



## MANAGEMENT OF LYMPHEDEMA : EXPERIENCE IN OUR INSTITUTE

## General Surgery

**Dr. Shubham Pandey**

3rd Year Resident, Department of General Surgery, B.J. Medical College, Civil Hospital, Ahmedabad.

**Dr. M. B. Mehta\***

Assistant Professor, Department of General Surgery, B.J. Medical College, Civil Hospital, Ahmedabad. \*Corresponding Author

**Dr. P. R. Modi**

Professor, Department of General Surgery, B.J. Medical College, Civil Hospital, Ahmedabad.

## ABSTRACT

- We evaluating Role of pre-operative and post-operative pneumatic compression and other physiotherapy exercises in management and rehabilitation in patients with lymphedema. Implementation Of reconstructural procedures (neibulowitz Nodo-venous shunt and lymphatico-venous shunt) alone and in conjunction with definitive excisional procedure according to the grade and type of Lymphedema.
- The results were that Patients with low grade lymphedema and chylous ascites were managed solely on reconstructural procedures along with proper physiotherapy and dietary modification expending the need for excisional procedures. Performing a reconstructural procedure before excisional procedure for high grade lymphedema and tailoring the time frame between the two , can significantly decrease perioperative morbidity in terms of operative time, need for blood transfusion and ease of resection. Post operative course in terms of less Lymphorrhoea , less chances of graft failure and better rehabilitation

## KEYWORDS

## INTRODUCTION

Lymphedema is the condition caused by an abnormality of the lymphatic system leading to excessive accumulation of tissue fluid in form of lymph in interstitial space. Lymphedema is the chronic condition and if left untreated will cause restriction in limb movement and work capacity. India is having 40% of worldwide burden of lymphedema and most of the cases are secondary due to lymphatic filariasis. It is important to diagnose and treat in early course of disease to have better results.

## KINMOTH CLASSIFICATION

PRIMARY No identifiable lymphatic disease Females > Males	SECONDARY Definitive cause More common
LYMPHOEDEMA CONGENITAL <2YEARS	TRAUMA
LYMPHOEDEMA PRAECOX 2-35YEARS	SURGERY
LYMPHOEDEMA TARDA >35YEARS	FILARIAL LYMPHOEDEMA
	TUBERCULOSIS
	SYPHILLIS
	FUNGAL INFECTION
	ADVANCED MALIGNANCY
	POST RADIOTHERAPY

## AIMS AND OBJECTIVES

- Role of pre-operative and post-operative pneumatic compression and other physiotherapy exercises in management and rehabilitation in patients with lymphedema.
- Implementation Of reconstructural procedures (neibulowitz Nodo-venous shunt and lymphatico-venous shunt) alone and in conjunction with definitive excisional procedure according to the grade and type of Lymphedema.
- Role of octreotide in post-operative management of lymphedema.

## INCLUSION CRITERIA:

- Few cases of gradual onset primary lymphedema.
- Patients from age 13 yr to 53 yr
- Majority cases of secondary lymphedema.

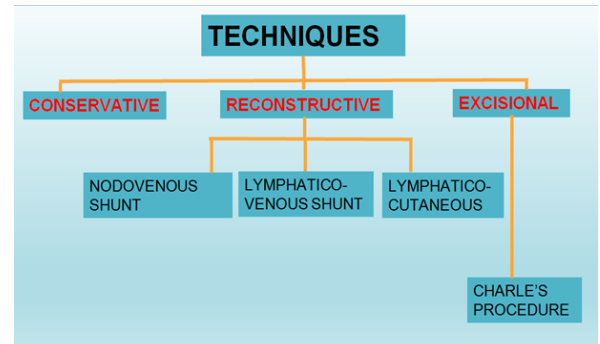
## EXCLUSION CRITERIA:

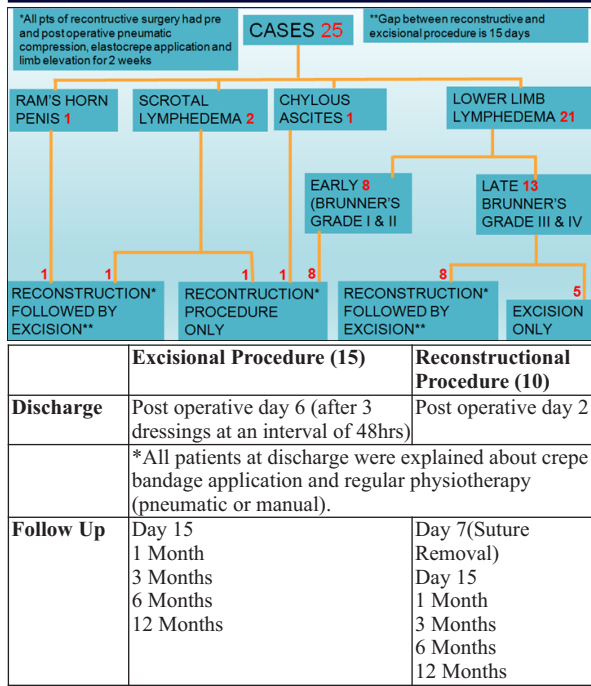
- Post radiotherapy lymphedema
- Post surgery lymphedema (post hysterectomy and post mastectomy etc.)

- Congenital genetically transferred lymphedema
- Lymphedema due to chronic venous stasis and post trauma.

## MATERIALS AND METHODS

- STUDY: NON RANDOMISED PROSPECTIVE CASE STUDY
- NUMBER OF CASES: 25
- TIME PERIOD: 3 YEARS





**RESULTS AND DISCUSSIONS**

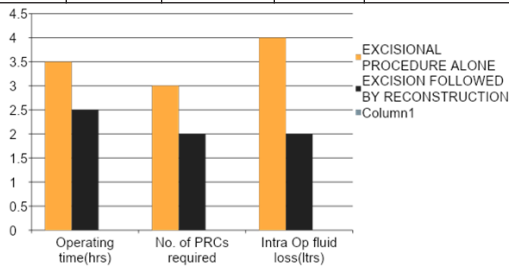
Limb girth reduction from day of admission till last pre-operative day in cases of lower limb lymphedema in all 21 patients due to

**1. Pneumatic Compression:**

DAYS	MID FOOT(CM)	MID CALF(CM)	MID THIGH(CM)
7	1	3	2
14	2	5	3

**2. Limb Girth Reduction After Reconstructive Procedure, Inclusive Of All 21 Patients:**

POST OP DAY	AVERAGE LIMB GIRTH REDUCTION (CM)			
	MID-FOOT	MID-CALF	MID-THIGH	WEIGHT REDUCTION (KG)
1	2	4	3	0.5
7	3	7	4	3
15	4	10	6	5



POST OP DAYS	ABDOMINAL GIRTH (CM)	WEIGHT REDUCTION (KG)
15	3	4
30	10	7
90	19	16

**3. Role of octreotide in excision procedure:**

Post Op Day	No. Of Gauze Soakage		% Uptake Of Graft	
	Without Octreotide	With Octreotide	Without Octreotide	With Octreotide
3	11	5	90	95
5	8	5	80	95
7	5	3	75	90

**CONCLUSION**

Management of Lymphedema being a debatable subject has led to various propositions for its treatment modalities, Of which reconstructive procedures and physiotherapy are the cornerstones. Patients with low grade lymphedema and chylous ascites were managed solely on reconstructural procedures alone with proper physiotherapy and dietary modification expending the need for excisional procedures. Plan of management should not be generalised but should be individualised according to patient's profile.

Performing a reconstructural procedure before excisional procedure for high grade lymphedema and tailoring the time frame between the two, can significantly decrease perioperative morbidity in terms of operative time, need for blood transfusion, fluid loss and ease of resection. Post operative course in terms of less Lymphorrhoea, less chances of graft failure and better rehabilitation. Use of octreotide was beneficial in reduction of soakage, lymphorrhoea leading to significant reduction in graft failure therefore should be used. With proper motivation and lifestyle modification patients can improve their quality of life. We are still evaluating role of lymphoscintigraphy and its correlation with operative techniques, role of dietary modifications and role of manual lymphatic decongestive therapy in management of lymphedema.