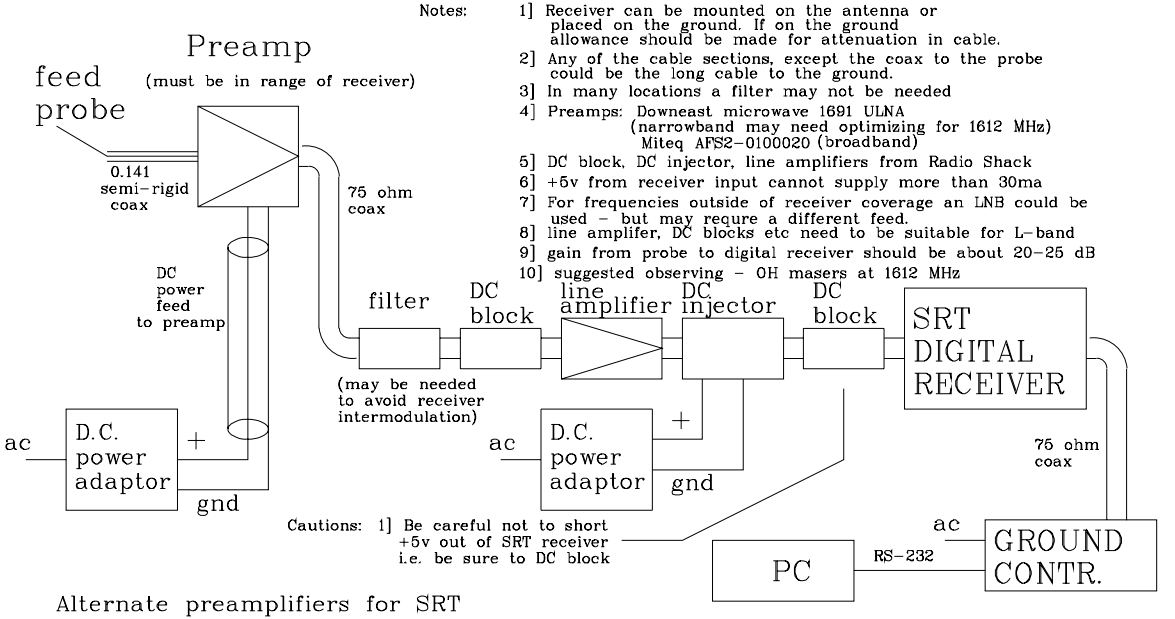
Notes:
1] Receiver can be mounted on the antenna or placed on the ground. If on the ground allowance should be made for attenuation in cable.
2] Any of the cable sections, except the coax to the probe could be the long cable to the ground.
3] In many locations a filter may not be needed
4] Preamps: Downeast microwave 1691 ULNA (narrowband may need optimizing for 1612 MHz) Miteq AFS2-0100020 (broadband)
5] DC block, DC injector, line amplifiers from Radio Shack
6] +5v from receiver input cannot supply more than 30ma
7] For frequencies outside of receiver coverage an LNB could be used - but may requre a different feed.
8] line amplifer, DC blocks etc need to be suitable for L-band
9] gain from probe to digital receiver should be about 20-25 dB
10] suggested observing - OH masers at 1612 MHz
Preamp
feed probe
(must be in range of receiver)
0.141 semi-rigid coax
75 ohm coax
DC power feed to preamp
filter
DC block
line amplifier
DC injector
DC block
SRT DIGITAL RECEIVER
(may be needed to avoid receiver intermodulation)
ac
D.C. power adaptor
+
gnd
ac
D.C. power adaptor
+
gnd
75 ohm coax
Cautions: 1] Be careful not to short +5v out of SRT receiver i.e. be sure to DC block
ac
GROUND CONTR.
PC
RS-232
Alternate preamplifiers for SRT
aeer feb 2002 \mri\ohpre