

$e = (e1 + e2) / e3$
 $t = (-4 * Br * S * Rk * Uk * C * P * (1.21 * Rb * X + Uk^2 * C * Rb * Tu / (2 * Br * S * Rk)) - 4.84 * U * Bet * Rk^2 * X * Br * S * P - 1.21 * Bet^2 * Rk^2 * X^2 * Rb * Uk * Tu) / (2 * Br * S * Rk * (1.21 * M - Uk * C * Rb / Rk)^2 + 2.42 * U^2 * Rb * Br * S)$
 $z = (2 * Uk^2 * C^2 * P^2 * Br * S * Rk + 2.42 * Bet^2 * Rk^3 * X^2 * Br * S * P) / (2 * Br * S * Rk * (1.21 * M - Uk * C * Rb / Rk)^2 + 2.42 * U^2 * Rb * Br * S)$
 $R = (3 * (2 * d * t - 8 * z) - 2 * e^2) / 24$
 $N = (2 * d * t - 8 * z) * e / 48 + (z * (4 * e - d^2) - t^2) / 8 - e^3 / 108$
 $Nk2 = (N / 2)^2$
 $Rk3 = Abs(R / 3)^3$

If $Nk2 > Rk3$ Then GoTo 13

GoTo 3

$13 G = (-N / 2 + ((N / 2)^2 + (R / 3)^3)^{(1 / 2)})^{(1 / 3)} + (-N / 2 - ((N / 2)^2 + (R / 3)^3)^{(1 / 2)})^{(1 / 3)}$

$y = G + e / 6$

$A = (8 * y + d^2 - 4 * e)^{(1 / 2)}$

$Bk1 = (d + A) / 2$

$Bk2 = (d - A) / 2$

$Ck1 = y + (d * y - t) / A$

$Ck2 = y - (d * y - t) / A$

$DIS1 = Bk1^2 - 4 * Ck1$

$DIS2 = Bk2^2 - 4 * Ck2$

$Wk3 = -Bk2 / 2 + ((DIS2)^{(1 / 2)}) / 2$

$Wk4 = -Bk2 / 2 - ((DIS2)^{(1 / 2)}) / 2$

$Wb3 = (1.21 * Wk3^2 * M + 1.21 * Wk3 * Rb * X + Uk^2 * C * Rb * Wk3 * Tu / (2 * Br * S * Rk) - Uk * C * Wk3^2 * Rb / Rk - Uk * C * P) / (1.1 * (Wk3 * U - Bet * Rk * X))$

$Wb4 = (1.21 * Wk4^2 * M + 1.21 * Wk4 * Rb * X + Uk^2 * C * Rb * Wk4 * Tu / (2 * Br * S * Rk) - Uk * C * Wk4^2 * Rb / Rk - Uk * C * P) / (1.1 * (Wk4 * U - Bet * Rk * X))$

$Tup = ((2 * Br * S / L) * (Wb3^2 / Rb + Wk3^2 / Rk + Wv^2 / Rv + Wsm^2 / Rsm) + 2 * Bs * (Atn(Br / Bs)) / Rm) / ((Wk3 * Uk) / (L * Rk) - Hs * (1 + q))$

$Tup4 = ((2 * Br * S / L) * (Wb4^2 / Rb + Wk4^2 / Rk + Wv^2 / Rv + Wsm^2 / Rsm) + 2 * Bs * (Atn(Br / Bs)) / Rm) / ((Wk4 * Uk) / (L * Rk) - Hs * (1 + q))$

$Wk = Wk3$

$Wb = Wb3$

$Wsm1 = Nsm * Wk3$

If $Abs(Wsm - Wsm1) \leq 3$ Then GoTo 15

If $Wsm - Wsm1 > 0$ Then GoTo 14

$Wsm = Wsm + 3$

14 $Wsm = Wsm - 3$

$Uvk = Uk - Rk * (Uk / Rk - Hs * (1 + q) * L / Wk3)$

$Uvsm = (Wsm / Wk3) * Uvk$

$Nsb = Wb3 / Wsm$

$Rsb = Rb / Nsb^2$

$Nsv = Wv / Wsm$

$Rsv = Rv / Nsv^2$

$Nsk = Wk3 / Wsm$

$Rsk = Rk / Nsk^2$

$Rsm = (Esm + Uvsm) / (Hsm * L / Wsm + Uvsm / Rsb + Uvsm / Rsv + Uvsm / Rsk)$

GoTo 11

15 $Wv1 = Nv * Wk3$