#### Advisory Council

(Continued from page 9.)

member of the Institute of Electrical Engineers, and a member of the Institute of Radio Engineers. During the war he held a commission in the Royal Engineers, and later became a wireless officer in the Royal Flying Corps.

He has been an engineer to North-Western Radio Mfg. Co., U.S.A., and



on the advisory staff of W.H.A. Since 1924 he has been in business in Christchurch as a civil electrical engineer. For some years he has been technical correspondent to the Christchurch "Sun," and is at present a lecturer to the Christchurch Radio Society.

#### Invercargill

MR. ALFRED JONES attended the Southland Boys' High School, and on leaving secured a position as junior in the Southland Building Society's office, where he took up accountancy and commercial work. He was a mem-ber of the staff of the City Council till 1911, leaving to join the firm of W. A.

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of the foundation members of the In- land, has a nominal membership of vercargill Stock Exchange, and was over 3000. chairman in 1925. He was an ex-member of the Southland Education Board, of which he was elected chairman in 1929, and a member of the Southland High School Board of Governors, and Southland Technical College Board, He is also a life member and ex-chairman of the Southland Schools' Committees' Association, and was elected chairman e Southland School Commit-Association in 1929. He the Southland School was appointed Justice of the Peace in 1924, and at the formation of the Southland Justices of the Peace Association in July, 1928, was unanimously elected registrar. He matriculated about five years ago, and took up law studies, and pass-



ed in several subjects at the New Zealand University Examinations in legal subjects.

For the last two years Mr. Jones has been actively connected with local radio as chairman of the Southland Radio Club.

#### Dunedin

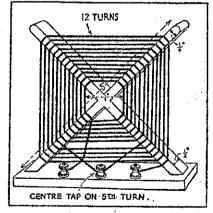
MR. HAROLD BOOTH, accountant. of Dunedin, is a prominent business man, and well-known to most readers of the "Radio Record." will be more familiarly known as the organiser of the N.Z. Radio Listeners' League, an organisation founded by him in 1930 to further the interests of listeners generally. Mr. Booth has always been strongly of the opinion that radio broadcasting should be under the control of listeners, or at least they should have some say in its operations. The league which Mr.

Ott and Co., Ltd., of which firm he Booth founded and has organised in mounted in the form of a cross, as later became a partner. He was one the four principal cities of New Zeashown in the diagram. The winding, of the foundation members of the Inland, has a nominal membership of which is centre tapped, is carried in



### Shortwave Antenna the "Super Six"

WE have received many inquiries from owners of "Super Six" recelvers asking for constructional details of the short-wave frame antenna. Previously we have not thought this worth while, as this component can be obtained commercially at a quite reasonable price. However, for those who prefer to make their own, we publish the following details:--



The antenna is wound on two strips of ebonite or other suitable material. 5in. long. Jin. wide, and Jin. deep,

slots cut in the cross-over ebonite supports. Silk covered Litz wire or 24/36 frame aerial wire is used, and the winding tunes from approximately 19 metres upwards, depending upon the efficiency of the set. Twelve turns in all are put on, and they are wound in saw-cuts made approximately 1-8ii, apart in the four arms. All further details are given in the sketch.

Owing to the smallness of the antenna, it will be found that tuning on both the aerial and oscillator condensers, is rather critical, and for this reason slow-motion dials of good quality are a necessity.

### Questions and Answers

(Concluded on page 13.)

bank-wind the two coils on the one former, keeping them separated by one and a half inches or so?

IAN (Christchurch).—Would it be satisfactory to work the "Cathode Super" as far as the second detector from a stanas rar as the second detector from a standard powerpack without reducing the value of the anode resistance and those for the screen and grid bias? I have a powerpack which will deliver up to 250 volts, 100 mamps.

A.: Yes. As a matter fact, its initial testing was done under these circumstances, when American and Japanese stations were tuned in on a speaker. Naturally the volume cannot be made too great without introducing distortion. The voltage on the 224 valves is no higher than usual

usual

2. I have two audio amplifiers, one used in push-pull, and the other incorporating the Loftin-White. Which do you consider to be the most suitable for the super-het?

A.: The push-pull amplifier would be decidedly better, although either might be used successfully.

M.M. (Auckland): Your circuit appears to be correct, and it seems that pears to be correct, and it seems that you are not getting the best results because your condensers are out of step. Try first of all the effect of balancing condensers, and if they improve things in any way, adjust the coils until you get the condensers in step. With two stages of screen-grid you should get really good

STENODE (Wellington): As far as we can see, no damage is being done when your eliminator stops.

2. We think that type of rectifier suitable for your needs is not available in New Zealand at the present time.

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