Device Modeling Report

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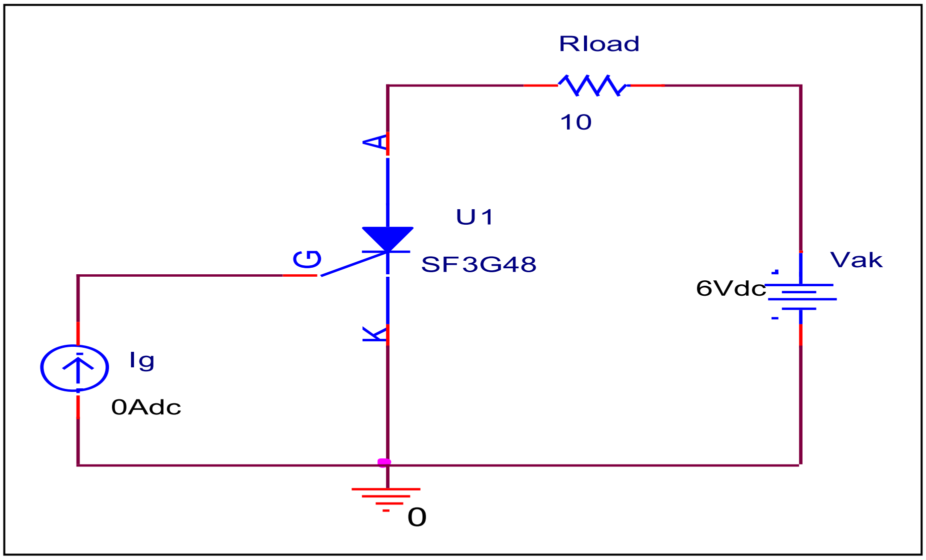
DIODE MODEL

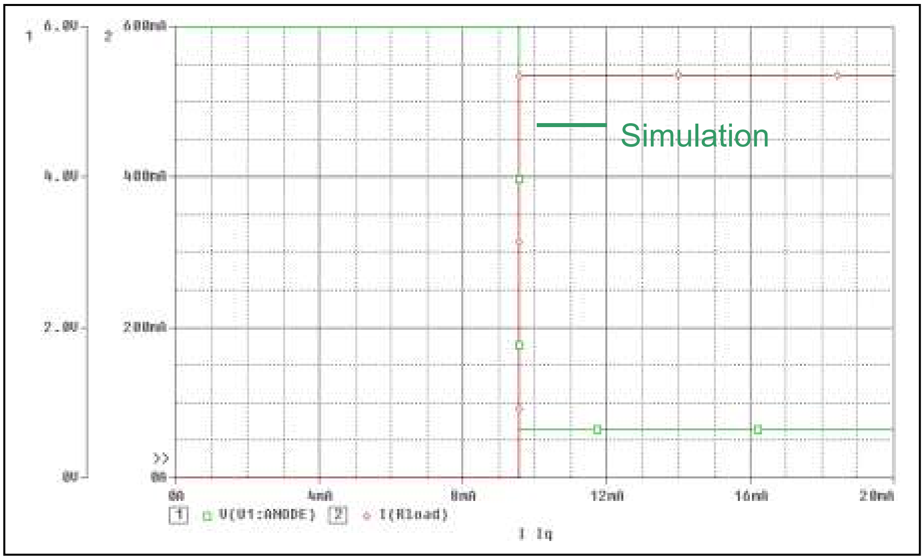
Pspice model Parameter	Model description
IS	Saturation Current
N	Emission Coefficient
RS	Series Resistance
IKF	High-injection Knee Current
CJO	Zero-bias Junction Capacitance
M	Junction Grading Coefficient
VJ	Junction Potential
ISR	Recombination Current Saturation Value
BV	Reverse Breakdown Voltage(a positive value)
IBV	Reverse Breakdown Current(a positive value)
TT	Transit Time

IG-VT Characteristic

Evaluation Circuit



Simulation result

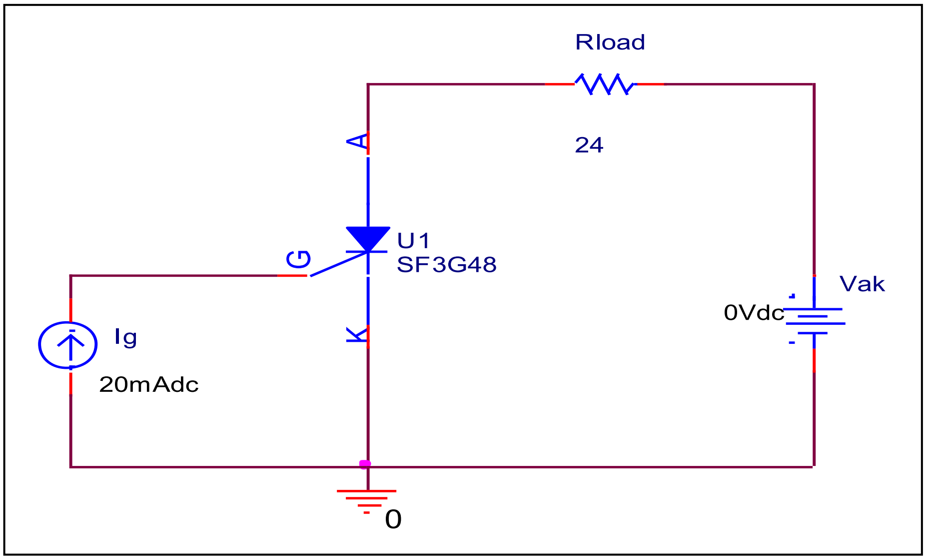


Comparison Table

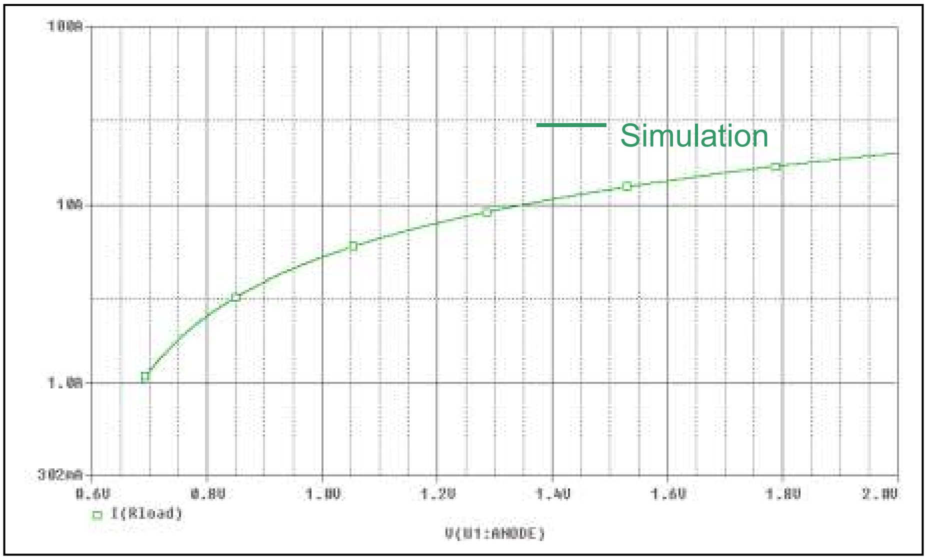
	Measurement	Simulation	% Error
IG (Max 10) (mA)	9.5	9.551	-0.537
VT (Max 1)(V)	0.63	0.638	-1.270

ITM-VTM Characteristic

Evaluation Circuit



Simulation result

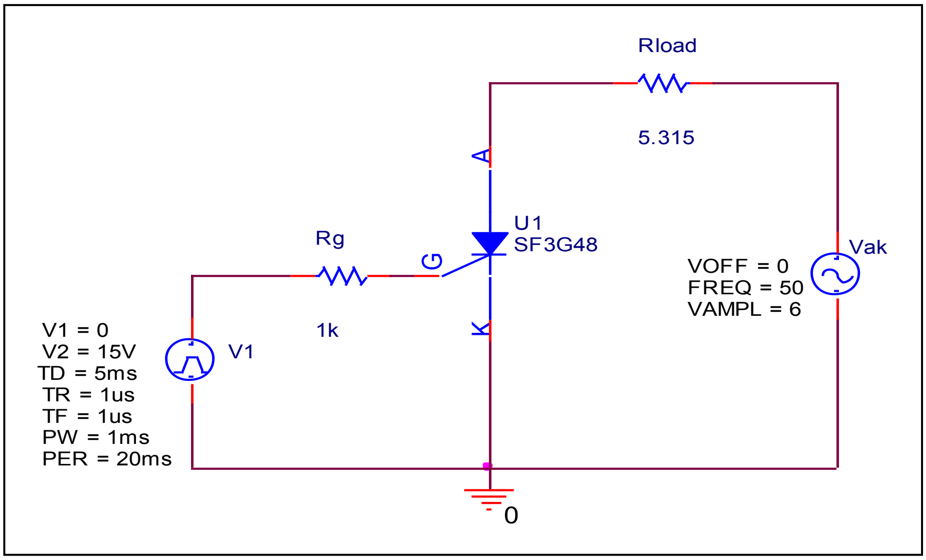


Comparison Table

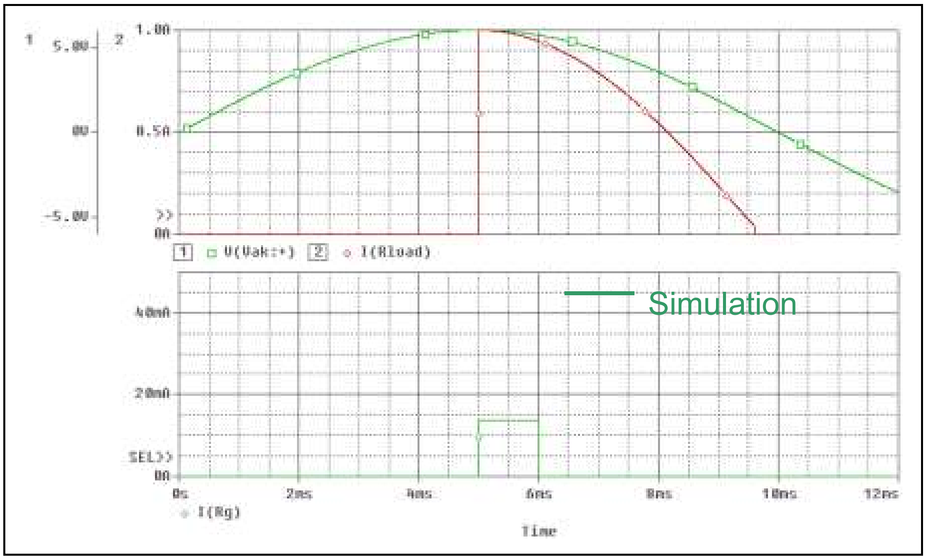
At ITM=12A	Measurement	Simulation	% Error
VTM(V)	Max 1.5	1.4835	1.100

Holding Characteristic (IH)

Evaluation Circuit



Simulation result



Comparison Table

VAK=6V,ITM=1A	Measurement	Simulation	% Error
IH(mA)	Max 40	40	0