ALIGNMENT PROCEDURE

Alignment procedure when Dual VCO is mounted in a Radio.

Rx VCO

1. Set the unit to the highest receive frequency, 174MHz and ADJUST L303 so the VCO control voltage at terminal 15 is set for 6.6Vdc (± 0. 1V).

2. Set the unit to the lowest receive frequency, 148MHz, then VERIFY that the VCO control voltage at terminal 15 is 1.OVdc or higher.

Tx VCO

1. Set the unit to the highest transmit frequency, 174MHz and ADJUST L203 so the VCO control voltage at terminal 15 is set to 7.15 Vdc (± 0.1V).

2. Set the unit to the lowest transmit frequency, 148MHz, then VERIFY that the VCO control voltage at terminal 15 is 1.OVdc or higher.

Alignment procedure when Dual VCO is mounted in the test fixture.

Rx VCO

1. With the Rx VCO powered up at 4.5Vdc (+-O.1V) on VCO terminal 4, set the Control Voltage at terminal 15 to 6.6Vdc (± O.1V) and ADJUST L303 so the output frequency at VCO terminal 2 is 219.3MHz. (± 0.2MHz).

2. Set the Control Voltage to 1.OVdc (+-O. 1V) on VCO terminal 15. VERIFY that the frequency at terminal 2 is 193.3MHz or LOWER.

Tx VCO

1. With the Tx VCO powered up at 4.5Vdc(± 0. 1 V) on terminal 8, set the Control Voltage at terminal 15 to 7.15Vdc (+-O. 1 V) and ADJUST L203 so that the output frequency at VCO terminal 6 is 174MHz. (± 0.2MHz).

2. Set the Control Voltage to 1.OVdc(+-O. 1V) VCO terminal 15. VERIFY that the frequency at VCO terminal 6 is 148MHz or LOWER.

VCO shield (E201) is to be installed and soldered to PCB prior to tuning VCO module. All tabs of shield to be soldered to FICB, comer seams to be sealed .