

INPUT TO MIK CODE

| | | | | | | | |
|----------------|-------------|-------------|------------|---------|---------|---|---|
| 4.0 | 18.0 | 2018.0 | 16 | 14 | 20 | ! | R1,R2,RF,N1,N2,N3 |
| | | | | | | ! | distance to mesh groups, no. of points in mesh groups |
| 1.0E-09 | 1.0E-09 | | | | | ! | H0,EPS |
| | | | | | | ! | input time step to gear, error control parameter |
| 1.40000000e-06 | 1.00000000 | 1.00000000 | 1.0 | | | ! | DISPRT,ETAV,ETAI,DOSE |
| | | | | | | ! | peak displ rate, v/i production efficiency, dose |
| 360.00000000 | | | | | | ! | TEMPC |
| | | | | | | ! | peak temperature |
| 0.2100000 | 0.0900000 | | | | | ! | CONCB,CONCC |
| | | | | | | ! | concentration of B, C |
| 1.00000e+14 | 9.10000e+28 | 3.50000e-10 | | | | ! | DISL,NAT,LAMBDA |
| | | | | | | ! | peak disloc density, no. density, jump distance |
| 0.785 | 0.668 | 0.872 | 0.660 | | | ! | FAV,FBV,FCV,FI -- 0.44??? |
| | | | | | | ! | jump correlation factors (A,B,C,interstitial) |
| 1.80000000 | 3.20000000 | 1.00000000 | | | | ! | WAV,WBV,WCV -- 1.6 (1.4) ,2.4 (2.3),1.0 or |
| | | | | | | ! | 1.866666666666,3.333333333 |
| | | | | | | ! | relative vac jump frequency ratios (A,B,C) |
| 1.00000000 | 1.00000000 | 1.00000000 | | | | ! | WAI,WBI,WCI |
| | | | | | | ! | relative int jump frequency ratios (A,B,C) |
| -4.28000000 | -4.21000000 | -4.44000000 | | | | ! | ECOHA,ECOHB,EOHC -- -4.28,-4.10,-4.44 |
| | | | | | | ! | cohesive energies |
| 0.90000000 | 0.90000000 | 0.90000000 | 1.00000000 | | | ! | EMIA,EMIB,EMIC,SV |
| | | | | | | ! | int migration energies, vac formation enthalpy |
| 1.28000000 | 0.97000000 | 1.04000000 | | | | ! | EMA,EMB,EMC |
| | | | | | | ! | pure element [vac] migration energies |
| 1.40000000 | 1.60000000 | 1.79000000 | 1.40000000 | | | ! | EFA,EFB,EFC,EFGB |
| | | | | | | ! | pure element [vac] form'n energy, GB formation energy |
| 0.00300000 | -0.00100000 | 0.00500000 | | | | ! | EORDAB,EORDAC,EORDBC |
| | | | | | | ! | ordering energies |
| 1.5e+13 | 1.5e+12 | | | | | ! | NUOV,NUOI |
| | | | | | | ! | debye frequencies |
| 1.00000000 | 12.00 | 1.00 | 1.00 | | | ! | AL,Z,BIASV,BIASI |
| | | | | | | ! | thermo factor, neighbor atoms, disloc bias for v/i |
| 1.0E-00 | 1.0E+01 | 5.0E+02 | 1.0e+03 | 5.0e+03 | 1.4e+04 | ! | TOUTPT(I),I=1,20 |
| 5.0E+04 | 7.1E+04 | 1.0E+05 | 1.4e+05 | 3.6e+05 | 4.3e+05 | ! | |
| 7.1E+05 | 2.1E+06 | 2.2E+06 | 2.3e+06 | 5.0e+06 | 7.0e+07 | ! | |
| 1.0e+08 | 0.0e+00 | | | | | ! | |
| | | | | | | ! | user-required output times |
| N | | | | | | ! | FRAC |

| | | | | | | |
|--------|--------|--------|--------|--------|--------|---|
| 1.0000 | 1.0000 | 1.0000 | 1.0000 | 1.0000 | 1.0000 | ! indicates whether profiles will be used |
| 1.0000 | 1.0000 | 1.0000 | 1.0000 | 1.0000 | 1.0000 | ! TFRAC(I),I=1,NSTEP-1 |
| 1.0000 | 1.0000 | 1.0000 | | | | ! fraction of max temperature |
| 1.0000 | 1.0000 | 1.0000 | | | | ! |
| 1.0000 | 1.0000 | 1.0000 | 1.0000 | 1.0000 | 1.0000 | ! CAFRAC(I),I=1,NSTEP |
| 1.0000 | 1.0000 | 1.0000 | 1.0000 | 1.0000 | 1.0000 | ! fraction of peak atom A |
| 1.0000 | 1.0000 | 1.0000 | | | | ! |
| 0.1231 | 0.2991 | 0.3912 | 0.4573 | 0.5100 | 0.6988 | ! CBFRAC(I),I=1,NSTEP |
| 0.8144 | 0.8969 | 0.9613 | 1.0150 | 1.0000 | 1.0000 | ! fraction of peak atom B |
| 1.0000 | 1.0000 | 1.0000 | | | | ! |
| 1.1670 | 1.1334 | 1.1160 | 1.1033 | 1.0933 | 1.0574 | ! CCFRAC(I),I=1,NSTEP |
| 1.0354 | 1.0196 | 1.0074 | 0.9971 | 1.0000 | 1.0000 | ! fraction of peak atom C |
| 1.0000 | 1.0000 | 1.0000 | | | | ! |
| 1.0000 | 1.0000 | 1.0000 | 1.0000 | 1.0000 | 1.0000 | ! DFRAC(I),I=1,NSTEP |
| 1.0000 | 1.0000 | 1.0000 | 1.0000 | 1.0000 | 1.0000 | ! fraction of peak damage |
| 1.0000 | 1.0000 | 1.0000 | | | | ! |
| 1.0000 | 1.0000 | 1.0000 | 1.0000 | 1.0000 | 1.0000 | ! SFRAC(I),I=1,NSTEP |
| 1.0000 | 1.0000 | 1.0000 | 1.0000 | 1.0000 | 1.0000 | ! fraction of max disloc density |
| 1.0000 | 1.0000 | 1.0000 | | | | ! |