

ILD SOLUTIONS:

Post COVID-19 and Patients With and Without Pre-existing ILD

KEY TAKEAWAYS



Risk of COVID-19 in ILD Patients

ILD patients with COVID-19 have a higher risk of complications and mortality

French National Retrospective Cohort Study of Hospitalized Patients with COVID-19 (N = 89,530)¹

	Asthma N = 2,973 (32.6%)	COPD N = 4,682 (32.6%)	ILD N = 1,385 (9.7%)	No Chronic Lung Disease
Pulmonary Embolism	106 (3.6%)	142 (3.0%)	1,385 (9.7%)	3.3%
Ventilator Acquired Pneumonia	323 (10.9%)	445(9.5%)	277 (20.0%)	7.9%
Acute Respiratory Failure	853 (28.7%)	1,845 (39.4%)	632 (45.6%)	25.2%
ICU needed	570 (19.2%)	960 (20.5%)	453 (32.7%)	14.9%
In-hospital Death	266 (9.0%)	1,163 (24.8%)	296 (21.4%)	16.1%



Strategy for Effective Management of ILD Patients with COVID-19

Current American College of Rheumatology Recommendations²



Hold immunosuppressants during COVID-19 infection



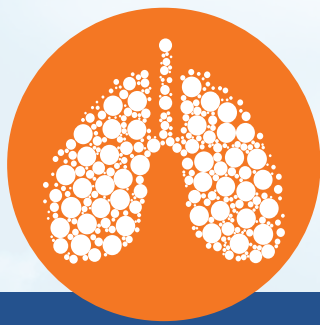
Mild infection: Reinitiate within 7-14 days of symptom resolution



Asymptomatic: 10-17 days after PCR positivity in those who are asymptomatic



Severe infection: Case by case basis



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Evaluate Post-COVID-19 Patients for Fibrotic Changes in the Lungs after Recovery



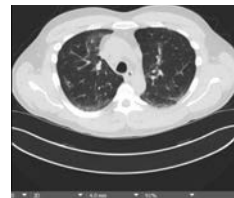
Currently, there are **no standard treatments or guidelines** for **post-COVID-19 lung fibrosis**



The UK Interstitial Lung Disease Consortium (UKILD) is conducting a longitudinal observational study on the **prevalence and risk factors** for **Long Covid-Interstitial Lung Disease (LC-ILD)**³ and **multiple clinical trials** are underway⁴



Imaging abnormalities are common after COVID-19, though they tend to improve over time. The most common abnormal findings are **ground glass opacities** and **fibrotic-like changes** (traction bronchiectasis, parenchymal bands, honeycombing)^{5,6}.



Patient with SSc-ILD with COVID-19 pneumonia at hospitalization



Patient with SSc-ILD with COVID-19 pneumonia 5 weeks post-hospital



Steroid usage after resolution of COVID-19 infection in steroid-responsive conditions, such as **organizing pneumonia** or **acute fibrinous organizing pneumonia**, may be helpful⁷



Antifibrotic therapy may improve post-COVID-19 fibrotic changes in the lungs. Several **clinical trials** are underway⁴.



References

1. Beltramo G, et al. Respiratory diseases are predictors of severe outcome in COVID-19 hospitalised patients: a nationwide study. *Eur Resp J*. 2021 Jan 1. DOI: 10.1183/13993003.04474-2020
2. Mikuls TR, et al. American College of Rheumatology Guidance for the Management of Rheumatic Disease in Adult Patients During the COVID-19 Pandemic: Version 3. *Arthritis Rheumatol*. 2021;73:e1-e12 DOI:10.1002/art.41596
3. Wild JM, et al. Understanding the burden of interstitial lung disease post-COVID-19: the UK Interstitial Lung Disease –Long COVID Study (UKILD-Long COVID). *BMJ Open Resp Res*. 2021(8):e001049. DOI:10.1136/bmjresp-2021-001049
4. Bazdyrev E, et al. Lung Fibrosis after COVID-19: Treatment Prospects. *Pharmaceuticals*. 2021 Aug;14(8):807. DOI:10.3390/ph14080807
5. Vijayakumar B, et al. CT Lung Abnormalities after COVID-19 at 3 Months and 1 Year after Hospital Discharge. *Radiology*. 2021 Oct 5:211746. DOI: 10.1148/radiol.2021211746
6. Pan F, et al. Chest CT Patterns from Diagnosis to 1 Year of Follow-up in COVID-19. *Radiology*. 2021 Oct 5:211199.
7. Myall KJ, et al. Persistent Post-COVID-19 Interstitial Lung Disease. An Observational Study of Corticosteroid Treatment. *Ann AM Thorac Soc*. 2021 May;18(5):799-806. DOI: 10.1513/AnnalsATS.202008-1002OC

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