LOWPIEZO (TINA Netlist Editor format)

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.LIB "<TINADIR>\EXAMPLES\SPICE\TSPICE.LIB"

.LIB "<TINADIR>\SPICELIB\Operational Amplifiers.LIB"

.TEMP 27

.AC DEC 20 10 1MEG

.TRAN 20U 10M

.PROBE V(4,0) V(7,0)

VIn2 1 94 DC 0 AC 1 0

+ PWL TIME\_SCALE\_FACTOR=5M VALUE\_SCALE\_FACTOR=2.048

+ REPEAT FOREVER

+ (0, 0) (200N 1) (499.9998M 1) (500.0002M -1) (999.9998M -1) (1,0) ENDREPEAT

VIn2\_DC 94 0 2.048

VS2 5 0 12

VS1 8 0 12

VIn1 9 95 DC 0 AC 1 0

+ PWL TIME\_SCALE\_FACTOR=5M VALUE\_SCALE\_FACTOR=2.048

+ REPEAT FOREVER

+ (0, 0) (200N 1) (499.9998M 1) (500.0002M -1) (999.9998M -1) (1,0) ENDREPEAT

VIn1\_DC 95 0 2.048

C3 VG1 3 1N

R6 3 4 100

C2 0 4 1U

R5 VG1 4 13K

R4 0 VG1 10K

XU2 1 VG1 5 0 3 LM8261\_0

R3 6 7 100

C1 0 7 1U

R2 VG1 6 13K ; **THIS SHOULD NOT BE CONNECTED**

R1 0 VG1 10K ; **THIS SHOULD NOT BE CONNECTED**

XU1 9 VG1 8 0 6 LM8261\_0 ; **THIS SHOULD NOT BE CONNECTED**

.LIB "<TINADIR>\SPICELIB\NSC.LIB"

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\*////////////////////////////////////////////////////////////////////

\* NATIONAL LM8261

\* PINOUT ORDER +IN -IN V+ V- OUT

\* PINOUT 3 2 7 4 6

.SUBCKT LM8261\_0 3 2 7 4 6

V5 8 34 0.7E-3

Q6 5 8 11 Q6M

R2 12 38 100.0E3

D1 46 31 D1M

E1 16 0 17 0 1.0

V6 31 12 0.75

V7 34 51 4.0E-3

R3 2 36 500.0

R4 51 3 500.0

M1 20 12 46 46 MWPM

I1 7 46 100.0E-6

I2 41 4 50.0E-6

I3 7 44 50.0E-6

R5 29 27 500.0

E2 38 16 43 9 1.0

RE2 43 0 1.0E12

V4 7 43 2.0

R7 7 9 10.0E6

R20 9 4 10.0E6

Q7 26 36 37 Q6M

R14 7 26 300.0

R15 7 5 300.0

R6 29 33 500.0

Q3 23 23 8 QQN

R18 37 42 500.0

Q9 42 18 4 QQN

R19 11 42 500.0

Q1 13 13 7 QQP

Q2 21 21 4 QQN

R16 28 4 300.0

R17 45 4 300.0

C4 19 6 8.0E-12

R8 17 19 220.0

R10 7 22 12.0

Q4 36 36 23 QQN

R11 4 15 12.0

Q5 8 8 49 QQN

R12 24 15 100.0

I5 32 7 4.0E-6

Q28 14 35 28 QQN

R13 25 22 100.0

Q8 49 49 36 QQN

R9 46 30 1.0

Q29 17 35 45 Q29M

Q30 50 20 4 QQN

Q31 20 20 4 QQN

Q32 6 50 15 Q32M

Q33 50 24 4 QQN

I6 4 35 4.0E-6

Q34 44 44 21 QQN

I7 39 7 2.0E-6

V10 7 40 1.4

Q35 7 44 50 QQN

Q36 6 30 22 Q36M

Q37 12 25 7 QQP

Q38 41 41 13 QQP

Q40 50 41 46 QQP

Q41 14 32 26 QQP

Q42 17 32 5 Q42M

Q43 29 39 7 QQP

Q44 45 34 27 Q44M

Q45 28 36 33 Q45M

Q46 18 40 29 QQP

Q47 18 18 4 QQN

.MODEL QQN NPN

.MODEL QQP PNP

.MODEL Q44M PNP BF=85.0

.MODEL Q45M PNP BF=85.0

.MODEL Q6M NPN BF=200.0

.MODEL Q29M NPN VAF=150.0

.MODEL Q42M PNP VAF=150.0

.MODEL Q32M NPN BF=600.0 VAF=125.0

.MODEL Q36M PNP BF=165.0 VAF=100.0

.MODEL MWPM PMOS KP=1.0E-3 VTO=-0.6

.MODEL D1M D IS=7.0E-14 M=0.45 N=2 TT=6.0E-9

.ENDS

.END