

LTspice Model

Operational Amplifier

TI

SN1605025DR

Model Information

Model An original macro model
Call Name MDC_SN1605025DR_LT
Pin Assign 1:OUTA 2:INA- 3:INA+ 4:V- 5:INB+ 6:INB- 7:OUTB 8:V+
File List Model Library MDC_SN1605025DR_LT01.lib
 Model Report MDC_SN1605025DR_LT.pdf (this file)

Verified Simulator Version LTspice version XVII
Note

References

The information which was used for modeling is as follow:

[Data Sheet]

- Date/Version SEPTEMBER 2017
- Product name SN1605025DR
- Company name Texas Instruments Inc.
- Characteristics GainFreq.[Temp],PhaseFreq.[Temp],Input offset voltage,Input offset current,Input bias current,Voltage output swing,Slew rate,Input referred voltage noise

Simulation Condition

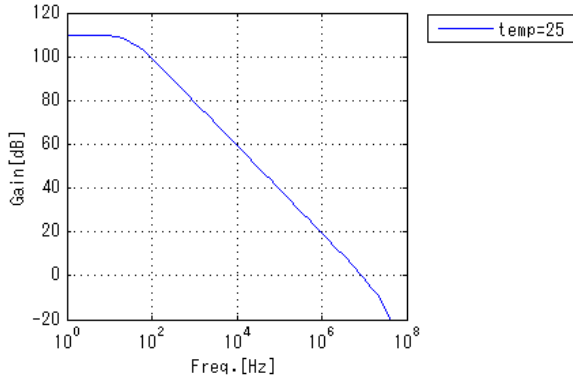
This table shows the value of evaluated simulation condition that was not occurs any convergence problems in this area.

Item	Condition	Unit
Temperature	25	deg C

Simulation results are following.
 Explanatory notes — : simulated

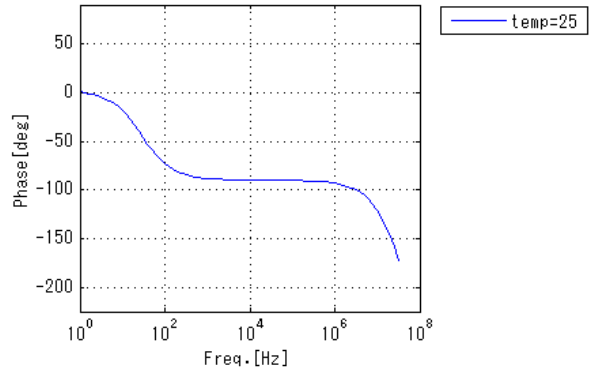
GainFreq.[Temp]

Vs+ = 2.75V, Vs- = -2.75V



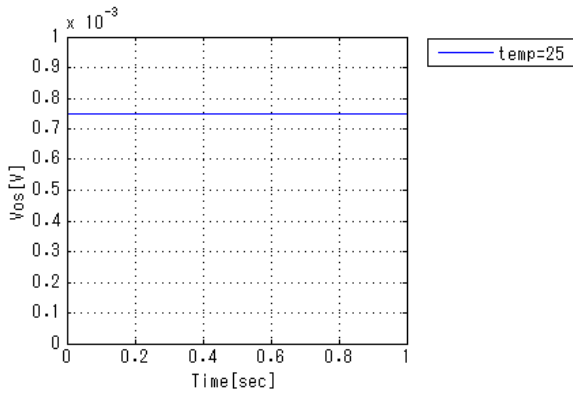
PhaseFreq.[Temp]

Vs+ = 2.75V, Vs- = -2.75V



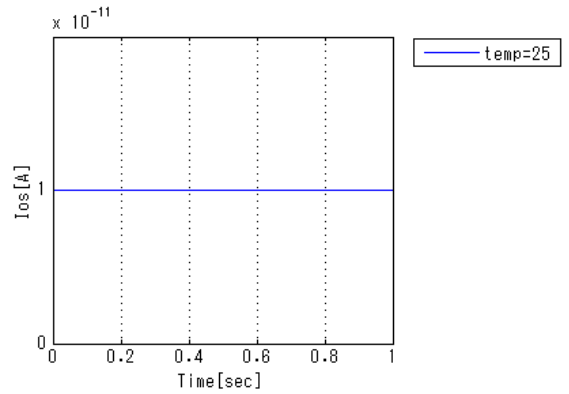
Input offset voltage

Vs+ = 2.75V, Vs- = -2.75V



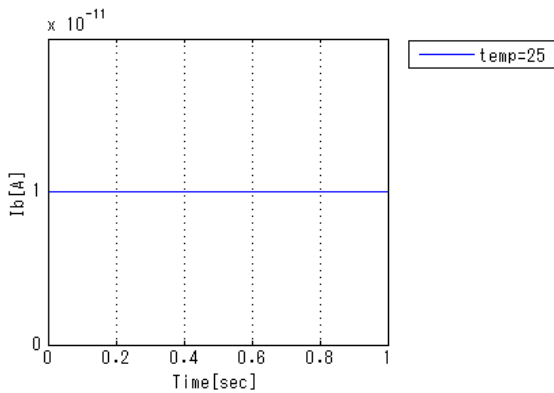
Input current

Vs+ = 2.75V, Vs- = -2.75V



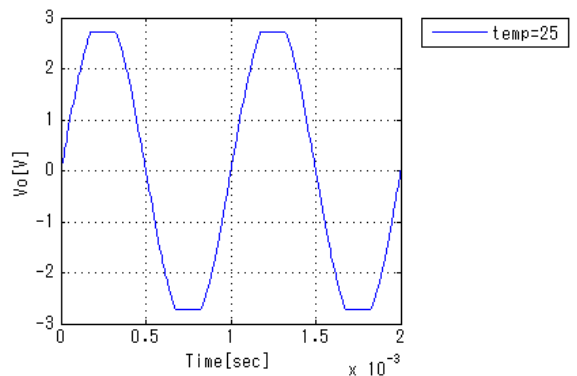
Input bias current

Vs+ = 2.75V, Vs- = -2.75V



Voltage output swing

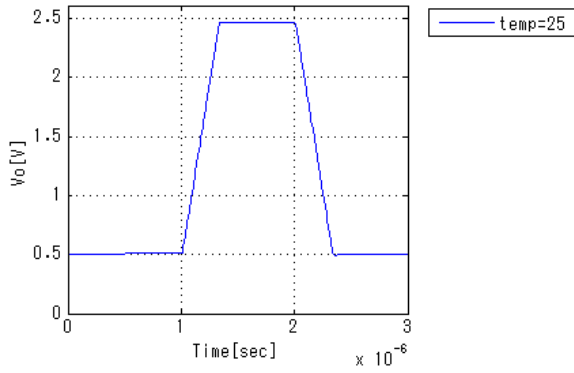
Vs+ = 2.75V, Vs- = -2.75V, RI = 10000ohm



Simulation results are following.
 Explanatory notes — : simulated

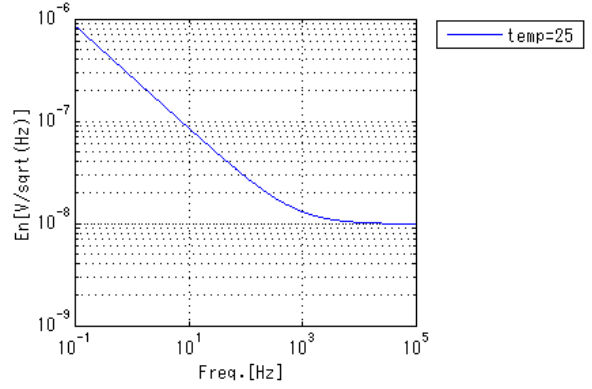
Slew rate

$V_{s+} = 2.75V$, $V_{s-} = -2.75V$, Gain = 1



Input referred voltage noise

$V_{s+} = 2.75V$, $V_{s-} = -2.75V$



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