NHS

Bristol Urological Institute

Everything you need to know about the male external genitalia

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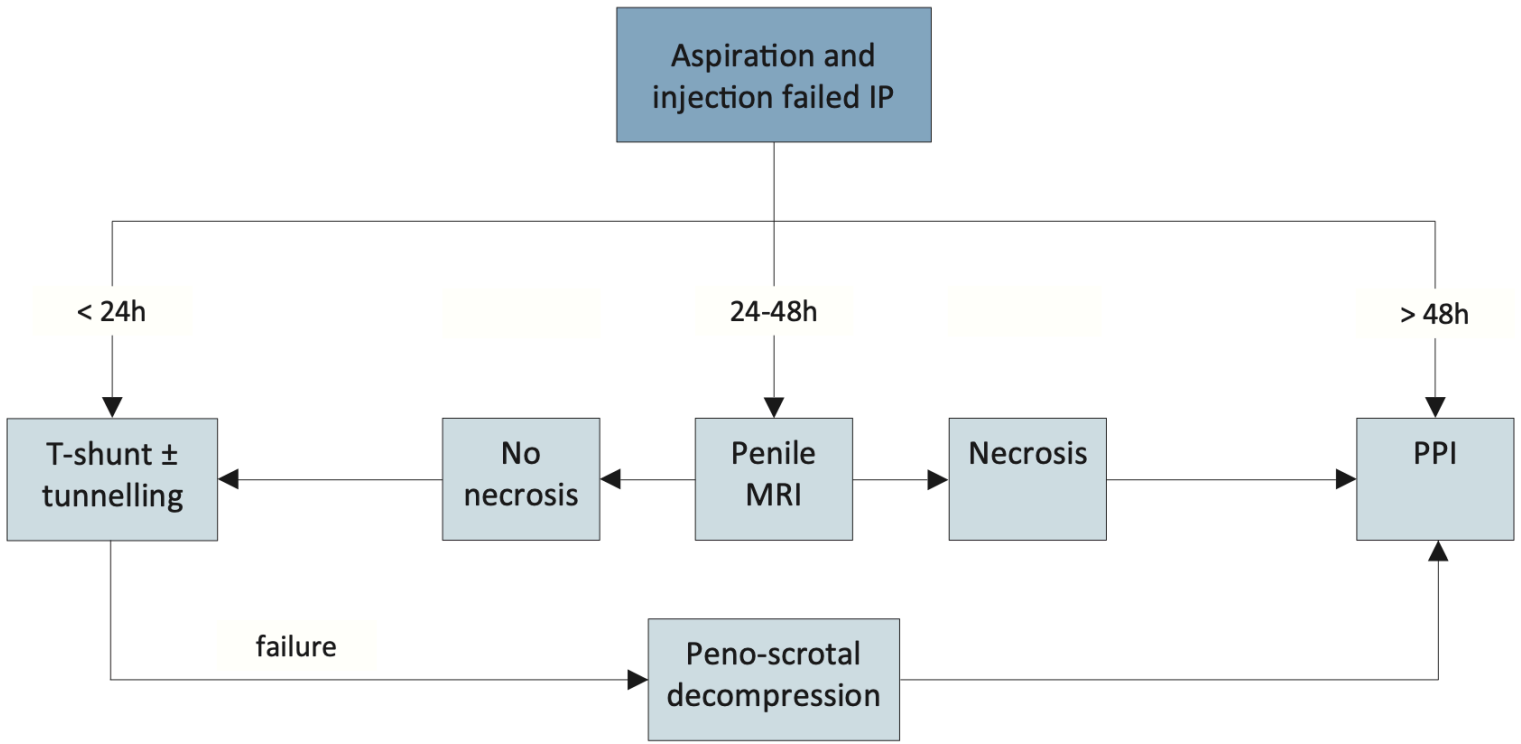
Figure 14: Algorithm on surgical management of priapism



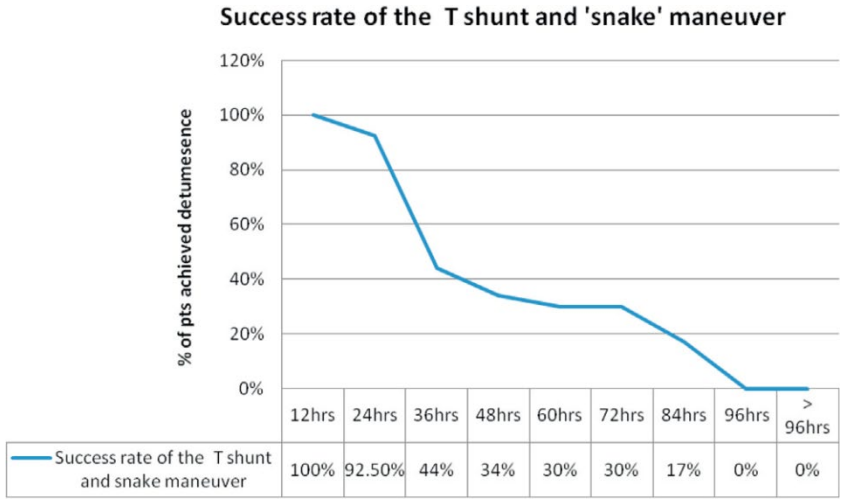
MRI - Magnetic resonance imaging; PPI = penile prosthesis implantation.

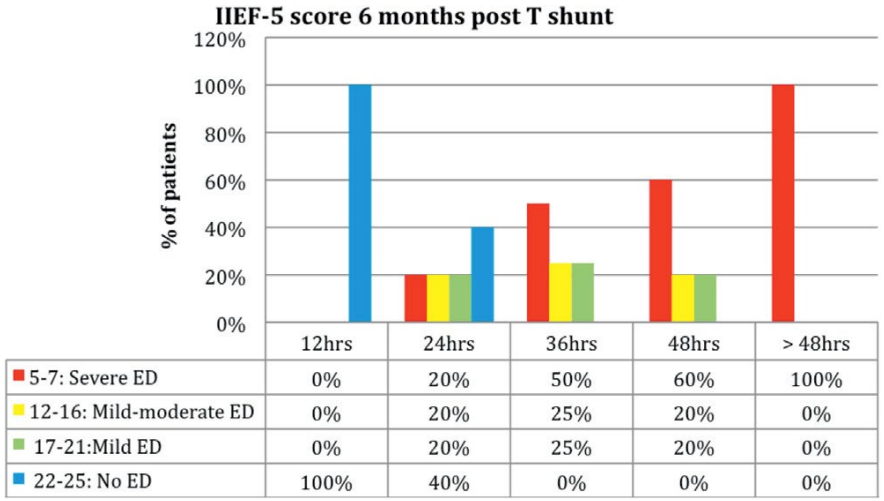
Priapism

Efficacy of the T-shunt and intracavernosal tunnelling

45pts

ischaemic priapism
failed conservative measures

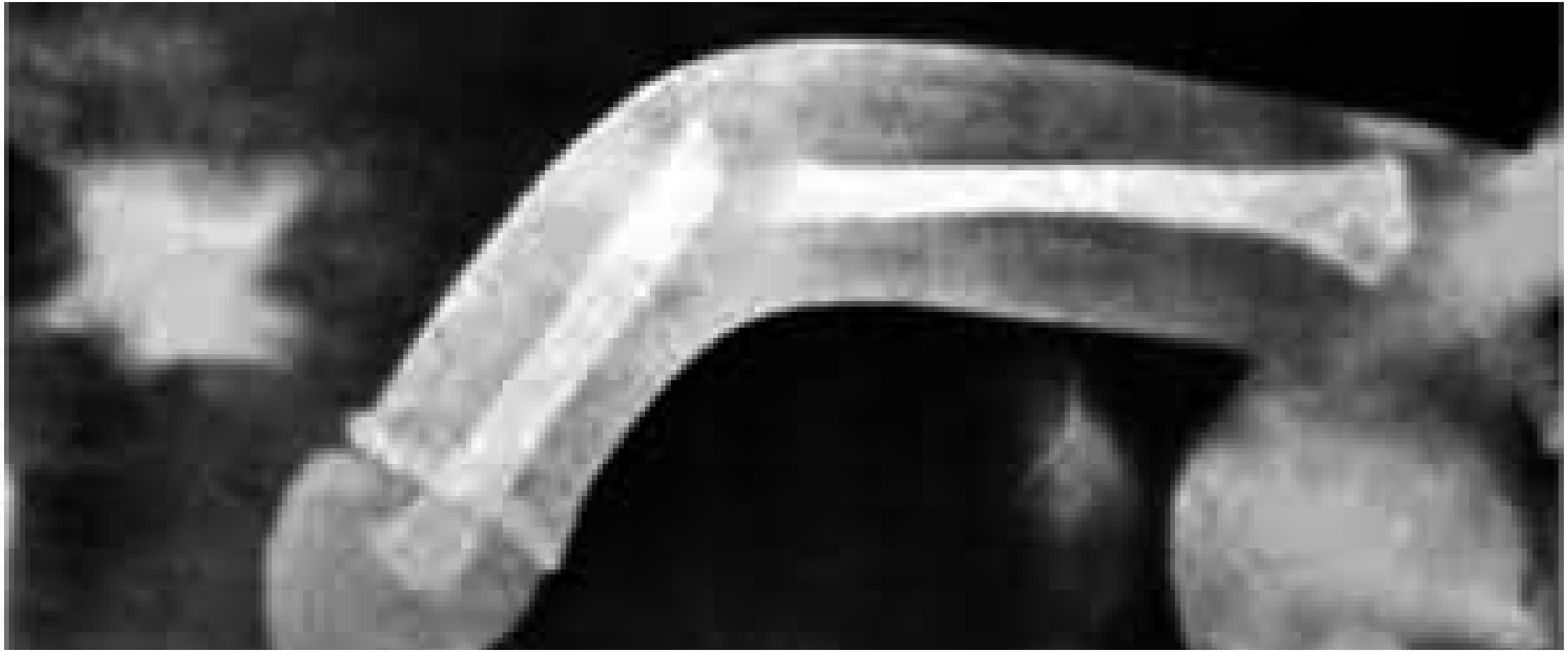


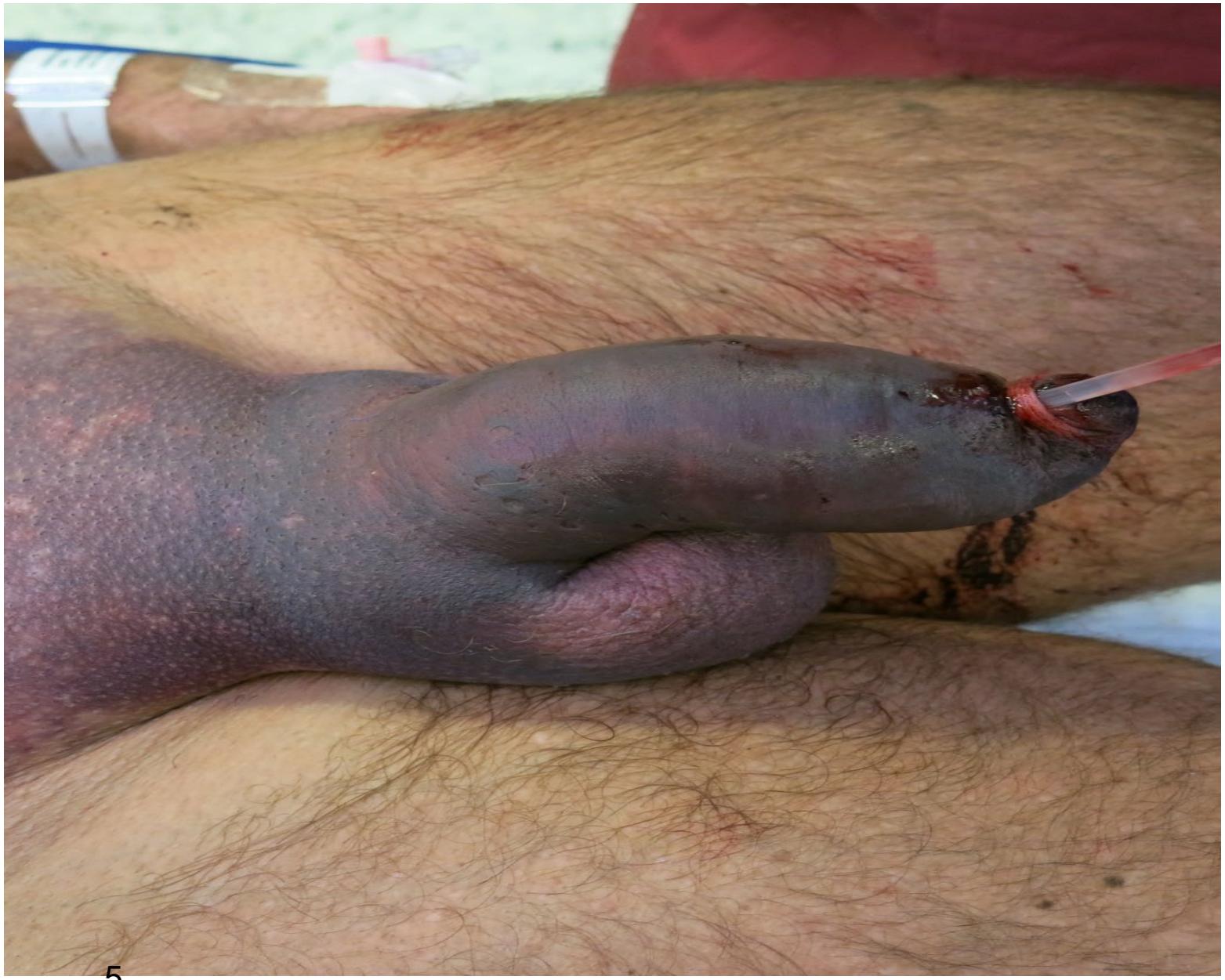


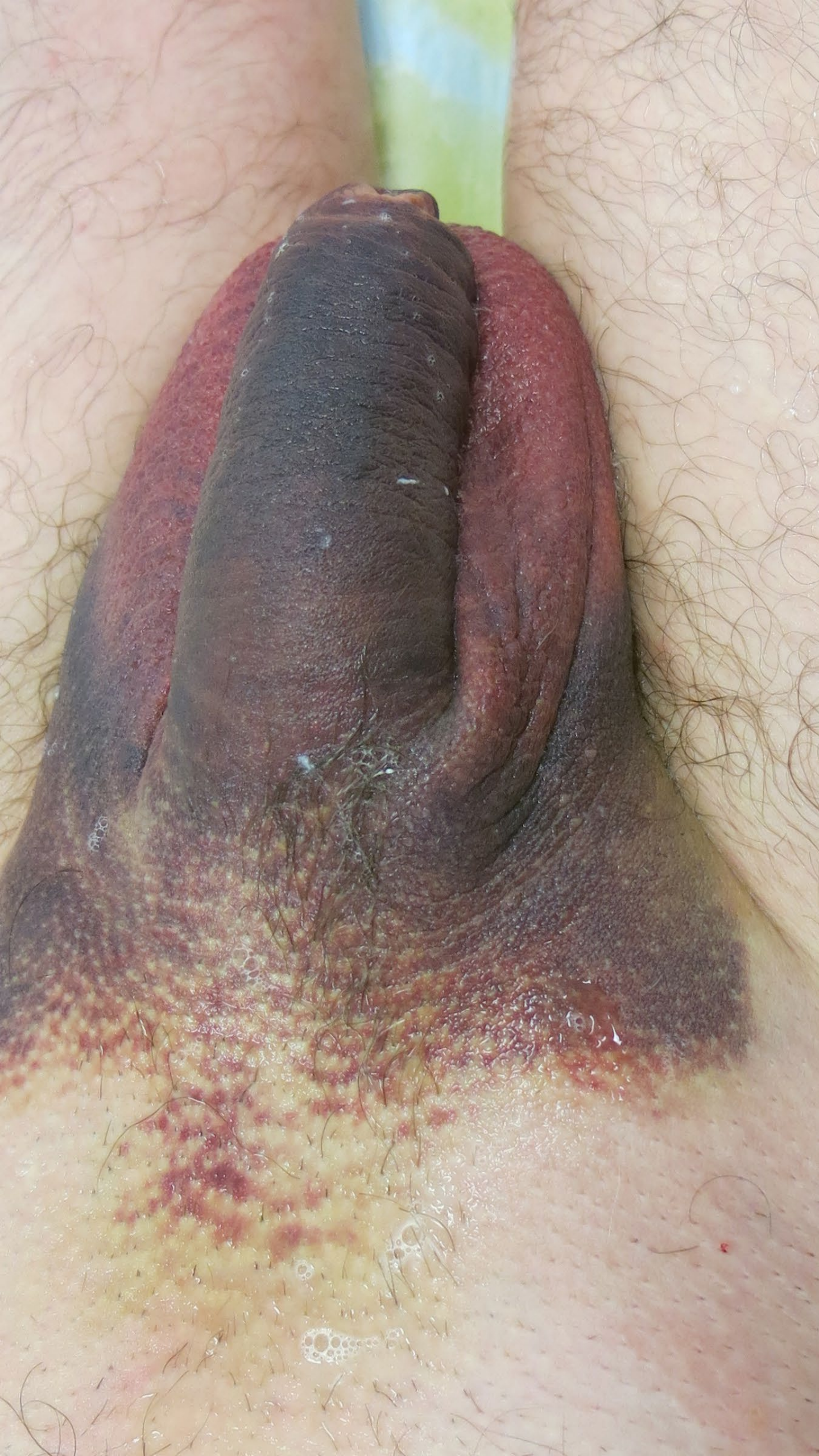
	12hrs	24hrs	36hrs	48hrs	> 48hrs
5-7: Severe ED	0%	20%	50%	60%	100%
12-16: Mild-moderate ED	0%	20%	25%	20%	0%
17-21:Mild ED	0%	20%	25%	20%	0%
22-25: No ED	100%	40%	0%	0%	0%

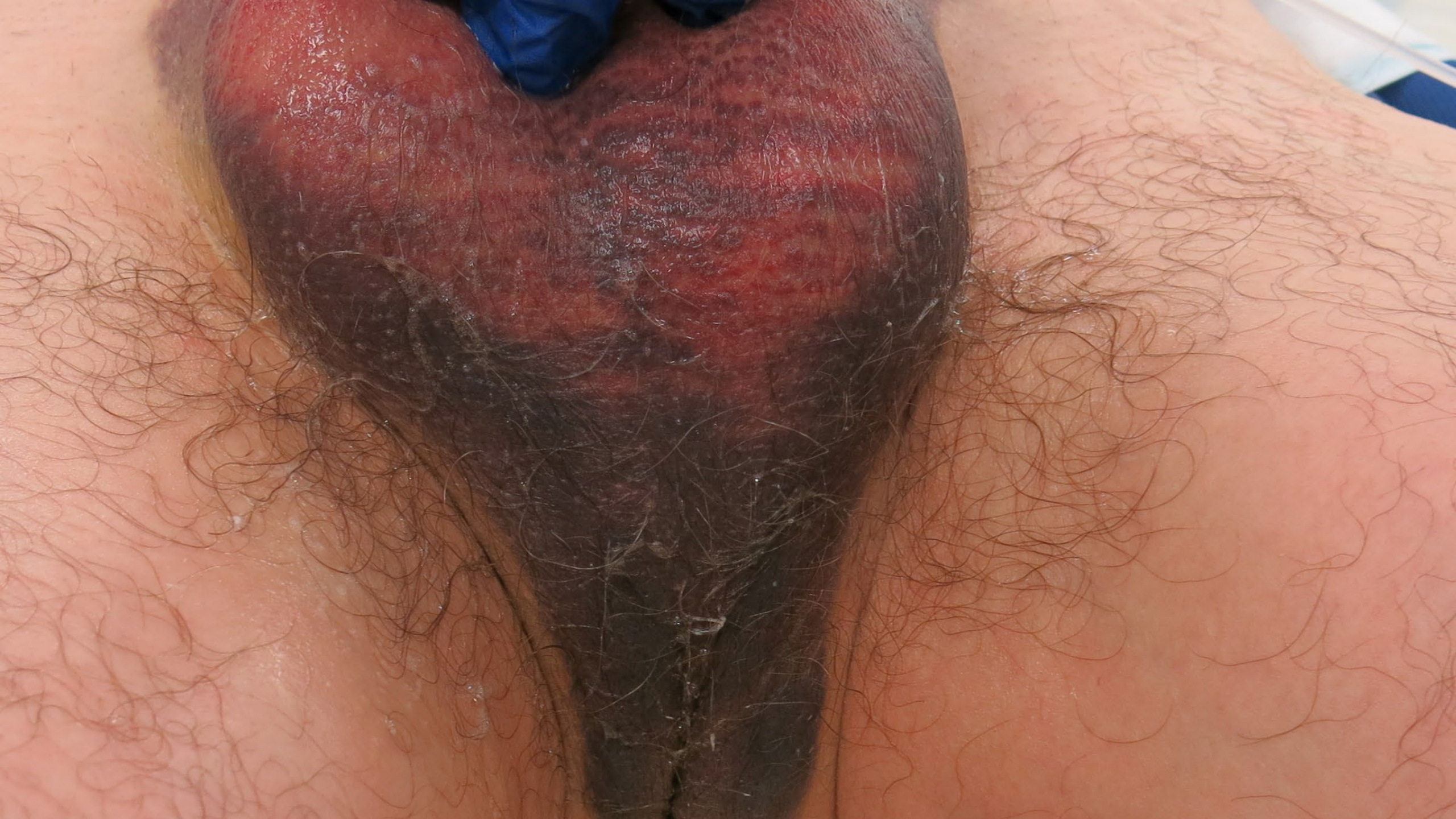
Zacharakis E, Raheem AA, Freeman A, Skolarikos A, Garaffa G, Christopher AN, et al. The efficacy of the T-shunt procedure and intracavernous tunneling (snake maneuver) for refractory ischemic priapism. J Urol. 2014;191(1):164-8.

Penile Fracture









Outcomes

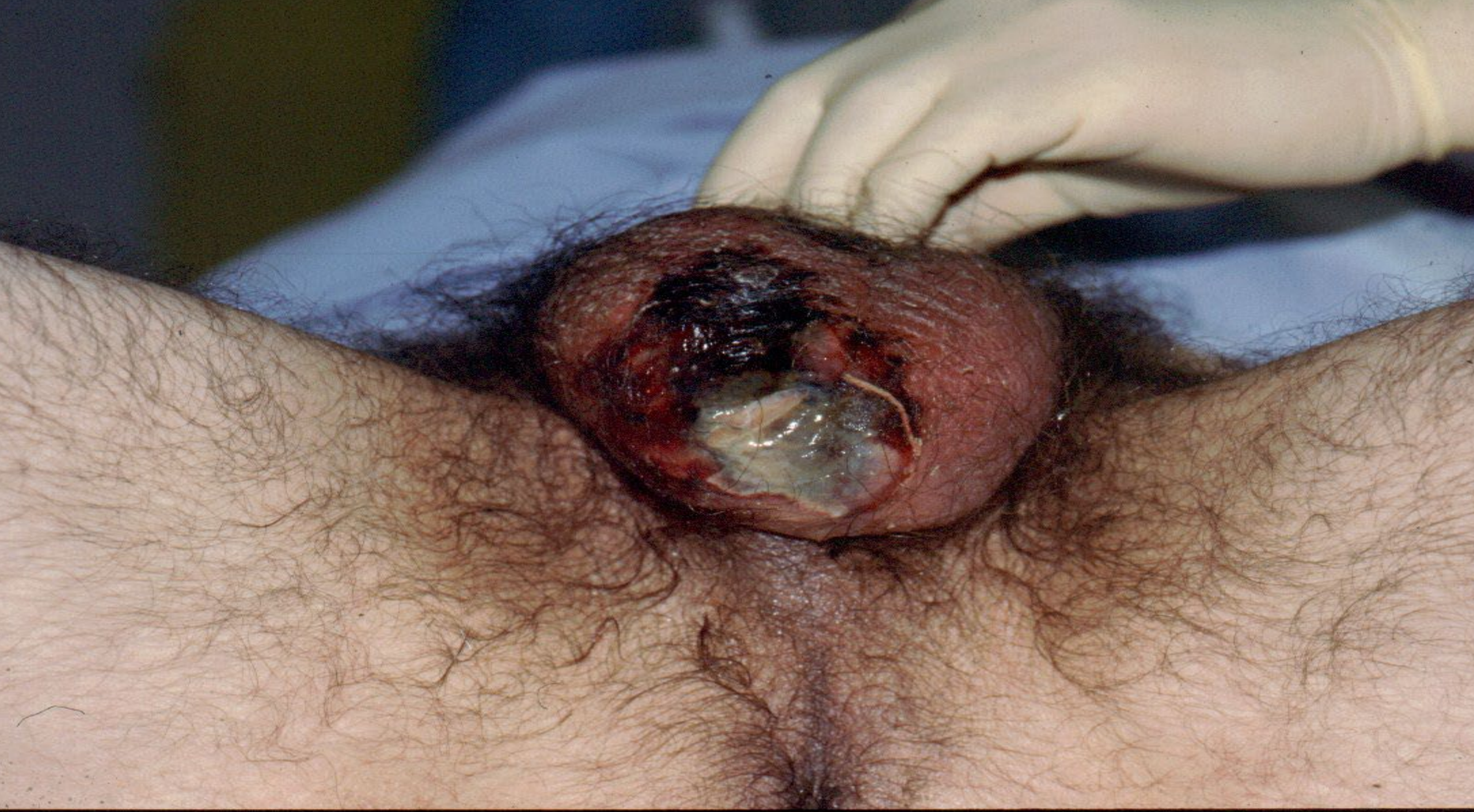
	Conservative	Surgical
Overall	48%	21%
Erectile dysfunction	22%	1.9%
Penile curvature	13%	2.7%

Penile Fracture

- Buckling trauma
- Classically:
  - Cracking/snapping sound during sex
  - Immediate detumscence
- 30% have urethral involvement
- Clinically:
  - Peno-scrotal bruising (aubergine abnormality)

Outcomes

	Conservative	Surgical
Overall	48%	21%
Erectile dysfunction	22%	1.9%
Penile curvature	13%	2.7%



Risk Factors

- Age > 50yrs
- Male/Female ratio: 10:1
- Diabetes Mellitus
- ET-OH XS
- Drugs: chronic steroid use, cytotoxic drugs
- Malignancy
- Malnutrition
- HIV
- Lymphoproliferative disease

Clinical Features

- Sudden pain & swelling in scrotum
- Purulence or wound discharge
- Crepitus
- Fever >38oC
- Characteristic faeculant/putrid odour
- Sepsis
- Multi-organ failure

Sexual Changes following Radical Prostatectomy

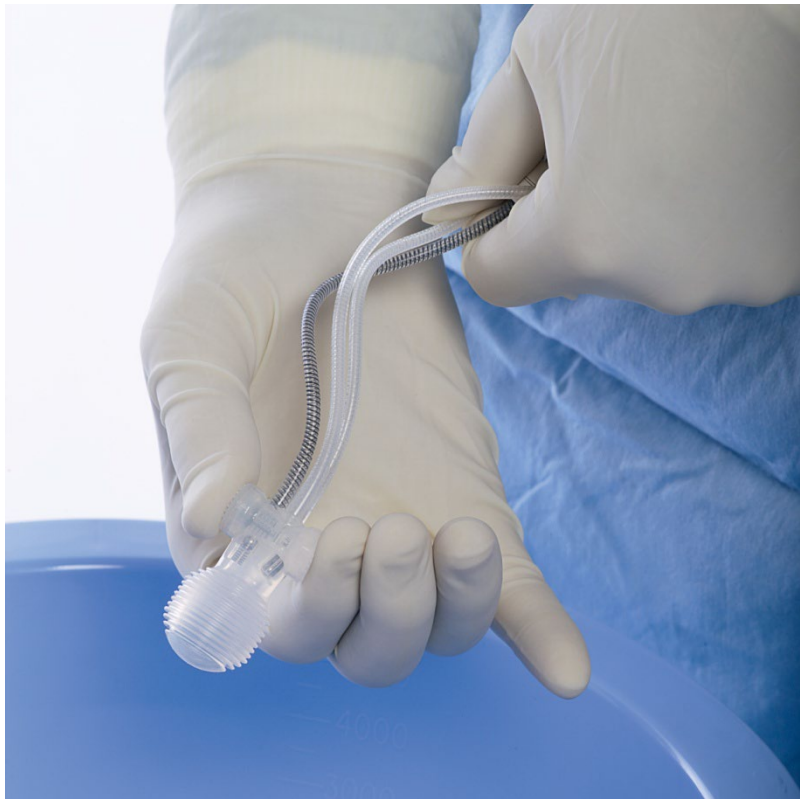
- Erectile dysfunction
- Loss of ejaculation
- Orgasmic changes
  - Change in sensation (50-75%)
  - Pain (10-20%)
  - Orgasm associated incontinence (at least 20%)
- Reduction in penile size (around 10-20%)
- Peyronie’s (11-16%)

AMS Tactra

Semi-rigid malleable penile prosthesis

Coloplast Genesis

3-piece Inflatable penile prosthesis



Coloplast Titan

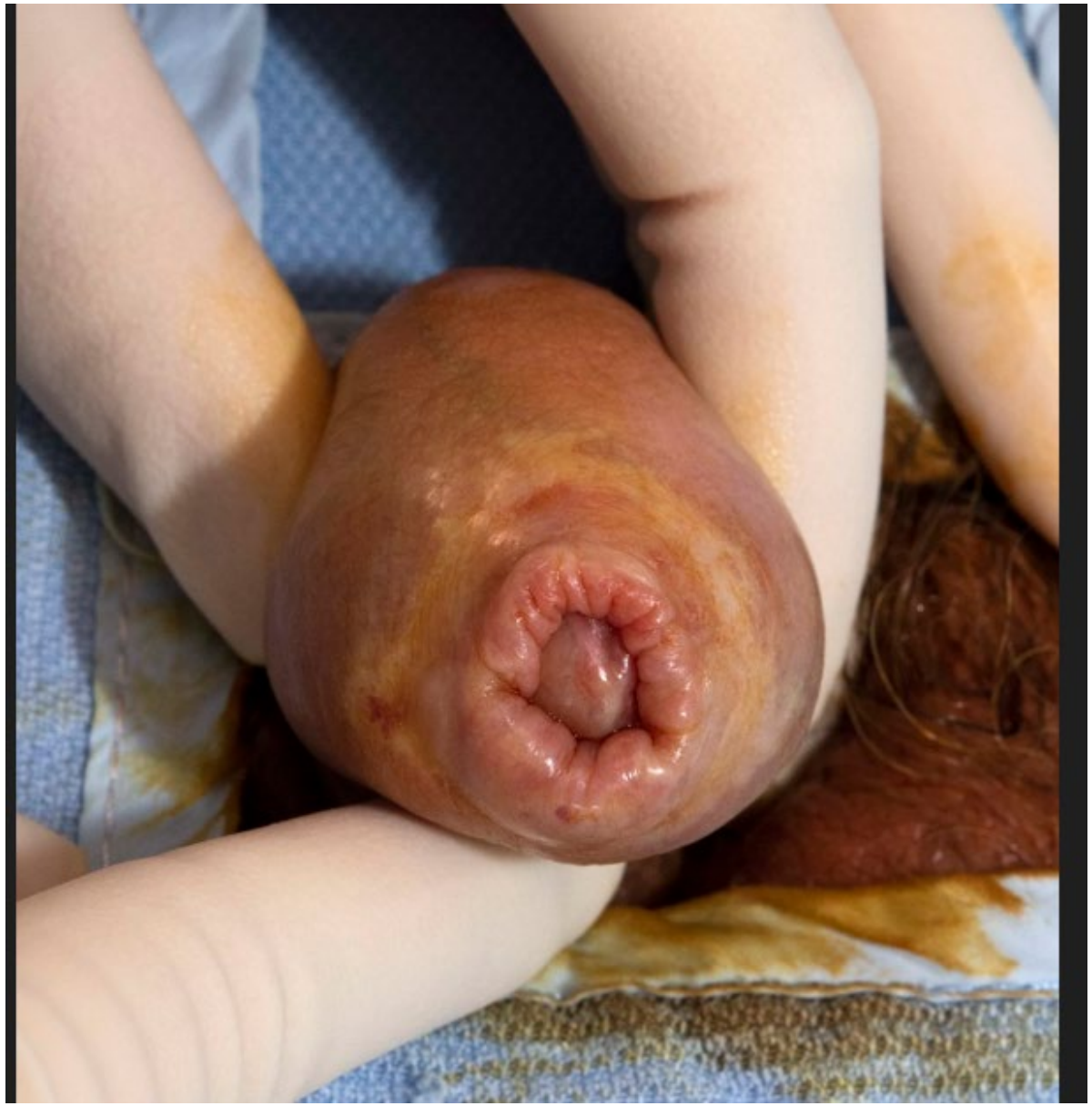
AMS cx 700

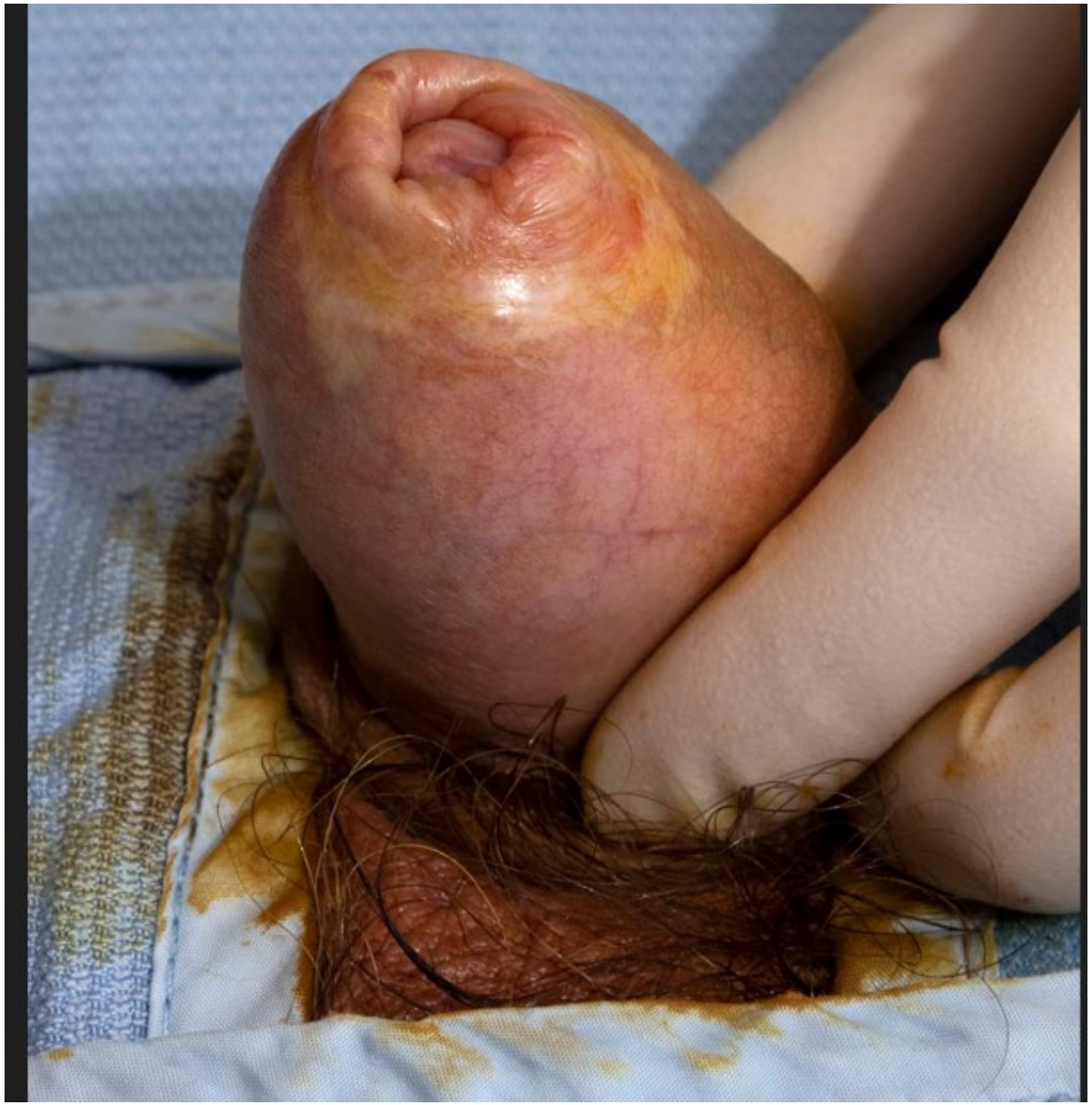
Penis

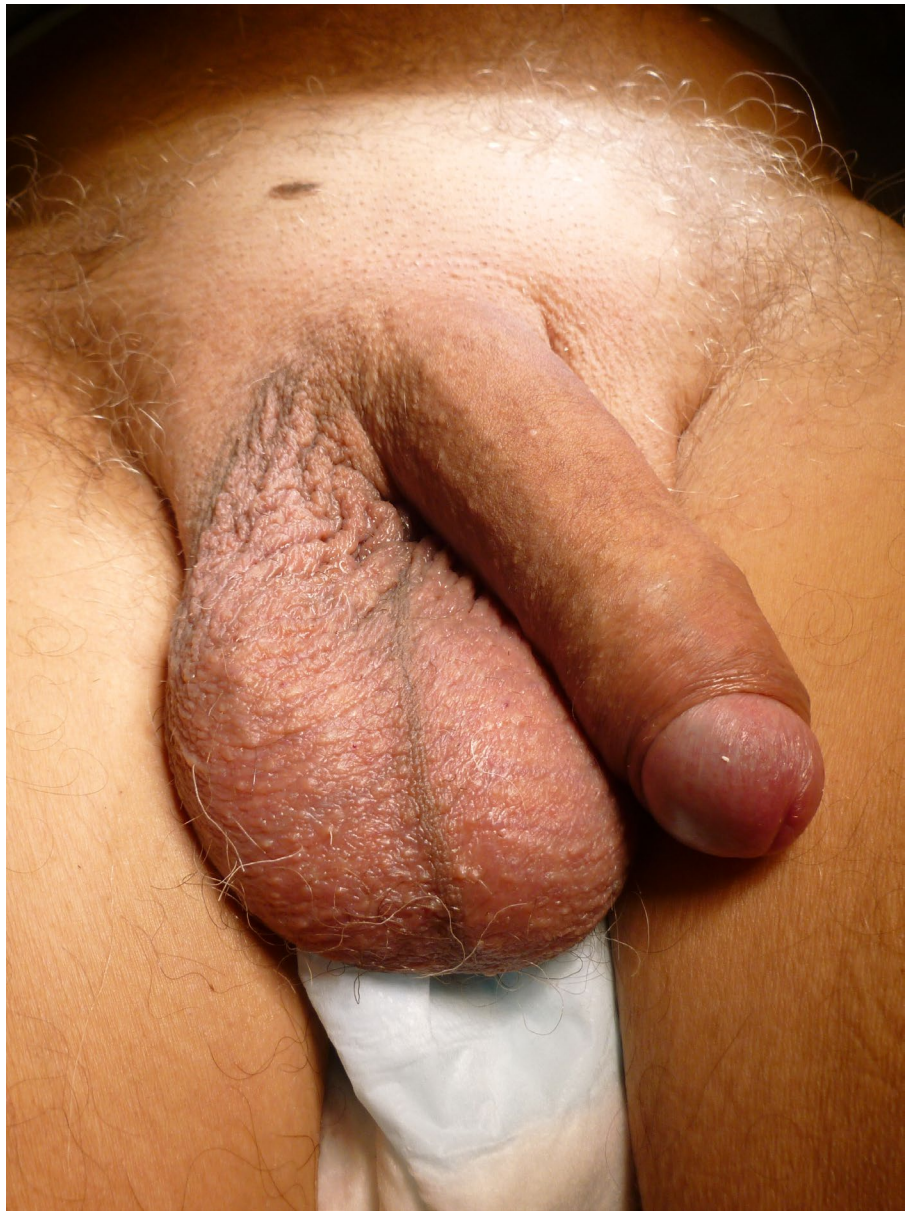
- Foreskin: is it retractile?
- Meatus: position, tight/open?
- Glans: mass, redness, pallor
- Shaft: mass/ulcer, hardness dorsally

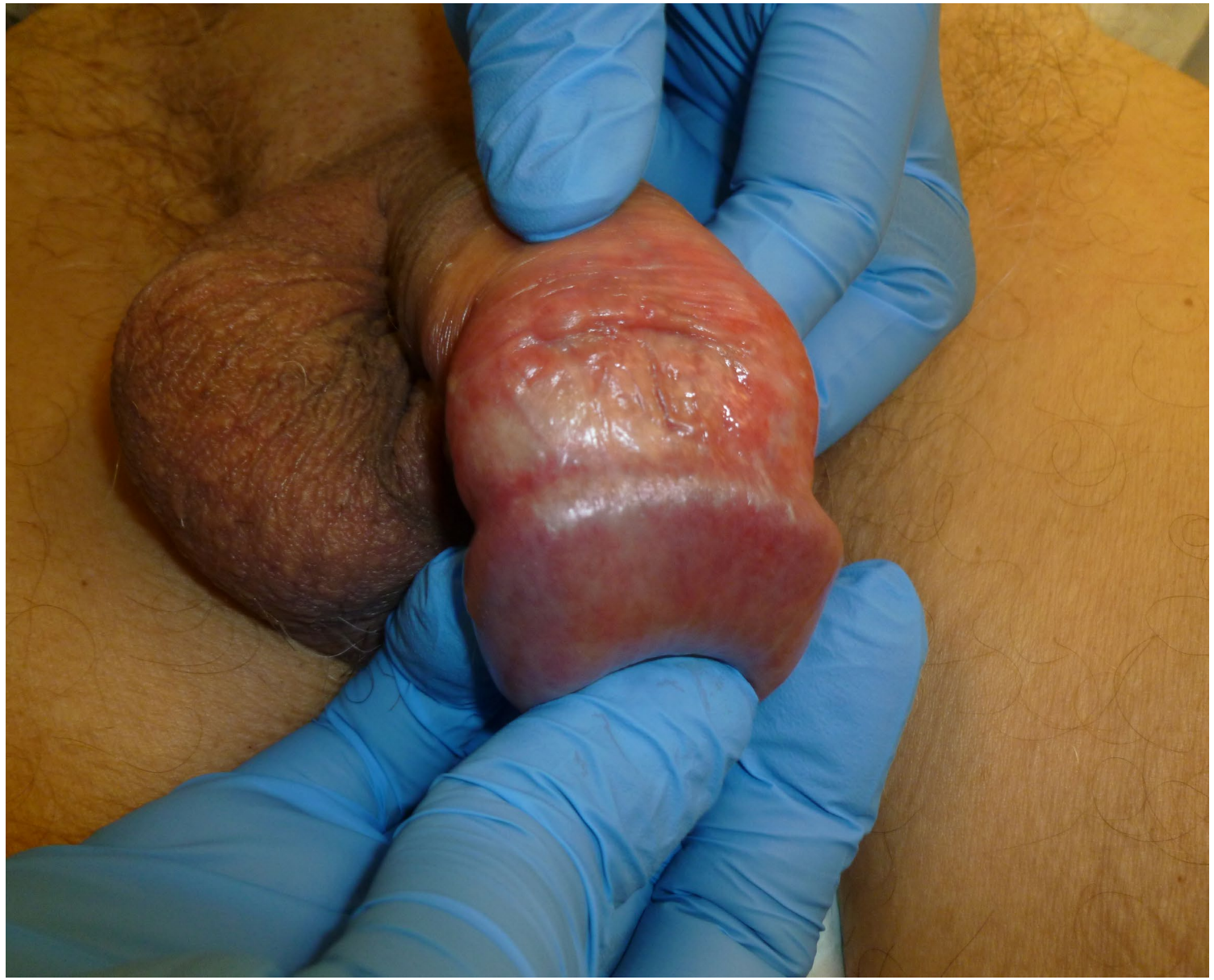
Common pathologies

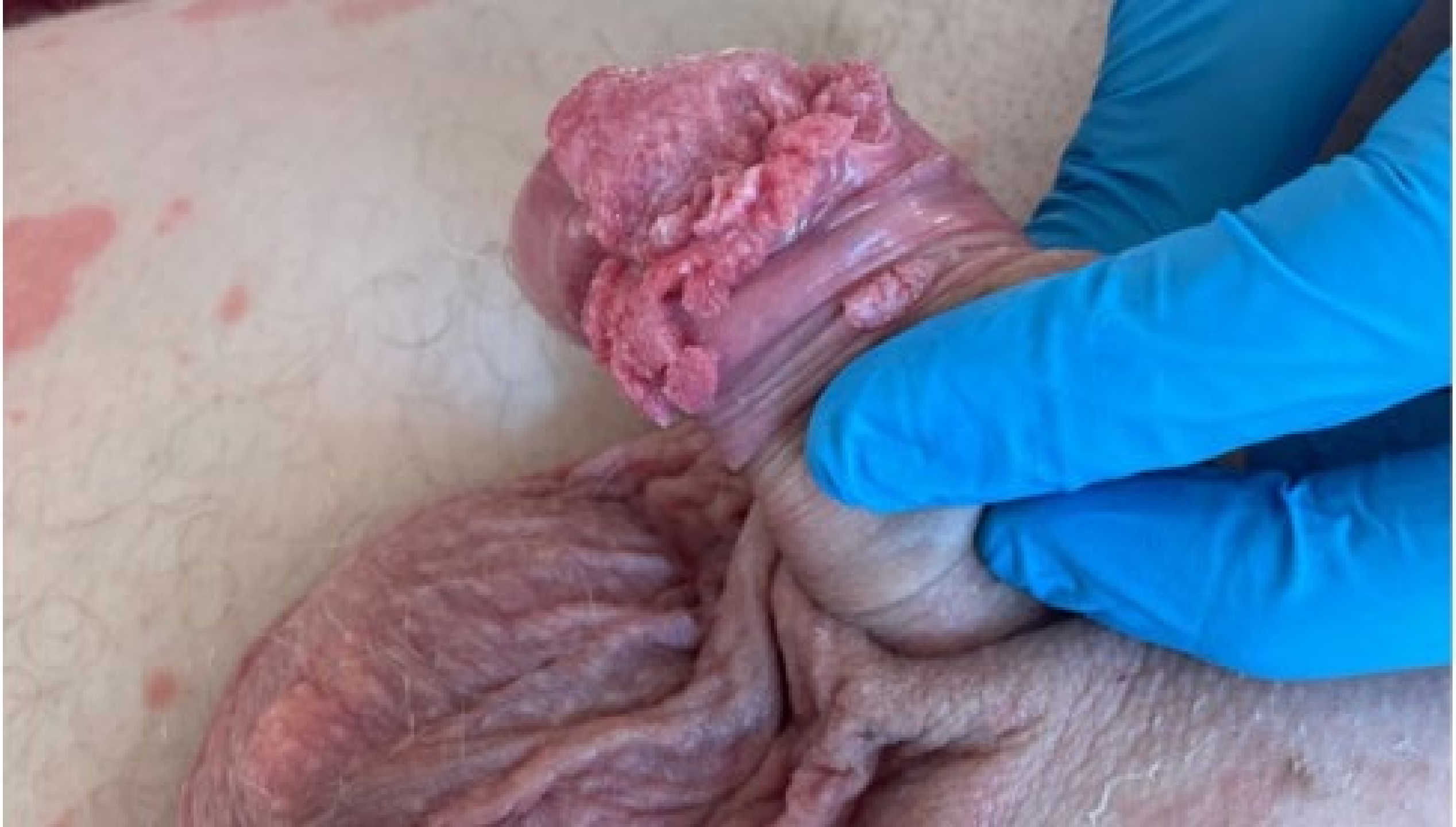
- Phimosis
- Balanitis
- Lichen Sclerosis
- Penile cancer
- Peyronie’s disease





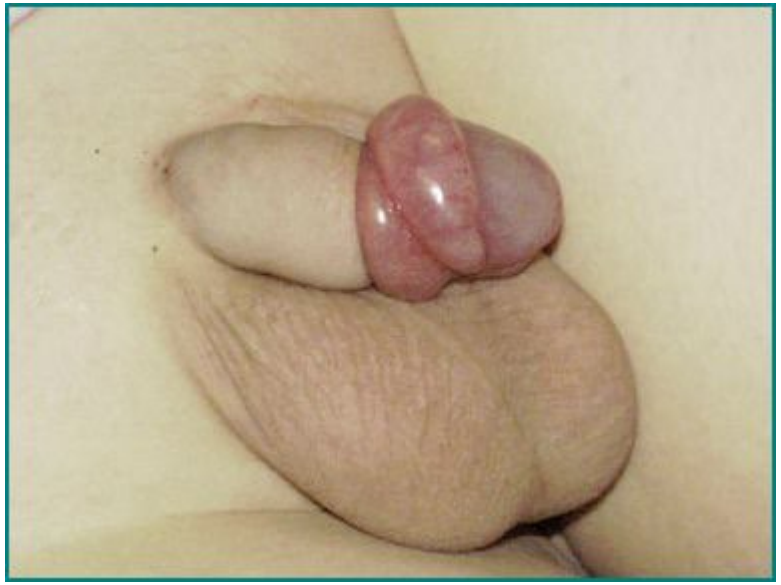




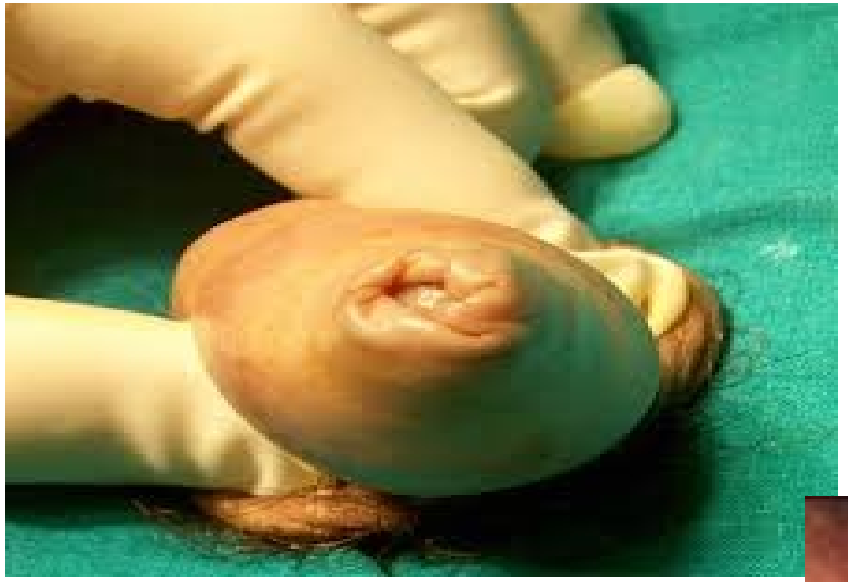


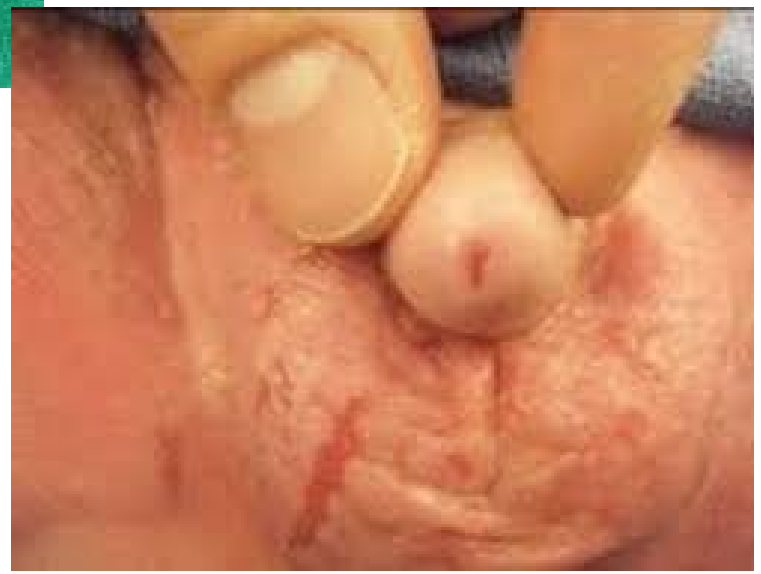
Paraphimosis

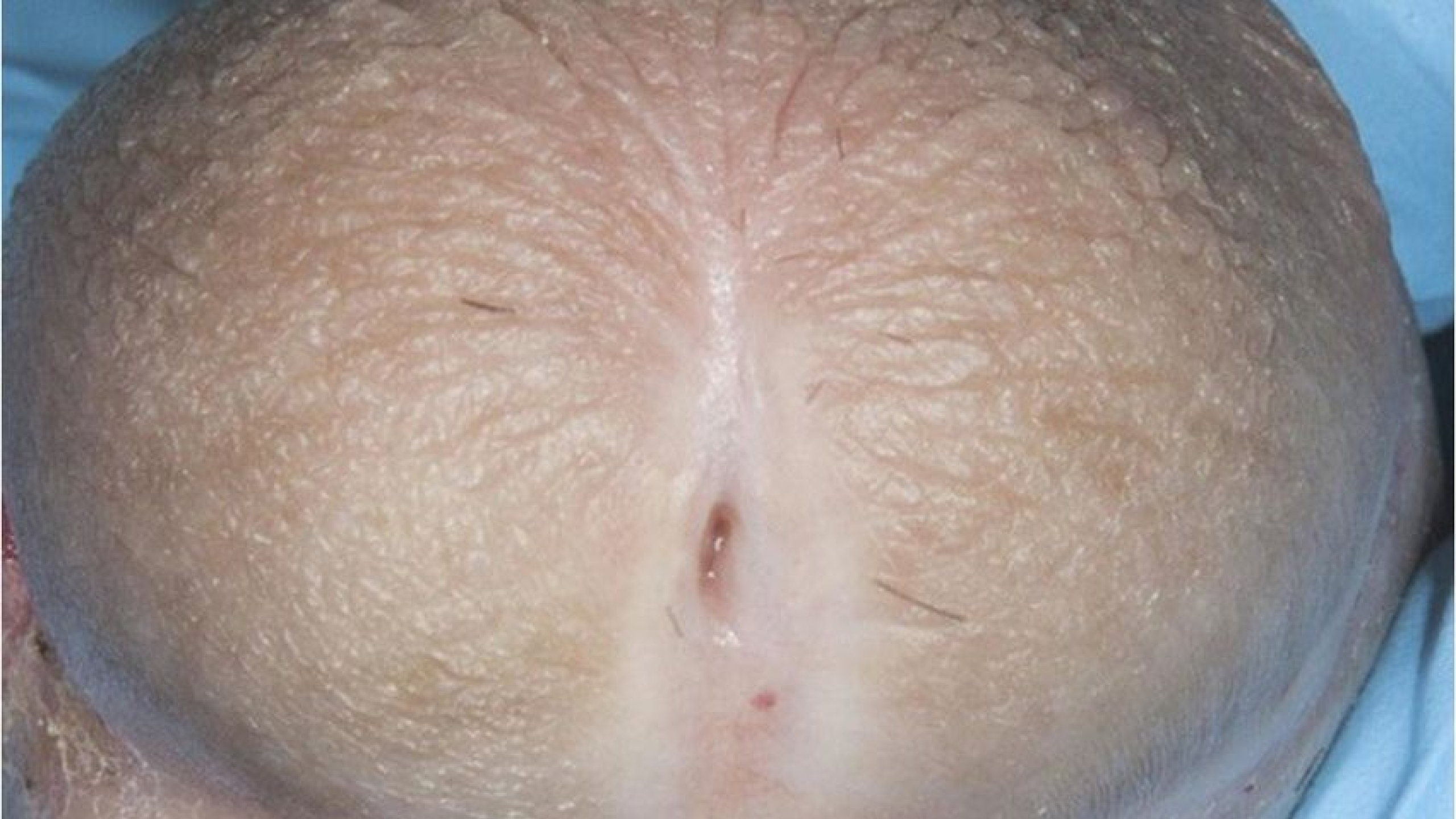
- Stuck and retracted below glans
- Manual reduction
- Dorsal slit
- Circumcision



Lichen sclerosus

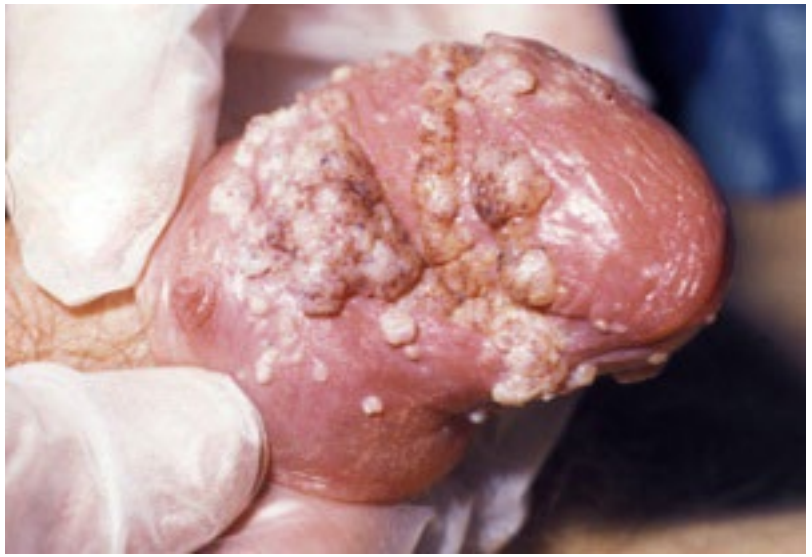


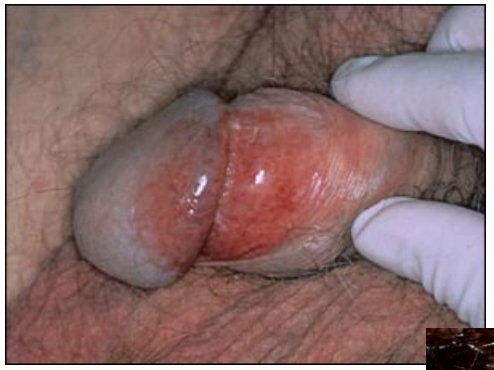


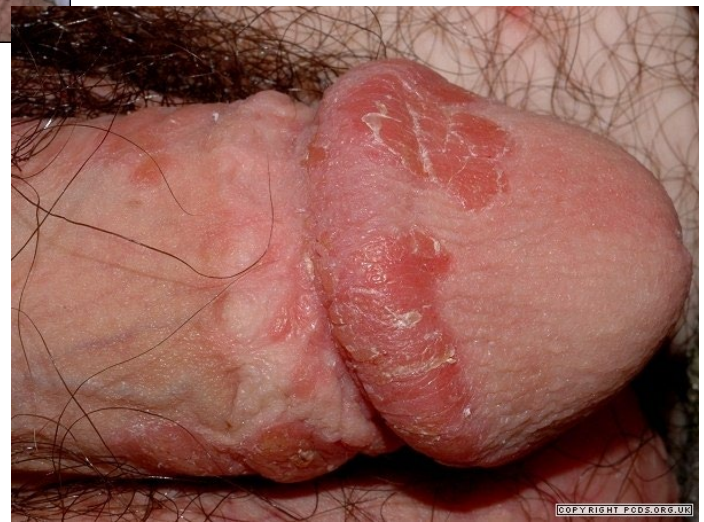


Benign ‘red’ lesions

- Zoons
- Lichen sclerosus et Atrophicus (LSA or BXO)
- Condylomata
- Psoriasis

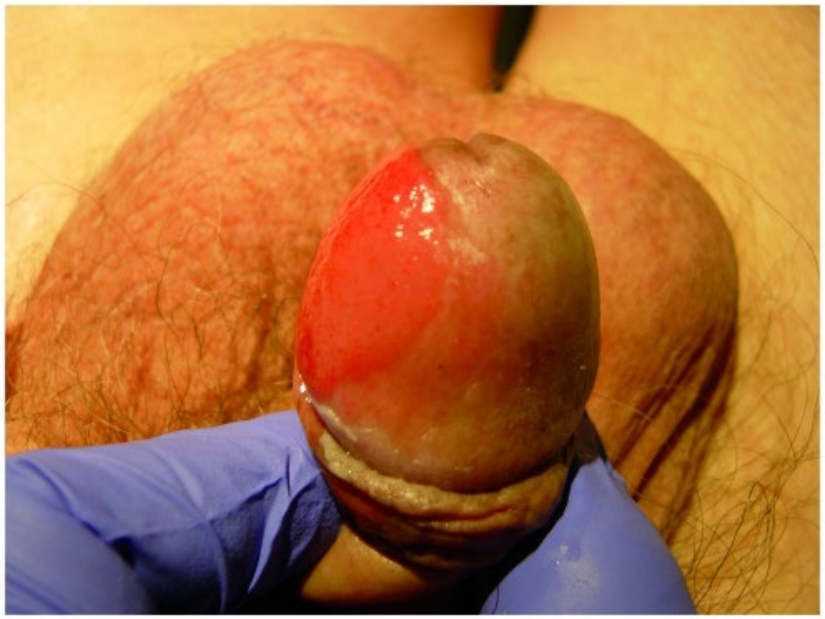


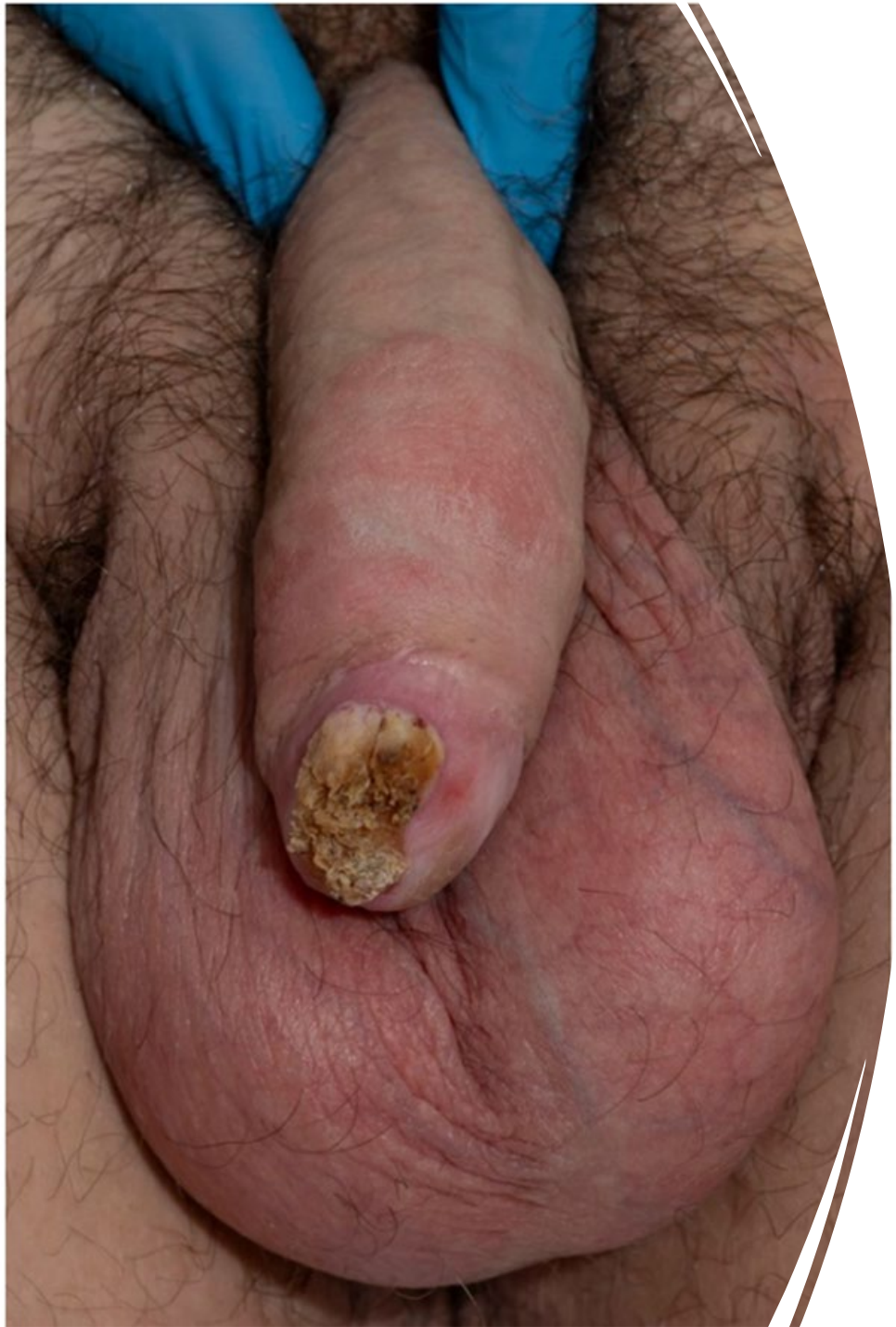




Pre-malignant ‘red’ lesions

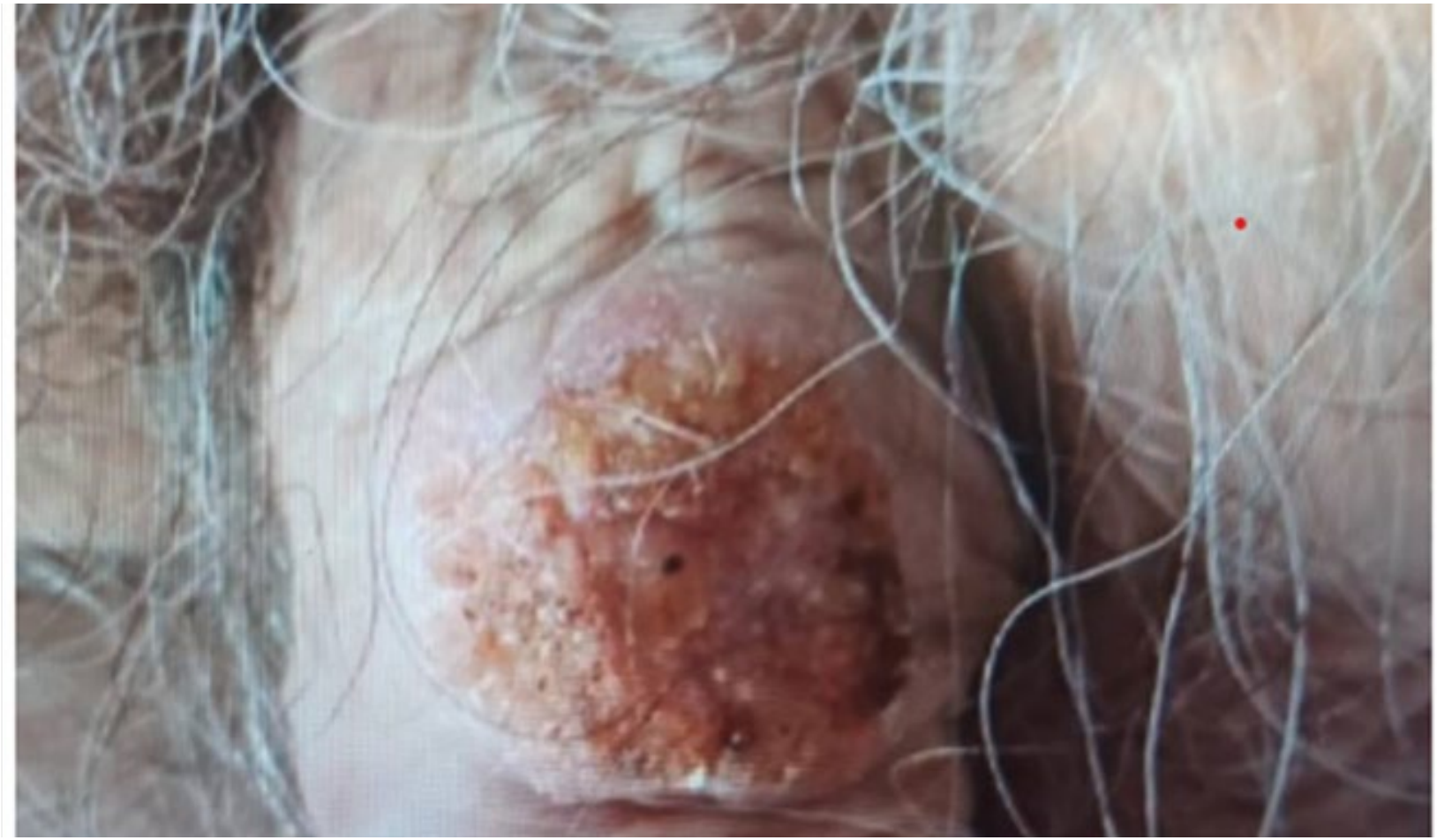
- Pre-cancer
  - PeIN
  - Erythroplasia de Queyrat
  - Bowens disease
  - HPV 16, 18



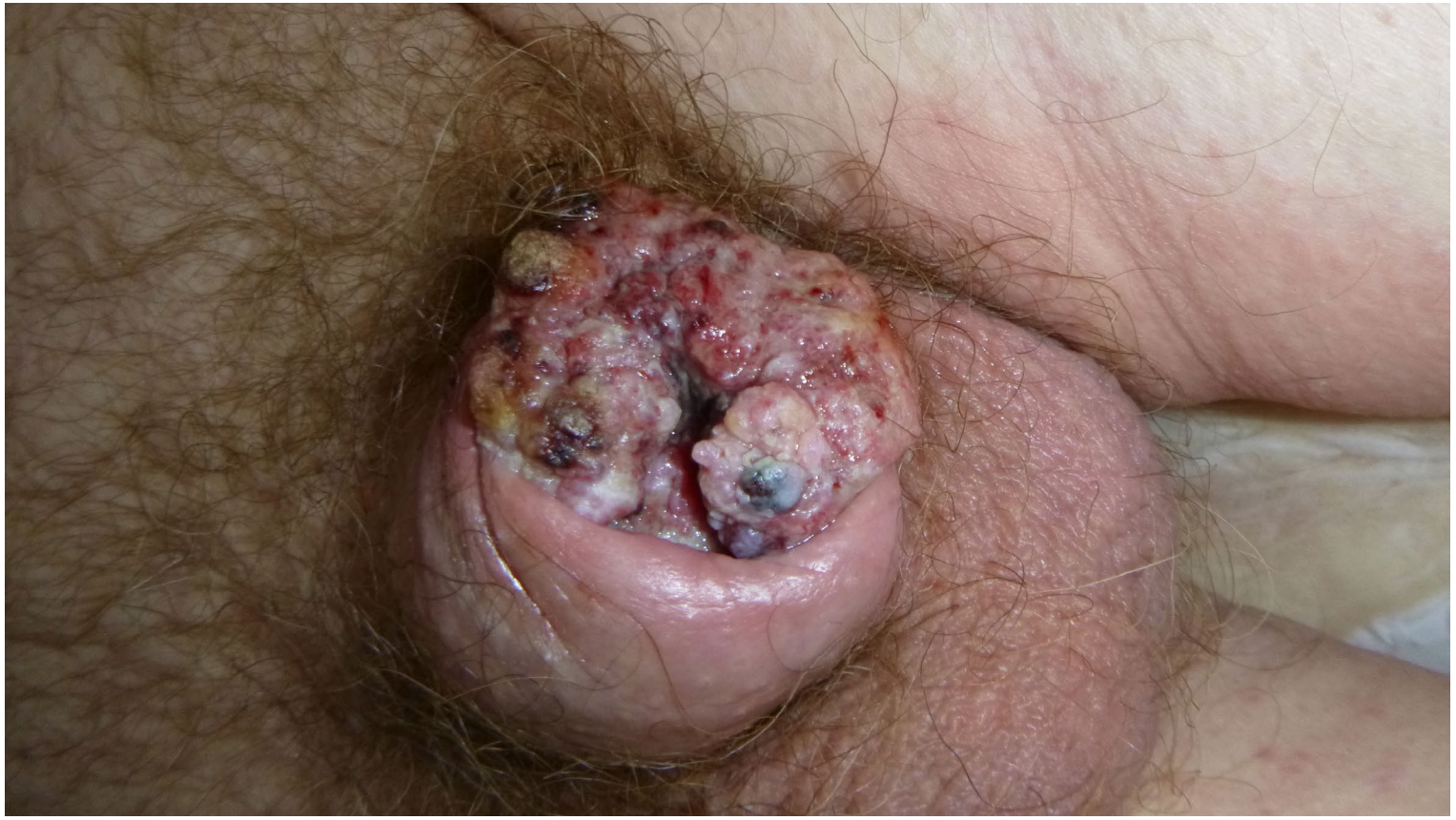


Penile cutaneous horn

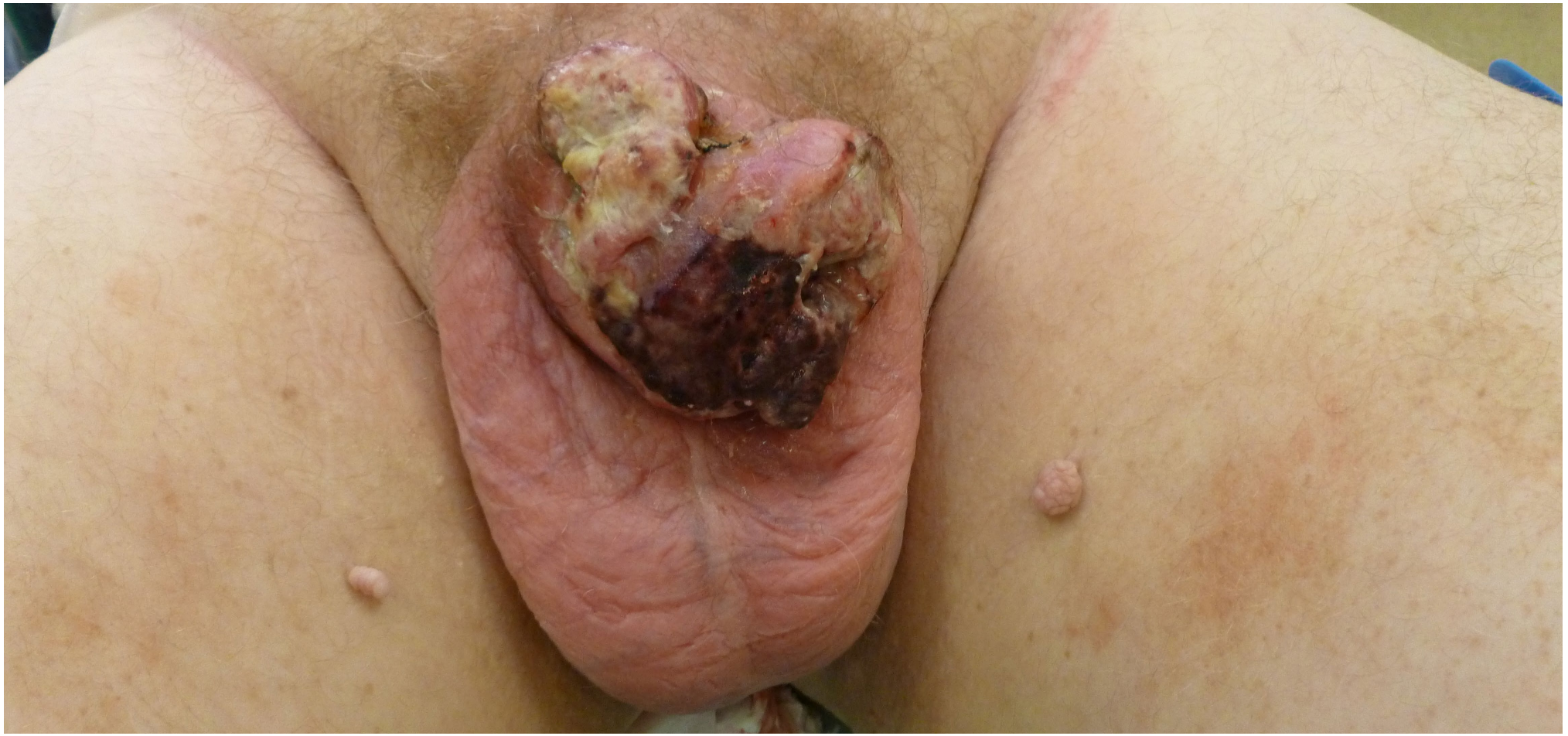
Penile shaft lesion



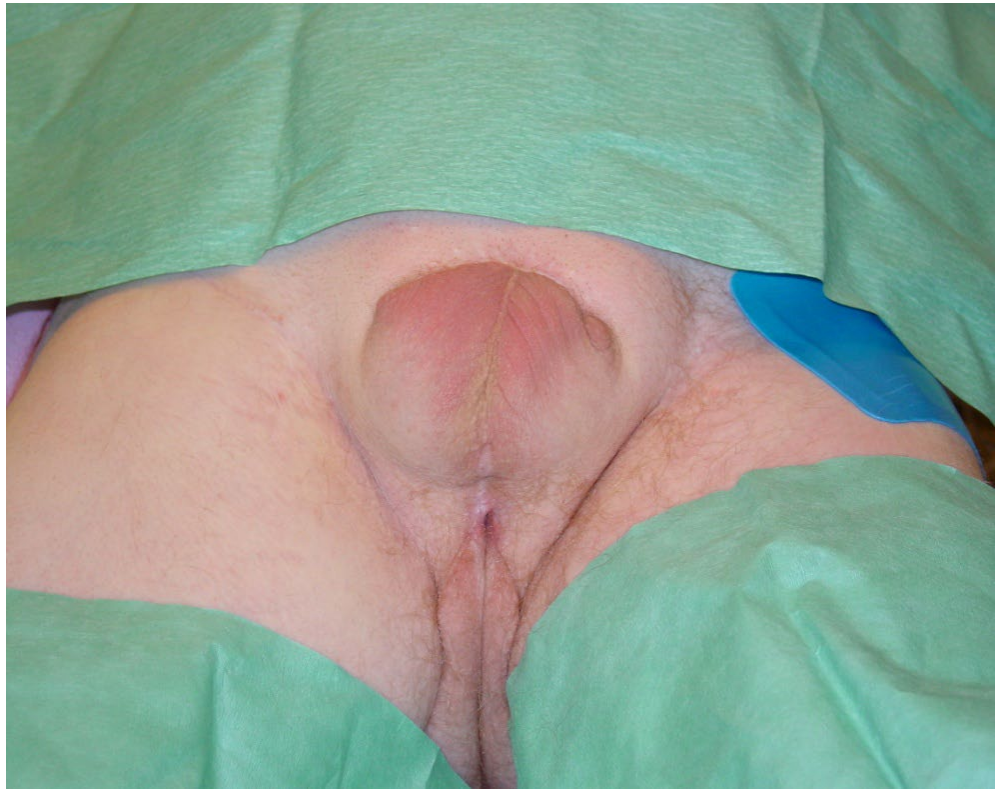
Penile cancer

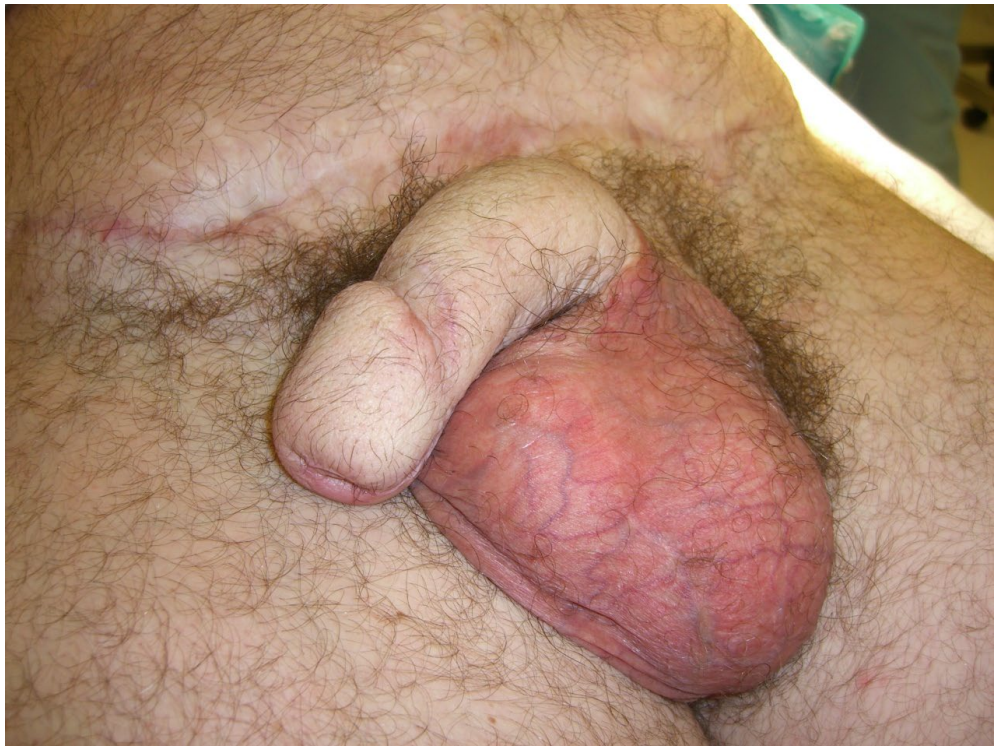


Penile cancer

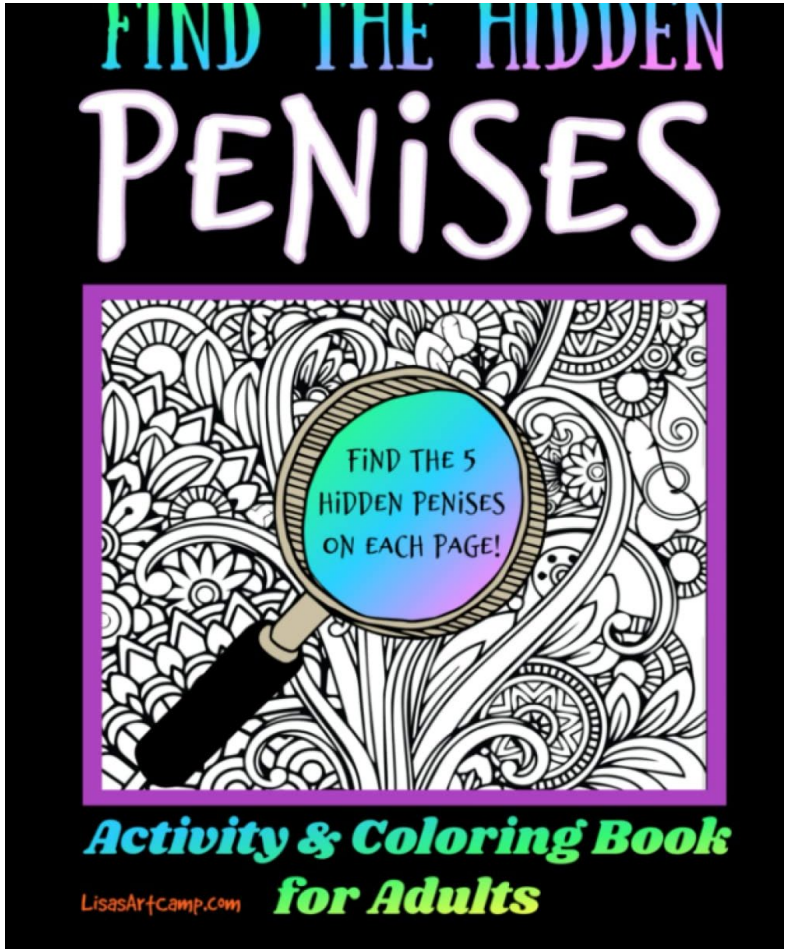


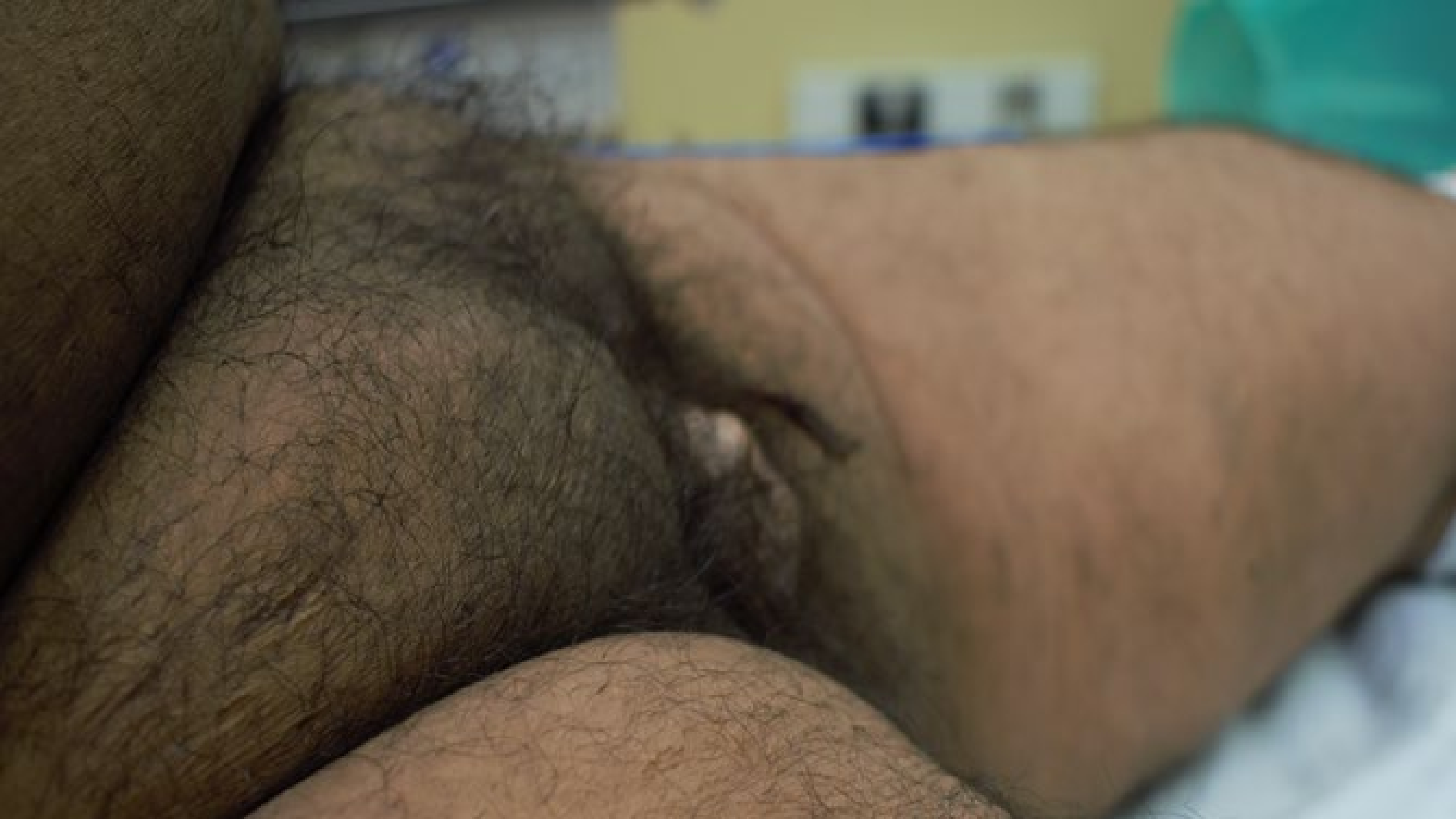
Radical penectomy & Phalloplasty

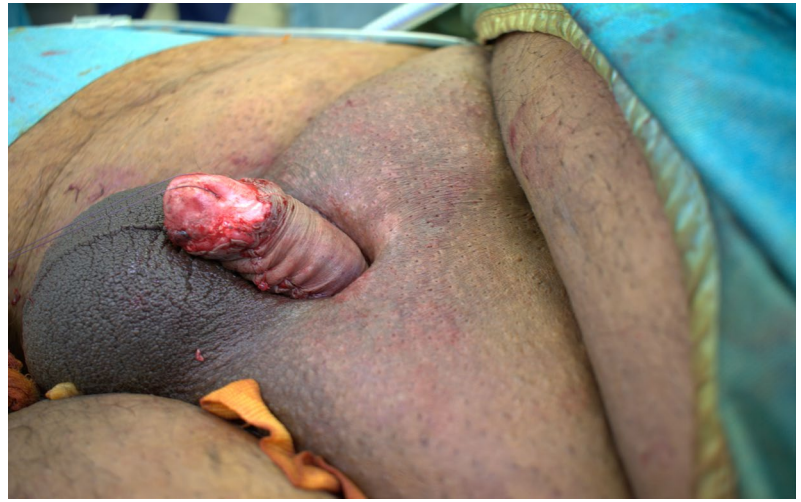


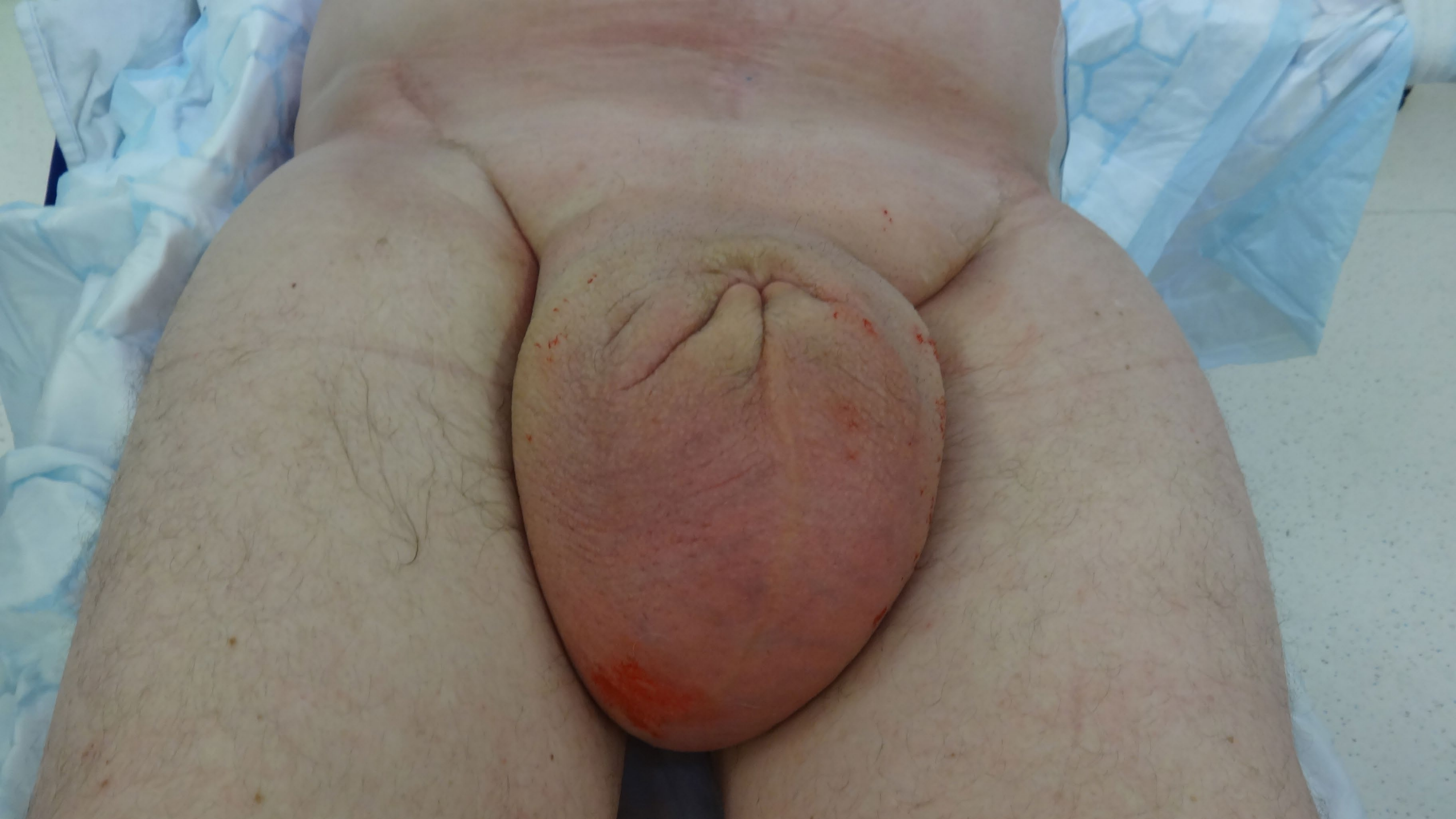


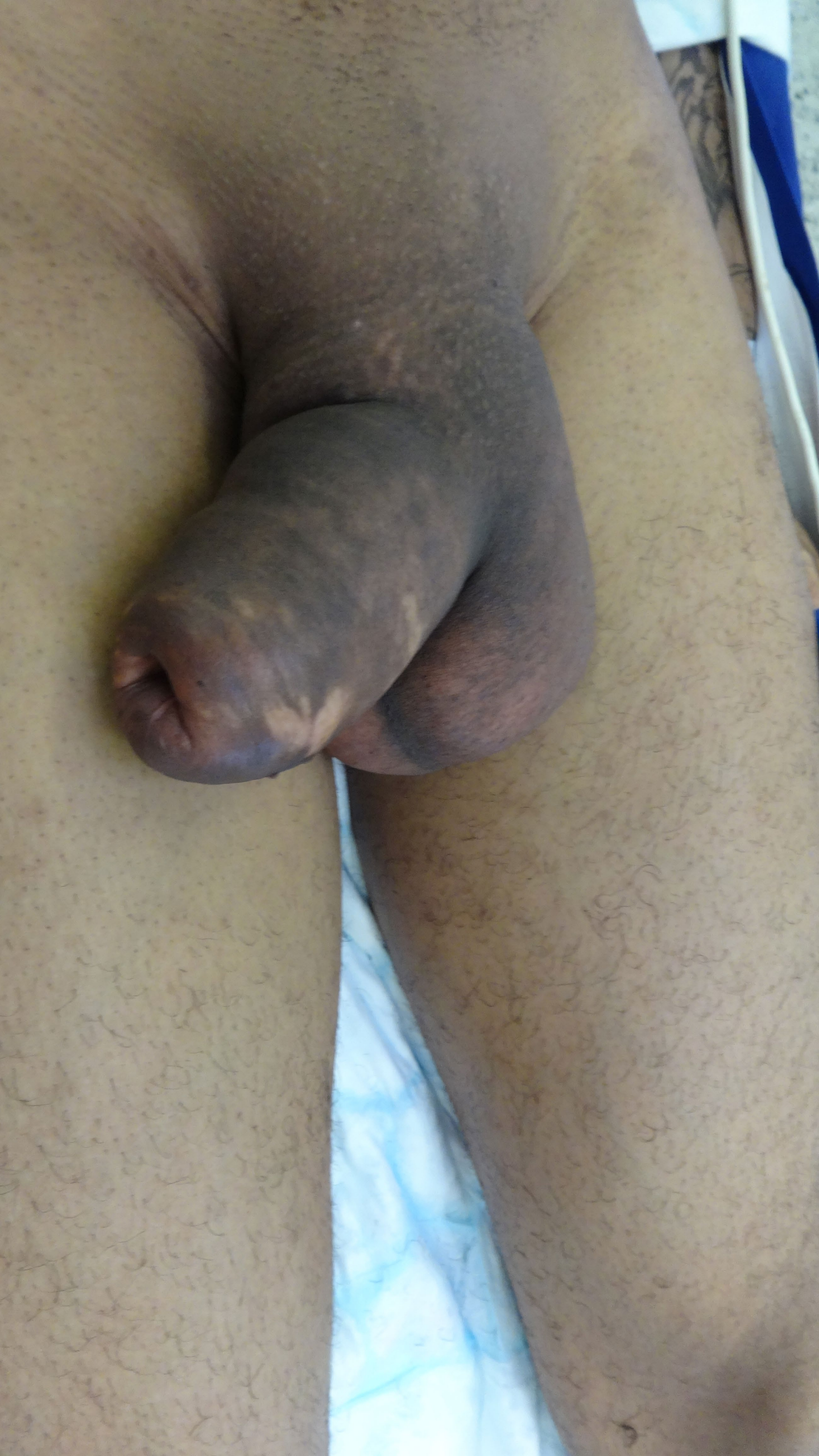
The Buried Penis

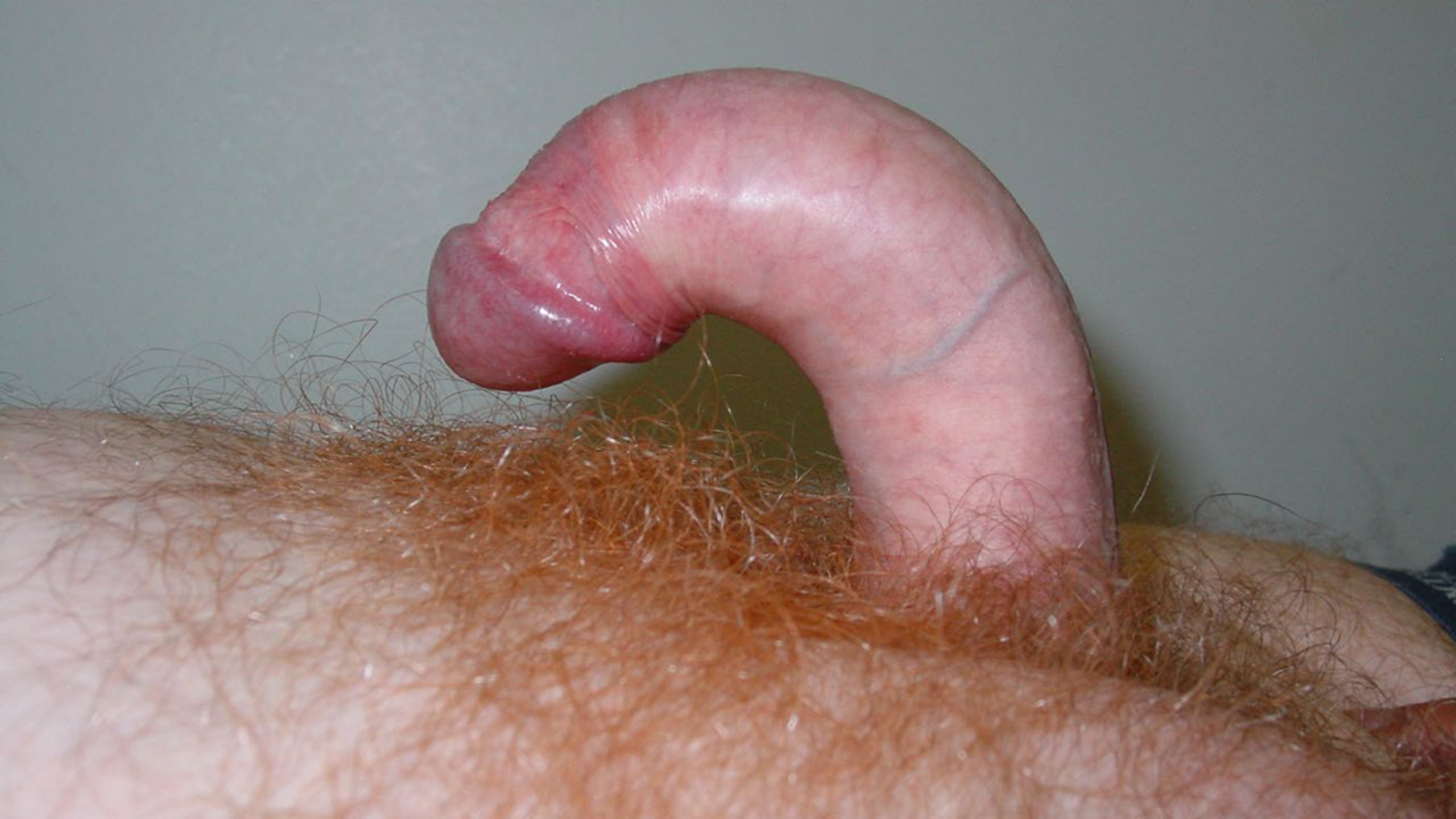












Surgical Treatment

Indication	• Deformity causing difficulty with intercourse
Considerations	• Is the disease stable • Is there co-existant ED

When to consider surgery in PD

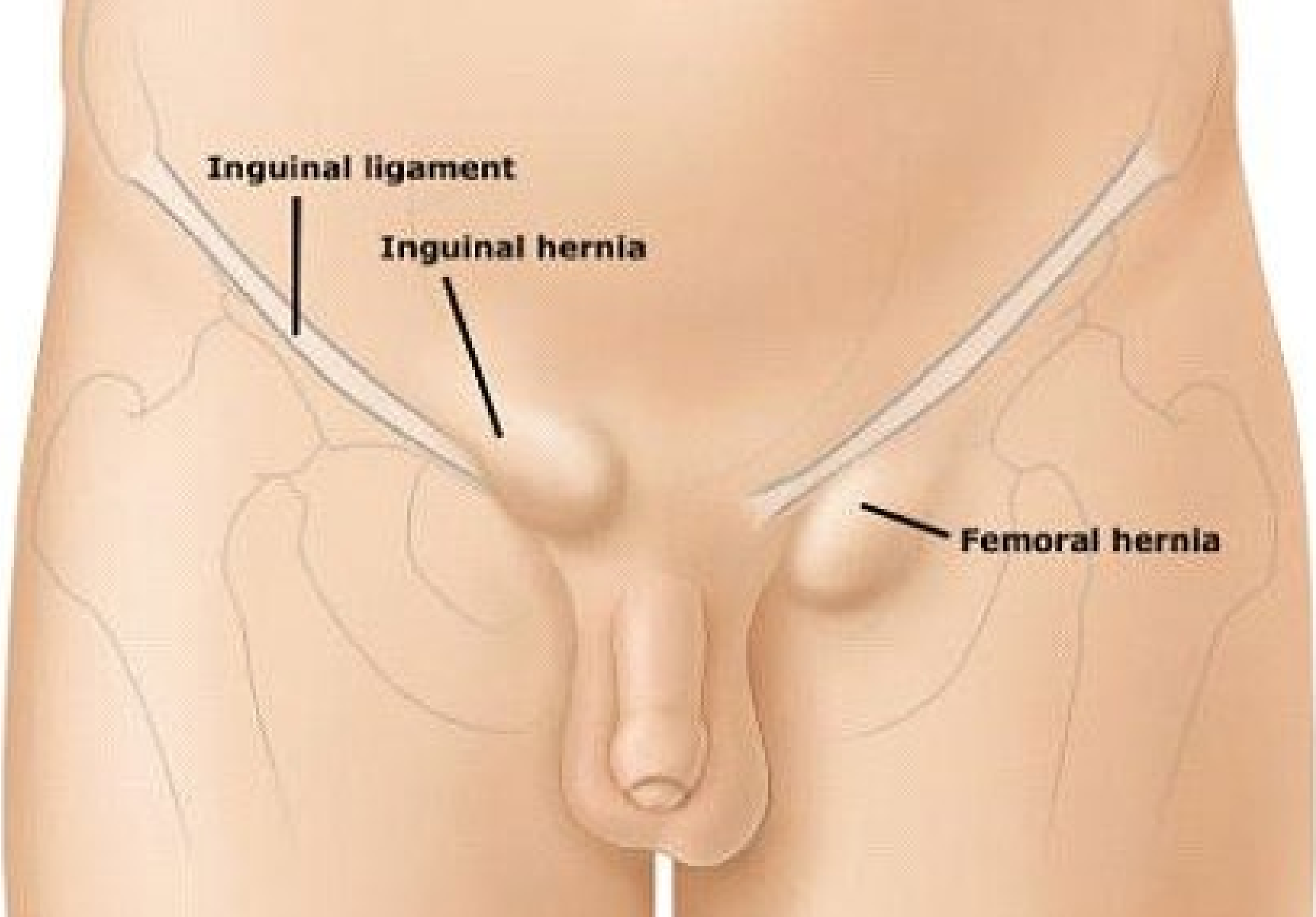
- Patient understands aims of surgery:
  - Curvature correction to allow penetrative sexual intercourse
  - Functionally straight penis
- Significant deformity preventing penetration
- Stable disease for 3-6 months (or >9-12 months from disease onset)

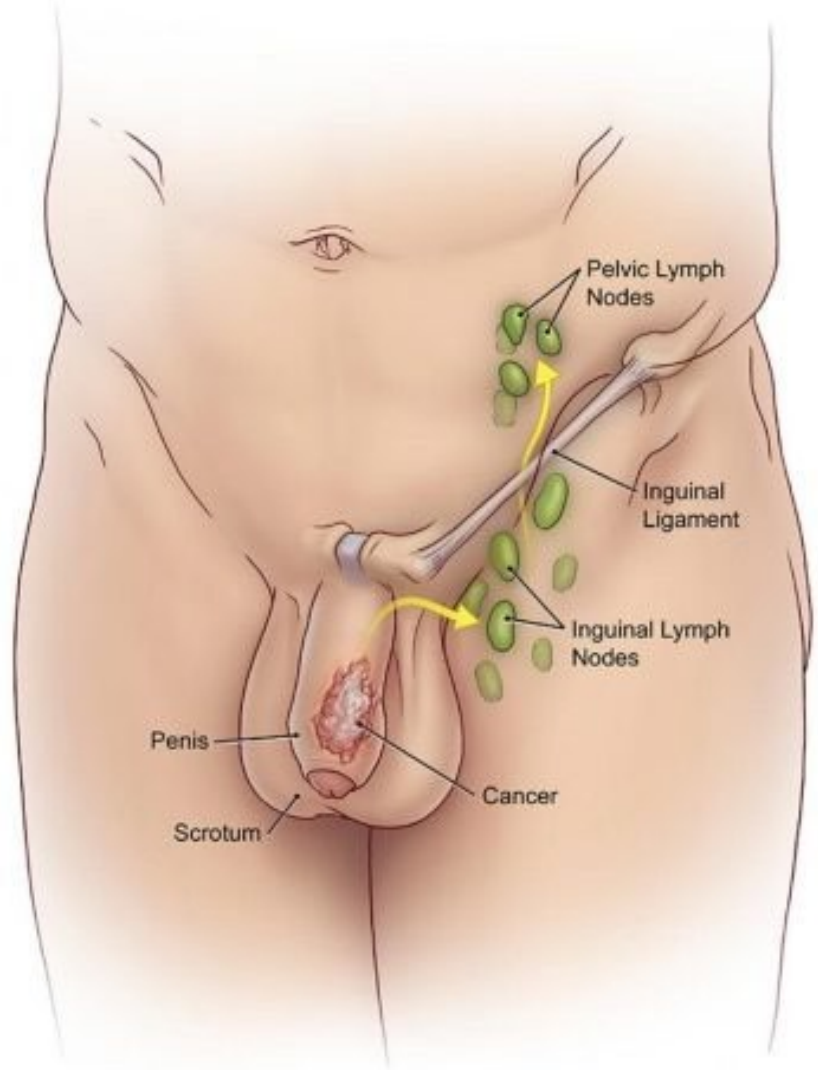
Inguinal lumps

- Hernia
- Lymph nodes
- Hydroceles of the cord
- Undescended testis
- Lipoma of the cord
- Saphenous varix
- Aneurysm
- Psoas abcess

Hernia

- Reducible
- Cough impulse
- Control
- Position


Inguinal ligament
Inguinal hernia
Femoral hernia

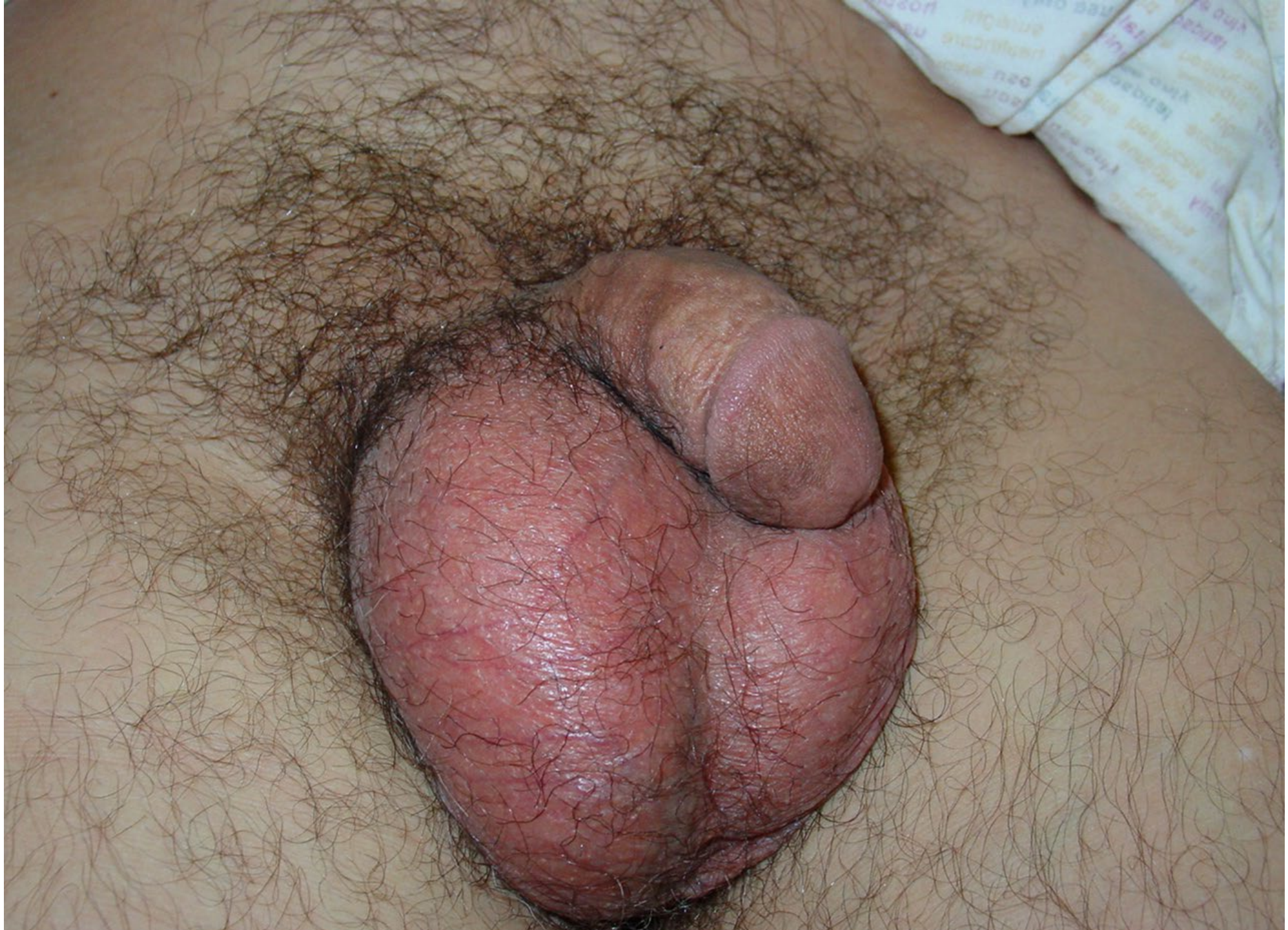

Pelvic Lymph Nodes
Inguinal Ligament
Inguinal Lymph Nodes
Penis
Cancer
Scrotum

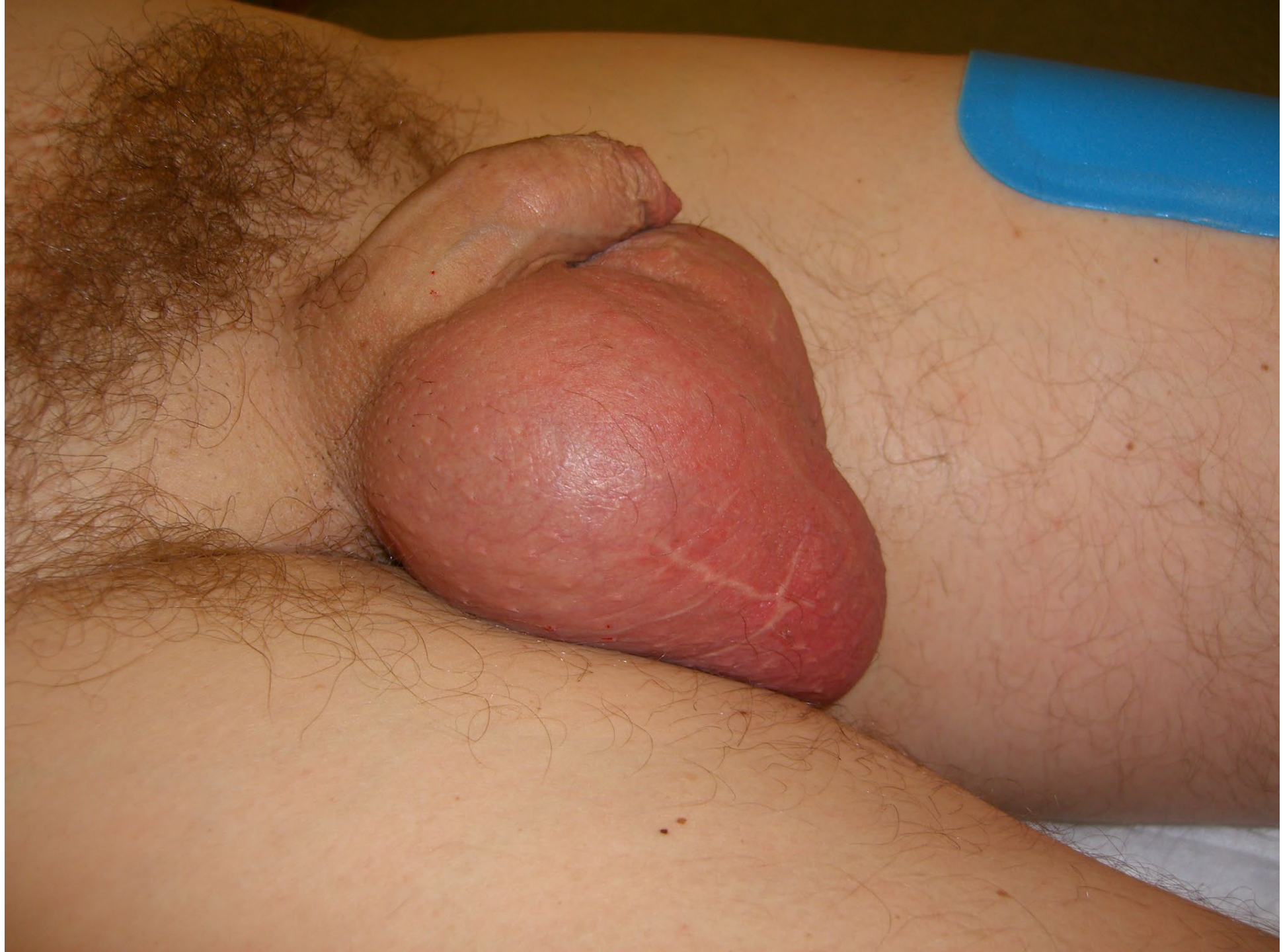
Scrotal swellings

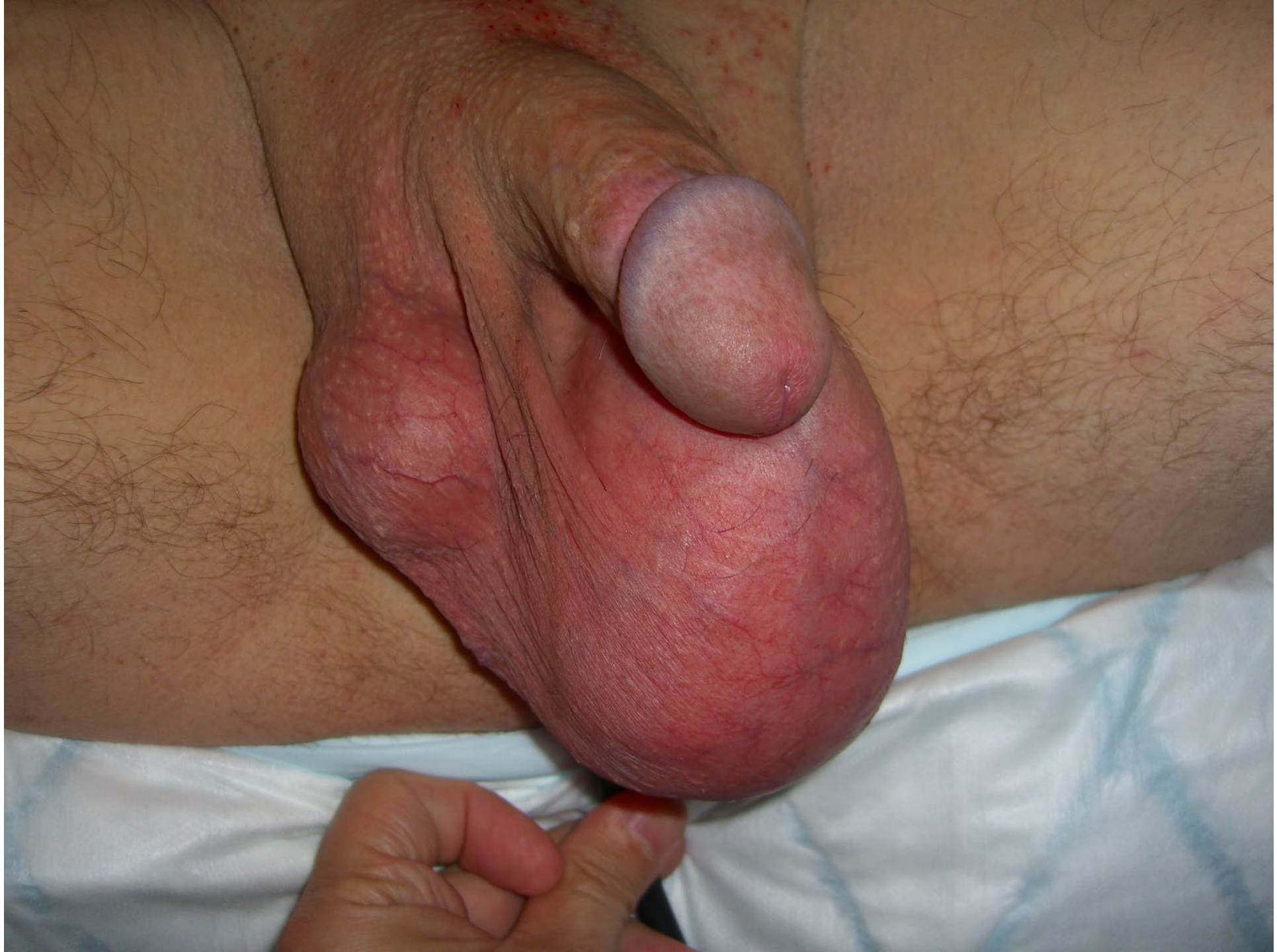
- Hydrocele
- Epididymal cyst
- Varicocele
- Tumour
- Epididymitis
- Torsion
- Inguinal Hernia

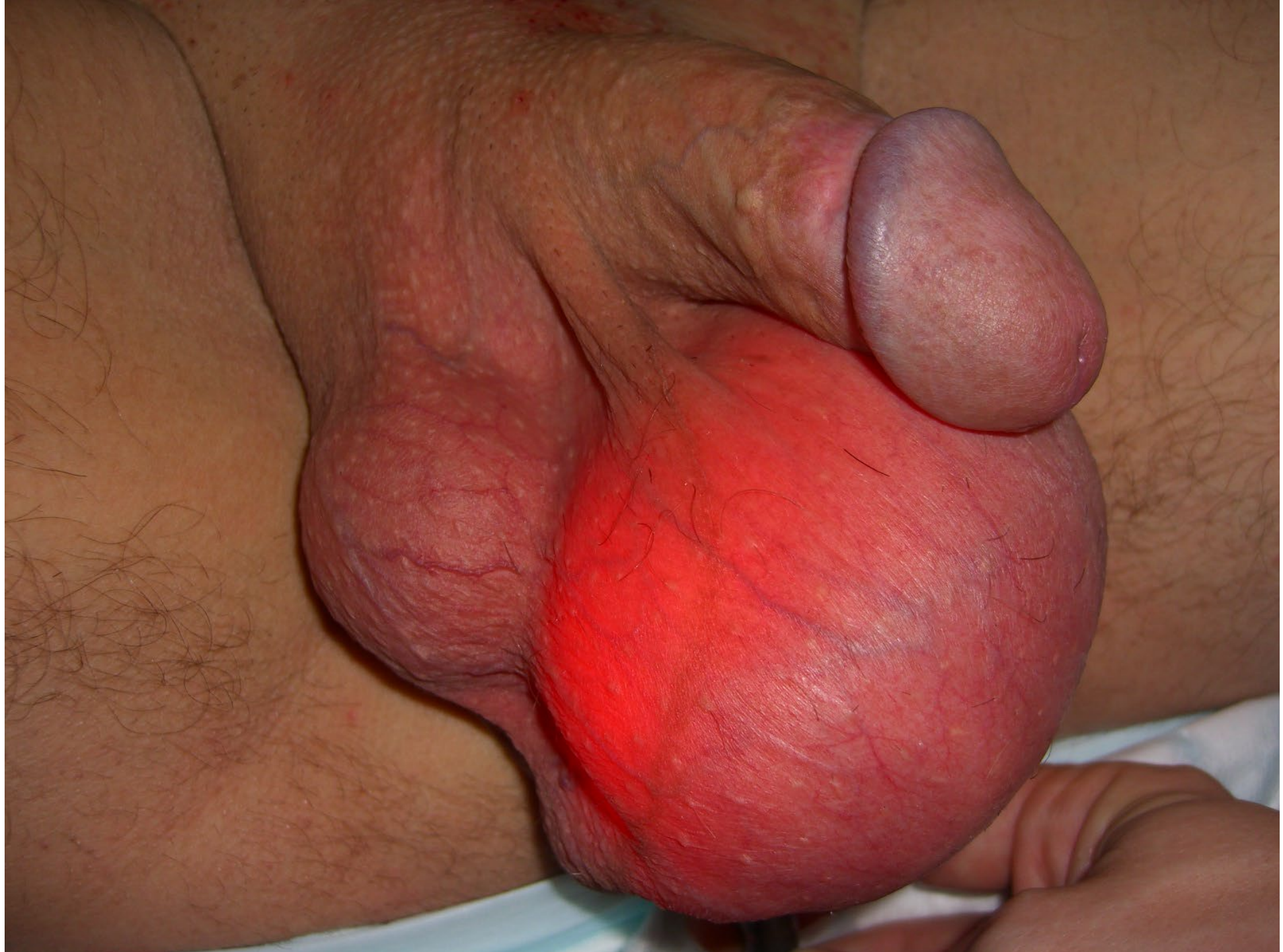
Differential Diagnosis

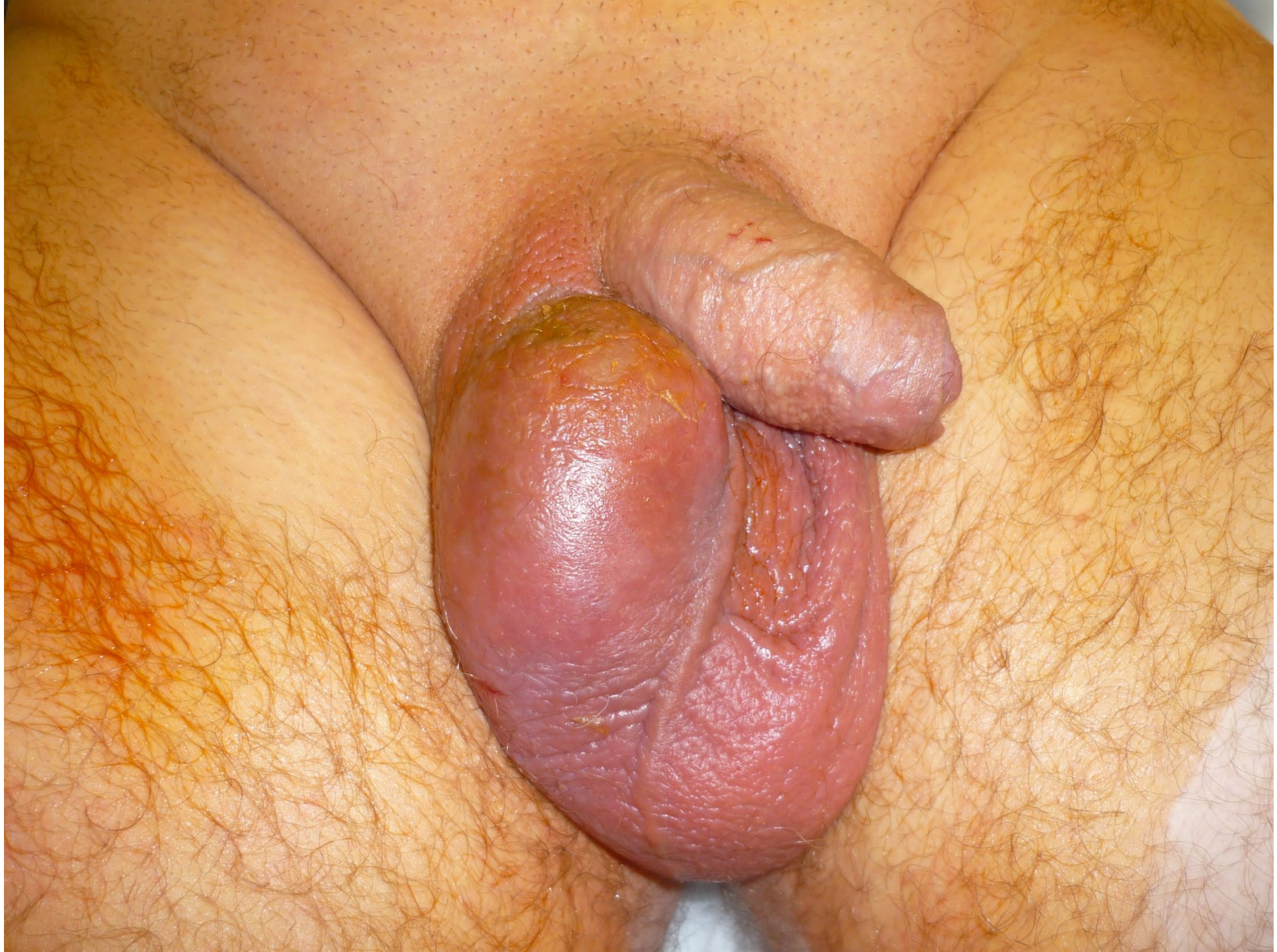
- Can you get above it?
- Is it reducible
- Can you feel the testicle seperately
- Does it transilluminate



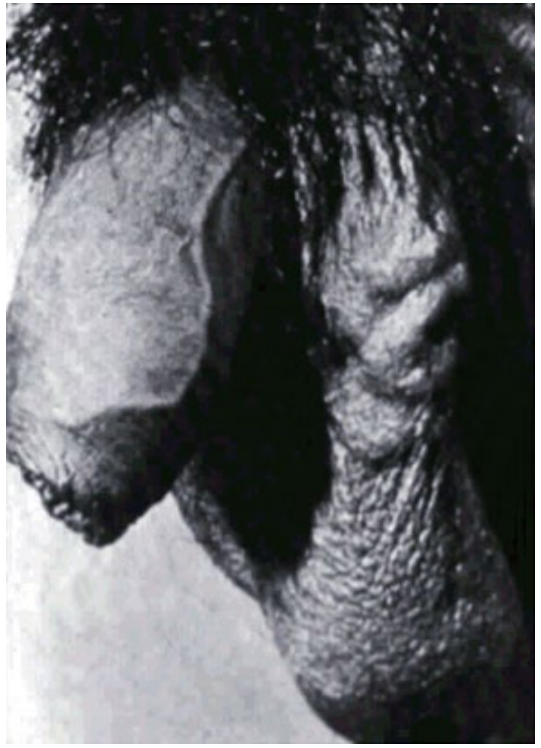


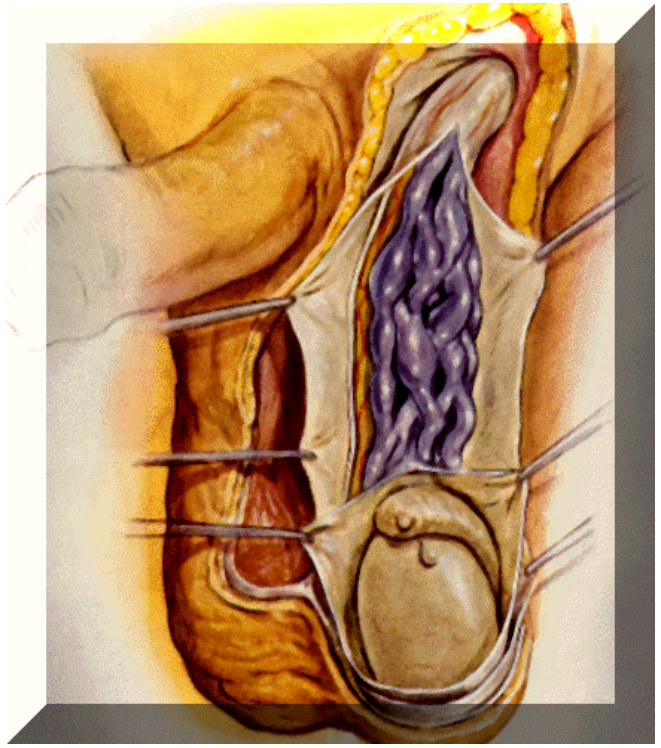






Varicocele





Varicocele - Grading

Grade I – small, palpable only with Valsalva

Grade II – moderate, palpable with patient standing

Grade III – large, visible through scrotal skin

Chronic Testis Pain

- Background
  - 1% incidence in UK
  - Usually presents in late 30s
  - Idiopathic may be due to nerve hypersensitivity or central sensitisation

Assessment

Detailed history & examination

- Nature & duration of pain
- Assess function of all pelvic organs
- Triggering events: surgery, cancer, life events, infection

Investigations

- Exclude infection inc. STI: MSU, STI screen, urethral swab,
- Exclude anatomical abnormalities: USS scrotum, MRI lumbar spine

Potential Causes

Idiopathic 20%	Post vasectomy	Previous infections	Nerve entrapment
Neuropathic: DM	Pelvic floor dysfunction	Referred pain from hip, groin, back, loin	Pschossomatic

Management_ Pelvic Floor Therapy & physical Therapy

- Pelvic floor dysfunction
  - Hypertonicity, myofascial pain

- Treatment options:
  - Pelvic floor relaxation exercises
  - Trigger point release
  - Postural correction & core strengthening

Management_ Behavioural & psychological interventions

- Treatment options:
  - Cognitive behavioural therapy (CBT)
  - Mindfulness based stress reduction
  - Sexual & psychological counselling

Management_ Anti-neuropathics

- Serotonin-norepinephrine reuptake inhibitors (SNRIs)
  - Duloxetine (30-60mg/day)
- Alpha-blockers
  - Tamsulosin (400mcg/day)
- Topical treatments
  - Capsaicin cream or lignocaine pathches

Management_ Spermatic cord block

Indications:

Suspected neuropathic pain

Pain unresponsive to medications

Outcomes:

Diagnostic value

Therapeutic benefit: repeat as required

Temporary effects: week to months

Management_Ilioinguinal & genitofemoral nerve block

Indications:

Ilioinguinal or genitofemoral nerve entrapment (post hernia repair or pelvic surgery)

Neuropathic pain

Outcomes:

Can be effective for months

Helps determine if surgical nerve ablation would be beneficial

Management_Botox

Indications:

- Pelvic floor dysfunction
- Spasticity related testis pain
- Myofascial pain not responding to physiotherapy

Outcomes:

- Can be effective for 3-6 months
- Reduces hypertonicity and neuropathic pain
- Expensive; not widely available

Thank-you.
Any questions