

nation, but muscular spasm will have passed off. Any gross deviation from the normal length or continuity of the bone may be detected, and the necessary readjustment made more easily than at a later period. Throughout the whole course of the treatment thereafter, it appears to me a wise measure to remove the splints every four, five, or six days, according to circumstances, so as to expose the seat of the fracture for a few moments, at least, to the sunlight and air, and to subject the skin and muscles to a light friction and massage in order to prevent what has been very aptly called "local scurvy." Now I wish particularly to state that this must be done without permitting any movement whatever of the fragments upon one another, and I would most strongly deprecate any idea of "testing" the degree of union by bending or rotating the limb. Such testing can do no good whatever, it rarely gives any reliable information to the surgeon, and it may be productive of very great harm.

If, while handling the limb, the surgeon feels distinctly a large formation of callus, it is to a certain degree reassuring, but its absence or small amount does not by any means prove that union is not progressing, for we know that the better and closer the apposition of the fragments the less is the amount of callus produced.

I believe, of course, in passive motion, but, if passive motion cannot be done without risking the union of the bones, then I say wait, and take chances on the movement of adjacent joints. Usually, when the bones are firm one can gradually restore the utility of the joints; but if you fail to get union of the bones, what becomes of the joint? You then have that worst of all combinations—a stiff joint with an ununited fracture in its immediate neighborhood.

In the treatment of fractures due regard must be had to the element of time, and the surgeon should devote his whole skill and attention to the proper treatment of the case, and scrupulously avoid all "testing" of the strength of the union until such a length of time has elapsed that he may reasonably expect that union will be perfect. If it should unfortunately happen that union has not taken place, the surgeon will experience a great disappointment, and the unwelcome news will come as a great shock to the patient, but the former will have nothing to reproach himself for, and the shock to the latter would not have been lessened by two or three weeks of disquieting apprehensions resulting from the suspicion of the unsatisfactory progress of his case that would have been excited by repeated testings.

But there are also some cases in which, even after the full time has been allowed for treatment, and where union is apparently firm, it is found that the callus is soft and yielding, and that it has not become fully ossified. In the case of bones of the upper limb, no ill result may follow