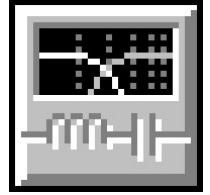


# Custom Two-Way Crossover Network Design

By Mark Carter, Walberswick Studios



## 2-Way Crossover Network

Low-Pass (LP) Filter: 1 required

Type: 1st-Order Butterworth

Desired Corner Frequency: 3000 Hz

High-Pass (HP) Filter: 1 required

Type: 2nd-Order Linkwitz-Riley

Desired Corner Frequency: 3000 Hz

C1 = 4  $\mu$ F, Polypropylene, 0.00732 ohms

L1 = 0.7 mH, Air Core (#16), 0.331 ohms

L2 = 0.17 mH, Air Core (#16), 0.27 ohms

## Tweeter

4.28 dB L-Pad

Rp1 = 2 ohms

Rp2 = 6 ohms

## Woofer

Impedance EQ

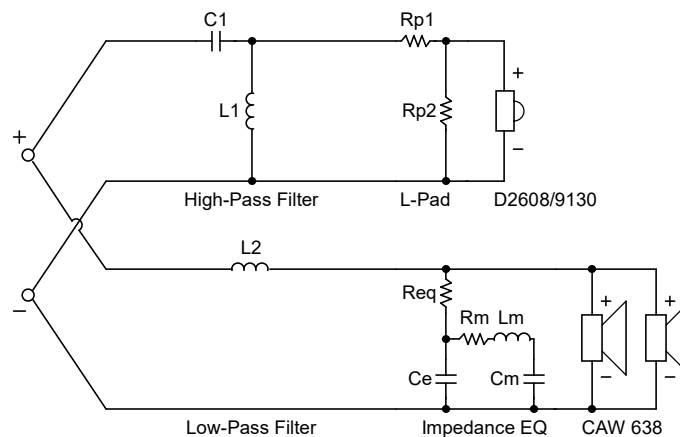
Req = 0 ohms

Ce = 0 pF

Rm = 0 ohms

Cm = 0 pF

Lm = 0 mH



## Tweeter Properties

--Driver Description--

Name: D2608/9130

Type: Standard one-way driver

Company: Scan-Speak

--Driver Configuration--

**No. of Drivers = 1**

--Driver Parameters--

Fs = 700 Hz

Qms = 0.51

Qes = 0.65

Re = 6.6 ohms

Le = 0.04 mH

Z = 8 ohms

2.83-V SPL = 91.3 dB

## Woofer Properties

--Driver Description--

Name: CAW 638

Type: Standard one-way driver

Company: Morel

--Driver Configuration--

**No. of Drivers = 2**

Mounting = Standard

Wiring = Parallel

--Driver Parameters--

Fs = 43 Hz

Qms = 2.2

Vas = 15.7 liters [31.4]

Sd = 119 sq.cm [238]

Qes = 0.58

Re = 6.4 ohms [3.2]

Le = 0.63 mH [0.315]

Z = 8 ohms [4]

2.83-V SPL = 86 dB [92.02]



Graph Key: — LP — HP — Net

