

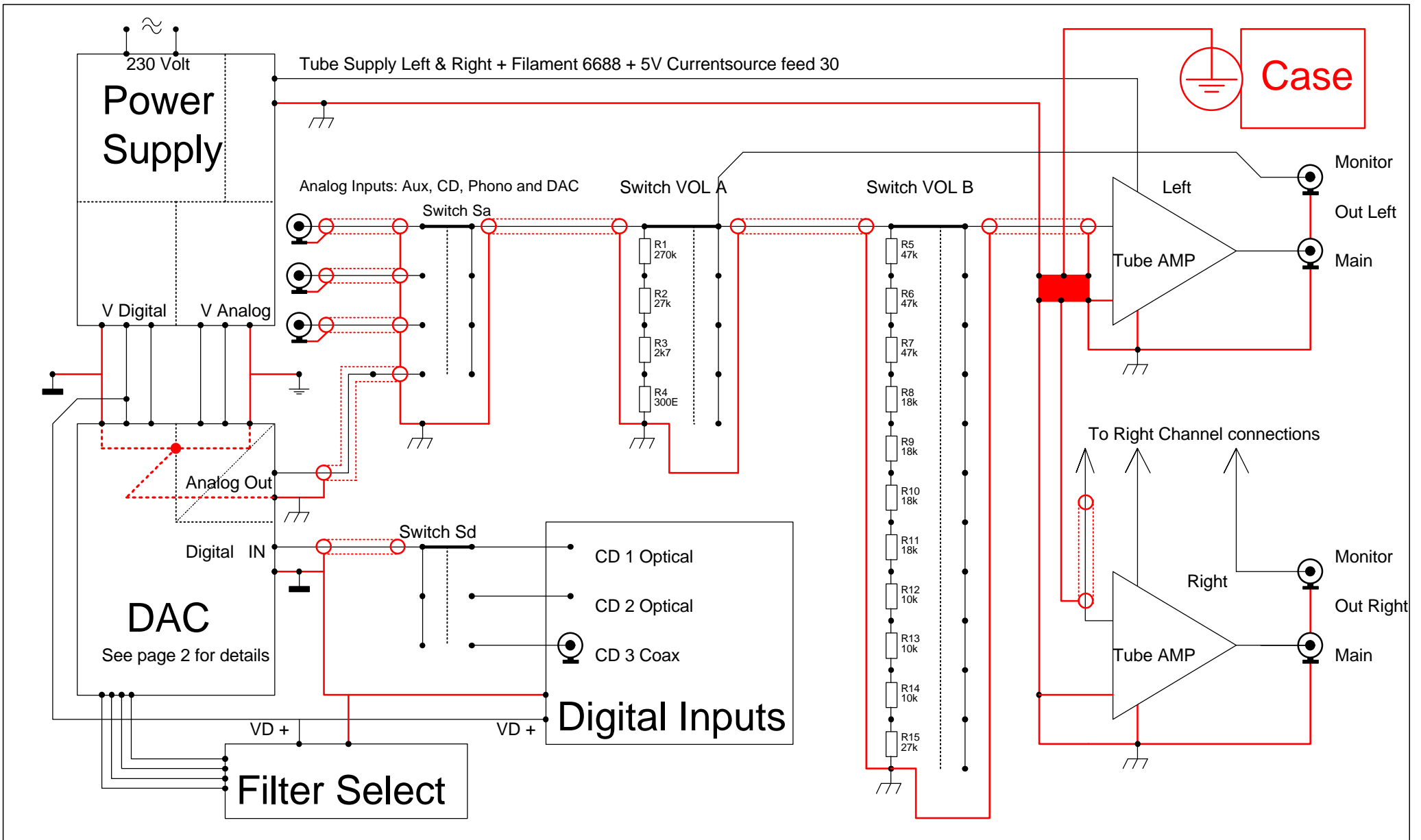
DDDAC 2000




Digital to Analog Converter

And

Tube Line AMP

By Doede Douma
Version 1.0 Update October 31 2000



-  Analog Ground Line AMP
-  Analog Ground DAC
-  Digital Ground DAC

Switch VOL A: Pre Volume Range 0dB, -20dB, -40dB, -60dB

Switch VOL B: Volume Range 0dB, -2dB, -4dB, -6dB, -8dB, -9dB, -11dB, -14dB, -15dB, -17dB, -20dB, -99dB

DDDAC 2000, Block Diagram

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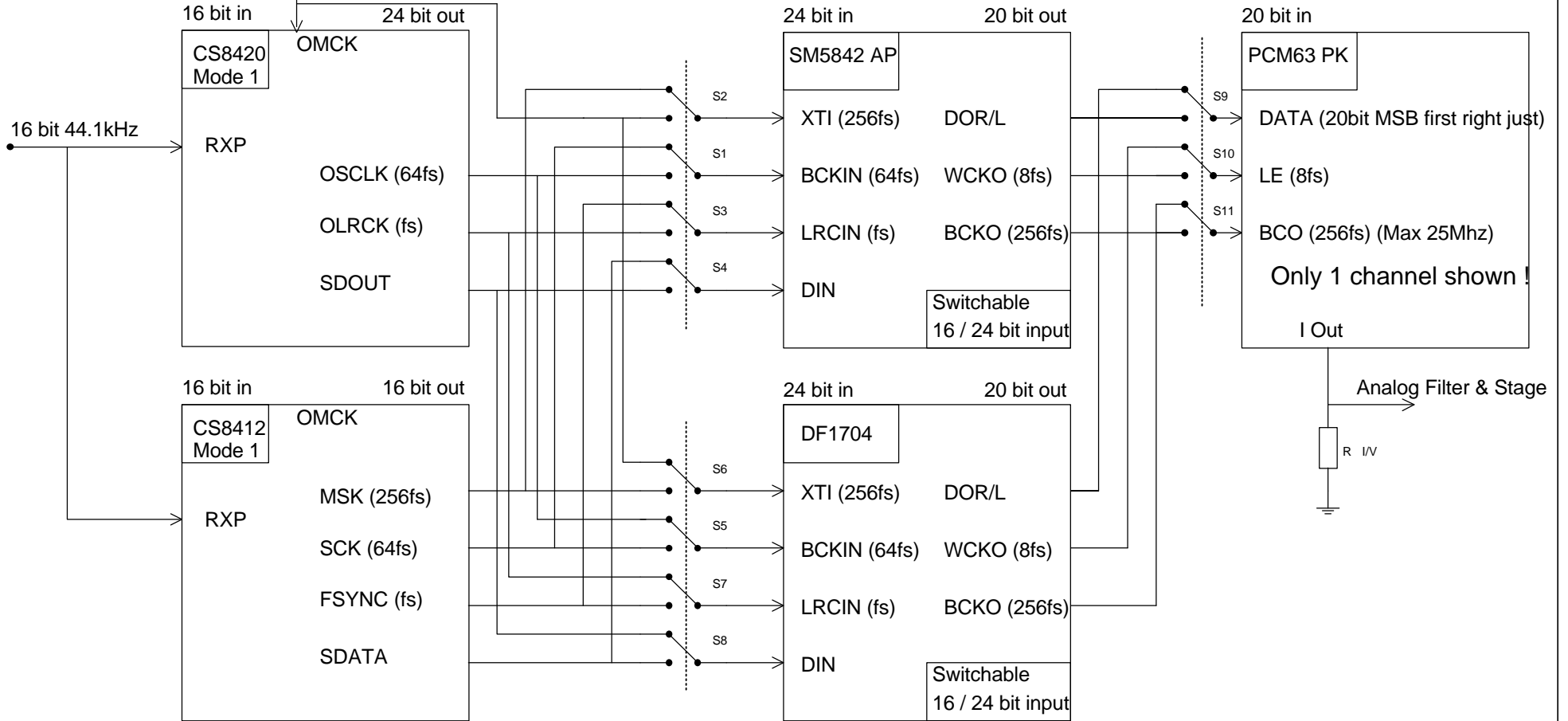
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XClock Oscillator
 256 x fs
 fs = 44.1 - 50 kHz

fs	8 fs freq	64 fs freq	256 fs freq
44.1 kHz	352,8Hz	2.8224 MHz	11.2896 MHz
50.78125 kHz	406.25 kHz	3.2500 MHz	13.0000 MHz



At Clockspeeds of 256fs clocked data is 32 bit wide

The 3 switchbanks allows all possible combinations of receivers and digital filters

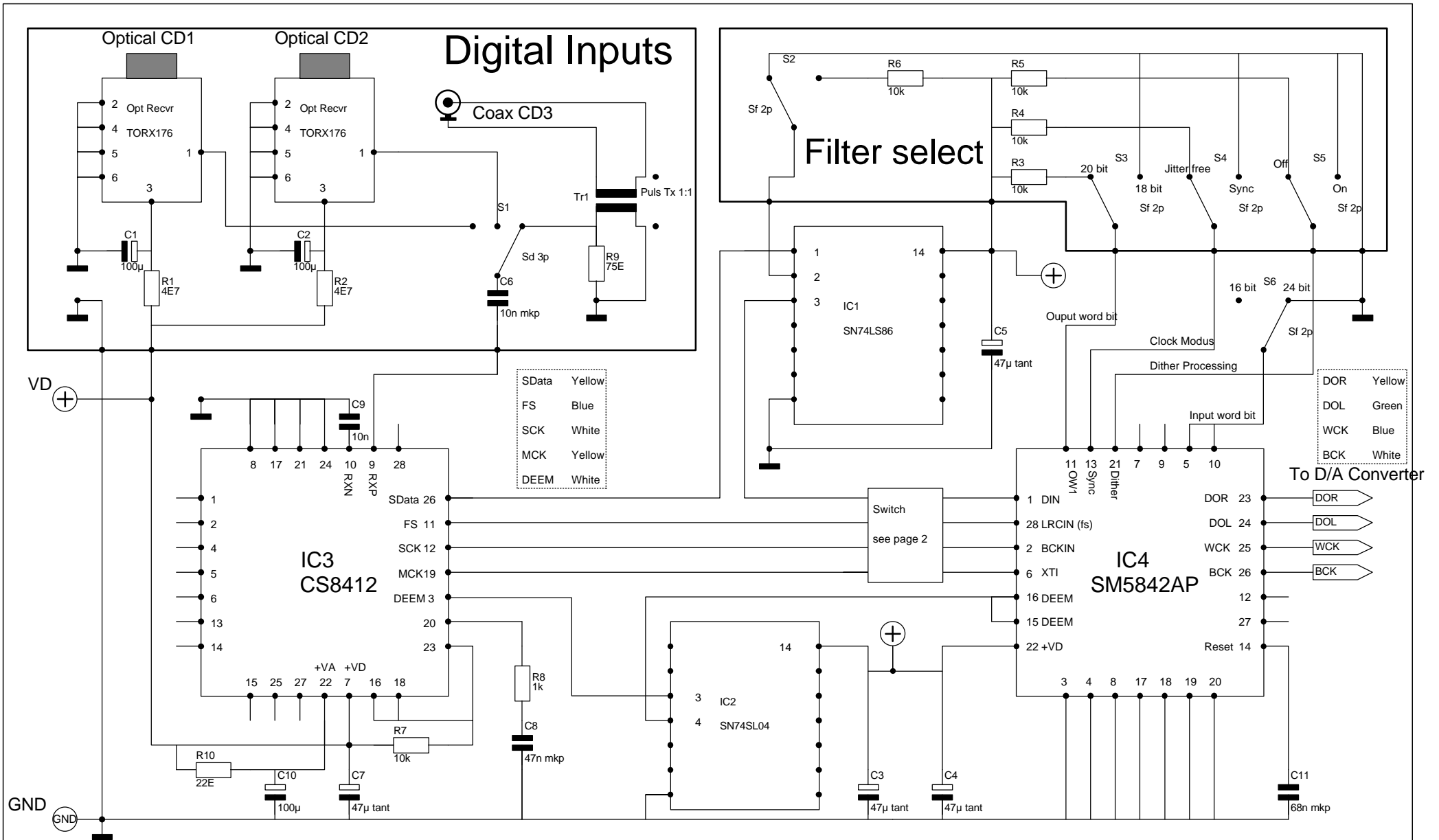
DDDAC 2000, DAC Basics

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- S2: Invert Data
- S3: 18 bit / 20 bit
- S4: Jitter Free / Sync
- S5: Dither on / off
- S6: 16 bit / 20 bit

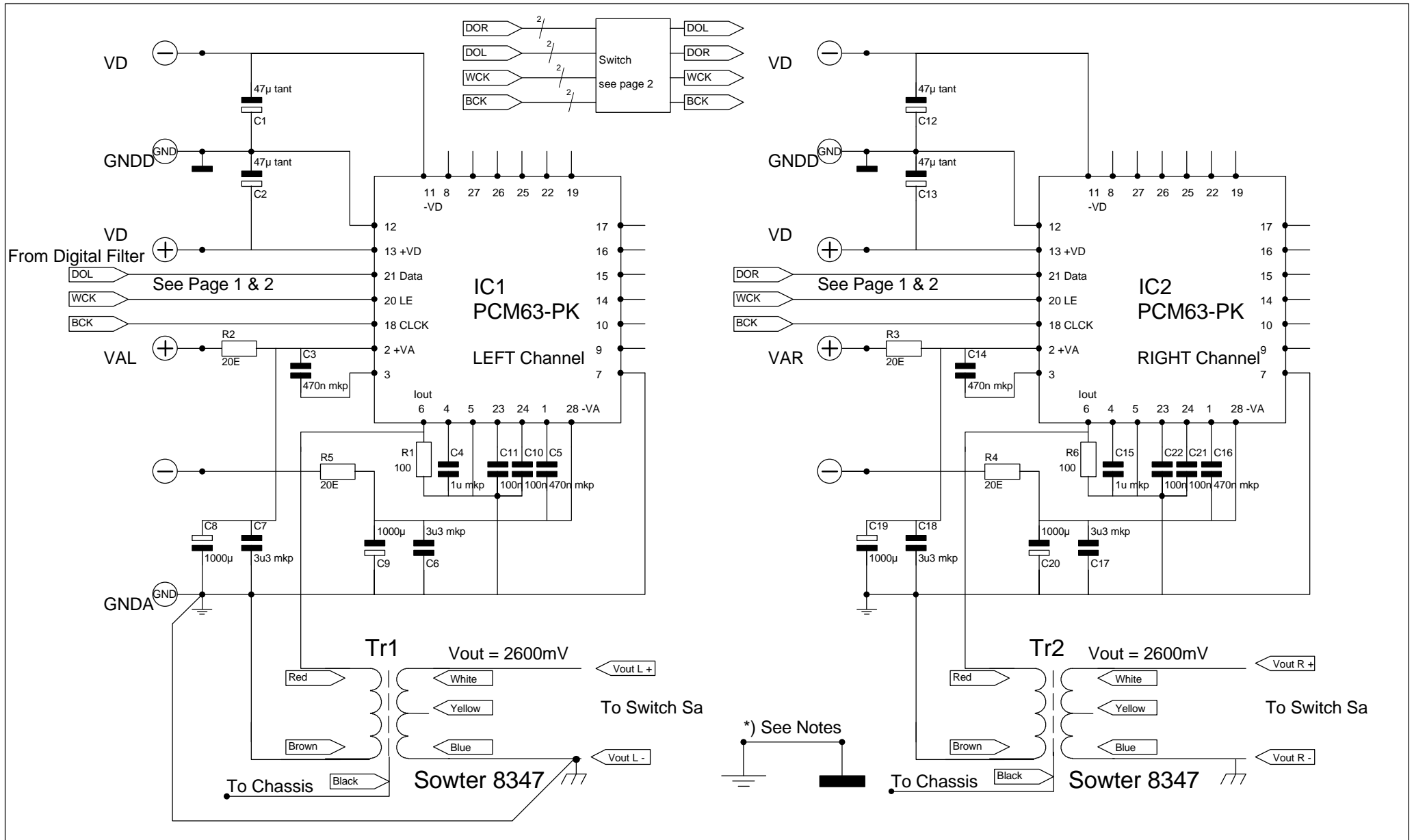
DDDAC 2000, Digital Filter 1

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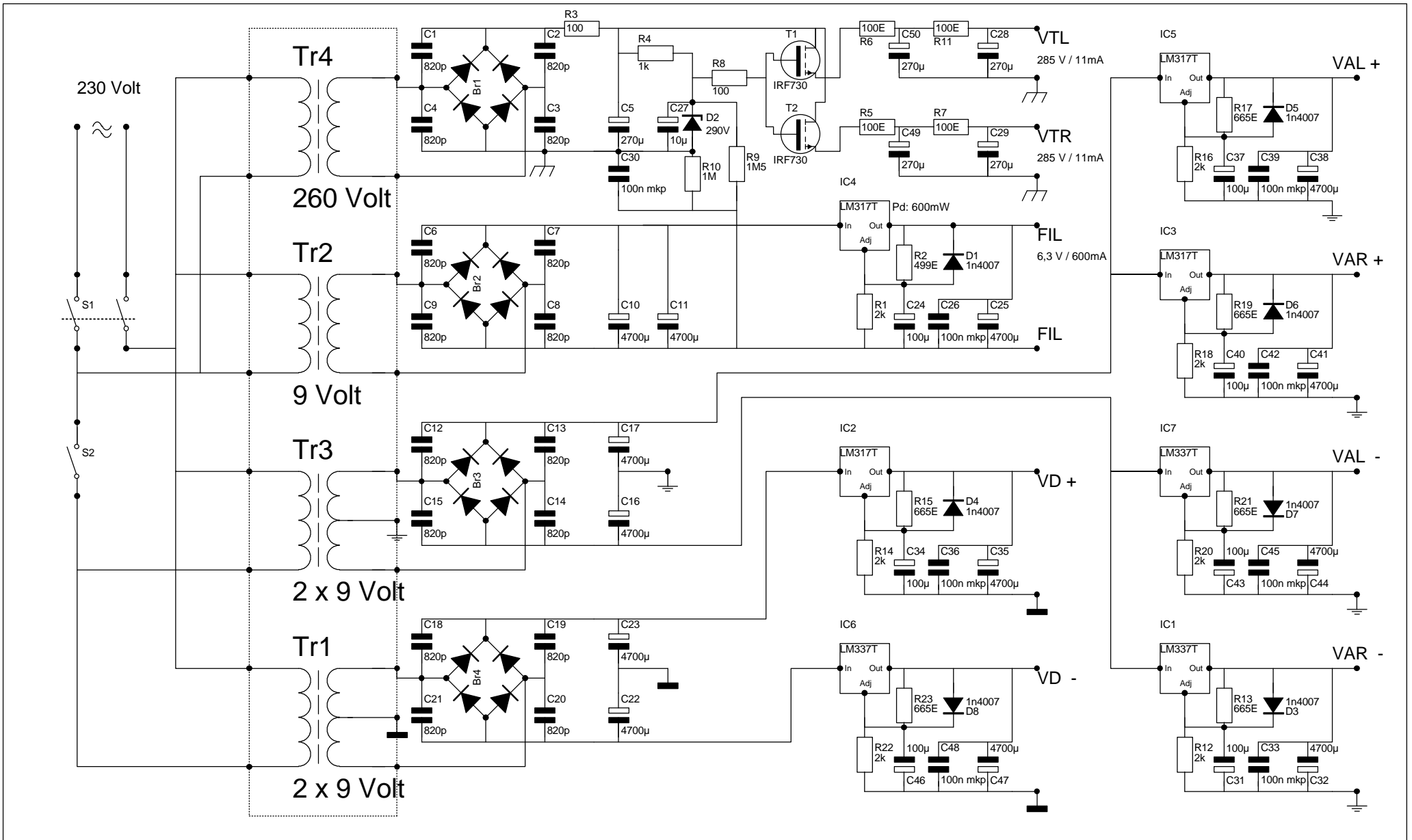
DDDAC 2000, DAC Stage




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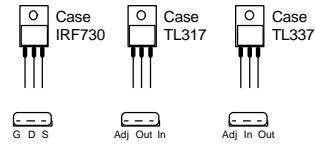
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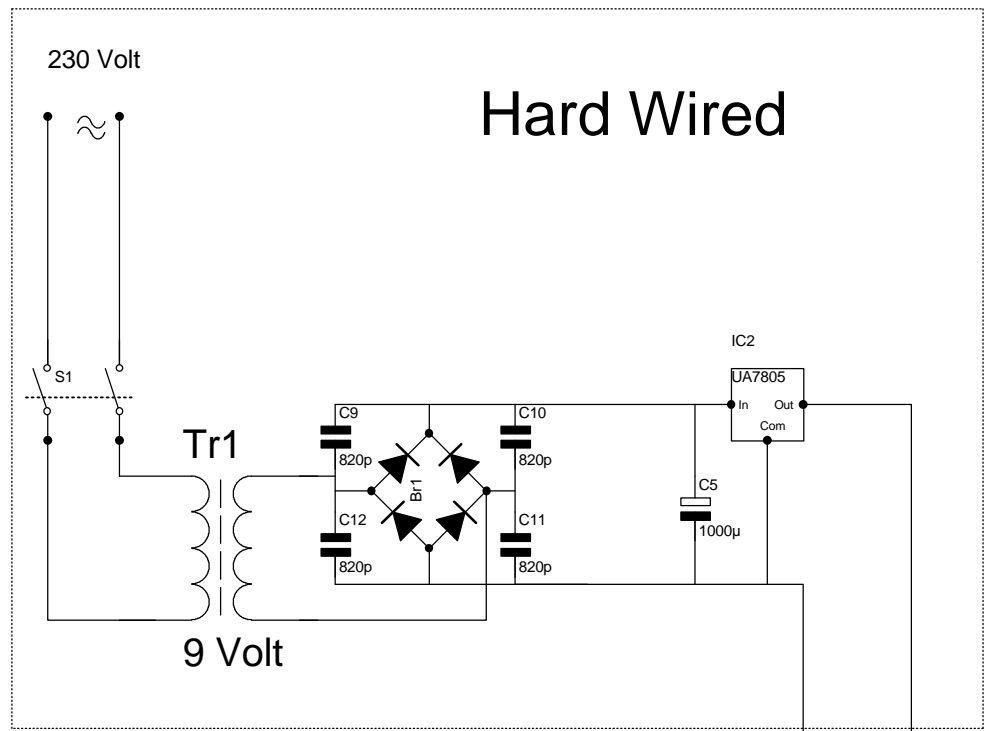


-  Analog Ground Line AMP
-  Analog Ground DAC
-  Digital Ground DAC

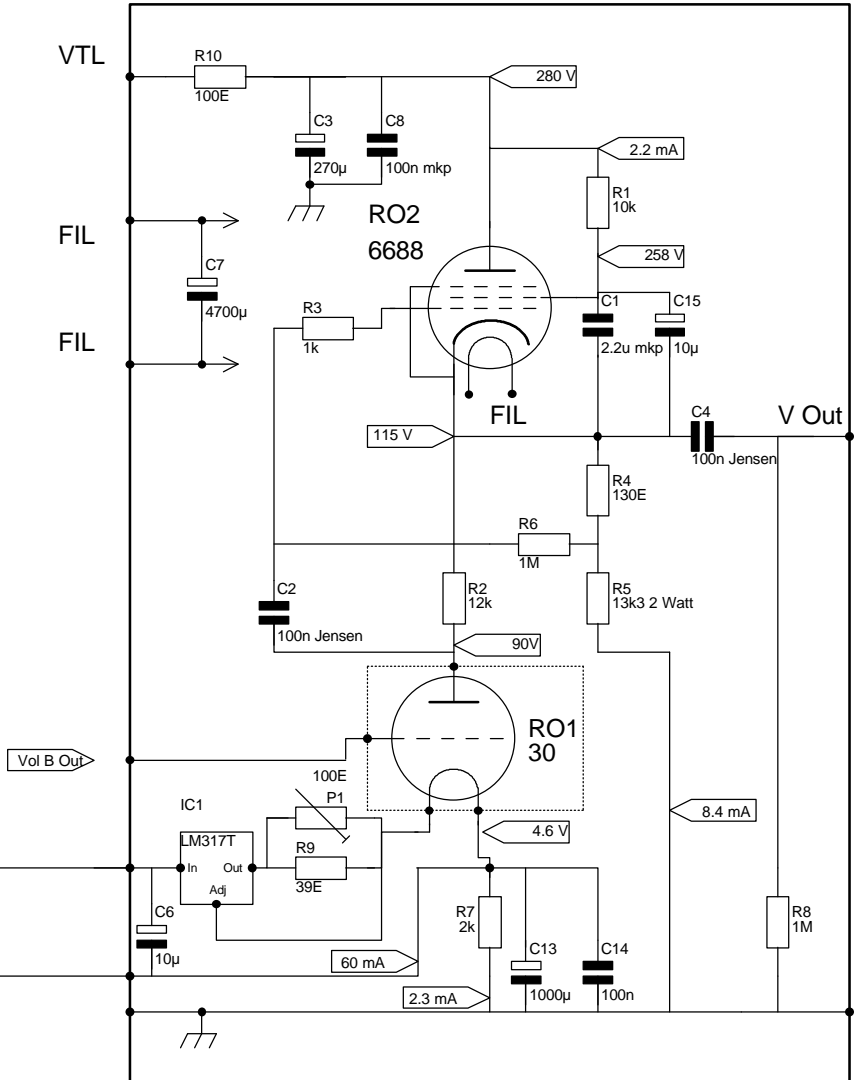
VTL: 285 Volt
 FIL: 6,3 Volt
 VD/VA: 5,0 Volt



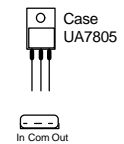
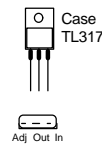
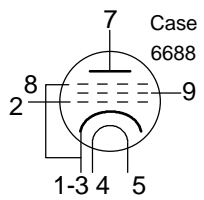
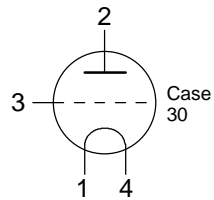
DDDAC 2000, Power Supply	
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Hard Wired



Right Channel identical to Left Channel. All parts x 2
 NB: Filament supply is floating !!
 Adjust Filament at 2.00 Volt with P1



DDDAC 2000, Tube Line AMP

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