

**S2 Table.** Baseline characteristics of patients according to the regimen of immune-checkpoint inhibitor

Characteristic	Nivolumab (n=153)	Pembrolizuma b (n=79)	Atezolizum ab (n=5)	Avelumab (n=1)	Nivolumab+i pilimumab (n=4)
Age (yr)	62.5±10.2	63.4±9.7	67.8±4.8	66.0±-	73.3±9.2
≤ 65	95 (62.1)	44 (55.7)	2 (40.0)	0	1 (25.0)
> 65	58 (37.9)	35 (44.3)	3 (60.0)	1 (100)	3 (75.0)
Sex					
Male	114 (74.5)	51 (64.6)	4 (80.0)	1 (100)	4 (100)
Female	39 (25.5)	28 (35.4)	1 (20.0)	0	0
Smoking					
Ever-smoker	112 (73.2)	52 (65.8)	4 (80.0)	1 (100)	4 (100)
Never-smoker	41 (26.8)	27 (34.2)	1 (20.0)	0	0
Stage					
IIIA	11 (7.2)	5 (6.3)	0	0	0
IIIB	6 (3.9)	8 (10.1)	0	1 (100)	0
IIIC	0	1 (1.3)	0	0	0
IV	136 (88.9)	65 (82.3)	5 (100)	0	4 (100)
ECOG PS					
0	26 (17.0)	22 (27.8)	4 (80.0)	0	0
1	52 (34.0)	25 (31.6)	0	1 (100)	1 (100)
2	57 (37.3)	25 (31.6)	1 (20.0)	0	3 (75.0)
≥ 3	18 (11.8)	7 (8.9)	0	0	0
Histology					
Non-small cell lung cancer					
Adenocarcinoma	88 (57.5)	58 (73.4)	5 (100)	0	2 (50.0)
Squamous cell carcinoma	45 (29.4)	14 (17.7)	0	1 (100)	0
Other NSCLC	16 (10.5)	7 (8.9)	0	0	1 (25.0)
Small cell carcinoma	4 (2.6)	0	0	0	1 (25.0)
Previous lung resection					
Lobectomy	15 (9.8)	10 (12.7)	0	0	1 (25.)
Wedge resection	2 (1.3)	0	0	0	0
Pneumonectomy	1 (0.7)	1 (1.3)	0	0	0
Segmentectomy	0	1 (1.3)	0	0	0
Not performed	135 (88.2)	67 (84.8)	5 (100)	1 (100)	3 (75.0)
Pulmonary comorbidities					
None	151 (98.7)	78 (98.7)	5 (100)	1 (100)	4 (100)
Asthma/COPD	1 (0.7)	1 (1.3)	0	0	0
IPF	1 (0.7)	0	0	0	0
Previous thoracic radiation					
Performed	55 (35.9)	21 (26.6)	1 (20.0)	0	1 (25.0)
Not performed	98 (64.1)	58 (73.4)	4 (80.0)	1 (100)	3 (75.0)
Previous number of chemotherapy					
None	4 (2.6)	9 (11.4)	0	1 (100)	0
1	62 (40.5)	32 (40.5)	5 (100)	0	0
≥ 2	87 (56.9)	38 (38.1)	0	0	4 (100)

Immediate chemotherapy  
prior to ICI<sup>a)</sup>

Cytotoxic agent	73 (47.7)	43 (54.4)	4 (80.0)	0	3 (75.0)
Targeted agent	10 (6.5%)	5 (6.3)	0	0	0
None	70 (45.8)	31 (39.2)	1 (20.0)	1 (100)	1 (25.0)

Values are presented as mean±SD or number (%). COPD, chronic obstructive pulmonary disease; ECOG PS, Eastern Cooperative Oncology Group performance status; ICI, immune-checkpoint inhibitor; IPF, interstitial pulmonary fibrosis; NSCLC, non-small cell lung cancer; SD, standard deviation. <sup>a)</sup>Included chemotherapy performed within 8 weeks before immune-checkpoint inhibitor started.