

$L = 3.14 * (N(j) + V(j)) / 2$   
 $Wkpr = Uk * Tu / (2 * Br * S)$

$w = 0$

$w = w + 1$

If  $w = 1$  Then GoTo 8

$6 Rb = Rb - 200$

Print "Rb=", Rb

Print "Wb=", Wb

Print "Wk3=", Wk3

Print "Wv=", Wv

Print "Wsm=", Wsm

GoTo 12

$7 Rb = Rb + 200$

Print "Rb=", Rb

Print "Wb=", Wb

Print "Wk3=", Wk3

Print "Wv=", Wv

Print "Wsm=", Wsm

GoTo 12

$8 V = 0$

$9 V = V + 1$

If  $V > 1$  Then GoTo 10

$Wv = Nv * Wkpr$

$10 i = 0$

$11 i = i + 1$

If  $i > 1$  Then GoTo 12

$Wsm = Nsm * Wkpr$

$ism = Hsm * L / Wsm$

$Rsm = Esm / ism$

$12 Rv1 = Rv / Nv^2$

$Rsm1 = Rsm / Nsm^2$

$C = Rv1 * Rsm1 / (Rv1 * Rsm1 + Rk * Rsm1 + Rk * Rv1)$

$F = (Rsm1 + Rv1) / (Rv1 * Rsm1 + Rk * Rsm1 + Rk * Rv1)$

$P = Wsm^2 * Rb / Rsm + Wv^2 * Rb / Rv + Hs * (1 + q) * Tu * L * Rb / (2 * Br * S) + Bs * L * Rb * (Atn(Br / Bs)) / (Br * S * Rm)$

$X = Hs * (1 + q) * L * C$

$U = Bet * (1 - F * Rk) * Uk + Eb * C$

$M = Bet * Eb + Rb * Uk * F$

$d1 = 4 * Br * S * Rk * (1.21 * M - Uk * C * Rb / Rk) * (1.21 * Rb * X + Uk^2 * C * Rb * Tu / (2 * Br * S * Rk)) - 1.21 * U^2 * Rb * Uk * Tu - 4.84 * U * Bet * Rk * X * Rb * Br * S$

$d2 = 2 * Br * S * Rk * (1.21 * M - Uk * C * Rb / Rk)^2 + 2.42 * U^2 * Rb * Br * S$

$d = d1 / d2$

$e1 = 2 * Br * S * Rk * (1.21 * Rb * X + Uk^2 * C * Rb * Tu / (2 * Br * S * Rk))^2 - 4 * Br * S * Rk * Uk * C * P * (1.21 * M - Uk * C * Rb / Rk)$

$e2 = 2.42 * U^2 * Br * S * Rk * P + 2.42 * U * Bet * Rk * X * Rb * Uk * Tu + 2.42 * Bet^2 * Rk^2 * X^2 * Rb * Br * S$

$e3 = (2 * Br * S * Rk * (1.21 * M - Uk * C * Rb / Rk)^2 + 2.42 * U^2 * Rb * Br * S)$