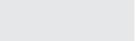


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Outcome prediction based on initial CT scan in COVID-19



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Dear Editor,

We appreciate the comments of Kalemci et al.¹ on our paper entitled "Predictive value of initial CT scan for various adverse outcomes in patients with COVID-19 pneumonia".² We believe there is a need for some elaboration regarding the presented issues. Of our 121 patients, 36 had diabetes, 48 had hypertension, and 29 had a history of ischemic heart disease. We analyzed the effect of these past medical conditions in their outcomes, which is presented in Table 1. We found no significant association between any of these conditions and patients' outcomes, although this might be attributed to our sample size. The authors also have suggested that patients with heart failure or kidney injury show more ground glass opacities in CT scan and have cited an article regarding the abundance of Kerley-B lines in these patients. Although heart failure or any fluid overload condition can be a differential diagnosis to ground glass opacities seen in COVID-19, however this is usually associated with interstitial septal thickening and/or pleural effusion. Nevertheless, accompanying volume overload may accentuate ground glass opacities in COVID-19 pneumonia as a limitation.³ However, we did not find any significant difference

in CSS between patients with chronic kidney disease and ischemic heart disease.

Finally, all scans were reviewed, and only one patient had signs of underlying interstitial lung disease (ILD). Also, regarding the controversial effect of smoking and outcome in patients with COVID-19, only 12.4% of our patients had reported current or past smoking which was found to have no significant association with their outcome. Although this might be due to the underreporting of smoking habits, other studies have also found the role of smoking controversial.^{4,5} Further studies with more data regarding the participants' smoking history are needed. We believe that we have addressed all the raised issues and welcome any follow-up regarding this paper.

Declaration of Competing Interest

None

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Table 1		
Univariable analysis	of past medical	conditions

Past Medical Condition	ICU Admission(n = 47)		Intubation(n = 38)		Mortality $(n = 36)$				
	N	OR(95% CI)	p-value	N	OR(95% CI)	p-value	N	OR(95% CI)	p-value
Diabetes	15	1.18 (0.53–2.61)	0.678	14	1.61 (0.71–3.67)	0.250	12	1.27 (0.54–2.93)	0.575
Hypertension	16	0.67 (0.31–1.44)	0.314	13	0.71 (0.32–1.58)	0.407	13	0.80 (0.36–1.80)	0.603
Ischemic Heart Disease	12	1.14 (0.49–2.69)	0.748	9	0.97 (0.39–2.40)	0.961	9	1.08 (0.43–2.67)	0.862

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