



## Eucapnic Voluntary Hyperpnea Test

**N.B:** Please note that only 1 positive test is required. If the test is negative another test may be attempted. **Please include the flow/volume loops and the print out from the spirometry unit with the data.**

This Annexe provides a list of available bronchoprovocation tests. This template provides a guide for completing the tests; the particular procedures of the testing are up to the clinician/scientist/technician involved. Please respect the criteria outlined in WADA's "Medical Information to support the decisions of TUECs – ASTHMA".

The eucapnic voluntary hyperpnea test is considered positive when a fall in FEV<sub>1</sub> of 10% or more from baseline is recorded after a 6 minutes period of hyperpnea in dry air. To overcome the problem of any post-test respiratory muscle fatigue, the FEV<sub>1</sub> should first be recorded at least 3 minutes after challenge. It is usual for the reduction to be sustained over the next five minutes to be consistent with the hyperpnea-induced bronchoconstriction.

Important recommendations

Date of test: \_\_\_\_\_

Make & Model of spirometer: \_\_\_\_\_

Duration of test\* (minutes): \_\_\_\_\_

Target Ventilation \_\_\_\_\_

Ventilation achieved (L, BTPS) \_\_\_\_\_

Average Ventilation (L/min, BTPS) \_\_\_\_\_

Bronchodilator, if given post-challenge:     Formoterol             Salmeterol

Salbutamol             Terbutaline

Dose (µg): \_\_\_\_\_

Spirometry (BTPS)	Baseline before challenge	% predicted	Lowest value after challenge	% fall from Baseline <sup>1</sup>
FEV <sub>1</sub> (L)	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>
FVC (L)	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>
FEV <sub>1</sub> / FVC %	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>
FEF <sub>25-75</sub> ( L/sec)	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>

1  $\frac{(\text{Baseline before challenge} - \text{Lowest value after challenge})}{\text{Baseline before challenge}} \times 100$

Date: \_\_\_\_\_ Physician/Technician Name: \_\_\_\_\_

Contact details: \_\_\_\_\_

Comments (optional): \_\_\_\_\_

# ANNEX 1



## Laboratory exercises or field exercise

**N.B:** Please note that only 1 positive test is required. If the test is negative another test may be attempted.  
**Please include the flow/volume loops and the print out from the spirometry unit with the data.**

This Annexe provides a list of available bronchoprovocation tests. This template provides a guide for completing the tests; the particular procedures of the testing are up to the clinician/scientist/technician involved. Please respect the criteria outlined in WADA's "Medical Information to support the decisions of TUECs – ASTHMA".

The response to the exercise challenge is considered positive when there is a fall in FEV1 of 10% or more compared to baseline during the first 30 minutes post exercise. To maximise the opportunity for a positive test, the exercise test should be performed breathing dry air for 8 minutes with the intensity of exercise close to maximal for the last 4 minutes. To overcome the problem of any post-test respiratory muscle fatigue, the FEV1 should first be recorded at least 3 minutes after challenge. It is usual for the reduction to be sustained over the next 5 minutes to be consistent with exercise-induced bronchoconstriction (EIB).

### Important recommendations

Date of test: \_\_\_\_\_

Make & Model of spirometer: \_\_\_\_\_

Type of test (e.g. running, cycling, etc): \_\_\_\_\_

Test conditions  Field  Laboratory

Duration of test\* (minutes): \_\_\_\_\_

Heart rate (bpm) and/or Average Ventilation during test (L/min, BTPS) \_\_\_\_\_  bpm  L/min

Inhaled air temperature \_\_\_\_\_  °C  °F

Inhaled air humidity \_\_\_\_\_  %  mg/L

Bronchodilator, if given post-challenge:  Formoterol  Salmeterol

Salbutamol  Terbutaline

Dose (µg): \_\_\_\_\_

Spirometry (BTPS)	Baseline before challenge	% predicted	Lowest value after challenge	% fall from Baseline <sup>1</sup>
FEV1 (L)	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>
FVC (L)	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>
FEV1 / FVC %	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>
FEF 25-75 ( L/sec)	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>

<sup>1</sup>  $\frac{(\text{Baseline before challenge} - \text{Lowest value after challenge})}{\text{Baseline before challenge}} \times 100$

Date: \_\_\_\_\_ Physician/Technician Name: \_\_\_\_\_

Contact details: \_\_\_\_\_

Comments (optional): \_\_\_\_\_







# ANNEX 1

## Methacholine Test



Spirometry (BTPS)	Baseline before challenge	% predicted	Lowest value after challenge	% fall from Baseline <sup>1</sup>
FEV1 (L)	<input style="width: 100%; height: 20px;" type="text"/>	<input style="width: 100%; height: 20px;" type="text"/>	<input style="width: 100%; height: 20px;" type="text"/>	<input style="width: 100%; height: 20px; border: 1px dashed gray;" type="text"/>
FVC (L)	<input style="width: 100%; height: 20px;" type="text"/>	<input style="width: 100%; height: 20px;" type="text"/>	<input style="width: 100%; height: 20px;" type="text"/>	<input style="width: 100%; height: 20px; border: 1px dashed gray;" type="text"/>
FEV1 / FVC %	<input style="width: 100%; height: 20px;" type="text"/>	<input style="width: 100%; height: 20px;" type="text"/>	<input style="width: 100%; height: 20px;" type="text"/>	<input style="width: 100%; height: 20px; border: 1px dashed gray;" type="text"/>
FEF 25-75 ( L/sec)	<input style="width: 100%; height: 20px;" type="text"/>	<input style="width: 100%; height: 20px;" type="text"/>	<input style="width: 100%; height: 20px;" type="text"/>	<input style="width: 100%; height: 20px; border: 1px dashed gray;" type="text"/>

<sup>1</sup>  $\frac{(\text{Baseline before challenge} - \text{Lowest value after challenge})}{\text{Baseline before challenge}} \times 100$

Select unit PD20, FEV1, PC20 FEV1\* (in the case of a negative result, please insert N/A):

Date: \_\_\_\_\_ Physician/Technician Name: \_\_\_\_\_

Comments (optional):