Introduction

One of the earliest recorded operative approaches to the treatment of breast cancer dates back to the 18th century when Jean Louis Petit advocated removal of the breast, pectoral muscles, and axillary lymph nodes to treat the disease ***(Grant , 2006).***

Several operations have been described for the treatment of breast cancer. Most notably, in 1894, William Halsted described what is referred to today as the "Halstedian radical mastectomy". Halsted described his surgical attack on breast cancer, he stated, "the suspected tissue should be removed in one piece" ***(Michal, 2009).***

In the 1940s, Patey advocated preservation of the pectoralis major muscle. It was noted that this procedure was equivalent in terms of local relapse rate and overall survival to patients treated with the previously described standard radical mastectomy ***(Daniel, 2005)***.

Further modification of the modified radical mastectomy occurred with the development of the total mastectomy. This procedure preserves both pectorals muscles and the axillary lymph nodes. The rationale for this modification stems from the popularization of the hypothesis that breast cancer is a systemic disease. Based on this hypothesis, the regional nodal dissection is unnecessary in the clinically negative axilla because it is unlikely to affect survival ***(Fisher, et al., 1995).***

Breast conservation involves removal of the primary tumor with an adequate margin of normal breast parenchyma. It is followed by radiation therapy in order to provide equivalent survival rates to that achieved with mastectomy. Breast-conserving surgery is also referred to as lumpectomy, partial mastectomy, and segmental mastectomy ***(Van Dongen, et al., 2000).***

The term skin-sparing mastectomy (SSM) was first used by Toth and Lappert in 1991. They described preoperative planning of mastectomy incisions in an attempt to maximize skin preservation and facilitate immediate breast reconstruction. The operation has been adopted for patients with early breast cancer treated by total mastectomy and immediate reconstruction but has not gained wide acceptance. It removes the breast, nipple-areola complex, previous biopsy incisions, and skin overlying superficial tumors. Preservation of the inframammary fold (IMF) and native skin greatly enhances the aesthetic result of breast reconstruction ***(Giles, et al., 2004).***

Prophylactic mastectomy can be offered to high-risk women, including stage I and II cancer breast, BRCA1 and BRCA2 gene mutation carriers and women with lobular carcinoma in situ. This bilateral mastectomy removes the nipple and 90% of the breast tissue but not the axillary lymph nodes. Reconstruction can then be perofmed immediately ***(Roberta, et al., 2007).***

Oncoplastic surgery of the breast means that after appropriate excision of the cancer, the remaining breast tissue is reshaped to achieve the best possible esthetic result. The goal is to resect the tumour with adequate oncological margins and to retain natural breast size and contour minimizing disturbance of surrounding body structures (muscles, nerves and skin) ***(Judy, et al., 2007)***.

A mastectomy is an operation with low morbidity and mortality and is well tolerated by patients. However, it is not without complications. Most notable are seroma formation, wound infection, skin flap necrosis, and with the modified radical mastectomy, lymphedema as a result of axillary lymph nodes dissection ***(Tejler, et al., 2000)***.