LIST OF EXAMPLES INCLUDED IN SIMSIDES

Basic Architectures

mod0.mdl	Ideal "0"-order ΣΔ modulator
mod1.mdl	Ideal First-order SC ΣΔ modulator with FE integrator
mod2.mdl	Ideal Second-order SC ΣΔ modulator with FE integrator and real-waveform DAC
mod2_idealmb.mdl	Ideal Second-order SC ΣΔ modulator with FE integrator and multi-bit quantization and real-waveform DAC
mod2_idealsb.mdl	Ideal Second-order SC ΣΔ modulator with FE integrator and single-bit quantization
SDM2ndSC_Zdomain.mdl	Ideal Second-order ΣΔ modulator with FE integrator using a "Z-Domain" model
SDM2ndSC_DCgain.mdl	Second-order SC ΣΔ modulator with FE integrator and single-bit quantization and OTA DC gain
SDM2ndSC_Noise.mdl	Second-order SC ΣΔ modulator with FE integrator and single-bit quantization and thermal noise
SDM2ndSC_Settling.mdl	Second-order SC ΣΔ modulator with FE integrator and single-bit quantization and incomplete settling error
SDM4thBPSC_ZDomain.mdl	Ideal Fourth-order Band-Pass ΣΔ modulator with LDI resonators, considering "Z-Domain" models
SDM4thBPSC_Ideal.mdl	Ideal Fourth-order SC Band-Pass ΣΔ modulator with LDI resonators
SDM4thBPSC_MonteCarlo.mdl	Fourth-order SC Band-Pass ΣΔ modulator with LDI resonators and mismatch error
SDM4thBPSC_Noise.mdl	Fourth-order SC Band-Pass ΣΔ modulator with LDI resonators and thermal noise
SDM4thBPSC_Settling.mdl	Fourth-order SC Band-Pass ΣΔ modulator with LDI resonators and incomplete settling error
c21_ideal.mdl	Ideal cascade 2-1 SC ΣΔ modulator with FE integrator
c211_ideal.mdl	Ideal cascade 2-1-1 SC ΣΔ modulator with FE integrator

Switched-Capacitor (SC) ΣΔ Modulators

mod2_manual_example.mdl	Second-order Low-Pass example included in the user guide
mod2_FElp_multibit.mdl	Second-order Low-Pass with FE integrators and multi-bit quantization
mod2_LDlp_alleffects.mdl	Second-order Low-Pass with LD integrators including all circuit errors
mod2_LDbp_alleffects.mdl	Second-order Band-Pass with LD integrators including all circuit errors
fifthorder_LDlp_allerrors.mdl	Fifth-order Feed-forward Low-Pass with LD integrators including all circuit errors
c21_manual_example.mdl	Cascade 2-1 Low-Pass with FE integrators included in the user guide
c21_FEbp_dcgain.mdl	Cascade 2-1 Band-Pass with FE integrators including OTA DC gain
c21_FElp_alleffects.mdl	Cascade 2-1 Low-Pass with FE integrators including all circuit errors
c211_FElp_alleffects_mb.mdl	Cascade 2-1 Low-Pass with multi-bit quantization (last stage) and FE integrators including all circuit errors
c21_FElp_mismatch.mdl	Cascade 2-1 Low-Pass with FE integrators including mismatch error
c21_LDlp_cnl.mdl	Cascade 2-1 Low-Pass with LD integrators including nonlinear capacitors
c21_FEbp_sampnl.mdl	Cascade 2-1 Band-Pass with FE integrators including nonlinear switch on resistance
c21_FEbp_sampnl_IM3.mdl	Cascade 2-1 Band-Pass with FE integrators including nonlinear switch on resistance and two-tone input to characterize IM3
c211_FElp_ideal.mdl	Ideal cascade 2-1-1 Low-Pass with FE integrators
c211_FElp_alleffects.mdl	Cascade 2-1-1 Low-Pass with FE integrators including all circuit errors
c211_FElp_alleffects_mb.mdl	Cascade 2-1 Low-Pass with multi-bit quantization (last stage) and

	FE integrators including all circuit errors
c211_FElp_noise.mdl	Cascade 2-1-1 Low-Pass with FE integrators including thermal noise
c211_FElp_settling.mdl	Cascade 2-1-1 Low-Pass with FE integrators including incomplete settling error
c211_FElp_DCgain.mdl	Cascade 2-1-1 Low-Pass with FE integrators including finite OTA DC gain

Switched-Current (SI) ΣΔ Modulators

c211_FEbp_basic.mdl	Ideal cascade 2-1-1 Band-Pass with Forward-Euler (FE) integrators
c211_FEbp_finitecond.mdl	Cascade 2-1-1 Band-Pass with finite output conductance with FE integrators
c211_LDbp_finitecond_settling.mdl	Cascade 2-1-1 Low-Pass with LD integrators including finite output conductance and incomplete settling error
c211_FEbp_allerrors.mdl	Cascade 2-1-1 Band-Pass with FE integrators including all circuit errors
c211_FElp_basic.mdl	Ideal cascade 2-1-1 Low-Pass with FE integrators
c211_FElp_allerrors.mdl	Ideal cascade 2-1-1 Low-Pass with FE integrators including all circuit errors
mod2_FEbp_alleffects.mdl	Second-order Low-Pass with FE integrators including all circuit errors
mod2_LDlp_basic_multibit.mdl	Second-order Low-Pass with LD integrators and multi-bit quantization
modelsi.m	M file including some model parameters

Continuous-Time (CT) ΣΔ Modulators

mod2_lp_GmC_ideal.mdl	Ideal second-order Low-Pass CT modulator with Gm-C integrators
mod2_lp_GmC_multibit_td_jitter.mdl	Ideal second-order Low-Pass CT modulator with Gm-C integrators, multi-bit quantization and clock jitter error
mod5th_lp_ct.mdl	Fifth-order Low-Pass CT modulator with Gm-C integrators and main circuit errors
mod5th_lp_ct_depdelay.mdl	Fifth-order Low-Pass CT modulator with Gm-C integrators and signal-dependent loop delay
mod5th_lp_ct_fixdelay.mdl	Fifth-order Low-Pass CT modulator with Gm-C integrators and fixed-loop delay
mod5th_ff_GmC.mdl	Fifth-order Feed-Forward Low-Pass CT modulator with Gm-C integrators and fixed-loop delay
mod2_BPgmC_1pole.mdl	Second-order Band-Pass CT modulator with Gm-C integrators with 1-pole dynamics
mod2_BPgmC_1pole_delay.mdl	Second-order Band-Pass CT modulator with Gm-C integrators with 1-pole dynamics and excess loop delay
mod2_BPgmC_1pole_td_jitter.mdl	Second-order Band-Pass CT modulator with Gm-C integrators with 1-pole dynamics and clock jitter error
mod2_BPgmC_2poles.mdl	Second-order Band-Pass CT modulator with Gm-C integrators with 2-pole dynamics
c211_GmC.mdl	Cascade 2-1-1 Low-Pass CT modulator with Gm-C integrators and main circuit errors
c32_GmC.mdl	Cascade 3-2 Low-Pass CT modulator with Gm-C integrators and main circuit errors

Hybrid Continuous-Time/Discrete-Time ΣΔ Modulators

c22_SR_GmC_SC.mdl	Cascade 2-2 Hybrid Gm-C/SC Modulator with main circuit errors
c22_SR_GmC_SI.mdl	Cascade 2-2 Hybrid Gm-C/SI Modulator with main circuit errors
c22_DSMR_gmC_SC_r2.mdl	Cascade 2-2 Downsampling Multirate Hybrid Gm-C/SC Modulator with multirate ratio r=2
c22_DSMR_gmC_SC_r4.mdl	Cascade 2-2 Downsampling Multirate Hybrid Gm-C/SC Modulator with multirate ratio r=4

Frequency/Time-based (VCO/GRO) ΣΔ Modulators (Library named FREQ_BASED_SDMs)

BabaieRomboutsVCOSDM	Model based on the VCO-ΣΔM proposed by A. Babaie and P. Rombouts at IEEE JSSC, Aug. 2017.
MASH MASH21_DT MASH31_DT MASH_3bit MASH_4bit MASH_VCO_GRO	Several models of VCO/GRO-GRO cascade architectures (one of them corresponds to the architecture by M. Honarparvar et al. at ISCAS 2018.)
Multiphase_VCOSDM	Multiphase (11-phase) VCO-based - ΣΔM
Standalone_GRO	Single GRO-based ΣΔM including both linear and nonlinear models