needed to be on all the time. A second problem noticed, concerning this aspect, was the excessively long "hang" time on the AGC. The manual does, however, indicate the relevant R/C components and perhaps a useful mod would be to reduce this time constant to prevent huge chunks of the QSO being missed.

Reports received from FM transmission were of quite good audio quality and modulation level but the large dynamic range of the rig, while giving excellent signals locally, was not too good at cutting through the noise for DX work. This was particularly noticeable when used by a female operator so perhaps some tailoring is called for. (I wonder why manufacturers haven't woken up to the fact that there are many more YL operators nowadays!) Obviously due to the physical size of the rig, and hence its correspondingly small heatsink, I found that the set became very hot indeed during long FM QSOs and so Standard's warning about mounting the rig in a well ventilated position be taken seriously if disaster is not to follow!

Repeaters

Repeater operation shows up two very awkward features. Firstly, the toneburst is activated automatically if the PTT is pressed, released and then pressed again in quick succession. Now while this could be useful for mobile operation, the fact that it cannot be switched off forsimplexFM work, coupled with the small PTT button, can cause some odd tones to appear when not wanted. Also, as with many rigs, the tone is rather long, but this could easily be modified. Secondly, the three position S/R1/R2 switch takes some getting used to. "S" is the normal TX/RX on the displayed frequency. "R1" gives − 600 kHz repeater shift from the displayed frequency which means that switching from simplex to repeater operation is time consuming, as one has to switch to R1 and then retune to the desired repeater output. The "R2" setting gives true reverse repeater operation and TX is 600kHz up from the display frequency. As the set covers the full 144-148MHz range and there is no out of band switching above 145.999, there could be problems if you don't keep your wits about you! Out of band protection below 144MHz takes the form of a rather blunt "OFF" message on the display (one or two suggestions were forthcoming as to a more pointed display here!). Strangely, this does not protect one from transmitting (surely a little extra logic could have been employed). A good point is that "listen on input" is instantly realiseable by switching from "R1" to either "S" or "R2" and that the toneburst and call facilities are defeated on SSB/CW operation. However, the repeater shift is *not* switched out on sideband and as this switch is one of those on top of the rig, it can easily be forgotten (red faces all round!). Odd repeater shifts are not catered for by the *5800* and so using it with a transverter could cause problems.

Reports from SSB contacts indicatd a very nice "full, rich sound" and, apart from confusion over frequency step size, the *5800* was pleasant to operate in this mode. Being a regular horizontal FM/SSB operator, I found the absence of a second VFO troublesome when moving from sideband up to FM frequencies, but the 100kHz up/down function, with practice, came in useful here. Yet again, Standard adopt the strange habit of having 25/1W settings on FM but only 25W on SSB, which could cause problems when using linears requiring eg. 10W of drive; I'm sure a modification will arise.