

**NITRIC OXIDE IN EXHALED BREATH: MEASUREMENT OF THE ALVEOLAR, BRONCHIAL, AND NASAL FRACTION. CLINICAL UTILITY**

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Various exhaled breath biomarkers are vital in a modern pulmonary diagnostic. Exhaled nitric oxide (FeNO) is becoming particularly interesting and has been recently adopted as a routine clinical practice. Nitric oxide is known for its interdependence with the level of eosinophilic inflammation in the airways. Several scientific societies, like the European Respiratory Society and the American Thoracic Society, have created standardized guidelines for FeNO measurement. FeNO is a simple test that routinely requires minimal patient cooperation. However, neonatal and non-cooperating patients testing options are also available. Depending on requested precision, a FeNO measurement can be performed with electrochemical and chemiluminescence analyzers. Nitric oxide can be measured in bronchial, nasal, and alveolar fractions to give additional clinical information. The lecture reviews basic information about nitric-oxide analysis, different testing options, and their clinical utility.

*Conflicts of interest: TD is a board member of PRO VITA Group (R&D services and sales in the medical-devices industry).*