

Compact Dry TC - AOAC 010404

SCOPE

Foods and swabs.

PRINCIPLES

Compact Dry TC (total count) is a ready-to-use dry chromogenic plate contains culture media, gelling agent and TTC (2, 3, 5 triphenyl-tetrazolium chloride) as an indicator of bacterial growth. Reduction of TTC by bacteria results in red coloured colonies. Plates are hydrated with sample and gelling agents cause the media to solidify.

Compact Dry plate is not supplied by a NATA certified media supplier and therefore new batches of media must undergo quality control prior to use.

The enumeration of total viable bacterial count is broken down into stages as follows:

Inoculation

Samples are diluted 1:10 in Butterfield's phosphate diluent or Peptone water¹ or other diluents (as recommended by the manufacturer) and one-mL diluent is placed in the centre of the Compact Dry TC plate. Carcass sponges should be hydrated with 25 ml of diluent. Serial dilutions must be prepared using appropriate diluent.

Incubation

Compact Dry TC plates are incubated inverted at $35 \pm 1^{\circ}$ C for 48 h.

Interpretation

All red colonies and colonies and otherwise coloured are counted. The countable range on Compact Dry TC plate is approximately 30 to 300. For swab samples counts should be expressed in CFU/cm2.

 $^{^{\}scriptscriptstyle 1}$ Case in peptone 0.1%, Sodium chloride 0.85%, pH 6.9-7.1

CHECKLIST

Inoculation	Is the diluent used recommended by the manufacturer?	
	Are appropriate dilution used to ensure a counting range of 30 to 300 CFU/plate?	
Incubation	What is the storage temperature of Compact Dry plates?	
	How are open packs stored?	
	What are the incubation conditions and period?	
	What is the maximum number of colonies counted on Compact Dry TC plates?	
Interpretation	What colonies are identified and counted?	
	How are counts outside the countable range reported?	