

CLINICAL CASE OF PNEUMONIA  
IN A PATIENT WITH  
IMMUNODEFFICIENCY CAUSED  
BY HIV INFECTION

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- Female, 39 years old
- Abuses alcohol
- In February 2020 she visited European countries
- She is a health worker of General Practice Network (GPN)
- She was hospitalized for acute pancreatitis in May 2019
- She was hospitalized to an infectious disease hospital in March 2020

# Complaints

Shortness of breath, which gradually increases

Unproductive cough

Increase in body temperature to 38.2 °C

Weight loss

Perioral cyanosis

Headache

Periodical diarrhea

# Test Results:

Complete blood count:

WBC -  $1.9 \times 10^9/l$

RBC -  $2.31 \times 10^{12}/l$

HGB - 77g/l

PLT -  $28 \times 10^9/l$

ESR - 28 mm/hour

SpO<sub>2</sub> = 91%

# Test Results:

## Biochemical blood analysis:

ALT - 16 U/L

AST - 5 U/L

Bilirubin - 9,08 мкмоль/л

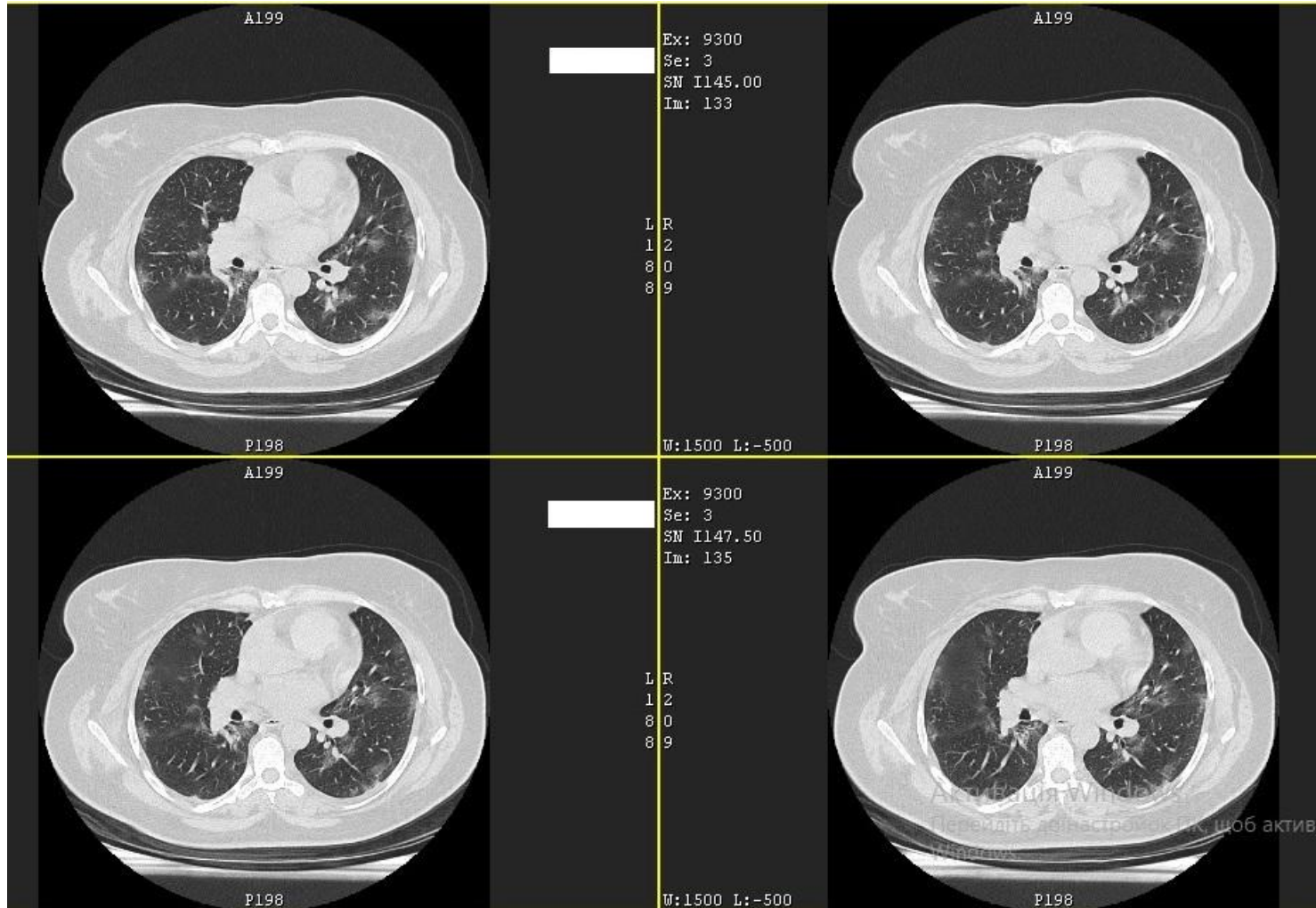
Creatinine - 65.1 μmol /L

Total protein - 56.5 g / l

Amylase - 131 U /L

Potassium - 3.6 μmol /L

# Examination results: Chest CT Scan



# Questions

What is the preliminary diagnosis?

1. TB
2. Pneumonia
3. Chronic obstructive pulmonary disease (COPD)

# Answer

Diagnosis: Bilateral polysegmental pneumonia,  
I-II degree RD



# Questions

What other tests and examinations are needed for differential diagnosis?

1. PCR test for SARS-CoV-2
2. HIV test
3. Sputum analysis
4. All of the above

# Answer

Tests: PCR test for SARS-CoV-2 – negative result  
HIV test – positive result

After the test for HIV, information was obtained that the woman was aware of her HIV-positive status.

In November 2019, she was prescribed the following ART regimen: TDF/FTC/DTG, which she is not taking

# Answer

Gene Xpert MTB/Rif of sputum (MTB+/Resist-)

CD4 (29 cells/mL), VL (721000 PHK copies/mL)

Head MRI – diffuse small focal changes

Gene Xpert MTB/Rif of CSF (MTB+/Resist-)

# Questions

What is the diagnosis?

1. TB
2. PCP
3. Pancreatitis
4. All of the above

# Answer

Firstly diagnosed miliary TB, with lesions  
of both lungs and brain

Pneumocystis pneumonia

Pancreatitis

Pancytopenia

# Treatment

2 H R E Z / 10 H R (Isoniazid, Rifampicin,  
Ethambutol, Pyrazinamide)

Trimethoprim / Sulfamethoxazole

Glucocorticosteroids

Symptomatic treatment

# Outcome

