

# Telemonitoring of daily activities compared to the six-minute walk test further completes the puzzle of oximetry-guided interventions

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**Table S1 – Comorbidities per chronic lung disease**

	<b>Total</b>	<b>COPD</b>	<b>ILD</b>	<b>Asthma</b>	<b>Bronchiectasis</b>	<b>Other</b>
	N = 100	N = 41	N = 22	N = 15	N = 10	N = 12
	%	n (%)	n (%)	n (%)	n (%)	n (%)
<b>Respiratory Comorbidities</b>						
Bronchiectasis	28.0	14 (34.1)	3 (13.6)	8 (53.3)	0 (0.0)	3 (25.0)
Chronic Respiratory Failure	26.0	13 (31.7)	6 (27.3)	1 (6.7)	2 (20.0)	4 (33.3)
Pulmonary Fibrosis	20.0	1 (2.4)	17 (77.3)	1 (6.7)	0 (0.0)	1 (8.3)
Rhinitis	13.0	4 (9.8)	2 (9.1)	3 (20.0)	1 (10.0)	3 (25.0)
Tuberculosis Sequelae	12.0	5 (12.2)	0 (0.0)	1 (6.7)	5 (50.0)	1 (8.3)
Sleep Apnea	9.0	4 (9.8)	2 (9.1)	1 (6.7)	0 (0.0)	2 (16.7)
Lung Cancer	7.0	3 (7.3)	0 (0.0)	0 (0.0)	0 (0.0)	4 (33.3)
Pulmonary Hypertension	7.0	4 (9.8)	0 (0.0)	1 (6.7)	0 (0.0)	2 (16.7)
<b>Cardiovascular Comorbidities</b>						
Arterial Hypertension	56.0	23 (56.1)	7 (31.8)	11 (73.3)	8 (80.0)	7 (58.3)
Dyslipidaemia	40.0	17 (41.5)	11 (50.0)	5 (33.3)	3 (30.0)	4 (33.3)
Arrhythmias	11.0	6 (14.6)	3 (13.6)	2 (13.3)	0 (0.0)	0 (0.0)
Coronary Heart Disease	9.0	4 (9.8)	2 (9.1)	2 (13.3)	1 (10.0)	0 (0.0)
Peripheral Arterial Disease	9.0	5 (12.2)	2 (9.1)	2 (13.3)	0 (0.0)	0 (0.0)
<b>Other Comorbidities</b>						
Anxiety or Depression	29.0	11 (26.8)	8 (36.4)	6 (40.0)	2 (20.0)	2 (16.7)
Gastric Disease	19.0	5 (12.2)	6 (27.3)	1 (6.7)	4 (40.0)	3 (25.0)
Diabetic	18.0	6 (14.6)	7 (31.8)	3 (20.0)	2 (20.0)	0 (0.0)
Gastroesophageal Reflux Disease	15.0	1 (2.4)	6 (27.3)	4 (26.7)	1 (10.0)	3 (25.0)
Obesity	12.0	5 (12.2)	4 (18.2)	2 (13.3)	1 (10.0)	0 (0.0)
Rheumatoid Disease	11.0	4 (9.8)	4 (18.2)	1 (6.7)	1 (10.0)	1 (8.3)
Thyroid Disease	10.0	2 (4.9)	2 (9.1)	2 (13.3)	2 (20.0)	2 (16.7)
Osteoporosis	7.0	1 (2.4)	3 (13.6)	1 (6.7)	0 (0.0)	2 (16.7)

COPD: Chronic Obstructive Pulmonary Disease; ILD: Interstitial Lung Disease; Other: post-thoracic surgery status, Lung Cancer,

Tuberculosis sequelae, Connective Tissue Disease and Pulmonary Ossification

**Table S2 – Six-minute walk test outcomes per chronic lung disease**

	<b>Total</b> N = 100	<b>COPD</b> N = 41	<b>ILD</b> N = 22	<b>Asthma</b> N = 15	<b>Bronchiectasis</b> N = 10	<b>Other</b> N = 12
<b>6MWT</b>						
6MWD (m; mean ± SD)	328 ± 114	330 ± 127	291 ± 104	341 ± 112	311 ± 88	389 ± 91
nadir SpO <sub>2</sub> (%; mean ± SD)	86.2 ± 6.2	85.4 ± 5.7	83.3 ± 7.4	89.4 ± 3.5	88.6 ± 7.5	88.2 ± 4.9
peak HR (%; mean ± SD)	71.2 ± 11.9	74.3 ± 11.1	69.4 ± 11.4	69.1 ± 12.2	72.5 ± 18.1	65.8 ± 6.5
activity intensity (MET; mean ± SD)	2.6 ± 0.5	2.6 ± 0.6	2.4 ± 0.5	2.6 ± 0.5	2.5 ± 0.4	2.9 ± 0.4
number of pauses ( <i>n</i> ; median; IQR)	0 (0 – 0)	0 (0 – 0)	0 (0 – 1)	0 (0 – 0)	0 (0 – 0)	0 (0 – 0)
number of periods SpO <sub>2</sub> < 90% ( <i>n</i> ; median; IQR)	1 (0 – 1)	1 (1 – 1)	1 (0 – 2)	1 (0 – 1)	0 (0 – 1)	1 (0 – 2)

COPD: Chronic Obstructive Pulmonary Disease; ILD: Interstitial Lung Disease; Other: post-thoracic surgery status, Lung Cancer, Tuberculosis sequelae, Connective Tissue Disease and Pulmonary Ossification; 6MWT: six-minute walk test; 6MWD: six-minute walk distance; SD: standard-deviation; nadir SpO<sub>2</sub>: lowest peripheral oxygen saturation detected; HR: heart rate; MET: metabolic equivalent of task; IQR: interquartile range

**Table S3 – SMARTREAB telemonitoring outcomes per chronic lung disease**

	<b>Total</b> N = 100	<b>COPD</b> N = 41	<b>ILD</b> N = 22	<b>Asthma</b> N = 15	<b>Bronchiectasis</b> N = 10	<b>Other</b> N = 12
<b><i>SMARTREAB telemonitoring</i></b>						
nadir SpO <sub>2</sub> (%; mean ± SD)	80.0 ± 8.2	81 ± 8	75 ± 8	77 ± 9	79 ± 6	82 ± 8
peak HR (%; mean ± SD)	80.6 ± 11.2	80.3 ± 12.0	78.0 ± 10.4	82.6 ± 10.7	84.0 ± 11.5	80.7 ± 10.4
activity intensity (MET; mean ± SD)	2.9 ± 0.7	2.9 ± 0.7	2.9 ± 0.7	2.9 ± 0.4	2.6 ± 0.6	3.5 ± 0.8
daily episodes SpO <sub>2</sub> < 90% (n; median; IQR)	6 (2 – 6)	8 (2 – 12)	10 (4 – 21)	3 (1 – 7)	4 (2 – 8)	2 (0 – 15)
longest period SpO <sub>2</sub> < 90% (min; mean ± SD)	28 ± 37	28 ± 36	33 ± 28	26 ± 45	19 ± 32	29 ± 49

COPD: Chronic Obstructive Pulmonary Disease; ILD: Interstitial Lung Disease; Other: post-thoracic surgery status, Lung Cancer, Tuberculosis sequelae, Connective Tissue Disease and Pulmonary Ossification; nadir SpO<sub>2</sub>: lowest peripheral oxygen saturation detected; SD: standard-deviation; HR: heart rate; MET: metabolic equivalent of task; IQR: interquartile range