



11/21/24 Morning Report with @CPSolvers

"One life, so many dreams" Case Presenter: David(@davserantes) Case Discussants: Rabih(@rabihmgeha) and Vini(@vinibarzon)



CC: 65yo female p/w 6 days of **fever** up to 39°C accompanied by malaise and asthenia

HPI:

ER: most recent symptoms include upper and lower extremity **arthralgia plus myalgia, dysuria, increase in severity of known headaches** in her parieto occipital region dysphagia for years

ROS (-): No abdominal pain, flank pain, no nausea, vomiting, no cough, dyspnea, odynophagia, chest pain, hematuria

PMH:

hypercholesterolemia, tension headache, **limited cutaneous systemic sclerosis** (anti Centromere-Ab +) (mainly skin manifestation)

Meds: acetaminophen, rovosastatin

No abx
Course of Linezolid +moxifloxacin 3 mo ago for **scleral ulceration**

Fam Hx:

Soc Hx:
Has a dog(vaccinated)

Health-Related Behaviors:

no smoking, no alcohol, no travel

Allergies:

Vitals: T: 38 HR: 80 BP: 120/60 RR: SpO2 99% RA

Exam:

Gen: not ill appearing

CV: nl

Pulm: nl

Abd: nl

Neuro: alert oriented 4x, no meningeal irritations

Extremities/skin: proximal interphalangeal joints, **petechiae** on 1./2.

Palmar fingers bilaterally, no pain on palpation, no ulcer, no back pain, no edema

Notable Labs & Imaging:

Hematology: WBC: 14,7 neutro.: 11.0 Hgb:10,6 MCV 87 Plt: 307

Chemistry: Na: nl K: nl Cl: nl HCO3: BUN: nl Cr: 0.7

AST: 35 ALT: 40 Alk-P: 90 **Albumin: 3.3, Crp 29, PCT 0.1, ESR 140**

INR 1.4 aPTT 20s

Imaging:

CXR: nl, CT ab/pel nl, LP: nl Glc 62, Prot 24 leuc 1/µl, RBCs 100, gram (-)

UA: mild hematuria 40 RBCs, mild proteinuria(resolved), nitrate neg

Culture neg. Urine blood and fecal, SARS CoV 2 neg, Influenza, legionella pneumococcal antigen neg.

Pip Tazo -> no improvement

Echocardiogram: no signs of Endocarditis

Serol: HIV, Hepatitis, Borrelia, Brucella, Coxiella neg, ANA anticentr. C3 C4 nl ANCA neg.

PET CT: **abdominal aorta: 7cm uptake** below the renal arteries into the iliacs

US temporal arteries nl Biopsy: pending,

Dx isolated Aortitis (GCA)

125 mg Prednisone 3 days + taper /w great response

Problem Representation: A 65 yo female presents w/ PMH of limited cutaneous systemic sclerosis on no immunosuppressants p/w 6 days of fevers, headache and constitutional symptoms. Her exam showed petechiae on her fingers bilaterally. Blood tests revealed a neutrophilic leukocytosis, CrP elevation and ESR of 140. Notably blood cultures, serology and Echo were unremarkable beside a mild hematuria and proteinuria which resolved spontaneously. Empiric antibiotic treatment did not improve the presenting symptoms. .

Teaching Points(Parisa):

Fever→ **IMADE** infection(acute); malignancies; AI; endocrinopathies(chronic) →management-wise we can not suppress immune system w/o ruling out infectious causes→ travel history; exposure history; PMH/ m.c.c of fever in AI dx immunosuppression induced infection.

Systemic inflammation→ the prominent sx of fever compared to rest of HPI suggests a potential trap, we need to make sure to not overemphasize on localizing feature(dysuria, myalgia)

Systemic sclerosis→ shows limited responsiveness to immunosuppressive→ skin (elbow/face) vs Visceral (gastrointestinal →esophageal dysmotility; pulmonary hypertension) → Dysphagia → aspiration PNA (fever+ SOB)

Aggressive viral infection vs bacterial infection→ Neutrophilia → uncommon feature of viral infection push towards bacterial infection→ hiding space → intra abdominal **liver abscess; kidney abscess; occult osteomyelitis; endovascular causes of infections** → **TEST:**CT abdomen Pelvis Chest; blood culture; viral panel 20% of PNA do not have positive lung exam; 15% do not have CXR findings → exam chest and abdomen more closely.

No source of infection has been identified→ high resolution imaging; FTD PET; look for other causes of fever AI→ Vasculopathies→ Skin(petechiae); Kidney; hematuria (dysmorphic RBC, cast)

Inflammation of unknown source scattered diffusely: blood vessel involvement **Infection mimics vasculitis** → endocarditis; Coxiella; mycobacteria; bartonella; brucella

Extravascular signature of vasculitis(retroperitoneal fibrosis) → Erdheim chester; IgG4

Alternative method for bx temporal artery: Temporal artery US