

## **Protocol DBILWO5**

### **Using the IRB-BART (laboratory) tester to test for IRB in water**

#### **Charging and incubating the IRB-BART laboratory tester**

The IRB-BART laboratory tester is a minimal form of the IRB-BART tester including only necessary minimal steps to assure that suitable testing can be conducted effectively in the laboratory setting. When used in this environment there can be a higher level of precision due to the skills of the laboratory technologists but also opportunities to select different incubation temperatures. Procedures are similar to the field test but involve fewer steps and the differences are summarized below. Samples are dispensed into the laboratory tester using sterile pipettes under aseptic procedures. Technician error in filling the vial with water sample is reduced through the water sample being pipetted into the vial at the midpoint over the ball using a 25ml pipette. This restricts the filling error to  $\pm 0.2$ ml. In the event that 25ml sterile pipettes were not available then 10ml sterile pipettes could be used with two aliquots (e.g. 10 and 5ml) being employed to charge the laboratory tester. Other procedures are addressed in DBIFWO5

For the sample coding on the individual tester it is recommended that this be done only on the top of the cap using a black permanent fine tip marker. Once dispensed, the testers should be placed in a test tube rack having a hole diameter of 26 to 28mm that would allow the testers cap to be suspended at least 90mm above the floor of the rack giving a 10mm clearance beneath the tester. A rack should contain only a single row of testers so the activities and reactions can be more easily recognized when the rack is lifted up for observation purposes.