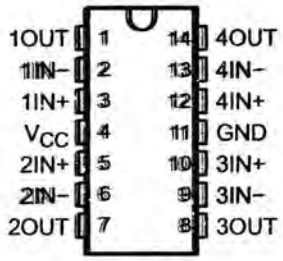
DAFTAR PUSTAKA

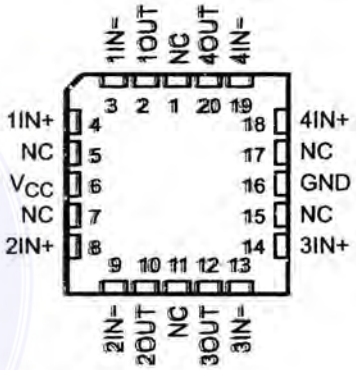
1. Adrian Michaels, 1995 " Daftar persamaan Transistor Internasional" PT. Elex Media Komputindo Kelompok Gramedia, Jakarta.
2. Ir. Suyanto B.Sc. 1979 Teknik Elektronika Industri I, Dekdikbud.
3. Drs.Mo h.Nur,Drs.B.J. 1978 Wibisono. Ilmu Elektronika 2, Dekdikbud.
4. Mannie Horowitz, 1997 " Merancang dan Merakit Penguat Audio" PT. Elex Media Komputindo, Jakarta.
5. Malvino, Albert paul, 1987 " Prinsip – prinsip Elektronika ", Edisi Kedua Alih Bahasa Hanafi Gunawan, Penerbit Erlangga.
6. B>R> Gupta, 1999, " Electronics and Instrumentation " S. Chand, India.
7. Drs.H.C. Yohannes, 1983 " Dsar-dasar elektronika ", Ghalia Indonesia, Jakarta.
8. http://www.google.Com / Inverter
9. http://www.google.Com / IRF 840
10. http://www.google.Com / KA7500B

- 2-kV ESD Protection for:
  - LM224K, LM224KA
  - LM324K, LM324KA
  - LM2902K, LM2902KV, LM2902KAV
- Wide Supply Ranges
  - Single Supply . . . 3 V to 32 V (26 V for LM2902)
  - Dual Supplies . . . ±1.5 V to ±16 V (±13 V for LM2902)
- Low Supply-Current Drain Independent of Supply Voltage . . . 0.8 mA Typ
- Common-Mode Input Voltage Range Includes Ground, Allowing Direct Sensing Near Ground
- Low Input Bias and Offset Parameters
  - Input Offset Voltage . . . 3 mV Typ
    A Versions . . . 2 mV Typ
  - Input Offset Current . . . 2 nA Typ
  - Input Bias Current . . . 20 nA Typ
    A Versions . . . 15 nA Typ
- Differential Input Voltage Range Equal to Maximum-Rated Supply Voltage . . . 32 V (26 V for LM2902)
- Open-Loop Differential Voltage Amplification . . . 100 V/mV Typ
- Internal Frequency Compensation

LM124 . . . D, J, OR W PACKAGE
LM124A . . . J PACKAGE
LM224, LM224A, LM224K, LM224KA . . . D OR N PACKAGE
LM324, LM324K . . . D, N, NS, OR PW PACKAGE
LM324A . . . D, DB, N, NS, OR PW PACKAGE
LM324KA . . . D, N, NS, OR PW PACKAGE
LM2902 . . . D, N, NS, OR PW PACKAGE
LM2902K . . . D, DB, N, NS, OR PW PACKAGE
LM2902KV, LM2902KAV . . . D OR PW PACKAGE
(TOP VIEW)



LM124, LM124A . . . FK PACKAGE
(TOP VIEW)



NC – No internal connection

description/ordering information

These devices consist of four independent high-gain frequency-compensated operational amplifiers that are designed specifically to operate from a single supply over a wide range of voltages. Operation from split supplies also is possible if the difference between the two supplies is 3 V to 32 V (3 V to 26 V for the LM2902), and V_{CC} is at least 1.5 V more positive than the input common-mode voltage. The low supply-current drain is independent of the magnitude of the supply voltage.

Applications include transducer amplifiers, dc amplification blocks, and all the conventional operational-amplifier circuits that now can be more easily implemented in single-supply-voltage systems. For example, the LM124 can be operated directly from the standard 5-V supply that is used in digital systems and provides the required interface electronics, without requiring additional ±15-V supplies.

FUNCTION TABLE

INPUT TO OUTPUT CTRL	OUTPUT FUNCTION
V_I = GND	Single-ended or parallel output
$V_I = V_{ref}$	Normal push-pull operation

FUNCTIONAL BLOCK DIAGRAM