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| **Author,  Reference** | **Article title** | **Main results** |
| VETTER et al.  [16] | Clinical features of covid-19. | Olfactory disorders were observed in 53% of patients in a cohort study conducted in Italy. |
| MARINOSCI et al.  [17] | Possible link between anosmia and COVID‑19: sniffing out the truth. | Loss of smell and/or taste can be a consistent symptom of SARS-CoV-2 infection. In addition, nasal epithelial cells exhibit a very high expression of the ACE-2 receptor allowing the viral entry. |
| RALLI et al.  [18] | Defining the burden of olfactory dysfunction in COVID-19 patients. | The Department of Diseases at Hospital Luigi Sacco, in Milan, Italy, through a questionnaire with 59 patients hospitalized for COVID-19, found that approximately 35% of patients had olfactory or gustatory changes and 18.6% had both. |
| HOPKINS et al.  [19] | Early recovery following new onset anosmia during the COVID-19 pandemic - an observational cohort study. | Of 382 patients, 86.4% reported anosmia. Of these, 11.5% reported severe loss of smell. After a week of follow-up: 80.1% reported a decrease in the severity of the symptom, 17.1% reported no change and 1.9% worsened. After a new survey (one week later): 11.5% had achieved complete symptomatic resolution and 17.3% reported the persistence of the symptom for one to four weeks. There was a 79% recovery rate in the interval between searches. |
| LECHIEN et al. [20] | Olfactory and gustatory dysfunctions as a clinical presentation of mild‑to‑moderate forms of the coronavirus disease (COVID‑19): a multicenter European study. | Among 417 patients with mild to moderate COVID-19 infection, 357 (85.6%) reported olfactory disorders and 79.6% had anosmia. |
| GIACOMELLI et al.  [6] | Self-reported Olfactory and Taste Disorders in Patients With Severe Acute Respiratory Coronavirus 2 Infection: A Cross-sectional Study. | Among 59 patients, 20 (33.9%) reported at least one taste or olfactory disorder and 11 (18.6%) reported both. |
| TOSTMANN et al.  [21] | Strong associations and moderate predictive value of early symptoms for SARS-CoV-2 test positivity among healthcare workers, the Netherlands, March 2020. | Anosmia was reported by 47% of those affected by SARS-CoV-2 and was strongly associated with positivity for SARS-CoV-2. |
| TROYER et al.  [22] | Are we facing a crashing wave of neuropsychiatric sequelae of COVID-19? Neuropsychiatric symptoms and potential immunologic mechanisms. | Olfactory epithelial cells express the ACE2 receptor, but the exact pathophysiology pathway of the anosmia in COVID-19 remains uncertain. |
| LAO et al.  [8] | Anosmia, hyposmia, and dysgeusia as indicators for positive SARS-CoV-2 infection. | Anosmia has been expressed as a symptom in patients positive for SARS-CoV-2, ranging from 15% to 66% depending on the study. |
| GROS et al.  [23] | Alteraciones Del Olfato En El Covid-19, Revisión De La Evidencia E Implicaciones En El Manejo De La Pandemia. | The authors reported that 85.6% (357/417) of patients with COVID-19 had olfactory changes, 68% in the form of anosmia and 18% with hyposmia. 11.8% of the patients had changes in their sense of smell before the onset of other symptoms. |

Continue

**Table 3.** Summary of the main results obtained from the articles included in the study.

Adapted from de Silva Júnior et al., 2019[28].

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| **Autor** | **Título** | **Resultados Principais** |
| AHMAD et al.  [7] | Neurological manifestations and complications of COVID-19: A literature review. | An Iranian cohort found that anosmia and hyposmia were reported in 48.23% of the patients infected by the SARS-CoV-2. Among them, the onset of anosmia was sudden in 76.24%. However, a Chinese cohort reported impaired sense of smell in only 11 (5.1%) patients. |
| BRIDWELL et al.  [1] | Neurologic complications of COVID-19. | Among patients hospitalized with COVID-19, neurological complications ranged from 6% to 36%. It is suggested that SARS-CoV-2 acts in a retrograde way along the olfactory nerve and olfactory bulb, which act as a bridge between the nasal epithelium and the central nervous system, which may explain anosmia. |
| BEHZAD et al.  [24] | Extrapulmonary manifestations of COVID-19: Radiologic and clinical overview. | Suggests that the cerebral involvement of SARS-CoV-2 occurs via the cribriform plaque by interaction with ACE2 receptors, which can lead to symptoms such as hyposmia or anosmia. |
| DUQUE et al.  [25] | El COVID-19 también Afecta el Sistema Nervioso por una de sus Compuertas: El Órgano Vascular de la Lámina Terminal y el Nervio Olfatorio. Alerta Neurológica, Prueba de Disosmia o Anosmia Puede Ayudar a Un Diagnóstico Rápido. | It proposes that the neuroinvasive properties of COVID-19 are related to the interaction of the virus with the ACE2 receptor. Therefore, those who have an altered response to smell should be considered as suspect patients. |
| WHITCROFT et al.  [10] | Olfactory Dysfunction in COVID-19. | It was observed in an Iranian study that 59 of the 60 patients hospitalized with COVID-19 had impaired smell. In a study in Italy, 64% of 202 mildly symptomatic patients reported olfaction deficiency. |
| TONG et al.  [26] | The Prevalence of Olfactory and Gustatory Dysfunction in COVID-19 Patients: A Systematic Review and Meta-analysis. | Ten studies were analyzed for olfactory dysfunction (n=1627), showing a prevalence of 52.73% among patients with COVID-19. It has been demonstrated that the use of validated methods of olfactory function considerably increases the detection of smell changes. |
| MOEIN et al.  [27] | Smell Dysfunction: a biomarker for COVID-19. | It was observed that 98% of the 60 patients affected by COVID-19 exhibited some olfactory dysfunction. Of the 60 patients evaluated, 35 (58%) were anosmatic and only one had a normosmia (1/60; 2%). The other patients presented hyposmia. |

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