



On the death of 100 + Italian doctors from COVID-19

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Received: 21 April 2020 / Accepted: 24 April 2020 / Published online: 1 May 2020
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The 100th Italian doctor to fall was a 62-year-old woman, Samar Sinjab. She was originally from Syria and was the widow of a pediatrician named Omar. She worked as a general practitioner in Veneto and was very appreciated by her patients who used to fill the ambulatory until the very end of her professional life, which sadly ended together with her biological one. Her two children, who are doctors as well—another pediatrician and a coroner—survive her.

The vast majority of the first 100 casualties among doctors (60) occurred in Lombardy, the worst-stricken region overall, followed by Emilia-Romagna (6) and Campania (6). Although doctor Sinjab was a woman, she represents an exception in terms of sex-related mortality in this particular population, as 95/100 of deceased doctors were men. The median age of death was 69 years (48–94) with no significant difference between male and female subjects. We have read about the prevalence of a more severe disease course in men, but in this particular list, the difference is so striking that we cannot be completely sure that it is only attributable to sex-related biological factors.

The results of a meta-analysis showed that male individuals took a larger percentage in the sex distribution of COVID-19 patients, up to 60% [1]. Among a cohort of 799 patients, 113 who died and 161 who recovered until 28 February 2020, the median age of deceased patients (68 years) was significantly greater than recovered patients (51 years) and male sex was more represented in deceased patients (73%) than in recovered patients (55%) [2].

Could different habits between men and women have played a role too? According to some research, women are supposedly more scrupulous in performing hand hygiene than men. Interviewed by The New York Times, Rosie Frasso, program director of public health at Thomas Jefferson University, said “Traditionally women were more

engaged in meal prep and house cleaning and were more likely to do the diaper changing,” and added “My guess is that these roles made women think about hand washing differently”. She also reported some scientific surveys backing up the idea that women are the superior hand washers [3].

Thus, is it time to apologize posthumously to Ignác Semmelweis again? As we know, the Hungarian physician and scientist discovered that the incidence of puerperal fever could be drastically cut by the use of hand disinfection in obstetrical clinics. The mortality rate in April 1847 was 18%. After hand washing was initiated, the rates dropped to 2% in June and to 1% in July. However, he was severely opposed by the medical establishment of his time and his theories were not believed until he died alone, aged 47, in a psychiatric clinic after having been severely beaten. Interestingly, since the start of the COVID-19 outbreak, we have witnessed a dramatic decrease of alert infections from multidrug-resistant organisms in our hospital. Could this be linked to the reinforced awareness of the importance of hands hygiene among health professionals?

In the same period, we read from the media about a significant inferior number of deceased nurses (26) out of more than 6,000 infected nurses (a figure that is similar to the total number of infected physicians). Although the average younger age and predominant female sex of nurses may have contributed to a milder course of their disease than that of medical doctors, we have reason to believe that another contributing factor may be the nurses’ long-standing tradition of taking care of personal and environmental antiseptic and aseptic measures. In this regard, not only lies the risk of being infected but also the amount of initial viral load. Microbial load is a usual determinant of severity in infectious diseases and COVID-19 seems to make no exception. Among 76 patients admitted to a hospital in Nanchang, China, it was noted that the mean viral load of severe cases was 60 times higher than that of mild cases and these data remained stable for the first 12 days after onset [4].

Additionally, the grim list of fallen doctors is topped by 45/100 general practitioners, followed by 7 odontologists, 5 surgeons, 5 cardiologists, 5 internists, 3 anesthesiologists, 3

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pediatricians, and 3 lung specialists. The dispute about the availability of personal protective equipment is beyond the purpose of this commentary. Time and other investigations will tell if medical subspecialties may have been linked to different rates of exposure and risk of contracting COVID-19. For sure, general practitioners were and are our first line of defense in the battle against the virus. Hopefully, they have not worked and died in vain. Disease course and hospitalization rate seem to have weakened and slowed down since the introduction of home health care nurse–physician teams that visit patients at home providing early diagnostic and therapeutic support.

Medice cura te ipsum (physician, heal thyself) is the Latin locution reminding us that we should never neglect our own health. Nowadays, other people's health might depend upon our own. First, we may experience fear of becoming infected and feel guilty if we spread the disease to other patients or colleagues. Second, when we become patients, perspectives change suddenly both in coping with the disease and in coming back to our jobs. Moreover, the COVID-19 outbreak has brought major disruptions to our personal lives, as many have had to self-isolate from the rest of the family [5]. Only

time will tell if we have not yet deserved the legacy from Semmelweis almost two centuries after his discovery.

Compliance with ethical standards

Conflict of interest The authors have no disclosures relevant to this article.

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