

.MODEL QBF471 NPN(

+ IS=7.974E-15  
+ NF=0.993  
+ ISE=2.266E-16  
+ NE=1.18  
+ BF=122  
+ IKF=0.01029  
+ VAF=25.51  
+ NR=0.999  
+ ISC=4.33E-12  
+ NC=1.397  
+ BR=6.235  
+ IKR=0.02746  
+ VAR=19.43  
+ RB=1  
+ IRB=1E-06  
+ RBM=0.5  
+ RE=0.3814  
+ RC=0.439  
+ XTB=0  
+ EG=1.11  
+ XTI=3  
+ CJE=1.742E-11  
+ VJE=0.4581  
+ MJE=0.3092  
+ TF=7.073E-10  
+ XTF=289.5  
+ VTF=6.144  
+ ITF=0.1495  
+ PTF=0  
+ CJC=5.045E-12  
+ VJC=0.197  
+ MJC=0.1947  
+ XCJC=0.1041  
+ TR=1E-08  
+ CJS=0  
+ VJS=0.75  
+ MJS=0.333  
+ FC = 0.8555)

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