

Some Problems in the Management of Upper-Extremity Amputees

FREDERICK E. VULTEE, Capt., USA (MC)¹

EXPERIENCE in the rehabilitation of upper-extremity amputees in recent years has highlighted the advantages of many concepts not previously considered or else heretofore noted only superficially. Not only has the development of prosthetic devices assured a greater degree of rehabilitation of many more amputees, but consideration of the amputee as a whole also has played a major role. It is now well recognized that, in times past, attention was too often directed only to the amputation stump. After the wound had healed, the patient was referred to a prosthetist without benefit of a physician's final evaluation. The development of the clinic-team approach (J) foreshadowed the end of such practices, and with the growth of the clinic team has come the all-important factor of considering the patient as a whole.

Implicit in such an approach is the concept that complete upper-extremity rehabilitation can rightly be expected only when the amputee has been afforded adequate training in efficient utilization of the prosthesis with which he has been fitted. Incomplete or unsystematic training is, at best, responsible for improper habits in prosthetic usage and hence for awkwardness and inefficiency. In the extreme case, it may lead to discard of the prosthesis entirely even though the components involved may themselves be of the greatest utility to an accomplished amputee wearer. The therapist has thus come to be looked upon as an important member of every prosthetics clinic team.

The importance of good health also has come to be realized. The patient who suffers

from complicating injuries or diseases may not be able to cooperate fully, and when cooperation is limited, interest and motivation die rapidly. For example, the obese patient will profit by guided weight reduction and proper weight stabilization, and the anemic and allergic will benefit by proper corrective measures. Dermatological problems frequently are a serious complication for the amputee, especially when involvement of the stump is threatened or when harnessing excoriates areas of existing dermatitis. Here proper therapeutic measures may permit continued use of the prosthesis or ensure only a temporary suspension of its use. If, however, such conditions are allowed to continue unchecked, they may result in a prolonged period of inactivity.

Equal in importance to good physical condition is a healthy mental attitude. Unless rehabilitation therapy includes consideration of the patient's mental outlook, the entire process of recovery may result in complete failure. Accordingly, some cases may require the assistance of specialists in psychiatry and related fields.

With respect to the patient's mental condition, an important factor relates to vocational and avocational pursuits. Whether an amputee can engage successfully in work and recreation to his own liking, and whether he has a taste for such activities as are possible to him, may together spell the difference between success and failure in any given case. Proper attention by a qualified occupational therapist is therefore essential.

Functional loss aside, a number of other problems arise from hand loss. In addition to the functions of grasp and tactile sense, the hand is used in many symbolic patterns—in benediction, in supplication, in the salute,

¹ Physical Medicine Service, Walter Reed Army Hospital, Washington, D. C.

