

glucose difference (MGD) (absolute maximum-minimum glucose level), mean absolute glucose (MAG) ( $(\Sigma|\Delta BG|) / (\Delta \text{ total time of observation})$ ) and the absolute mean of daily differences (MODD). CCI was defined as ICU length of stay  $\geq 14$  days and SOFA score  $\geq 2$  on day 14.

## Results

A total 79 patients were included in the study. Median (IQR) age was 65 (49–77), median APACHE II was 23 (19–27) and median SOFA score was 5 (4–8). Nineteen (24.1%) patients developed CCI and 8 of them (42.1%) died. Totally 17 (21.5%) patients died in the ICU. On the first day of ICU admission, median (IQR) SD was 20.9 (14.4–33.2), CV was 15.1% (11.5–22.4), MGD was 55 mg/dL (39–91) and MAG was 5.5 mg/dL (2.9–8.1). First week mean glucose level was  $139.1 \pm 31.1$  mg/dL, median SD was 28.5 (18.3–45.6), CV was 20.6% (16.7–26.1), MGD was 117.0 mg/dL (75.0–191.0), MAG was 4.5 mg/dL (2.8–8.6), MODD was 26.5 mg/dL (14.6–37.8). Comparisons of GV parameters between patients with CCI and without CCI (Table 1) and between patients who died and survived were not different ( $p > 0.05$  for all).

## Conclusion

Glycemic variability was not found to be associated with the development of CCI and ICU mortality in critically-ill patients. However, the study might be underpowered to determine the effect of GV on outcome.

**Keywords:** Glycemic variability, Chronic critical illness, ICU, Critical care

**Table 1**

Comparisons of patients with CCI and without CCI.

	With CCI n = 19	Without CCI n = 60	P
Age *	63 [58–75]	68.5 [48–78]	0.44
Gender, male, n (%)	10 (52.6)	28 (46.7)	0.42
APACHE II*	24 [21–28]	23 [18–27]	0.17
SOFA*	6 [5–10]	5 [4–8]	0.15
NUTRIC*	6 [4–7]	5 [4–6]	0.09
GV (first day)*			
SD	24.1 [13.1–41.2]	19.9 [14.5–33.1]	0.57
CV	13.1 [11.1–22.4]	15.1 [11.6–22.5]	0.60
MGD	70 [39–115]	54 [39.2–82]	0.50
MAG	5.1 [2.9–12.2]	5.6 [2.9–7.6]	0.68
GV (first week)*			
SD	39.1 [24.1–48.6]	26.1 [17.4–43.3]	0.16
CV	22.5 [16.7–27.4]	20.5 [16.6–25.8]	0.68
MGD	179 [87–217]	104.5 [73.2–179.2]	0.11
MAG	7.7 [3.4–10.9]	4.3 [2.7–8.2]	0.14
MODD	26.6 [14.3–37.1]	25.5 [14.6–37.8]	0.78

\* median [IQR] CCI: chronic critical illness GV: Glycemic variability, SD: standart deviation, CV: coefficient of variation maximal blood glucose difference, MGD: maximal blood glucose difference, MAG: mean absolute glucose, MODD: the absolute mean of daily differences.

## Determination of Covid-19 stress level in intensive care nurses after pandemic

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## Introduction and aim

Intensive care nurses faced many psychological problems during the Covid-19 disease process, which emerged as a global health threat. The aim of this descriptive and cross-sectional study was to determine the stress level in intensive care nurses due to the Covid-19 pandemic.

## Methods

The study was conducted online with 88 nurses working in intensive care. Data were collected with a personal information form comprising 21 questions and the Covid-19 Stress Scale. SPSS version 29.0 program was used for data analysis. In addition to descriptive statistics, t-tests and one-way analysis of variance were used in statistical evaluation. The significance level was accepted as  $p < 0.05$ .

## Results

The mean age of the nurses was  $34.50 \pm 8.16$  years. Among the nurses who participated in the study, 70.5% stated that they were affected by the Covid-19 pandemic. It was determined that nurses had SARS-COVID-19 infection an average of  $1.30 \pm 0.56$  (min: 1, max: 4) times. 85.2% of the participants stated that the Covid-19 pandemic positively affected the nursing profession and 90.9% stated that it positively affected them professionally. It was determined that there was a significant difference between the duration of working in the Covid-19-related service and the level of traumatic stress ( $p < 0.05$ ). When the scale sub-dimension scores were analyzed, it was found that the sub-dimension with the highest mean was the danger and contagiousness sub-dimension ( $29.17 \pm 11.86$ ).

## Conclusion

It was concluded that the level of traumatic stress increased with the increase in the working time of the nurses in the Covid-19 service and the nurses experienced the most problem with the risk of danger and contagiousness. In line with these results, in order to prevent nurses from contacting patients with infectious diseases for a long time during pandemic periods, it is recommended that nurses working in the pandemic service should work in other services during the process, and rest periods should be planned. It is also recommended to develop training and procedures to take measures to minimize the risk of contagiousness.

**Keywords:** Covid 19, Nurse, Stress, Intensive care unit

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