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Title: ERICA (evaluating the role of inflammation in chronic airways disease): Extrapulmonary manifestations of COPD

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Body: Introduction ERICA is a longitudinal study investigating the significance of cardiovascular (CV) and skeletal muscle (SM) manifestations of COPD and fibrinogen in relation to death/admission. This midpoint analysis asks whether the CV & SM manifestations represent the same patient subsets. Method We measured blood pressure (BP), spirometry, fibrinogen, 6 min walk distance (6MW), quadriceps maximal voluntary contraction force (MVC), and aortic pulse wave velocity (PWV). We defined CV manifestation as PWV>10m/s (EHJ 2010;31: 2338) and SM weakness as MVC/BMI ratio<1.2 (Thorax 2007 62:115). Results Table 1 presents data from the first 318 of a planned 800 patients, grouped according to presence of CV and/or SM manifestations, with Group 1 (SM) N=95, Group 2 (CV & SM) N=80, Group 3 (neither CV/SM) N=78 and Group 4 (CV) N=65 (Fig 1).

Table 1

	Group				
	1	2	3	4	p

Age(yrs)	65.4(7.6)	71.1(7.1)	63.9(8.1)	70.1(6.9)	<.01
BMI(kg/m²)	27.5(5.0)	28.9(5.7)	25.2(4.4)	26.4(4.4)	<.01
FEV1(%pred)	55.7(14.9)	52.7(14.2)	58.1(14.7)	51.7(16.0)	.04
6WMT(m)	342(113)	276(129)	421(89.4)	376(113)	<.01
Systolic BP(mmHg)	139(17)	155(20)	139(20)	149(17)	<.01
PWV(m/s)	8.3(1.1)	12.5(2.1)	8.0(1.2)	12.4(2.0)	<.01
MVC(kg)	25.0(6.9)	23.4(6.3)	39.5(9.1)	39.9(8.7)	<.01
Fibrinogen(g/L)	3.51(0.9)	3.63(1.0)	3.39(1.0)	3.61(0.9)	.38

Data are means(SD)

Conclusion Analysis of data from COPD patients enrolled in ERICA thus far suggests that there are distinct CV and SM subsets.