

WORLD JOURNAL OF PHARMACEUTICAL RESEARCH

SJIF Impact Factor 8.084

Volume 9, Issue 13, 320-321.

Letter to the Editor

ISSN 2277-7105

COVID 19: DISEASE AND MEDICATION ARE BOTH PROGRESSING TOWARDS MULTI-ORGAN DISORDER

*Neelesh Kumar Maurya

Research Scholar, Department of Food and Nutrition, Institute of Home Science, Bundelkhand University, Jhansi (U.P.), India.

Article Received on 23 August 2020, Revised on 13 Sept. 2020, Accepted on 03 Oct. 2020, DOI: 10.20959/wjpr202013-18938

*Corresponding Author Dr. Neelesh Kumar Maurya

Research Scholar, Department of Food and Nutrition, Institute of Home Science, Bundelkhand University, Jhansi (U.P.), India.

To the editor,

Acute respiratory disease triggered by a novel coronavirus (SARS-CoV-2, formerly recognized as 2019-nCoV), coronavirus disease 2019 (COVID-19), has spread across China and has achieved worldwide popularity. The novel coronavirus was classified as a causative agent and was eventually referred to as COVID-19 by the World Health Organization (WHO).^[1] Coronavirus Cases: the risk of death of a novel coronavirus was reported to be approximately 2% at the WHO press conference on 29 January 2020 [World Health Organization, 2020]. Globally, 33,224,403 recorded cases of COVID-19, including 1,000,709 fatalities, were announced to the WHO at 2:09 p.m. CEST, 27 September 2020.^[2] Considered a subset of acute respiratory syndrome (SARS) and the Middle East respiratory syndrome (MERS), COVID-19 is triggered by beta coronavirus SARS-CoV-2, which

affects the lower respiratory tract and poses as human pneumonia. The prevalent definition of SARS-CoV-2 infection might be incorrect since it is not only a respiratory infection. However, biologist accept that the newly suggested redefinition of COVID-19 as 'Micro CLOTS'[4] is still troubling, as it is not only – or even primarily – a vascular disease. Biologist, therefore, propose a new nomenclature, including the concept of multiple organ damage: multiple organ failure in the SARS-CoV-2 (MODS-CoV-2).^[3] ARS-CoV-2 not only triggers viral pneumonia but has significant consequences for the CV method. Patients with CV risk factors including gender, advanced age, diabetes, hypertension and obesity have been described as susceptible groups. COVID-19 can also inflict harm to other tissues, such as the heart, liver and kidneys. Patients ultimately suffer from multiple organ failure, trauma, acute respiratory distress syndrome, cardiac failure, arrhythmia, and renal failure. [4] It is doubtful

320

that successful vaccination or antimicrobial-based methods would be ready for the next epidemic. Supportive treatment to enhance patient disease immunity has become the first line of protection during any pandemic. The biologist, therapist should give attention to possible multi-organ accidents, and the safety and avoidance of those accidents. Drugs commonly approved for the treatment of COVID-19 include Oseltamivir, Lopinavir / Ritonavir, Ribavirin, and Chloroquine Phosphate. Both these medications are metabolized in the liver. Liver and kidney damage can make it difficult to meet the dose of the medicines and increase the risk of adverse drug reactions in patients with the disease. The medicine should be prescribed after well researched and studies of pharmacokinetics and pharmacodynamics impact on patients. Scientist and therapist should give attention to possible multi-organ accidents and the safety and avoidance of those accidents.

REFERENCES

- 1. Guo, Y. R., Cao, Q. D., Hong, Z. S., Tan, Y. Y., Chen, S. D., Jin, H. J., ... & Yan, Y. The origin, transmission and clinical therapies on coronavirus disease 2019 (COVID-19) outbreak—an update on the status. *Military Medical Research*, 2020; 7(1): 1-10.
- 2. https://www.worldometers.info/coronavirus/?fbclid=IwAR1BQ0gSu73eu1Nb4XBXzgBp Obm1-yp3fsJl3AWLQlo0LosC1f8fre_rrks
- 3. Song Z, Xu Y, Bao L, Zhang L, Yu P, Qu Y, Zhu H, Zhao W, Han Y, Qin C. From SARS to MERS, thrusting coronaviruses into the spotlight. Viruses, 2019; 11(1): 59.
- 4. Robba C, Battaglini D, Pelosi P, Rocco PR. Multiple organ dysfunction in SARS-CoV-2: MODS-CoV-2. Expert review of respiratory medicine, 2020; 22: 1-4.
- Guzik TJ, Mohiddin SA, Dimarco A, Patel V, Savvatis K, Marelli-Berg FM, Madhur MS, Tomaszewski M, Maffia P, D'Acquisto F, Nicklin SA. COVID-19 and the cardiovascular system: implications for risk assessment, diagnosis, and treatment options. Cardiovascular research, 2020; cvaa106.
- 6. Rismanbaf A, Zarei S. Liver and kidney injuries in COVID-19 and their effects on drug therapy; a letter to editor. Arch Acad Emerg Med., 2020 Mar 9; 8(1): e17.