Lymphedema Complications to Prophylactic Subcutaneous Nipple-Sparing Mastectomy and Breast Augmentation with an Implant

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Clinical Image

A 42 year old woman with three children had a hereditary increased risk for breast cancer. She wanted a prophylactic subcutaneous nipple-sparing mastectomy combined with mastopexi and breast augmentation all in one operation (Figure 1).

Preoperative marking of the skin incisions (Figure 2).

A lazy-S skin incision was performed from the upper and lateral part of areola and further laterally. A subcutaneous mastectomy was performed leaving a small amount of breast glandular tissue below the nipple-areola complex. In total 460 gm breast glandular tissue was removed from each side. The implant pocket was prepared as a dual plane procedures implying a dissection between major and minor pectoral muscle cranially and subcutaneous caudally. The major pectoral muscle was divided caudally and a mesh, Ultra pro-Mesh, Monocryl-Prolene composite, Ethicon 10 x 15 cm was sutured

Figure 1: Preoperatively.

Figure 2: Skin incisions are marked.
to the sub mammary fold and to the edge of the major pectoral muscle. An anatomic implant, Mentor CPG 323 Medium Height High Profile Cohesive Gel 495 cc was inserted.

The mastopexi was done by deepithelialization of the skin superior to the areola after which the nipple-areola complex was transferred to its new location. One week postoperatively there was no complications (Figure 3).

However two months later a necroses developed in the skin incision in the patients left breast and the mesh was exposed (Figure 4). The implant and the mesh were therefore removed.

Four months later there was no sign of any infection and a new implant corresponding to the earlier was inserted.

After one week the breast was enlarged. A seroma was suspected but there was no fluid around the implant (Figure 5). The patient had since long time planned to go abroad with her family for four weeks. As responsible surgeon I was not happy over the patients decision.

When the patient came back after four weeks the breast looked almost normal. I asked: ‘How this was possible’? The patient answered: 'Every morning I stayed in bed for 45 minutes and gently moved fluid from the breast into the thorax wall’ (Figure 6).

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Obviously the patient had got lymphedema in her left breast which she by herself had treated like medical physio-lymph therapists do when they treat lymphedema patients with manual lymphatic drainage. The theory is by gentle massage open up lymph vessels closed to the affected areas and then move the lymphedema into these lymphvessels. It is a low pressure system with 10 mm Hg pressure in the tissue. The patient has not had any recurrence of her lymphedema with a four year follow up.

This casedemonstrates that it is possible to perform in one operation a prophylactic subcutaneous nipple- sparing mastectomy with a dual plane breast implant augmentation and a mastopexi. Complication happened and could be treated including manual lymphatic drainage of the postoperative lymphedema.