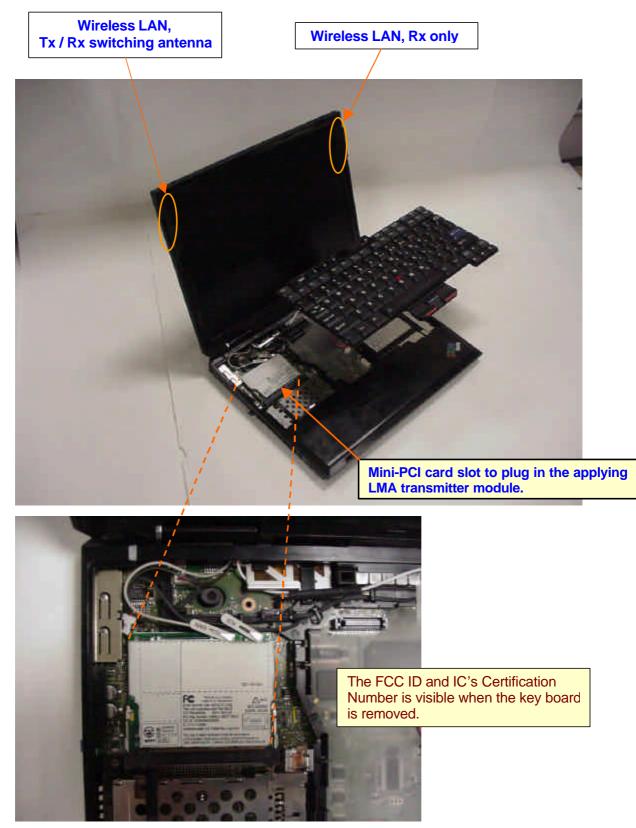
### Host Unit Information of ThinkPad X30 Series

- Host PC Information
- Host PC Labeling
- Antenna Information

## **Host PC** Information

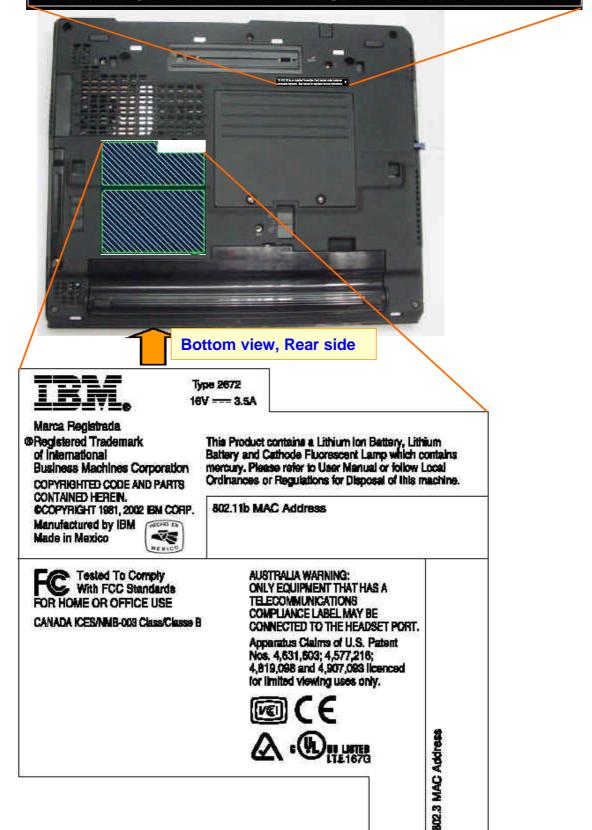
The left antenna in LCD is used for both RF transmission and receiving with half duplex switching mode. The right antenna is used for RF receiver only. When the Wireless LAN card is in RF receiving state, one of the antennas is selected automatically to have a good quality of radiocommunication



Prepared by T. Murota

# Host PC Labeling

TX FCC ID for an installed Transmitter Card located under customer removable keyboard. See manual for keyboard removal instructions.



## **Antenna Information**

#### 1. Antenna Specification

Transmission Antenna assembly overview

Designator (Parts Number)	Manufacture	Antenna type	Cable type and length	Gain (dBi) Note 1)
LCD left antenna 46L4677		Inverted F type	coax 380mm	1.42 dBi (peak)
LCD right antenna	IBM Japan Ltd.	Antenna	coax 520mm	1.24 dBi (peak)
46L4676				(peak)

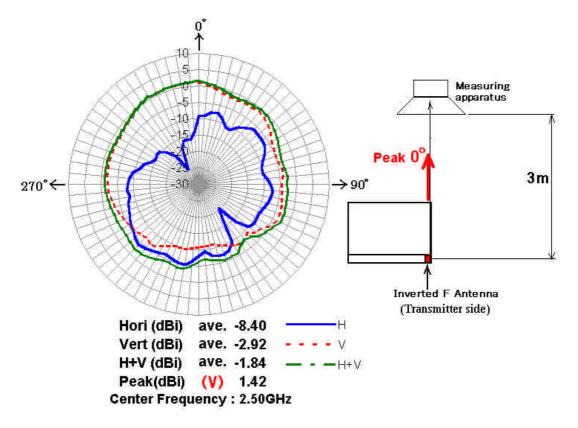
Notes:

1a. Includes all cable losses

1b. Antenna type should be Omni Directional and have gain of 3.0 dBi or less regarding the IBM internal specification.

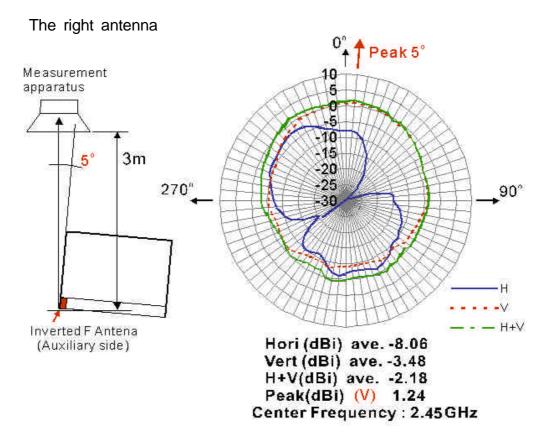
#### 2. Radiation characteristic of antenna

The left antenna



Note1) The measurement was performed at 3 frequencies (2400, 2450, 2500MHz).

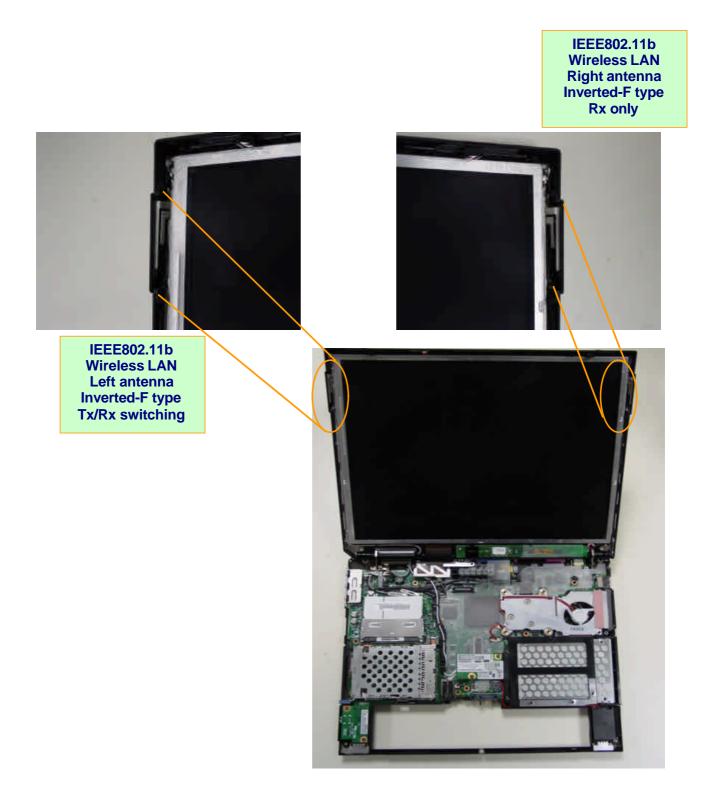
Note2) The maximum antenna gain was found around **0 degree** angle from measuring apparatus in **vertical** polarization at the highest frequency(2.50GHz).



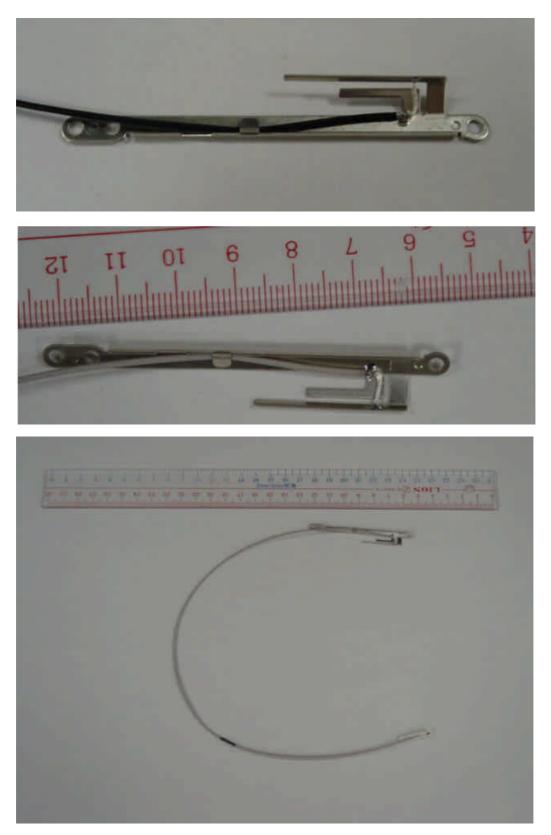
Note1) The measurement was performed at 3 frequencies (2400, 2450, 2500MHz).

Note2) The maximum antenna gain was found around **5 degree** angle from measuring apparatus in **vertical** polarization at the middle frequency (2.45GHz).

#### 3. Antenna Locations



#### 4. Exterior Photos of Antennas



Left antenna (Tx/Rx switch) : IBM P/N: 46L4677 Cable : coax 380 mm Right antenna (Rx only) : IBM P/N: 46L4676 Cable : coax 520 mm