TECHNICAL DATA SHEET

DESCRIPTION TRIPLE SUGAR IRON AGAR, BOTTLED
SGL PRODUCT CODE 0871

Triple Sugar Iron Agar is used for the differentiation of microorganisms on the basis of dextrose, lactose and sucrose fermentation in addition to hydrogen sulphide formation.

An alkaline slant with acid butt indicates the fermentation of dextrose only. The presence of alkaline is indicated by red coloured agar. The presence of acid is indicated by yellow coloured agar.

An acid slant with acid butt indicates the fermentation of dextrose, lactose and/or sucrose.
An alkaline slant with alkaline butt indicates dextrose or lactose were not fermented.

The presence of gas formation is indicated by cracks, splits and/or bubbles in the agar. The presence of hydrogen sulphide is indicated by black precipitation in the agar butt.

FORMULATION

Typical product composition*:

COMPONENT	WEIGHT / VOLUME
Beef extract	3.0 g
Yeast extract	3.0 g
Peptone	20.0 g
Sodium chloride	5.0 g
Lactose	10.0 g
Sucrose	10.0 g
Glucose	1.0 g
Ferric citrate	0.3 g
Sodium thiosulphate	0.3 g
Phenol red	0.025 g
Agar	12.0 g
Purified water	1000 ml

*Product may be adjusted and/or supplemented to meet performance criteria

QUALITY CONTROL SPECIFICATION

PHYSICAL TESTS	SPECIFICATION CRITERIA
Appearance	Dark red coloured gel
pH at 20-25°C	7.4 ± 0.2

STERILITY TESTS	SPECIFICATION CRITERIA
Incubation at 22-25°C for 5 days	No growth detected
Incubation at 35-37°C for 5 days	No growth detected
Incubation at 42-45°C for 5 days	No growth detected

GROWTH PROMOTION / INHIBITION TESTS	SPECIFICATION CRITERIA
Escherichia coli ATCC 8739	Growth with acid and gas in the agar butt, acid agar slant with no hydrogen sulphide formation at 35-37°C incubation after 18-24 hours
Proteus mirabilis ATCC 29906	Growth with acid and gas in the agar butt, alkaline agar slant with hydrogen sulphide formation at 35-37°C incubation after 18-24 hours
Salmonella typhimurium ATCC 14028	Growth with acid and gas in the agar butt, alkaline agar slant with hydrogen sulphide formation at 35-37°C incubation after 18-24 hours

NMT = Not more than
NLT = Not less than
CFU = Colony forming units

Additional specification testing may be performed as requested by the customer.

Manufactured in compliance with ISO 9001 (Ref No FM37824) and tested by a UKAS (ISO 17025) accredited laboratory (Ref No. 4356).