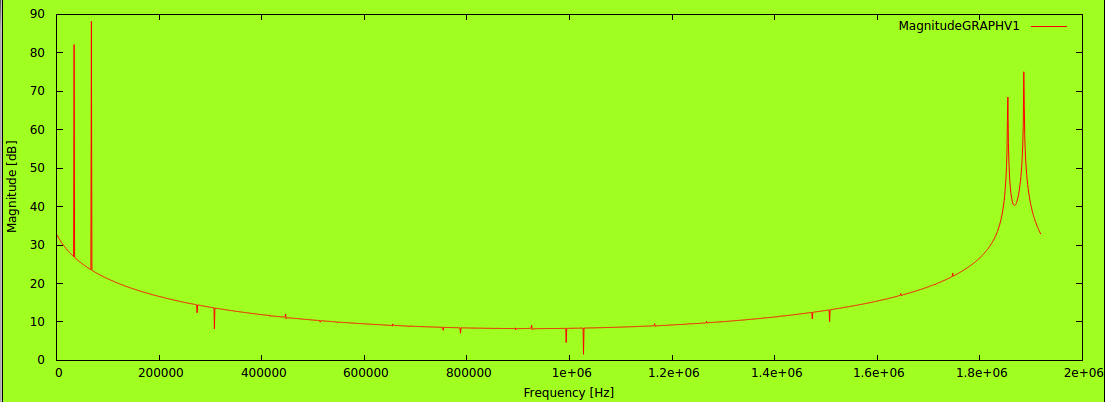


Interpolating by 60.

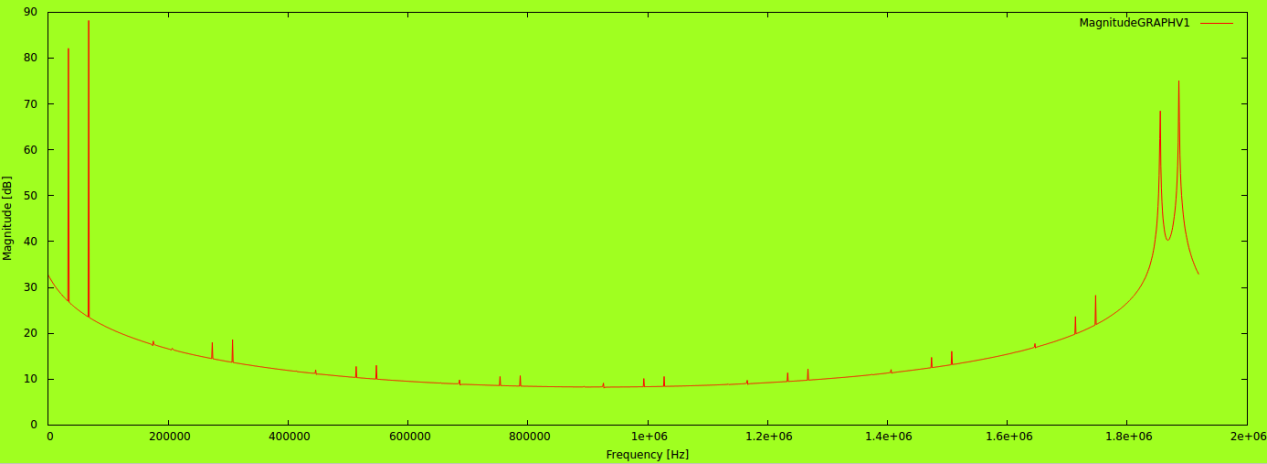


After Filtering (N=8)

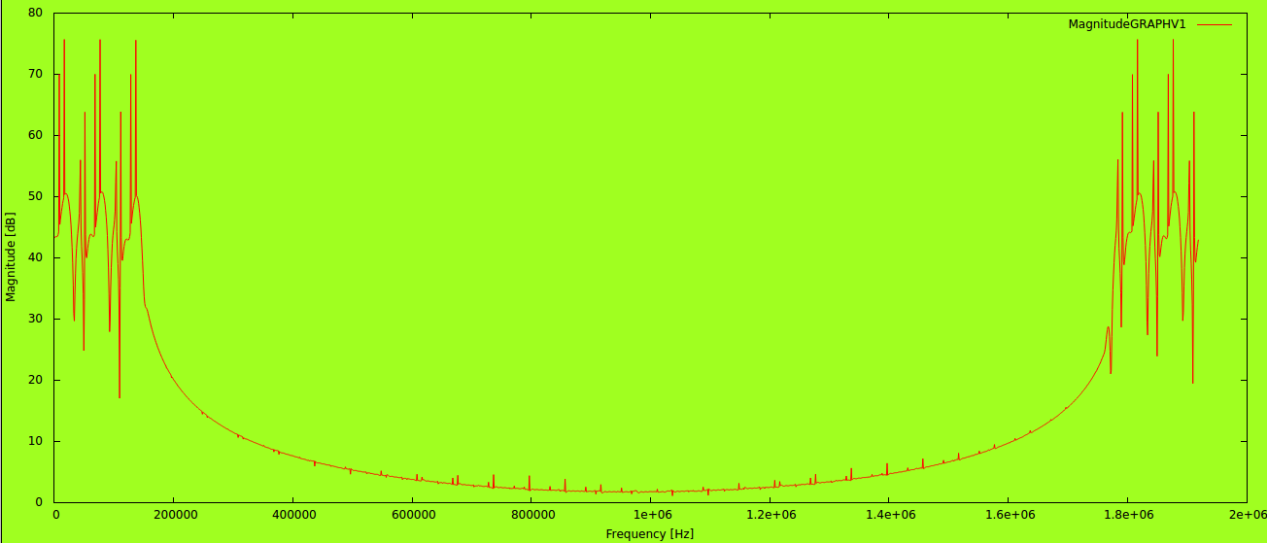




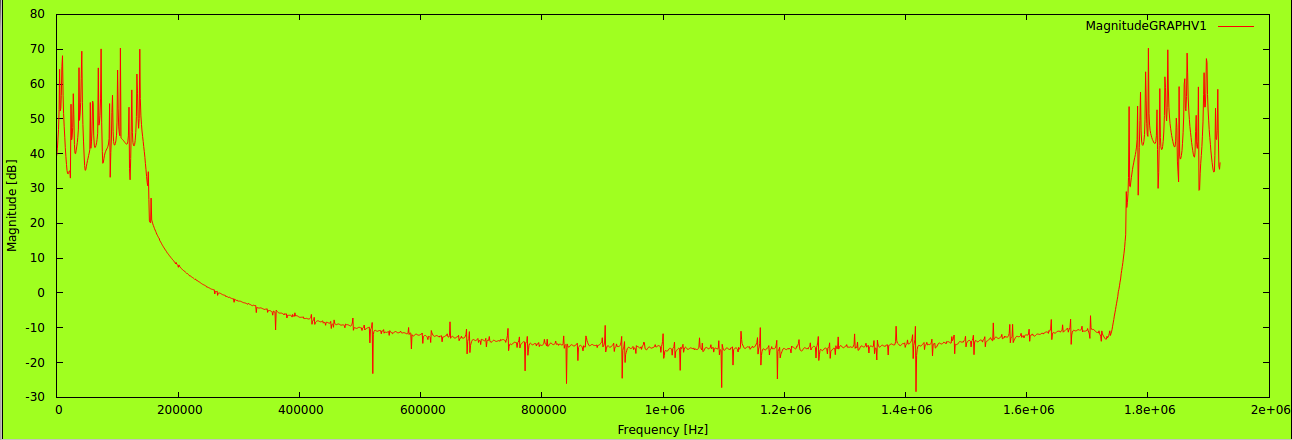
With improved computing efficiency in convolution function.



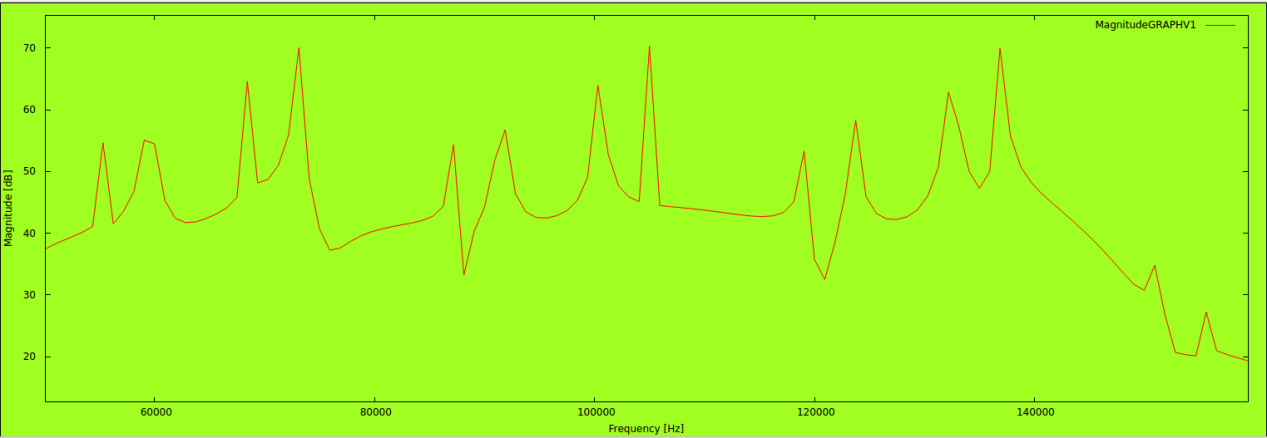
After Filtering (N=32)

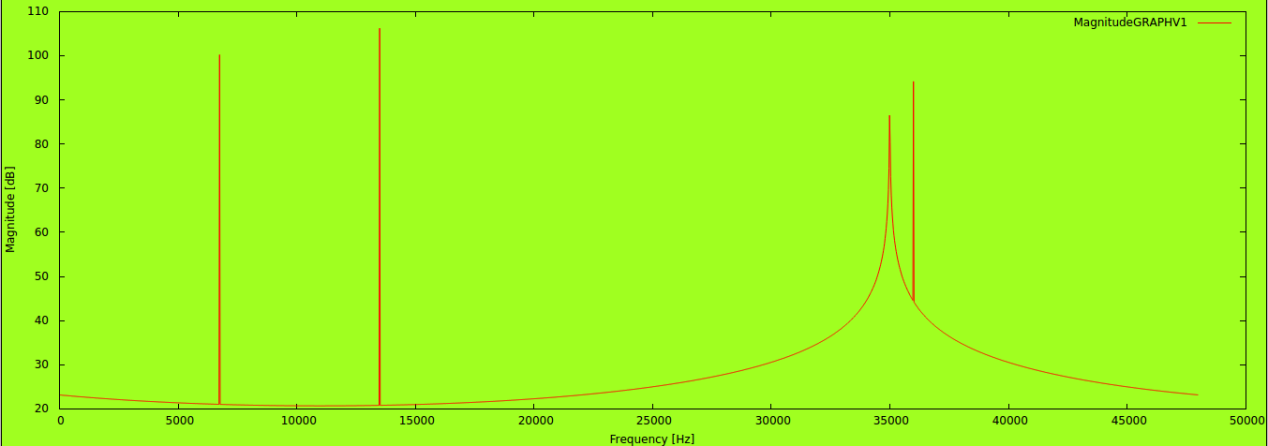


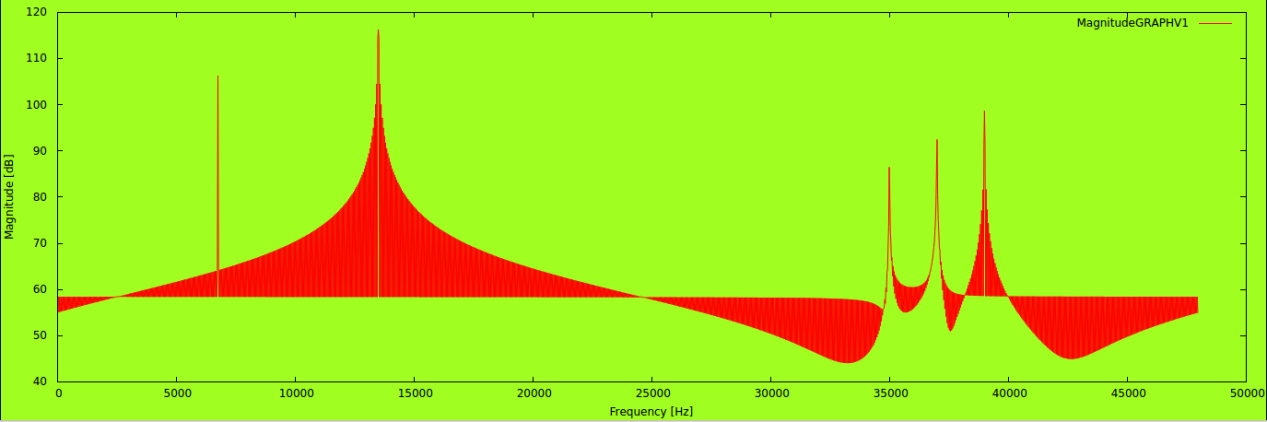
After Filtering (N=60)

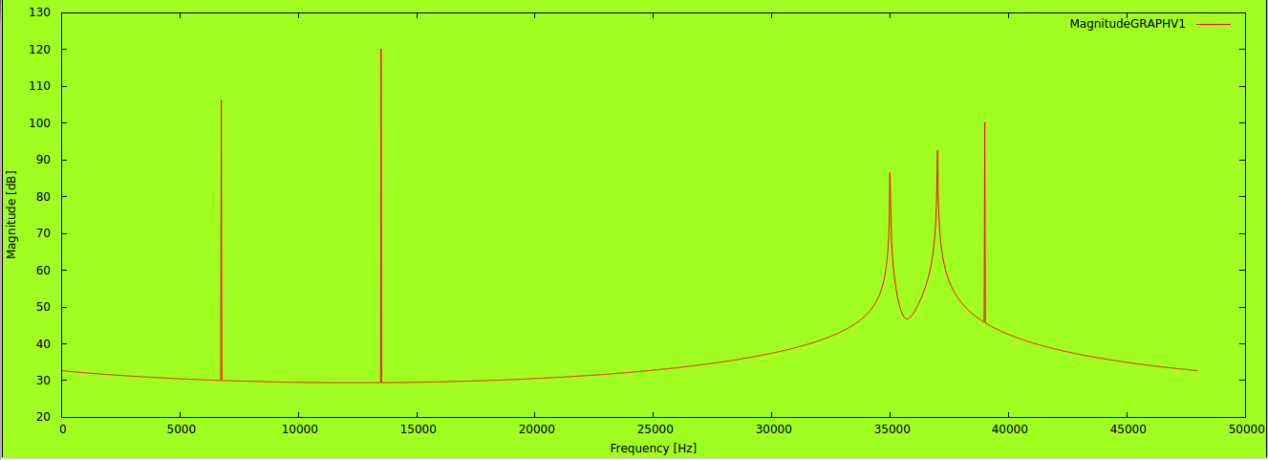


After Filtering (N=60). Detail.

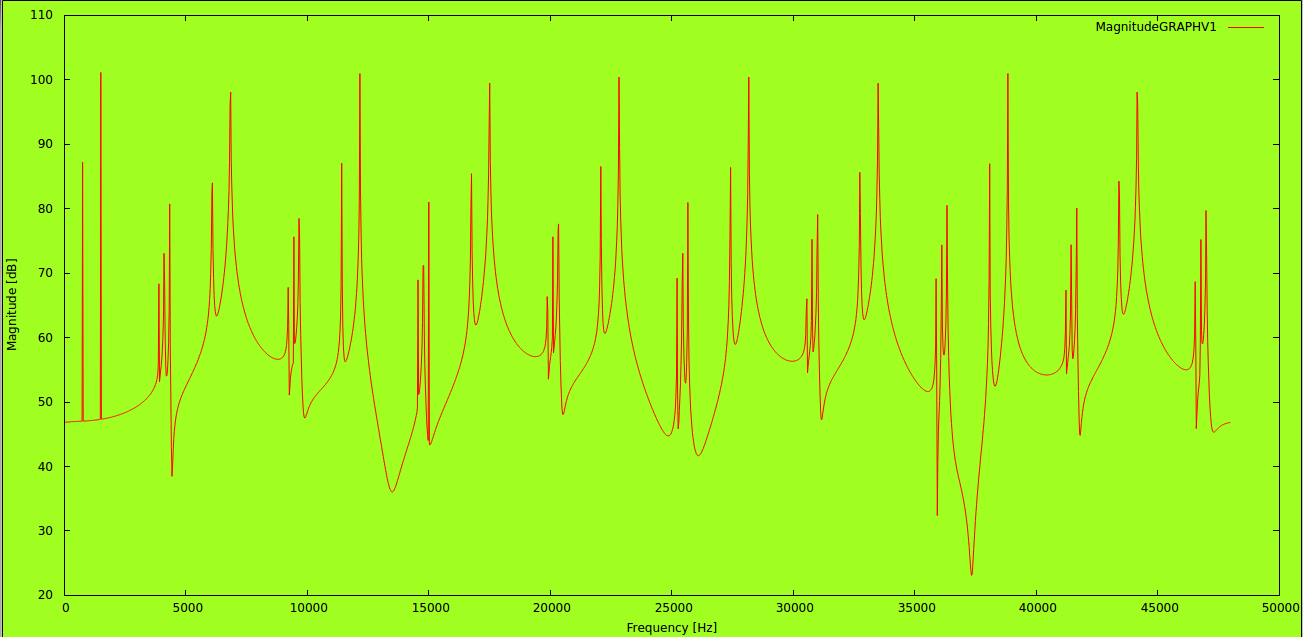


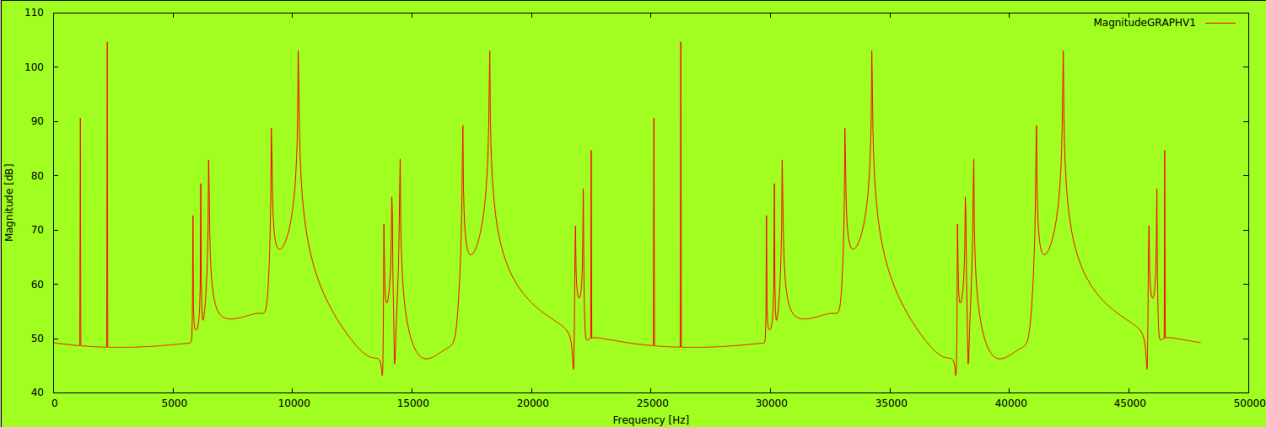




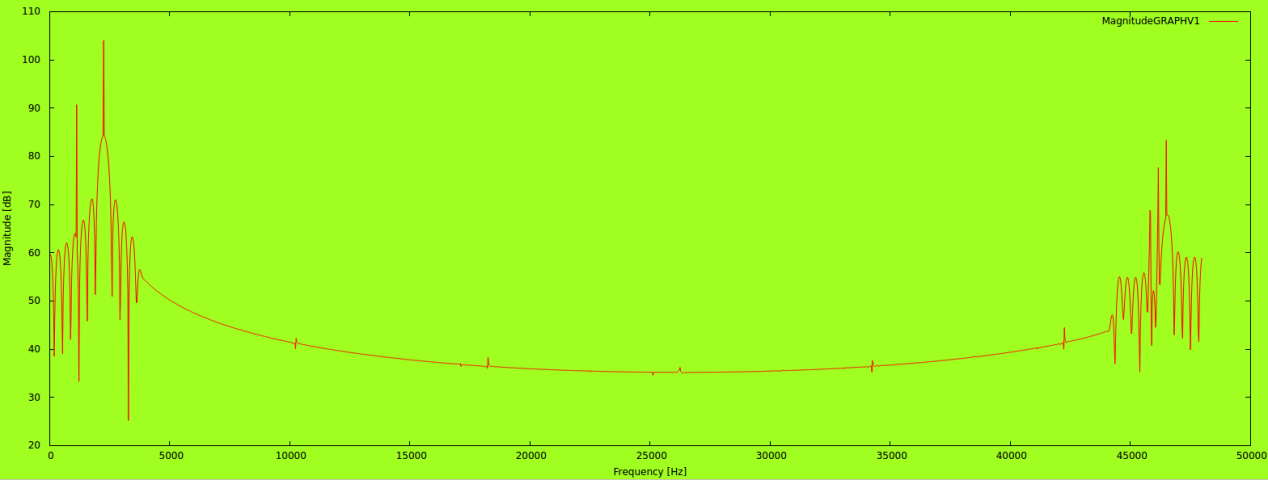


Interpolation with no filtering

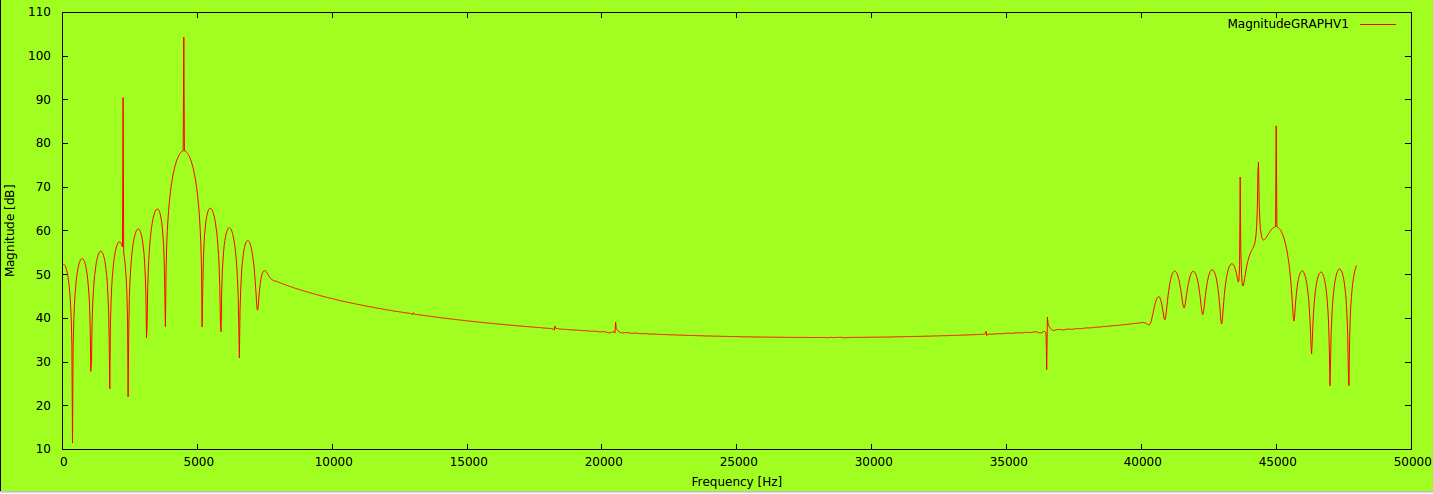




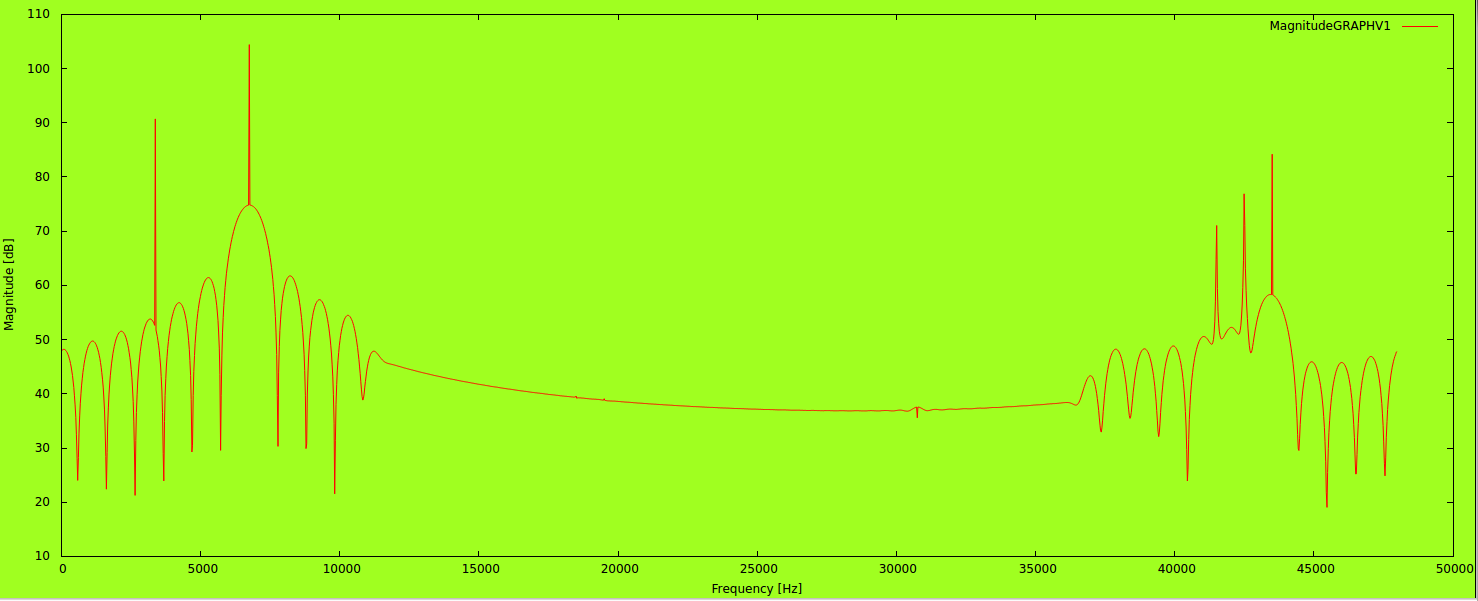
INT=6, DEC=1

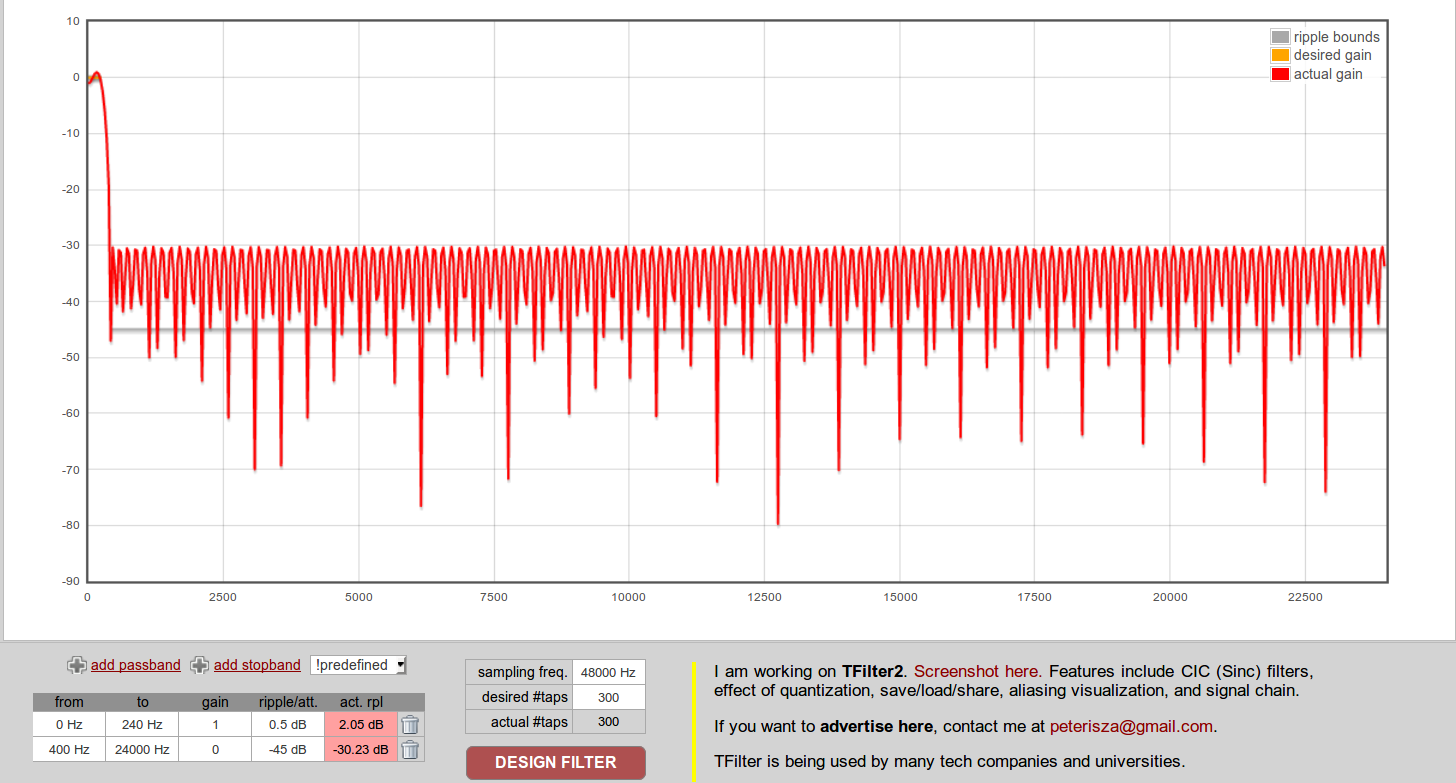


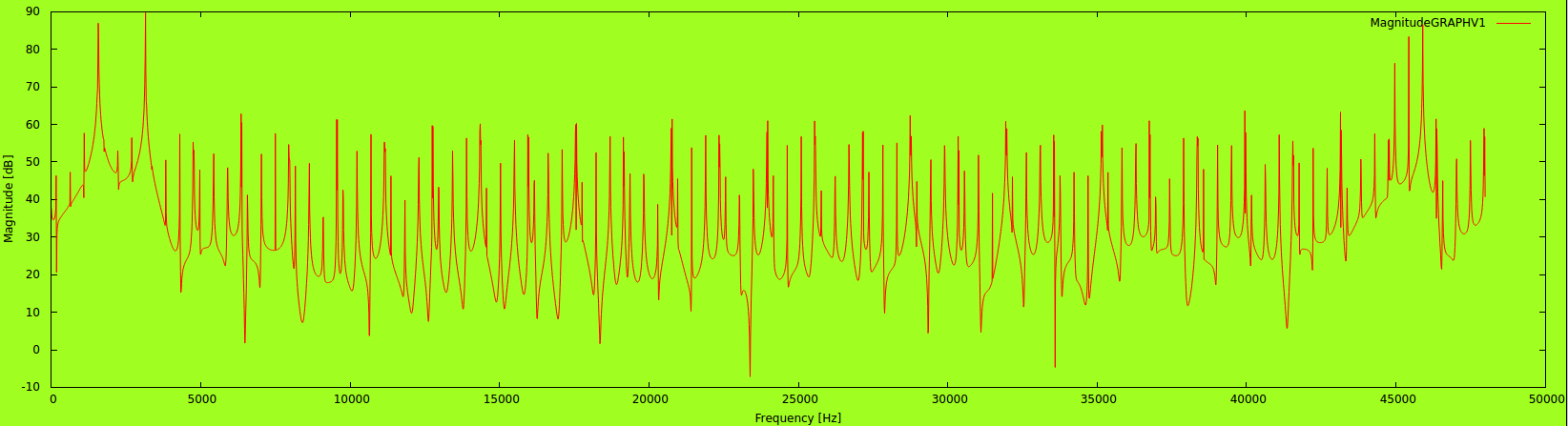
INT=6, DEC=2



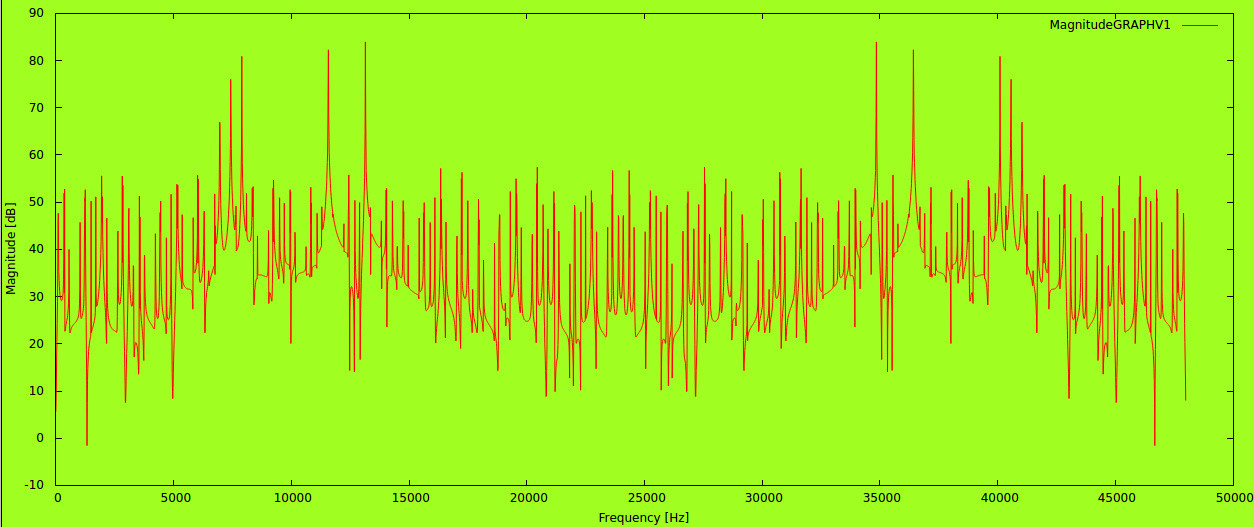
INT=6, DEC=3







Moving to a fOL=10kHz



With a set of tones of equal amplitude

