Fortran code

C is the parent concentration

KmetC = Kmet0\*C + Vmax\*C/(Km + C)

dCreact = -(1 - C2 + C2\*KO2\*\*n\_O2/(KO2\*\*n\_O2 + CO2\*\*n\_O2))\*KmetC

Expressed mathematically:

]\*C