rent. Every few weeks the faradic current is tried, and as soon as the faintest response to it is obtained, it is used in conjunction with the constant current. When the response to faradism becomes strong, the constant current is no longer used. The type of faradic coil in use is rather unusual, and the effect it produces arouses the admiration of the onlooker who sees it for the first time. This coil is one introduced by Dr. Morton Smart and Captain Bristow. Its main feature is a coarse winding of the secondary coil, which does away with painful cutaneous stimulation, so that a very powerful muscular contraction can be obtained by a strong current without the pain that is usual when the ordinary coil is used. In the Bristow coil there is also a condenser in the circuit to the interrupter, which does away with any sparking and renders the breaks of the current very even in length. The coil is worked from two dry cells or a four-volt accumulator, and a switch regulates the voltage allowed through the coil. Another coil regulates the amount of induced current taken from the secondary coil, according to whether one-third, two-thirds, or the whole thickness of the coil is used. As well as this, there is a movable iron wire core for the primary coil, so that there are three controls for the strength of current. Having arranged a current sufficient to produce a weak muscular contraction with the core out, the amount of contraction of the muscle is controlled by the pushing in and out of the core, the degree of contraction being gauged by the fingers and thumb of the hand holding the electrode in position over the muscle being stimulated. In carrying on this faradic treatment the strongest current that the patient can take is used, as against the weakest current that will produce a response when the constant current is employed.

With the Bristow coil, individual muscles can be exercised and trained in a manner difficult to understand or believe unless one actually sees the coil at work. It should be mentioned that in treating the muscles this way they must always be placed in the position of greatest relaxation to start with and worked from this position. Captain Bristow is very emphatic about the necessity for treating the muscles controlling any joint, if that joint has had any injury, *e.g.*, in the knee joint after incision of the internal semilunar cartilage, the quadriceps muscle is treated with faradism, commencing about the fifth day. On the first day the treatment lasts ten minutes, fifteen minutes on the second day, and twenty minutes on succeeding days, care being taken not to produce fatigue, for some three or four weeks, when the joint is in perfect order and the man returns to duty. Special attention is always paid to the vastus internus, as this muscle is most liable to atrophy.

The same treatment is most successfully used in case of synovitis, either acute or chronic. No bandages are allowed, nor are splints, and the patient is encouraged in the use of the limb, the explanation of the success of the treatment being that, by keeping the quadriceps in good tone and preventing any muscular atrophy, the tonus of the joint capsule and ligaments is maintained or increased, and with exercise restoration of a normally functionating joint ensues,

4. The Plaster Room.

This is made good use of, for plaster is extensively used by all the surgeons, both for fixed and removable splints. The bandages are made from a special book muslin (No. 14 Manchester) by the nurse in charge of the department, and are usually fifteen cm. in width. If a whole limb is being encased, rolls of six mm. "piano felt" are used for covering the skin, and is a most excellent material for the purpose, but difficult to procure, even with the necessary ticket issued by the Ministry of Munitions. Casts are taken in any special case, both before and after operation, and these form now an interesting and valuable collection. Casts of limbs are also taken for use in the work shops, as models for the fitting of any special appliance.

5. The X-Ray Department.

A Snook apparatus has been provided, with which very satisfactory work is done. The X-ray plates are sent to the wards and kept by the sister in charge. At No. 3 Australian General Hospital, Major Argyle used to index and store the plates, and sent a bromide print and written report to the Ward, which were kept with the patient's case-sheet, to complète the records of the case, and this system was