SKIN BIOPSY

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WHY BIOPSY?

- Biopsies don’t just confirm dx, they rule out others.
- Correct dx leads to correct tx.
- They’re essential to increasing derm skills.
WHY NOT BIOPSY?

- “DON’T NEED TO. DX = OBVIOUS"
- “DON’T HAVE TIME”
- LACK OF SKILLS + CONFIDENCE
- DON’T HAVE THE RIGHT TOOLS
- WHAT IF THEY BLEED?
- I MIGHT GET YELLED AT
- MY COLLEAGUES DON’T DO THEM!
POINT BY POINT

• ALL BLEEDING STOPS EVENTUALLY
• “OBVIOUS DX” ARE OFTEN WRONG
• YOU HAVE TIME FOR ALL OTHER LABS + PHONE CALLS
• BX’S ARE NOT ROCKET SCIENCE
• NEED ORDINARY TOOLS, SUPPLIES, SKILLS
LOCAL ANESTHETIC

- XYLOCAINE ONE % WITH EPI + 30 GA
- ALTERNATIVES – MARCAINE, BENADRYL, SALINE FOR INJECTION
- PUT ENOUGH IN, WAIT A MINUTE OR TWO
- WHEALS PROVIDE INSTANT ANESTHESIA
- EPI IS NOT A PROBLEM, ANYWHERE
PUNCH TOOL

▶ USE 2-4 MM PUNCH TOOL
▶ PRESS AND TWIRL, INTO FAT LAYER
▶ GRASP DEEP PORTION WITH PICKUPS
▶ LIFT UP AND SNIP OFF
▶ WATCH SPECIMEN ALL THE WAY INTO SPECIMEN CONTAINER
▶ LABEL CONTAINER IMMEDIATELY
THE PUNCH TOOL

- DISPOSABLE
- 4 MM IS DEFAULT SIZE
- SMALLER TOOL (eg 2 mm) ON FACE
- WIDELY AVAILABLE THROUGH SURGICAL SUPPLY HOUSES
1. Press

2. Twirl
CLOSING THE DEFECT

- ONE OR TWO SUTURES
- OR NO SUTURES
- USE VICRYL IN TENDER LOCATIONS
- GIVE THE EPI TIME TO WORK FIRST
- ALUMINUM CHLORIDE OR MONSEL’S FOR HEMOSTASIS
EXCISION OF ENTIRE LESION

- IS THE GOLD STANDARD
- GET THE WHOLE THING + UNDERLYING FAT
- CONSIDER COSMESIS
- BIOPSY CANNOT SPREAD SKIN CANCER
THE NEXT BEST THING IS PUNCH BIOPSY

- GET ADEQUATE SAMPLE
- MULTIPLE PUNCHES OK BUT NOT PREFERABLE, WITH LARGER LESIONS
- SOLITARY SMALL PUNCH BIOPSY CAN MISS PATHOLOGY LYING ELSEWHERE IN LARGE LESIONS.
- IT’S OK TO EXCISE SMALL LESIONS WITH PUNCH
PUNCH BIOPSY IS ALSO OK FOR

- BENIGN LESIONS
- INFLAMMATORY CONDITIONS (eg lupus, contact derm, psoriasis, drug rash)
- NOT JUST FOR BENIGN VS MALIGNANT
IDENTIFYING ORGANISMS

- THROUGH SPECIAL STAINS (AFB, GRAM STAIN, FUNGAL STAINS, ETC)
- THROUGH CULTURE OF PUNCHED TISSUE, SUBMITTED IN CULTURETTE OR IN SALINE (EXPEDITED)
- MENTION SUSPECTED ORGANISM ON BIOPSY REQUISITION (eg FUNGAL, AFB, BACTERIA,PROTOZOANS)
HANSEN’S DISEASE

- MULTIBACILLARY FORM
- DIAGNOSED CLINICALLY, CONFIRMED WITH PATH AND SPECIAL STAINS FOR MYCOBACTERIA LEPROSUM (FITE STAIN)
- REPORTED TO NATIONAL HANSEN’S DISEASE CENTER, BATON ROUGE
- TREATED, RELEASED WITHIN 2 DAYS
- RETURNED TO JOB AS CHEF
SHAVE BIOPSY

- FINE FOR BCC VS SCC
- NOT OK FOR SUSPECTED MELANOMA (NEED DEPTH) UNLESS TRAINED
- DEEP SHAVE (SAUCERIZATION) = OK FOR POSSIBLE MELANOMA
BIOPSY PEARLS

• PUT DIFFERENTIAL ON REQUISITION (OR HISTORY AND DESCRIPTION)

• NEED TO HAVE EVERYTHING READY AND IN ONE PLACE

• CAN DO THESE IN 5 MINUTES TOPS

• HANDLE AS WITH ANY LAB SPECIMEN: LABEL, LOGBOOK, SYSTEM
BIOPSY PEARLS

• Ask pathologist for help in interpreting results if needed
• IPAR first (indications, procedure, alternatives and risks) before procedure
• Need DDX, as with any lab
SUPPURATIVE NODULES
HISTORY/EXAM

• SUPPERATIVE NODULES, QUITE TENDER
• FAILED ORAL ANTIBIOTICS
• EXTENSIVE ADENOPATHY
• CONSTRUCTION WORKER
• OTHERWISE HEALTHY
• NO INSURANCE
**SPOROTHRIX SCHENKII**

- ONE OF THE DEEP FUNGI (EG COCCIDIOIDOMYCOSIS, HISTO, BLASTO)
- “ROSE GARDENER’S DISEASE”
- UBIQUITOUS FUNGUS IN SOIL, NEEDS PUNCTURE WOUND TO START
- TREATED WITH ITRACONAZOLE
- DIAGNOSED BY CULTURE + BIOPSY
SUPPARATIVE NODULES
NON-HEALING LESION X 2 YEARS

- NATIVE OF PAKISTAN
- FAILED TX WITH ORAL AB’S
- BIOPSY AND CULTURE SHOWED LEISHMANIASIS
- TREATED WITH iv INFUSIONS X WEEKS, CDC INVOLVED
SCURVY

- CORKSCREW HAIRS
- PERIFOLLICULAR HEMORRHAGES
- MANY ECCHYMOSES
- WEAK
- Hgb: 8, crit: 24
- ALL DRUGS, NO FOOD X WEEKS
WHERE TO TAKE IT

► FORGET ABOUT GETTING NORMAL SKIN
► DO AVOID GETTING NECROTIC MATERIAL ONLY, OR GETTING BURNED OUT TISSUE
► FOR MM: GET THE DARKEST, ODDEST PART, AND GET REPRESENTATIVE SAMPLE
TAKE 5MM PUNCH FROM CENTER VS SAUCERIZATION
BASAL CELL CARCINOMA
R/O MM
LUPUS VS SEB DERM
METASTATIC BREAST CA
WHY BIOPSY?

- For correct diagnosis
- Which dictates correct treatment
- Eases PT/provider/family’s minds
- Is essential to becoming better at Derm
- Increases production, could make you money, increase your value to the practice
- More fun than sprained ankles!
LEARNING DERM

SIMPLY CANNOT LEARN DERMATOLOGY WITHOUT ROUTINELY PERFORMING BIOPSIES

YOU DO PAPS, WET PREPS, GET BLOOD WORK, RADIOGRAPHS, DO LPs – WHY NOT BIOPSY?

BX IS SIMPLE PROCEDURE BUT YIELDS A HUGE AMOUNT OF INFORMATION
T-CELL LYMPHOMA