

# Introduction

Breast reconstruction surgery aims to restore the shape and form of breast after surgical resection or mastectomy. The procedure can be performed immediately after mastectomy (primary reconstruction) or after some years later (secondary reconstruction).

Depending on individual need, nipple areola reconstruction and tattooing can be performed half year after breast reconstruction as a staged procedure.

Breast reconstruction can be classified as:

- Implant insertion with or without tissue expansion
- Autologous tissue transfer, such as Transverse Rectus Abdominus Myocutaneous (TRAM) flap (including muscle, skin and fatty tissue) technique. The transfer of flap can be performed using the attached blood supply (pedicle flap) or using microscope to restore the blood circulation (free flap). This flap is repositioned to the chest wall region. The shape can be tailored and the tissue will stand radiotherapy better.
- A combination of both

## The Procedure

- 1. General anaesthesia.
- 2. Usually the procedure will be operated by 2 teams of surgeon for mastectomy and immediate reconstruction to shorten the operative time. The procedure will last for 4 to 10 hours depending on the types of reconstruction and recovery after the anaesthesia
- 3. Use of both implant and autologous tissue may be required in certain circumstances, depending on the size of the contralateral breast and your choice of procedures.
- 4. Drains will be inserted for drainage of fluid.
- 5. Wound suturing.

## **Preoperative Preparation**

- 1. Admit 1 day before or on same day of this "elective" operation.
- 2. Anaesthetic assessment. Inform your doctors about drug allergy, regular medications or other medical conditions.
- 3. Smoking should be completely restricted as this will increase the risk of skin and flap failure.
- 4. Keep fast for 6 to 8 hours before operation.
- 5. A signed consent is required.
- 6. Investigations including blood tests, electrocardiogram, chest X-ray will be performed.
- Empty bladder and change to operation clothes before transfer to operating room. 7.
- 8. Pre-medication, antibiotic prophylaxis intravenous line may be required.

#### **Postoperative Instruction**

## A. General

- 1. Mild throat discomfort or pain because of intubation.
- 2. Nausea or vomiting are common; inform nurses if symptoms severe.
- 3. Inform nurses if more analgesics are required.
- A urinary catheter and intravenous drip will be required in the early postoperative period, it will be removed 4. according to patient condition and doctor prescription.



# **Information on Breast Reconstruction** with TRAM Abdominal Muscle Flap

# **B.** Wound care

- 1. You may have a dressing over the wound. If autologouso tissue flap is used, you should avoid direct pressure over the flap skin or its blood supply. The nurse will monitor the flap circulation regularly.
- If the abdominal wall tissue is used you may be required to sit up in bed for 2-3 days to avoid stretching on 2. the abdominal wound. You are encouraged to move your legs to avoid stasis of blood circulation.
- Postoperative pain may be experienced in the breast and donor site. If necessary you will be given an 3. intravenous line of pain medication. You can press the control button to adjust the medication required
- 4. Surgical drains will be in place to remove exudates. These will be removed in post-operative period depending on their output. But patient may go home with the drainage tube.
- Inform the nurse if there is severe pain or oozing from the wound. 5.
- In the early days after abdominal wall surgery, you may lean forward when you stand to avoid stretching on 6 the wound. Once pain can be tolerated, you can gradually straighten up, usually in 1-2 weeks' time. The abdominal skin may feel numb in the early weeks after operation but the sensation will recover with time.
- 7. You may not need to remove stitches if absorbable sutures were used. When non-absorbable sutures were used, they will be removed in 1-2 weeks' time depending on the progress of wound healing.
- Follow the instructions by nurses for wound care, massage and limb mobilization. 8.
- 9. Recovery depends on the type of procedures performed. Usually you can apply full-cup bra with no wiring in 2 weeks' time. You can resume daily activities 3-4 weeks after the operation.
- **C.** Diet Resume diet, usually 4 hours after anaesthesia, and when taking sips of water well.

# Common Risks and Complications (not all possible complications are listed)

## A. Anesthesia related

- 1. Cardiovascular : myocardial infarction or ischaemia, stroke, deep vein thrombosis, pulmonary embolism, etc.
- 2. Respiratory : atelectasis, pneumonia, asthmatic attack, exacerbation of chronic obstructive airway disease.
- 3. Allergic reaction and shock.

# **B.** Procedure related

- 1. Wound pain / Wound infection / Flap necrosis.
- 2. Bleeding (may require re-operation to evacuate the blood clot).
- 3. Seroma collection (this may need prolonged drainage or needle aspiration).
- 4. Lymphoedema / Injury to blood vessels.
- 5. Nerve injury (including long thoracic nerve, thoracodorsal nerve and rarely brachial plexus).
- 6. Frozen shoulder and chronic stiffness / Numbness over axilla.
- 7. Hypertrophic scar and keloid formation (may result in unsightly scar).
- Scarring is disadvantage of this procedures. Partial or total loss of the transferred tissue is potential 8. complication but once the wound heals, the transferred tissue will become part of your body.

## Things to take note after discharge

- 1. You can usually be discharged home within a week after operation.
- 2. If you notice non-stop bleeding, severe pain or swelling, infection and discharges, please contact the hospital or go to the Accident and Emergency Department nearby.
- 3. Remember the dates of taking off stitches / clips in the hospital clinic, and follow-up at the clinic of your doctor.
- 4. During your follow-up visit, your surgeon will check your wounds and discuss the results of surgery including any need for further treatment or subsequent nipple reconstruction and tattoo.
- 5. You need regular follow up in outpatient clinic to look for late effects of scarring, herniation of abdominal wall and problems related to the flap and implant.
- 6. Avoid lifting heavy objects with the arm on the side of operation.
- 7. Protect the arm on operated side from infection or injury. Wear glove when washing or horticulture.

Keterence Hospital Authority: "Surgery for Breast Reconstruction" (2019) Smart Patient: <u>https://www.ekg.org.hk/pilic/public/surgery\_pilic/plasticsurg\_breastreconstruction\_0240\_eng.pdf</u> (24-07-2023)



This is general information only and the list of complications is not exhaustive. Other unforeseen complications may occasionally occur. In special patient groups, the actual risk may be different. For further information please contact your doctor. Evangel Hospital reserves the right to amend this leaflet without prior notice. We welcome suggestions or enquiries on the information provided in this leaflet. Please contact our Healthcare professionals so that we could follow up and make improvement. Reference