# Stanbio Laboratory β-Hydroxybutyrate LiquiColor<sup>®</sup> Preliminary\*

#### **Order information**

Ref. No. Kit Size

2440-058, R1 1 x 50 mL + R2 1 x 8.5 mL Std. 1 x 3 mL

2460-605, 6 x 5 mL 2465-605, 6 x 5 mL 2450-604, 6 x 4 mL

## Method

 $\beta$ -Hydroxybutyrate (D-3-hydroxybutyrate) in the presence of NAD is converted to acetoacetate and NADH at pH 8.5 by  $\beta$  -Hydroxybutyrate dehydrogenase (D-3-hydroxybutyrate dehydrogenase). At this pH the reaction is favored to the right. The NADH produced is converted to color using INT and diaphorase.

### **Reagent Preparation and Stability**

The reagents are ready-to-use and stable up to the end of the indicated month of expiry, if contamination is avoided and stored at 2-8 °C. The reagent 2 must be protected from light.

Use Reagent A as R1 and Reagent B as R2.

#### Specimen

Serum, heparinized, sodium fluoride or EDTA plasma. Avoid hemolysis! Stable at least one week if kept at 2 - 8 °C

#### Components and concentration in the test

- R1: Reagent A Enzyme β-Hydroxybutyrate Dehydrogenase Diaphorase
  R2: Reagent B – Catalyst NAD
  - INT Oxalate

## Notes

1. The reagents contain Sodium Azide (0.095 %) as preservative. Do not swallow! Avoid contact with skin and mucous membranes!

#### **Normal Range**

Adults 0.2 – 2.8 mg/dL Conversion: mmol/L = mg/dL x 0.096

> \*Customers should be aware that this protocol has been generated by a user of our assay on a Cobas Integra 400 analyzer and has not been validated by Stanbio Laboratory or the instrument manufacturer.

		Cobas Integra 400
GENERAL		
Test:	Test ID:	8-634
	Short Name:	BOHB
	Long Name:	β-Hydroxybutyrate
	Test No.:	634
	Version No.	5.0
	General Test Class:	Substrate
	Default Sample Type:	Serum
	Measurement Mode:	ABS
	Duration	Standard
	Clot Detection:	Enabled
CALIBRATION		
Calibrator Editor: Calibrator Definitions:	Selected Calibrator:	User Defined (87-6341-0)
	Short Name:	BOHST
	Long Name;	BOHB Standard
	Version No.:	5.0
	No. of Standards	2
	Replicate:	Duplicate
	Sequence:	Cassette & Interval days: 0
	BOD Action:	Test Requested
DILUENT	0.1 ( 10 11	.х.
	Selected Pre-diluent:	None
	Selected Diluent:	None
PIPETTING		
Sample and Control Definitions:	Pre-dilution:	Disabled
Pipetting Parameter	Reaction Mode:	R1-S-SR
	Pipettng Depth:	Normal
Pipetting Volumes	S: Specimen:	4 μl Water: 5 μl
	R1: Reagent:	150 μl Water: 5 μl
	SR: Reagent:	25 μl Water: 5 μl
CASSETTE		
Cassette	Cassette ID:	87-6340-0
	Short Name:	BOHB
	Long Name:	β-Hydroxybutyrate
Development channel COBAS c pack	Version:	4.0
		150
	Container B:	Empty - Volume (mL): 0.00
	Container A:	R1 - Volume (mL): 25.85
	Container C:	R2 - Volume (mL): 6.38
Mixing	By BOD:	Enabled-Mix Time: 1 minute
On-board Stability	On-board Stability:	Enabled - Time to use: 30 days
CALCULATION		
General	ABS Calculation Model:	Endpoint
	Wavelength L 1:	512 nm
	Wavelength L2:	800 nm
	Reaction Direction:	Increase
	Calculation Point First:	37
	Calculation Point Last:	64
	Standard Unit:	mmol/L
Calibration:	Curve Direction Check:	None
	Calculation Model:	Linear Reqression
CHECKS		
Reagent Range:	Low Limit:	Disabled
	High Limit:	Disabled
Test Range:	Low Limit: 0.10	High Limit: 8.0
Endpoint:	Unstable Limit:	Disabled
	Replicate Deviation:	Disabled
	Activity	None
	Activity:	
	Activity: Antigen Excess: Lin Req Curve Ranqe:	Disabled Disabled