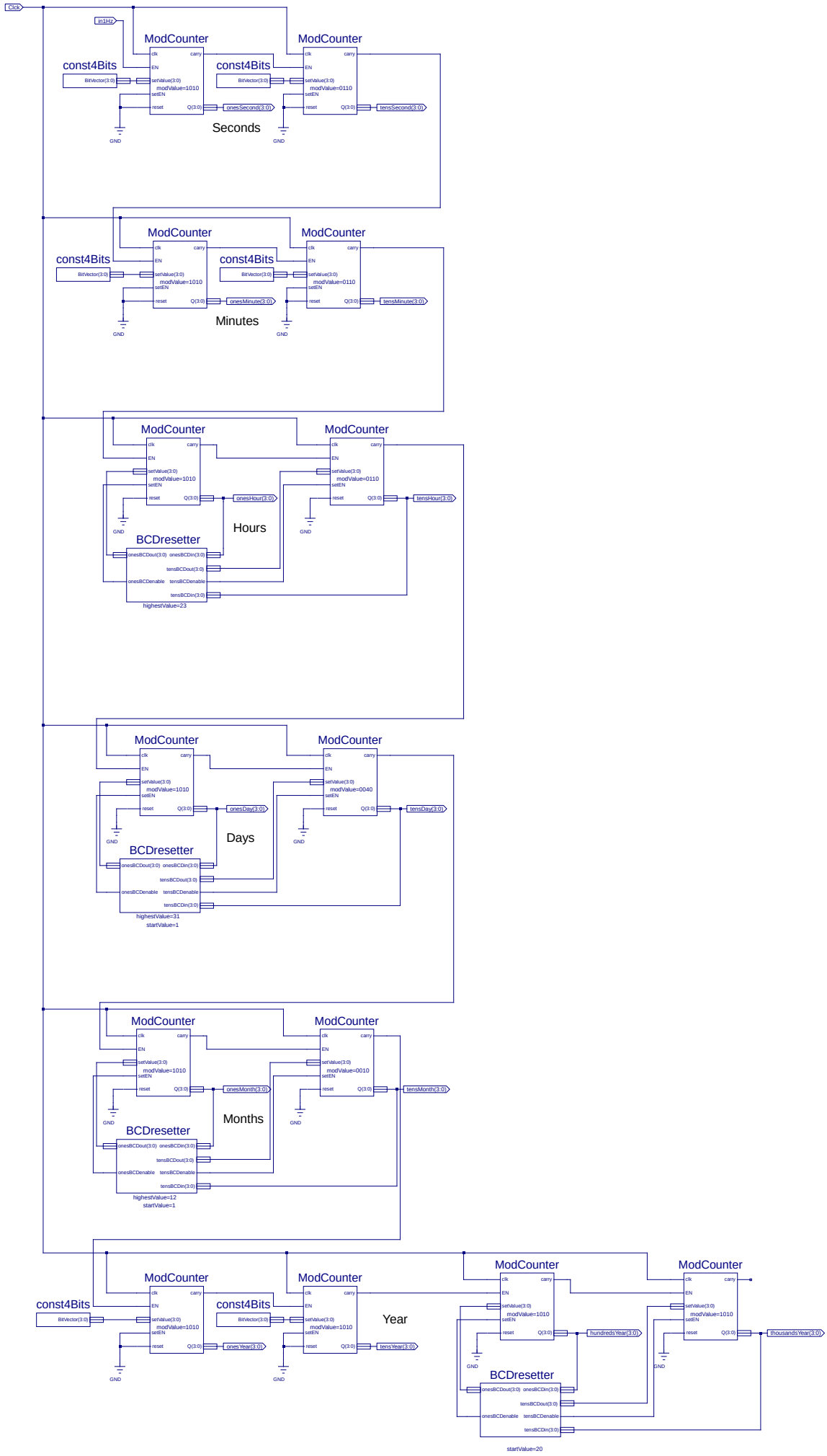
Clck
in1Hz
ModCounter
const4Bits
BitVector(3:0)
clk
carry
EN
setValue(3:0)
modValue=1010
setEN
reset
Q(3:0)
onesSecond(3:0)
modValue=0110
tensSecond(3:0)
GND
Seconds
onesMinute(3:0)
tensMinute(3:0)
Minutes
onesHour(3:0)
tensHour(3:0)
Hours
BCDresetter
onesBCDout(3:0)
onesBCDin(3:0)
tensBCDout(3:0)
onesBCDenable
tensBCDenable
tensBCDin(3:0)
highestValue=23
modValue=0040
onesDay(3:0)
tensDay(3:0)
Days
highestValue=31
startValue=1
modValue=0010
onesMonth(3:0)
tensMonth(3:0)
Months
highestValue=12
startValue=1
onesYear(3:0)
tensYear(3:0)
Year
hundredsYear(3:0)
thousandsYear(3:0)
startValue=20