1/27/22 Morning Report with @CPSolvers

***Case Presenter**: Alec Rezigh (@ARBezMed) **Case Discussants**: Sharmin and Rabih*

CC: Back Pain

HPI: 70M presenting with back pain. Well until 3 weeks ago. Gradually worsening dull, lower, midline back pain with radiation to thighs and calves bilaterally.

Unable to ambulate without a walker. NSAIDs and tramadol were ineffective.

No numbness, weakness, bowel or bladder incontinence. No fevers, chills. Did have 5lb weight loss.

PMH:
HTN
DM
GERD
HLD

Meds:
Metformin
Sitagliptin
Gabapentin
Atorvastatin
Glimepiride
Lisinopril
HCTZ
Omeprazole

Fam Hx:
DM only

Soc Hx:
Works in construction. Originally from El Salvador. Moved to US 20 years ago

Health-Related Behaviors:
30 pack year tobacco history. Stopped 20 years ago

Allergies:

Vitals: **T**: **AF** **HR**: **80 BP: 140/80 SaO2: Normal BMI: 28**
Exam:
Gen: Comfortable. Minimal movement due to discomfort with movement
HEENT: No LAD
CV: Normal
Pulm: Normal
Abd: Normal
Neuro: AO x 3, CN normal. 5/5 in all extremities. +Straight leg raise. 2+ symmetric reflexes in Upper & Lower. Normal sensation.
MSK: TTP lower spinous processes (lumbar and sacral)

Notable Labs & Imaging:
Hematology:
Plt: 455 (elevated); **Chemistry**: Normal
A1c: 10%; **HIV:** Negative
UA: No proteinuria, hematuria, pyuria

XR L-Spine: Multilevel spondylosis, otherwise no abnormalities
CXR: Bilateral, small pulmonary nodules. Some emphysema.
CT A/P (obtained for renal colic): 2x3x5cm expansile destructive mass in the sacrum replacing most of the vertebral body and eroding into the disc space.
MRI: Hyperintense T1/T2 lesion seen, similar to CT
CT Chest: Small pulmonary nodules and mild emphysema.

PTH, PSA, Uric Acid: Normal **SPEP:** Small monoclonal spike in Lambda region; **SFLC:** Slightly elevated, normal ratio.
UPEP: Negative, **Quantiferon-Gold:** Negative. **Skeletal survey:** Neg

FINAL DX: Solitary Plasmacytoma seen on biopsy of spinal mass

Problem Representation: 70M w/ PMH of HTN, DM, GERD and HLD p/w worsening dull lower midline back pain for 3 weeks. Found to have small monoclonal spike on SPEP.

Teaching Points (Rafa):

- **BACK PAIN**

Primary vs secondary?
Age (younger - ankylosing spondylitis)?
Tempo?
Most common cause
Musculoskeletal derangements
Any red flags?
Pain at night, fever, chills, weight loss significant PMH (cancer/immunosuppression) , no response to previous therapy, neurologic deficits
Different categories:
Spinal stenosis, spondyloarthropathy, metastasis (eg, prostate cancer), vertebral osteomyelitis, degenerative (osteoarthritis) , radiculopathy (eg, disc herniation), primary bone malignancy

- **BASIC LABS**

ESR? CRP? - if elevated, consider imaging - (eg, X-ray, MRI)
If not - watch and observe
Elevated platelets
Probably secondary to inflammation - less likely PV

- **BONE LESION**

Infection? Malignancy?
El Salvador - TB (upper spine) / Brucella (low spine)
Malignancy - osteoblastic (prostate cancer)/ osteolytic (multiple myeloma, melanoma) / mix (GI, breast)
Pearl: >50 yo - chance of increasing of finding a benign monoclonal spike
Solitary plasmacytoma - No CRAB - chance of progressing to MM