

# PBL 3766, PBL 3766/6 Subscriber Line Interface Circuit

## Description

The PBL 3766 Subscriber Line Interface Circuit (SLIC) is a monolithic integrated circuit, manufactured in 75 V bipolar technology. The PBL 3766 SLIC facilitates the design of cost effective, high performance on-premises (ONS) analog line interface cards for PABX systems and terminal adapters. Small package size and few required external components result in a miniaturized design.

The PBL 3766 programmable, constant current loop feed system can operate with battery supply voltages between -24 V and -58 V.

The SLIC incorporates loop current and ring trip detection functions as well as a ring relay driver.

The two- to four-wire and four- to two-wire voice frequency (vf) signal conversion, i.e. the hybrid function, is provided by the SLIC in conjunction with either a conventional or a programmable CODEC/filter.

The PBL 3766 package is a 22 pin, plastic dual-in-line (batwing) or a 28-pin, plastic j-leaded chip carrier (PLCC).

The differences between PBL 3766 and PBL 3766/6 are the specifications for balance, output offset voltage, and insertion loss.

## Key Features

- Low cost
- Few external components
- Programmable, constant current loop feed
- Line feed characteristics independent of battery supply variations
- -24 V to -58 V battery supply voltage range
- Detectors
  - programmable loop current detector
  - ring trip detector
- Ring relay driver
- Hybrid function with conventional or programmable CODEC/filters
- Line terminating impedance, complex or real, set by a simple external network or controlled by a programmable CODEC/filter
- Idle noise typ. -83 dBmp, typ. 7 dBrc
- Low on-hook power dissipation: 20 mW @ -28 V, 35 mW @ -48 V
- Tip-ring open circuit state for subscriber loop power denial
- On-hook transmission

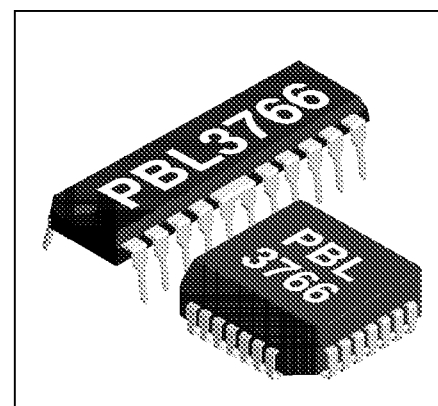
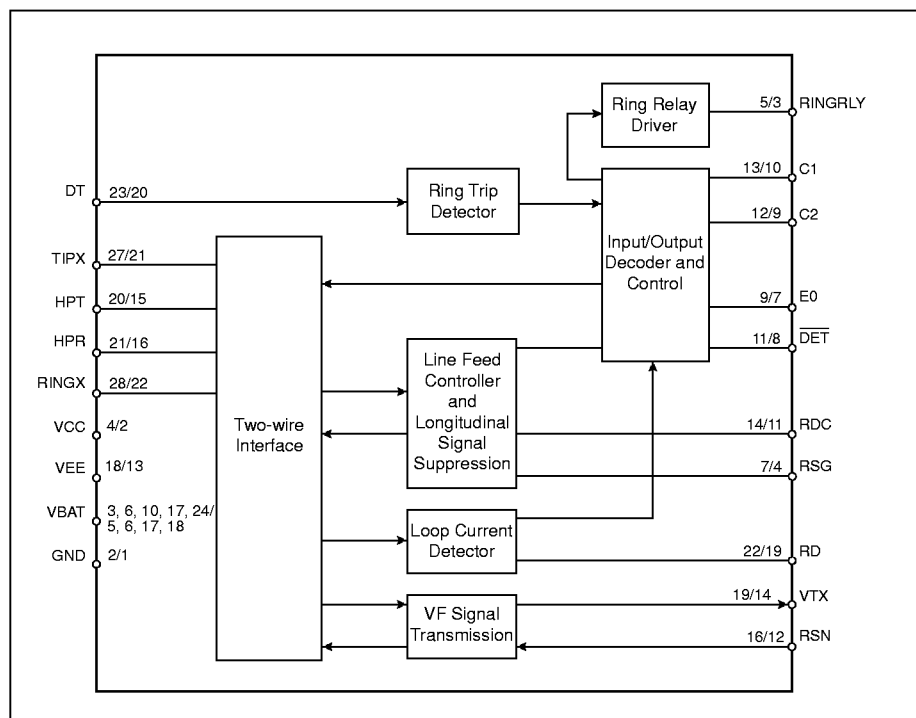


Figure 1. Block diagram. Pin numbers PLCC/DIP.

**Ordering Information**

<b>Package</b>	<b>Temp. Range</b>	<b>Part No.</b>
Plastic DIP 22 pin	0 °C to 70 °C	PBL 3766/1N (previously PBL 3766N)
Plastic DIP 22 pin	0 °C to 70 °C	PBL 3766/6N
PLCC 28 pin	0 °C to 70 °C	PBL 3766/1QN (previously PBL 3766QN)
PLCC 28 pin	0 °C to 70 °C	PBL 3766/6QN
PLCC 28 pin Tape & Reel	0 °C to 70 °C	PBL 3766/1QN:T
PLCC 28 pin Tape & Reel	0 °C to 70 °C	PBL 3766/6QN:T

Information given in this data sheet is believed to be accurate and reliable. However no responsibility is assumed for the consequences of its use nor for any infringement of patents or other rights of third parties which may result from its use. No license is granted by implication or otherwise under any patent or patent rights of Ericsson Components AB. These products are sold only according to Ericsson Components AB' general conditions of sale, unless otherwise confirmed in writing.

Specifications subject to change without notice.

1522-PBL 3766 Uen Rev. C

© Ericsson Components AB 1998

This product is an original Ericsson product protected by US, European and other patents.

**ERICSSON** **Ericsson Components AB**

S-164 81 Kista-Stockholm, Sweden

Telephone: +46(0)8 757 50 00