Editorial

Linden Brown

COVID Blindness

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When I completed my internal medicine residency in the summer of 2019, I was filled with excitement, a sense of freedom, and a simultaneous fear of my new responsibility as an attending hospitalist at an academic medical center in upstate New York. I had no idea that I would barely get my feet under me before our world would be turned upside down by the COVID-19 pandemic.

In January, our intimate group of former co-residents (calling ourselves "A.O.'s Army," in honor of our former program director) were clued into the novel coronavirus by our prior classmate, who started work at the Centers for Disease Control and Prevention (CDC) just 6 months before. He mentioned whispers of a respiratory illness bubbling up in China. Before we knew it, he was deployed to quarantine incoming travelers at a US airport, and it became clear that things were getting out of hand quickly. Once cases started popping up globally, the potential devastation started to set in and dominated our conversations. As a diverse group of graduates – fellows, hospitalists, primary care physicians – we stopped wondering *if* it would affect our hospitals and communities, but instead *when* and to what extent.

My mind flashed back to medical school ethics class where we considered the situation in which there weren't enough ventilators for all those who needed them. "This will never actually happen!" was frequently the annoyed muttering from many of the students. Hearing the reports of an overwhelmed Italian medical system, my heart sank. Maybe taking those ethics exercises more seriously would have better prepared us?

The day following our county's first confirmed case, our hospital decided to break ranks with the CDC testing guidelines. We were advised to test anyone who had a respiratory infection and no other easily identifiable cause. In short: Flu/respiratory syncytial virus negative? Viral panel negative? Send COVID-19 polymerase chain reaction (PCR), and wait 3–5 days for the outside lab results to return. We were instructed not to panic as potential cases suddenly appeared throughout the hospital.

I heard the echoes of one of my old intensive care unit attendings: "The first thing to do in a code is check your own pulse!"

Deep breath.

Waiting. PCR pending. Quarantining. PCR pending. Donning and doffing. PCR pending. My hands were raw with scrubbing.

Grand-theft N95. Black market, moonshine hand sanitizer.

In some ways, I expected this fallout in a stressed medical system. But what I didn't expect was what I will call COVID Blindness.

It was day three into our new testing protocol. I volunteered to attend on the COVID rule-out patients throughout the hospital, figuring I was at lower risk of serious complications than many of my colleagues if, or when, exposed. Walking onto my home unit, I heard the charge nurse take a call from the lab.

"Fifteen percent bands on the CBC for patient James."

Opening up my patient list, I saw Mr. James was assigned to me. Admitted overnight, he was an elderly man who came in with fever and decreased alertness from a local facility where he was a long-term resident. He was non-verbal and couldn't provide any history. My chart review told a familiar story: "Presented with a fever and malaise for one day and brought to the ED." He was found to be hypoxic requiring 4 L of oxygen, and a chest X-ray showed faint increased interstitial markings at the right lung base. No formal radiology read yet.

Flu swab negative, blood cultures drawn. Airborne, contact, droplet, and eye precautions immediately instituted. COVID swab obtained.

He was shipped upstairs to my quarantine unit with the diagnostic label of "COVID-19 rule-out."

Diving further into the chart, I noticed leukocytosis, left shift, an unimpressive chest X-ray, current fever, and tachycardia to 130. Carefully, I began the ritual of donning my uniform, my personal protective armor, and slipped into the room, feeling like an astronaut doing a spacewalk. He laid listlessly on the bed, barely opening his eyes. His skin was burning hot to touch.

The nurse came in behind me. "Dr. Brown, I'm giving the Tylenol that was ordered overnight. Anything else you want now?"

Realizing I had forgotten to look at all the active orders, I asked the nurse which antibiotics had been ordered and when they were last given.

"He's a COVID patient. He isn't ordered for any antibiotics."

My stomach lurched. I sprang into action, finishing up my exam and ordering the broad-spectrum antibiotics that this man desperately needed for severe sepsis. He had been inside the hospital for 12 h.

Fevering, tachycardic, tachypneic, hypoxic, and with an impressive leukocytosis for 12 h. No antibiotics given.

This was COVID Blindness.

By the time antibiotics were hung, the unit phone was ringing again. The lab was calling with urgent blood culture results: "Patient James? Yeah? Gram negatives? Bacilli? Okay, thanks!"

COVID Blindness.

We missed severe sepsis from Gram-negative bacteremia for 12 h. As our hospital rolled out COVID-19 PCR testing, we also rolled out anchoring bias. In the panic of quarantine and isolation precautions, we put on cognitive blinders to our bread and butter: sepsis. Had this patient come into the hospital 2 weeks prior, he would likely have been placed on antibiotics immediately.

There is no one person at fault in this case. This patient passed through many layers of care, each provider getting onboard the bias train as it left the station. We know how to treat sepsis, and we know how to treat it well. I am not a pandemic or COVID-19 expert. I am not a cognitive psychologist. I am a physician, a hospitalist, a flawed human in this greater world community who is trying to fight one small battle in this larger war.

In order to survive sepsis, and survive this pandemic, we must not forget our differential diagnoses and our foundational training. Not all that fevers is COVID-19.

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