

# F2F Decoder IC

## Triple track, BS300E

### Features

- 0.8um CMOS ASIC IC for F2F magnetic stripe card reader.
- Built-in operational amplification circuitry.
- Low power : Current 1.0 ~ 1.25mA, best for portable, hand-held devices.
- Operational power 3.3V/5.0V automatic gain control.
- Two modes for RCP width. One is 14 ~ 60us. The other one is 1/4 RDP width.
- Power down mode for stand-by control.
- Support for 75/210 BPI recording density.
- Speed range: 300 to more than 12600 BIT/sec.
- Built-in Boarding Pass Ticket reading solution--- recovery for data lose.
- Small outline and surface mount design.SSOP48.



### Application

- Magnetic stripe card reader.
- POS Keyboard
- Security Control.
- CAT (Card Authorization Terminal )

### Specification

- Power Voltage: DC3.3V /5V±5%
- Consumption: 1.0mA /DC 3.3V; 1.25mA /DC 5.0V
- Reading Speed Range /second: 10cm/sec ~ 150cm/sec
- MTBF: 100,000 hrs
- Environment : Temperature: Operating: -10°C ~ 55°C; Storage: -30°C ~ 70°C  
Humidity: Operating: 10% ~ 90%; Storage: up to 100%
- Pin Assignment

No	Signal	No.	Signal	No.	Signal	No.	Signal	No	Signal	No	Signal
1	NC	9	GND	17	RDPB	25	NC	33	NERC	41	NC
2	MSIB+	10	VREFIN	18	RCPB	26	VSS	34	OSC	42	OPA2OUT
3	MSIB-	11	MSIC+	19	NC	27	CLS	35	NC	43	OPA2IN
4	OPB1OUT	12	MSIC-	20	RDPC	28	NC	36	RESEL	44	NC
5	NC	13	OPC1OUT	21	RCPC	29	NC	37	IBS	45	OPA1OUT
6	OPB2IN	14	OPC2IN	22	RDPA	30	ADJ	38	VDD	46	MSIA-
7	OPB2OUT	15	OPC2OUT	23	RCPA	31	NC	39	VCC	47	MSIA+
8	NC	16	NPWDN	24	NC	32	NRCPM	40	NC	48	NC