



MEET 2014
MULTIDISCIPLINARY EUROPEAN
ENDOVASCULAR THERAPY

Office Based CHIVA

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MEET2014
MULTIDISCIPLINARY EUROPEAN
ENDOVASCULAR THERAPY

Faculty disclosure

***Fausto
Passariello***

I have no financial relationships to disclose

Ground floor and
quick procedures

→ Many patients

VENOUS
OFFICE

10th floor and
long procedures

→ A few patients

varices



OB Chiva

***Systematic organization of the
working environment***

reduce to a minimum

***the instrumental
and structural requirements***

Chiva

- ambulatory, but generally surgical

OB Chiva

- equipped medical-surgical office
- all the needed authorizations

PROCEDURES OF INTERVENTION

CHIVA

OB CHIVA

Crossotomy

RLDC

Phlebectomy of tributaries

Endovenous and perivenous Laser

FUGS

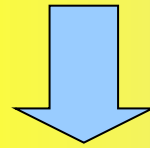
Ligature of perforators

US guided Endovenous Laser

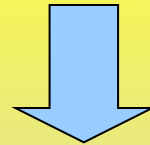
Devalvulation

Wire Guided Devalvulation (WGD)

OB Chiva

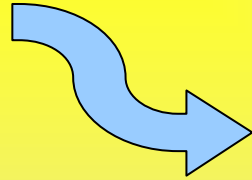


immediate recall

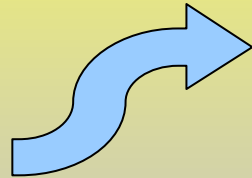


***classic non surgical
operators***

- **Day Surgery**
- **Ambulatory Surgery**



security arrangements



- **Office Based Surgery**

**The organizing and structural
requirements are then reduced**

without

any change in security

Laser in Chiva

RLDC

***Riobamba Laser Draining
Crossotomy***

(F. Passariello – N. Morrison)



**Riobamba
2009**



Riobamba 2010



Riobamba

2014



Office Based Chiva (OB Chiva)

F. PASSARIELLO

Centro Diagnostico Aquarius, Napoli

The OB Chiva is a systematic organization of the working environment, in order to reduce to a minimum the instrumental and structural requirements.

Journal of Vascular Diagnostics

Dovepress

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METHODOLOGY

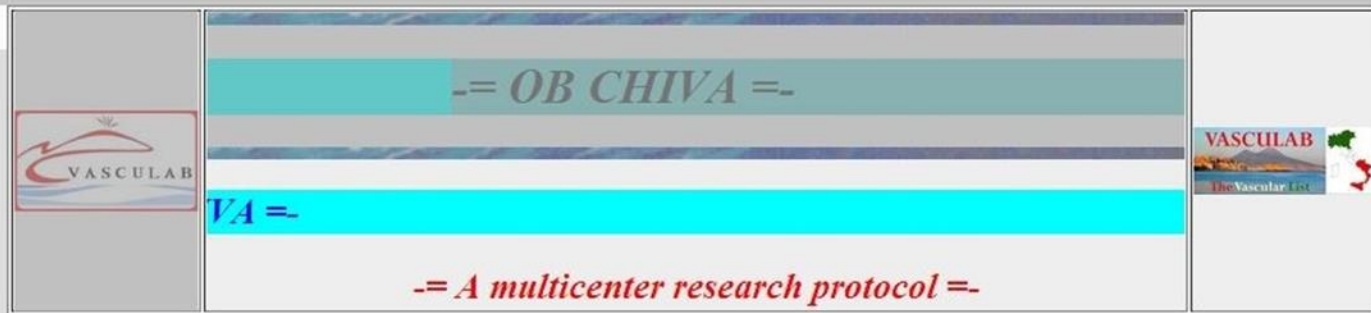
The office based CHIVA

This article was published in the following Dove Press journal:
Journal of Vascular Diagnostics
25 September 2013
[Number of times this article has been viewed](#)

Fausto Passariello¹
Stefano Ermini²
Massimo Cappelli³
Roberto Delfrate⁴
Claude Franceschi⁵

Abstract: The cure Conservatrice Hémodynamique de l'Insuffisance Veineuse en Ambulatoire (CHIVA) can be office based (OB). The OB-CHIVA protocol is aimed at transferring CHIVA procedures to specialists rooms. The protocol will check the feasibility of OB-CHIVA, data pertaining to recurrence, and will offer the opportunity to study saphenous femoral junction (SFJ) stump evolution, the role of the washing vessels and the arch recanalization rate, and gather new data

The OB Chiva Web Page

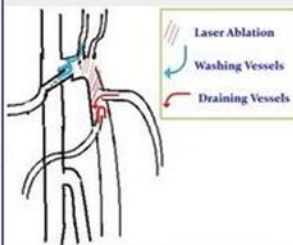


Index

- The Office Based CHIVA Protocol
 - The protocol
 - Team registration
 - Registered access: coming soon
- Medical and Surgical Teams
 - No Disclosure Team
 - Protocol Agreement
 - Consenso al Protocollo
 - Consenso a Non

The Office Based CHIVA Protocol

- LASER, RF, Steam, Mechanical ablation, Glue/Super-Glue
- The Protocol is constituted by some public or already published material, which can be used and redistributed (citing the Authors and the source) and by several internal documents, which are private and are (or will be) available only to registered participants, Centers and Companies.

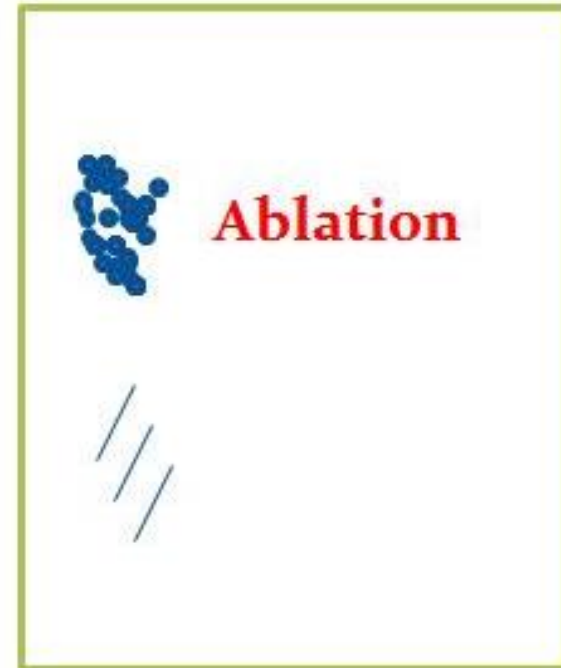
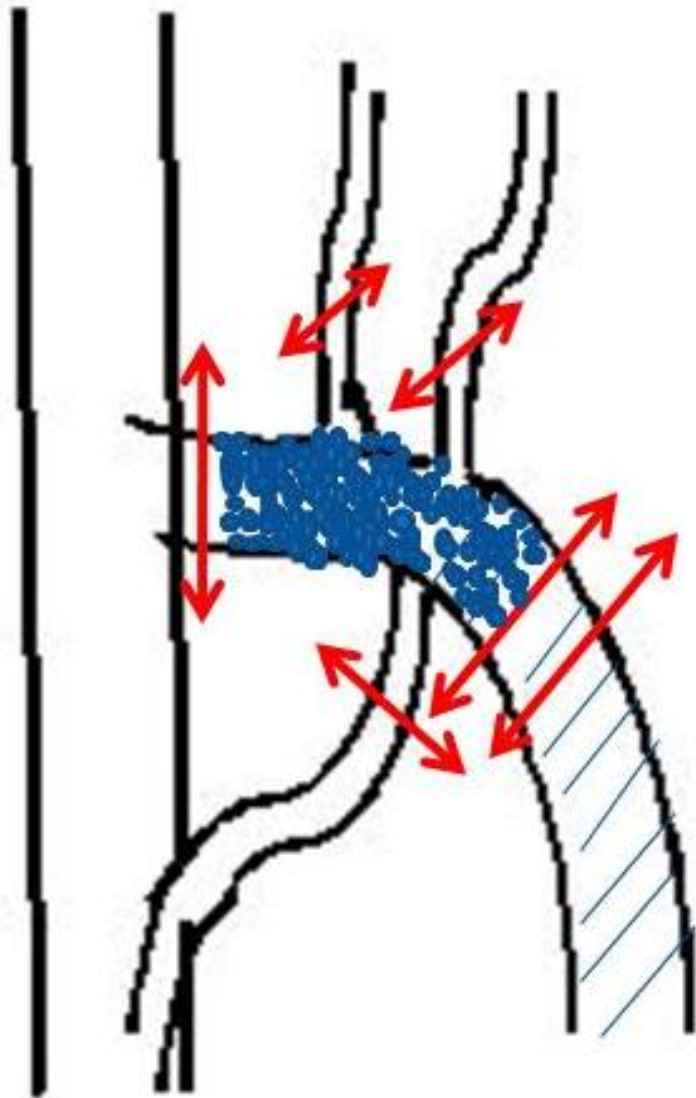


Registered access: coming

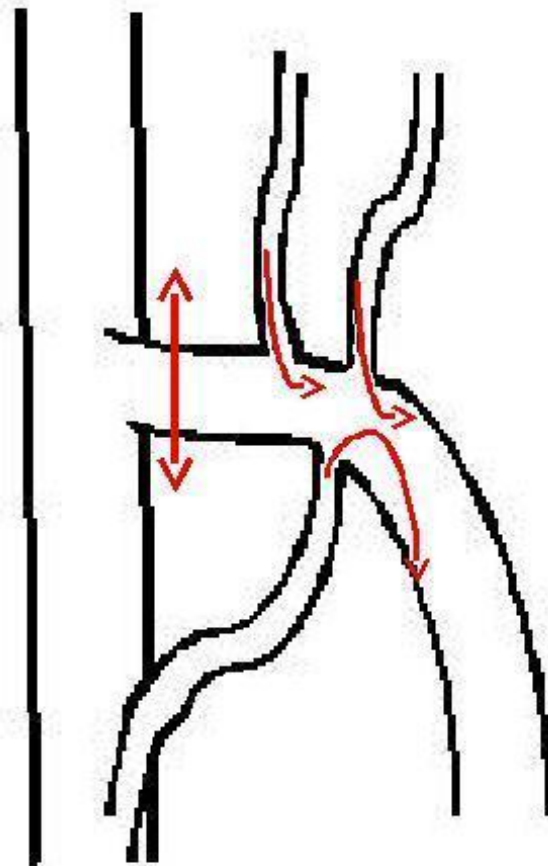
Several kinds of Crossotomy

- ✓ **Traditional Crossectomy**
- ✓ **CHIVA Crossotomy**
- ✓ **R.L.D.C. Crossotomy**

Traditional Crosssectomy

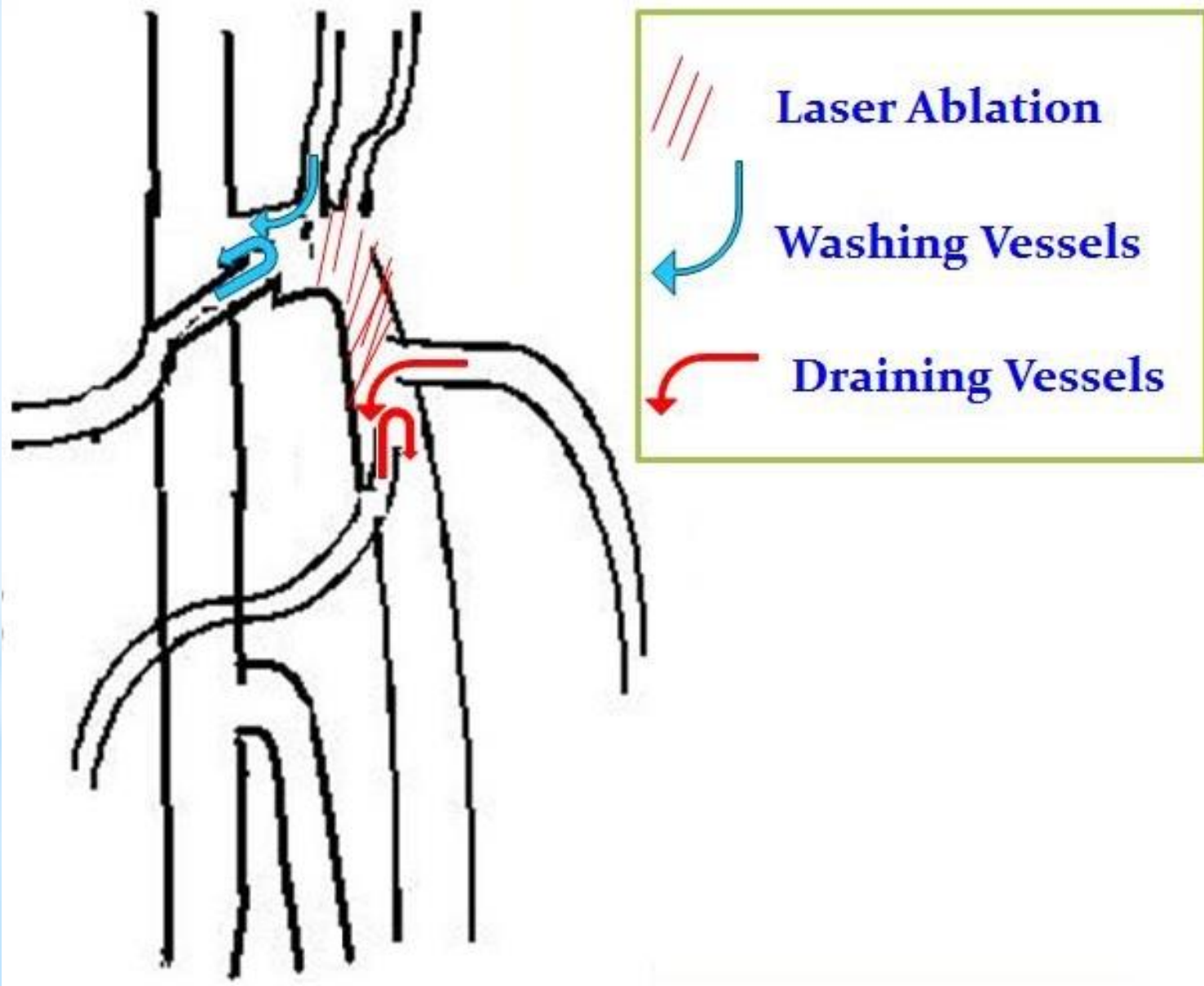


CHIVA Crossotomy

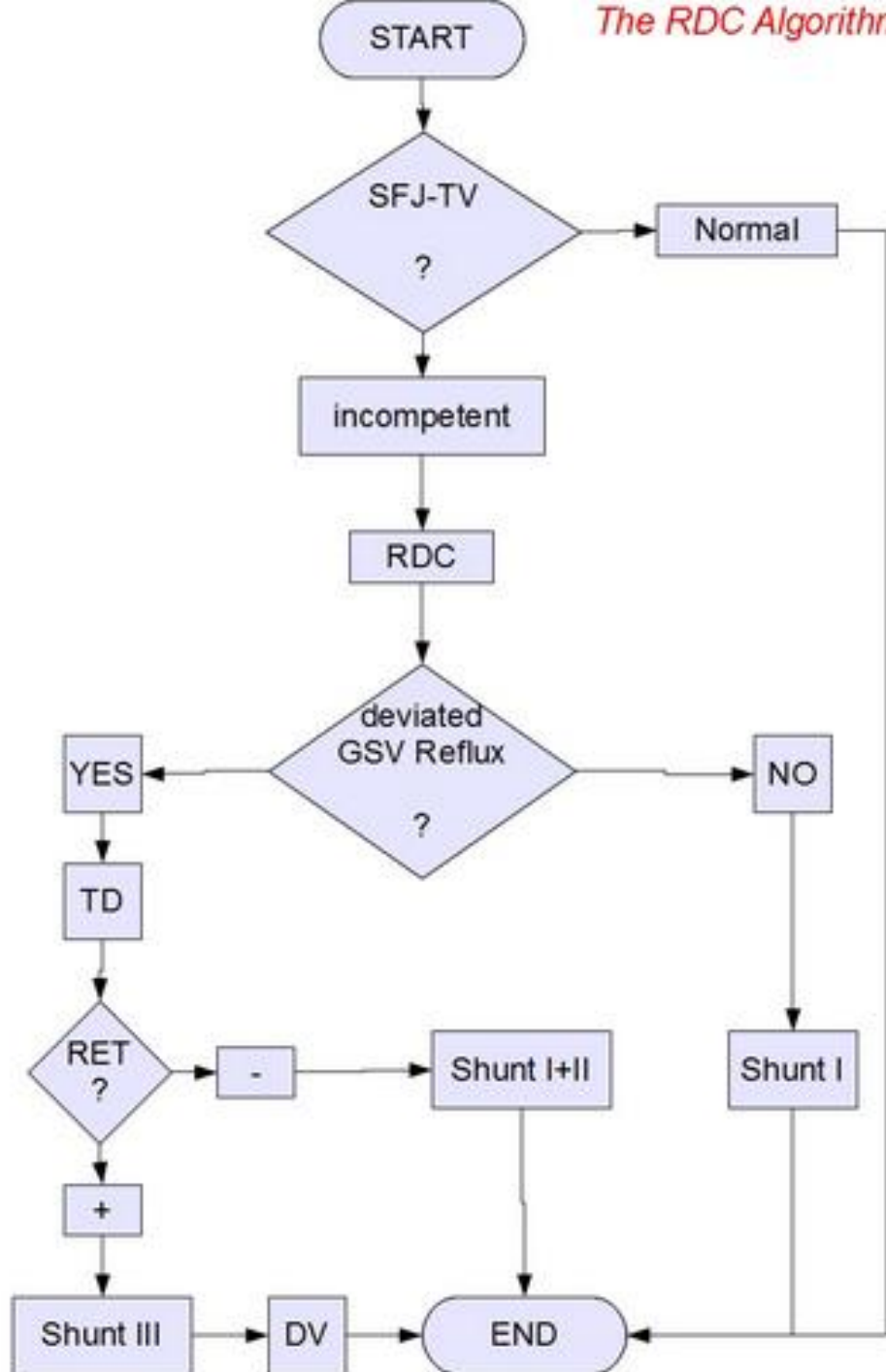


Draining Vessels

R.L.D.C. Crossotomy







The RDC Algorithm

Test

- SFJ TV incompetence
- Deviated reflux
- RET

R.L.D.C.

Materials and Methods

LASER equipment and fibers for endovenous treatments
Surgical Instruments for phlebectomy

Echo device: a careful study of

- ✓ **the SFJ**
- ✓ **the washing vessels**
- ✓ **the draining vessels**

R.L.D.C.

Main variables

#w number of washing vessels

ϕw max caliber of washing vessels

#d number of draining vessels

ϕd max caliber of draining vessels

L lenght of LASER obliterated GSV arch at start

LT lenght of LASER obliterated GSV arch at follow up

LS lenght of LASER sub-occluded GSV arch at follow up

R.L.D.C.

Indications

Relative contra-indications to surgical crossotomy

- ❑ Local (*obesity*)
 - ✓ To avoid local adverse effects
- ❑ General (*coagulation, epatopathies, cardiopathies, ...*)
 - ✓ To reduce the lasting time of interventions

Hemodynamics

- ❑ Sh I
- ❑ Sh I+ II

R.L.D.C.

Contraindications

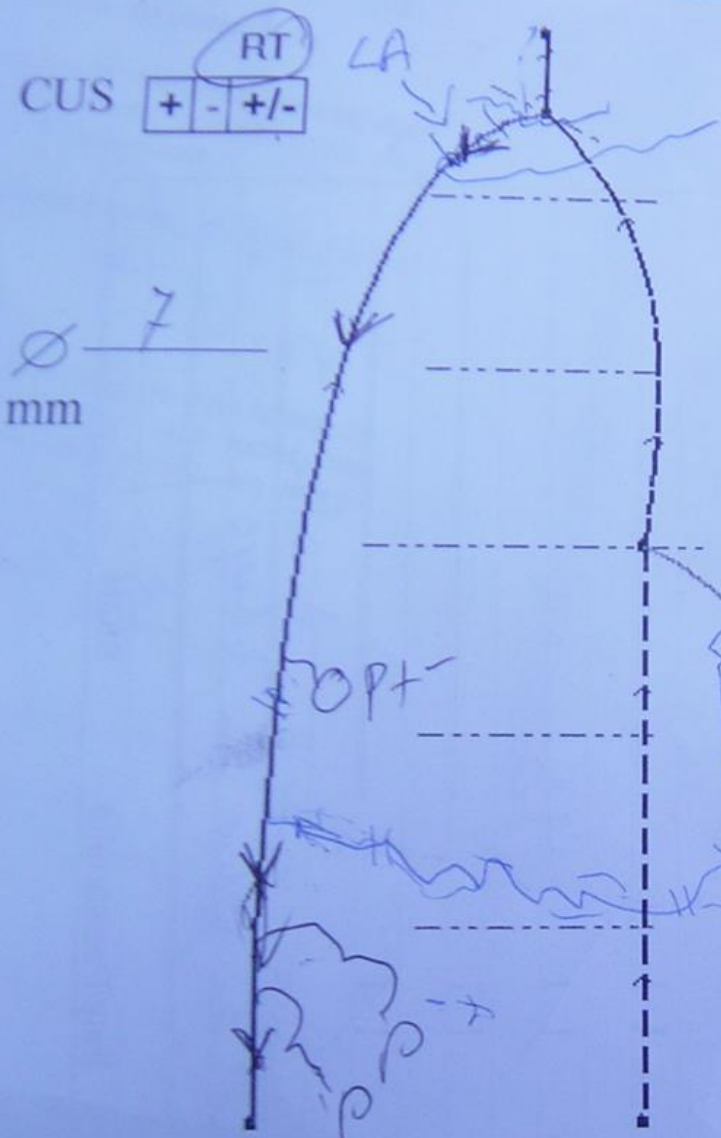
No real contra-indication

- ✓ **difficulties in the isolated ShIII**
 - ✓ **devalvulation difficult to perform**
 - ✓ **very hypoplastic peripheral GSV trunk**

OB CHIVA CLINICAL CASES

... mi venosa insuficiente causada
 re venosa abajo de mi pierna.

... DEL PACIENTE: Guido P. Fecha
 C.C.: 060004588
 DOMICILIO: CANTONIA

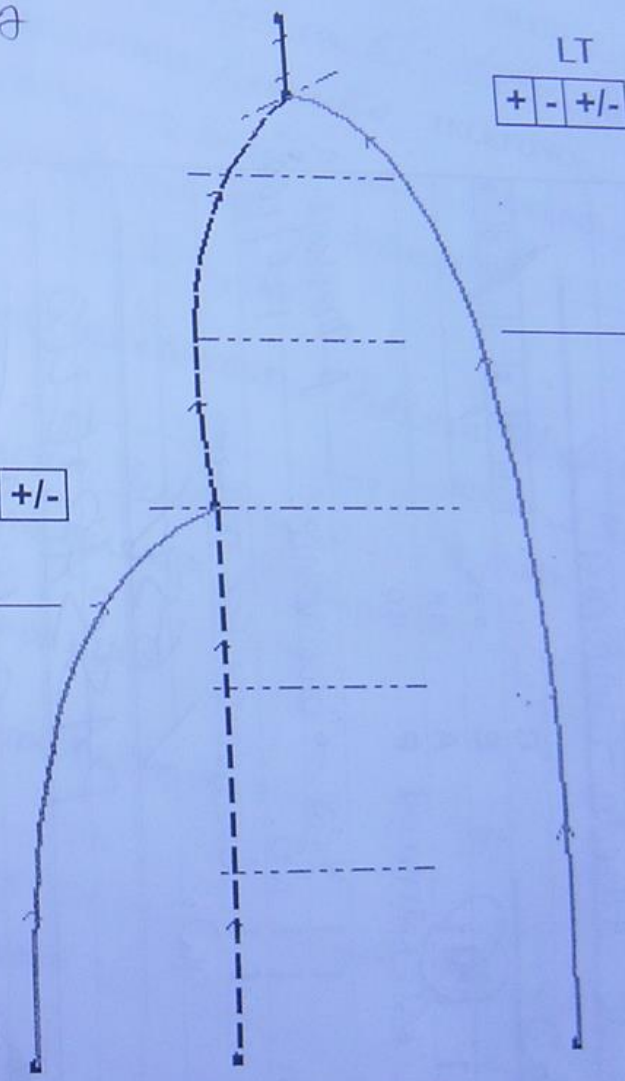


+	-	+/-
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 CUS

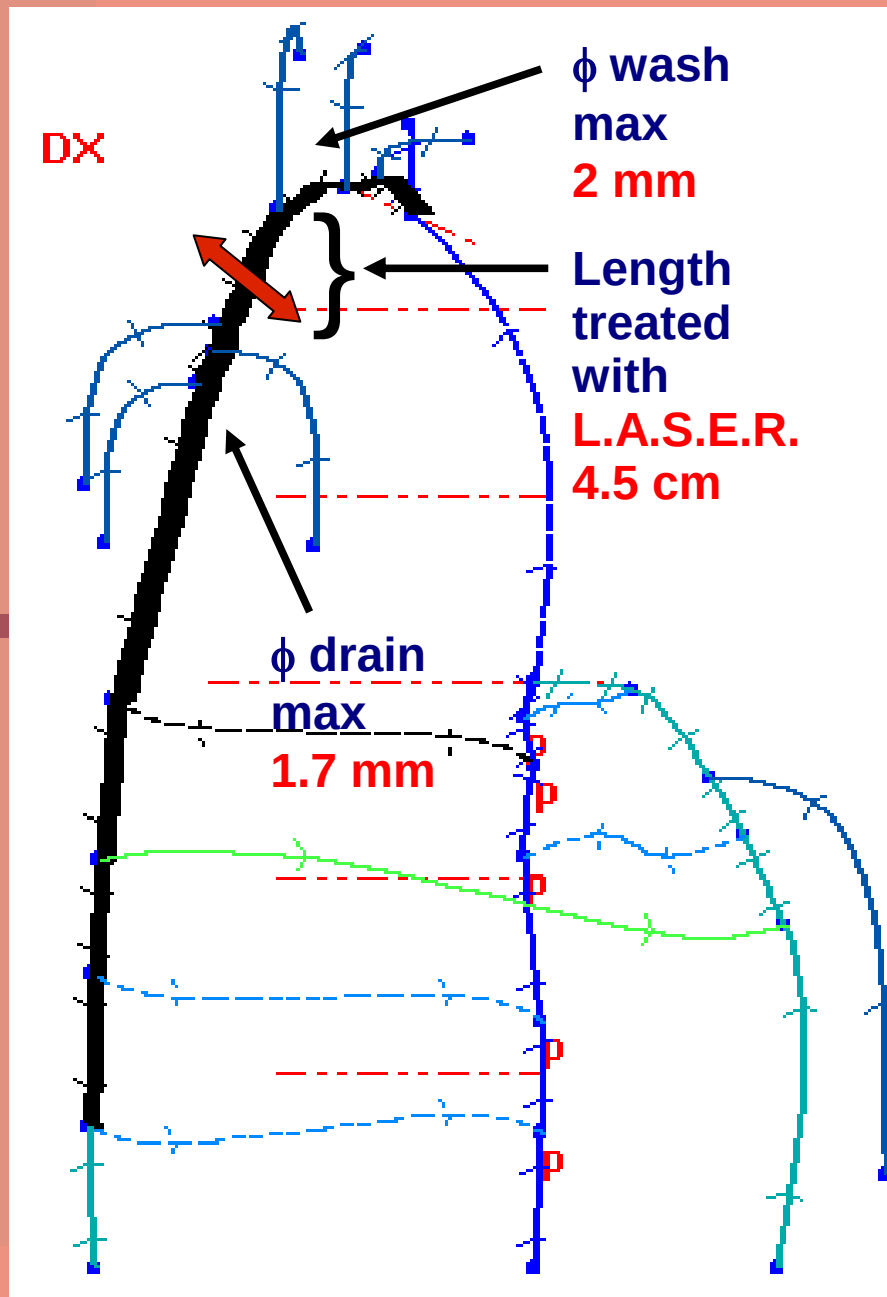
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mm



SHUNT

SHUNT 29 7 2009



eq2_GAC

R. L. D. C

Riobamba

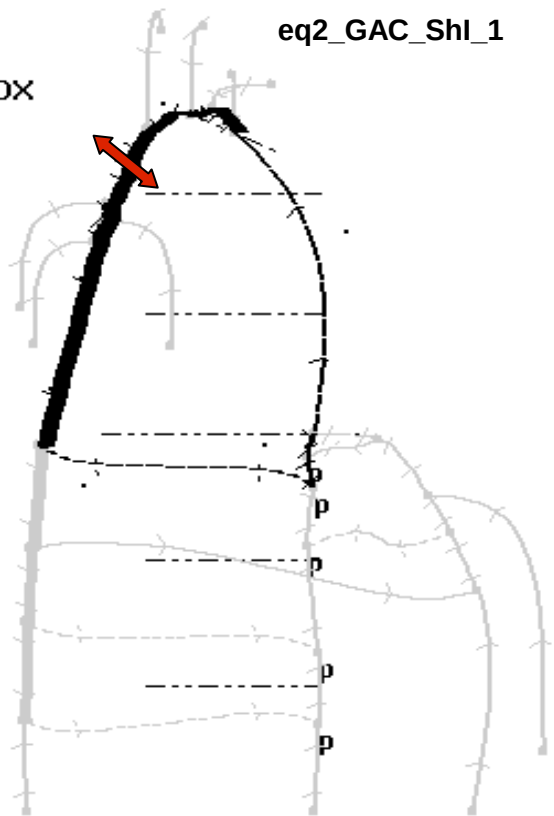
LASER

Draining

Crossotomy

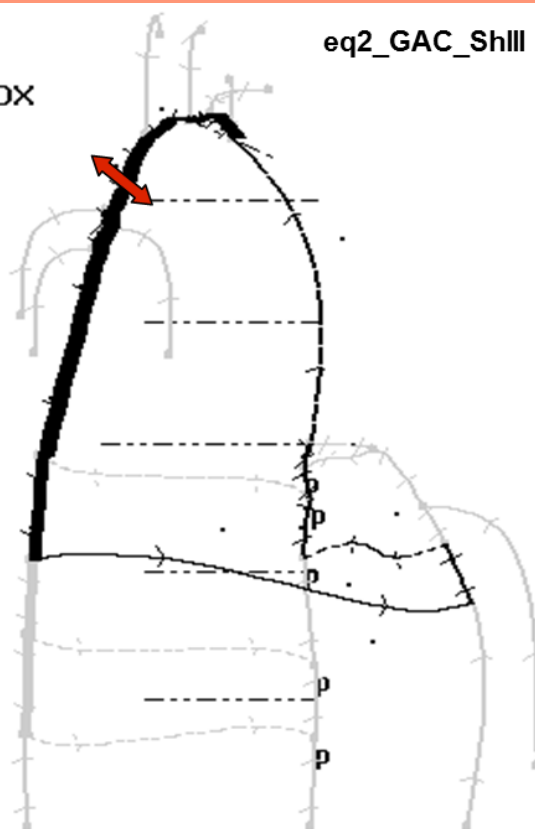
eq2_GAC_ShI_1

DX



eq2_GAC_ShIII

DX

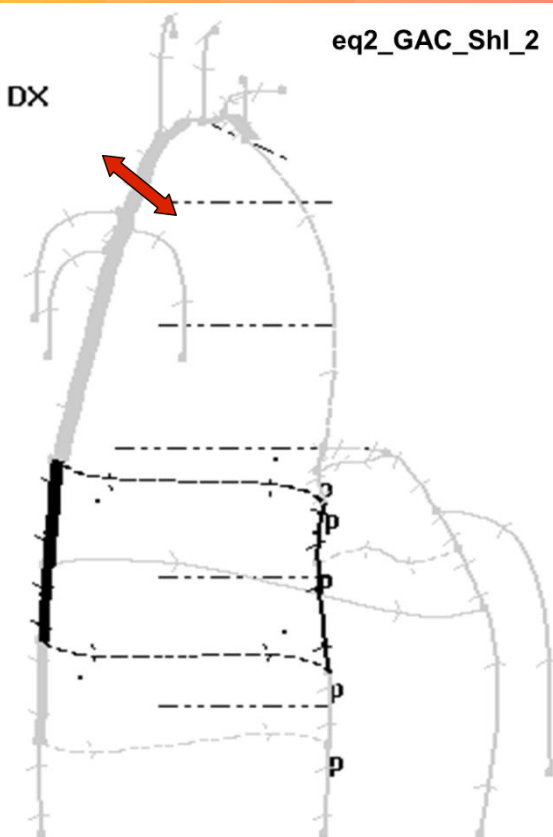


Persisting shunt



eq2_GAC_ShI_2

DX



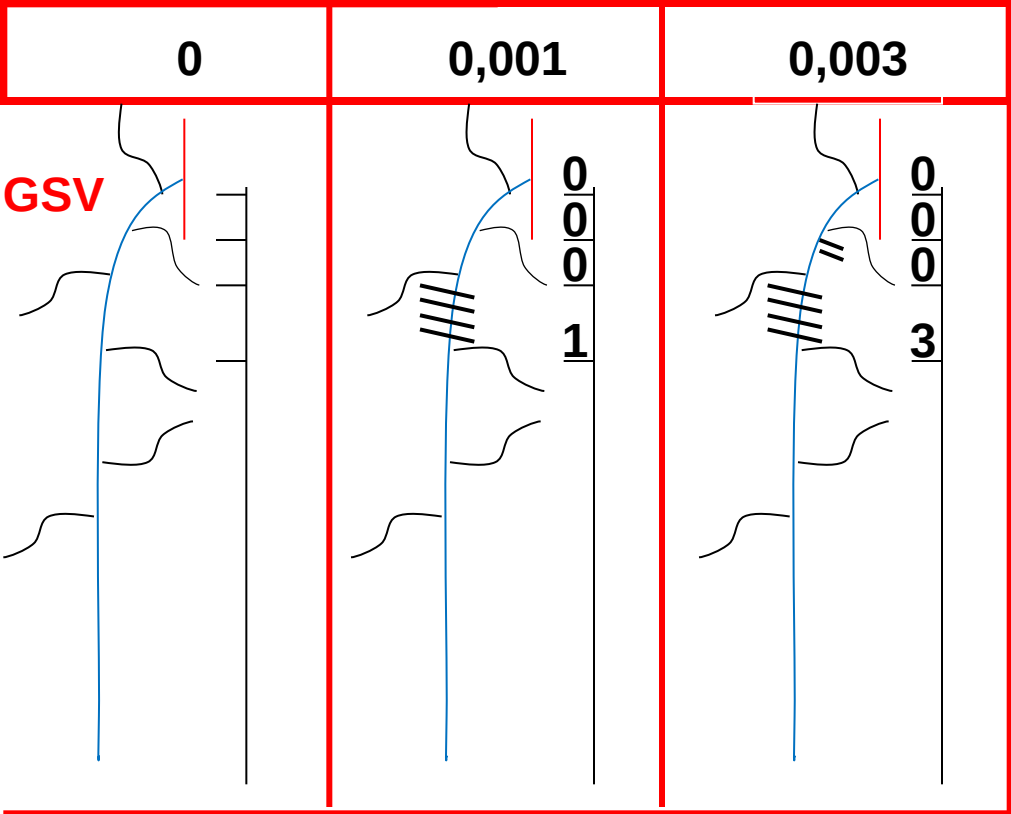
Disconnected shunts



X-PASTE evolution

GSV LASER treatment

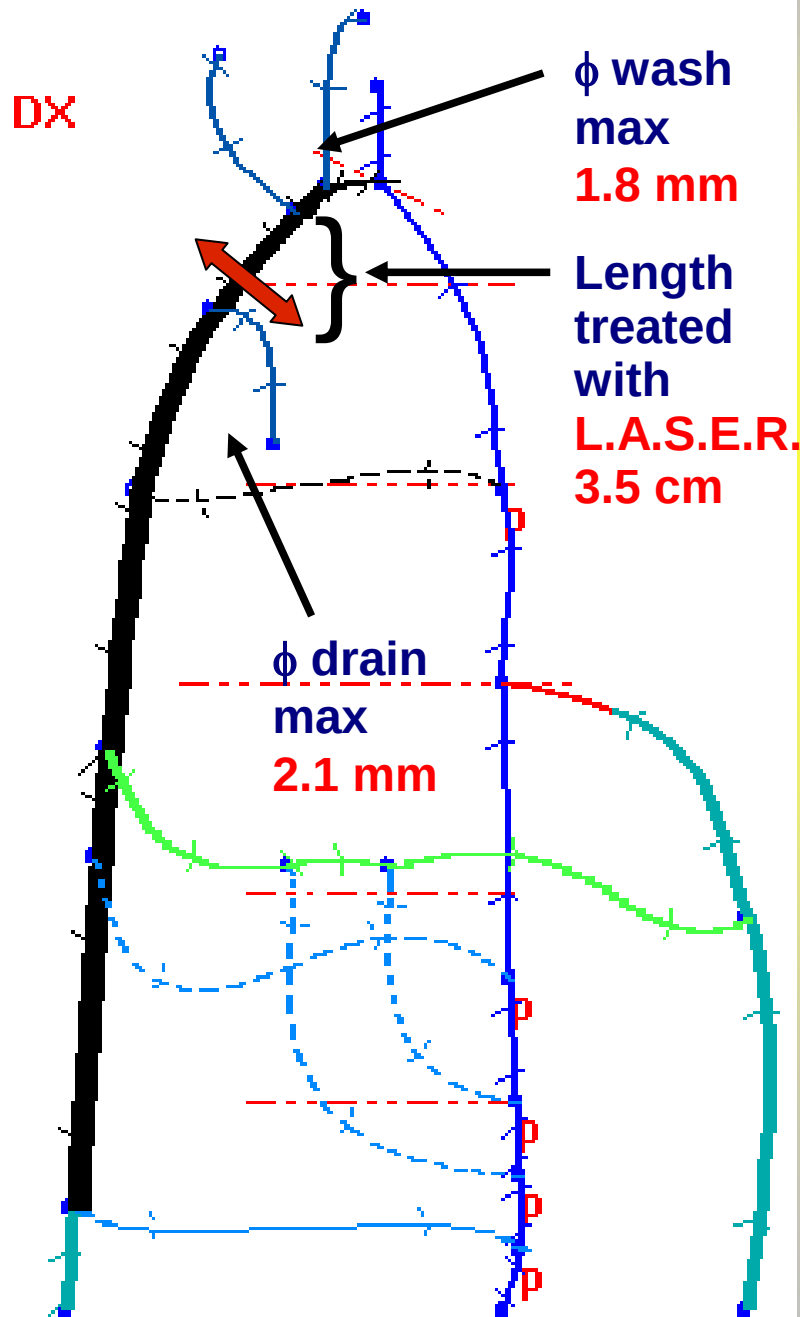
X-PASTE score



Thrombosis			
echogenicity		extention	
■	hyper	≡	partial
■	mixed	≡≡	complete
■	hypo		

GAC

Time of follow-up



eq3_VL

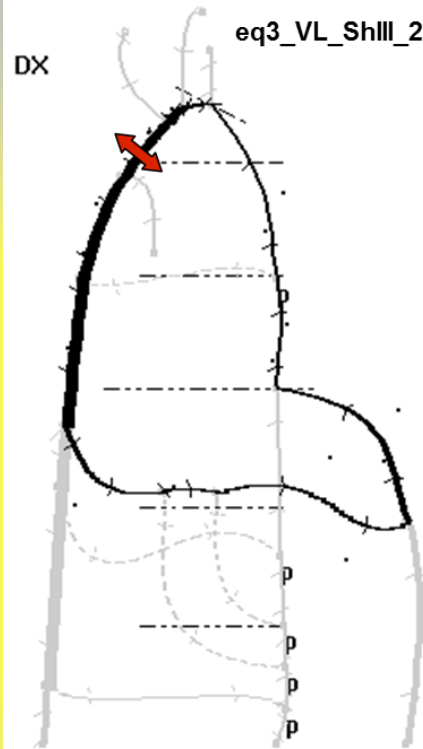
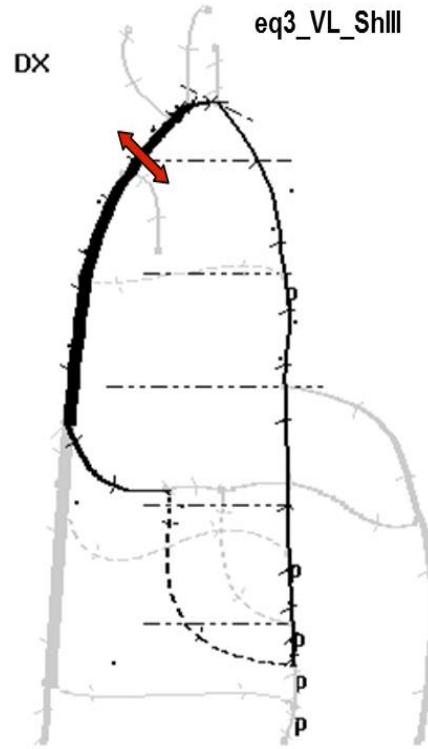
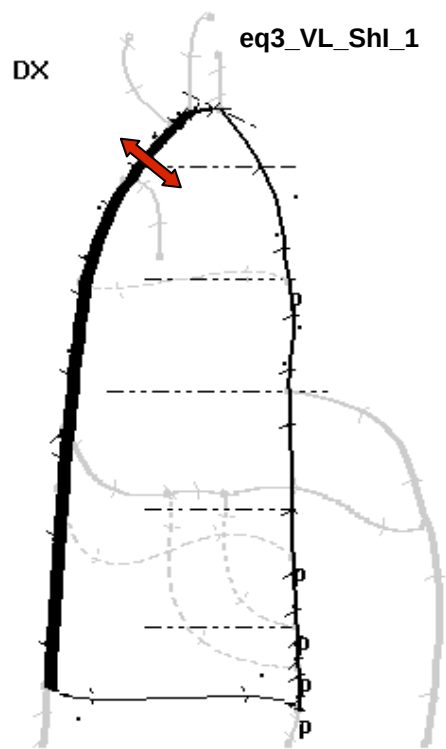
R. L. D. C

Riobamba

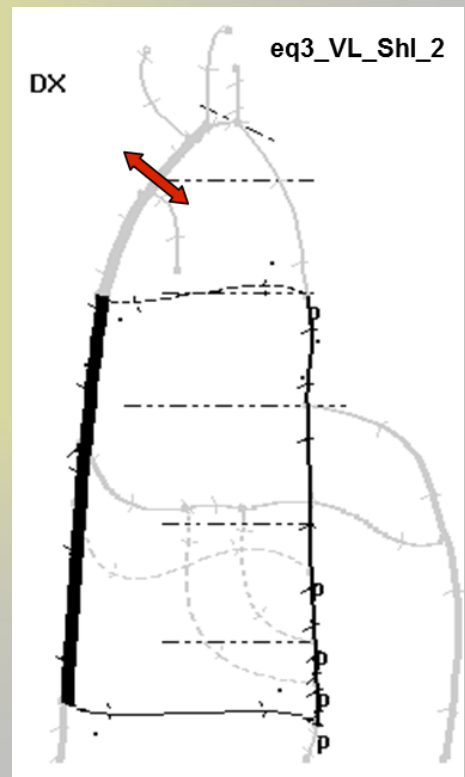
LASER

Draining

Crossotomy



Persisting shunt



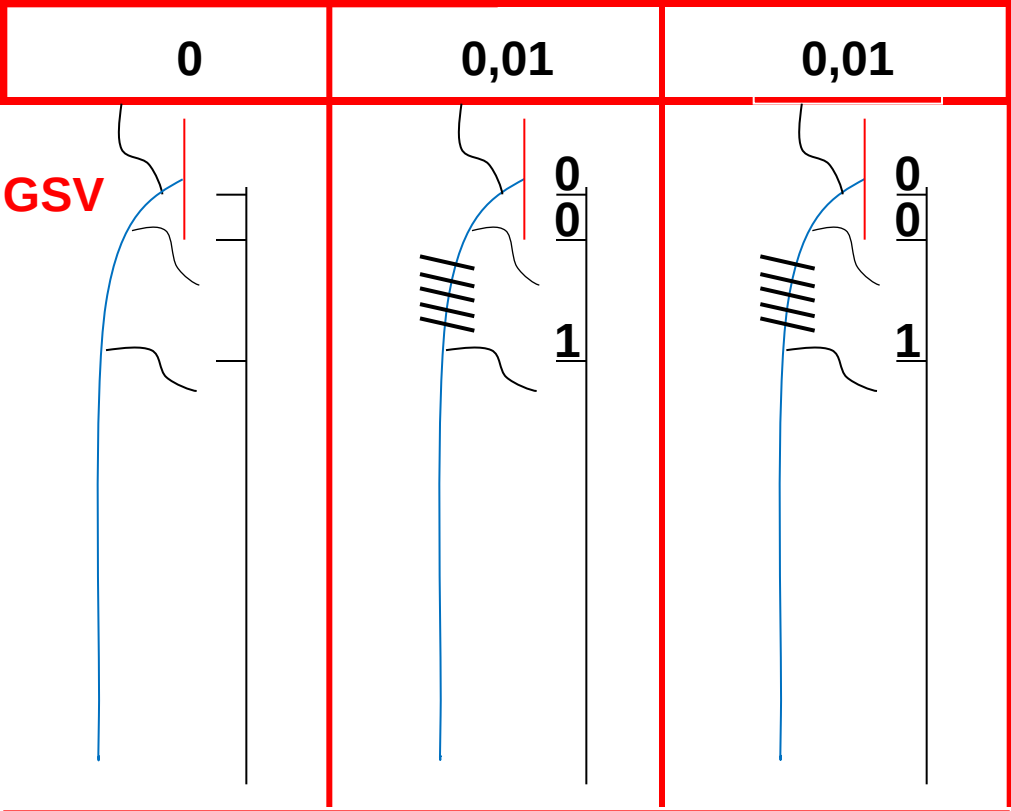
Disconnected shunts



X-PASTE evolution

GSV LASER treatment

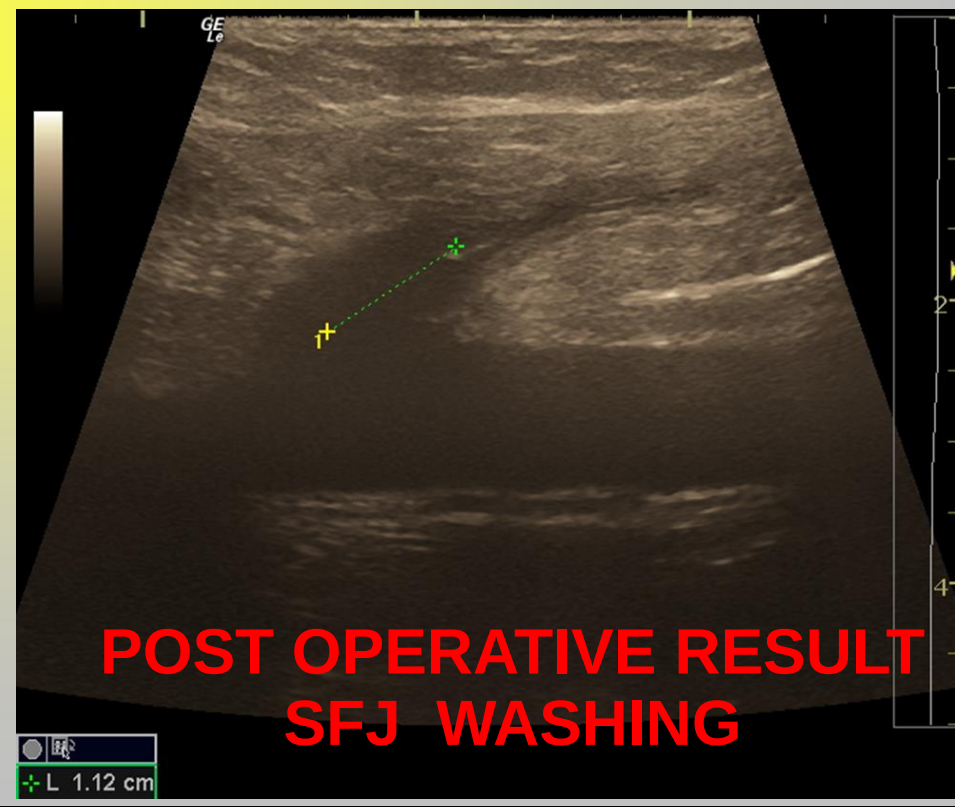
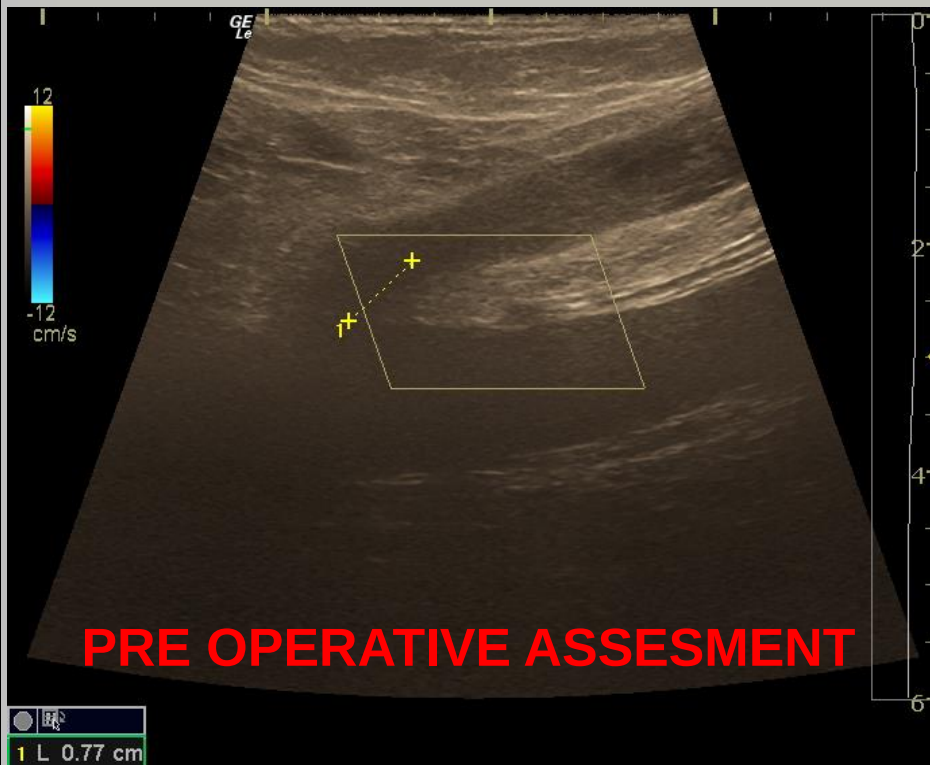
X-PASTE score



Thrombosis			
echogenicity		extention	
■	hyper	≡	partial
■	mixed	≡≡	complete
■	hypo		

VL

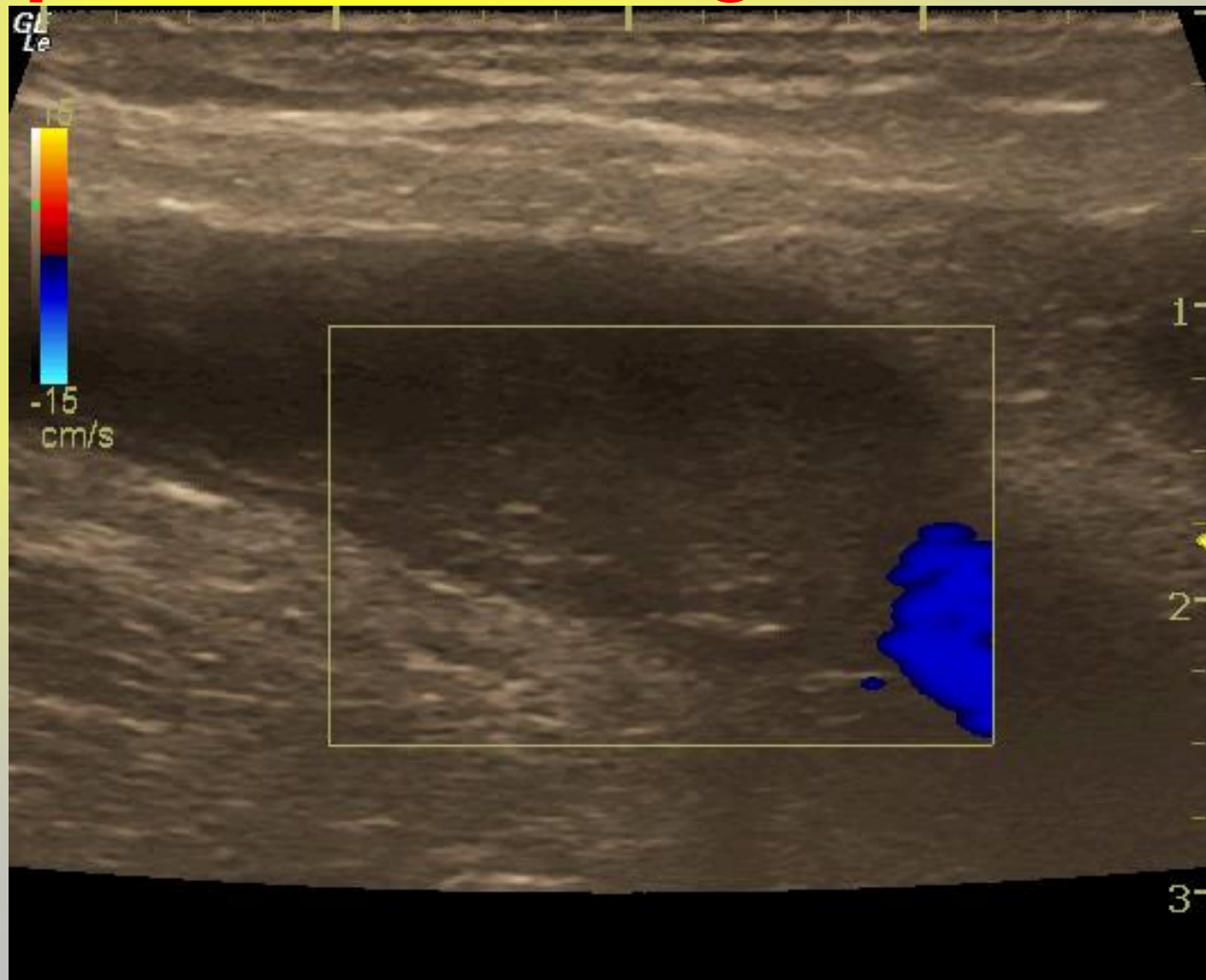
Time of follow-up



POST OPERATIVE RESULT TRUNK DRAINING distal floating thrombus



POST OPERATIVE RESULT SFJ WASHING proximal floating thrombus



OB CHIVA STATISTICS

OB CHIVA CASES

N Patients 13

Sex 6M 7F

Age 47.9 +/- 15.2 yo (32-78yo)

Limb 10RT 3LT

CEAP C1 0, C2 10, C3 0, C4 2, C5 0, C6 1

Anthropometry and GSV caliber

- height of the groin **74.5 +/- 6.1 cm**
- height of the first re-entry perf **36.3 +/- 14.2 cm**
- mid-thigh GSV caliber **7.4 +/- 3.2 mm**

SFJ study

- number of washing vessels **2.5 +/- 1.1**
- max washing caliber **3.3 +/- 1.7 mm**
- number of draining vessels **1.9 +/- 0.7**
- max draining caliber **2.1 +/- 0.5 mm**

PROCEDURES

☐ LASER

- ✓ 12 808nm power 14w pullback speed 0,1 cm/s LEED 140 J/cm
- ✓ 1 1470nm power 6w pull back speed 0,1 cm/s LEED 60 J/cm

associated phlebectomies 8/13

associated UGS 5/13

MISMATCH BETWEEN PLANNED AND PERFORMED PROCEDURE

- planned GSV length
 - 7.7 +/- 3.6 cm
- treated GSV length
 - 6.8 +/- 5.3 cm

R.L.D.C. Results

Reflux

#cases **13**

	#	%
reflux	3	23
	1	insufficient administered energy, open SFJ
	1	incompetence of one of the washing vessels, not detected pre-operatively by reflux competition

Riobamba Laser Draining Crossotomy (*RLDC*)

an anecdotal long term follow-up

- **1 GSV case treated in 2009**

Instrumental Follow-up at 5 years

- **1 GSV case treated in 2010**

Only Clinical Follow-up at 4 years

CUS ~~RT~~

+	-	+/-
---	---	-----

LGGJ 2009

Ø 7 mm

+	-	+/-
---	---	-----



pre - intervention

Patient Ref #

31

CUS

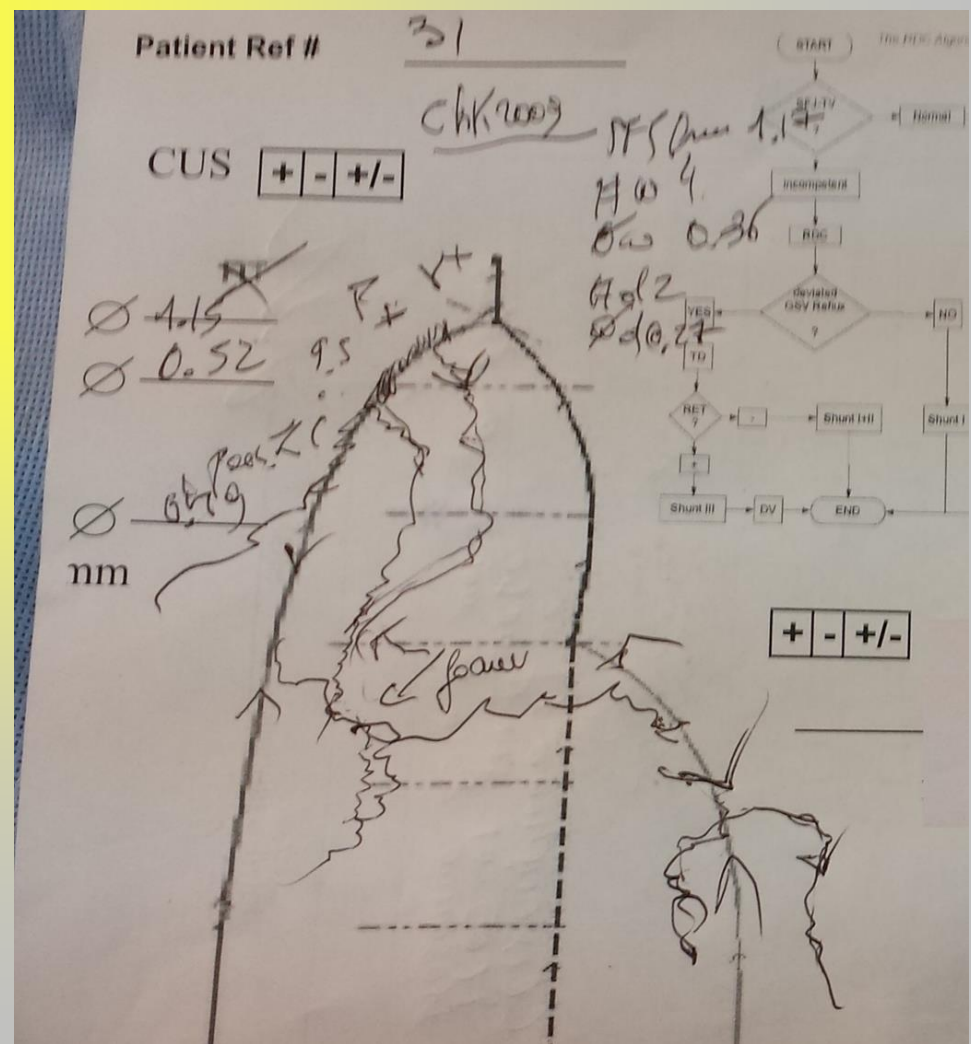
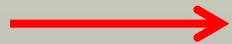
+	-	+/-
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Ø 4.15
Ø 0.52

Ø 6.19 nm

+	-	+/-
---	---	-----

5 y follow up





Centro Diagnostico Aquarius
26/04/14 18:26:10 ADM

q31chk,
260414-181952

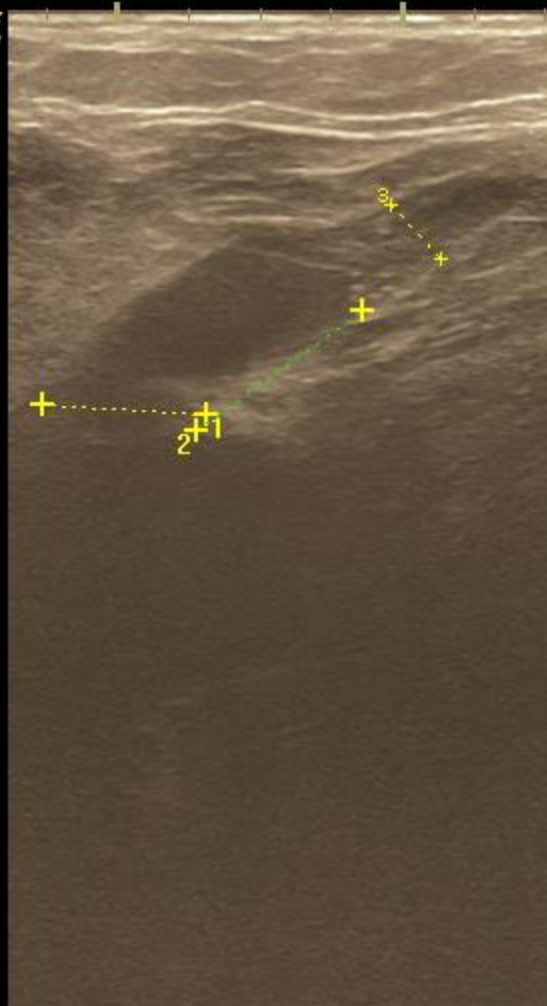
MI 0.4
--:--:--

TIs 0.3

12L-RS
Veins



GE
Le



B CHI
Frq 12.0 MHz
- Gn 62
E/A 2/3
- Mapp D/0
D 7.0 cm
- DR 99
FR 26 Hz
2- AO 100 %

4-

6-

●	1/2
1	L 1.15 cm
2	L 1.43 cm
3	L 0.52 cm

Follow up

LGGJ – 2009/2014

	2009 (pre)	2009 (3 days)	2014 (5 years)
# w	4	4	4
ϕ w	2.9	2.9	3.6
# d	2	2	2
ϕ d	2.9	2.9	2.76
PASTE	0st 4t 0st	5st 4t 0st	0st 9.5t 4st
X-Paste	0.0001	0.0003	0.001107

Clinical results at 5 y

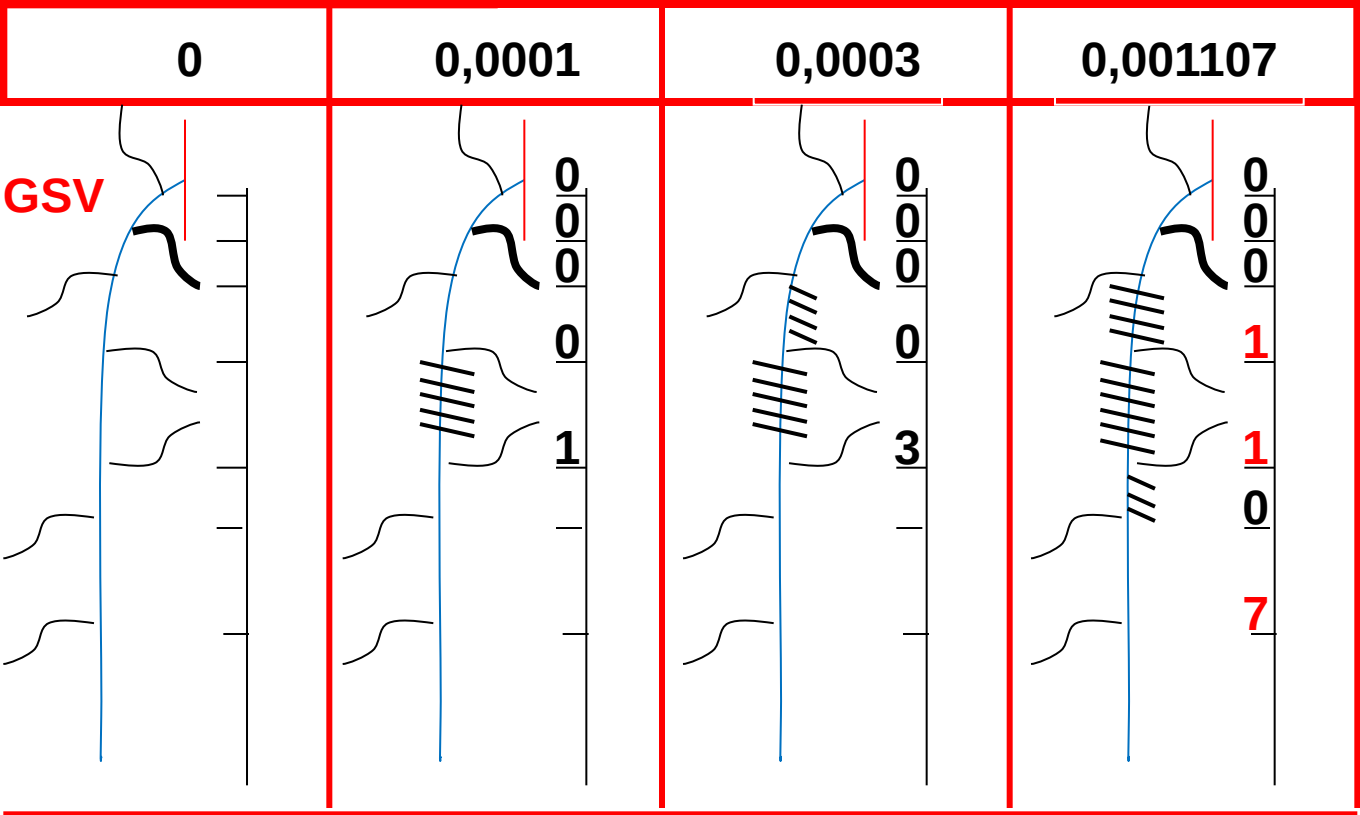
- ✓ **Very well**
- ✓ **He complains for some varicosities in the leg (partially fed by the medial accessory)**
- ✓ **He is satisfied and asks for an intervention also on the other limb.**

X-PASTE evolution

GSV LASER treatment

X-PASTE score

Thrombosis			
echogenicity		extention	
■	hyper	≡	partial
■	mixed	≡≡	complete
■	hypo		



LGGJ

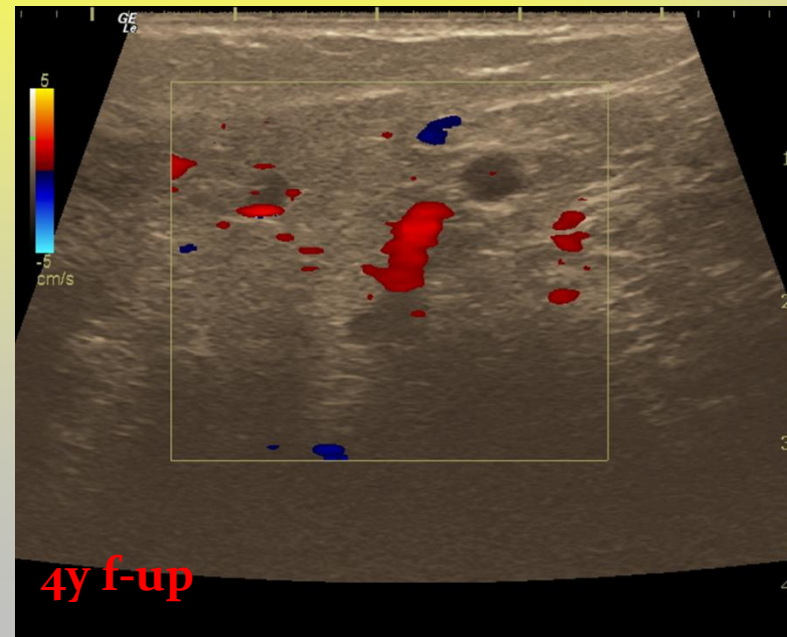
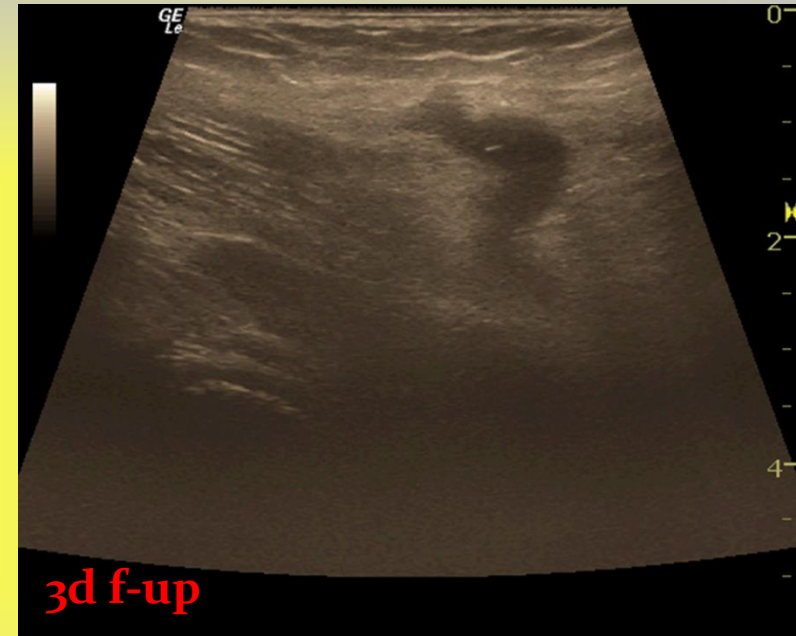
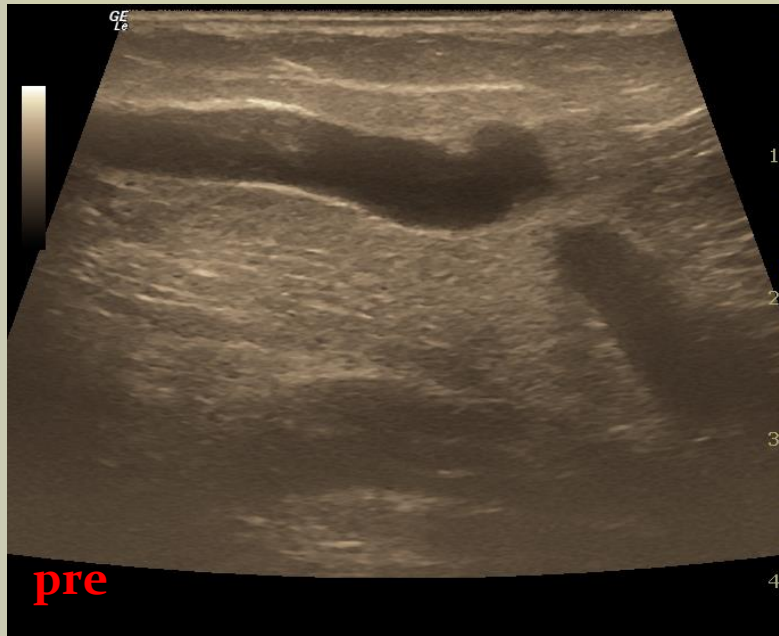
pre goal 3d 5y Time of follow-up

Riobamba Foam Draining Crossotomy (RFDC)

- **1 SSV case treated in 2010**

Follow-up at 4 years

E12 SSV - Foam Injection



Post-LASER Recanalization

The patient feels much better and both the ulcers quickly healed in 3 months after the intervention, though it was hemodynamically a failure.

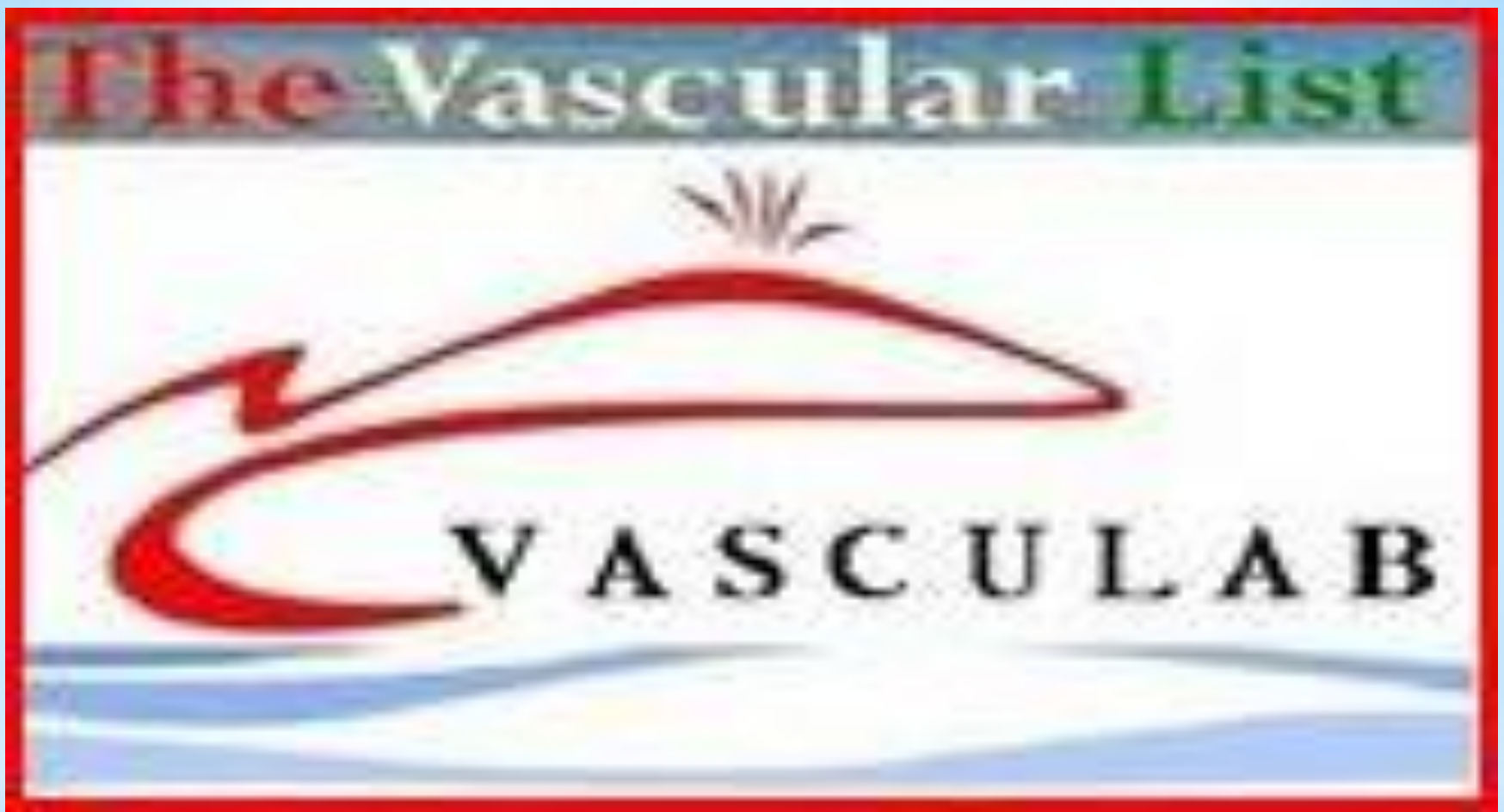
A marked improvement of QoL scores was registered at 1 year of follow-up.

pre-intervention



1 year follow-up





!! 2321 !!

subscribers