

IMAGES IN EMERGENCY MEDICINE

Nontrauma and Medical

Man with periorbital edema, palms hyperkeratosis, and exertional dyspnea

Andrea Finazzi MD^{1,2} | Roberto Cosentini MD²¹Postgraduate School of Emergency and Critical Care Medicine - Department of Clinical Sciences and Community Health, Università degli Studi di Milano, Milano, Italy²Department of Emergency Medicine, Papa Giovanni XXIII Bergamo Hospital, Bergamo, Italy**Correspondence**

Dr Andrea Finazzi, MD, Department of Clinical Sciences and Community Health, Via della Commenda, 19 Milano, 20122 Italy.

Email: andrea.finazzi@unimi.it

1 | PATIENT PRESENTATION

A 56-year-old previously healthy man presented to the emergency department with worsening exertional dyspnea, lower extremity weakness, bilateral periorbital edema (Figure 1), and hyperkeratosis of both palms (Figure 2). These symptoms started only 5 months earlier. On blood tests, there was a marked elevation of creatine kinase (CK:4103 U/L) and mild elevation of C-reactive protein (CRP: 3.8 mg/dL). On chest computed tomography scan, there was an interstitial lung disease pattern with ground-glass opacities and traction bronchiectasis (Figure 3); on echocardiography, there was only increased pulmonary artery pressure (42 mmHg) with no left ventricular dysfunction.

2 | DIAGNOSIS

2.1 | Jo-1 antisynthetase syndrome with pulmonary, muscle, and dermatologic involvement

Given antisynthetase syndrome clinical suspicion (mechanic's hands, interstitial lung disease, CK and CRP elevation),¹ the patient was admitted to the pulmonary unit. Immunologic tests, including myositis-specific, myositis-associated, and anti-aminoacyl-tRNA synthetase antibodies^{1,2} showed anti-Jo-1 and anti-Ro52 positivity. The latter is also a predictor of increased severity of pulmonary manifestations and lower response to immunosuppressive treatment.³ Clinical suspicion in the emergency department led us to exclude myocardial involvement early (8% of Jo-1 antisynthetase syndrome) with troponin I, B-type natriuretic peptide, and echocardiography² and

**FIGURE 1** Bilateral periorbital edema

start methylprednisolone boluses (1 g daily for 3 consecutive days) early. Rheumatologists then started immunosuppressive therapy with

This is an open access article under the terms of the [Creative Commons Attribution-NonCommercial-NoDerivs](https://creativecommons.org/licenses/by-nc-nd/4.0/) License, which permits use and distribution in any medium, provided the original work is properly cited, the use is non-commercial and no modifications or adaptations are made.

© 2022 The Authors. *JACEP Open* published by Wiley Periodicals LLC on behalf of American College of Emergency Physicians.



FIGURE 2 Right-hand palm hyperkeratosis

cyclosporine 100 mg twice a day and follow-up with the patient.⁴ The patient's symptoms improved during hospitalization, and he was discharged with an outpatient follow-up program.

REFERENCES

1. Katzap E, Barilla-Labarca ML, Marder G. Antisynthetase syndrome. *Curr Rheumatol Rep.* 2011;13:175-181.

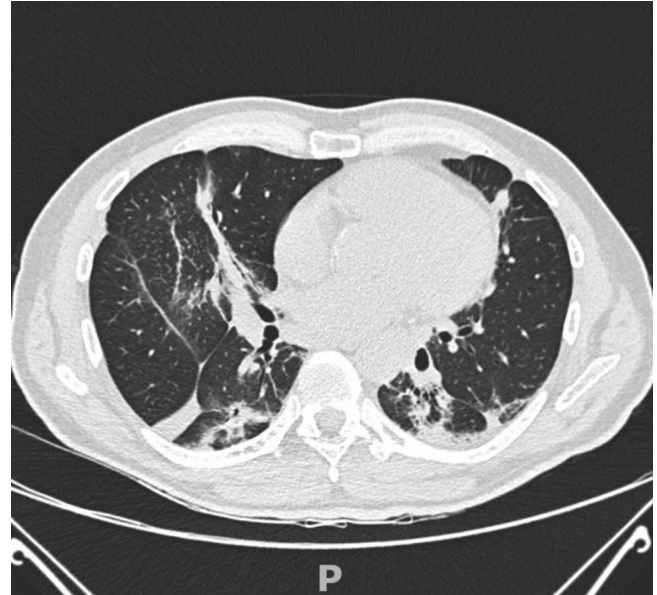


FIGURE 3 Chest high-resolution computed tomography scan: interstitial lung disease

2. Masiak A, Marzec M, Kulczycka J, Zdrojewski Z. The clinical phenotype associated with antisynthetase autoantibodies. *Reumatologia.* 2020;58:4-8.
3. Bauhammer J, Blank N, Max R, et al. Rituximab in the treatment of jo1 antibody-associated antisynthetase syndrome: anti-Ro52 positivity as a marker for severity and treatment response. *J Rheumatol.* 2016;43:1566-1574.
4. Witt LJ, Curran JJ, Strek ME. The diagnosis and treatment of antisynthetase syndrome. *Clin Pulm Med.* 2016;23:218-226.

How to cite this article: Finazzi A, Cosentini R. Man with periorbital edema, palms hyperkeratosis, and exertional dyspnea. *JACEP Open.* 2022;3:e12835.
<https://doi.org/10.1002/emp2.12835>