



## Azide Dextrose-Broth

Version: 07/2022  
M&S item numbers: 5140 (25 x 50 ml, single concentrated)  
5010 (4 x 100 ml in 250 ml bottles, double concentrated)  
Profile: Polycarbonate bottles  
Color: Violet  
Storage: Dark and dry at 4 – 12 °C  
Shelf life: 8 months after production

### Description and application range

Azide Dextrose-Broth is used for the enrichment and detection of enterococci from water and other samples (e.g. German mineral- and table water regulation). Azide inhibits the growth of most bacteria, but does not affect the development of enterococci. The medium is manufactured and quality tested in compliance with ISO 11133:2014 + Amd. 2:2020 standard.

### Typical composition

|                            |          |
|----------------------------|----------|
| Enzymatic digest of casein | 15.0 g/l |
| Meat extract               | 4.8 g/l  |
| Dextrose                   | 7.5 g/l  |
| Sodium chloride            | 7.5 g/l  |
| Sodium azide               | 0.25 g/l |
| Bromocresolpurple          | 0.07 g/l |

Final pH: 7.4 ± 0.2 at 25 °C

### Microbiological quality control

#### Bacterial contamination

Incubation: aerobically at room temperature for 3 days, specification: no growth

#### Productivity qualitative analysis

Incubation: aerobically at 36 ± 2 °C for 44 hours, approx. inoculum: 50 – 120 CFU

| Microorganism                | Test strain | Specification           | Appearance                                    |
|------------------------------|-------------|-------------------------|---|
| <i>Enterococcus faecalis</i> | WDCM 00009  | Growth and color change | Turbidity, color change from violet to yellow |
| <i>Enterococcus faecium</i>  | WDCM 00177  | Growth and color change | Turbidity, color change from violet to yellow |
| <i>Enterococcus faecalis</i> | WDCM 00087  | Growth and color change | Turbidity, color change from violet to yellow |



**Selectivity** qualitative analysis

Incubation: aerobically at  $36 \pm 2$  °C for 44 hours, approx. inoculum: 10,000 – 1,000,000 CFU

| Microorganism           | Test strain | Specification   | Appearance      |
|-------------------------|-------------|-----------------|-----------------|
| <i>Escherichia coli</i> | WDCM 00012  | Full inhibition | Fully inhibited |
| <i>Escherichia coli</i> | WDCM 00013  | Full inhibition | Fully inhibited |



1                      2                      3

- 1) *E. faecium* WDCM 00177 44 hours at 36 °C
- 2) *E. faecalis* WDCM 00009 44 hours at 36 °C
- 3) *E. coli* WDCM 00012 44 hours at 36 °C