

Non-Confidential Description - PSU No. 4335 "Flap Jack Breast Retractor"

Field of Invention/Keywords:

mastectomy, breast cancer, retractor, skin flap

Inventors:

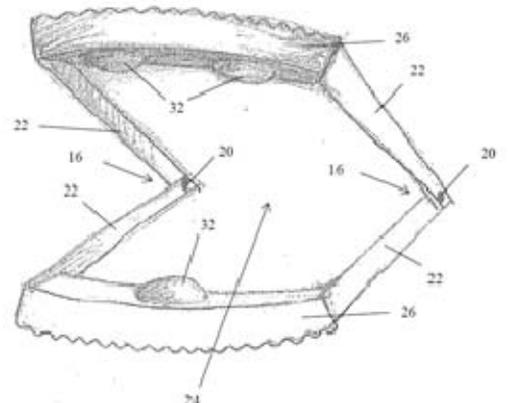
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Background

An increasing number of women are choosing to proceed with mastectomies for the treatment of early stage breast cancer. Advances in autologous reconstruction and implant based reconstruction allow surgeons to perform more complex procedures through smaller incisions. During the procedure, the plane between subcutaneous tissue and the glandular tissue of the breast must be located (dissection plane). Currently, traction and counter traction is applied to both the skin and breast tissue for this purpose. However, smaller incisions can decrease surgeon visualization thereby increasing the risk of incomplete removal of breast tissue and bleeding. There is a need for a device that increases visualization of the dissection plane and minimizes potential injury to the mastectomy flap.

Invention Description

This device is a wedge-shaped prop that can be used to retract skin from underlying tissue along a dissection plane. This retractor can enable hands-free traction, counter traction, and propping of the skin for a wide area of retraction, while being inserted through a small incision. Current retractors predominately lift at the incision edge of the flap, but they don't provide retraction at the leading edge of the dissection. Without traction and counter traction along the plane of dissection there is increased risk of both thermal and mechanical injury to the skin flap. This retraction device can decrease injury to the skin flap, improve visualization, and decrease operating time.



Advantages

- Can decrease injury to skin, improve surgeon visualization, and decrease operating time
- Can enable hands-free traction and counter traction
- May be used to lift at the leading edge of dissection

Status of the Invention

Available for licensing

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