

Figure 1. Pre-filter and Interpolation filter

Method: Equiripple  
Number Of Coef: 64  
Filter Type: FIR low pass filter (linier phase)  
Sampling frequency: 46.875 kHz  
Pass band frequency: 4 kHz  
Stop band frequency: 6 kHz  
Pass band ripple: 1 dB or less  
Stop band ripple: -70 dB or more

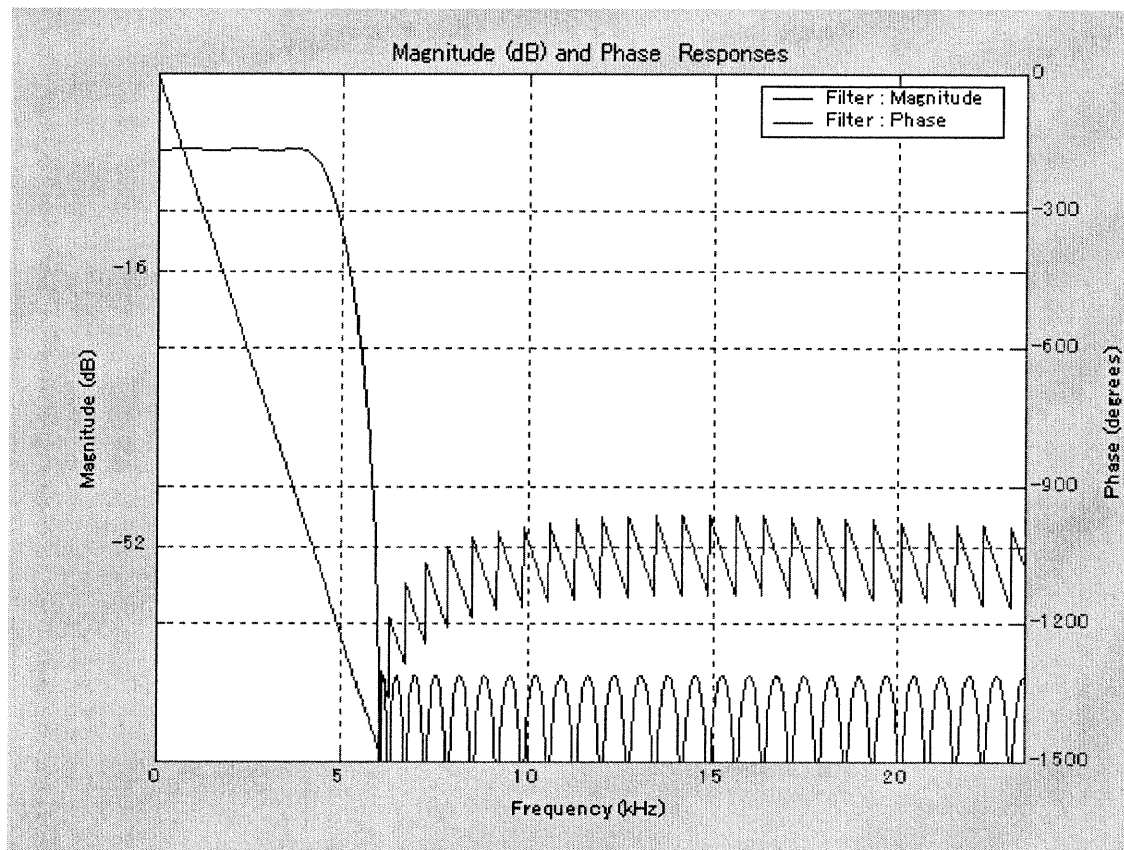


Figure 2. TX Audio filter

Method: Equiripple  
Number Of Coef: 96  
Filter Type: FIR band pass filter (linier phase)  
Sampling frequency: 9.375 kHz  
Stop band frequency (low): 100 Hz  
Pass band frequency (low): 300 Hz  
Pass band frequency (high): 2700 Hz  
Stop band frequency (high): 2900 Hz  
Pass band ripple: 1 dB or less  
Stop band ripple: -60 dB or more

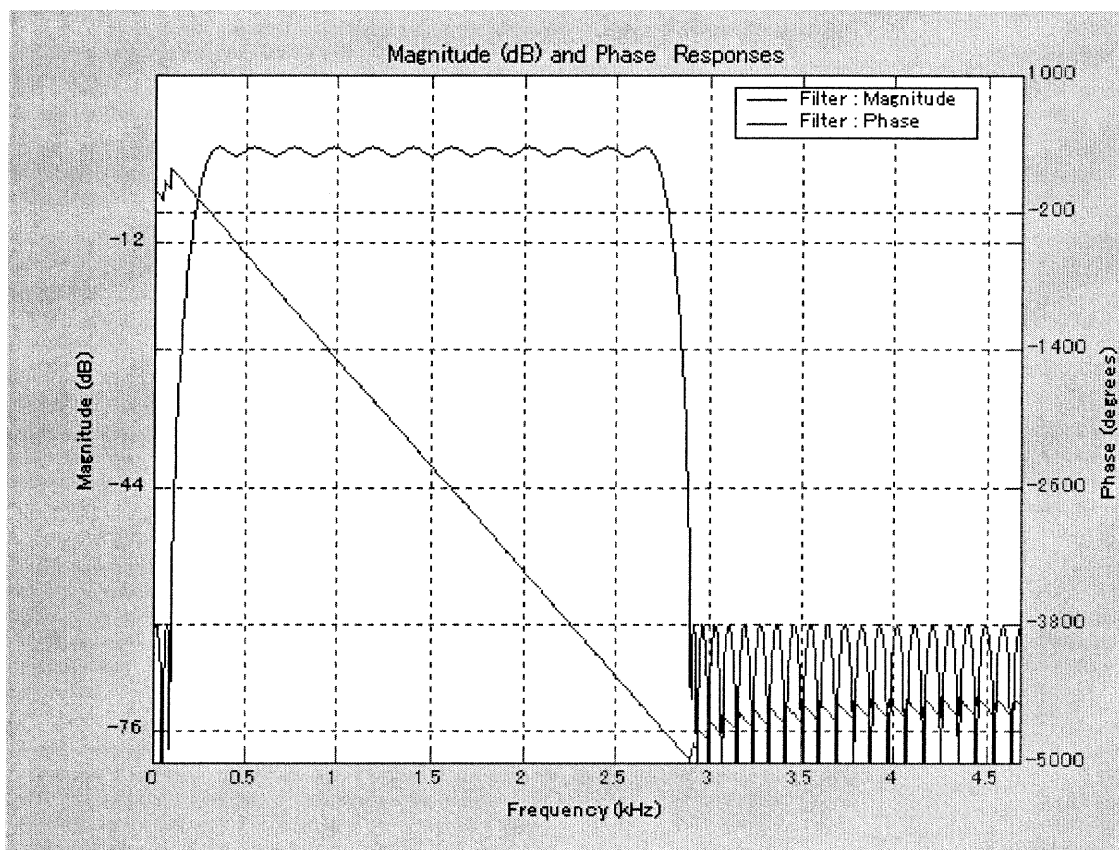


Figure 3. Image rejection filter

Method: Equiripple  
Number Of Coef: 120  
Filter Type: FIR band pass filter (linier phase)  
Sampling frequency: 46.875 kHz  
Stop band frequency (low): 13 kHz  
Pass band frequency (low): 14 kHz  
Pass band frequency (high): 22 kHz  
Stop band frequency (high): 23 kHz  
Pass band ripple: 1 dB or less  
Stop band ripple: -70 dB or more

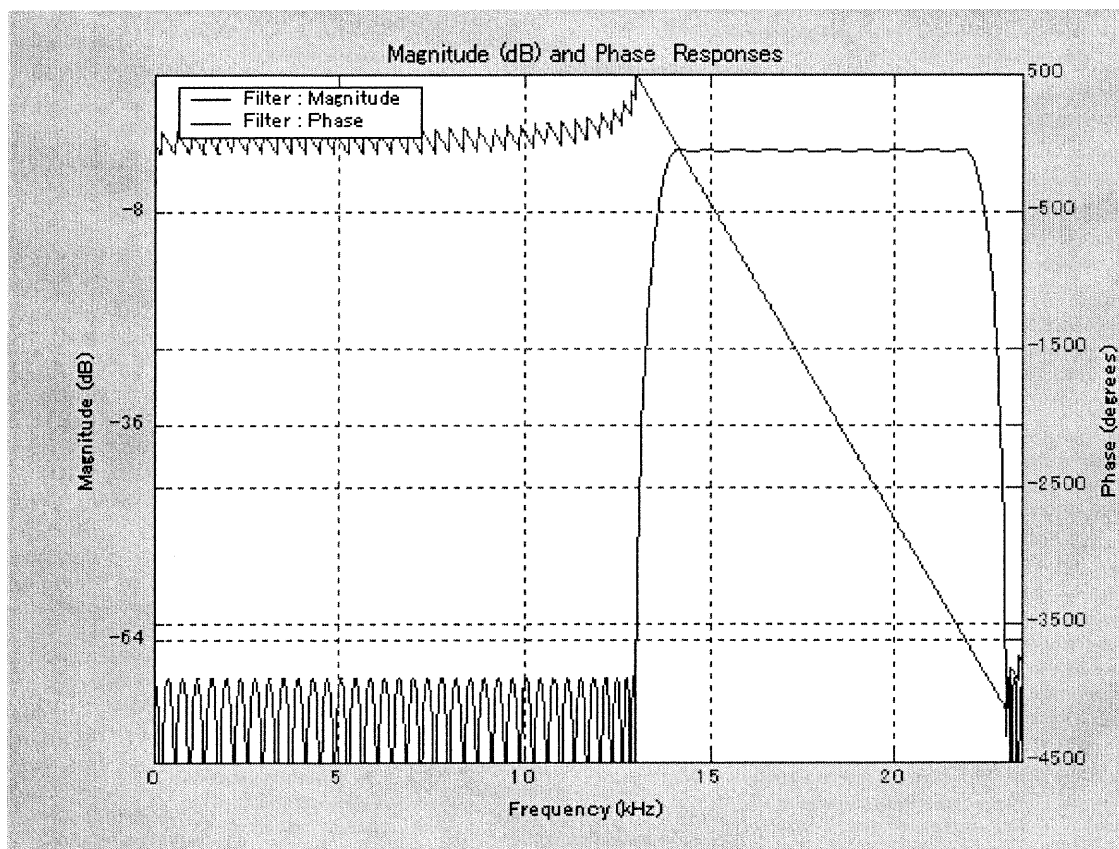


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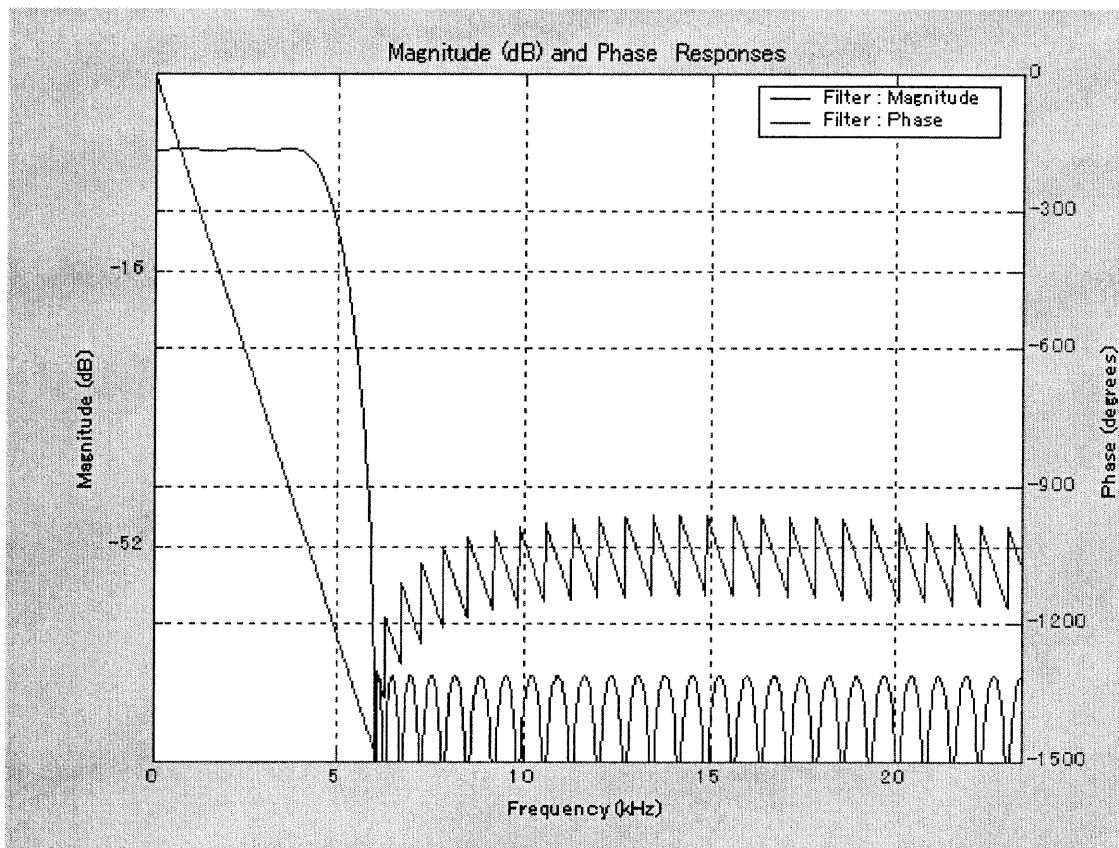


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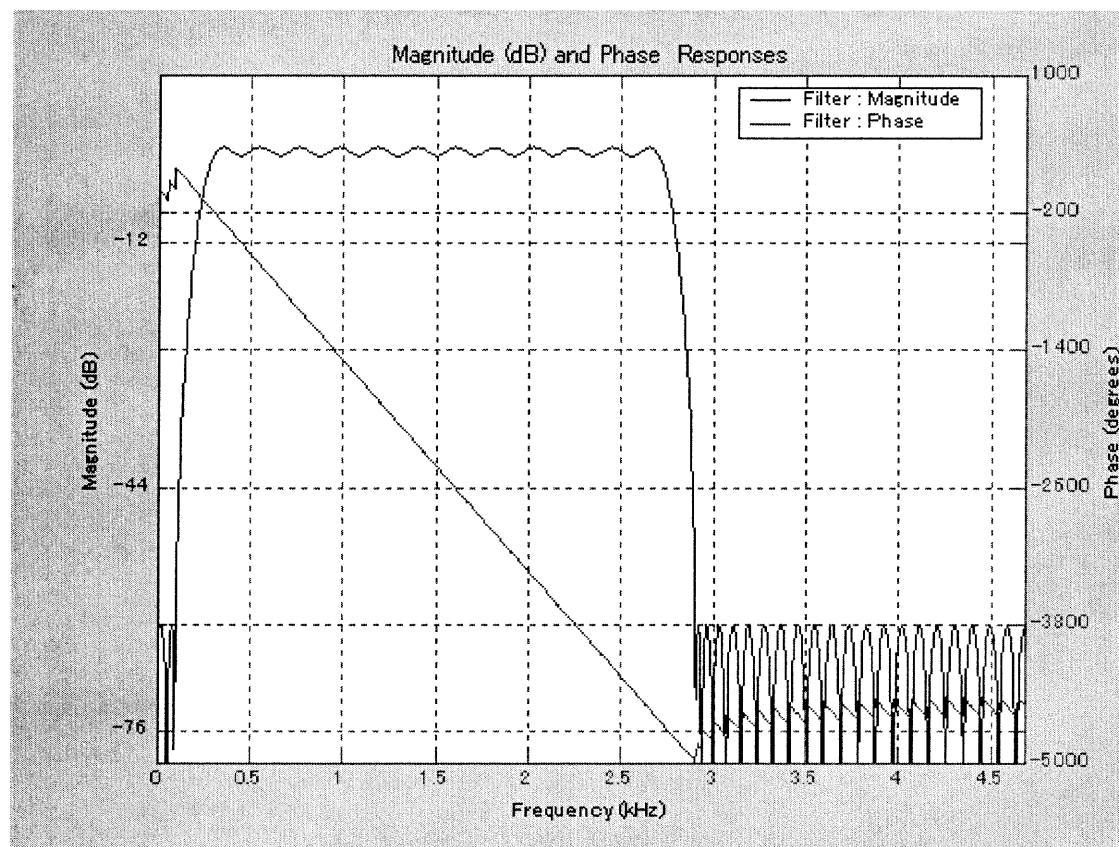
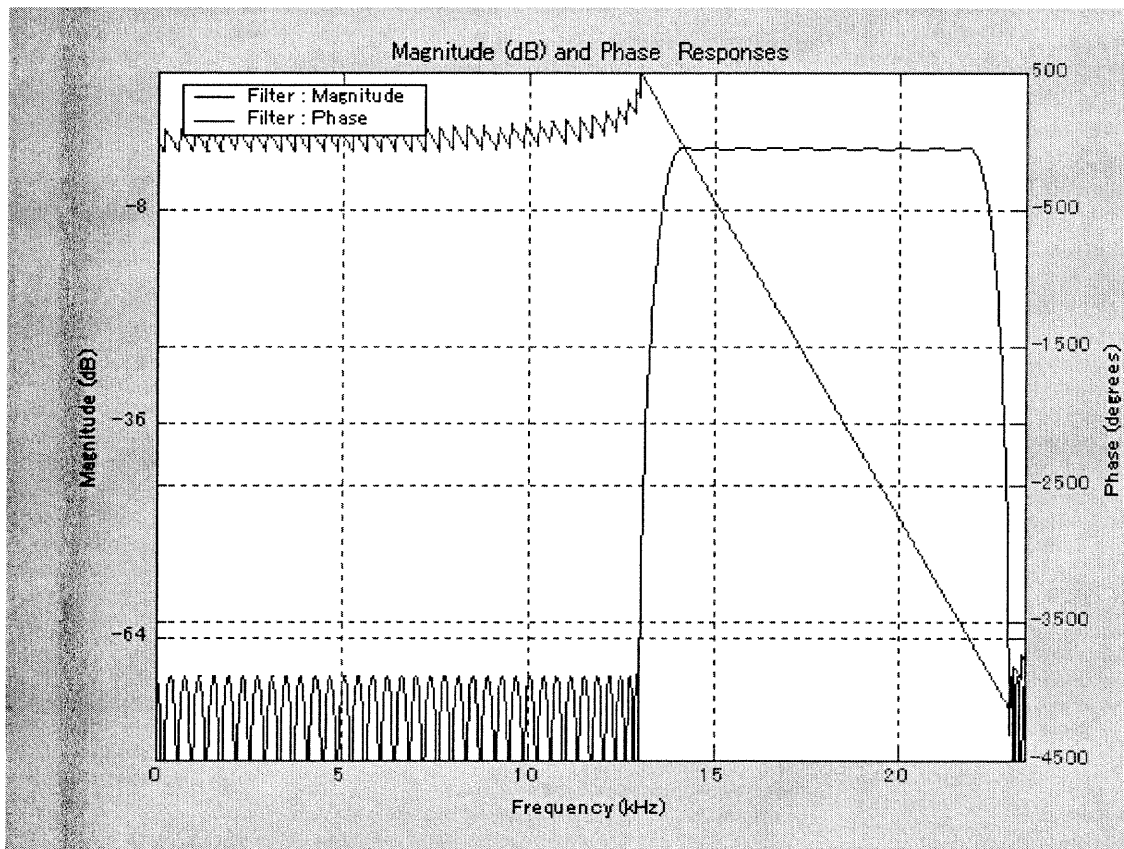
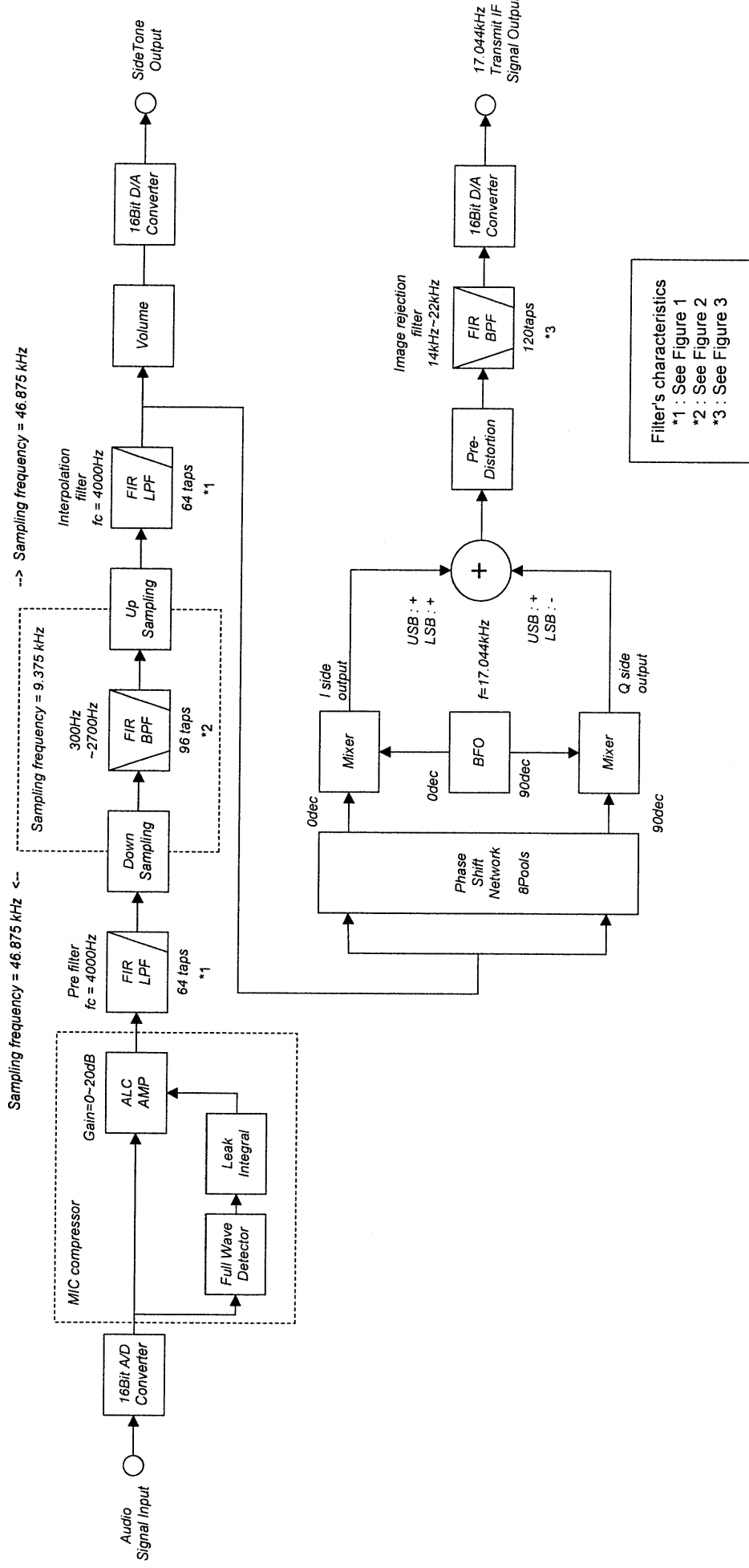


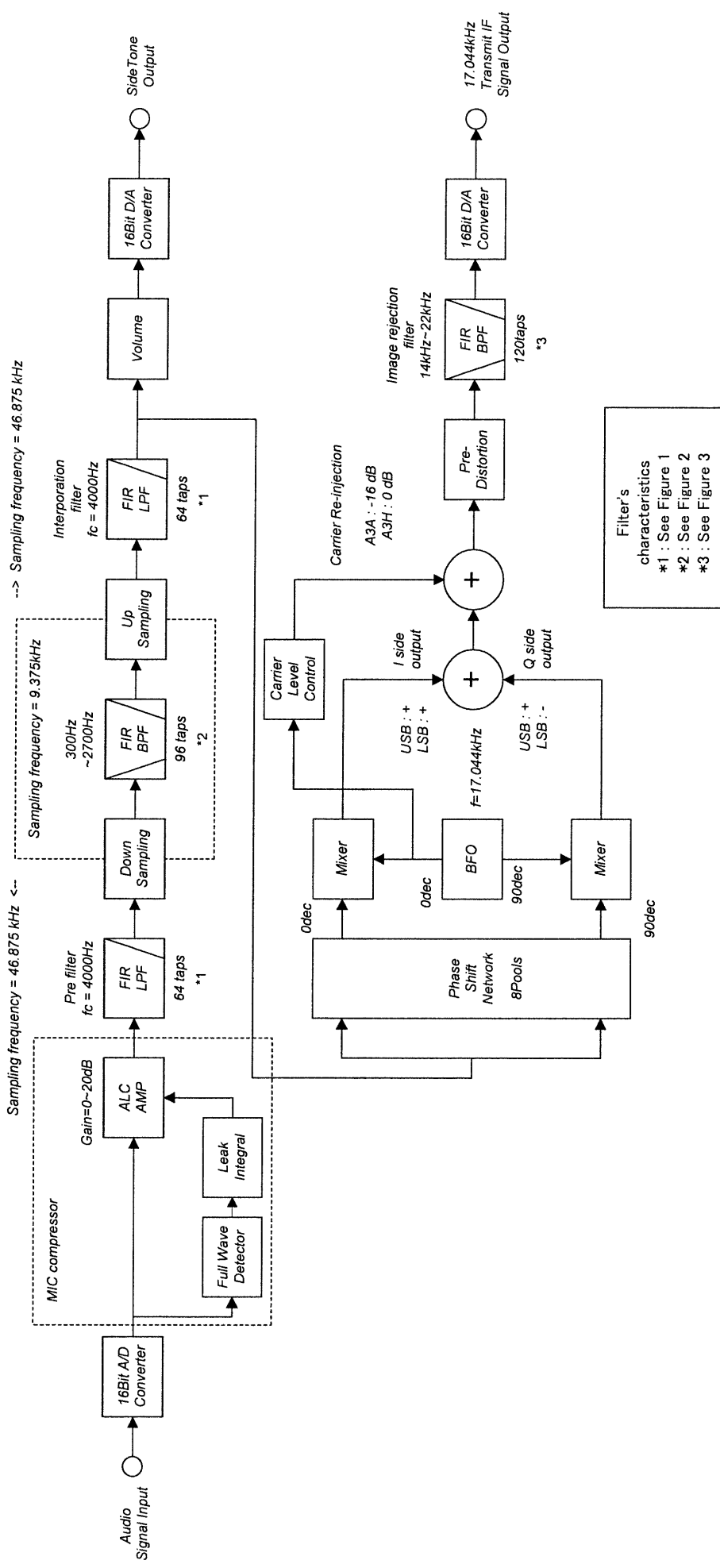
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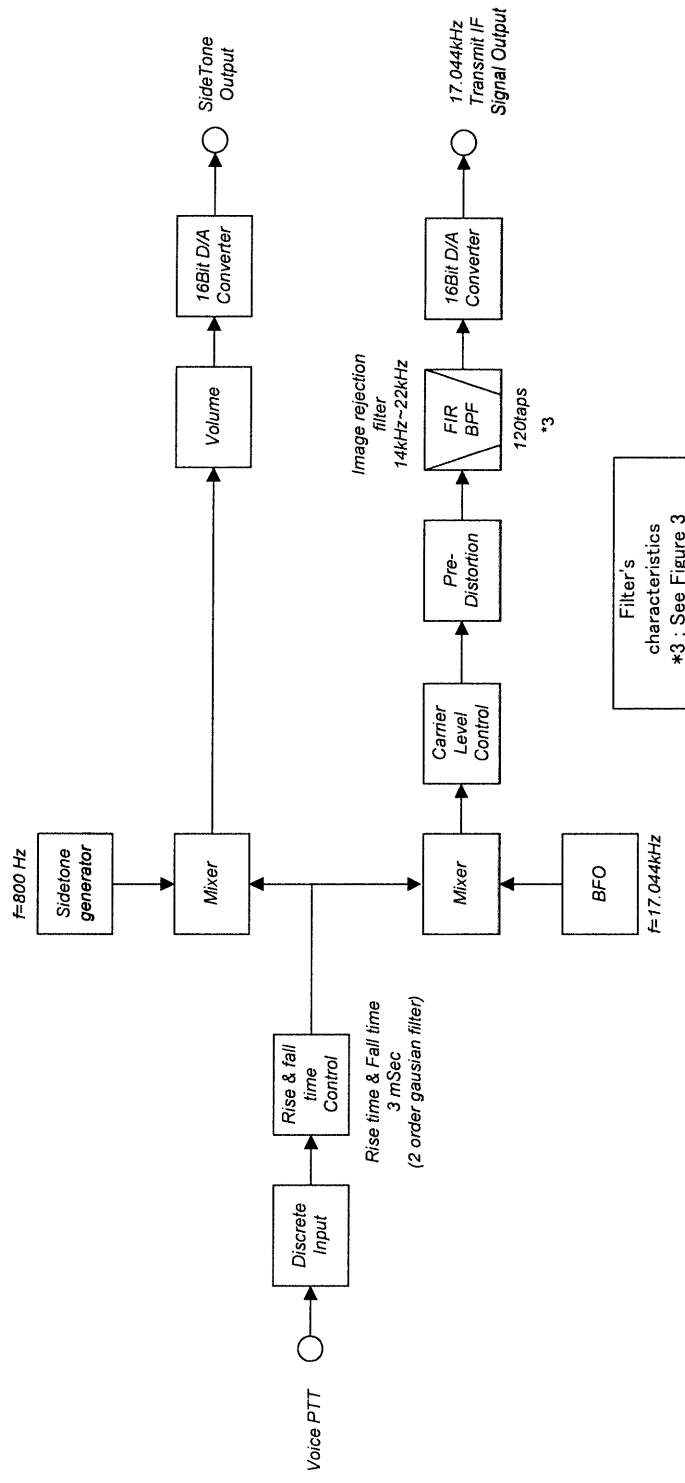


NTD-29A SSB Modulation Diagram

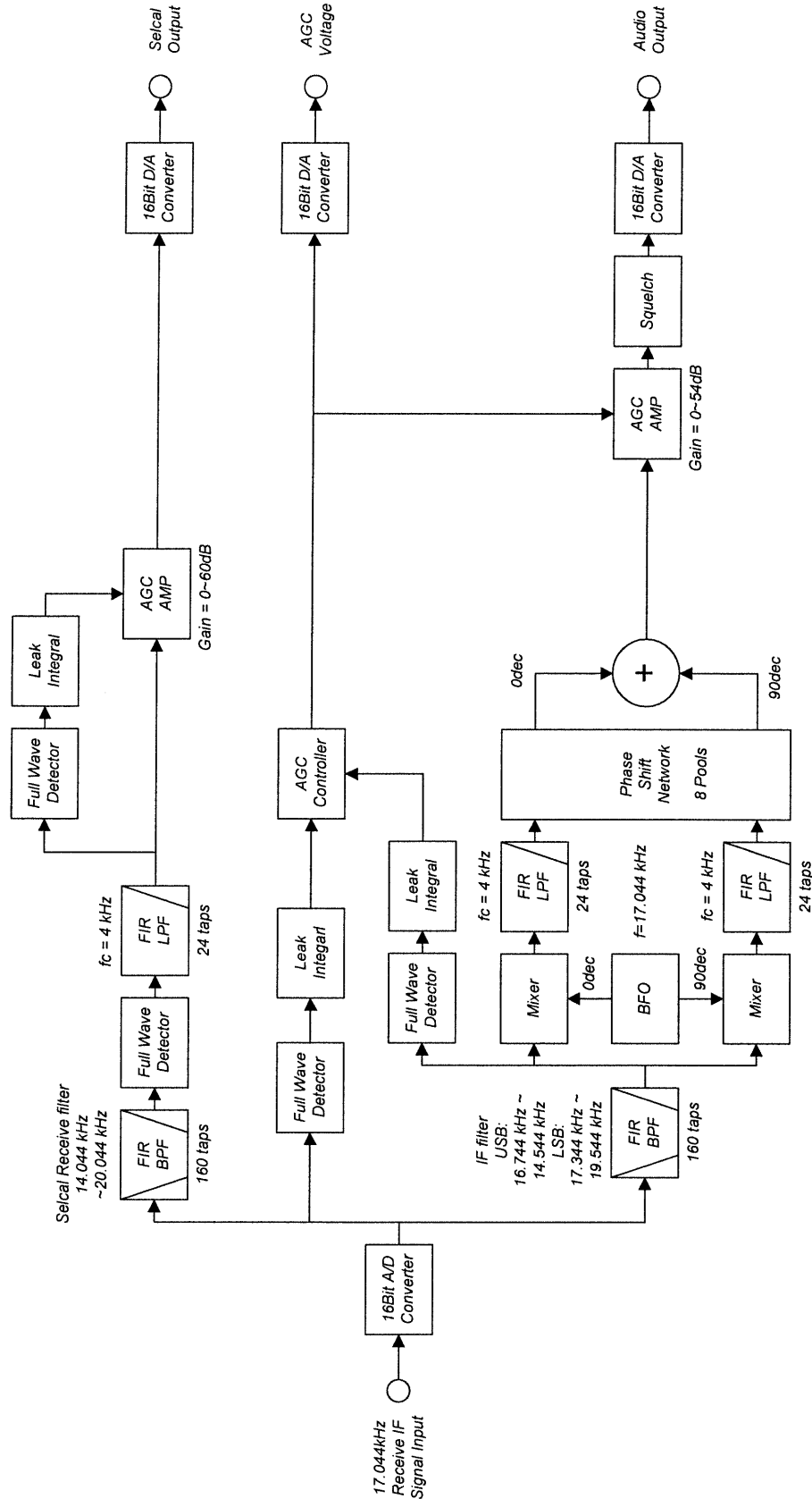


NTD-29A A3A & A3H Modulation Diagram

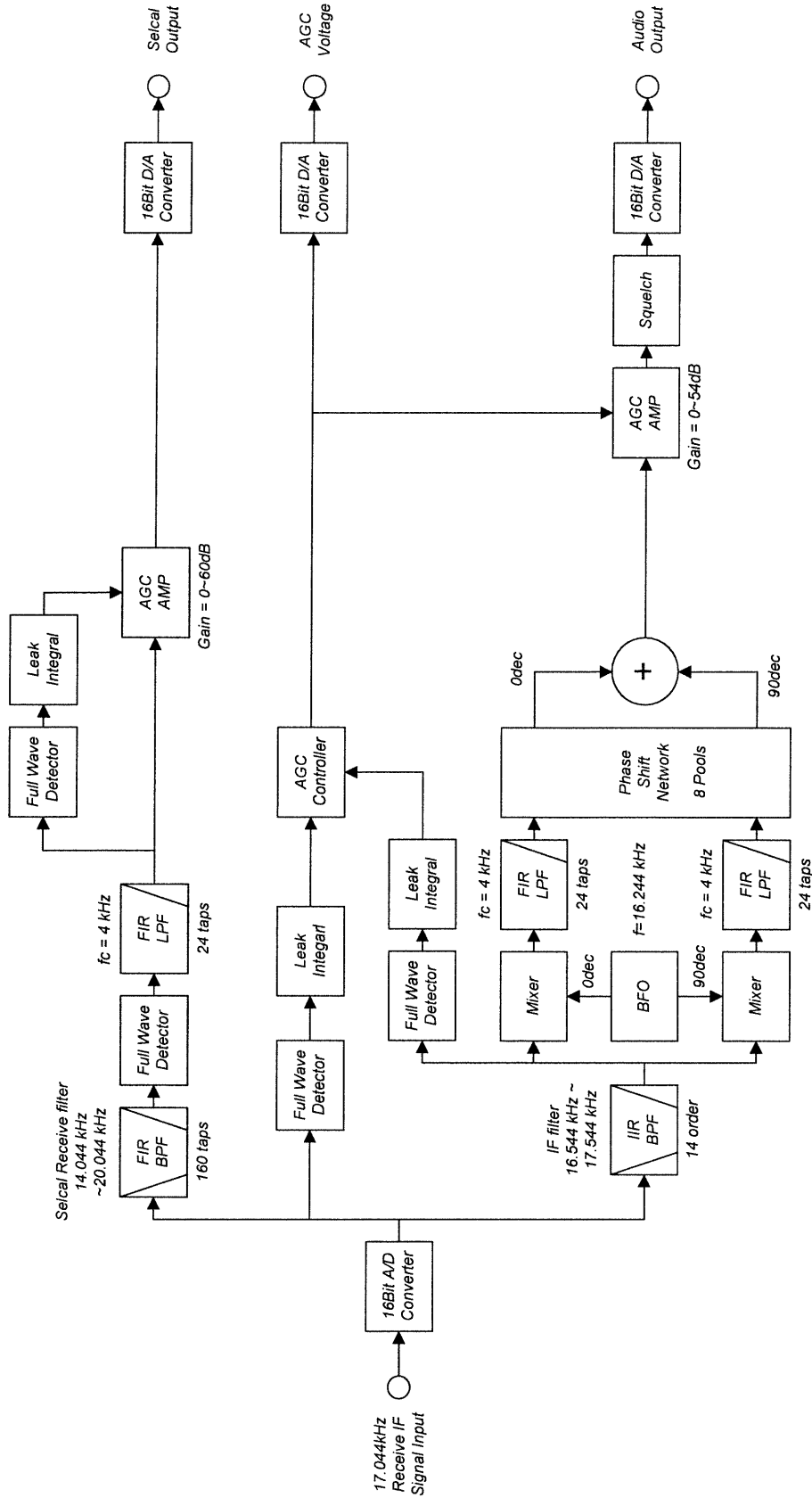




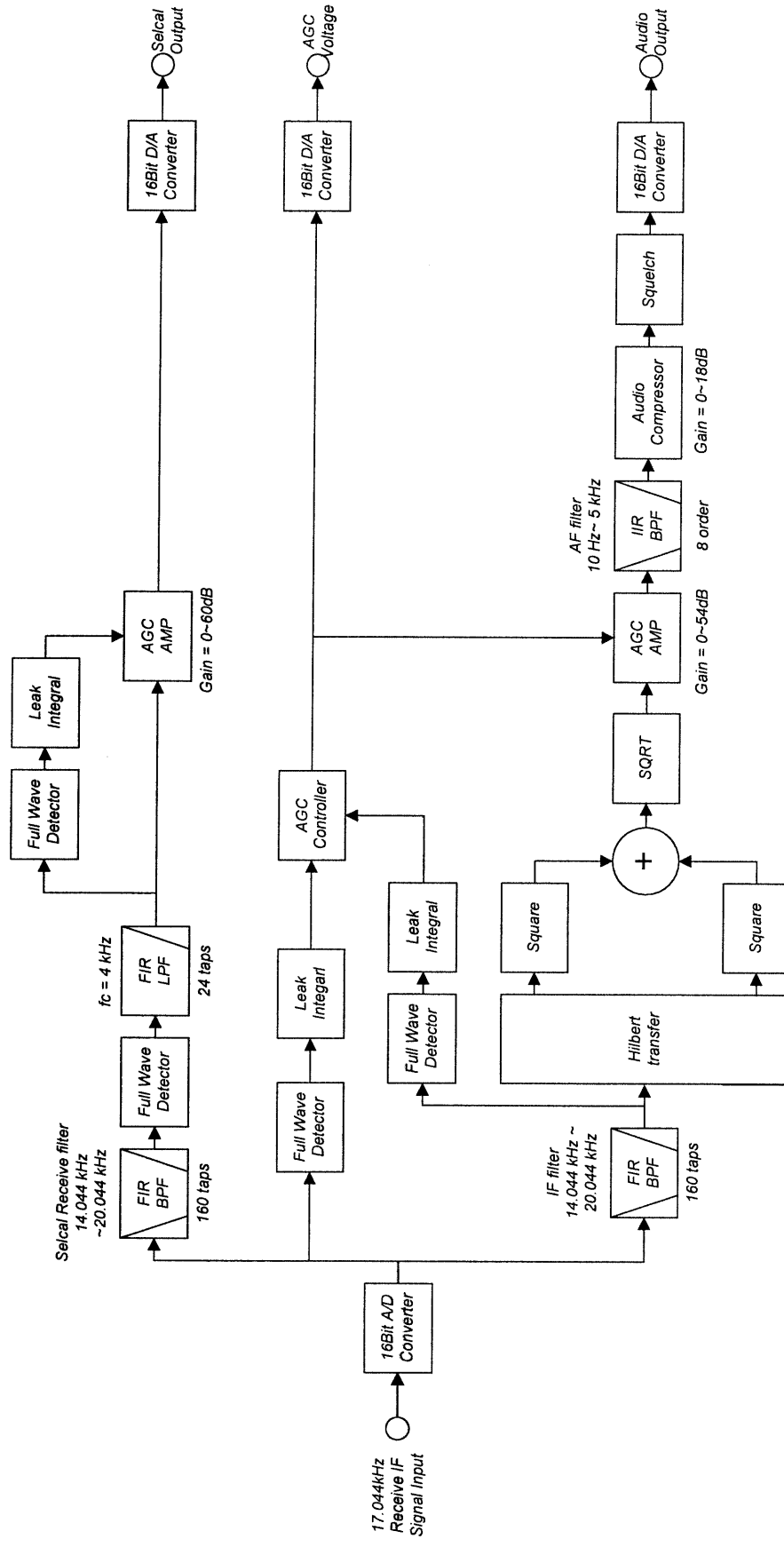
NTD-29A CW Modulation Diagram



NTD-29A SSB Demodulation Diagram



NTD-29A CW Demodulation Diagram



NTD-29A AM Demodulation Diagram