

SHORT REPORT

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Asthma and COVID-19: a systematic review

Natália F. Mendes^{1,2}, Carlos P. Jara^{1,2}, Eli Mansour³, Eliana P. Araújo^{1,2} and Lício A. Velloso^{2,3*} 

Abstract

Background: Severe coronavirus disease-19 (COVID-19) presents with progressive dyspnea, which results from acute lung inflammatory edema leading to hypoxia. As with other infectious diseases that affect the respiratory tract, asthma has been cited as a potential risk factor for severe COVID-19. However, conflicting results have been published over the last few months and the putative association between these two diseases is still unproven.

Methods: Here, we systematically reviewed all reports on COVID-19 published since its emergence in December 2019 to June 30, 2020, looking into the description of asthma as a premorbid condition, which could indicate its potential involvement in disease progression.

Results: We found 372 articles describing the underlying diseases of 161,271 patients diagnosed with COVID-19. Asthma was reported as a premorbid condition in only 2623 patients accounting for 1.6% of all patients.

Conclusions: As the global prevalence of asthma is 4.4%, we conclude that either asthma is not a premorbid condition that contributes to the development of COVID-19 or clinicians and researchers are not accurately describing the premorbidities in COVID-19 patients.

Keywords: Coronavirus, SARS-CoV-2, Allergy, Respiratory insufficiency, Lung

Background

COVID-19 was first reported in December, 2019 in Wuhan, China, and rapidly spread across the globe [1]. It has affected more than 54 million people and has led to the death of over 1.3 million as of November 16, 2020 (www.who.org). Severely affected patients present fever, dry cough, dyspnea, and fatigue, which are commonly associated with the development of pneumonia and acute respiratory distress syndrome (ARDS) [2]. Advanced age, ischemic and congestive heart disease, hypertension, diabetes, and chronic obstructive pulmonary disease (COPD) are the most important independent predictors of death [2, 3]. As with other infectious diseases affecting the lungs, asthma has been cited as a potential risk factor for severe COVID-19 [4–8]. This association could

be putatively explained on the basis of an abnormal immune response occurring in the context of the allergic condition and an abnormal respiratory function [9, 10]. However, no previous study has addressed this question looking into all studies that described the clinical features of COVID-19.

Here, we systematically reviewed all studies published on COVID-19 since its emergence in December 2019 to June 30, 2020, looking into the description of asthma as a premorbid condition and its putative association with severe progression of the disease. We show that out of 161,271 patients diagnosed with COVID-19 and having their premorbid conditions described, only 1.6% were reported as previously diagnosed with asthma.

Methods

This is a systematic review of the diagnosis of asthma as a premorbid condition in patients with COVID-19. The report was organized according to the Preferred Reporting Items for Systematic Reviews [11]. Two authors, NFM and CPJ, independently identified

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cross-sectional and longitudinal studies published before June 30, 2020, that reported on the prevalence of asthma as a premorbid condition of severe COVID-19 by systematically searching PubMed-NCBI, Google Scholar, Scopus and Web of Science databases. As previously reported, PubMed-NCBI alone covers more than 90% of MEDLINE providing a widely accessible biomedical resource [12]. For database searches, language of the article was restricted to English. Search terms included the following: *COVID-19* (*COVID*, *COVID 19*) or *nCov* or *novel coronavirus* or *Sars-Cov-2* in the title and *clinical characteristics* or *asthma* anywhere in the text. Three authors, EM, EPA, and LAV, resolved eventual discrepancies by discussion and adjudication.

We found 1069 articles that met the initial inclusion search criteria. All articles were assessed by authors and 598 were excluded (Additional file 1: Table 1) due to one or more of the following criteria: editorials; metanalyses; systematic reviews; commentaries; letters to the Editor; no description of patient's clinical characteristics or premorbid conditions; duplicated articles and main text in a language other than English. We found 99 studies duplicated, which were also excluded accordingly, allowing us to analyze only in one of the both versions. The remaining 372 articles were included in the study. Additional file 1: Table 2 depicts the details of all articles analyzed.

Two authors, NFM and CPJ, independently extracted the following data from each article using a standardized form: study design; number of patients with COVID-19; mention of any respiratory disease; number of patients with any respiratory disease; mention of asthma; number of patients with the previous diagnosis of asthma. The entire body of the articles was presented descriptively.

Results

Figure 1 is a schematic representation of search, inclusion and exclusion of articles. Our search criteria resulted in the identification of 1069 articles that were pre-selected for detailed analysis resulting in the exclusion of 598 articles (Additional file 1: Table 1) due to one or more of the following reasons: editorials; metanalyses; systematic reviews; commentaries; letters to the Editor; no description of patient's clinical characteristics or premorbid conditions; and main text in a language other than English. The remaining 372 articles (Additional file 1: Table 2) described the clinical aspects of 161,271 COVID-19 patients. Two hundred and one studies mentioned the existence of other respiratory premorbidities except for asthma. Although asthma was mentioned as a underlying disease in 67 studies, only 52 articles have described the exact number of the COVID-19 patients with asthma (Table 1). The other 15

studies presented asthma together with other respiratory diseases, making it impossible to identify the number of COVID-19 asthmatic patients. There was a total of 40,948 COVID-19 patients included in the studies mentioning asthma, of which 8439 were previously diagnosed with asthma. In most of the studies describing other respiratory illnesses, COPD was the leading diagnosis. The United States was the country with the largest number of studies describing asthma, followed by China, France, Spain and the United Kingdom (Fig. 2a).

Thus, according to current COVID-19 clinical records, 6.4% of patients included in articles describing the clinical characteristics of COVID-19 patients and citing asthma were previously diagnosed with asthma (Fig. 2b). If all studies providing any clinical description of COVID-19 comorbidities are taken into consideration, asthma was present in only 1.6% of patients (Fig. 2c).

Discussion

Asthma is a highly prevalent, chronic, non-communicable disease that affects up to 4.4% of the world's population (<http://www.globalasthmareport.org>; <https://www.who.int/news-room/q-a-detail/asthma>). Its recurrent nature leads to frequent hospitalizations and high mortality, ranging from 2 to 4/100,000 [13]. Respiratory viruses can trigger asthma exacerbations, which can increase the severity of the infectious condition [14]. In the past, coronaviruses have been implicated as triggers of asthma exacerbations [15, 16]; this is also true for influenza virus [17]. However, as for the new coronavirus, SARS-CoV-2, there is still controversy regarding the putative role of asthma as a premorbid that could worsen disease progression [7, 8, 18].

Here, we evaluated all studies on COVID-19 published since its emergence up to June 30, 2020. We showed that asthma was described as a premorbid condition in only 1.6% of all patients. These numbers are far less than expected considering the prevalence of asthma in the world (<http://www.globalasthmareport.org>; <https://www.who.int/news-room/q-a-detail/asthma>) and could suggest that having asthma as a premorbid condition either represents no risk for COVID-19 or could be a protective factor against the development of the disease. However, there are some aspects that should be considered as potentially impactful for the findings herein reported. First, the prevalence of asthma varies across the globe, ranging from 21% in Australia to less than 2% in China, Kazakhstan and Vietnam [19]. Likewise, the most common risk factors for COVID-19, obesity, diabetes and hypertension, have distinct prevalences in different countries (www.who.org). Thus, the geographical origin of the studies could have influenced the results. However, as the studies included in this systematic review were

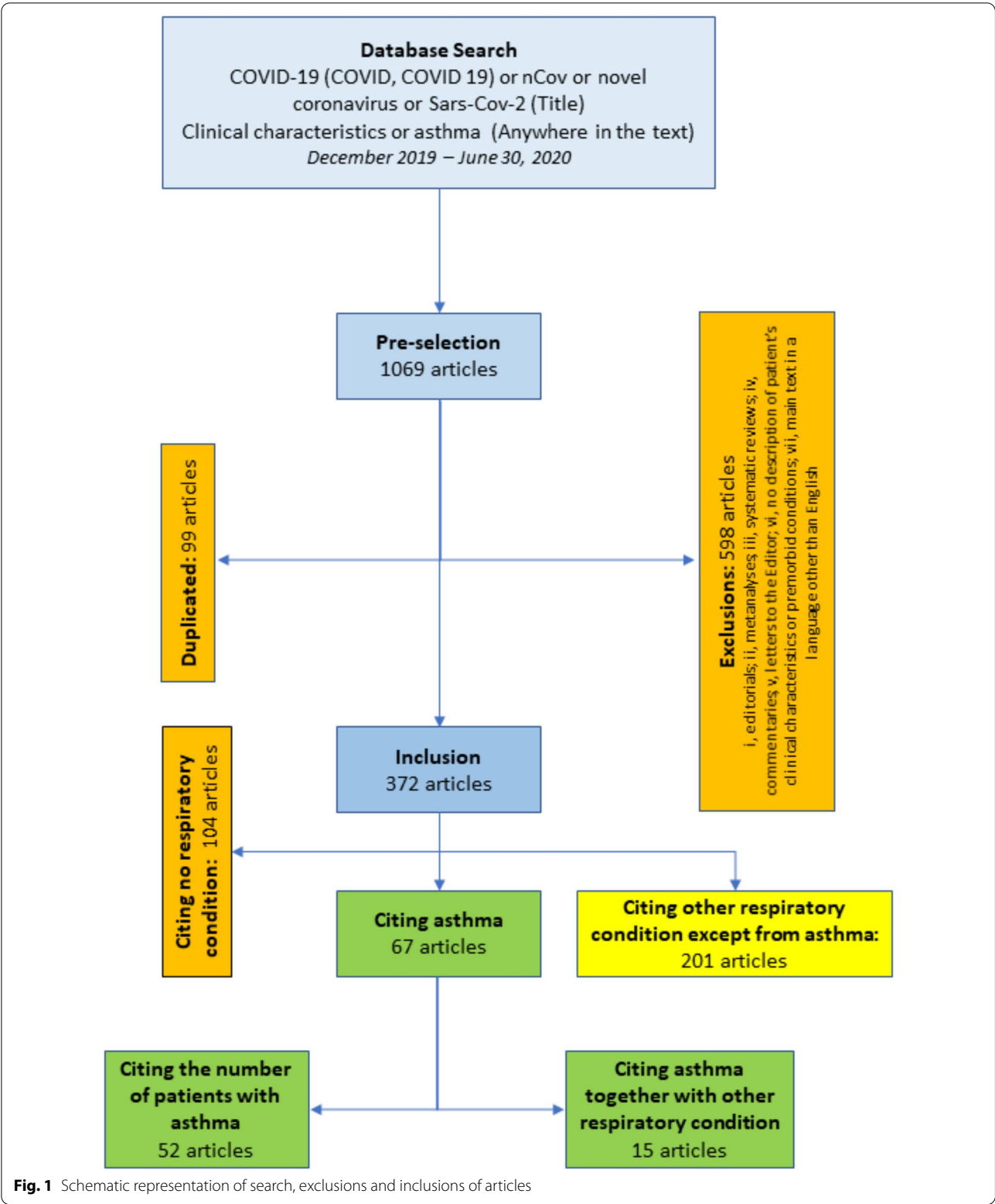


Table 1 Details of the articles that mention asthma

Citation	Title	DOI	Mention to respiratory disease except from asthma	Number (%) respiratory disease except from asthma	Mention to asthma	Number (%) asthma patients	Number of COVID-19 patients
Alkundi A, et al.	Clinical characteristics and outcomes of COVID-19 hospitalized patients with diabetes in the United Kingdom: A retrospective single centre study	10.1016/j.diabres.2020.108263	Yes	COPD: 7 (7.3%)	Yes	6 (2.6%)	232
Alsafayan YM, et al.	Clinical characteristics of COVID-19 in Saudi Arabia: A national retrospective study	10.1016/j.jiph.2020.05.026	Yes	Chronic lung disease: 57 (5.2%)	Yes	54 (4.9%)	1519
Aretz M, et al.	Characteristics and Outcomes of 21 Critically Ill Patients With COVID-19 in Washington State	10.1001/jama.2020.4326	Yes	COPD: 7 (33.3%)	Yes	2 (9.1%)	21
Asghar MS, et al.	Clinical Profiles, Characteristics, and Outcomes of the First 100 Admitted COVID-19 Patients in Pakistan: A Single-Center Retrospective Study in a Tertiary Care Hospital of Karachi	10.7759/cureus.8712	Yes	COPD: 3 (3%)	Yes	2 (2%)	100
Benger M, et al.	Intracerebral haemorrhage and COVID-19: Clinical characteristics from a case series	10.1016/j.jbbi.2020.06.005	No	–	Yes	1 (20%)	5
Bhatraju PK, et al.	Covid-19 in Critically Ill Patients in the Seattle Region — Case Series	10.1056/NEJMoa2004500	Yes	COPD: 1 (4%)	Yes	3 (12.5%)	24
Chao JY, et al.	Clinical Characteristics and Outcomes of Hospitalized and Critically Ill Children and Adolescents with Coronavirus Disease 2019 (COVID-19) at a Tertiary Care Medical Center in New York City	10.1016/j.jpeds.2020.05.006	No	–	Yes	11 (24.4%)	46

Table 1 (continued)

Citation	Title	DOI	Mention to respiratory disease except from asthma	Number (%) respiratory disease except from asthma	Mention to asthma	Number (%) asthma patients	Number of COVID-19 patients
Cheng FY, et al.	Using Machine Learning to Predict ICU Transfer in Hospitalized COVID-19 Patients	10.3390/jcm9061668	Yes	COPD: 219 (8.42%)	Yes	219 (8.42%)	2599
Cheung ZB and Forsh DA	Early outcomes after hip fracture surgery in COVID-19 patients in New York City	10.1016/j.jor.2020.06.003	Yes	COPD: 1 (10%)	Yes	2 (20%)	10
Chhibra KD, et al.	Prevalence and characterization of asthma in hospitalized and nonhospitalized patients with COVID-19	10.1016/j.jaci.2020.06.010	Yes	COPD: 111 (7.27%)	Yes	220 (14.2%)	1542
D'Silva KM, et al.	Clinical characteristics and outcomes of patients with coronavirus disease 2019 (COVID-19) and rheumatic disease: a comparative cohort study from a US 'hot spot'	10.1136/annrheumdis-2020-217888	Yes	COPD: 9 (5.7%)	Yes	31 (19.8%)	156
Du H, et al.	Clinical characteristics of 182 pediatric COVID-19 patients with different severities and allergic status	10.1111/all.14452	No	–	Yes	1 (2.3%)	43
Duanmu Y, et al.	Characteristics of Emergency Department Patients With COVID-19 at a Single Site in Northern California: Clinical Observations and Public Health Implications	10.1111/acem.14003	Yes	COPD: 1 (10%)	Yes	10 (10%)	100
Fan J, et al.	The epidemiology of reverse transmission of COVID-19 in Gansu Province, China	10.1016/j.tmaid.2020.101741	Yes	COPD: N/A	Yes	N/A	37
Fernández R, et al.	COVID-19 in Solid Organ Transplant Recipients: A Single-Center Case Series from Spain	10.1111/ajt.15929	No	–	Yes	1 (5.55%)	18

Table 1 (continued)

Citation	Title	DOI	Mention to respiratory disease except from asthma	Number (%) respiratory disease except from asthma	Mention to asthma	Number (%) asthma patients	Number of COVID-19 patients
Gayam V, et al.	Presenting characteristics, comorbidities, and outcomes of patients coinfecting with COVID-19 and Mycoplasma pneumoniae in the USA	10.1002/jmv.26026	No	–	Yes	2 (33.3%)	6
Gold JAW, et al.	Characteristics and Clinical Outcomes of Adult Patients Hospitalized With COVID-19—Georgia, March 2020	10.15585/mmwr.mm6918e1	Yes	COPD: 16 (5.2%)	Yes	32 (10.5%)	305
Goyal P, et al.	Clinical Characteristics of Covid-19 in New York City	10.1056/NEJMc2010419	Yes	COPD: 20 (5.1%)	Yes	49 (12.5%)	393
Huang D, et al.	A novel risk score to predict diagnosis with coronavirus disease 2019 (COVID-19) in suspected patients: A retrospective, multicenter, and observational study	10.1002/jmv.26143	Yes	COPD: 9 (2.7%)	Yes	5 (1.5%)	336
Jehi L, et al.	Individualizing Risk Prediction for Positive Coronavirus Disease 2019 Testing: Results From 11,672 Patients	10.1016/j.chest.2020.05.580	Yes	COPD/emphysema: 14 (1.26%)	Yes	163 (14.7%)	1108
Kaushik S, et al.	Multisystem Inflammatory Syndrome in Children Associated with Severe Acute Respiratory Syndrome Coronavirus 2 Infection (MIS-C): A Multi-institutional Study from New York City	10.1016/j.jpeds.2020.06.045	No	–	Yes	5 (15%)	33
Knight M, et al.	Characteristics and outcomes of pregnant women admitted to hospital with confirmed SARS-CoV-2 infection in UK: national population-based cohort study	10.1136/bmj.m2107	No	–	Yes	31 (7%)	427

Table 1 (continued)

Citation	Title	DOI	Mention to respiratory disease except from asthma	Number (%) respiratory disease except from asthma	Mention to asthma	Number (%) asthma patients	Number of COVID-19 patients
Korkmaz MF, et al.	The Epidemiological and Clinical Characteristics of 81 Children with COVID-19 in a Pandemic Hospital in Turkey: an Observational Cohort Study	10.3346/jkms.2020.35.e236	No	–	Yes	1 (1.23%)	81
Lechien JR, et al. 2020	Clinical and Epidemiological Characteristics of 1,420 European Patients With Mild-To-Moderate Coronavirus Disease 2019	10.1111/joim.13089	Yes	Respiratory insufficiency: 10 (0.7%)	Yes	93 (6.5%)	1420
Li X, et al. 2020	Risk factors for severity and mortality in adult COVID-19 inpatients in Wuhan	10.1016/j.jaci.2020.04.006	Yes	COPD: 17 (3.1%)	Yes	5 (0.9%)	548
Liabeuf S, et al.	Association between renin-angiotensin system inhibitors and COVID-19 complications	10.1093/ehjcvp/pvaa062	Yes	COPD: 26 (10%)	Yes	14 (5%)	268
Liu BM, et al.	Epidemiological characteristics of COVID-19 patients in convalescence period	10.1017/S0950268820001181	Yes	Pulmonary tuberculosis: 4 (5.9%)	Yes	1 (1.5%)	68
Liu D, et al.	The pulmonary sequelae in discharged patients with COVID-19: a short-term observational study	10.1186/s12931-020-01385-1	No	–	Yes	4 (2.8%)	149
Lokken EM, et al.	Clinical characteristics of 46 pregnant women with a severe acute respiratory syndrome coronavirus 2 infection in Washington State	10.1016/j.ajog.2020.05.031	No	–	Yes	4 (8.7%)	46
Magagnoli et al.	Outcomes of Hydroxychloroquine Usage in United States Veterans Hospitalized with COVID-19	10.1016/j.medj.2020.06.001	Yes	COPD: 175 (21.68%)	Yes	40 (4.95%)	807

Table 1 (continued)

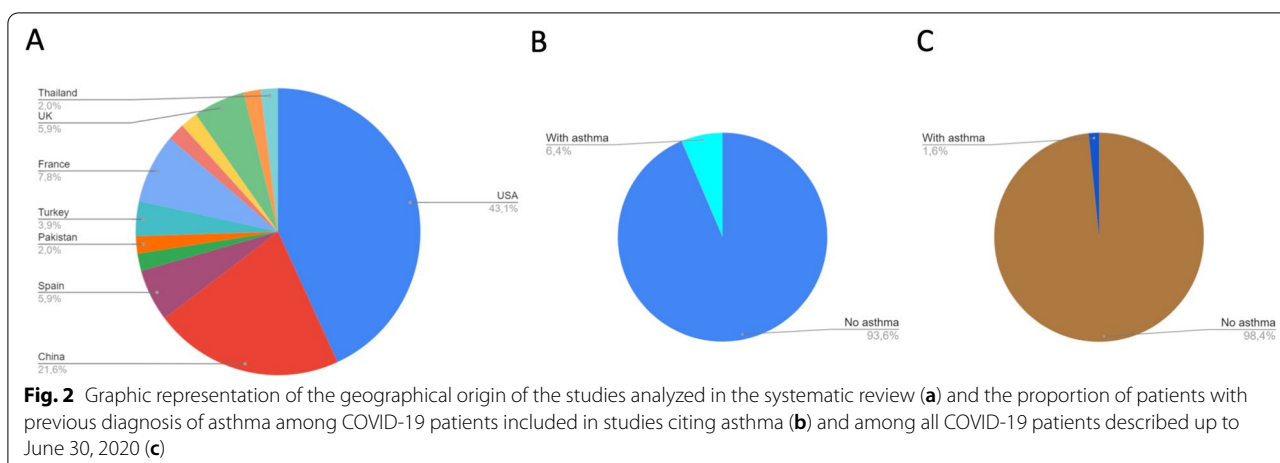
Citation	Title	DOI	Mention to respiratory disease except from asthma	Number (%) respiratory disease except from asthma	Mention to asthma	Number (%) asthma patients	Number of COVID-19 patients
Mestre-Gómez B, et al.	Incidence of pulmonary embolism in non-critically ill COVID-19 patients. Predicting factors for a challenging diagnosis	10.1007/s11239-020-02190-9	Yes	Chronic obstructive lung disease: 13 (14.28%)	Yes	7 (7.69%)	91
Mikami T, et al.	Risk Factors for Mortality in Patients with COVID-19 in New York City	10.1007/s11606-020-05983-z	Yes	COPD: 176 (2.7%)	Yes	271 (4.2%)	6493
Mitra AR, et al.	Baseline characteristics and outcomes of patients with COVID-19 admitted to intensive care units in Vancouver, Canada: a case series	10.1503/cmaj.200794	Yes	COPD: 8 (6.8%)	Yes	14 (12%)	117
Oualha M, et al.	Severe and fatal forms of COVID-19 in children	10.1016/j.arcped.2020.05.010	Yes	COPD: 1 (3.7%) e Chronic lung disease: 2 (7.4%)	Yes	1 (3.7%)	27
Pare JR, et al.	Point-of-care Lung Ultrasound Is More Sensitive than Chest Radiograph for Evaluation of COVID-19	10.5811/westjem.2020.5.47743	Yes	COPD: 1 (3.7%)	Yes	4 (14.8%)	27
Peyrony O, et al.	Accuracy of Emergency Department Clinical Findings for Diagnosis of Coronavirus Disease 2019	10.1016/j.annemergmed.2020.05.022	Yes	COPD: 24 (6.2%)	Yes	22 (5.7%)	391
Phipps MM, et al.	Acute Liver Injury in COVID-19: Prevalence and Association with Clinical Outcomes in a Large US Cohort	10.1002/hep.31404	Yes	COPD: 185 (8.1%)	Yes	308 (14)	2273
Pongpirul WA, et al.	Clinical Characteristics of Patients Hospitalized with Coronavirus Disease, Thailand	10.3201/eid2607.200598	Yes	COPD: 0	Yes	0	11
Price-Haywood EG, et al.	Hospitalization and Mortality among Black Patients and White Patients with Covid-19	10.1056/NEJMsa2011686	Yes	COPD: 79 (2.25%)	Yes	147 (4%)	3481

Table 1 (continued)

Citation	Title	DOI	Mention to respiratory disease except from asthma	Number (%) respiratory disease except from asthma	Mention to asthma	Number (%) asthma patients	Number of COVID-19 patients
Richardson S, et al.	Presenting Characteristics, Comorbidities, and Outcomes Among 5700 Patients Hospitalized With COVID-19 in the New York City Area	10.1001/jama.2020.6775	Yes	COPD: 287 (5.4%)	Yes	479 (9%)	5700
San-Juan R, et al.	Incidence and clinical profiles of COVID-19 pneumonia in pregnant women: A single-centre cohort study from Spain	10.1016/j.eclim.2020.100407	No	–	Yes	4 (12.5%)	32
Satici C, et al.	Performance of pneumonia severity index and CURB-65 in predicting 30-day mortality in patients with COVID-19	10.1016/j.jid.2020.06.038	Yes	COPD: 28 (4.1%)	Yes	43 (6.3%)	681
Sentilhes L, et al.	Coronavirus disease 2019 in pregnancy was associated with maternal morbidity and preterm birth	10.1016/j.ajog.2020.06.022	No	–	Yes	5 (9.3%)	54
Shahriarirad R, et al.	Epidemiological and clinical features of 2019 novel coronavirus diseases (COVID-19) in the South of Iran	10.1186/s12879-020-05128-x	Yes	COPD: 9 (8%)	Yes	7 (6.2%)	113
Smith SM, et al.	Impaired glucose metabolism in patients with diabetes, prediabetes and obesity is associated with severe Covid-19	10.1002/jmv.26227	Yes	COPD: 12 (6.5%)	Yes	18 (9.8%)	184
Solis and Carreño	COVID-19 Fatality and Comorbidity Risk Factors among Diagnosed Patients in Mexico	10.1101/2020.04.21.20074591	Yes	COPD: 202 (2.7%)	Yes	270 (3.6%)	7497
Sultan I, et al.	The Role of Extracorporeal Life Support for Patients With COVID-19: Preliminary Results from a Statewide Experience	10.1111/jocs.14583	No	–	Yes	N/A	10

Table 1 (continued)

Citation	Title	DOI	Mention to respiratory disease except from asthma	Number (%) respiratory disease except from asthma	Mention to asthma	Number (%) asthma patients	Number of COVID-19 patients
Wang X, et al.	Nosocomial Outbreak of 2019 Novel Coronavirus Pneumonia in Wuhan, China	10.1183/13993003.00544-2020	No	–	Yes	2 (5.7%)	35
Zhang C, et al.	Clinical and epidemiological characteristics of pediatric SARS-CoV-2 infections in China: A multicenter case series	10.1371/journal.pmed.1003130	No	–	Yes	1 (3%)	34
Zhang JJ, et al.	Clinical characteristics of 140 patients infected with SARS-CoV-2 in Wuhan, China	10.1111/all.14238	Yes	COPD: 2 (1.4%)	Yes	0	140
Zhao M, et al.	Comparison of clinical characteristics and outcomes of patients with coronavirus disease 2019 at different ages	10.18632/aging.103298	Yes	COPD: 23 (2.3%)	Yes	12 (1.2%)	1000
Zhou X, et al.	Clinical Characteristics of Coronavirus Disease 2019 (COVID-19) Patients with Hypertension on Renin-Angiotensin System Inhibitors	10.1080/10641963.2020.1764018	Yes	COPD: 3 (2.7%)	Yes	1 (0.9%)	110



mostly originated from countries presenting a wide range of prevalences for both asthma and the main comorbidities for COVID-19, we believe this factor plays a minor role in the reported findings.

Another aspect that could explain our results is that asthma treatment with inhaled corticosteroids allied to improved therapeutic and prophylactic adhesion has increased over the years, resulting in the reduction of respiratory distress episodes and allergy associated immunological imbalance [20–23]. Moreover, allergy and asthma international associations were efficient to rapidly produce and release COVID-19 guidelines that provided advice for health professionals involved in the care of asthma patients, as well as for reaching the general public [24–27]. These actions could have beneficially impacted on the control of asthma and also influenced patients to follow social isolation procedures; thus, mitigating the risk of contracting COVID-19.

It has been suggested that the particular inflammatory environment in the bronchioalveolar system of asthma patients could lead to a reduced expression of SARS-CoV-2 receptor, angiotensin converting enzyme 2 (ACE2), rendering asthma patients protected from the infection [28–30]. This could be due to the fact that interleukin-13 (IL-13), a cytokine involved in eosinophil recruitment to the bronchial epithelia [31], is capable of reducing ACE2 expression in bronchial ex-vivo human samples [28]. In line with these findings, it has been reported that progressive increase in blood eosinophil counts is related to COVID-19 recovery. Thus, if proven correct, these data could suggest that only patients with allergic asthma are protected from COVID-19, as recently suggested [32, 33]. However, currently available data provides no sufficient detail regarding asthma etiological classification and further studies would be required in order to provide advance in this issue.

The main weaknesses of this systematic review rely on the facts that we included publications covering the initial 6 months of pandemics and as new data is published on a daily basis, some changes in the frequency of asthma could appear; moreover, readers should keep in mind that some reports show that in certain pocket populations, asthma could be an important comorbidity for COVID-19 [34]. The reasons for these apparent discrepancies should be a focus of further studies.

Thus, as for the data analyzed in this systematic review, asthma does not seem to be an important premorbid condition in COVID-19 patients; or, conversely, it could be a protective factor, as previously proposed [18]. The findings herein reported could be an epidemiological truth that should be further explored in mechanistic studies or could be due to the fact that researchers are not properly investigating and describing the premorbidities in COVID-19 patients. Whatever the reasons, the medical community should be aware of the implications of missing the diagnosis of a potentially severe respiratory disease such as asthma that could worsen the prognosis of COVID-19 patients.

Supplementary Information

The online version contains supplementary material available at <https://doi.org/10.1186/s13223-020-00509-y>.

Additional file 1: Table 1. Excluded articles. **Table 2.** Included articles.

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Authors' contributions

NFM and CPJ performed article search and first round of inclusions. EM, EPA and LAV performed second round of inclusion. LAV and NFM performed statistics analysis. LAV and NFM wrote the manuscript. All authors read manuscript and provided approval.

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Availability of data and materials

Data are available upon request.

Ethics approval and consent to participate

The study does not require ethical approval because the systematic review is based on published research and the original data are anonymous.

Consent for publication

Authors are the sole responsible for the publication of this study.

Competing interests

Authors have no competing interests to declare.

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Additional data

Asthma and COVID-19 - *A systematic review*

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Additional Table 1. Excluded articles.

<i>Citation</i>	<i>Title</i>	<i>DOI</i>	<i>Type of article</i>	<i>Reason for exclusion</i>
<i>Andino JJ et al.</i>	Video Visits as a Substitute for Urological Clinic Visits	10.1016/j.urology.2020.05.080	Original Research	Do not present patient' underlying diseases
<i>Assaad S, et al.</i>	High mortality rate in cancer patients with symptoms of COVID-19 with or without detectable SARS-COV-2 on RT-PCR	10.1016/j.ejca.2020.05.028	Original Article	Do not present patient' underlying diseases
<i>Avula A, et al.</i>	COVID-19 Presenting as Stroke	10.1016/j.bbi.2020.04.077	Original Article	Do not present patient' underlying diseases
<i>Banerjee A et al.</i>	Use of Machine Learning and Artificial Intelligence to predict SARS-CoV-2 infection from Full Blood Counts in a population	10.1016/j.intimp.2020.106705	Original Research	Do not present patient' underlying diseases
<i>Bi X, et al.</i>	Prediction of Severe Illness Due to COVID-19 Based on an Analysis of Initial Fibrinogen to Albumin Ratio and Platelet Count	10.1080/09537104.2020.1760230	Original Article	Do not present patient' underlying diseases
<i>Bielecki M, et al.</i>	Social distancing alters the clinical course of COVID-19 in young adults: A comparative cohort study	10.1093/cid/ciaa889	Original research	Do not present patient' underlying diseases
<i>Bode B, et al.</i>	Glycemic Characteristics and Clinical Outcomes of COVID-19 Patients Hospitalized in the United States	10.1177/1932296820924469	Original Research	Do not present patient' underlying diseases
<i>Cao D, et al.</i>	Clinical analysis of ten pregnant women with COVID-19 in Wuhan, China: A retrospective study	10.1016/j.ijid.2020.04.047	Original Article	Do not present patient' underlying diseases
<i>Chan KH, et al.</i>	Clinical characteristics and outcome in patients with combined diabetic ketoacidosis and hyperosmolar hyperglycemic state associated with COVID-19: A retrospective, hospital-based observational case series	10.1016/j.diabres.2020.108279	Original research	Do not present patient' underlying diseases
<i>Chang CM, et al.</i>	COVID-19: Taiwan's epidemiological characteristics and public and hospital responses	10.7717/peerj.9360	Original research	Do not present patient' underlying diseases
<i>Chang D, et al.</i>	Epidemiologic and Clinical Characteristics of Novel Coronavirus Infections Involving 13 Patients Outside Wuhan, China	10.1001/jama.2020.1623	Research Letter	Do not present patient' underlying diseases
<i>Chen C, et al.</i>	A special symptom of olfactory dysfunction in coronavirus disease 2019: report of three cases	10.1007/s13365-020-00849-w	Case Reports	Do not present patient' underlying diseases
<i>Chen D, et al.</i>	Assessment of Hypokalemia and Clinical Characteristics in Patients With Coronavirus Disease 2019 in Wenzhou, China	10.1001/jamanetworkopen.2020.11122	Original Article	Do not present patient' underlying diseases
<i>Chen L, et al.</i>	Ocular Manifestations of a Hospitalised Patient with Confirmed 2019 Novel Coronavirus Disease	10.1136/bjophthalmol-2020-316304	Original Research	Do not present patient' underlying diseases
<i>Chen M, et al.</i>	A SARS-CoV-2 familial cluster infection reveals asymptomatic transmission to children	10.1016/j.jiph.2020.05.018	Original Article	Do not present patient' underlying diseases
<i>Chen M, et al.</i>	Clinical Characteristics of Re-hospitalized Patients With COVID-19 in China	10.1002/jmv.26002	Research Article	Do not present patient' underlying diseases

Chen P, et al.	Epidemiological and Clinical Characteristics of 136 Cases of COVID-19 in Main District of Chongqing	10.1016/j.jfma.2020.04.019	Original Research	Do not present patient' underlying diseases
Chen R, et al.	Safety and efficacy of different anesthetic regimens for parturients with COVID-19 undergoing Cesarean delivery: a case series of 17 patients	10.1007/s12630-020-01630-7	Original Research	Do not present patient' underlying diseases
Chen T, et al.	Epidemic characteristics of the COVID-19 outbreak in Tianjin, a well-developed city in China	10.1016/j.ajic.2020.06.006	Original Article	Do not present patient' underlying diseases
Chen Z, et al.	Childhood COVID-19: a multicentre retrospective study	10.1016/j.cmi.2020.06.015	Research note	Do not present patient' underlying diseases
Chu J, et al.	Clinical Characteristics of 54 Medical Staff With COVID-19: A Retrospective Study in a Single Center in Wuhan, China	10.1002/jmv.25793	Original Research	Do not present patient' underlying diseases
Cobes N, et al.	Ventilation/perfusion SPECT/CT findings in different lung lesions associated with COVID-19: a case series	10.1007/s00259-020-04920-w	Short communication	Do not present patient' underlying diseases
Colizzi M, et al.	Psychosocial and Behavioral Impact of COVID-19 in Autism Spectrum Disorder: An Online Parent Survey	10.3390/brainsci10060341	Original Article	Do not present patient' underlying diseases
Dai H, et al.	High-resolution Chest CT Features and Clinical Characteristics of Patients Infected with COVID-19 in Jiangsu, China	10.1016/j.ijid.2020.04.003	Original Research	Do not present patient' underlying diseases
De Gottardi A, et al.	Clinical characteristics and management of a liver transplanted patient admitted with SARS-CoV-2 infection	10.1016/j.clinre.2020.05.014	Case Report	Do not present patient' underlying diseases
Dong Y, et al.	Epidemiology of COVID-19 Among Children in China	10.1542/peds.2020-0702	Original research	Do not present patient' underlying diseases
Dong Y, et al.	A novel simple scoring model for predicting severity of patients with SARS-CoV-2 infection	10.1111/tbed.13651	Original research	Do not present patient' underlying diseases
Du M, et al.	Multomics Evaluation of Gastrointestinal and Other Clinical Characteristics of COVID-19	10.1053/j.gastro.2020.03.045	Original research	Do not present patient' underlying diseases
Du W, et al.	Persistence of SARS-CoV-2 virus RNA in feces: A case series of children	10.1016/j.jiph.2020.05.025	Original research	Do not present patient' underlying diseases
Dworzńska A, et al.	A 56-year-old man with RT-PCR negative nasopharyngeal swabs with Coronavirus Disease 2019 (COVID-19) Pneumonia	10.2644/aaem/123543	Case Reports	Do not present patient' underlying diseases
Fernandez-Nieto D, et al.	Clinical and Histological Characterization of Vesicular COVID-19 Rash: A Prospective Study in a Tertiary Care Hospital	10.1111/ced.14277	Concise Report	Do not present patient' underlying diseases
Finzi E	Treatment of SARS-CoV-2 with high dose oral zinc salts: A report on four patients	10.1016/j.ijid.2020.06.006	Case report	Do not present patient' underlying diseases
Frey MK, et al.	Impact of the coronavirus disease 2019 pandemic on the quality of life for women with ovarian cancer	10.1016/j.ajog.2020.06.049	Original research	Do not present patient' underlying diseases
Gómez-Iglesias P, et al.	An Online Observational Study of Patients With Olfactory and Gustatory Alterations Secondary to SARS-CoV-2 Infection	10.3389/fpubh.2020.00243	Original research	Do not present patient' underlying diseases
Gualtieri P, et al.	Body Composition Findings by Computed Tomography in SARS-CoV-2 Patients: Increased Risk of Muscle Wasting in Obesity	10.3390/ijms21134670	Original research	Do not present patient' underlying diseases
Güemes-Villahoz N, et al.	Detecting SARS-CoV-2 RNA in conjunctival secretions: Is it a valuable diagnostic method of COVID-19?	10.1002/jmv.26219	Original research	Do not present patient' underlying diseases
Guo H, et al.	The impact of the COVID-19 epidemic on the utilization of emergency dental services.	10.1016/j.jds.2020.02.002	Short communication	Do not present patient' underlying diseases
Guo L et al.	Absence of SARS-CoV-2 in semen of a COVID-19 patient cohort	10.1111/andr.12848	Original research	Do not present patient' underlying diseases
He D, et al.	Comparing COVID-19 and the 1918-19 influenza pandemics in the United Kingdom	10.1016/j.ijid.2020.06.075	Comparative Study	Do not present patient' underlying diseases
He YF, et al.	Clinical characteristics, diagnosis, and treatment of COVID-19: A case report.	10.12998/wjcc.v8.i11.2325	Case Reports	Do not present patient' underlying diseases
Himoto Y, et al.	Diagnostic Performance of Chest CT to Differentiate COVID-19 Pneumonia in Non-High-Epidemic Area in Japan	10.1007/s11604-020-00958-w	Original research	Do not present patient' underlying diseases
Hu X et al.	Clinical features and chest CT findings of 3 cases of 2019 novel coronavirus (COVID-19) pneumonia	10.1016/j.radcr.2020.06.031	Case Reports	Do not present patient' underlying diseases
Hu Z, et al.	Clinical Characteristics of 24 Asymptomatic Infections With COVID-19 Screened Among Close Contacts in Nanjing, China	10.1007/s11427-020-1661-4	Research Article	Do not present patient' underlying diseases
Hua CZ, et al.	Epidemiological features and viral shedding in children with SARS-CoV-2 infection	10.1002/jmv.26180	Original research	Do not present patient' underlying diseases
Huang H, et al.	Clinical characteristics of COVID-19 in patients with preexisting ILD: A retrospective study in a single center in Wuhan, China	10.1002/jmv.26174	Original Article	Do not present patient' underlying diseases
Huang JT, et al.	Chronological Changes of Viral Shedding in Adult Inpatients with COVID-19 in Wuhan, China	10.1093/cid/ciaa631	Original research	Do not present patient' underlying diseases

Huang K <i>et al.</i>	A retrospective analysis of the epidemiology, clinical manifestations, and imaging characteristics of familial cluster-onset COVID-19	10.21037/atm-20-3759	Original Research	Do not present patient' underlying diseases
Huang L, <i>et al.</i>	Initial CT Imaging Characters of an Imported Family Cluster of COVID-19	10.1016/j.dinimag.2020.04.010	Original Article	Do not present patient' underlying diseases
Ji T, <i>et al.</i>	Lockdown Contained the Spread of 2019 Novel Coronavirus Disease in Huangshi City, China: Early Epidemiological Findings	10.1093/cid/ciaa390	Original Research	Do not present patient' underlying diseases
Jia J, <i>et al.</i>	Epidemiological Characteristics on the Clustering Nature of COVID-19 in Qingdao City, 2020: A Descriptive Analysis	10.1017/dmp.2020.59	Original Research	Do not present patient' underlying diseases
Jiang Q, <i>et al.</i>	The Prevalence, Characteristics, and Prevention Status of Skin Injury Caused by Personal Protective Equipment Among Medical Staff in Fighting COVID-19: A Multicenter, Cross-Sectional Study	10.1089/wound.2020.1212	Original Article	Do not present patient' underlying diseases
Jiang S <i>et al.</i>	Liver Injury in Critically Ill and Non-critically Ill COVID-19 Patients: A Multicenter, Retrospective, Observational Study	10.3389/fmed.2020.00347	Original Research	Do not present patient' underlying diseases
Joffily L, <i>et al.</i>	The close relationship between sudden loss of smell and COVID-19	10.1016/j.bjorl.2020.05.002	Original research	Do not present patient' underlying diseases
Jung SM, <i>et al.</i>	Epidemiological Identification of A Novel Pathogen in Real Time: Analysis of the Atypical Pneumonia Outbreak in Wuhan, China, 2019-2020	10.3390/jcm9030637	Original Research	Do not present patient' underlying diseases
Khamis F, <i>et al.</i>	Epidemiology of COVID-19 Infection in Oman: Analysis of the First 1304 Cases	10.5001/omj.2020.60	Original Research	Do not present patient' underlying diseases
Kim Gu, <i>et al.</i>	Clinical Characteristics of Asymptomatic and Symptomatic Patients With Mild COVID-19	10.1016/j.cmi.2020.04.040	Original Article	Do not present patient' underlying diseases
Kobayashi KI, <i>et al.</i>	Clinical Characteristics of Patients With Coronavirus Disease 2019 in Japan: A Single- Center Case Series	10.1093/infdis/jiaa244	Case Reports	Do not present patient' underlying diseases
Kolanka A, <i>et al.</i>	A single-center experience with patients immediately after transplantation	10.1111/tid.13381	Case Report	Do not present patient' underlying diseases
Kurstjens S, <i>et al.</i>	Rapid identification of SARS-CoV-2-infected patients at the emergency department using routine testing	10.1515/cdm-2020-0593	Multicenter study	Do not present patient' underlying diseases
Lang G, <i>et al.</i>	The Clinical and Radiological Manifestations in Coronavirus Disease 2019 With Negative Nucleic Acid Results	10.1093/ofid/ofaa252	Original research	Do not present patient' underlying diseases
Lapostolle F, <i>et al.</i>	Clinical features of 1487 COVID-19 patients with outpatient management in the Greater Paris: the COVID-call study	10.1007/s11739-020-02379-z	Original research	Do not present patient' underlying diseases
Lei P, <i>et al.</i>	Clinical and Computed Tomographic (CT) Images Characteristics in the Patients With COVID-19 Infection: What Should Radiologists Need to Know?	10.3233/XST-200670	Research Article	Do not present patient' underlying diseases
Li B, <i>et al.</i>	Diagnostic Value and Key Features of Computed Tomography in Coronavirus Disease 2019	10.1080/22221751.2020.1750307	Original research	Do not present patient' underlying diseases
Li C, <i>et al.</i>	Chest CT study of fifteen COVID-19 patients with positive RT-PCR retest results after discharge	10.21037/qims-20-530	Original research	Do not present patient' underlying diseases
Li <i>et al.</i>	Efficacy and Safety of Lopinavir/Ritonavir or Arbidol in Adult Patients with Mild/Moderate COVID-19: An Exploratory Randomized Controlled Trial	10.1016/j.medj.2020.04.001	Original research	Do not present patient' underlying diseases
Li H, <i>et al.</i>	The Profile of Peripheral Blood Lymphocyte Subsets and Serum Cytokines in Children With 2019 Novel Coronavirus Pneumonia	10.1016/j.jinf.2020.04.001	Original Article	Do not present patient' underlying diseases
Li J, <i>et al.</i>	Clinical characteristics of emergency surgery patients infected with coronavirus disease 2019 (COVID-19) pneumonia in Wuhan, China	10.1016/j.surg.2020.05.007	Research Article	Do not present patient' underlying diseases
Li R, <i>et al.</i>	Clinical characteristics of 225 patients with COVID-19 in a tertiary Hospital near Wuhan, China	10.1016/j.jcv.2020.104363	Original research	Do not present patient' underlying diseases
Li W, <i>et al.</i>	The Characteristics of Household Transmission of COVID-19	10.1093/cid/ciaa450	Original Research	Do not present patient' underlying diseases
Li X, <i>et al.</i>	Epidemiological Characteristics of Confirmed COVID-19 in Guizhou Province, China	10.1017/dmp.2020.134.	Original Article	Do not present patient' underlying diseases
Li X, <i>et al.</i>	CT Imaging Changes of Corona Virus Disease 2019 (COVID-19): A Multi-Center Study in Southwest China	10.1186/s12967-020-02324-w	Original Research	Do not present patient' underlying diseases
Li Y, <i>et al.</i>	Comparison of hospitalized patients with pneumonia caused by COVID-19 and influenza A in children under 5 years	10.1016/j.ijid.2020.06.026	Original Article	Do not present patient' underlying diseases
Li Y, <i>et al.</i>	Retrospective analysis of laboratory testing in 54 patients with severe- or critical-type 2019 novel coronavirus pneumonia	10.1038/s41374-020-0431-6	Original research	Do not present patient' underlying diseases
Li Y, <i>et al.</i>	Characteristics of Respiratory Virus Infection During the Outbreak of 2019 Novel Coronavirus in Beijing	10.1016/j.ijid.2020.05.008	Original Article	Do not present patient' underlying diseases
Li Y, <i>et al.</i>	Insight Into COVID-2019 for Pediatricians	10.1002/ppul.24734	Case Report	Do not present patient' underlying diseases
Liao M, <i>et al.</i>	Single-cell landscape of bronchoalveolar immune cells in patients with COVID-19	10.1038/s41591-020-0901-9	Brief Communication	Do not present patient' underlying diseases

<i>Lin P, et al.</i>	Adverse Skin Reactions Among Healthcare Workers During the Coronavirus Disease 2019 Outbreak: A Survey in Wuhan and Its Surrounding Regions	10.1111/bjd.19089	Original Research	Do not present patient' underlying diseases
<i>Liu C, et al.</i>	18F-FDG PET/CT and Serial Chest CT Findings in a COVID-19 Patient With Dynamic Clinical Characteristics in Different Period	10.1097/RLU.0000000000003068	Case Reports	Do not present patient' underlying diseases
<i>Liu H, et al.</i>	Management of COVID-19 in Patients After Liver Transplantation: Beijing Working Party for Liver Transplantation	10.1007/s12072-020-10043-z	Original Research	Do not present patient' underlying diseases
<i>Liu L, et al.</i>	Optimizing screening strategies for coronavirus disease 2019: A study from Middle China	10.1016/j.jiph.2020.05.003	Original research	Do not present patient' underlying diseases
<i>Liu L, et al.</i>	Association Between Age and Clinical Characteristics and Outcomes of COVID-19	10.1183/13993003.01112-2020	Original Article	Do not present patient' underlying diseases
<i>Liu Q, et al.</i>	Laboratory findings and a combined multifactorial approach to predict death in critically ill patients with COVID-19: a retrospective study	10.1017/S0950268820001442	Observational Study	Do not present patient' underlying diseases
<i>Liu W, et al.</i>	Clinical characteristics of 19 neonates born to mothers with COVID-19	10.1007/s11684-020-0772-y	Original Research	Do not present patient' underlying diseases
<i>Loeffelholz MJ, et al.</i>	Multicenter Evaluation of the Cepheid Xpert Xpress SARS-CoV-2 Test	10.1128/JCM.00926-20	Original Article	Do not present patient' underlying diseases
<i>Lombardi A, et al.</i>	Characteristics of 1573 healthcare workers who underwent nasopharyngeal swab testing for SARS-CoV-2 in Milan, Lombardy, Italy	10.1016/j.cmi.2020.06.013	Original research	Do not present patient' underlying diseases
<i>Lu D, et al.</i>	Asymptomatic COVID-19 Infection in Late Pregnancy Indicated No Vertical Transmission	10.1002/jmv.25927	Original Article	Do not present patient' underlying diseases
<i>Lu L, et al.</i>	An evidence mapping and analysis of registered COVID-19 clinical trials in China	10.1186/s12916-020-01612-y	Original research	Do not present patient' underlying diseases
<i>Lu Y, et al.</i>	Clinical Characteristics and Radiological Features of Children Infected With the 2019 Novel Coronavirus	10.1016/j.crad.2020.04.010	Original Article	Do not present patient' underlying diseases
<i>Lüke et al.</i>	Coronavirus disease 2019 induces multi-lineage, morphologic changes in peripheral blood cells	10.1002/jha2.44	Original research	Do not present patient' underlying diseases
<i>Luo Y, et al.</i>	Investigation of COVID-19-related symptoms based on factor analysis	10.21037/apm-20-1113	Original research	Do not present patient' underlying diseases
<i>Ma H, et al.</i>	A Single-Center, Retrospective Study of COVID-19 Features in Children: A Descriptive Investigation	10.1186/s12916-020-01596-9	Original Article	Do not present patient' underlying diseases
<i>Manganotti P, et al.</i>	Miller Fisher syndrome diagnosis and treatment in a patient with SARS-CoV-2	10.1007/s13365-020-00858-9	Case Reports	Do not present patient' underlying diseases
<i>Mani NS, et al.</i>	Prevalence of COVID-19 Infection and Outcomes Among Symptomatic Healthcare Workers in Seattle, Washington	10.1093/cid/ciaa761	Original research	Do not present patient' underlying diseases
<i>Mao LJ, et al.</i>	A Child With Household Transmitted COVID-19	10.1186/s12879-020-05056-w	Case Reports	Do not present patient' underlying diseases
<i>Mapelli P, et al.</i>	Dual tracer 68Ga-DOTATOC and 18F-FDG PET/computed tomography radiomics in pancreatic neuroendocrine neoplasms: an endearing tool for preoperative risk assessment	10.1097/MNM.0000000000001236	Original research	Do not present patient' underlying diseases
<i>Masse S, et al.</i>	Epidemiology and Clinical Symptoms Related to Seasonal Coronavirus Identified in Patients with Acute Respiratory Infections Consulting in Primary Care over Six Influenza Seasons (2014-2020) in France	10.3390/v12060630	Original Article	Do not present patient' underlying diseases
<i>Mehta HB, et al.</i>	Characteristics of registered clinical trials assessing treatments for COVID-19: a cross-sectional analysis	10.1136/bmjopen-2020-039978	Original Article	Do not present patient' underlying diseases
<i>Meo SA, et al.</i>	Novel Coronavirus 2019-nCoV: Prevalence, Biological and Clinical Characteristics Comparison With SARS-CoV and MERS-CoV	10.26355/eurrev_202002_20379	Original Research	Do not present patient' underlying diseases
<i>Meyer B, et al.</i>	Validation of a commercially available SARS-CoV-2 serological immunoassay	10.1016/j.cmi.2020.06.024	Original Research	Do not present patient' underlying diseases
<i>Miller R & Englund K</i>	Clinical Presentation and Course of COVID-19	10.3949/cjcm.87a.ccc013	Brief Communication	Do not present patient' underlying diseases
<i>Mohammadi A, et al.</i>	Clinical and radiological characteristics of pediatric patients with COVID-19: focus on imaging findings	10.1007/s11604-020-01003-6	Original Article	Do not present patient' underlying diseases
<i>Mohr-Sasson A, et al.</i>	Laboratory characteristics of pregnant compared to non-pregnant women infected with SARS-CoV-2	10.1007/s00404-020-05655-7	Original research	Do not present patient' underlying diseases
<i>Mondejar-Lopez et al.</i>	Impact of SARS-CoV-2 infection in patients with cystic fibrosis in Spain: Incidence and results of the national CF-COVID19-Spain survey	10.1016/j.rmed.2020.106062	Original research	Do not present patient' underlying diseases
<i>Moro E, et al.</i>	The international European Academy of Neurology survey on neurological symptoms in patients with COVID-19 infection	10.1111/ene.14407	Original research	Do not present patient' underlying diseases
<i>Nasir UM, et al.</i>	The Role of Emergency Radiology in COVID-19: From Preparedness to Diagnosis	10.1177/0846537120916419	Original research	Do not present patient' underlying diseases
<i>Nguyen HT, et al.</i>	Fear of COVID-19 Scale—Associations of Its Scores with Health Literacy and Health-Related Behaviors among Medical Students	10.3390/ijerph17114164	Original research	Do not present patient' underlying diseases

<i>Nie S, et al.</i>	Coronavirus Disease 2019-related dyspnea cases difficult to interpret using chest computed tomography	10.1016/j.rmed.2020.105951	Case Reports	Do not present patient' underlying diseases
<i>Pan Y, et al.</i>	Epidemiological and Clinical Characteristics of 26 Asymptomatic Severe Acute Respiratory Syndrome Coronavirus 2 Carriers	10.1093/infdis/jiaa205	Original Article	Do not present patient' underlying diseases
<i>Pertile D, et al.</i>	The impact of COVID-19 pandemic on surgical residency programmes in Italy: a nationwide analysis on behalf of the Italian Polyspecialistic Young Surgeons Society (SPIGC)	10.1007/s13304-020-00811-9	Original research	Do not present patient' underlying diseases
<i>Petrescu AM, et al.</i>	Electroencephalogram (EEG) in COVID-19: A systematic retrospective study.	10.1016/j.jneuci.2020.06.001	Original Research	Do not present patient' underlying diseases
<i>Powell-Jackson T, et al.</i>	Infection Prevention and Control Compliance in Tanzanian Outpatient Facilities: A Cross-Sectional Study With Implications for the Control of COVID-19	10.1016/S2214-109X(20)30222-9	Original Research	Do not present patient' underlying diseases
<i>Pung R, et al.</i>	Investigation of three clusters of COVID-19 in Singapore: implications for surveillance and response measures	10.1016/S0140-6736(20)30528-6	Original research	Do not present patient' underlying diseases
<i>Qiao XM, et al.</i>	Re-positive Cases of Nucleic Acid Tests in Discharged Patients With COVID-19: A Follow-Up Study.	10.3389/fmed.2020.00349	Original Research	Do not present patient' underlying diseases
<i>Raciborski F, et al.</i>	Dynamics of the coronavirus disease 2019 outbreak in Poland: an epidemiological analysis of the first 2 months of the epidemic	10.20452/pamw.15430	Original research	Do not present patient' underlying diseases
<i>Ratnarathn AC, et al.</i>	Potential dual dengue and SARS-CoV-2 infection in Thailand: A case study	10.1016/j.heliyon.2020.e04175	Case Reports	Do not present patient' underlying diseases
<i>Roland LT, et al.</i>	Smell and taste symptom-based predictive model for COVID-19 diagnosis	10.1002/alr.22602	Original research	Do not present patient' underlying diseases
<i>Rosenberg ES, et al.</i>	Cumulative incidence and diagnosis of SARS-CoV-2 infection in New York	10.1016/j.annepidem.2020.06.004	Original Research	Do not present patient' underlying diseases
<i>Safari F, et al.</i>	B-cell Depleting Therapies May Affect Susceptibility to Acute Respiratory Illness Among Patients With Multiple Sclerosis During the Early COVID-19 Epidemic in Iran	10.1016/j.msard.2020.102195	Original Research	Do not present patient' underlying diseases
<i>Shabto JM, et al.</i>	Characteristics and outcomes of COVID-19 positive patients with diabetes managed as outpatients	10.1016/j.diabres.2020.108229	Original Research	Do not present patient' underlying diseases
<i>Shams SA, et al.</i>	Analyzing COVID-19 pandemic for unequal distribution of tests, identified cases, deaths, and fatality rates in the top 18 countries	10.1016/j.dsx.2020.06.051	Original Research	Do not present patient' underlying diseases
<i>Sharmeen S, et al.</i>	COVID-19 in rheumatic disease patients on immunosuppressive agents	10.1016/j.semarthrit.2020.05.010	Original research	Do not present patient' underlying diseases
<i>Sheikh JA, et al.</i>	Emerging Genetic Diversity Among Clinical Isolates of SARS-CoV-2: Lessons for Today	10.1016/j.meegid.2020.104330	Short communication	Do not present patient' underlying diseases
<i>Shen N, et al.</i>	Characteristics and diagnosis rate of 5630 subjects receiving SARS-CoV-2 nucleic acid tests from Wuhan, China	10.1172/jci.insight.137662	Original Article	Do not present patient' underlying diseases
<i>Shen Q, et al.</i>	Novel coronavirus infection in children outside of Wuhan, China	10.1002/ppul.24762	Original research	Do not present patient' underlying diseases
<i>Song J, et al.</i>	End-to-end automatic differentiation of the coronavirus disease 2019 (COVID-19) from viral pneumonia based on chest CT	10.1007/s00259-020-04929-1	Original research	Do not present patient' underlying diseases
<i>Su L, et al.</i>	The Different Clinical Characteristics of Corona Virus Disease Cases Between Children and Their Families in China - The Character of Children With COVID-19	10.1080/22221751.2020.1744483	Original research	Do not present patient' underlying diseases
<i>Sun JK, et al.</i>	Serum calcium as a biomarker of clinical severity and prognosis in patients with coronavirus disease 2019	10.18632/aging.103526	Original research	Do not present patient' underlying diseases
<i>Suso-Ribera C, et al.</i>	How Much Support Is There for the Recommendations Made to the General Population during Confinement? A Study during the First Three Days of the COVID-19 Quarantine in Spain	10.3390/jerph17124382	Original research	Do not present patient' underlying diseases
<i>Suwanwongse K & Shabarek N</i>	Fatal Outcome in a Kidney-Pancreas Transplant Recipient With COVID-19	10.7759/cureus.8691	Case Reports	Do not present patient' underlying diseases
<i>Takahashi N, et al.</i>	Clinical course of a critically ill patient with severe acute respiratory syndrome coronavirus 2 (SARS-CoV-2)	10.1007/s10047-020-01183-y	Case report	Do not present patient' underlying diseases
<i>Tan YP, et al.</i>	Epidemiologic and clinical characteristics of 10 children with coronavirus disease 2019 in Changsha, China	10.1016/j.jcv.2020.104353	Original research	Do not present patient' underlying diseases
<i>Thai PQ, et al.</i>	Factors associated with the duration of hospitalisation among COVID-19 patients in Vietnam: A survival analysis	10.1017/S0950268820001259	Original Article	Do not present patient' underlying diseases
<i>Tian H, et al.</i>	Case Report: Clinical Treatment of the First Critical Patient With Coronavirus Disease (COVID-19) in Liaocheng, Shandong Province	10.3389/fmed.2020.00249	Case Report	Do not present patient' underlying diseases
<i>Tian S, et al.</i>	Characteristics of COVID-19 Infection in Beijing	10.1016/j.jinf.2020.02.018	Original Research	Do not present patient' underlying diseases
<i>Toubiana J, et al.</i>	Kawasaki-like multisystem inflammatory syndrome in children during the covid-19 pandemic in Paris, France: prospective observational study	10.1136/bmj.m2094	Original research	Do not present patient' underlying diseases
<i>Van Houtven CH, et al.</i>	Essential Long-Term Care Workers Commonly Hold Second Jobs and Double- Or Triple-Duty Caregiving Roles	10.1111/jgs.16509	Brief Report	Do not present patient' underlying diseases

Viale G, et al.	Benefit Ratio Adaptation of Breast Cancer Care at the Epicenter of COVID-19 Outbreak	10.1634/theoncologist.2020-0316	Original research	Do not present patient' underlying diseases
Wang B, et al.	Implications of the lack of a unified research project framework: an investigation into the registration of clinical trials of COVID-19	10.1080/03007995.2020.1771294	Original research	Do not present patient' underlying diseases
Wang C, et al.	A Longitudinal Study on the Mental Health of General Population During the COVID-19 Epidemic in China	10.1016/j.bbi.2020.04.028	Original Research	Do not present patient' underlying diseases
Wang H, et al.	Characteristic CT Findings Distinguishing 2019 Novel Coronavirus Disease (COVID-19) From Influenza Pneumonia	10.1007/s00330-020-06880-z	Original Article	Do not present patient' underlying diseases
Wang J, et al.	CT characteristics of patients infected with 2019 novel coronavirus: association with clinical type	10.1016/j.crad.2020.04.001	Original research	Do not present patient' underlying diseases
Wang L, et al.	Quadruple Therapy for Asymptomatic COVID-19 Infection Patients	10.1080/14787210.2020.1758066	Original Research	Do not present patient' underlying diseases
Wei Y, et al.	Analysis of 2019 novel coronavirus infection and clinical characteristics of outpatients: An epidemiological study from a fever clinic in Wuhan, China	10.1002/jmv.26175	Original research	Do not present patient' underlying diseases
Wood et al.	Outcomes of a Rapid Adolescent Telehealth Scale-Up During the COVID-19 Pandemic	10.1016/j.jadohealth.2020.05.025	Original research	Do not present patient' underlying diseases
Wu C, et al.	Clinical Manifestation and Laboratory Characteristics of SARS-CoV-2 Infection in Pregnant Women	10.1007/s12250-020-00227-0	Research Article	Do not present patient' underlying diseases
Wu H, et al.	Clinical and Immune Features of Hospitalized Pediatric Patients With Coronavirus Disease 2019 (COVID-19) in Wuhan, China	10.1001/jamanetworkopen.2020.10895	Original research	Do not present patient' underlying diseases
Wu J, et al.	Identification of RT-PCR-Negative Asymptomatic COVID-19 Patients via Serological Testing	10.3389/fpubh.2020.00267	Case Reports	Do not present patient' underlying diseases
Wu P et al.	Characteristics of Ocular Findings of Patients With Coronavirus Disease 2019 (COVID-19) in Hubei Province, China	10.1001/jamaophthalmol.2020.1291	Original research	Do not present patient' underlying diseases
Wu Y, et al.	Relationship between ABO blood group distribution and clinical characteristics in patients with COVID-19	10.1016/j.cca.2020.06.026	Original research	Do not present patient' underlying diseases
Xia W, et al.	Clinical and CT Features in Pediatric Patients With COVID-19 Infection: Different Points From Adults	10.1002/ppul.24718	Original Research	Do not present patient' underlying diseases
Xiao AT, et al.	Dynamic profile of RT-PCR findings from 301 COVID-19 patients in Wuhan, China	10.1016/j.jcv.2020.104346	Original research	Do not present patient' underlying diseases
Xiao M, et al.	Multiple approaches for massively parallel sequencing of SARS-CoV-2 genomes directly from clinical samples	10.1186/s13073-020-00751-4	Original Research	Do not present patient' underlying diseases
Xie C, et al.	Comparison of Different Samples for 2019 Novel Coronavirus Detection by Nucleic Acid Amplification Tests	10.1016/j.ijid.2020.02.050	Original Research	Do not present patient' underlying diseases
Xu et al.	A Deep Learning System to Screen Novel Coronavirus Disease 2019 Pneumonia	10.1016/j.eng.2020.04.010	Original research	Do not present patient' underlying diseases
Xu Y, et al.	Clinical and Computed Tomographic Imaging Features of Novel Coronavirus Pneumonia Caused by SARS-CoV-2	10.1016/j.jinf.2020.02.017	Original Research	Do not present patient' underlying diseases
Xu Y, et al.	Characteristics of pediatric SARS-CoV-2 infection and potential evidence for persistent fecal viral shedding	10.1038/s41591-020-0817-4	Original research	Do not present patient' underlying diseases
Yan J, et al.	Coronavirus Disease 2019 in Pregnant Women: A Report Based on 116 Cases	10.1016/j.ajog.2020.04.014	Original Article	Do not present patient' underlying diseases
Ye G, et al.	Clinical characteristics of severe acute respiratory syndrome coronavirus 2 reactivation.	10.1016/j.jinf.2020.03.001	Research Article	Do not present patient' underlying diseases
Yin S, et al.	The Implications of Preliminary Screening and Diagnosis: Clinical Characteristics of 33 Mild Patients With SARS-CoV-2 Infection in Hunan, China	10.1016/j.jcv.2020.104397	Original Research	Do not present patient' underlying diseases
Yuan B, et al.	Correlation between immune response and self-reported depression during convalescence from COVID-19	10.1016/j.bbi.2020.05.062	Original research	Do not present patient' underlying diseases
Yue H, et al.	The epidemiology and clinical characteristics of co-infection of SARS-CoV-2 and influenza viruses in patients during COVID-19 outbreak	10.1002/jmv.26163	Original Article	Do not present patient' underlying diseases
Zhang & Huang	Clinical Features of 33 Cases in Children Infected With SARS-CoV-2 in Anhui Province, China-A Multi-Center Retrospective Cohort Study	10.3389/fpubh.2020.00255	Original Research	Do not present patient' underlying diseases
Zhang G, et al.	Analysis of clinical characteristics and laboratory findings of 95 cases of 2019 novel coronavirus pneumonia in Wuhan, China: a retrospective analysis	10.1186/s12931-020-01338-8	Original Research	Do not present patient' underlying diseases
Zhang H, et al.	Clinical Characteristics of 194 Cases of COVID-19 in Huanggang and Talian, China	10.1007/s15010-020-01440-5	Original Article	Do not present patient' underlying diseases
Zhang S, et al.	High-resolution CT Features of 17 Cases of Corona Virus Disease 2019 in Sichuan Province, China	10.1183/13993003.00334-2020	Original Research	Do not present patient' underlying diseases
Zhang T, et al.	Detectable SARS-CoV-2 Viral RNA in Feces of Three Children During Recovery Period of COVID-19 Pneumonia	10.1002/jmv.25795	Original Research	Do not present patient' underlying diseases

Zhao W, et al.	Characteristics of Children With Reactivation of SARS-CoV-2 Infection After Hospital Discharge	10.1177/0009922820928057	Original research	Do not present patient' underlying diseases
Zheng G, et al.	Clinical characteristics of acute respiratory syndrome with SARS-CoV-2 infection in children in South China	10.1002/ppul.24921	Original research	Do not present patient' underlying diseases
Zheng T, et al.	Clinical characteristics and outcomes of COVID-19 patients with gastrointestinal symptoms admitted to Jiangnan Fangcang Shelter Hospital in Wuhan, China	10.1002/jmv.26146	Original Article	Do not present patient' underlying diseases
Zheng Y, et al.	The hemocyte counts as a potential biomarker for predicting disease progression in COVID-19: a retrospective study	10.1515/cdm-2020-0377	Original Article	Do not present patient' underlying diseases
Zhong ZF, et al.	Epidemiological and clinical characteristics of COVID-19 patients in Hengyang, Hunan Province, China	10.12998/wjcc.v8.i12.2554	Original Research	Do not present patient' underlying diseases
Zhou B, et al.	The Duration of Viral Shedding of Discharged Patients With Severe COVID-19	10.1093/cid/ciaa451	Original Research	Do not present patient' underlying diseases
Zhou C, et al.	Predictive factors of severe coronavirus disease 2019 in previously healthy young adults: a single-center, retrospective study	10.1186/s12931-020-01412-1	Original research	Do not present patient' underlying diseases
Zhou H et al.	Coronavirus disease 2019 (COVID-19): chest CT characteristics benefit to early disease recognition and patient classification-a single center experience	10.21037/atm-20-2119a	Original research	Do not present patient' underlying diseases
Zhou Y, et al.	Cohort study of chest CT and clinical changes in 29 patients with coronavirus disease 2019 (COVID-19)	10.1007/s00330-020-07007-0	Original research	Do not present patient' underlying diseases
Zhou Y, et al.	Risk Factors Associated With Disease Progression in a Cohort of Patients Infected With the 2019 Novel Coronavirus	10.21037/apm.2020.03.26	Original Research	Do not present patient' underlying diseases
Zhu L, et al.	Clinical characteristics of a case series of children with coronavirus disease 2019	10.1002/ppul.24767	Original research	Do not present patient' underlying diseases
Zhu L, et al.	Successful Recovery of COVID-19 Pneumonia in a Renal Transplant Recipient With Long-Term Immunosuppression	10.1111/ajt.15869	Original Research	Do not present patient' underlying diseases
Zhuang SF, et al.	Low-grade fever during COVID-19 convalescence: A report of 3 cases	10.12998/wjcc.v8.i12.2655	Case Reports	Do not present patient' underlying diseases
Zu ZY, et al.	Coronavirus Disease 2019 (COVID-19): A Perspective From China	10.1148/radiol.2020200490	Original Research	Do not present patient' underlying diseases
Chen X, et al.	Dynamic Chest CT Evaluation in Three Cases of 2019 Novel Coronavirus Pneumonia.	10.34172/aim.2020.11	Original research	Full text not available
Bai K, et al.	Clinical Analysis of 25 Novel Coronavirus Infections in Children	10.1097/INF.00000000000002740	Original research	Full text not available
Bryant JE, et al.	Serology for SARS-CoV-2: Apprehensions, opportunities, and the path forward	10.1126/sciimmunol.abc6347	Original research	Full text not available
Du W, et al.	Clinical Characteristics of COVID-19 in Children Compared With Adults in Shandong Province, China	10.1007/s15010-020-01427-2	Original research	Full text not available
Han C, et al.	Digestive Symptoms in COVID-19 Patients With Mild Disease Severity: Clinical Presentation, Stool Viral RNA Testing, and Outcomes	10.14309/ajg.0000000000000664	Original research	Full text not available
Lu Y, et al.	Symptomatic Infection Is Associated With Prolonged Duration of Viral Shedding in Mild Coronavirus Disease 2019: A Retrospective Study of 110 Children in Wuhan	10.1097/INF.00000000000002729	Original research	Full text not available
Mi B, et al.	Characteristics and Early Prognosis of COVID-19 Infection in Fracture Patients	10.2106/BJS.20.00390	Original research	Full text not available
Mishra V, et al.	COVID-19-Hospitalized Patients in Karnataka: Survival and Stay Characteristics	10.4103/ijph.IJPH_486_20	Original research	Full text not available
Peng L, et al.	Improved Early Recognition of Coronavirus Disease-2019 (COVID-19): Single-Center Data From a Shanghai Screening Hospital	10.34172/aim.2020.10	Original research	Full text not available
Qian G, et al.	Epidemiologic and Clinical Characteristics of 91 Hospitalized Patients With COVID-19 in Zhejiang, China: A Retrospective, Multi-Centre Case Series	10.1093/qjmed/hcaa089	Original research	Full text not available
Qiu L, et al.	A Typical Case of Critically Ill Infant of Coronavirus Disease 2019 With Persistent Reduction of T Lymphocytes	10.1097/INF.00000000000002720	Original research	Full text not available
Yang P, et al.	Clinical Characteristics and Risk Assessment of Newborns Born to Mothers With COVID-19	10.1016/j.jcv.2020.104356	Original research	Full text not available
Zheng Y, et al.	Epidemiological Characteristics and Clinical Features of 32 Critical and 67 Noncritical Cases of COVID-19 in Chengdu	10.1016/j.jcv.2020.104366	Original research	Full text not available
-	Expert consensus for bronchoscopy during the epidemic of 2019 novel coronavirus infection (Trial version)	10.3760/cma.j.issn.1001-0939.2020.03.012	Original research	Full text available only in Chinese
-	An update on the epidemiological characteristics of novel coronavirus pneumonia (COVID-19)	10.3760/cma.j.issn.0254-6450.2020.02.002	Original research	Full text available only in Chinese
Bai SL, et al.	Analysis of the first cluster of cases in a family of novel coronavirus pneumonia in Gansu Province	10.3760/cma.j.issn.0253-9624.2020.0005	Original research	Full text available only in Chinese

<i>Cao L, et al.</i>	A preliminary investigation on the serological and epidemiological characteristics of severe acute respiratory syndrome in children	PMID: 15631713	Original research	Full text available only in Chinese
<i>Chen L, et al.</i>	Analysis of clinical features of 29 patients with 2019 novel coronavirus pneumonia	10.3760/cma.j.issn.1001-0939.2020.0005	Original research	Full text available only in Chinese
<i>Chen S, et al.</i>	Pregnant women with new coronavirus infection: a clinical characteristics and placental pathological analysis of three cases	10.3760/cma.j.cn112151-20200225-00138	Original research	Full text available only in Chinese
<i>Chen XB, et al.</i>	Retrospective Analysis of 61 Cases of Children Died of Viral Pneumonia	10.12116/j.issn.1004-5619.2020.02.002	Original research	Full text available only in Chinese
<i>Cucchiari D, et al.</i>	Pneumococcal superinfection in COVID-19 patients: A series of 5 cases	10.1016/j.medcli.2020.05.022	Case Reports	Full text available only in Spanish
<i>Dong XC, et al.</i>	Epidemiological Characteristics of Confirmed COVID-19 Cases in Tianjin	10.3760/cma.j.cn112338-20200221-00146	Original research	Full text available only in Chinese
<i>Feng K, et al.</i>	Analysis of CT features of 15 Children with 2019 novel coronavirus infection	10.3760/cma.j.issn.0578-1310.2020.0007	Original research	Full text available only in Chinese
<i>Fuentes B, et al.</i>	Impact of the COVID-19 pandemic on the organisation of stroke care.	10.1016/j.nrl.2020.05.007	Original research	Full text available only in Spanish
<i>Gao ZC</i>	Efficient management of novel coronavirus pneumonia by efficient prevention and control in scientific manner	10.3760/cma.issn.1001-0939.2020.03.002	Original research	Full text available only in Chinese
<i>Gong et al.</i>	Experimental study and reflection on peacetime and wartime reconstruction of large general hospitals in public health emergencies	10.11817/j.issn.1672-7347.2020.200401	Original research	Full text available only in Chinese
<i>Gou FX, et al.</i>	Epidemiological Characteristics of COVID-19 in Gansu Province	10.3760/cma.j.cn112338-20200229-00216	Original research	Full text available only in Chinese
<i>Gu M, et al.</i>	Analysis of property and efficacy of traditional Chinese medicine in staging revention and treatment of coronavirus disease 2019	10.19540/j.cnki.cjmm.20200225.501	Original research	Full text available only in Chinese
<i>Guan Q, et al.</i>	Epidemiological investigation of a family clustering of COVID-19	10.3760/cma.j.cn112338-20200223-00152	Original research	Full text available only in Chinese
<i>He XW et al.</i>	Impact of complicated myocardial injury on the clinical outcome of severe or critically ill COVID-19 patients	10.3760/cma.j.cn112148-20200228-00137	Original research	Full text available only in Chinese
<i>Hu ZB & Ci C</i>	Screening and management of asymptomatic infection of coronavirus disease 2019 (COVID-19)	10.3760/cma.j.cn112150-20200229-00220	Original research	Full text available only in Chinese
<i>Jiang et al.</i>	Psychological status of the staff in a general hospital during the outbreak of coronavirus disease 2019 and its influential factors	10.11817/j.issn.1672-7347.2020.200190	Original research	Full text available only in Chinese
<i>Lara Álvarez MÁ, et al.</i>	COVID-19 mortality in cancer patients in a Madrid hospital during the first 3 weeks of the epidemic	10.1016/j.medcli.2020.05.005	Original research	Full text available only in Spanish
<i>Li CX, et al.</i>	Clinical Study and CT Findings of a Familial Cluster of Pneumonia with Coronavirus Disease 2019 (COVID-19)	10.12182/20200360107	Original research	Full text available only in Chinese
<i>Li et al.</i>	Clinical characteristics, diagnosis and treatment strategies	10.11817/j.issn.1672-7347.2020.200264	Original research	Full text available only in Chinese
<i>Li XQ, et al.</i>	Comparison of Epidemic Characteristics Between SARS in 2003 and COVID-19 in 2020 in Guangzhou	10.3760/cma.j.cn112338-20200228-00209	Original research	Full text available only in Chinese
<i>Li YY, et al.</i>	Comparison of the clinical characteristics between RNA positive and negative patients clinically diagnosed with 2019 novel coronavirus pneumonia	10.3760/cma.j.cn112147-20200214-00095	Original research	Full text available only in Chinese
<i>Liu BL, et al.</i>	Health management of breast cancer patients outside the hospital during the outbreak of 2019 novel coronavirus disease	10.3760/cma.j.cn112152-20200221-00110	Original research	Full text available only in Chinese
<i>Liu C, et al.</i>	Preliminary study of the relationship between novel coronavirus pneumonia and liver function damage: a multicenter study	10.3760/cma.j.issn.1007-3418.2020.02.003	Original research	Full text available only in Chinese
<i>Liu et al.</i>	Relation between blood glucose and the prognosis of severe coronavirus disease 2019	10.11817/j.issn.1672-7347.2020.200182	Original research	Full text available only in Chinese
<i>Liu M, et al.</i>	Clinical characteristics of 30 medical workers infected with new coronavirus pneumonia	10.3760/cma.j.issn.1001-0939.2020.03.014	Original research	Full text available only in Chinese
<i>Liu RR, et al.</i>	CT imaging analysis of 33 cases with the 2019 novel coronavirus infection	10.3760/cma.j.cn112137-20200203-00182	Original research	Full text available only in Chinese
<i>López-Bravo A, et al.</i>	Impact of the COVID-19 pandemic on headache management in Spain: an analysis of the current situation and future perspectives	10.1016/j.nrl.2020.05.006	Original research	Full text available only in Spanish
<i>Ma FH, et al.</i>	Surgical treatment strategy for digestive system malignancies during the outbreak of novel coronavirus pneumonia	10.3760/cma.j.cn112152-20200223-00117	Original research	Full text available only in Chinese
<i>Mao DM, et al.</i>	Guide to the Forensic Pathology Practice on Death Cases Related to Corona Virus Disease 2019 (COVID-19)	10.12116/j.issn.1004-5619.2020.01.003	Original research	Full text available only in Chinese
<i>Mei H & Hu Y</i>	Characteristics, causes, diagnosis and treatment of coagulation dysfunction in patients with COVID-19	10.3760/cma.j.issn.0253-2727.2020.0002	Original research	Full text available only in Chinese

Peng YD, et al.	Clinical characteristics and outcomes of 112 cardiovascular disease patients infected by 2019-nCoV	10.3760/cma.j.cn112148-20200220-00105	Original research	Full text available only in Chinese
Qian ZP, et al.	Analysis of baseline liver biochemical parameters in 324 cases with novel coronavirus pneumonia in Shanghai area	10.3760/cma.j.cn501113-20200229-00076	Original research	Full text available only in Chinese
Ren YH, et al.	When COVID-19 encounters interstitial lung disease: challenges and management	10.3760/cma.j.cn112147-20200315-00339	Original research	Full text available only in Chinese
Rodríguez A, et al.	Severe infection due to the SARS-CoV-2 coronavirus: Experience of a tertiary hospital with COVID-19 patients during the 2020 pandemic	10.1016/j.medin.2020.05.018	Original research	Full text available only in Spanish
Shi Y, et al.	Progress and challenge of vaccine development against 2019 novel coronavirus (2019-nCoV)	10.3760/cma.j.cn112150-20200317-00366	Original research	Full text available only in Chinese
Sun C, et al.	Clinical analysis of 150 cases of 2019 novel coronavirus infection in Nanyang City, Henan Province	10.3760/cma.j.cn112147-20200224-00168	Original research	Full text available only in Chinese
Wang et al.	Clinical characteristics and the risk factors for severe events of elderly coronavirus disease 2019 patients	10.11817/j.issn.1672-7347.2020.200292	Original research	Full text available only in Chinese
Wang J, et al.	Dynamic changes of chest CT imaging in patients with corona virus disease-19 (COVID-19)	PMID: 32096366	Original research	Full text available only in Chinese
Wang XF, et al.	Clinical and epidemiological characteristics of 34 children with 2019 novel coronavirus infection in Shenzhen	10.3760/cma.j.issn.0578-1310.2020.0008	Original research - Retracted	Full text available only in Chinese
Wen et al.	Clinical characteristics of coronavirus disease 2019 patients complicated with liver injury	10.11817/j.issn.1672-7347.2020.200225	Original research	Full text available only in Chinese
Wu J, et al.	Novel coronavirus pneumonia (COVID-19) CT distribution and sign features	10.3760/cma.j.cn112147-20200217-00106	Original research	Full text available only in Chinese
Wu WS, et al.	Investigation and Analysis on Characteristics of a Cluster of COVID-19 Associated With Exposure in a Department Store in Tianjin	10.3760/cma.j.cn112338-20200221-00139	Original research	Full text available only in Chinese
Yang HY, et al.	The preliminary analysis on the characteristics of the cluster for the Corona Virus Disease	10.3760/cma.j.cn112338-20200223-00153	Original research	Full text available only in Chinese
Yao N, et al.	Clinical characteristics and influencing factors of patients with novel coronavirus pneumonia combined with liver injury in Shaanxi region	10.3760/cma.j.cn501113-20200226-00070	Original research	Full text available only in Chinese
Yao XH, et al.	A pathological report of three COVID-19 cases by minimally invasive autopsies	10.3760/cma.j.cn112151-20200312-00193	Original research	Full text available only in Chinese
Zhang H, et al.	Lowering the intraocular pressure by a combination of timolol with adrenergic agents	10.1016/j.euro.2020.03.030	Original research	Full text available only in German
Zhang J, et al.	Management strategies for patients with gynecological malignancies during the outbreak of COVID19	10.3760/cma.j.cn112141-20200302-00168	Original research	Full text available only in Chinese
Zhang MQ, et al.	Clinical features of 2019 novel coronavirus pneumonia in the early stage from a fever clinic in Beijing	10.3760/cma.j.issn.1001-0939.2020.03.015	Original research	Full text available only in Chinese
Zhang T, et al.	Comparison of clinical and pathological features between severe acute respiratory syndrome and coronavirus disease 2019	10.3760/cma.j.cn112147-20200311-00312	Original research	Full text available only in Chinese
Zhang Y, et al.	Clinical and Coagulation Characteristics of 7 Patients With Critical COVID-2019 Pneumonia and Acro-Ischemia	10.3760/cma.j.issn.0253-2727.2020.0006	Original research	Full text available only in Chinese
Zhao L, et al.	The treatment proposal for the patients with breast diseases in the central epidemic area of 2019 coronavirus disease	10.3760/cma.j.cn112139-20200221-00116	Original research	Full text available only in Chinese
Zhang Q, et al.	CT imaging features of patients with different clinical types of coronavirus disease 2019 (COVID-19)	PMID: 32207591	Original research	Full text available only in Chinese
Zhonghua et al.	The epidemiological characteristics of an outbreak of 2019 novel coronavirus diseases (COVID-19) in China	10.3760/cma.j.issn.0254-6450.2020.02.003	Original research	Full text available only in Chinese
Zhou et al.	Clinical characteristics of 16 patients with fecal severe acute respiratory syndrome coronavirus 2 nucleic acid-positive	10.11817/j.issn.1672-7347.2020.200230	Original research	Full text available only in Chinese
Zhou L, et al.	Early detection and disease assessment of patients with novel coronavirus pneumonia	10.3760/cma.j.issn.1001-0939.2020.03.003	Original research	Full text available only in Chinese
Zhou L, et al.	Cause analysis and treatment strategies of "recurrence" with novel coronavirus pneumonia (covid-19) patients after discharge from hospital	10.3760/cma.j.cn112147-20200229-00219	Original research	Full text available only in Chinese
Zhu ZW, et al.	Comparison of heart failure and 2019 novel coronavirus pneumonia in chest CT features and clinical characteristics	10.3760/cma.j.cn112148-20200218-00093	Original research	Full text available only in Chinese
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Aaby P, et al.	The non-specific and sex-differential effects of vaccines	10.1038/s41577-020-0338-x	Review	
Aardema F.	COVID-19, obsessive-compulsive disorder and invisible life forms that threaten the self	10.1016/j.jocrd.2020.100558	Short communication	

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<i>Alanagreh L, et al.</i>	The Human Coronavirus Disease COVID-19: Its Origin, Characteristics, and Insights into Potential Drugs and Its Mechanisms.	10.3390/pathogens9050331	Review
<i>Aledo-Serrano Á, et al.</i>	Genetic epilepsies and COVID-19 pandemic: Lessons from the caregiver perspective	10.1111/epi.16537	Letter
<i>Allam M, et al.</i>	COVID-19 Diagnostics, Tools, and Prevention	10.3390/diagnostics10060409	Review
<i>Alramthan & Aldaraji</i>	A Case of COVID-19 Presenting in Clinical Picture Resembling Chilblains Disease. First Report From the Middle East	10.1111/ced.14243	Correspondence
<i>Altuntas Aydin O, et al.</i>	HIV/SARS-CoV-2 co-infected patients in Istanbul, Turkey	10.1002/jmv.25955	Letter to the editor
<i>Aly MH, et al.</i>	Indicators of Critical Illness and Predictors of Mortality in COVID-19 Patients	10.2147/IDR.S261159	Review
<i>Ambrosi P, et al.</i>	Epidemiological and clinical characteristics of heart transplant recipients during the 2019 coronavirus outbreak in Wuhan, China	10.1016/j.healun.2020.04.002	Comment
<i>Andrenelli E, et al.</i>	International Multiprofessional Steering Committee of Cochrane Rehabilitation REH-COVER action. Systematic rapid living review on rehabilitation needs due to COVID-19	10.23736/S1973-9087.20.06435-7	Review
<i>Antwi-Amoabeng D, et al.</i>	Clinical outcomes in COVID-19 patients treated with tocilizumab: An individual patient data systematic review	10.1002/jmv.26038	Review
<i>Balachandrar V, et al.</i>	Follow-up studies in COVID-19 recovered patients - is it mandatory?	10.1016/j.scitotenv.2020.139021	Review
<i>Baldotto C, et al.</i>	Lung Cancer and the COVID-19 pandemic: Recommendations from the Brazilian Thoracic Oncology Group	10.6061/clinics/2020/e2060	Review
<i>Bao J, et al.</i>	Comparative analysis of laboratory indexes of severe and non-severe patients infected with COVID-19	10.1016/j.cca.2020.06.009	Review
<i>Barzegar M, et al.</i>	Characteristics of COVID-19 disease in multiple sclerosis patients	10.1016/j.msard.2020.102276	Correspondence
<i>Bhanushali P, et al.</i>	COVID-19: Changing Trends and Its Impact on Future of Dentistry	10.1155/2020/8817424	Review
<i>Blasco ML, et al.</i>	Co-detection of Respiratory Pathogens in Patients Hospitalized With Coronavirus Viral disease-2019 Pneumonia	10.1002/jmv.25922	Letter to the editor
<i>Balay H, et al.</i>	COVID-19 is a Real Headache!	10.1111/head.13856	Views and Perspectives
<i>Bulut Ö & Gürsel İ</i>	Mesenchymal stem cell derived extracellular vesicles: promising immunomodulators against autoimmune, autoinflammatory disorders and SARS-CoV-2 infection	10.3906/biy-2002-79	Review
<i>Cai Q & Chen J</i>	Reply to "Clinical Characteristics of COVID-19 Patients With Abnormal Liver Tests"	10.1016/j.jhep.2020.04.042	Letter to the editor
<i>Cao Q, et al.</i>	SARS-CoV-2 infection in children: Transmission dynamics and clinical characteristics	10.1016/j.jfma.2020.02.009	Comment
<i>Carneiro A, et al.</i>	Impact of the COVID-19 Pandemic on the Urologist's Clinical Practice in Brazil: A Management Guideline Proposal for Low- And Middle-Income Countries During the Crisis Period	10.1590/S1677-5538.IBJU.2020.04.03	Letter to the editor
<i>Cevik M, et al.</i>	COVID-19 pandemic - A focused review for clinicians.	10.1016/j.cmi.2020.04.023	Review
<i>Chakraborty S & Basu A</i>	The COVID-19 pandemic: catching up with the cataclysm	10.12688/f1000research.24963.1	Review
<i>Chambers CD, et al.</i>	Evaluation of SARS-CoV-2 in Breastmilk from 18 Infected Women	10.1101/2020.06.12.20127944	Preprint
<i>Chang TH, et al.</i>	Clinical characteristics and diagnostic challenges of pediatric COVID-19: A systematic review and meta-analysis.	10.1016/j.jfma.2020.04.007	Systematic Review
<i>Chen ATC, et al.</i>	Clinical Characteristics of Covid-19 in China	10.1056/NEJMc2005203#sa2	Comment
<i>Chen F, et al.</i>	Clinical characteristics and risk factors for mortality among inpatients with COVID-19 in Wuhan, China	10.1002/ctm2.40	Letter to the Editor
<i>Chen H, et al.</i>	Clinical and imaging features of COVID-19	10.1016/j.jrid.2020.04.003	Review
<i>Chen J, et al.</i>	COVID-19 infection: the China and Italy perspectives	10.1038/s41419-020-2603-0	Review
<i>Chen L, et al.</i>	Clinical Characteristics of Pregnant Women with Covid-19 in Wuhan, China	10.1056/NEJMc2009226	Correspondence

<i>Chen P & Zhou B</i>	Clinical Characteristics of COVID-19 in Patients With Liver Injury	10.1016/j.cgh.2020.04.043	Letter to the editor
<i>Chen P, et al.</i>	Clinical characteristics of COVID-19 patients with abnormal liver tests	10.1016/j.jhep.2020.04.028	Letter to the editor
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<i>Cheng F, et al.</i>	COVID-19 treatment: Combining anti-inflammatory and antiviral therapeutics using a network-based approach	10.3949/ccjm.87a.ccc037	Review
<i>Cheng Q, et al.</i>	Infectivity of human coronavirus in the brain	10.1016/j.ebiom.2020.102799	Review
<i>Corona G, et al.</i>	SARS-CoV-2 infection, male fertility and sperm cryopreservation: a position statement of the Italian Society of Andrology and Sexual Medicine (SIAMS)	10.1007/s40618-020-01290-w	Review
<i>Conroy ML, et al.</i>	The COVID-19 AAGP Online Trainee Curriculum: Development and Method of Initial Evaluation	10.1016/j.jagp.2020.06.003	Brief Report
<i>Damle B, et al.</i>	Clinical Pharmacology Perspectives on the Antiviral Activity of Azithromycin and Use in COVID-19	10.1002/cpt.1857	Review
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<i>Davanzo R, et al.</i>	Breastfeeding and Coronavirus Disease-2019. Ad interim indications of the Italian Society of Neonatology endorsed by the Union of European Neonatal & Perinatal Societies	10.1111/mcn.13010	Review
<i>de Souza TH, et al.</i>	Clinical manifestations of children with COVID-19: A systematic review	10.1002/ppul.24885	Review
<i>Deeks et al.</i>	Antibody tests for identification of current and past infection with SARS-CoV-2	10.1002/14651858.CD013652	Review
<i>Dehghanbanadaki et al.</i>	Bibliometric Analysis of Global Scientific Research on SARS CoV-2 (COVID-19)	10.34171/mjiri.34.51	Review
<i>Deng SQ & Peng HJ</i>	Characteristics of and Public Health Responses to the Coronavirus Disease 2019 Outbreak in China.	10.3390/jcm9020575	Review
<i>Dickinson & Gronseth</i>	Application of Universal Design for Learning (UDL) Principles to Surgical Education During the COVID-19 Pandemic	10.1016/j.jsurg.2020.06.005	Review
<i>Docampo-Simón A, et al.</i>	Are chilblain-like acral skin lesions really indicative of COVID-19? A prospective study and literature review	10.1111/jdv.16665	Review
<i>D'Silva KM, et al.</i>	Response to: 'COVID-19 in patients with rheumatological diseases treated with Anti-TNF' by Brito et al and 'Clinical characteristics and outcomes of patients with COVID-19 and rheumatic disease in China 'hot spot' versus in US 'hot spot': similarities and differences' by Zhao et al.	10.1136/annrheumdis-2020-218196	Correspondence
<i>Du YX & Chen XP</i>	Favipiravir: pharmacokinetics and concerns about clinical trials for 2019-nCoV infection	10.1002/cpt.1844	Review
<i>Duan YN, et al.</i>	CT features of novel coronavirus pneumonia (COVID-19) in children	10.1007/s00330-020-06860-3	Review
<i>Ebrahim SH, et al.</i>	All Hands on Deck: A synchronized whole-of-world approach for COVID-19 mitigation	10.1016/j.ijid.2020.06.049	Perspective
<i>Elberry MH, et al.</i>	Occult SARS-CoV-2 infection; a possible hypothesis for viral relapse	10.1016/j.mehy.2020.109980	Letter to the editor
<i>Emami A, et al.</i>	Prevalence of Underlying Diseases in Hospitalized Patients With COVID-19: A Systematic Review and Meta-Analysis	PMID: 32232218	Review
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<i>Farsalinos K, et al.</i>	Systematic review of the prevalence of current smoking among hospitalized COVID-19 patients in China: could nicotine be a therapeutic option?	10.1007/s11739-020-02355-7	Systematic review
<i>Feng G, et al.</i>	COVID-19 and Liver Dysfunction: Current Insights and Emergent Therapeutic Strategies	10.14218/ICTH.2020.00018	Review
<i>Fidahic M, et al.</i>	Research methodology and characteristics of journal articles with original data, preprint articles and registered clinical trial protocols about COVID-19	10.1186/s12874-020-01047-2	Review
<i>Fiorillo L, et al.</i>	COVID-19 Surface Persistence: A Recent Data Summary and Its Importance for Medical and Dental Settings.	10.3390/jerph17093132	Review
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<i>Galbadage T, et al.</i>	Systematic Review and Meta-Analysis of Sex-Specific COVID-19 Clinical Outcomes	10.3389/fmed.2020.00348	Systematic Review
<i>Garcia IG, et al.</i>	A randomized multicenter clinical trial to evaluate the efficacy of melatonin in the prophylaxis of SARS-CoV-2 infection in high-risk contacts (MeCOVID Trial): A structured summary of a study protocol for a randomised controlled trial	10.1186/s13063-020-04436-6	Letter

<i>Garg S, et al.</i>	Hospitalization Rates and Characteristics of Patients Hospitalized With Laboratory-Confirmed Coronavirus Disease 2019 - COVID-NET, 14 States, March 1-30, 2020	10.15585/mmwr.mm6915e3	CDC Report
<i>Ge H, et al.</i>	The epidemiology and clinical information about COVID-19	10.1007/s10096-020-03874-z	Review
<i>Gebhard C, et al.</i>	Impact of sex and gender on COVID-19 outcomes in Europe	10.1186/s13293-020-00304-9	Review
<i>Giuliani J. & Bonetti A</i>	Cancer prevales on COVID-19: To maintain high quality standard concerning diagnosis and oncological care even during a pandemic	10.1002/jmv.26190	Letter to the editor
<i>Gopinathannair R, et al.</i>	COVID-19 and cardiac arrhythmias: a global perspective on arrhythmia characteristics and management strategies	10.1007/s10840-020-00789-9	Multimedia Report
<i>Goyal P, et al.</i>	Clinical Characteristics of Covid-19 in New York City	10.1056/NEJMc2010419	Letter to the editor
<i>Griffiths G, et al.</i>	AGILE-ACCORD: A Randomized, Multicentre, Seamless, Adaptive Phase I/II Platform Study to Determine the Optimal Dose, Safety and Efficacy of Multiple Candidate Agents for the Treatment of COVID-19: A structured summary of a study protocol for a randomised platform trial	10.1186/s13063-020-04473-1	Letter
<i>Guan WJ & Zhong NS</i>	Clinical Characteristics of Covid-19 in China. Reply	10.1056/NEJMc2005203	Comment
<i>Guo G, et al.</i>	New Insights of Emerging SARS-CoV-2: Epidemiology, Etiology, Clinical Features, Clinical Treatment, and Prevention	10.3389/fcell.2020.00410	Review
<i>Guo YR, et al.</i>	The origin, transmission and clinical therapies on coronavirus disease 2019 (COVID-19) outbreak - an update on the status	10.1186/s40779-020-00240-0	Review
<i>Han Q, et al.</i>	Coronavirus 2019-nCoV: A brief perspective from the front line.	10.1016/j.jinf.2020.02.010	Review
<i>Haydar A, et al.</i>	Palliative Care Utilization Among Patients With COVID-19 in an Underserved Population: A Single-Center Retrospective Study	10.1016/j.jpainsymman.2020.05.022	Comment
<i>He Y, et al.</i>	Chinese Society of Anesthesiology Expert Consensus on Anesthetic Management of Cardiac Surgical Patients With Suspected or Confirmed Coronavirus Disease 2019	10.1053/j.jvca.2020.03.026	Comment
<i>Henry BM & Vikse J</i>	Clinical Characteristics of Covid-19 in China	10.1056/NEJMc2005203	Comment
<i>Hong H, et al.</i>	Clinical Characteristics of Novel Coronavirus Disease 2019 (COVID-19) in Newborns, Infants and Children	10.1016/j.pedneo.2020.03.001	Comment
<i>Hu Y, et al.</i>	Prevalence and severity of corona virus disease 2019 (COVID-19): A systematic review and meta-analysis	10.1016/j.jcv.2020.104371	Review
<i>Huang B, et al.</i>	Characteristics of the Coronavirus Disease 2019 and related Therapeutic Options	10.1016/j.omtm.2020.06.013	Review
<i>Huang F, et al.</i>	A review of therapeutic agents and Chinese herbal medicines against SARS-CoV-2 (COVID-19)	10.1016/j.phrs.2020.104929	Review
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<i>Huang J et al.</i>	Characteristics of COVID-19 Clinical Trials in China Based on the Registration Data on ChiCTR and ClinicalTrials.gov	10.2147/DDDT.S254354	Review
<i>Huang X, et al.</i>	Epidemiology and Clinical Characteristics of COVID-19	10.34172/aim.2020.09	Review
<i>Huang Z, et al.</i>	Occupational exposure to SARS-CoV-2 in burns treatment during the COVID-19 epidemic: Specific diagnosis and treatment protocol.	10.1016/j.biopha.2020.110176	Review
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<i>Jacobs JLL</i>	Neutralizing antibodies mediate virus-immune pathology of COVID-19	10.1016/j.mehy.2020.109884	Hypothesis
<i>Jesenak M, et al.</i>	COVID-19, Chronic Inflammatory Respiratory Diseases and Eosinophils - Observations from Reported Clinical Case Series	10.1111/all.14353	Letter to the editor
<i>Jiang C, et al.</i>	Comparative Review of Respiratory Diseases Caused by Coronaviruses and Influenza A Viruses During Epidemic Season	10.1016/j.jmicinf.2020.05.005	Review
<i>Jiang F, et al.</i>	Review of the Clinical Characteristics of Coronavirus Disease 2019 (COVID-19)	10.1007/s11606-020-05762-w	Review

<i>Jin YH, et al.</i>	A rapid advice guideline for the diagnosis and treatment of 2019 novel coronavirus (2019-nCoV) infected pneumonia (standard version)	10.1186/s40779-020-0233-6	Practice Guideline
<i>Jungreis I, et al.</i>	Sarbecovirus comparative genomics elucidates gene content of SARS-CoV-2 and functional impact of COVID-19 pandemic mutations	10.1101/2020.06.02.130955	Preprint
<i>Kang Y & Xu S</i>	Comprehensive overview of COVID-19 based on current evidence.	10.1111/dth.13525	Review
<i>Kasraeian M, et al.</i>	COVID-19 pneumonia and pregnancy; a systematic review and meta-analysis	10.1080/14767058.2020.1763952	Review
<i>Khalil K, et al.</i>	Clinical characteristics and 28-day mortality of medical patients admitted with COVID-19 to a central London teaching hospital	10.1016/j.jinf.2020.06.027	Comment
<i>Khalili M, et al.</i>	Epidemiological characteristics of COVID-19: a systematic review and meta-analysis	10.1017/S0950268820001430	Review
<i>Klein S, et al.</i>	Sex, age, and hospitalization drive antibody responses in a COVID-19 convalescent plasma donor population	10.1101/2020.06.26.20139063	Preprint
<i>Koh J, et al.</i>	Epidemiological and Clinical Characteristics of Cases During the Early Phase of COVID-19 Pandemic: A Systematic Review and Meta-Analysis	10.3389/fmed.2020.00295	Review
<i>Kokou-Kpolou CK, et al.</i>	Prolonged grief related to COVID-19 deaths: Do we have to fear a steep rise in traumatic and disenfranchised griefs?	10.1037/tra0000798	Comment
<i>Kopel J, et al.</i>	Clinical Insights into the Gastrointestinal Manifestations of COVID-19	10.1007/s10620-020-06362-8	Review
<i>Kowalewski M, et al.</i>	COVID-19 and ECMO: the interplay between coagulation and inflammation-a narrative review.	10.1186/s13054-020-02925-3	Review
<i>Kronbichler A, et al.</i>	Asymptomatic patients as a source of COVID-19 infections: A systematic review and meta-analysis	10.1016/j.ijid.2020.06.052	Review
<i>Lakhani HV, et al.</i>	Systematic Review of Clinical Insights into Novel Coronavirus (CoVID-19) Pandemic: Persisting Challenges in U.S. Rural Population	10.3390/ijerph17124279	Review
<i>Lam HY et al.</i>	The epidemiology of COVID-19 cases and the successful containment strategy in Hong Kong-January to May 2020	10.1016/j.ijid.2020.06.057	Review
<i>Lee K, et al.</i>	Immunopathogenesis of COVID-19 and early immunomodulators	10.3345/cep.2020.00759	Review
<i>Lei S, et al.</i>	Author's Reply - Clinical Characteristics and Outcomes of Patients Undergoing Surgeries During the Incubation Period of COVID-19 Infection	10.1016/j.eclinm.2020.100363	Letter
<i>Lennon JC</i>	Neurologic and Immunologic Complications of COVID-19: Potential Long-Term Risk Factors for Alzheimer's Disease	10.3233/ADR-200190	Short communication
<i>Leung C</i>	Clinical characteristics of COVID-19 in children: Are they similar to those of SARS?	10.1002/ppul.24855	Review
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<i>Li C, et al.</i>	Recent progress on the diagnosis of 2019 Novel Coronavirus	10.1111/tbed.13620	Review
<i>Li H, et al.</i>	Coronavirus disease 2019 (COVID-19): current status and future perspectives	10.1016/j.ijantimicag.2020.105951	Review
<i>Li J, et al.</i>	Meta-analysis investigating the relationship between clinical features, outcomes, and severity of severe acute respiratory syndrome coronavirus 2 (SARS-CoV-2) pneumonia	10.1016/j.ajic.2020.06.008	Review
<i>Li J, et al.</i>	Association Between ABO Blood Groups and Risk of SARS-CoV-2 Pneumonia	10.1111/bjh.16797	Letter to the editor
<i>Li JY, et al.</i>	The epidemic of 2019-novel-coronavirus (2019-nCoV) pneumonia and insights for emerging infectious diseases in the future.	10.1016/j.jmicinf.2020.02.002	Review
<i>Li L, et al.</i>	COVID-19 Patients' Clinical Characteristics, Discharge Rate, and Fatality Rate of Meta-Analysis	10.1002/jmv.25757	Review
<i>Li LY, et al.</i>	Digestive system involvement of novel coronavirus infection: prevention and control infection from a gastroenterology perspective	10.1111/1751-2980.12862	Review
<i>Li MD, et al.</i>	Automated assessment of COVID-19 pulmonary disease severity on chest radiographs using convolutional Siamese neural networks	10.1101/2020.05.20.20108159	Preprint
<i>Li T, et al.</i>	Clinical Observation and Management of COVID-19 Patients	10.1080/22221751.2020.1741327	Comment
<i>Li W, et al.</i>	The characteristics of two patients coinfecting with SARS-CoV-2 and HIV in Wuhan, China	10.1002/jmv.26155	Letter to the Editor
<i>Li X & Ma X</i>	Acute respiratory failure in COVID-19: is it "typical" ARDS?	10.1186/s13054-020-02911-9	Review

<i>Li YC, et al.</i>	The neuroinvasive potential of SARS-CoV2 may play a role in the respiratory failure of COVID-19 patients.	10.1002/jmv.25728	Review
<i>Lin HY</i>	The severe COVID-19: A sepsis induced by viral infection? And its immunomodulatory therapy	10.1016/j.cjtee.2020.06.002	Review
<i>Lingeswaran M, et al.</i>	Inflammation, Immunity and Immunogenetics in COVID-19: A Narrative Review	10.1007/s12291-020-00897-3	Review
<i>Lippi G, et al.</i>	COVID-19: unravelling the clinical progression of nature's virtually perfect biological weapon	10.21037/atm-20-3989	Review
<i>Lippi G, et al.</i>	Clinical and Demographic Characteristics of Patients Dying From COVID-19 in Italy Versus China	10.1002/jmv.25860	Letter to the editor
<i>Liu F, et al.</i>	Clinically significant portal hypertension in cirrhosis patients with COVID-19: Clinical characteristics and outcomes	10.1016/j.jinf.2020.06.029	Comment
<i>Liu K, et al.</i>	Clinical features of COVID-19 in elderly patients: A comparison with young and middle-aged patients	10.1016/j.jinf.2020.03.005	Review
<i>Liu N, et al.</i>	COVID-19 Pandemic: Experiences in China and Implications for Its Prevention and Treatment Worldwide	10.2174/1568009620666200414151419	Review
<i>Liya G, et al.</i>	Studies on viral pneumonia related to novel coronavirus SARS- CoV-2, SARS-CoV, and MERS-CoV: a literature review	10.1111/apm.13047	Review
<i>Long-Quan L, et al.</i>	Response to Char's comment: Comment on Li et al.: COVID-19 patients' clinical characteristics, discharge rate, and fatality rate of meta-analysis	10.1002/jmv.25924	Comment
<i>Lotfi M, et al.</i>	SARS-CoV-2: A comprehensive review from pathogenicity of the virus to clinical consequences	10.1002/jmv.26123	Review
<i>Lovato A, et al.</i>	Clinical characteristics associated with persistent olfactory and taste alterations in COVID-19: A preliminary report on 121 patients	10.1016/j.amjoto.2020.102548	Comment
<i>Lovato A, et al.</i>	Sore throat in COVID-19: Comment on "Clinical characteristics of hospitalized patients with SARS-CoV-2 infection: A single arm meta-analysis"	10.1002/jmv.25815	Letter to the editor
<i>Ma J, et al.</i>	Clinical Characteristics and Prognosis in Cancer Patients With COVID-19: A Single Center's Retrospective Study	10.1016/j.jinf.2020.04.006	Letter to the editor
<i>Ma X, et al.</i>	The clinical characteristics of pediatric inpatients with SARS-CoV-2 infection: A meta-analysis and systematic review	10.1002/jmv.26208	Review
<i>Ma XL, et al.</i>	Management strategies of neonatal jaundice during the coronavirus disease 2019 outbreak	10.1007/s12519-020-00347-3	Review
<i>MacIntyre CR, et al.</i>	Human coronavirus data from four clinical trials of masks and respirators	10.1016/j.ijid.2020.05.092	Review
<i>Maguire BJ & Guérin PJ</i>	A Living Systematic Review Protocol for COVID-19 Clinical Trial Registrations	10.12688/wellcomeopenres.15821.1	Review
<i>Maida FD, et al.</i>	Letter to the Editor: "Clinical characteristics and outcomes of patients undergoing surgeries during the incubation period of COVID-19 infection".	10.1016/j.eclinm.2020.100362	Letter to the editor
<i>Mallineni SK, et al.</i>	Coronavirus Disease (COVID-19): Characteristics in Children and Considerations for Dentists Providing Their Care	10.1111/ipd.12653	Editorial
<i>Mantovani A, et al.</i>	Coronavirus disease 2019 (COVID-19) in children and/or adolescents: a meta-analysis	10.1038/s41390-020-1015-2	Review
<i>Mason RJ</i>	Thoughts on the alveolar phase of COVID-19	10.1152/ajplung.00126.2020	Review
<i>Matar R, et al.</i>	Clinical Presentation and Outcomes of Pregnant Women with COVID-19: A Systematic Review and Meta-Analysis	10.1093/cid/cia828	Review
<i>Mathew D, et al.</i>	Deep immune profiling of COVID-19 patients reveals patient heterogeneity and distinct immunotypes with implications for therapeutic interventions	10.1101/2020.05.20.106401	Preprint
<i>McCreary EK & Pogue JM</i>	Coronavirus Disease 2019 Treatment: A Review of Early and Emerging Options	10.1093/ofid/ofaa105	Review
<i>Meena et al.</i>	Clinical Features and Outcome of SARS-CoV-2 Infection in Children: A Systematic Review and Meta-analysis	10.1007/s13312-020-1961-0	Review
<i>Meng X, et al.</i>	COVID-19 and anosmia: A review based on up-to-date knowledge	10.1016/j.amjoto.2020.102581	Review
<i>Merkler AE, et al.</i>	Ischemic Stroke in Patients with Covid-19 versus Patients with Influenza	10.1101/2020.05.18.20105494	Preprint
<i>Merkus PJFM, et al.</i>	The value of chest CT as a COVID-19 screening tool in children	10.1183/13993003.01241-2020.	Letter to the Editor
<i>Mi B, et al.</i>	Surgery in the COVID-19 pandemic: clinical characteristics and outcomes	10.1002/bjs.11733	Correspondence

<i>Mo X, et al.</i>	Abnormal pulmonary function in COVID-19 patients at time of hospital discharge	10.1183/13993003.01217-2020	Letter to the Editor
<i>Morabito M, et al.</i>	Heat warning and public and workers' health at the time of COVID-19 pandemic	10.1016/j.scitotenv.2020.140347	Comment
<i>Moujaess E, et al.</i>	Cancer patients and research during COVID-19 pandemic: A systematic review of current evidence	10.1016/j.critrevonc.2020.102972	Review
<i>Nelson PP, et al.</i>	Current and Future Point-of-Care Tests for Emerging and New Respiratory Viruses and Future Perspectives.	10.3389/fcimb.2020.00181	Mini Review
<i>No authors listed</i>	Corrigendum to Glycemic Characteristics and Clinical Outcomes of COVID-19 Patients Hospitalized in the United States	10.1177/1932296820932678	Retracted
<i>Olaguibel JM, et al.</i>	Upper and Lower Airways Functional Examination in Asthma and Respiratory Allergic Diseases. Considerations in the SARS-CoV-2 Post-Pandemic Situation	10.18176/jiaci.0625	Review
<i>Ozars R, et al.</i>	Influenza and COVID-19 coinfection: Report of six cases and review of the literature	10.1002/jmv.26125	Review
<i>Pan X, et al.</i>	Potential drugs for the treatment of the novel coronavirus pneumonia (COVID-19) in China	10.1016/j.virusres.2020.198057	Review
<i>Parasa S, et al.</i>	Prevalence of Gastrointestinal Symptoms and Fecal Viral Shedding in Patients With Coronavirus Disease 2019: A Systematic Review and Meta-analysis	10.1001/jamanetworkopen.2020.11335	Review
<i>Park M, et al.</i>	A Systematic Review of COVID-19 Epidemiology Based on Current Evidence	10.3390/jcm9040967	Review
<i>Pedersen SF & Ho YC</i>	SARS-CoV-2: a storm is raging	10.1172/JCI137647	Comment
<i>Pence BD</i>	Severe COVID-19 and aging: are monocytes the key?	10.1007/s11357-020-00213-0	Review
<i>Phan T</i>	Novel Coronavirus: From Discovery to Clinical Diagnostics	10.1016/j.meegid.2020.104211	Opinion
<i>Pongpirul WA, et al.</i>	Clinical Characteristics of Patients Hospitalized With Coronavirus Disease, Thailand	10.3201/eid2607.200598	Letter to the editor
<i>Pormohammad A, et al.</i>	Comparison of confirmed COVID-19 with SARS and MERS cases - Clinical characteristics, laboratory findings, radiographic signs and outcomes: A systematic review and meta-analysis	10.1002/rmv.2112	Review
<i>Posada-Vergara et al.</i>	COVID-19 and HIV	10.25100/cm.v5i12.4327	Review
<i>Prayuenyong P, et al.</i>	Clinical Implications of Chloroquine and Hydroxychloroquine Ototoxicity for COVID-19 Treatment: A Mini-Review	10.3389/fpubh.2020.00252	Review
<i>Qian JY, et al.</i>	Acute Kidney Injury in the 2019 Novel Coronavirus Disease	10.1159/000509086	Review
<i>Qu JM, et al.</i>	Guidance for the Management of Adult Patients With Coronavirus Disease 2019	10.1097/CM9.0000000000000899	Clinical Guideline
<i>Raba AA, et al.</i>	Novel coronavirus infection (COVID-19) in children younger than one year: A systematic review of symptoms, management and outcomes	10.1111/apa.15422	Review
<i>Razonable RR, et al.</i>	A Collaborative Multidisciplinary Approach to the Management of Coronavirus Disease 2019 in the Hospital Setting	10.1016/j.mayocp.2020.05.010	Review
<i>Ren YR, et al.</i>	Comprehensive Updated Review on SARS-CoV-2 and COVID-19	10.1002/jcph.1673	Review
<i>Rhodes NJ, et al.</i>	Multicenter point-prevalence evaluation of the utilization and safety of drug therapies for COVID-19	10.1101/2020.06.03.20121558	Preprint
<i>Ribeiro VST, et al.</i>	Arboviral diseases and COVID-19 in Brazil: Concerns regarding climatic, sanitation, and endemic scenario	10.1002/jmv.26079	Letter to the Editor
<i>Richards W</i>	Being a dentist in the pandemic	10.1038/s41432-020-0095-5	Comment
<i>Robbins-Juarez SY, et al.</i>	Outcomes for Patients With COVID-19 and Acute Kidney Injury: A Systematic Review and Meta-Analysis	10.1016/j.ekir.2020.06.013	Review
<i>Rolf JD</i>	Clinical Characteristics of Covid-19 in China	10.1056/NEJMc2005203	Comment
<i>Saghazadeh & Rezaei</i>	Towards treatment planning of COVID-19: Rationale and hypothesis for the use of multiple immunosuppressive agents: Anti-antibodies, immunoglobulins, and corticosteroids.	10.1016/j.intimp.2020.106560	Review
<i>Salehi S, et al.</i>	Coronavirus Disease 2019 (COVID-19): A Systematic Review of Imaging Findings in 919 Patients.	10.2214/AJR.20.23034	Review
<i>Santaella-Tenorio J</i>	SARS-CoV-2 diagnostic testing alternatives for Latin America	10.25100/cm.v5i12.4272	Review

<i>Sarapultsev A, et al.</i>	Immunological environment shifts during pregnancy may affect the risk of developing severe complications in COVID-19 patients	10.1111/aji.13285	Letter to the Editor
<i>Schultheiß C, et al.</i>	Next-Generation Sequencing of T and B Cell Receptor Repertoires from COVID-19 Patients Showed Signatures Associated with Severity of Disease	10.1016/j.immuni.2020.06.024	Comment
<i>Semerara F, et al.</i>	New Early Warning Score: off-label approach for Covid-19 outbreak patient deterioration in the community	10.1016/j.resuscitation.2020.04.018	Letter to the Editor
<i>Shashikumar SP, et al.</i>	Development and Prospective Validation of a Transparent Deep Learning Algorithm for Predicting Need for Mechanical Ventilation	10.1101/2020.05.30.20118109	Preprint
<i>She J, et al.</i>	COVID-19 Epidemic: Disease Characteristics in Children	10.1002/jmv.25807	Review
<i>Shereen MA, et al.</i>	COVID-19 Infection: Origin, Transmission, and Characteristics of Human Coronaviruses	10.1016/j.jare.2020.03.005	Review
<i>Shi W, et al.</i>	Clinical characteristics of COVID-19 patients combined with allergy	10.1111/all.14434	Letter to the Editor
<i>Simpson CR, et al.</i>	Pandemic Evaluation and Enhanced Surveillance of COVID-19 (EAVE II): protocol for an observational study using linked Scottish national data	10.1136/bmjopen-2020-039097	Protocol
<i>Somers EC, et al.</i>	Tocilizumab for treatment of mechanically ventilated patients with COVID-19	10.1101/2020.05.29.20117358	Preprint
<i>Song P & Karako T</i>	COVID-19: Real-time dissemination of scientific information to fight a public health emergency of international concern	10.5582/bst.2020.01056	Editorial
<i>Stojkovic-Filipovic J & Basic M</i>	Treatment of COVID 19-Repurposing drugs commonly used in dermatology	10.1111/dth.13829	Review
<i>Stower H</i>	Clinical and Epidemiological Characteristics of Children With COVID-19	10.1007/s11427-020-1643-8	Comment
<i>Su & Lai</i>	Comparison of clinical characteristics of coronavirus disease (COVID-19) and severe acute respiratory syndrome (SARS) as experienced in Taiwan	10.1016/j.tmaid.2020.101625	Letter to the editor
<i>Suleyman G, et al.</i>	Clinical Characteristics and Morbidity Associated With Coronavirus Disease 2019 in a Series of Patients in Metropolitan Detroit	10.1001/jamanetworkopen.2020.12270	Review
<i>Sultan LR, et al.</i>	A Review of Early Experience in Lung Ultrasound in the Diagnosis and Management of COVID-19	10.1016/j.ultrasmedbio.2020.05.012	Review
<i>Sun C, et al.</i>	Role of the Eye in Transmitting Human Coronavirus: What We Know and What We Do Not Know.	10.3389/fpubh.2020.00155	Review
<i>Sun P, et al.</i>	Clinical characteristics of hospitalized patients with SARS-CoV-2 infection: A single arm meta-analysis	10.1002/jmv.25735	Review
<i>Sun P, et al.</i>	Response to: Sore throat in COVID-19: comment on "Clinical characteristics of hospitalized patients with SARS-CoV-2 infection: A single arm meta-analysis"	10.1002/jmv.25818	Letter to the editor
<i>Sun T & Guan J</i>	Novel coronavirus and central nervous system.	10.1111/ene.14227	Letter to the editor
<i>Taghizadeh-Hesary F & Akbari H</i>	The Powerful Immune System Against Powerful COVID-19: A Hypothesis	10.1016/j.mehy.2020.109762	Hypothesis
<i>Tang D, et al.</i>	The hallmarks of COVID-19 disease	10.1371/journal.ppat.1008536	Review
<i>Tang LY & Wang J</i>	Anesthesia and COVID-19: What We Should Know and What We Should Do	10.1177/1089253220921590	Review
<i>Temesgen Z, et al.</i>	First Clinical Use of Lenzilumab to Neutralize GM-CSF in Patients with Severe COVID-19 Pneumonia	10.1101/2020.06.08.20125369	Preprint
<i>Tolia VM, et al.</i>	Preliminary Results of Initial Testing for Coronavirus (COVID-19) in the Emergency Department	10.5811/westjem.2020.3.47348	Review
<i>Toombs JM, et al.</i>	COVID-19 in three people living with HIV in the United Kingdom	10.1002/jmv.26178	Letter to the editor
<i>Toraih EA, et al.</i>	Association of cardiac biomarkers and comorbidities with increased mortality, severity, and cardiac injury in COVID-19 patients: A meta-regression and decision tree analysis	10.1002/jmv.26166	Review
<i>Tsvigoulis G, et al.</i>	Neurological manifestations and implications of COVID-19 pandemic	10.1177/1756286420932036	Review
<i>Tu Y, et al.</i>	A Review of SARS-CoV-2 and the Ongoing Clinical Trials.	10.3390/ijms21072657	Review
<i>Udugama B, et al.</i>	Diagnosing COVID-19: The Disease and Tools for Detection	10.1021/acsnano.0c02624	Review
<i>Vardavas CI & Nikitara K</i>	COVID-19 and smoking	10.18332/tid/119324	Systematic review

Viswanathan R, et al.	Support Groups and Individual Mental Health Care via Video Conferencing for Frontline Clinicians During the COVID-19 Pandemic	10.1016/j.psych.2020.06.014	Perspective
Wang A, et al.	Timely blood glucose management for the outbreak of 2019 novel coronavirus disease (COVID-19) is urgently needed.	10.1016/j.diabetes.2020.108118	Comment
Wang B, et al.	A tertiary center experience of multiple myeloma patients with COVID-19: lessons learned and the path forward	10.1101/2020.06.04.20122846	Preprint
Wang L, et al.	Review of the 2019 novel coronavirus (SARS-CoV-2) based on current evidence	10.1016/j.ijantimicag.2020.105948	Review
Wang X, et al.	Comorbid Chronic Diseases and Acute Organ Injuries Are Strongly Correlated with Disease Severity and Mortality among COVID-19 Patients: A Systemic Review and Meta-Analysis.	10.34133/2020/2402961	Systematic Review
Wei M, et al.	Novel Coronavirus Infection in Hospitalized Infants Under 1 Year of Age in China	10.1001/jama.2020.2131	Letter to the editor
Wen J, et al.	Potential therapeutic effect of Qingwen Baidu Decoction against Corona Virus Disease 2019: a mini review	10.1186/s13020-020-00332-y	Review
Weng CH, et al.	Characteristics and Clinical Course and Outcome of COVID-19 in Hispanic/Latino Patients in a Community Setting: A Retrospective Cohort Study	10.1002/jmv.26196	Letter to the editor
Weng CH, et al.	Differences in clinical characteristics of COVID-19 in Hispanic/Latino population	10.1111/tbed.13664	Letter to the Editor
Wilder-Smith A, et al.	Can We Contain the COVID-19 Outbreak With the Same Measures as for SARS?	10.1016/S1473-3099(20)30129-8	Review
Wong MC, et al.	Detection of SARS-CoV-2 RNA in fecal specimens of patients with confirmed COVID-19: A meta-analysis	10.1016/j.jinf.2020.06.012	Review
Wu F, et al.	SARS-CoV-2 titers in wastewater foreshadow dynamics and clinical presentation of new COVID-19 cases	10.1101/2020.06.15.20117747	Preprint
Wu Q, et al.	Recovery from COVID-19 in two patients with coexisted HIV infection.	10.1002/jmv.26006	Letter to the editor
Wu Q, et al.	Co-infection and Other Clinical Characteristics of COVID-19 in Children.	10.1542/peds.2020-0961	Review
Xing Y, et al.	Prolonged viral shedding in feces of pediatric patients with coronavirus disease 2019	10.1016/j.jmii.2020.03.021	Review
Xiong XL, et al.	Comparative study of the clinical characteristics and epidemiological trend of 244 COVID-19 infected children with or without GI symptoms	10.1136/gutjnl-2020-321486	Letter to the Editor
Xu Y, et al.	Significance of Serology Testing to Assist Timely Diagnosis of SARS-CoV-2 Infections: Implication From a Family Cluster	10.1080/22221751.2020.1752610	Letter to the editor
Yadaw AS, et al.	Clinical predictors of COVID-19 mortality	10.1101/2020.05.19.20103036	Preprint
Yang C, et al.	Coronavirus disease 2019: reassembly attack of coronavirus	10.1080/09603123.2020.1747602	Review
Yang H & Lu S	COVID-19 and Tuberculosis	10.2478/jtim-2020-0010	Review
Yang J, et al.	Characteristics and Challenges of Psychological First Aid in China During the COVID-19 Outbreak	10.1016/j.bbi.2020.04.075	Letter to the editor
Yang J, et al.	Prevalence of comorbidities in the novel Wuhan coronavirus (COVID-19) infection: a systematic review and meta-analysis	10.1016/j.ijid.2020.03.017	Meta-analysis
Yang M, et al.	Characteristics of registered studies for Coronavirus disease 2019 (COVID-19): A systematic review	10.1016/j.imr.2020.100426	Review
Yang W, et al.	The role of imaging in 2019 novel coronavirus pneumonia (COVID-19)	10.1007/s00330-020-06827-4	Review
Yang Z, et al.	Coronavirus disease 2019 (COVID-19) and pregnancy: a systematic review	10.1080/14767058.2020.1759541	Systematic Review
Yao Y, et al.	Epidemiological Characteristics of 2019-nCoV Infections in Shaanxi, China by February 8, 2020	10.1183/13993003.00310-2020	Letter to the editor
Younes N, et al.	Challenges in Laboratory Diagnosis of the Novel Coronavirus SARS-CoV-2	10.3390/v12060582	Review
Yu et al.	Recent Understandings Toward Coronavirus Disease 2019 (COVID-19): From Bench to Bedside	10.3389/fcell.2020.00476	Review
Yu J, et al.	SARS-CoV-2 Transmission in Patients With Cancer at a Tertiary Care Hospital in Wuhan, China	10.1001/jamaoncol.2020.0980	Letter to the editor
Zavascski & Falci	Clinical Characteristics of Covid-19 in China	10.1056/NEJMc2005203	Comment

Zhang D, et al.	Viral aetiology and clinical characteristics of acute respiratory tract infections in Shenzhen during epidemic of coronavirus disease 2019	10.1080/23744235.2020.1769855	Comment	
Zhang et al.	Solid Organ Transplantation During the COVID-19 Pandemic	10.3389/fimmu.2020.01392	Review	
Zhang LP, et al.	Focus on the 2019 novel coronavirus (SARS-CoV-2)	10.2217/fmb-2020-0063	Review	
Zhang W, et al.	The use of anti-inflammatory drugs in the treatment of people with severe coronavirus disease 2019 (COVID-19): The Perspectives of clinical immunologists from China	10.1016/j.clim.2020.108393	Review	
Zhao C, et al.	Otolaryngology during COVID-19: Preventive care and precautionary measures	10.1016/j.amjoto.2020.102508	Review	
Zhao J, et al.	Clinical characteristics and outcomes of patients with COVID-19 and rheumatic disease in China 'hot spot' versus in US 'hot spot': similarities and differences	10.1136/annrheumdis-2020-218183	Correspondence	
Zhao Q, et al.	COVID-19 and cutaneous manifestations: a systematic review	10.1111/jdv.16778	Review	
Zhao YF, et al.	Prediction of the Number of Patients Infected with COVID-19 Based on Rolling Grey Verhulst Models	10.3390/ijerph17124582	Review	
Zhao Z, et al.	Recommendations of individualized medical treatment and common adverse events management for lung cancer patients during the outbreak of COVID-19 epidemic	10.1111/1759-7714.13424	Clinical Guideline	
Zhen-Dong Y, et al.	Clinical and transmission dynamics characteristics of 406 children with coronavirus disease 2019 in China: A review	10.1016/j.jvs.2020.04.483	Review	
Zheng J, et al.	SARS-CoV-2: an Emerging Coronavirus that Causes a Global Threat.	10.7150/ijbs.45053	Review	
Zheng Y, et al.	Immunoregulation with mTOR inhibitors to prevent COVID-19 severity: A novel intervention strategy beyond vaccines and specific antiviral medicines	10.1002/jmv.26009	Review	
Zhou B, et al.	The Clinical Characteristics of Myocardial Injury in Severe and Very Severe Patients With 2019 Novel Coronavirus Disease	10.1016/j.jinf.2020.03.021	Letter to the editor	
Zhou H, et al.	Potential therapeutic targets and promising drugs for combating SARS-CoV-2	10.1111/bph.15092	Review	
Zhou M, et al.	Serological characteristics of COVID-19 patients	10.1080/23744235.2020.1784997	Letter to the editor	
Zhou M, et al.	Coronavirus Disease 2019 (COVID-19): A Clinical Update	10.1007/s11684-020-0767-8	Review	
Zhou M, et al.	From SARS to COVID-19: What we have learned about children infected with COVID-19.	10.1016/j.ijid.2020.04.090	Review	
Zhou Y, et al.	Obesity and diabetes as high-risk factors for severe coronavirus disease 2019 (Covid-19)	10.1002/dmrr.3377	Review	
Zhou Y, et al.	Comment on Li et al.: COVID-19 patients' clinical characteristics, discharge rate, and fatality rate of meta-analysis.	10.1002/jmv.25912	Comment	
Zhu J, et al.	Clinical Characteristics of 3,062 COVID-19 Patients: A Meta-Analysis	10.1002/jmv.25884	Meta-analysis	
Bauer DC, et al.	Supporting pandemic response using genomics and bioinformatics: A case study on the emergent SARS-CoV-2 outbreak	10.1111/tbed.13588	Rapid communication	Did not mentioned "clinical characteristics" anywhere in the full text
Bullard J, et al.	Predicting infectious SARS-CoV-2 from diagnostic samples	10.1093/cid/cia638	Original research	Did not mentioned "clinical characteristics" anywhere in the full text
Cagnacci A, et al.	Age-related difference in the rate of coronavirus disease 2019 mortality in women versus men	10.1016/j.ajog.2020.05.039	Original research	Did not mentioned "clinical characteristics" anywhere in the full text
Caly L, et al.	Isolation and rapid sharing of the 2019 novel coronavirus (SARS-CoV-2) from the first patient diagnosed with COVID-19 in Australia	10.5694/mja2.50569	Original research	Did not mentioned "clinical characteristics" anywhere in the full text
Camiola M, et al.	Expression of SARS-CoV-2 receptor ACE2 and coincident host response signature varies by asthma inflammatory phenotype	10.1016/j.jaci.2020.05.051	Original research	Did not mentioned "clinical characteristics" anywhere in the full text
Cheng VCC, et al.	Escalating Infection Control Response to the Rapidly Evolving Epidemiology of the Coronavirus Disease 2019 (COVID-19) Due to SARS-CoV-2 in Hong Kong	10.1017/ice.2020.58	Original research	Did not mentioned "clinical characteristics" anywhere in the full text
d'Alessandro M, et al.	Serum KL-6 concentrations as a novel biomarker of severe COVID-19	10.1002/jmv.26087	Original research	Did not mentioned "clinical characteristics" anywhere in the full text
Davies NG, et al.	Effects of non-pharmaceutical interventions on COVID-19 cases, deaths, and demand for hospital services in the UK: a modelling study	10.1016/S2468-2667(20)30133-X	Original research	Did not mentioned "clinical characteristics" anywhere in the full text
El Hachem M, et al.	A clinical, histopathological and laboratory study of 19 consecutive Italian paediatric patients with chilblain-like lesions: lights and shadows on the relationship with COVID-19 infection	10.1111/jdv.16682	Original research	Did not mentioned "clinical characteristics" anywhere in the full text
Fan N, et al.	Imaging characteristics of initial chest computed tomography and clinical manifestations of patients with COVID-19 pneumonia	10.1007/s11604-020-00973-x	Original research	Did not mentioned "clinical characteristics" anywhere in the full text

<i>Ferrazzi E, et al.</i>	Vaginal delivery in SARS-CoV-2-infected pregnant women in Northern Italy: a retrospective analysis	10.1111/1471-0528.16278	Original research	Did not mentioned "clinical characteristics" anywhere in the full text
<i>Holt A, et al.</i>	New-onset atrial fibrillation: incidence, characteristics, and related events following a national COVID-19 lockdown of 5.6 million people	10.1093/eurheartj/ehaa494	Original research	Did not mentioned "clinical characteristics" anywhere in the full text
<i>Hu S, et al.</i>	Computed tomography manifestations in super early stage 2019 novel coronavirus pneumonia	10.1177/0284185120924806	Original research	Did not mentioned "clinical characteristics" anywhere in the full text
<i>Lauer SA, et al.</i>	The Incubation Period of Coronavirus Disease 2019 (COVID-19) From Publicly Reported Confirmed Cases: Estimation and Application	10.7326/M20-0504	Original research	Did not mentioned "clinical characteristics" anywhere in the full text
<i>Lieberman JA, et al.</i>	Comparison of Commercially Available and Laboratory Developed Assays for in vitro Detection of SARS-CoV-2 in Clinical Laboratories	10.1128/JCM.00821-20	Original research	Did not mentioned "clinical characteristics" anywhere in the full text
<i>Liu X, et al.</i>	Prediction of the severity of Corona Virus Disease 2019 and its adverse clinical outcomes	10.7883/yoken.JIJD.2020.194	Original research	Did not mentioned "clinical characteristics" anywhere in the full text
<i>Liu X, et al.</i>	Single-cell Transcriptome Analysis of the Novel Coronavirus (SARS-CoV-2) Associated Gene ACE2 Expression in Normal and Non-Obstructive Azoospermia (NOA) Human Male Testes	10.1007/s11427-020-1705-0	Original research	Did not mentioned "clinical characteristics" anywhere in the full text
<i>Long CJ, et al.</i>	Imaging features of the initial chest thin-section CT scans from 110 patients after admission with suspected or confirmed diagnosis of COVID-19	10.1186/s12880-020-00464-5	Original research	Did not mentioned "clinical characteristics" anywhere in the full text
<i>Long DR, et al.</i>	Occurrence and Timing of Subsequent SARS-CoV-2 RT-PCR Positivity Among Initially Negative Patients	10.1093/cid/ciaa722	Original research	Did not mentioned "clinical characteristics" anywhere in the full text
<i>Mei F, et al.</i>	First Detection of SARS-CoV-2 by Real-Time Reverse Transcriptase-Polymerase Chain Reaction Assay in Pleural Fluid	10.1016/j.chest.2020.05.583	Case Reports	Did not mentioned "clinical characteristics" anywhere in the full text
<i>Moccia L, et al.</i>	Affective Temperament, Attachment Style, and the Psychological Impact of the COVID-19 Outbreak: An Early Report on the Italian General Population	10.1016/j.lbbi.2020.04.048	Original research	Did not mentioned "clinical characteristics" anywhere in the full text
<i>Paraskevis D, et al.</i>	Full-genome evolutionary analysis of the novel corona virus (2019-nCoV) rejects the hypothesis of emergence as a result of a recent recombinationevent	10.1016/j.meegid.2020.104212	Short communication	Did not mentioned "clinical characteristics" anywhere in the full text
<i>Prakop M, et al.</i>	CO-RADS - A Categorical CT Assessment Scheme for Patients With Suspected COVID-19: Definition and Evaluation	10.1148/radiol.2020.201473	Original research	Did not mentioned "clinical characteristics" anywhere in the full text
<i>Roca-Ginés, J et al.</i>	Assessment of Acute Acral Lesions in a Case Series of Children and Adolescents During the COVID-19 Pandemic	10.1001/jamadermatol.2020.2340	Original research	Did not mentioned "clinical characteristics" anywhere in the full text
<i>Qiu C, et al.</i>	Olfactory and Gustatory Dysfunction as an Early Identifier of COVID-19 in Adults and Children: An International Multicenter Study	10.1177/0194599820934376	Original research	Did not mentioned "clinical characteristics" anywhere in the full text
<i>Tran BX, et al.</i>	Coverage of Health Information by Different Sources in Communities: Implication for COVID-19 Epidemic Response	10.3390/ijerph17103577	Original research	Did not mentioned "clinical characteristics" anywhere in the full text
<i>van Dam LF, et al.</i>	Clinical and computed tomography characteristics of COVID-19 associated acute pulmonary embolism: A different phenotype of thrombotic disease?	10.1016/j.thromres.2020.06.010	Original research	Did not mentioned "clinical characteristics" anywhere in the full text
<i>Vanni G, et al.</i>	Breast Cancer and COVID-19: The Effect of Fear on Patients' Decision-making Process	10.21873/invivo.11957	Original research	Did not mentioned "clinical characteristics" anywhere in the full text
<i>Wang H, et al.</i>	The psychological distress and coping styles in the early stages of the 2019 coronavirus disease (COVID-19) epidemic in the general mainland Chinese population: A web-based survey.	10.1371/journal.pone.0233410	Original research	Did not mentioned "clinical characteristics" anywhere in the full text
<i>Zhang FY, et al.</i>	CT Imaging of the COVID-19	10.1016/j.jfma.2020.04.006	Original research	Did not mentioned "clinical characteristics" anywhere in the full text
<i>Zhang L, et al.</i>	Early characteristics of the COVID-19 outbreak predict the subsequent epidemic scope	10.1016/j.ijid.2020.05.122	Original research	Did not mentioned "clinical characteristics" anywhere in the full text
<i>Zifeng J, et al.</i>	Consistency Analysis of COVID-19 Nucleic Acid Tests and the Changes of Lung CT	10.1016/j.jcv.2020.104359	Original research	Did not mentioned "clinical characteristics" anywhere in the full text
<i>Abouelkhair MA.</i>	Targeting adenosinergic pathway and adenosine A2A receptor signaling for the treatment of COVID-19: A hypothesis	10.1016/j.mehy.2020.110012	Original research	The study did not analyzed COVID-19 patients
<i>Ahamad MM</i>	A machine learning model to identify early stage symptoms of SARS-Cov-2 infected patients	10.1016/j.eswa.2020.113661	Original research	The study did not analyzed COVID-19 patients
<i>Barratt R, et al.</i>	Characteristics of personal protective equipment training programs in Australia and New Zealand hospitals: A survey	10.1016/j.idh.2020.05.005	Original research	The study did not analyzed COVID-19 patients
<i>Bianchi M, et al.</i>	Sars-CoV-2 Envelope and Membrane Proteins: Structural Differences Linked to Virus Characteristics?	10.1155/2020/4389089	Original research	The study did not analyzed COVID-19 patients
<i>Bromage DI, et al.</i>	The impact of COVID-19 on heart failure hospitalization and management: report from a Heart Failure Unit in London during the peak of the pandemic	10.1002/ehf.1925	Original research	The study did not analyzed COVID-19 patients
<i>Carter E, et al.</i>	The first six weeks - setting up a UK urgent dental care centre during the COVID-19 pandemic	10.1038/s41415-020-1708-2	Original Article	The study did not analyzed COVID-19 patients
<i>Chu H, et al.</i>	Comparative Replication and Immune Activation Profiles of SARS-CoV-2 and SARS-CoV in Human Lungs: An Ex Vivo Study With Implications for the Pathogenesis of COVID-19	10.1093/cid/ciaa410	Original research	The study did not analyzed COVID-19 patients
<i>Ciaccio M & Agnello L</i>	Biochemical biomarkers alterations in Coronavirus Disease 2019 (COVID-19)	10.1515/dx-2020-0057	Original research	The study did not analyzed COVID-19 patients

<i>Compton S, et al.</i>	Medical students' preference for returning to the clinical setting during the COVID-19 pandemic	10.1111/medu.14268	Original Article	The study did not analyzed COVID-19 patients
<i>Gan X, et al.</i>	Willingness of Chinese nurses to practice in Hubei combating the coronavirus disease 2019 epidemic: A cross-sectional study	10.1111/jan.14434	Original research	The study did not analyzed COVID-19 patients
<i>Gao X, et al.</i>	Characterization, pathogenicity and protective efficacy of a cell culture-derived porcine deltacoronavirus	10.1016/j.virusres.2020.197955	Original research	The study did not analyzed COVID-19 patients
<i>Gonzalez-Reiche AS, et al.</i>	Introductions and early spread of SARS-CoV-2 in the New York City area	10.1126/science.abc1917	Original research	The study did not analyzed COVID-19 patients
<i>Hamza MS, et al.</i>	Cross-Sectional Study on Awareness and Knowledge of COVID-19 Among Senior pharmacy Students	10.1007/s10900-020-00859-z	Original Article	The study did not analyzed COVID-19 patients
<i>Hernández-García I & Giménez-Júlvez T</i>	Characteristics of YouTube Videos in Spanish on How to Prevent COVID-19	10.3390/ijerph17134671	Original research	The study did not analyzed COVID-19 patients
<i>Hamolak J, et al.</i>	Widely available lysosome targeting agents should be considered as potential therapy for COVID-19	10.1016/j.jantimicag.2020.106044	Original Article	The study did not analyzed COVID-19 patients
<i>Hou C, et al.</i>	The Effectiveness of the Quarantine of Wuhan City Against the Corona Virus Disease 2019 (COVID-19): Well-Mixed SEIR Model Analysis	10.1002/jmv.25827	Original research	The study did not analyzed COVID-19 patients
<i>Huang JF, et al.</i>	Telestroke in the Time of COVID-19: The Mayo Clinic Experience	10.1016/j.mayocp.2020.06.007	Original research	The study did not analyzed COVID-19 patients
<i>Huang Y, et al.</i>	Treatment strategies of hospitalized patients with coronavirus disease-19	10.18632/aging.103370	Original research	The study did not analyzed COVID-19 patients
<i>Iglai Z, et al.</i>	Comparison of commercial realtime reverse transcription PCR assays for the detection of SARS-CoV-2	10.1016/j.jcv.2020.104510	Short communication	The study did not analyzed COVID-19 patients
<i>Jiang Q, et al.</i>	The Prevalence, Characteristics, and Related Factors of Pressure Injury in Medical Staff Wearing Personal Protective Equipment Against COVID-19 in China: A Multicentre Cross-Sectional Survey	10.1111/ijw.13391	Original research	The study did not analyzed COVID-19 patients
<i>Jones NK, et al.</i>	Effective control of SARS-CoV-2 transmission between healthcare workers during a period of diminished community prevalence of COVID-19	10.7554/eLife.59391	Original research	The study did not analyzed COVID-19 patients
<i>Khader Y, et al.</i>	Dentists' Awareness, Perception, and Attitude Regarding COVID-19 and Infection Control: Cross-Sectional Study Among Jordanian Dentists	10.2196/18798	Original research	The study did not analyzed COVID-19 patients
<i>Kim E, et al.</i>	Microneedle Array Delivered Recombinant Coronavirus Vaccines: Immunogenicity and Rapid Translational Development	10.1016/j.ebiom.2020.102743	Original Research	The study did not analyzed COVID-19 patients
<i>Kocylgit BF, et al.</i>	YouTube as a source of information on COVID-19 and rheumatic disease link	10.1007/s10067-020-05176-3	Original research	The study did not analyzed COVID-19 patients
<i>Kotian, et al.</i>	Knowledge and understanding among medical imaging professionals in India during the rapid rise of the covid-19 pandemic	10.1007/s12553-020-00437-2	Original research	The study did not analyzed COVID-19 patients
<i>Koziatek CA, et al.</i>	Assessing the Impact of a Rapidly Scaled Virtual Urgent Care in New York City During the COVID-19 Pandemic	10.1016/j.jemermed.2020.06.041	Original research	The study did not analyzed COVID-19 patients
<i>Lara B, et al.</i>	Neuropsychiatric symptoms and quality of life in Spanish patients with Alzheimer's disease during the COVID-19 lockdown	10.1111/ene.14339	Short communication	The study did not analyzed COVID-19 patients
<i>Li M, et al.</i>	The SARS-CoV-2 Receptor ACE2 Expression of Maternal-Fetal Interface and Fetal Organs by Single-Cell Transcriptome Study	10.1371/journal.pone.0230295	Original research	The study did not analyzed COVID-19 patients
<i>Li S, et al.</i>	Internet Use, Risk Awareness, and Demographic Characteristics Associated With Engagement in Preventive Behaviors and Testing: Cross-Sectional Survey on COVID-19 in the United States	10.2196/19782	Original research	The study did not analyzed COVID-19 patients
<i>Linton NM, et al.</i>	Incubation Period and Other Epidemiological Characteristics of 2019 Novel Coronavirus Infections with Right Truncation: A Statistical Analysis of Publicly Available Case Data.	10.3390/jcm9020538	Original research	The study did not analyzed COVID-19 patients
<i>Liu CY, et al.</i>	The prevalence and influencing factors in anxiety in medical workers fighting COVID-19 in China: a cross-sectional survey	10.1017/S0950268820001107	Original research	The study did not analyzed COVID-19 patients
<i>Loh TP, et al.</i>	Laboratory practices to mitigate biohazard risks during the COVID-19 outbreak: an IFCC global survey	10.1515/cdm-2020-0711	Original Article	The study did not analyzed COVID-19 patients
<i>Mackey T, et al.</i>	Machine Learning to Detect Self-Reporting of Symptoms, Testing Access, and Recovery Associated With COVID-19 on Twitter: Retrospective Big Data Infoveillance Study	10.2196/19509	Original research	The study did not analyzed COVID-19 patients
<i>Madanelo M, et al.</i>	The impact of the coronavirus disease 2019 pandemic on the utilisation of emergency urological services	10.1111/bju.15109	Original research	The study did not analyzed COVID-19 patients
<i>Massie AB, et al.</i>	Identifying scenarios of benefit or harm from kidney transplantation during the COVID-19 pandemic: A stochastic simulation and machine learning study	10.1111/ajt.16117	Original research	The study did not analyzed COVID-19 patients
<i>Mattoli AV, et al.</i>	Quarantine during COVID-19 outbreak: Changes in diet and physical activity increase the risk of cardiovascular disease.	10.1016/j.numecd.2020.05.020	Viewpoint	The study did not analyzed COVID-19 patients
<i>Monteagudo A, et al.</i>	Continuous Intravenous Anakinra Infusion to Calm the Cytokine Storm in Macrophage Activation Syndrome	10.1002/acr2.11135	Original Research	The study did not analyzed COVID-19 patients
<i>Nasrallah AA, et al.</i>	A large number of COVID-19 interventional clinical trials were registered soon after the pandemic onset: a descriptive analysis	10.1016/j.jclinepi.2020.06.005	Original Article	The study did not analyzed COVID-19 patients

<i>Ng SW, et al.</i>	Cellular Metabolic Profiling of CrFK Cells Infected with Feline Infectious Peritonitis Virus Using Phenotype Microarrays	10.3390/pathogens9050412	Original research	The study did not analyzed COVID-19 patients
<i>Nguyen HN, et al.</i>	People With Suspected COVID-19 Symptoms Were More Likely Depressed and Had Lower Health-Related Quality of Life: The Potential Benefit of Health Literacy	10.3390/jcm9040965	Original research	The study did not analyzed COVID-19 patients
<i>Nochaiwong S, et al.</i>	Mental health circumstances among health care workers and general public under the pandemic situation of COVID-19 (HOME-COVID-19)	10.1097/MD.00000000000020751	Original research	The study did not analyzed COVID-19 patients
<i>Ong DSY, et al.</i>	Comparison of diagnostic accuracies of rapid serological tests and ELISA to molecular diagnostics in patients with suspected coronavirus disease 2019 presenting to the hospital	10.1016/j.j.cmi.2020.05.028	Original Article	The study did not analyzed COVID-19 patients
<i>Petrarca L, et al.</i>	Human bocavirus in children hospitalized for acute respiratory tract infection in Rome	10.1007/s12519-019-00324-5	Original research	The study did not analyzed COVID-19 patients
<i>Szepietowski JC, et al.</i>	Face Mask-induced Itch: A Self-questionnaire Study of 2,315 Responders During the COVID-19 Pandemic	10.2340/00015555-3536	Original research	The study did not analyzed COVID-19 patients
<i>Tini G, et al.</i>	Semantic and Geographical Analysis of COVID-19 Trials Reveals a Fragmented Clinical Research Landscape Likely to Impair Informativeness	10.3389/fmed.2020.00367	Original research	The study did not analyzed COVID-19 patients
<i>Xiong Y, et al.</i>	Transcriptomic Characteristics of Bronchoalveolar Lavage Fluid and Peripheral Blood Mononuclear Cells in COVID-19 Patients	10.1080/22221751.2020.1747363	Original Research	The study did not analyzed COVID-19 patients
<i>Yip CC, et al.</i>	Evaluation of the commercially available LightMix® Modular E-gene kit using clinical and proficiency testing specimens for SARS-CoV-2 detection	10.1016/j.jcv.2020.104476	Original research	The study did not analyzed COVID-19 patients
<i>Zhang L, et al.</i>	How scientific research reacts to international public health emergencies: a global analysis of response patterns	10.1007/s11192-020-03531-4	Original research	The study did not analyzed COVID-19 patients
<i>Zhao & Chen</i>	Modeling the Epidemic Dynamics and Control of COVID-19 Outbreak in China	10.1007/s40484-020-0199-0	Original research	The study did not analyzed COVID-19 patients
<i>Zhong B, et al.</i>	Knowledge, Attitudes, and Practices Towards COVID-19 Among Chinese Residents During the Rapid Rise Period of the COVID-19 Outbreak: A Quick Online Cross-Sectional Survey	10.7150/ijbs.45221	Original research	The study did not analyzed COVID-19 patients

Additional Table 2. Included articles.

<i>Citation</i>	<i>Title</i>	<i>DOI</i>	<i>Mention of any other respiratory disease</i>	<i>Number and % of COVID-19 patients with underlying respiratory disease</i>	<i>Mention of Asthma</i>	<i>Number (%) COVID-19 patients with asthma</i>	<i>Number of COVID-19 patients</i>
<i>Aggarwal S, et al.</i>	Clinical features, laboratory characteristics, and outcomes of patients hospitalized with coronavirus disease 2019 (COVID-19): Early report from the United States	10.1515/dx-2020-0046	Yes	COPD: 2 (13%)	No	-	16
<i>Ai JW, et al.</i>	Characteristics of COVID-19 Patients With Gastrointestinal Symptoms: An Analysis of Seven Patients in China	10.3389/fmed.2020.00308	No	-	No	-	7
<i>Akdur A, et al.</i>	Coronavirus Disease (COVID-19) in Kidney and Liver Transplant Patients: A Single-Center Experience	10.6002/ect.2020.0193	No	-	No	-	583
<i>Alberici F, et al.</i>	A single center observational study of the clinical characteristics and short-term outcome of 20 kidney transplant patients admitted for SARS-CoV2 pneumonia	10.1016/j.kint.2020.04.002	No	-	No	-	20
<i>Alkundi A, et al.</i>	Clinical characteristics and outcomes of COVID-19 hospitalized patients with diabetes in the United Kingdom: A retrospective single centre study	10.1016/j.diabres.2020.108263	Yes	COPD: 7 (7.3%)	Yes	6 (2.6%)	232
<i>Alsafyan YM, et al.</i>	Clinical characteristics of COVID-19 in Saudi Arabia: A national retrospective study	10.1016/j.jiph.2020.05.026	Yes	Chronic lung disease: 57 (5.2%)	Yes	54 (4.9%)	1519
<i>Aretz M, et al.</i>	Characteristics and Outcomes of 21 Critically Ill Patients With COVID-19 in Washington State	10.1001/jama.2020.4326	Yes	COPD: 7 (33.3%)	Yes	2 (9.1%)	21
<i>Arslan H, et al.</i>	Incidence and Immunologic Analysis of Coronavirus Disease (COVID-19) in Hemodialysis Patients: A Single-Center Experience	10.6002/ect.2020.0194	Yes	COPD: 1 (14%)	No	-	7
<i>Asghar MS, et al.</i>	Clinical Profiles, Characteristics, and Outcomes of the First 100 Admitted COVID-19 Patients in Pakistan: A Single-Center Retrospective Study in a Tertiary Care Hospital of Karachi	10.7759/cureus.8712	Yes	COPD: 3 (3%)	Yes	2 (2%)	100
<i>Bar S, et al.</i>	The association of lung ultrasound images with COVID-19 infection in an emergency room cohort	10.1111/anae.15175	No	-	No	-	31
<i>Barman HA, et al.</i>	Prognostic significance of cardiac injury in COVID-19 patients with and without coronary artery disease	10.1097/MCA.00000000000000914	Yes	COPD: 73 (12%)	No	-	607
<i>Becchetti C, et al.</i>	COVID-19 in an international European liver transplant recipient cohort	10.1136/gutjnl-2020-321923	Yes	COPD: 7 (12%)	No	-	57
<i>Bellosta R, et al.</i>	Acute Limb Ischemia in Patients With COVID-19 Pneumonia	10.1016/j.jvs.2020.04.483	Yes	COPD: 2 (10%)	No	-	20
<i>Benger M, et al.</i>	Intracerebral haemorrhage and COVID-19: Clinical characteristics from a case series	10.1016/j.bbi.2020.06.005	No	-	Yes	1 (20%)	5
<i>Benussi A, et al.</i>	Clinical characteristics and outcomes of inpatients with neurologic disease and COVID-19 in Brescia, Lombardy, Italy	10.1212/WNL.00000000000009848	No	-	No	-	173
<i>Bezzio C, et al.</i>	Outcomes of COVID-19 in 79 Patients With IBD in Italy: An IG-IBD Study	10.1136/gutjnl-2020-321411	Yes	COPD: 5 (6%)	No	-	79
<i>Bhatla A, et al.</i>	COVID-19 and cardiac arrhythmias	10.1016/j.hrthm.2020.06.016	Yes	COPD: 63 (9%)	No	-	700
<i>Bhatraju PK, et al.</i>	Covid-19 in Critically Ill Patients in the Seattle Region — Case Series	10.1056/NEJMoa2004500	Yes	COPD: 1 (4%)	Yes	3 (12.5%)	24
<i>Babin M, et al.</i>	Characteristics and Early Prognosis of COVID-19 Infection in Fracture Patients	10.2106/BJS.20.00390	Yes	COPD: 1 (10 %)	No	-	10
<i>Biagi A, et al.</i>	Clinical and epidemiological characteristics of 320 deceased patients with COVID-19 in an Italian Province: A retrospective observational study	10.1002/jmv.26147	Yes	COPD: 56 (17.5%)	No	-	320
<i>Brill SE, et al.</i>	COVID-19: a retrospective cohort study with focus on the over-80s and hospital-onset disease	10.1186/s12916-020-01665-z	Yes	Respiratory condition: 85 (19%)	No	-	450
<i>Cai Q, et al.</i>	Characteristics of Liver Tests in COVID-19 Patients	10.1016/j.jhep.2020.04.006	No	-	No	-	417
<i>Cai Q, et al.</i>	COVID-19 in a Designated Infectious Diseases Hospital Outside Hubei Province, China	10.1111/all.14309	No	-	No	-	298
<i>Cai Q, et al.</i>	Obesity and COVID-19 Severity in a Designated Hospital in Shenzhen, China	10.2337/dc20-0576	Yes	COPD: 32 (8.35%)	No	-	383
<i>Cai Y, et al.</i>	Coronavirus Disease 2019 in the Perioperative Period of Lung Resection: A Brief Report From a Single Thoracic Surgery Department in Wuhan, People's Republic of China	10.1016/j.jtho.2020.04.003	Yes	COPD: 2 (28.5%)	No	-	7
<i>Caly L, et al.</i>	Isolation and Rapid Sharing of the 2019 Novel Coronavirus (SARS-CoV-2) From the First Patient Diagnosed With COVID-19 in Australia	10.5694/mja2.50569	No	-	No	-	1
<i>Cao J, et al.</i>	Clinical Features and Short-term Outcomes of 102 Patients With Corona Virus Disease 2019 in Wuhan, China	10.1093/cid/ciaa243	Yes	Respiratory Diseases: 9 (10.8%)	No	-	102
<i>Cao Z, et al.</i>	Clinical characteristics of Coronavirus Disease 2019 patients in Beijing, China	10.1371/journal.pone.0234764	Yes	COPD: 5 6.3%)	No	-	80

Capra R, et al.	Impact of Low Dose Tocilizumab on Mortality Rate in Patients With COVID-19 Related Pneumonia	10.1016/j.ejim.2020.05.009	No	-	No	-	85
Cariou B, et al.	Phenotypic characteristics and prognosis of inpatients with COVID-19 and diabetes: the CORONADO study	10.1007/s00125-020-05180-x	Yes	COPD: 133 (10.4%)	No	-	1278
Cen Y, et al.	Risk factors for disease progression in patients with mild to moderate coronavirus disease 2019-a multi-centre observational study	10.1016/j.cmi.2020.05.041	Yes	COPD: 46 (4.6%)	No	-	1007
Challener DW, et al.	Screening for COVID-19: Patient factors predicting positive PCR test	10.1017/ice.2020.249	Yes	COPD: 6 (12.5%)	Yes	6 (12.5%)* same patients with other chronic pulmonary diseases	48
Chao JY, et al.	Clinical Characteristics and Outcomes of Hospitalized and Critically Ill Children and Adolescents with Coronavirus Disease 2019 (COVID-19) at a Tertiary Care Medical Center in New York City	10.1016/j.jpeds.2020.05.006	No	-	Yes	11 (24.4%)	46
Chen G, et al.	Clinical and Immunological Features of Severe and Moderate Coronavirus Disease 2019	10.1172/JCI137244	No	-	No	-	41
Chen H, et al.	Clinical Characteristics and Intrauterine Vertical Transmission Potential of COVID-19 Infection in Nine Pregnant Women: A Retrospective Review of Medical Records	10.1016/S0140-6736(20)30360-3	No	-	No	-	9
Chen J, et al.	Clinical progression of patients with COVID-19 in Shanghai, China	10.1016/j.jinf.2020.03.004	Yes	Respiratory Diseases: 5 (2%)	No	-	249
Chen N, et al.	Epidemiological and Clinical Characteristics of 99 Cases of 2019 Novel Coronavirus Pneumonia in Wuhan, China: A Descriptive Study	10.1016/S0140-6736(20)30211-7	Yes	Respiratory Diseases: 1 (1%)	No	-	99
Chen P, et al.	Clinical and Demographic Characteristics of Cluster Cases and Sporadic Cases of Coronavirus Disease 2019 (COVID-19) in 141 Patients in the Main District of Chongqing, China, Between January and February 2020	10.12659/MSM.923985	Yes	COPD: 17 (12%)	No	-	141
Chen Q, et al.	Clinical Characteristics of 145 Patients With Corona Virus Disease 2019 (COVID-19) in Taizhou, Zhejiang, China	10.1007/s15010-020-01432-5	Yes	COPD: 6 (4,13%)	No	-	145
Chen R, et al.	Safety and efficacy of different anesthetic regimens for parturients with COVID-19 undergoing Cesarean delivery: a case series of 17 patients	10.1007/s12630-020-01630-7	No	-	No	-	17
Chen T, et al.	Clinical characteristics and outcomes of older patients with coronavirus disease 2019 (COVID-19) in Wuhan, China (2019): a single-centered, retrospective study	10.1093/gerona/glaa089	Yes	COPD: 8 (3.9%)	No	-	203
Chen T, et al.	Clinical Characteristics of 113 Deceased Patients With Coronavirus Disease 2019: Retrospective Study	10.1136/bmj.m1091	Yes	Chronic lung diseases: 18 (7%)	No	-	274
Chen TY, et al.	COVID-19 pneumonia in kidney transplant recipients: Focus on immunosuppression management	10.1111/tid.13378	No	-	No	-	30
Chen X, et al.	Associations of clinical characteristics and treatment regimens with the duration of viral RNA shedding in patients with COVID-19	10.1016/j.ijid.2020.06.091	Yes	Respiratory diseases: 9 (3.4%)	No	-	267
Chen X, et al.	Detectable Serum SARS-CoV-2 Viral Load (RNAemia) Is Closely Correlated With Drastically Elevated Interleukin 6 (IL-6) Level in Critically Ill COVID-19 Patients	10.1093/cid/ciaa449	Yes	Pulmonary diseases: 2 (4.2%)	No	-	48
Chen Y, et al.	Clinical Characteristics and Outcomes of Type 2 Diabetes Patients Infected with COVID-19: A Retrospective Study	10.1016/j.eng.2020.05.017	Yes	COPD: 2 (1.0%)	No	-	208
Chen Y, et al.	Epidemiological analysis of the early 38 fatalities in Hubei, China, of the coronavirus disease 2019	10.7189/jogh-10-011004	Yes	COPD: 1 (2.6%)	No	-	38
Chen Y, et al.	The Presence of SARS-CoV-2 RNA in Feces of COVID-19 Patients	10.1002/jmv.25825	Yes	COPD: 2 (4.76%)	No	-	42
Chen Y, et al.	Clinical Characteristics and Outcomes of Patients With Diabetes and COVID-19 in Association With Glucose-Lowering Medication.	10.2337/dc20-0660	Yes	Chronic lung disease: 22 (2.4%)	No	-	904
Chen Y, et al.	Impact of Fundamental Diseases on Patients With COVID-19	10.1017/dmp.2020.139	Yes	Chronic bronchitis: 7 (21.2%)	No	-	50
Cheng FY, et al.	Using Machine Learning to Predict ICU Transfer in Hospitalized COVID-19 Patients	10.3390/jcm9061668	Yes	COPD: 219 (8.42%)	Yes	219 (8.42%)	2599
Cheung ZB & Forsh DA	Early outcomes after hip fracture surgery in COVID-19 patients in New York City	10.1016/j.jor.2020.06.003	Yes	COPD: 1 (10%)	Yes	2 (20%)	10
Chhibar KD, et al.	Prevalence and characterization of asthma in hospitalized and nonhospitalized patients with COVID-19	10.1016/j.jaci.2020.06.010	Yes	COPD: 111 (7,27%)	Yes	220 (14.2%)	1542
Choi MH, et al.	Clinical Characteristics and Disease Progression in Early-Stage COVID-19 Patients in South Korea	10.3390/jcm9061959	Yes	Chronic lung disease 17 (5.8%)	No	-	293
Chung SM, et al.	The Risk of Diabetes on Clinical Outcomes in Patients with Coronavirus Disease 2019: A Retrospective Cohort Study	10.4093/dmj.2020.0105	Yes	Chronic lung disease: 4 (3.6%)	No	-	110
Clark TW, et al.	Diagnostic accuracy of the Febrile host response point-of-care test in patients hospitalised with suspected COVID-19	10.1016/j.jinf.2020.06.051	Yes	Respiratory disease: 37 (31%)	No	-	118
Colombi D, et al.	Well-aerated Lung on Admitting Chest CT to Predict Adverse Outcome in COVID-19 Pneumonia	10.1148/radiol.2020201433	Yes	Pulmonary diseases: 40 (17%)	No	-	236

<i>Corbett RW, et al.</i>	Epidemiology of COVID-19 in an Urban Dialysis Center	10.1681/ASN.2020040534	No	-	No	-	300
<i>COVID-19 Investigation Team</i>	Clinical and virologic characteristics of the first 12 patients with coronavirus disease 2019 (COVID-19) in the United States	10.1038/s41591-020-0877-5	Yes	COPD: 1 (8.3%)	No	-	12
<i>Covino M, et al.</i>	Clinical characteristics and prognostic factors in COVID-19 patients aged ≥80 years	10.1111/aggi.13960	Yes	COPD: 7 (10.1%)	No	-	69
<i>De Luca G, et al.</i>	GM-CSF blockade with mavrilimumab in severe COVID-19 pneumonia and systemic hyperinflammation: a single-centre, prospective cohort study	10.1016/S2665-9913(20)30170-3	No	-	No	-	39
<i>Deiana G, et al.</i>	Deaths in SARS-CoV-2 Positive Patients in Italy: The Influence of Underlying Health Conditions on Lethality	10.3390/tjcrph17124450	Yes	Chronic lung disease: 22 (22.7%)	No	-	97
<i>Deng L, et al.</i>	Arbidol Combined With LPV/r Versus LPV/r Alone Against Corona Virus Disease 2019: A Retrospective Cohort Study	10.1016/j.jinf.2020.03.002	Yes	COPD: 1 (5.9 %)	No	-	33
<i>Deng W, et al.</i>	Positive results for patients with COVID-19 discharged from hospital in Chongqing, China	10.1186/s12879-020-05151-y	Yes	COPD: 8 (13.1%)	No	-	61
<i>Deng Y, et al.</i>	Clinical characteristics of fatal and recovered cases of coronavirus disease 2019 in Wuhan, China: a retrospective study	10.1097/CM9.0000000000000824	Yes	Lung disease: 25 (11.1%)	No	-	225
<i>Ding Q, et al.</i>	The Clinical Characteristics of Pneumonia Patients Coinfected With 2019 Novel Coronavirus and Influenza Virus in Wuhan, China	10.1002/jmv.25781	No	-	No	-	5
<i>Dong X, et al.</i>	Eleven Faces of Coronavirus Disease 2019	10.1111/all.14289	Yes	COPD: 1 (9%)	No	-	11
<i>D'Silva KM, et al.</i>	Clinical characteristics and outcomes of patients with coronavirus disease 2019 (COVID-19) and rheumatic disease: a comparative cohort study from a US 'hot spot'	10.1136/annrheumdis-2020-217888	Yes	COPD: 9 (5.7%)	Yes	31 (19.8%)	156
<i>Du H, et al.</i>	Clinical characteristics of 182 pediatric COVID-19 patients with different severities and allergic status	10.1111/all.14452	No	-	Yes	1 (2.3%)	43
<i>Du X, et al.</i>	Clinical features of hemodialysis patients with COVID-19: a single-center retrospective study on 32 patients	10.1007/s10157-020-01904-w	No	-	No	-	32
<i>Duan X, et al.</i>	A retrospective study of the initial 25 COVID-19 patients in Luoyang, China	10.1007/s11604-020-00988-4	Yes	COPD: 1 (4%)	No	-	25
<i>Duanmu Y, et al.</i>	Characteristics of Emergency Department Patients With COVID-19 at a Single Site in Northern California: Clinical Observations and Public Health Implications	10.1111/acem.14003	Yes	COPD: 1 (10%)	yes	10 (10%)	100
<i>Dube GK, et al.</i>	COVID-19 in pancreas transplant recipients	10.1111/tid.13359	No	-	No	-	4
<i>Fan J, et al.</i>	The epidemiology of reverse transmission of COVID-19 in Gansu Province, China.	10.1016/j.tmaid.2020.101741	Yes	COPD: N/A	Yes	N/A	37
<i>Fan N, et al.</i>	Imaging characteristics of initial chest computed tomography and clinical manifestations of patients with COVID-19 pneumonia	10.1007/s11604-020-00973-x	Yes	Chronic bronchitis N/A	No	-	150
<i>Feng Y, et al.</i>	COVID-19 with Different Severities: A Multicenter Study of Clinical Features	10.1002/oby.22832	Yes	COPD: 22 (4.6%)	No	-	476
<i>Ferguson J, et al.</i>	Characteristics and Outcomes of Coronavirus Disease Patients under Nonsurge Conditions, Northern California, USA, March-April 2020	10.3201/eid2608.201776	Yes	COPD: 10 (13.9%)	Yes	10 (13.9%)* same patients with COPD	72
<i>Fernandéz R, et al.</i>	COVID-19 in Solid Organ Transplant Recipients: A Single-Center Case Series From Spain	10.1111/ajt.15929	No	-	Yes	1 (5.55%)	18
<i>Fontana F, et al.</i>	SARS-CoV-2 infection in dialysis patients in northern Italy: a single-centre experience	10.1093/ckj/sfaa084	No	-	No	-	15
<i>Galloway JB, et al.</i>	A clinical risk score to identify patients with COVID-19 at high risk of critical care admission or death: An observational cohort study	10.1016/j.jinf.2020.05.064	Yes	Chronic lung disease: 234 (20.2%)	No	-	1157
<i>Gan J, et al.</i>	Leucocyte Subsets Effectively Predict the Clinical Outcome of Patients With COVID-19 Pneumonia: A Retrospective Case-Control Study	10.3389/fpubh.2020.00299	Yes	COPD: 6(6%)	No	-	95
<i>Gao M, et al.</i>	A Study on Infectivity of Asymptomatic SARS-CoV-2 Carriers	10.1016/j.j.med.2020.106026	No	-	No	-	35
<i>Gao X, et al.</i>	Improving the early diagnosis of suspected patients with COVID-19: a retrospective study of 106 patients	10.3855/jdc.12992	Yes	COPD: 4 (3.8%)	No	-	106
<i>Gao Y, et al.</i>	Diagnostic Utility of Clinical Laboratory Data Determinations for Patients With the Severe COVID-19	10.1002/jmv.25770	Yes	COPD: 8 (18.6%)	No	-	43
<i>Garassino MC, et al.</i>	COVID-19 in patients with thoracic malignancies (TERAVOLT): first results of an international, registry-based, cohort study	10.1016/S1470-2045(20)30314-4	Yes	COPD: 51 (26%)	No	-	198
<i>Garfinkle R, et al.</i>	Development and Validation of a Clinical Risk Score for IntensiveCare Resource Utilization After Colon Cancer Surgery: a PracticalGuide to the Selection of Patients During COVID-19	10.1007/s11605-020-04665-9	No	-	No	-	54893
<i>Gayam V, et al.</i>	Presenting characteristics, comorbidities, and outcomes of patients coinfectd with COVID-19 and Mycoplasma pneumoniae in the USA	10.1002/jmv.26026	No	-	Yes	2 (33.3%)	6

<i>Giacomelli A, et al.</i>	30-day mortality in patients hospitalized with COVID-19 during the first wave of the Italian epidemic: A prospective cohort study	10.1016/j.phrs.2020.104931	No	-	No	-	233
<i>Gianfrancesco M, et al.</i>	Characteristics associated with hospitalisation for COVID-19 in people with rheumatic disease: data from the COVID-19 Global Rheumatology Alliance physician-reported registry	10.1136/annrheumdis-2020-217871	Yes	Chronic lung diseases 127 (21%)*	Yes	127 (21%)*	600
<i>Gidari A, et al.</i>	Predictive value of National Early Warning Score 2 (NEWS2) for intensive care unit admission in patients with SARS-CoV-2 infection	10.1080/23744235.2020.1784457	Yes	Chronic lung disease 5 (7%)	No	-	68
<i>Gold JAW, et al.</i>	Characteristics and Clinical Outcomes of Adult Patients Hospitalized With COVID-19 - Georgia, March 2020	10.15585/mmwr.mm6918e1	Yes	COPD: 16 (5.2%)	Yes	32 (10.5%)	305
<i>Goyal P, et al.</i>	Clinical Characteristics of Covid-19 in New York City	10.1056/NEJMc2010419	Yes	COPD: 20 (5.1%)	Yes	49 (12.5%)	393
<i>Grasselli G, et al.</i>	Baseline Characteristics and Outcomes of 1591 Patients Infected With SARS-CoV-2 Admitted to ICUs of the Lombardy Region, Italy	10.1001/jama.2020.5394	Yes	COPD: 42 (4%)	No	-	1591
<i>Guan WJ, et al.</i>	Clinical Characteristics of Coronavirus Disease 2019 in China	10.1056/NEJMoa2002032	Yes	COPD: 12 (1.1%)	No	-	1099
<i>Haimovich A, et al.</i>	Patient factors associated with SARS-CoV-2 in an admitted emergency department population	10.1002/emp2.12145	Yes	Pulmonary circulation disorders 62 (7.9%)	No	-	786
<i>Han C, et al.</i>	Digestive Symptoms in COVID-19 Patients With Mild Disease Severity: Clinical Presentation, Stool Viral RNA Testing, and Outcomes	10.14309/ajg.0000000000000664	Yes	Chronic lung disease: 8 (3.9%)	No	-	206
<i>Han J, et al.</i>	Analysis of factors affecting the prognosis of COVID-19 patients and viral shedding duration	10.1017/S0950268820001399	No	-	No	-	185
<i>Han Y, et al.</i>	A comparative-descriptive analysis of clinical characteristics in 2019-coronavirus-infected children and adults	10.1002/jmv.25835	No	-	No	-	32
<i>He S, et al.</i>	Relationship between chest CT manifestations and immune response in COVID-19 patients	10.1016/j.ijid.2020.06.059	Yes	COPD: 2 (2%)	No	-	93
<i>Ho HE, et al.</i>	Clinical outcomes and immunologic characteristics of Covid-19 in people with HIV	10.1093/infdis/jiaa380	Yes	Lung disease, asthma, or COPD 25 (26.9%)	Yes	25 (26.9%)* same patients with other lung diseases	93
<i>Hong KS, et al.</i>	Clinical Features and Outcomes of 98 Patients Hospitalized With SARS-CoV-2 Infection in Daegu, South Korea: A Brief Descriptive Study	10.3349/ymj.2020.61.5.431	Yes	COPD: 5 (3.8%)	No	-	98
<i>Hu H, et al.</i>	Comparing Rapid Scoring Systems in Mortality Prediction of Critically Ill Patients With Novel Coronavirus Disease	10.1111/acem.13992	Yes	Chronic pulmonary disease: 12 (11.4%)	No	-	105
<i>Hu Z, et al.</i>	Clinical Characteristics of 24 Asymptomatic Infections With COVID-19 Screened Among Close Contacts in Nanjing, China	10.1007/s11427-020-1661-4	No	-	No	-	24
<i>Huang C, et al.</i>	Clinical features of patients infected with 2019 novel coronavirus in Wuhan, China	10.1016/S0140-6736(20)30183-5	Yes	COPD: 1 (2%)	No	-	41
<i>Huang C, et al.</i>	Mining the Characteristics of COVID-19 Patients in China: Analysis of Social Media Posts	10.2196/19087	Yes	COPD: 10 (2.06%)	No	-	485
<i>Huang D, et al.</i>	A novel risk score to predict diagnosis with coronavirus disease 2019 (COVID-19) in suspected patients: A retrospective, multicenter, and observational study	10.1002/jmv.26143	Yes	COPD: 9 (2.7%)	Yes	5 (1.5%)	336
<i>Huang L, et al.</i>	Rapid asymptomatic transmission of COVID-19 during the incubation period demonstrating strong infectivity in a cluster of youngsters aged 16-23 years outside Wuhan and characteristics of young patients with COVID-19: A prospective contact-tracing study	10.1016/j.jinf.2020.03.006	No	-	No	-	8
<i>Huang M, et al.</i>	Clinical Characteristics and Predictors of Disease Progression in Severe Patients with COVID-19 Infection in Jiangsu Province, China: A Descriptive Study	10.1016/j.amjms.2020.05.038	Yes	COPD: 2 (3.3%)	No	-	60
<i>Huang Q, et al.</i>	Clinical characteristics and drug therapies in patients with the common-type coronavirus disease 2019 in Hunan, China	10.1007/s11096-020-01031-2	Yes	Chronic bronchitis: 2 (3.7%)	No	-	54
<i>Huang R, et al.</i>	Clinical Findings of Patients With Coronavirus Disease 2019 in Jiangsu Province, China: A Retrospective, Multi-Center Study	10.1371/journal.pntd.0008280	Yes	Chronic lung disease: 7 (3.5%)	No	-	202
<i>Huang Y, et al.</i>	Clinical characteristics of 17 patients with COVID-19 and systemic autoimmune diseases: a retrospective study	10.1136/annrheumdis-2020-217425	Yes	Respiratory disease: 6 (4%)	No	-	17
<i>Huang Y, et al.</i>	Clinical Characteristics of Laboratory Confirmed Positive Cases of SARS-CoV-2 Infection in Wuhan, China: A Retrospective Single Center Analysis	10.1016/j.tmaid.2020.101606	Yes	COPD: 3 (8.82%)	No	-	34
<i>Hur K, et al.</i>	Factors Associated With Intubation and Prolonged Intubation in Hospitalized Patients With COVID-19	10.1177/0194599820929640	Yes	Pulmonary disease: 78 (16%)	No	-	486
<i>Ihle-Hansen H, et al.</i>	COVID-19: Symptoms, Course of Illness and Use of Clinical Scoring Systems for the First 42 Patients Admitted to a Norwegian Local Hospital	10.4045/tidsskr.20.0301	Yes	COPD: 3 (7%)	No	-	42
<i>Ikhtimur H, et al.</i>	Determining host factors contributing to disease severity in a family cluster of 29 hospitalized SARS-CoV-2 patients: Could genetic factors be relevant in the clinical course of COVID-19?	10.1002/jmv.26106	Yes	Chronic respiratory disease, COPD, and asthma bronchiale 19 (23.45%)	Yes	19 (23.45%)* same patients with other respiratory illness	81
<i>Inciardi RM, et al.</i>	Characteristics and Outcomes of Patients Hospitalized for COVID-19 and Cardiac Disease in Northern Italy	10.1093/eurheartj/ehaa388	Yes	COPD: 9 (9%)	No	-	99

Jang JG, et al.	Prognostic Accuracy of the SIRS, qSOFA, and NEWS for Early Detection of Clinical Deterioration in SARS-CoV-2 Infected Patients	10.3346/jkms.2020.35.e234	Yes	Chronic lung disease 4 (3.6%)	No	-	110
Javanian M, et al.	Clinical and Laboratory Findings From Patients With COVID-19 Pneumonia in Babol North of Iran: A Retrospective Cohort Study	10.2478/rjlm-2020-0013	Yes	COPD: 12 (12%)	No	-	100
Jehi L, et al.	Individualizing Risk Prediction for Positive Coronavirus Disease 2019 Testing: Results From 11,672 Patients	10.1016/j.chest.2020.05.580	Yes	COPD/emphysema: 14 (1.26%)	Yes	163 (14.7%)	1108
Ji M, et al.	Characteristics of Disease Progress in Patients With Coronavirus Disease 2019 in Wuhan, China	10.1017/S0950268820000977	Yes	COPD: 2 (2%)	No	-	101
Jie B, et al.	Clinical and Dynamic Computed Tomography Features of 24 Patients With Coronavirus Disease 2019	10.1177/0846537120918834	Yes	Pulmonary tuberculosis 1 (4.16%)	No	-	24
Jin A, et al.	Clinical characteristics of patients diagnosed with COVID-19 in Beijing	10.1016/j.bsheel.2020.05.003	Yes	COPD: 3 (7%)	No	-	45
Jin X, et al.	Epidemiological, clinical and virological characteristics of 74 cases of coronavirus-infected disease 2019 (COVID-19) with gastrointestinal symptoms	10.1136/gutjnl-2020-320926	Yes	COPD: 1 (0.15%)	No	-	651
Kant A, et al.	The relationship between diagnostic value of chest computed tomography imaging and symptom duration in COVID infection	10.4103/atm.ATM_165_20	No	-	No	-	105
Kanthimathinathan HK, et al.	COVID-19: A UK Children's Hospital Experience	10.1542/hpeds.2020-000208	Yes	Respiratory disease: 6 (13%)	No	-	45
Kaushik S, et al.	Multisystem Inflammatory Syndrome in Children Associated with Severe Acute Respiratory Syndrome Coronavirus 2 Infection (MIS-C): A Multi-institutional Study from New York City	10.1016/j.jpeds.2020.06.045	No	-	Yes	5 (15%)	33
Ketcham SW, et al.	Coronavirus Disease-2019 in Heart Transplant Recipients in Southeastern Michigan: A Case Series	10.1016/j.cardfail.2020.05.008	Yes	Obstructive sleep apnea: 6 (46%)	No	-	13
Khamis F, et al.	Clinical characteristics and outcomes of the first 63 adult patients hospitalized with COVID-19: An experience from Oman	10.1016/j.jiph.2020.06.002	No	-	No	-	63
Khider L, et al.	Curative anticoagulation prevents endothelial lesion in COVID-19 patients	10.1111/jth.14968	No	-	No	-	66
Killerby et al.	Characteristics Associated with Hospitalization Among Patients with COVID-19	10.15585/mmwr.mm6925e1	Yes	Chronic respiratory disease: 101 (19%)	No	-	531
Knight M, et al.	Characteristics and outcomes of pregnant women admitted to hospital with confirmed SARS-CoV-2 infection in UK: national population based cohort study	10.1136/bmj.m2107	No	-	Yes	31 (7%)	427
Koleilat I, et al.	Clinical characteristics of acute lower extremity deep venous thrombosis diagnosed by duplex in patients hospitalized for coronavirus disease 2019	10.1016/j.jvs.2020.06.012	Yes	COPD: 13 (11.1%)	No	-	117
Kong W, et al.	Comparison of clinical and epidemiological characteristics of asymptomatic and symptomatic SARS-CoV-2 infection: A multi-center study in Sichuan Province, China	10.1016/j.tmaid.2020.101754	Yes	Pulmonary tuberculosis: 3 (3%)	No	-	100
Kong Y, et al.	VEGF-D: a novel biomarker for detection of COVID-19 progression	10.1186/s13054-020-03079-y	Yes	Chronic Pulmonary disease: 6 (25%)	No	-	24
Korkmaz MF, et al.	The Epidemiological and Clinical Characteristics of 81 Children with COVID-19 in a Pandemic Hospital in Turkey: an Observational Cohort Study	10.3346/jkms.2020.35.e236	No	-	Yes	1 (1.23%)	81
Lagadinou M, et al.	Prognosis of COVID-19: Changes in laboratory parameters	10.1186/s12931-020-01428-7	Yes	Acute respiratory distress syndrome: 35 (10.00%)	No	-	349
Lam RPK, et al.	Clinical, laboratory, and radiological features indicative of novel coronavirus disease (COVID-19) in emergency departments - a multicentre case-control study in Hong Kong.	10.1002/emp2.12183	Yes	COPD: 1 (2.5%)	No	-	37
Lechien JR, et al.	Clinical and Epidemiological Characteristics of 1,420 European Patients With Mild-To-Moderate Coronavirus Disease 2019	10.1111/joim.13089	Yes	Respiratory insufficiency 10 (0.7%)	Yes	93 (6.5%)	1420
Lee J, et al.	Early Intervention of Palliative Care in the Emergency Department During the COVID-19 Pandemic	10.1001/jamainternmed.2020.2713	Yes	Chronic lung condition 20 (18.2%)	No	-	110
Lee JY, et al.	Risk Factors for Mortality and Respiratory Support in Elderly Patients Hospitalized with COVID-19 in Korea	10.3346/jkms.2020.35.e223	Yes	Chronic lung disease: 8 (8.2%)	No	-	98
Lee LY, et al.	COVID-19 mortality in patients with cancer on chemotherapy or other anticancer treatments: a prospective cohort study	10.1016/S0140-6736(20)31173-9	Yes	COPD: 61 (8%)	No	-	800
Lei S, et al.	Clinical Characteristics and Outcomes of Patients Undergoing Surgeries During the Incubation Period of COVID-19 Infection	10.1016/j.eclinm.2020.100331	Yes	COPD: 1 (2.9%)	No	-	34
Lei Z, et al.	A Cross-Sectional Comparison of Epidemiological and Clinical Features of Patients With Coronavirus Disease (COVID-19) in Wuhan and Outside Wuhan, China	10.1016/j.tmaid.2020.101664	Yes	COPD: 2 (1.68%)	No	-	119
Li J, et al.	Clinical Characteristics and Outcomes of 74 Patients With Severe or Critical COVID-19	10.1016/j.amjms.2020.05.040	Yes	Tuberculosis: 6 (8.1%)	No	-	74
Li J, et al.	Clinical features of familial clustering in patients infected with 2019 novel coronavirus in Wuhan, China	10.1016/j.virusres.2020.198043	No	-	No	-	94
Li K, et al.	The Clinical and Chest CT Features Associated With Severe and Critical COVID-19 Pneumonia	10.1097/RLI.00000000000000672	Yes	COPD: 5 (6%)	No	-	83

<i>Li M, et al.</i>	Cardiovascular disease potentially contributes to the progression and poor prognosis of COVID-19	10.1016/j.numecd.2020.04.013	No	-	No	-	83
<i>Li N, et al.</i>	Maternal and Neonatal Outcomes of Pregnant Women With COVID-19 Pneumonia: A Case-Control Study	10.1093/cid/ciaa352	No	-	No	-	16
<i>Li S, et al.</i>	Clinical and pathological investigation of patients with severe COVID-19	10.1172/jci.insight.138070	Yes	COPD: 7 (10.1%)	No	-	69
<i>Li X, et al.</i>	Risk factors for severity and mortality in adult COVID-19 inpatients in Wuhan	10.1016/j.jaci.2020.04.006	Yes	COPD: 17 (3.1%)	Yes	5 (0.9%)	548
<i>Li X, et al.</i>	Clinical and CT characteristics which indicate timely radiological reexamination in patients with COVID-19: A retrospective study in Beijing, China	10.1016/j.jrid.2020.05.003	Yes	COPD: 2 (2.7%)	No	-	73
<i>Li X, et al.</i>	Effect of combination antiviral therapy on hematological profiles in 151 adults hospitalized with severe coronavirus disease 2019	10.1016/j.phrs.2020.105036	Yes	Respiratory disease: 6 (3.97%)	No	-	151
<i>Li X, et al.</i>	Clinical characteristics of 25 death cases with COVID-19: a retrospective review of medical records in a single medical center, Wuhan, China	10.1016/j.ijid.2020.03.053	Yes	COPD: 2 (8%)	No	-	25
<i>Li Y, et al.</i>	Clinical and Transmission Characteristics of Covid-19 - A Retrospective Study of 25 Cases From a Single Thoracic Surgery Department	10.1007/s11596-020-2176-2	Yes	COPD: 5 (20%)	No	-	25
<i>Li Y, et al.</i>	Retrospective Analysis of Laboratory Testing in 54 Patients With Severe- Or Critical-Type 2019 Novel Coronavirus Pneumonia	10.1038/s41374-020-0431-6	Yes	Pulmonary disease: 4 (13.3%)	No	-	30
<i>Liabeuf S, et al.</i>	Association between renin-angiotensin system inhibitors and COVID-19 complications	10.1093/ehjcvp/pvaa062	Yes	COPD: 26 (10%)	Yes	14 (5%)	268
<i>Lian J, et al.</i>	Epidemiological, clinical, and virological characteristics of 465 hospitalized cases of coronavirus disease 2019 (COVID-19) from Zhejiang province in China	10.1111/irv.12758	Yes	COPD: 0 (0%)	No	-	465
<i>Lian J, et al.</i>	Analysis of Epidemiological and Clinical Features in Older Patients With Corona Virus Disease 2019 (COVID-19) Out of Wuhan	10.1093/cid/ciaa242	Yes	COPD: 3 (0.38%)	No	-	788
<i>Lian N, et al.</i>	Umifenovir treatment is not associated with improved outcomes in patients with coronavirus disease 2019: a retrospective study	10.1016/j.cmi.2020.04.026	No	-	No	-	81
<i>Liang W, et al.</i>	Clinical Characteristics and Outcomes of Hospitalised Patients With COVID-19 Treated in Hubei (Epicenter) and Outside Hubei (Non-Epicenter): A Nationwide Analysis of China	10.1183/13993003.00562-2020	Yes	COPD: 24 (1.5%)	No	-	1590
<i>Liang W, et al.</i>	Development and Validation of a Clinical Risk Score to Predict the Occurrence of Critical Illness in Hospitalized Patients With COVID-19	10.1001/jamainternmed.2020.2033	Yes	COPD: 24 (1.5%)	No	-	1590
<i>Liang Y, et al.</i>	Neurosensory dysfunction: A diagnostic marker of early COVID-19	10.1016/j.ijid.2020.06.086	No	-	No	-	86
<i>Liu BM, et al.</i>	Epidemiological characteristics of COVID-19 patients in convalescence period	10.1017/S0950268820001181	Yes	Pulmonary tuberculosis: 4 (5.9%)	Yes	1 (1.5%)	68
<i>Liu D, et al.</i>	The pulmonary sequelae in discharged patients with COVID-19: a short-term observational study	10.1186/s12931-020-01385-1	No	-	Yes	4 (2.8%)	149
<i>Liu F, et al.</i>	Patients of COVID-19 may benefit from sustained Lopinavir-combined regimen and the increase of Eosinophil may predict the outcome of COVID-19 progression	10.1016/j.ijid.2020.03.013	No	-	No	-	10
<i>Liu F, et al.</i>	Prognostic value of interleukin-6, C-reactive protein, and procalcitonin in patients with COVID-19	10.1016/j.jcv.2020.104370	Yes	Respiratory disease: 16 (11.4 %)	No	-	140
<i>Liu J, et al.</i>	Prevalence and predictive value of hypocalcemia in severe COVID-19 patients	10.1016/j.jiph.2020.05.029	Yes	Respiratory diseases: 11(10%)	No	-	107
<i>Liu J, et al.</i>	Neutrophil-to-lymphocyte ratio predicts critical illness patients with 2019 coronavirus disease in the early stage	10.1186/s12967-020-02374-0	Yes	COPD: 6 (5.2%)	No	-	115
<i>Liu K, et al.</i>	Clinical Characteristics of Novel Coronavirus Cases in Tertiary Hospitals in Hubei Province	10.1097/CM9.0000000000000744	Yes	COPD: 2 (1.5%)	No	-	137
<i>Liu L, et al.</i>	Epidemiological and Clinical Characteristics of Patients With Coronavirus Disease-2019 in Shiyan City, China	10.3389/fcimb.2020.00284	Yes	COPD: 8 (15.1%)	No	-	53
<i>Liu M, et al.</i>	COVID-19 Pneumonia: CT Findings of 122 Patients and Differentiation From Influenza Pneumonia	10.1007/s00330-020-06928-0	Yes	COPD: 4 (3%)	No	-	122
<i>Liu SF, et al.</i>	Comparison of the Characteristics and Outcomes of Coronavirus Disease 2019 in Different Types of Family Infections in Taiwan	10.3390/jcm9051527	No	-	No	-	32
<i>Liu W, et al.</i>	Analysis of factors associated with disease outcomes in hospitalized patients with 2019 novel coronavirus disease	10.1097/CM9.0000000000000775	Yes	COPD: 2 (2.6%)	No	-	78
<i>Liu X, et al.</i>	Analysis of clinical features and early warning signs in patients with severe COVID-19: A retrospective cohort study	10.1371/journal.pone.0235459	Yes	Respiratory disease 10 (9.6%)	No	-	104
<i>Liu Y, et al.</i>	Clinical and Biochemical Indexes From 2019-nCoV Infected Patients Linked to Viral Loads and Lung Injury	10.1007/s11427-020-1643-8	Yes	Chronic lung disease: 1 (8.3%)	No	-	12
<i>Liu Y, et al.</i>	Neutrophil-to-lymphocyte Ratio as an Independent Risk Factor for Mortality in Hospitalized Patients With COVID-19	10.1016/j.jinf.2020.04.002	Yes	COPD: 8 (3.26%)	No	-	245

<i>Liu Z, et al.</i>	Association between Initial Chest CT or Clinical Features and Clinical Course in Patients with Coronavirus Disease 2019 Pneumonia	10.3348/kjr.2020.0171	No	-	No	-	72
<i>Lo IL, et al.</i>	Evaluation of SARS-CoV-2 RNA shedding in clinical specimens and clinical characteristics of 10 patients with COVID-19 in Macau	10.7150/ijbs.45357	No	-	No	-	7
<i>Lodigiani C, et al.</i>	Venous and Arterial Thromboembolic Complications in COVID-19 Patients Admitted to an Academic Hospital in Milan, Italy	10.1016/j.thromres.2020.04.024	Yes	COPD: 35 (9%)	No	-	388
<i>Lokken EM, et al.</i>	Clinical characteristics of 46 pregnant women with a severe acute respiratory syndrome coronavirus 2 infection in Washington State	10.1016/j.ajog.2020.05.031	No	-	Yes	4 (8.7%)	46
<i>Lorente-Ros A, et al.</i>	Myocardial injury determination improves risk stratification and predicts mortality in COVID-19 patients	10.5603/CJ.a2020.0089	Yes	COPD: 100 (10,74%)	No	-	931
<i>Louapre C, et al.</i>	Clinical Characteristics and Outcomes in Patients With Coronavirus Disease 2019 and Multiple Sclerosis	10.1001/jamaneurol.2020.2581	Yes	Pulmonary comorbidity 17 (2.5%)	No	-	347
<i>Lu R, et al.</i>	Epidemiological and clinical characteristics of COVID-19 patients in Nantong, China	10.3855/jdc.12678	Yes	Respiratory system disease: 2 (7.1%)	No	-	28
<i>Luo P, et al.</i>	Metformin Treatment Was Associated with Decreased Mortality in COVID-19 Patients with Diabetes in a Retrospective Analysis	10.4269/ajtmh.20-0375	Yes	COPD: 6 (3.4%)	No	-	179
<i>Luo X, et al.</i>	Prognostic value of C-reactive protein in patients with COVID-19	10.1093/cid/ciaa641	Yes	Chronic pulmonary disease: 23 (7.7%)	No	-	298
<i>Ma S, et al.</i>	Clinical characteristics of critically ill patients co-infected with SARS-CoV-2 and the influenza virus in Wuhan, China	10.1016/j.ijid.2020.05.068	Yes	Chronic pulmonary disease: 8 (8.6%)	No	-	93
<i>Magagnoli et al.</i>	Outcomes of Hydroxychloroquine Usage in United States Veterans Hospitalized with COVID-19	10.1016/j.medj.2020.06.001	Yes	COPD: 175 (21.68%)	40	40 (4.95%)	807
<i>McCullough SA, et al.</i>	Electrocardiographic Findings in Coronavirus Disease-19: Insights on Mortality and Underlying Myocardial Processes	10.1016/j.cardfail.2020.06.005	Yes	Respiratory disease: 142 (18.8%)	No	-	756
<i>Melis D, et al.</i>	Clinical efficacy, speed of improvement and safety of apremilast for the treatment of adult Psoriasis during COVID-19 pandemic	10.1111/dth.13722	No	-	No	-	48
<i>Meng H, et al.</i>	CT Imaging and Clinical Course of Asymptomatic Cases With COVID-19 Pneumonia at Admission in Wuhan, China	10.1016/j.jinf.2020.04.004	Yes	COPD: 1 (1.7%)	No	-	58
<i>Meng Y, et al.</i>	Sex-specific Clinical Characteristics and Prognosis of Coronavirus disease-19 Infection in Wuhan, China: A Retrospective Study of 168 Severe Patients	10.1371/journal.ppat.1008520	Yes	COPD: 1 (0.6%)	No	-	168
<i>Merza MA, et al.</i>	COVID-19 outbreak in Iraqi Kurdistan: The first report characterizing epidemiological, clinical, laboratory, and radiological findings of the disease.	10.1016/j.dsx.2020.04.047	Yes	Bronchitis: 2 (13.3%)	Yes	2 (13.3%)* same patients with bronchitis	15
<i>Mestre-Gómez B, et al.</i>	Incidence of pulmonary embolism in non-critically ill COVID-19 patients. Predicting factors for a challenging diagnosis	10.1007/s11239-020-02190-9	Yes	Chronic obstructive lung disease: 13 (14.28%)	Yes	7 (7.69%)	91
<i>Myers LC, et al.</i>	Characteristics of Hospitalized Adults With COVID-19 in an Integrated Health Care System in California	10.1001/jama.2020.7202	Yes	COPD: 28 (7.4%)	Yes	28 (7.4%)* same patients with COPD	377
<i>Mikami T, et al.</i>	Risk Factors for Mortality in Patients with COVID-19 in New York City.	10.1007/s11606-020-05983-z	Yes	COPD: 176 (2.7%)	Yes	271 (4.2%)	6493
<i>Mitra AR, et al.</i>	Baseline characteristics and outcomes of patients with COVID-19 admitted to intensive care units in Vancouver, Canada: a case series	10.1503/cmaj.200794	Yes	COPD: 8 (6.8%)	Yes	14 (12%)	117
<i>Mo P, et al.</i>	Clinical characteristics of refractory COVID-19 pneumonia in Wuhan, China	10.1093/cid/ciaa270	Yes	COPD: 5 (3.2%)	No	-	155
<i>Morena V, et al.</i>	Off-label use of tocilizumab for the treatment of SARS-CoV-2 pneumonia in Milan, Italy	10.1016/j.ejim.2020.05.011	Yes	Chronic lung diseases: 5 (9.8%)	No	-	51
<i>Myers CN, et al.</i>	COVID-19 in lung transplant recipients	10.1111/tid.13364	Yes	COPD: 2 (25%)	No	-	8
<i>Neveu S, et al.</i>	Incidental diagnosis of Covid-19 pneumonia on chest computed tomography	10.1016/j.diii.2020.05.011	Yes	COPD: 1 (16,6%)	No	-	6
<i>Nowak B, et al.</i>	Clinical characteristics and short-term outcomes of patients with coronavirus disease 2019: a retrospective single-center experience of a designated hospital in Poland	10.20452/pamw.15361	Yes	COPD: 22 (13%)	No	-	169
<i>Nie Y, et al.</i>	Epidemiological and clinical characteristics of 671 COVID-19 patients in Henan Province, China	10.1093/ije/dyaa081	Yes	Respiratory disease: 15 (4.3%)	Yes	15 (4.3%)* same patients with other respiratory diseases	671
<i>Oualha M, et al.</i>	Severe and fatal forms of COVID-19 in children	10.1016/j.arcped.2020.05.010	Yes	COPD: 1 (3.7%) e Chronic lung disease: 2 (7.4%)	Yes	1 (3,7%)	27
<i>Pan Lei, et al.</i>	Clinical Characteristics of COVID-19 Patients With Digestive Symptoms in Hubei, China	10.14309/ajg.0000000000000620	Yes	Respiratory diseases: 9 (4.41%)	No	-	204
<i>Pare JR, et al.</i>	Point-of-care Lung Ultrasound Is More Sensitive than Chest Radiograph for Evaluation of COVID-19	10.5811/westjem.2020.5.47743	Yes	COPD: 1 (3.7%)	Yes	4 (14.8%)	27
<i>Parri N, et al.</i>	Characteristic of COVID-19 infection in pediatric patients: early findings from two Italian Pediatric Research Networks	10.1007/s00431-020-03683-8	Yes	Respiratory chronic diseases 16 (12%)	No	-	130

Pei G, et al.	Renal Involvement and Early Prognosis in Patients with COVID-19 Pneumonia	10.1681/ASN.2020030276	No	-	No	-	333
Pereira MR, et al.	COVID-19 in Solid Organ Transplant Recipients: Initial Report From the US Epicenter	10.1111/ajt.15941	Yes	Chronic lung disease: 17 (19%)	No	-	90
Petrilli CM, et al.	Factors associated with hospital admission and critical illness among 5279 people with coronavirus disease 2019 in New York City: prospective cohort study	10.1136/bmj.m1966	Yes	COPD: 906 (17.1%)	Yes	906 (17.1%)* same patients with COPD	5279
Peyrony O, et al.	Accuracy of Emergency Department Clinical Findings for Diagnosis of Coronavirus Disease 2019	10.1016/j.annemergmed.2020.05.022	Yes	COPD: 24 (6.2%)	Yes	22 (5.7%)	391
Philips K, et al.	Rapid Implementation of an Adult COVID-19 Unit in a Children's Hospital	10.1016/j.jpeds.2020.04.060	Yes	History of lung disease: 19 (19)	No	-	100
Phipps MM, et al.	Acute Liver Injury in COVID-19: Prevalence and Association with Clinical Outcomes in a Large US Cohort	10.1002/hep.31404	Yes	COPD: 185 (8.1%)	Yes	308 (14)	2273
Piano S, et al.	Abnormal liver function tests predict transfer to intensive care unit and death in COVID-19	10.1111/liv.14565	Yes	COPD: 45 (8%)	No	-	565
Pisapia R, et al.	Differences among confirmed and not-confirmed COVID-19 patients at "D.Cotugno" hospital, Naples (Italy): what we learned from first suspected cases?	PMID: 32532943	No	-	No	-	17
Pongpirul WA, et al.	Clinical Characteristics of Patients Hospitalized with Coronavirus Disease, Thailand	10.3201/eid2607.200598	Yes	COPD: 0	0	0	11
Price-Haywood EG, et al.	Hospitalization and Mortality among Black Patients and White Patients with Covid-19	10.1056/NEJMsa2011686	Yes	COPD: 79 (2.25%)	Yes	147 (4%)	3481
Pung R, et al.	Investigation of three clusters of COVID-19 in Singapore: Implications for surveillance and response measures	10.1016/S0140-6736(20)30528-6	No	-	No	-	17
Qi X, et al.	Clinical course of COVID-19 in patients with pre-existing decompensated cirrhosis: initial report from China	10.1007/s12072-020-10051-z	No	-	No	-	3
Qin C, et al.	Clinical Characteristics and Outcomes of COVID-19 Patients With a History of Stroke in Wuhan, China	10.1161/STROKEAHA.120.030365	Yes	COPD: 28 (1.5)	No	-	1875
Qiu C, et al.	Transmission and Clinical Characteristics of Coronavirus Disease 2019 in 104 outside-Wuhan Patients, China	10.1002/jmv.25975	Yes	COPD: 1 (0.96%)	No	-	104
Qiu L, et al.	SARS-CoV-2 Is Not Detectable in the Vaginal Fluid of Women With Severe COVID-19 Infection	10.1093/cid/ciaa375	No	-	No	-	10
Ren ZL, et al.	Epidemiologic and Clinical Characteristics of Heart Transplant Recipients During the 2019 Coronavirus Outbreak in Wuhan, China: A Descriptive Survey Report	10.1016/j.healun.2020.03.008	Yes	COPD: 1 (1.1%)	No	-	87
Richardson S et al.	Presenting Characteristics, Comorbidities, and Outcomes Among 5700 Patients Hospitalized With COVID-19 in the New York City Area.	10.1001/jama.2020.6775	Yes	COPD: 287 (5.4%)	Yes	479 (9%)	5700
Rivera-Izquierdo M, et al.	Sociodemographic, clinical and laboratory factors on admission associated with COVID-19 mortality in hospitalized patients: A retrospective observational study	10.1371/journal.pone.0235107	Yes	Prior lung disease 50 (21%)	No	-	238
Rogado J, et al.	Covid-19 and lung cancer: A greater fatality rate?	10.1016/j.lungcan.2020.05.034	Yes	COPD: 9 (52.9%)	No	-	17
Romero-Sánchez CM, et al.	Neurologic manifestations in hospitalized patients with COVID-19: The ALBACOV registry	10.1212/WNL.00000000000009937	No	-	No	-	841
Rong Y, et al.	Clinical characteristics and risk factors of mild-to-moderate COVID-19 patients with false-negative SARS-CoV-2 nucleic acid	10.1002/jmv.26242	Yes	COPD: 4 (8%)	No	-	50
Sabatino J, et al.	COVID-19 and Congenital Heart Disease: Results from a Nationwide Survey	10.3390/jcm9061774	No	-	No	-	9
Sabri A, et al.	Novel coronavirus disease 2019: predicting prognosis with a computed tomography-based disease severity score and clinical laboratory data	10.20452/pamw.15422	No	-	No	-	63
Salva EP, et al.	Epidemiological and clinical characteristics of patients with suspected COVID-19 admitted in Metro Manila, Philippines	10.1186/s41182-020-00241-8	Yes	Respiratory illness: 7 (16,6%)	Yes	7 (16,6%)* same patients with other respiratory illness	42
San-Juan R, et al.	Incidence and clinical profiles of COVID-19 pneumonia in pregnant women: A single-centre cohort study from Spain	10.1016/j.eclinm.2020.10.0407	No	-	Yes	4 (12.5%)	32
Satici C, et al.	Performance of pneumonia severity index and CURB-65 in predicting 30-day mortality in patients with COVID-19	10.1016/j.ijid.2020.06.038	Yes	COPD: 28 (4.1%)	Yes	43 (6.3%)	681
Sentilhes L, et al.	Coronavirus disease 2019 in pregnancy was associated with maternal morbidity and preterm birth	10.1016/j.ajog.2020.06.022	No	-	Yes	5 (9.3%)	54
Shahriariad R, et al.	Epidemiological and clinical features of 2019 novel coronavirus diseases (COVID-19) in the South of Iran	10.1186/s12879-020-05128-x	Yes	COPD: 9 (8%)	Yes	7 (6.2%)	113
Shalev N, et al.	Clinical characteristics and outcomes in people living with HIV hospitalized for COVID-19	10.1093/cid/ciaa635	Yes	COPD: 8 (25.8%)	Yes	8 (25.8%)* same patients with COPD	31
Shang W, et al.	The value of clinical parameters in predicting the severity of COVID-19	10.1002/jmv.26031	Yes	Pulmonary disease: 12 (2.7%)	No	-	443

Shekerdemian LS, et al.	Characteristics and Outcomes of Children With Coronavirus Disease 2019 (COVID-19) Infection Admitted to US and Canadian Pediatric Intensive Care Units	10.1001/jamapediatrics.2020.1948	Yes	Chronic lung disease: 2 (4%)	No	-	48
Shi J, et al.	Lactate dehydrogenase and susceptibility to deterioration of mild COVID-19 patients: a multicenter nested case-control study	10.1186/s12916-020-01633-7	No	-	No	-	85
Shi M, et al.	Analysis of clinical features and outcomes of 161 patients with severe and critical COVID-19: A multicenter descriptive study	10.1002/jcla.23415	Yes	COPD: 11 (6.83%)	No	-	161
Shi Q, et al.	Clinical Characteristics and Risk Factors for Mortality of COVID-19 Patients With Diabetes in Wuhan, China: A Two-Center, Retrospective Study	10.2337/dc20-0598	Yes	Chronic pulmonary disease: 21 (6.8%)	No	-	306
Shi S, et al.	Characteristics and clinical significance of myocardial injury in patients with severe coronavirus disease 2019	10.1093/eurheartj/ehaa408	Yes	COPD: 23 (3.4%)	No	-	671
Si D, et al.	Death, discharge and arrhythmias among patients with COVID-19 and cardiac injury	10.1503/cmaj.200879	Yes	COPD: 11 (6.47%)	No	-	170
Sigel K, et al.	Covid-19 and People with HIV Infection: Outcomes for Hospitalized Patients in New York City	10.1093/cid/ciaa880	Yes	Chronic lung disease 15 (3.04%)	No	-	493
Silva F, et al.	SARS-CoV-2 infection in kidney transplant recipients: Early report of five cases	10.1111/tid.13394	No	-	No	-	5
Simonet A, et al.	High Prevalence of Obesity in Severe Acute Respiratory Syndrome Coronavirus-2 (SARS-CoV-2) Requiring Invasive Mechanical Ventilation	10.1002/oby.22831	No	-	No	-	124
Singh S & Khan A	Clinical Characteristics and Outcomes of COVID-19 Among Patients With Pre-Existing Liver Disease in United States: A Multi-Center Research Network Study	10.1053/j.gastro.2020.04.064	Yes	Chronic lower respiratory diseases: 100 (40%)	No	-	250
Singhvi A, et al.	Challenges in heart transplantation during COVID-19: A single-center experience	10.1016/j.healun.2020.06.015	No	-	No	-	22
Smith SM, et al.	Impaired glucose metabolism in patients with diabetes, prediabetes and obesity is associated with severe Covid-19	10.1002/jmv.26227	Yes	COPD: 12 (6.5%)	Yes	18 (9.8%)	184
Solis & Carreño	COVID-19 Fatality and Comorbidity Risk Factors among Diagnosed Patients in Mexico	10.1101/2020.04.21.20074591	Yes	COPD: 202 (2.7%)	Yes	270 (3.6%)	7497
Steinberg E, et al.	In Young Adults with COVID-19, Obesity Is Associated with Adverse Outcomes	10.5811/westjem.2020.5.47972	No	-	No	-	210
Sultan I, et al.	The Role of Extracorporeal Life Support for Patients With COVID-19: Preliminary Results From a Statewide Experience	10.1111/jocs.14583	No	-	Yes	N/A	10
Sun D, et al.	SARS-CoV-2 infection in infants under 1 year of age in Wuhan City, China	10.1007/s12519-020-00368-y	No	-	No	-	36
Sun H, et al.	Risk Factors for Mortality in 244 Older Adults With COVID-19 in Wuhan, China: A Retrospective Study	10.1111/jgs.16533	Yes	Previous respiratory diseases: 24 (9.8%)	No	-	244
Sun L, et al.	Clinical Features of Patients With Coronavirus Disease 2019 (COVID-19) From a Designated Hospital in Beijing, China	10.1002/jmv.25966	Yes	Respiratory diseases: 4 (7.3%)	No	-	55
Sun Y, et al.	Epidemiological and Clinical Predictors of COVID-19	10.1093/cid/ciaa322	Yes	COPD: 10 (1.3%)	No	-	788
Szabados B, et al.	Clinical Characteristics and Outcome for Four SARS-CoV-2-infected Cancer Patients Treated with Immune Checkpoint Inhibitors	10.1016/j.euro.2020.05.024	No	-	No	-	4
Tabata S, et al.	Clinical characteristics of COVID-19 in 104 people with SARS-CoV-2 infection on the Diamond Princess cruise ship: a retrospective analysis	10.1016/S1473-3099(20)30482-5	Yes	Respiratory disorder: 7 (7%)	No	-	104
Tan C, et al.	C-reactive Protein Correlates With CT Findings and Predicts Severe COVID-19 Early	10.1002/jmv.25871	No	-	No	-	27
Tan W, et al.	Single Center Trends in Acute Coronary Syndrome Volume and Outcomes During the COVID-19 Pandemic	10.14740/cr1096	No	-	No	-	204
Tang B, et al.	Coronavirus Disease 2019 (COVID-19) Pneumonia in a Hemodialysis Patient	10.1016/j.xkme.2020.03.001	No	-	No	-	1
Taxonera C, et al.	2019 novel coronavirus disease (COVID-19) in patients with inflammatory bowel diseases	10.1111/apt.15804	No	-	No	-	12
Tian J, et al.	Clinical characteristics and risk factors associated with COVID-19 disease severity in patients with cancer in Wuhan, China: a multicentre, retrospective, cohort study	10.1016/S1470-2045(20)30309-0	Yes	COPD: 4 (1%)	No	-	751
Vizcarra P, et al.	Description of COVID-19 in HIV-infected individuals: a single-centre, prospective cohort	10.1016/S2352-3018(20)30164-8	Yes	Chronic respiratory disease: 8 (23%)	No	-	35
Vuagnat P, et al.	COVID-19 in breast cancer patients: a cohort at the Institut Curie hospitals in the Paris area	10.1186/s13058-020-01293-8	Yes	Chronic lung disease: 2 (3%)	No	-	59
Wan S, et al.	Clinical Features and Treatment of COVID-19 Patients in Northeast Chongqing	10.1002/jmv.25783	Yes	Pulmonary disease: 1 (0.7%)	No	-	135
Wan Y, et al.	Prognosis analysis of patients with mental disorders with COVID-19: a single-center retrospective study	10.18632/aging.103371	Yes	Chronic bronchitis: 1 (3.3%)	No	-	30

Wang A, et al.	Stroke and mechanical thrombectomy in patients with COVID-19: technical observations and patient characteristics	10.1136/neurintsurg-2020-016220	No	-	No	-	5
Wang C, et al.	Alveolar macrophage dysfunction and cytokine storm in the pathogenesis of two severe COVID-19 patients	10.1016/j.ebiom.2020.102833	No	-	No	-	2
Wang D, et al.	Clinical Characteristics of 138 Hospitalized Patients With 2019 Novel Coronavirus-Infected Pneumonia in Wuhan, China	10.1001/jama.2020.1585	Yes	COPD: 4 (2.9%)	No	-	138
Wang F, et al.	Characteristics of Peripheral Lymphocyte Subset Alteration in COVID-19 Pneumonia	10.1093/infdis/jiaa150	No	-	No	-	60
Wang F, et al.	Clinical characteristics of 28 patients with diabetes and COVID-19 in Wuhan, China	10.4158/EP-2020-0108	Yes	Chronic pulmonary disease: 2 (14.3%)	No	-	28
Wang H, et al.	Neutrophil to CD4+ lymphocyte ratio as a potential biomarker in predicting virus negative conversion time in COVID-19	10.1016/j.intimp.2020.106683	Yes	Respiratory disease: 6 (6.3%)	No	-	95
Wang J, et al.	Clinical and CT findings of COVID-19: differences among three age groups	10.1186/s12879-020-05154-9	Yes	COPD: 3 (1%)	No	-	307
Wang J, et al.	Clinical characteristics of invasive pulmonary aspergillosis in patients with COVID-19 in Zhejiang, China: a retrospective case series	10.1186/s13054-020-03046-7	Yes	COPD: 4 (3.8%)	No	-	104
Wang K, et al.	Differences of Severe Acute Respiratory Syndrome Coronavirus 2 Shedding Duration in Sputum and Nasopharyngeal Swab Specimens Among Adult Inpatients With Coronavirus Disease 2019	10.1016/j.chest.2020.06.015	Yes	Chronic lung disease: 12 (17.6%)	No	-	68
Wang K, et al.	Imaging manifestations and diagnostic value of chest CT of coronavirus disease 2019 (COVID-19) in the Xiaogan area	10.1016/j.crad.2020.03.004	Yes	Respiratory diseases: 5 (4.4%)	No	-	114
Wang L, et al.	Coronavirus disease 2019 in elderly patients: Characteristics and prognostic factors based on 4-week follow-up	10.1016/j.jinf.2020.03.019	Yes	COPD: 21 (6.2%)	No	-	339
Wang M, et al.	Typical Radiological Progression and Clinical Features of Patients With Coronavirus Disease 2019	10.18632/aging.103170	Yes	COPD: 1 (2%)	No	-	66
Wang R, et al.	COVID-19 in Hemodialysis Patients: A Report of 5 Cases	10.1053/j.ajkd.2020.03.009	No	-	No	-	5
Wang X, et al.	Neutralizing Antibodies Responses to SARS-CoV-2 in COVID-19 Inpatients and Convalescent Patients	10.1093/cid/ciaa721	No	-	No	-	70
Wang X, et al.	Clinical characteristics of non-critically ill patients with novel coronavirus infection (COVID-19) in a Fangcang Hospital	10.1016/j.cmi.2020.03.032	Yes	Respiratory diseases: 20 (2.0%)	No	-	1012
Wang X, et al.	Clinical Characteristics of 80 Hospitalized Frontline Medical Workers Infected With COVID-19 in Wuhan, China	10.1016/j.jhin.2020.04.019	Yes	COPD: 1 (1.25%)	No	-	80
Wang X, et al.	Nosocomial outbreak of COVID-19 pneumonia in Wuhan, China.	10.1183/13993003.00544-2020	No	-	Yes	2 (5.7%)	35
Wang Y, et al.	Characterization of an asymptomatic cohort of SARS-CoV-2 infected individuals outside of Wuhan, China	10.1093/cid/ciaa629	Yes	COPD: 2 (1.58%)	No	-	126
Wang Y, et al.	Clinical Characteristics of Patients Infected With the Novel 2019 Coronavirus (SARS-Cov-2) in Guangzhou, China	10.1093/ofid/ofaa187	No	-	No	-	275
Wang Z, et al.	Clinical characteristics and laboratory results of pregnant women with COVID-19 in Wuhan, China	10.1002/jgo.13265	No	-	No	-	72
Wang Z, et al.	Clinical Characteristics and Therapeutic Procedure for Four Cases With 2019 Novel Coronavirus Pneumonia Receiving Combined Chinese and Western Medicine Treatment	10.5582/bst.2020.01030	No	-	No	-	4
Wu C, et al.	Risk Factors Associated With Acute Respiratory Distress Syndrome and Death in Patients With Coronavirus Disease 2019 Pneumonia in Wuhan, China	10.1001/jamainternmed.2020.0994	Yes	Chronic lung diseases: 5 (2.5%)	No	-	201
Wu J, et al.	Clinical Features of Maintenance Hemodialysis Patients with 2019 Novel Coronavirus-Infected Pneumonia in Wuhan, China	10.2215/CJN.04160320	Yes	COPD: 1 (0.99%)	No	-	101
Wu J, et al.	Clinical Characteristics of Imported Cases of COVID-19 in Jiangsu Province: A Multicenter Descriptive Study	10.1093/cid/ciaa199	Yes	Respiratory system diseases: 1 (1.25%)	No	-	80
Wu J, et al.	Early Antiviral Treatment Contributes to Alleviate the Severity and Improve the Prognosis of Patients With Novel Coronavirus Disease (COVID-19)	10.1111/joim.13063	Yes	Respiratory system diseases: 6 (2.14%) and COPD: 1 (0.36%)	No	-	280
Wu X, et al.	Radiological findings and clinical characteristics of pregnant women with COVID-19 pneumonia	10.1002/jgo.13165	No	-	No	-	23
Wu Y, et al.	Clinical outcomes of 402 patients with COVID-2019 from a single center in Wuhan, China	10.1002/jmv.26168	Yes	COPD: 7 (5%)	No	-	141
Xi A, et al.	Epidemiological and clinical characteristics of discharged patients infected with SARS-CoV-2 on the Qinghai Plateau	10.1002/jmv.26032	No	-	No	-	18
Xia XY, et al.	Epidemiological and initial clinical characteristics of patients with family aggregation of COVID-19	10.1016/j.jcv.2020.104360	No	-	No	-	10
Xiang F, et al.	Antibody Detection and Dynamic Characteristics in Patients With COVID-19	10.1093/cid/ciaa461	Yes	Chronic lung disease: N/A	No	-	85

Xie H, et al.	Clinical characteristics of non-ICU hospitalized patients with coronavirus disease 2019 and liver injury: A retrospective study	10.1111/liv.14449	No	-	No	-	79
Xie J, et al.	A Predictive Nomogram for Predicting Improved Clinical Outcome Probability in Patients with COVID-19 in Zhejiang Province, China	10.1016/j.eng.2020.05.014	No	-	No	-	104
Xie J, et al.	Characteristics of Patients With Coronavirus Disease (COVID-19) Confirmed Using an IgM-IgG Antibody Test	10.1002/jmv.25930	No	-	No	-	56
Xie Y, et al.	Impact of Cardiovascular Disease on Clinical Characteristics and Outcomes of Coronavirus Disease 2019 (COVID-19)	10.1253/circj.CJ-20-0348	No	-	No	-	62
Xiong F, et al.	Clinical Characteristics of and Medical Interventions for COVID-19 in Hemodialysis Patients in Wuhan, China	10.1681/ASN.2020030354	Yes	COPD: 3 (3.1%)	No	-	131
Xu C, et al.	Imaging and Clinical Features of Patients With 2019 Novel Coronavirus SARS-CoV-2	10.1007/s00259-020-04735-9	Yes	COPD: 1 (0.9%)	No	-	90
Xu T, et al.	Clinical Features and Dynamics of Viral Load in Imported and Non-Imported Patients With COVID-19	10.1016/j.ijid.2020.03.022	Yes	Pulmonary disease: 1 (1.96%)	No	-	51
Xu T, et al.	Epidemiological and Clinical Features of Asymptomatic Patients With SARS-CoV-2 Infection	10.1002/jmv.25944	No	-	No	-	15
Xu X, et al.	Effective Treatment of Severe COVID-19 Patients With Tocilizumab	10.1073/pnas.2005615117	Yes	COPD: 1 (4.8%) and Bronchiectasis 1 (4.8%)	No	-	21
Xu XW, et al.	Clinical findings in a group of patients infected with the 2019 novel coronavirus (SARS-Cov-2) outside of Wuhan, China: retrospective case series	10.1136/bmj.m606	Yes	COPD: 1 (1.61%)	No	-	62
Yaghi S, et al.	SARS-CoV-2 and Stroke in a New York Healthcare System	10.1161/STROKEAHA.120.030335	No	-	No	-	32
Yang A, et al.	Clinical and Epidemiological Characteristics of COVID-19 Patients in Chongqing China	10.3389/fpubh.2020.00244	Yes	Respiratory system disease: 1 (0.87%)	No	-	144
Yang AP, et al.	Infection with SARS-CoV-2 causes abnormal laboratory results of multiple organs in patients	10.18632/aging.103255	No	-	No	-	93
Yang B, et al.	Impact of the COVID-19 pandemic on the process and outcome of thrombectomy for acute ischemic stroke	10.1136/neurintsurg-2020-016177	Yes	Pulmonary inflammation on chest CT: 6 (28.6%)	No	-	21
Yang F, et al.	Analysis of 92 deceased patients with COVID-19	10.1002/jmv.25891	Yes	COPD: 1 (1.08%)	No	-	92
Yang F, et al.	Clinical characteristics and outcomes of cancer patients with COVID-19	10.1002/jmv.25972	Yes	COPD: 1 (9.1%)	No	-	11
Yang K, et al.	Clinical characteristics, outcomes, and risk factors for mortality in patients with cancer and COVID-19 in Hubei, China: a multicentre, retrospective, cohort study	10.1016/S1470-2045(20)30310-7	Yes	COPD: 5 (2%)	No	-	205
Yang L, et al.	Epidemiological and clinical features of 200 hospitalized patients with corona virus disease 2019 outside Wuhan, China: A descriptive study	10.1016/j.jcv.2020.104475	Yes	Chronic lung disease: 7 (3.5 %)	No	-	200
Yang P, et al.	A retrospective study on the epidemiological characteristics and establishment of early warning system of severe COVID-19 patients	10.1002/jmv.26022	Yes	COPD: 4 (3%)	No	-	133
Yang Q, et al.	Analysis of the clinical characteristics, drug treatments and prognoses of 136 patients with coronavirus disease 2019	10.1111/jcpt.13170	No	-	No	-	136
Yang S, et al.	Clinical Characteristics of COVID-19 After Gynecologic Oncology Surgery in Three Women: A Retrospective Review of Medical Records	10.1634/theoncologist.2020-0157	No	-	No	-	3
Yang W, et al.	Clinical Characteristics and Imaging Manifestations of the 2019 Novel Coronavirus Disease (COVID-19):A Multi-Center Study in Wenzhou City, Zhejiang, China	10.1016/j.jinf.2020.02.016	Yes	Respiratory system disease: 1 (0.67%)	No	-	149
Yang Y, et al.	Plasma IP-10 and MCP-3 Levels Are Highly Associated With Disease Severity and Predict the Progression of COVID-19	10.1016/j.jaci.2020.04.027	Yes	Chronic lung disease: 2 (6.7%)	No	-	30
Yao Q, et al.	Retrospective Study of Risk Factors for Severe SARS-Cov-2 Infections in Hospitalized Adult Patients	10.20452/pamw.15312	Yes	Pulmonary disease (bronchiectasis, COPD or asthma): 3 (2.8%)	Yes	3 (2.8%)* same patients with other pulmonary diseases	108
Yao Y, et al.	Clinical characteristics of COVID-19 patients in three consecutive generations of spread in Zhejiang, China	10.1016/j.cmi.2020.06.018	Yes	COPD: 3 (1.8%)	No	-	171
Yarza R, et al.	SARS-CoV-2 infection in cancer patients undergoing active treatment: analysis of clinical features and predictive factors for severe respiratory failure and death	10.1016/j.ejca.2020.06.001	Yes	Chronic pulmonary disease 14 (22%)	No	-	63
Ye F, et al.	Delivery of Infection From Asymptomatic Carriers of COVID-19 in a Familial Cluster	10.1016/j.ijid.2020.03.042	No	-	No	-	5
Ye G, et al.	Clinical Characteristics of Severe Acute Respiratory Syndrome Coronavirus 2 Reactivation	10.1016/j.jinf.2020.03.001	No	-	No	-	55
Yin Z, et al.	A Comparison of Clinical and Chest CT Findings in Patients With Influenza A (H1N1) Virus Infection and Coronavirus Disease (COVID-19)	10.2214/AJR.20.23214	Yes	Chronic respiratory disease: 0	No	-	30
Yoshimura Y, et al.	Clinical characteristics of the coronavirus disease 2019 (COVID-19) outbreak on a cruise ship	10.1016/j.jiac.2020.06.010	Yes	Chronic respiratory diseases: 6 (35,29%)**	Yes	6 (35,29%)**	17

Yu C, et al.	Clinical Characteristics, Associated Factors, and Predicting COVID-19 Mortality Risk: A Retrospective Study in Wuhan, China	10.1016/j.amepre.2020.05.002	Yes	COPD: 50 (3.4%)	No	-	1464
Yu M, et al.	Prediction of the Development of Pulmonary Fibrosis Using Serial Thin-Section CT and Clinical Features in Patients Discharged after Treatment for COVID-19 Pneumonia	10.3348/kjr.2020.0215	Yes	COPD: 1 (3.1%)	No	-	32
Yu N, et al.	Clinical Features and Obstetric and Neonatal Outcomes of Pregnant Patients With COVID-19 in Wuhan, China: A Retrospective, Single-Centre, Descriptive Study	10.1016/S1473-3099(20)30176-6	No	-	No	-	7
Yu Q, et al.	Multicenter Cohort Study Demonstrates More Consolidation in Upper Lungs on Initial CT Increases the Risk of Adverse Clinical Outcome in COVID-19 Patients	10.7150/thno.46465	No	-	No	-	625
Yu X, et al.	Epidemiological and Clinical Characteristics of 333 Confirmed Cases With Coronavirus Disease 2019 in Shanghai, China	10.1111/tbed.13604	Yes	Respiratory diseases: 5 (1.5%)	No	-	333
Yu Y, et al.	Patients with COVID-19 in 19 ICUs in Wuhan, China: a cross-sectional study.	10.1186/s13054-020-02939-x	Yes	Chronic pulmonary disease: 15 (6.6%)	No	-	226
Yuan M, et al.	Association of Radiologic Findings With Mortality of Patients Infected With 2019 Novel Coronavirus in Wuhan, China	10.1371/journal.pone.0230548	No	-	No	-	27
Zhang C, et al.	Clinical and epidemiological characteristics of pediatric SARS-CoV-2 infections in China: A multicenter case series	10.1371/journal.pmed.1003130	No	-	Yes	1 (3%)	34
Zhang H, et al.	Identification of Kidney Transplant Recipients With Coronavirus Disease 2019	10.1016/j.eururo.2020.03.030	No	-	No	-	5
Zhang J, et al.	Poor-sleep is associated with slow recovery from lymphopenia and an increased need for ICU care in hospitalized patients with COVID-19: A retrospective cohort study	10.1016/j.bbci.2020.05.075	Yes	Chronic respiratory disease: 6 (4.4%)	No	-	135
Zhang J, et al.	Do underlying cardiovascular diseases have any impact on hospitalised patients with COVID-19?	10.1136/heartjnl-2020-316909	Yes	Respiratory system disease: 45 (8.3%)	No	-	541
Zhang J, et al.	Predictive Factors for Disease Progression in Hospitalized Patients With Coronavirus Disease 2019 in Wuhan, China	10.1016/j.jcv.2020.104392	Yes	COPD: 3 (2.7 %)	No	-	111
Zhang J, et al.	The Clinical Characteristics and Prognosis Factors of Mild-Moderate Patients With COVID-19 in a Mobile Cabin Hospital: A Retrospective, Single-Center Study	10.3389/fpubh.2020.00264	Yes	COPD: 11 (1.3%)	Yes	11 (1.3%)* same patients with COPD	869
Zhang JJ, et al.	Clinical characteristics of 140 patients infected with SARS-CoV-2 in Wuhan, China	10.1111/all.14238	Yes	COPD: 2 (1.4%)	Yes	0	140
Zhang L, et al.	Clinical Characteristics of COVID-19-infected Cancer Patients: A Retrospective Case Study in Three Hospitals Within Wuhan, China	10.1016/j.annonc.2020.03.296	Yes	COPD: 1 (3.5%)	Yes	1 (3.5%)* same patients with COPD	28
Zhang L, et al.	Diarrhea and altered inflammatory cytokine pattern in severe coronavirus disease 2019: Impact on disease course and in-hospital mortality	10.1111/jgh.15166	Yes	COPD: 23 (5.6%)	No	-	409
Zhang L, et al.	D-dimer levels on admission to predict in-hospital mortality in patients with Covid-19	10.1111/jth.14859	Yes	COPD: 8 (2.3%)	No	-	343
Zhang N, et al.	Clinical characteristics and chest CT imaging features of critically ill COVID-19 patients	10.1007/s00330-020-06955-x	Yes	COPD: 6 (10%)	No	-	60
Zhang P, et al.	The modified NUTRIC score can be used for nutritional risk assessment as well as prognosis prediction in critically ill COVID-19 patients	10.1016/j.clnu.2020.05.051	Yes	COPD: 12 (9%)	No	-	136
Zhang Q, et al.	Clinical analysis of risk factors for severe COVID-19 patients with type 2 diabetes	10.1016/j.jdiacomp.2020.107666	Yes	Secondary pulmonary tuberculosis 12 (16.2%)	No	-	74
Zhang X, et al.	Epidemiological, Clinical Characteristics of Cases of SARS-CoV-2 Infection With Abnormal Imaging Findings	10.1016/j.ijid.2020.03.040	Yes	COPD: 1 (0.15%)	No	-	645
Zhang Y, et al.	Manifestations of blood coagulation and its relation to clinical outcomes in severe COVID-19 patients: Retrospective analysis	10.1111/jjth.13273	Yes	Chronic respiratory disease: 4 (5.6%)	No	-	71
Zhang Y, et al.	The clinical characteristics and outcomes of patients with diabetes and secondary hyperglycaemia with coronavirus disease 2019: A single-centre, retrospective, observational study in Wuhan	10.1111/dom.14086	Yes	COPD: 19 (11.4%)	No	-	116
Zhao J, et al.	Retrospective Analysis of the Clinical and Epidemiological Characteristics of COVID-19 Patients in Henan Provincial People's Hospital, Zhengzhou, China	10.3389/fmed.2020.00286	Yes	Respiratory system disease 4 (13.8%)	No	-	29
Zhao M, et al.	Comparison of clinical characteristics and outcomes of patients with coronavirus disease 2019 at different ages	10.18632/aging.103298	Yes	COPD: 23 (2.3%)	Yes	12 (1.2%)	1000
Zhao S, et al.	Anesthetic Management of Patients with COVID 19 Infections during Emergency Procedures	10.1053/j.jvca.2020.02.039	Yes	Respiratory system diseases: 8 (22%)	No	-	37
Zhao W, et al.	Relation Between Chest CT Findings and Clinical Conditions of Coronavirus Disease (COVID-19) Pneumonia: A Multicenter Study	10.2214/AJR.20.22976	Yes	Respiratory system diseases: 5 (4.9%)	No	-	101
Zhao W, et al.	CT Scans of Patients With 2019 Novel Coronavirus (COVID-19) Pneumonia	10.7150/thno.45016	Yes	Respiratory system diseases: 4 (3.4%)	No	-	118
Zhao X, et al.	Clinical Characteristics of Patients With 2019 Coronavirus Disease in a non-Wuhan Area of Hubei Province, China: A Retrospective Study	10.1186/s12879-020-05010-w	Yes	COPD: 1 (1.09%)	No	-	91
Zheng F, et al.	Clinical Characteristics of 161 Cases of Corona Virus Disease 2019 (COVID-19) in Changsha	10.26355/eurrev_202003_20711	Yes	COPD: 6 (3.7%)	No	-	161

Zheng F, et al.	Clinical Characteristics of Children With Coronavirus Disease 2019 in Hubei, China	10.1007/s11596-020-2172-6	No	-	No	-	25
Zheng S, et al.	Viral Load Dynamics and Disease Severity in Patients Infected With SARS-CoV-2 in Zhejiang Province, China, January-March 2020: Retrospective Cohort Study	10.1136/bmj.m1443	Yes	Lung disease: 4 (4%)	No	-	96
Zheng Y, et al.	Epidemiological and Clinical Characteristics Analysis of COVID-19 in the Surrounding Areas of Wuhan, Hubei Province in 2020	10.1016/j.phrs.2020.104821	Yes	Sinusitis and pleurisy: 4 (5.5%)	No	-	73
Zheng Y, et al.	The Hemocyte Counts as a Potential Biomarker for Predicting Disease Progression in COVID-19: A Retrospective Study	10.1515/ccim-2020-0377	No	-	No	-	141
Zhong Q, et al.	Spinal anaesthesia for patients with coronavirus disease 2019 and possible transmission rates in anaesthetists: retrospective, single-centre, observational cohort study	10.1016/j.bja.2020.03.007	No	-	No	-	49
Zhong Z, et al.	Clinical Characteristics and Immunosuppressants Management of Coronavirus Disease 2019 in Solid Organ Transplant Recipients	10.1111/ajt.15928	No	-	No	-	2
Zhou F, et al.	Clinical Course and Risk Factors for Mortality of Adult Inpatients With COVID-19 in Wuhan, China: A Retrospective Cohort Study	10.1016/S0140-6736(20)30566-3	Yes	Chronic obstructive lung disease: 6 (3%)	No	-	191
Zhou H, et al.	COVID-19 Is Distinct From SARS-CoV-2-Negative Community-Acquired Pneumonia	10.3389/fcimb.2020.00322	Yes	COPD: 7 (2.3%)	No	-	304
Zhou S, et al.	CT Features of Coronavirus Disease 2019 (COVID-19) Pneumonia in 62 Patients in Wuhan, China	10.2214/AJR.20.22975	No	-	No	-	62
Zhou X, et al.	Clinical Characteristics of Coronavirus Disease 2019 (COVID-19) Patients With Hypertension on Renin-Angiotensin System Inhibitors	10.1080/10641963.2020.1764018	Yes	COPD: 3 (2.7%)	Yes	1 (0.9%)	110
Zhou Y, et al.	Clinical and Autoimmune Characteristics of Severe and Critical Cases of COVID-19	10.1111/cts.12805	Yes	COPD: 2 (9.5%)	No	-	21
Zhou Z, et al.	Clinical characteristics of older and younger patients infected with SARS-CoV-2	10.18632/aging.103535	Yes	COPD: 5 (2.1%)	No	-	239
Zhu L, et al.	Coronavirus Disease 2019 Pneumonia in Immunosuppressed Renal Transplant Recipients: A Summary of 10 Confirmed Cases in Wuhan, China	10.1016/j.eururo.2020.03.039	Yes	COPD: 1 (10%)	No	-	10
Zhu Z, et al.	Clinical value of immune-inflammatory parameters to assess the severity of coronavirus disease 2019	10.1016/j.ijid.2020.04.041	Yes	Chronic lung disease: 6 (4.72%)	No	-	127
Zou X, et al.	Characteristics of Liver Function in Patients With SARS-CoV-2 and Chronic HBV Coinfection	10.1016/j.cgh.2020.06.017	Yes	COPD: 3 (2.86%)	No	-	105

** Chronic obstructive pulmonary disease, bronchial asthma, or interstitial pneumonia

*** Chronic obstructive pulmonary disease, asthma, interstitial lung disease or other not specified

**** Bronchiectasis, chronic obstructive pulmonary disease, or asthma