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Coronavirus Lockdown: Forced Inactivity for the Oldest Old?



To the Editor:

According to the WHO, as of March 15, a total of 153,517 patients have been diagnosed with coronavirus disease 2019 (COVID-19)

worldwide—with a death toll of 5735 (https://www.who.int/docs/default-source/coronaviruse/situation-reports/20200315-sitrep-55-covid-19.pdf?sfvrsn=33daa5cb_6). These heartbreaking figures have led the most affected countries (notably, Italy and Spain) to implement strict national lockdowns, ordering people to stay home—except for essential reasons such as going to work, medical appointments, or buying food—in order to reduce virus spread.

This exceptional situation is having important consequences for everyone in general but for the oldest old—those aged 85 years and older—in particular. This population segment is indeed very vulnerable, especially under stressful situations that challenge body functional reserve. On one hand, older adults present the greatest risk of mortality for COVID-19 (odds ratio per year increase of 1.10, 95% confidence interval 1.03 to 1.17),¹ and therefore require strict protection measures against the infection. On the other hand, prompting the oldest old to stay home might further increase sedentary behavior, a situation that is likely to contribute to aggravating sarcopenia, frailty, and age-related functional decline, and to increase the risk of all-cause mortality.²

Important lessons can be drawn from other confinement conditions in the oldest old such as mainly hospitalization, where they spend most of the time in bed, including those who are able to walk independently.³ This scenario can lead to major negative health consequences even when the illness that prompted hospitalization is successfully treated. Ten days of bed rest suffices to result in marked impairments in muscle mass and strength, walking speed, and functional ability among individuals aged about 70 years.⁴ Approximately one-third of older adults lose their ability to independently perform 1 or more activities of daily living from hospital admission to discharge,⁵ which has important short- and midterm consequences—including a higher risk of nursing home admission, hospital admission, and mortality.⁶

There is growing evidence that the oldest old people can adapt to exercise just like younger individuals and deserve to benefit from it.⁷ The incidence of functional decline during hospitalization has been inversely associated with the levels of physical activity.⁸ A recent randomized controlled trial from our group showed that even a simple exercise intervention (doing uncomplicated exercises such as walking back and forward along a corridor and rising from a chair twice a day for ~20 minutes in total) was safe and significantly reduced functional decline (by 64%) in oldest old people (aged 88 years on average) who had been hospitalized for a median time of 7 days.⁹ Furthermore, the intervention proved especially effective in those with a worse functional status at baseline.¹⁰

The situation for the oldest old is especially dramatic in light of the recent recommendations from the Italian Society of Anesthesiology and Intensive Care for “exceptional conditions of imbalance between needs and available resources” in intensive care unit admissions of this country (<http://www.siaarti.it/SiteAssets/News/COVID19%20-%20documenti%20SIAARTI/SIAARTI%20-%20Covid19%20-%20Raccomandazioni%20di%20etica%20clinica.pdf>). The considerations for potential triage during the ongoing COVID-19 outbreak in Italy include a patient’s age and chance of survival. Under these circumstances, it is not surprising that some oldest old Italians are gripped with fear and stuck to immobility.

The need for avoiding virus infection should not overshadow the deleterious effects that disuse can impose in all individuals and particularly the oldest old. Public health efforts to promote physical activity and “break” sedentary behavior—which can be achieved with simple home exercises such as rising up from a chair several times a day and avoiding continuous sitting for long hours—during lockdown are to be recommended.

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Severe Acute Respiratory Syndrome Coronavirus 2 (SARS-CoV-2)-Related Deaths in French Long-Term Care Facilities: The “Confinement Disease” Is Probably More Deleterious Than the Coronavirus Disease-2019 (COVID-19) Itself



To the Editor:

To date, coronavirus severe acute respiratory syndrome coronavirus 2 (SARS-CoV-2) has infected 2.2 million people and has killed more than 150,000.¹ The population groups most susceptible to severe and fatal coronavirus disease-2019 (COVID-19) are older adults and those with chronic underlying chronic medical disorders. The residents of long-term care facilities (LTCFs) typically combine those 2 features and are, thus, particularly at risk. In France, 9.4% of the population is over age 75 years and nearly 600,000 people currently reside in LTCFs for older dependent individuals. To date, more than 60% of the French LTCFs have reported at least 1 case of COVID-19 among their residents.

Estimated overall mortality among patients with COVID-19 is 10% in France but reaches up to 30% in LTCFs. There are, however, substantial differences in mortality rates between the different LTCFs.² What explains these differences?

We intervened in 1 LTCF located in the Southern Île-de-France region that had registered more than 24 deaths related to COVID-19 among the 140 residents in 5 days. No acute respiratory distress syndrome was observed, and mortality was mainly due to hypovolemic shock. Most of the victims had been left alone in their rooms for confinement settings for many days without help because of the lack of protective masks and the work overload for caregivers affected by a 40% staff absenteeism rate. The dependent infected residents were confined and no longer received the usual assistance for drinking and eating. In addition, general practitioners stopped their physical examination visits, limiting their interventions to telemedicine, which proved unsuitable whenever feasible at all.

With appropriate resources lacking, the “disease linked to confinement” thus proved more fatal than COVID-19 itself. We did not observe this phenomenon in other LTCFs where healthcare staff and physicians were physically present in full force.

A task force team intervened as soon as the fifth death was reported. Adapted infusion to restore hydroelectrolytic balance as well as oxygen therapy per World Health Organization guidelines led to a rapid improvement of this high mortality trend.^{3,4}

Disproportionate mortality because of COVID-19 in LTCFs is not a fatality. Continuous provision of pragmatic medicine and wellness care will limit the devastating impact of this infection in dependent older people.

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