

# Not Your Average Fever; Dexmedetomidine Induced Fever In A Critically-III COVID Patient



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## Introduction

Critically-ill COVID patients have become the norm across the world with fevers being caused by COVID or superimposed infections. However, dexmedetomidine, a sedative medication is not often on the top of the differential diagnosis when it comes to fevers.

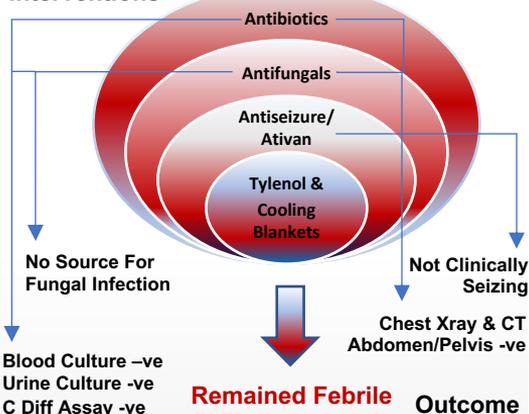
## Case

A 59-year-old male was hospitalized and critically ill with COVID-19 infection intubated and on a ventilator in the ICU for greater than a month already. The patient was started on a dexmedetomidine drip for sedation after increased agitation. The next day, the patient rapidly developed a fever to 105.7F.

## Interventions Undertaken

A comprehensive septic workup was taken. The patient was started on broad spectrum antibacterial and anti-fungal agents. Physical exam including skin was unchanged and unremarkable, chest and abdominal images were unchanged from prior. The patient was loaded with Ativan for possible central fever as well as Valproic acid for possible seizures. The temperature lasted for 7 hours irrespective of multiple doses of Tylenol and cooling blankets.

## Interventions



## Result

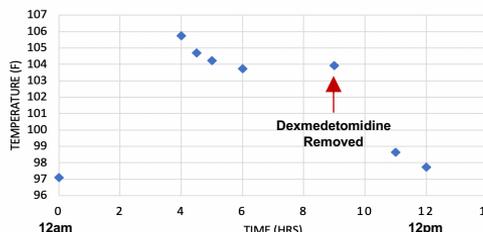
The next morning, all infectious work up came back negative and antimicrobial agents were discontinued. After reviewing changes the day prior, it had been noticed that the only modification was adding dexmedetomidine. Dexmedetomidine had been on for 36 hours and the patient was persistently febrile. Dexmedetomidine was then discontinued. Two hours later, the patient's temperature normalized. Fevers related to dexmedetomidine have been reported in the literature while in use in the intensive care unit.

## Conclusion

This case illustrates the complexity of COVID-19 patients. While COVID-19 itself and superimposed infections in critically-ill ICU patients can cause fever, it is always important to remember medications can be a potential cause of fever and sometimes, they are the easiest fixes.



## Fever Curve



## Reference

Faust AC, Sutton SE. Dexmedetomidine-associated fever in the intensive care unit. *Ther Adv Drug Saf.* 2015 Dec;6(6):234-7. doi: 10.1177/2042098615612661. PMID: 26668714; PMCID: PMC4667765.