



$C3$   $C=Cds$   
 $Qds$

nx = node numbers  
 bx = branch numbers

Where

$I(b1) <+ Igs;$   
 $I(b2) <+ Igd;$   
 $I(b3) <+ Ids;$   
 $I(b3) <+ ddt(Qds);$   
 $I(b4) <+ ddt(Qgs);$   
 $I(b5) <+ Area*V(b5)/Rin;$   
 $I(b6) <+ ddt(Qgd);$   
 $I(b7) <+ V(b7)/Rg;$   
 $I(b8) <+ Area*V(b8)/Rd;$   
 $I(b9) <+ Area*V(b9)/Rs;$   
 $fourkt = 4.0 * P\_K * T2$   
 $I ds\_n = I(b3) <+ white\_noise(thermal\_pwr, "thermal")+$   
 $flicker\_noise(flicker\_pwr, 1.0, "flicker")$   
 $IRg\_n = I(b7) <+ white\_noise(Area*fourkt/Rg\_T2, "thermal")$   
 $IRd\_n = I(b8) <+ white\_noise(Area*fourkt/Rd\_T2, "thermal")$   
 $IRs\_n = I(b9) <+ white\_noise(Area*fourkt/RS\_T2, "thermal")$

Values for thermal\_pwr and flicker\_pwr are given in the text.