

# Clinical-radiological correlations in COVID-19-related venous thromboembolism: preliminary results from a multidisciplinary study

Maddalena Wu<sup>1</sup>, Riccardo Colombo<sup>1</sup>, Massimo Arquati<sup>1</sup>, Sonia Ippolito<sup>1</sup>, Alba Taino<sup>1</sup>, Diego Ruggiero<sup>1</sup>, Francesca Tonelli<sup>1</sup>, Lucia Trombetta<sup>1</sup>, Pietro Facchinetti<sup>1</sup>, Pierluigi Glielmo<sup>1</sup>, Chiara Cogliati<sup>1</sup>, and Nicola Flor<sup>1</sup>

<sup>1</sup>ASST Fatebenefratelli Sacco

February 16, 2021

## Abstract

**Introduction:** Among the multiple complex pathophysiological mechanisms underlying COVID-19 pneumonia, immunothrombosis has been shown to play a key role. One of the most dangerous consequences of the prothrombotic imbalance is the increased incidence of micro- and macro-thrombotic phenomena, especially deep vein thrombosis (DVT) and pulmonary embolism (PE). **Methods:** We investigated the correlation between radiological and clinical-biochemical characteristics of a cohort of hospitalized COVID-19 patients. **Results:** PE was confirmed in 14/61 (23%) patients, five (35.7%) had DVT. The radiographic findings, quantified by Qanadli score, correlated with the clinical score and biochemical markers. The ratio between the right and left ventricle diameter measured at CT scan correlated with the length of hospital stay. **Conclusion:** In our cohort radiological parameters showed a significant correlation with clinical prognostic indices and scores, thus suggesting that a multidisciplinary approach is advisable in the evaluation of PE in COVID-19 patients.

## Hosted file

title page.pdf available at <https://authorea.com/users/396050/articles/509215-clinical-radiological-correlations-in-covid-19-related-venous-thromboembolism-preliminary-results-from-a-multidisciplinary-study>

## Hosted file

Manuscript\_28012021\_plain text.pdf available at <https://authorea.com/users/396050/articles/509215-clinical-radiological-correlations-in-covid-19-related-venous-thromboembolism-preliminary-results-from-a-multidisciplinary-study>

