

# Decisional Algorithms for Testing Blood Donations

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VERSION 1

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## 1 – Objectives and scope

The objective of this document is to define the decision-making algorithms regarding the microbiological tests, according to the guidelines related to the testing of blood donations and the Principles of Good Transfusion Practices released In October 2012 by the Lebanese Ministry of Public Health.

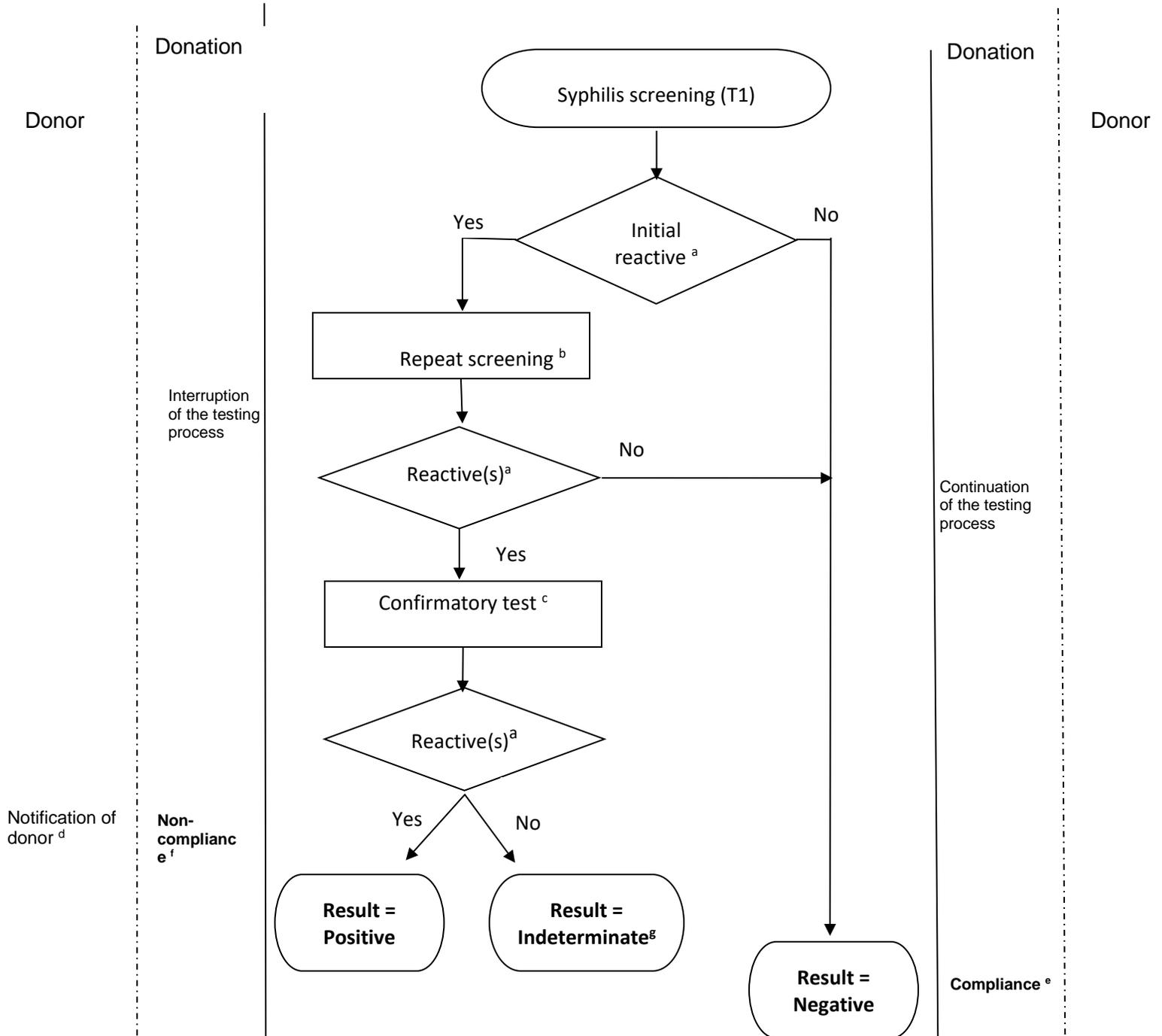
This document applies to the BTC personnel performing testing of blood donation activities.

## 2- Abbreviations

<b>BTC</b> .....	: Blood Transfusion Center
<b>HIV</b> .....	: Human Immunodeficiency virus
<b>HCV</b> .....	: Hepatitis C virus
<b>Anti HIV 1/2 +P24</b> .....	: Antibodies against HIV types 1 and 2 and P24 antigen
<b>Anti-HCV</b> .....	: Antibodies against HCV
<b>HBs Ag</b> .....	: Hepatitis B virus (HBV) surface antigen
<b>T anti-HBc</b> .....	:Total (IgM+IgG) Hepatitis B core antibodies
<b>Anti-HBs</b> .....	: Hepatitis B surface antibody
<b>VDRL</b> .....	: Venereal Disease Research Laboratory; anti-treponema antibody
<b>RPR</b> .....	: Rapid Plasma Reagin; anti-treponema antibody
<b>TPHA</b> .....	: Treponema Pallidum Hemagglutination assay; anti-treponema antibody

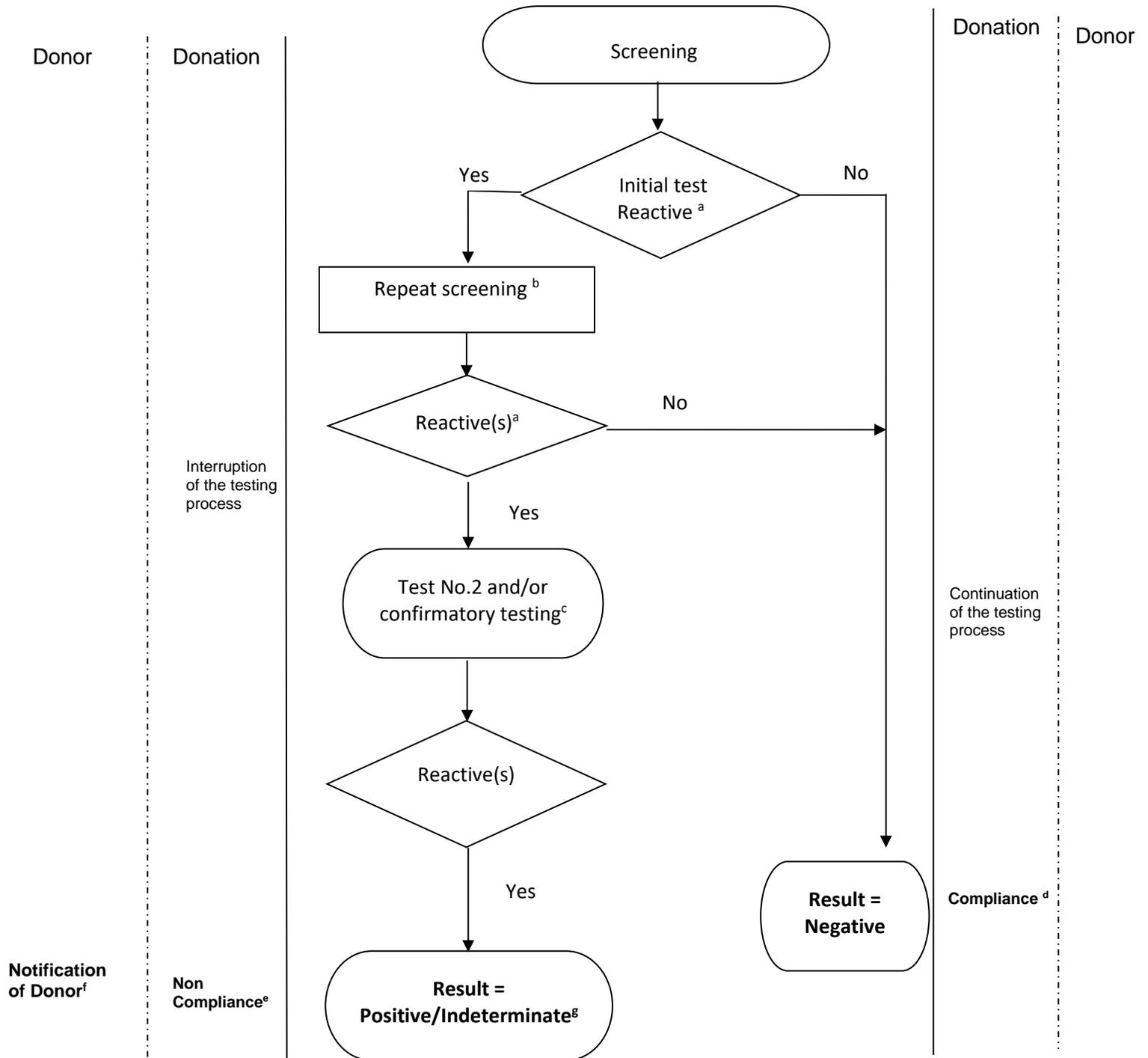
### 3- Algorithms

#### 3.1. For syphilis



- T1: VDRL or RPR/enzyme immunoassay
- a: agglutination reaction consistent with the kit recommendations
- b: Repeat the analysis with the same kit (check procedure « Technical procedures for implementing the infectious disease screening tests »)
- c: TPHA
- d: check procedure « course of action for abnormal test results in blood donors »
- e: Compliant donation for this marker
- f: Non-compliant donation: check disposal protocol
- g: check procedure « Technical procedures for implementing the infectious disease screening tests »

### 3.2. For HIV/HCV/HBs Ag/T anti-HBc



- a: Reaction signal above the supplier threshold
- b: Repeat the analysis with the same kit (check procedure « Technical procedures for implementing the infectious disease screening tests »)
- c: Perform a second enzyme immunoassay with another reagent or neutralization test for HBsAg
- d: Compliant donation for this marker
- e: Non-compliant donation : check disposal protocol
- f: Check procedure « course of action for abnormal test results in blood donors »
- g: Check procedure « Technical procedures for implementing the infectious disease screening tests »)