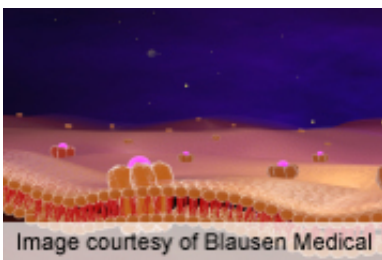


Pulmonary artery enlargement predicts exacerbation in COPD

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For patients with chronic obstructive pulmonary disease, computed tomographic measurement of pulmonary artery enlargement, as determined by a ratio of the diameter of the pulmonary artery to the diameter of the aorta of >1 , correlates with severe exacerbations, according to a study published online Sept. 3 in the *New England Journal of Medicine* to coincide with presentation at the annual meeting of the European Respiratory Society, held from Sept. 1 to 5 in Vienna.

(HealthDay)—For patients with chronic obstructive pulmonary disease (COPD), computed tomographic (CT) measurement of pulmonary artery enlargement, as determined by a ratio of the diameter of the pulmonary artery to the diameter of the aorta (PA:A) of >1 , correlates with severe exacerbations, according to a study published online Sept. 3 in the *New England Journal of Medicine* to coincide with presentation at the annual meeting of the European Respiratory Society, held from Sept. 1 to 5 in Vienna.

J. Michael Wells, M.D., from the University of Alabama at Birmingham,

and colleagues conducted a multicenter observational trial involving former and current smokers with COPD to determine the association between a PA:A ratio of >1 and a history of severe exacerbations requiring hospitalization at the time of enrollment. The utility of the ratio was assessed as a predictor of events in longitudinal follow-up of this cohort and in an external validation cohort.

The researchers observed a significant association between a PA:A ratio of >1 and a history of severe exacerbations (odds ratio, 4.78). In both the trial cohort and the external validation cohort, a PA:A ratio of >1 correlated independently with an increased risk of future severe exacerbations (odds ratio, 3.44 and 2.80, respectively). PA:A ratio of >1 had the strongest association with severe exacerbations of all the variables analyzed.

"Pulmonary artery enlargement (a PA:A ratio of >1), as detected by CT, was associated with severe [exacerbations](#) of COPD," Wells and colleagues conclude.

Several authors disclosed [financial relationships](#) with pharmaceutical and biotechnology companies.

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