

.MODEL QBSR13 NPN(

+ IS=29.13E-15
+ NF=992.6E-3
+ ISE=9.652E-15
+ NE=1.516
+ BF=256.7
+ IKF = 489.9E-3
+ VAF = 80.99
+ NR = 984.4E-3
+ ISC = 320.3E-12
+ NC = 1.608
+ BR = 6.590
+ IKR = 192.9E-3
+ VAR = 101.2
+ RB = 1.000
+ IRB = 1.000E-3
+ RBM = 1.000
+ RE = 193.4E-3
+ RC = 224.8E-3
+ XTB = 0.000
+ EG = 1.110
+ XTI = 3.000
+ CJE = 25.89E-12
+ VJE = 689.1E-3
+ MJE = 366.8E-3
+ TF = 293.9E-12
+ XTF = 71.78
+ VTF = 20.00
+ ITF = 4.797
+ PTF = 0.000
+ CJC = 10.11E-12
+ VJC = 662.2E-3
+ MJC = 416.0E-3
+ XCJC = 0.5946
+ TR = 320.0E-9
+ CJS = 0.000
+ VJS = 750.0E-3
+ MJS = 333.0E-3
+ FC = 938.8E-3)

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