

---

## A Drug rEpurposing Approach to tackle pulMony fibrosis in post Covid-19 patientS (DREAMS)

### Authors:

Cristina D'Aniello<sup>1</sup>, Maurizio Ventre<sup>2</sup>, Giuseppe Fiorentino<sup>3</sup>, Eduardo J. Patriarca<sup>1</sup>, Gabriella Minchiotti<sup>1</sup>

1. Istituto di Genetica e Biofisica "A. Buzzati-Traverso", CNR

2. Centro Interdipartimentale di Ricerca sui Biomateriali (CRIB), Università di Napoli Federico II

3. Azienda Ospedaliera dei Colli, Napoli

Covid-19 infection leads to a wide spectrum of respiratory diseases with a high incidence of acute respiratory distress syndrome. To date, about 4 million people worldwide have recovered from Covid-19, but concern remains that lungs might have long-term impairment following infection.

Previous coronavirus outbreaks, including SARS and MERS, have been associated with substantial post-viral lung fibrosis and respiratory impairment. Thus, the burden of fibrotic lung disease following Covid-19 infection is likely to be high. Therefore, given the scale of the pandemic, the repercussions will likely include a large cohort of individuals with pulmonary fibrosis and progressive physiological impairment. To respond to this NEW HEALTH EMERGENCY, there is thus an urgent need for active teams dedicated to the follow-up of post Covid-19 patients, rehabilitation programs and effective pharmacological treatment that are lacking, so far. Our project embraces this challenge by proposing a *intertidisciplinary approach of drug-repurposing* to identify novel therapeutic strategies to tackle pulmonary fibrosis, present after Covid infection.

The CENTRAL IDEA of the Project is that FDA-approved drugs with proved and/or suggested anticollagenic/fibrotic activity in different cells/tissues may be excellent source to block/reduce lung fibrosis and could be explored for their therapeutic potential to treat severe Covid-19 patients.

**References:** -----

**Keywords:** -----

**Contacts:** -----

**Website(s):** -----

**Other:** -----

---