

## Evaluation of the StreptoB ID Agar for the Detection of Group B Streptococci from Vaginal and Recto-vaginal Specimens

-318 106th ASM

**Background:** Current guidelines for the prevention of GBS perinatal disease are based on prenatal screening culture for recto-vaginal GBS colonization. Use of selective and differential media as Granada type agar improves the sensitivity and workload of these cultures.

**Objective:** To evaluate the Strepto B ID Agar (SBID), bioMérieux, for the selective growth of pink to red colonies of GBS.

**Methods:** 175 swabs (33 vaginal;142 rectovaginal) collected from pregnant women. Each swab : suspended in 2 ml of saline solution and 50 µl-aliquots plated on SBID, modified Granada agar (GRA), Becton Dickinson and blood agar with colistin-nalidixic acid (CNA), primary cultures. The remaining suspension: added to a selective Todd-Hewitt broth with antibiotics (STH). After overnight incubation: 50 µl-aliquots of STH plated on SBID, GRA and CNA. SBID incubated in air, GRA anaerobically and CNA in air + 7% CO<sub>2</sub>, at 35°C, 24 - 48 h. Positive and negative control strains (GBS; *E. faecalis*) : cultured with each run. Specific identification of colonies suggestive of GBS (light pink to red on SBID, orange on GRA, β-H on CNA) was performed. If conflicting results between the 3 media: colonies not suggestive of GBS, grown on the negative media were identified.

**Results:** GBS were recovered from 38 swabs (21.7 %). 33 from primary cultures and 37 after selective enrichment: characteristic GBS were identified respectively from 32 and 34 SBID, 33 and 36 GRAN, 31 and 35 CNA. Non characteristic GBS were identified from 1 SBID, 0 GRA and 2 CNA. Sensitivity and fertility: no significant difference. Characteristic colonies of GBS were not confirmed as GBS : from 11 primary SBID and 8 after selective enrichment, respectively from 2 and 3 CNA and from 0 GRA. GRA was significantly more specific. Presumptive GBS were easily observed on SBID and GRA even in low numbers without requiring any subculture. From CNA, several subcultures were sometimes necessary to confirm the presence of GBS.

**Conclusions:** 1) SBID and GRA: very high sensitivity for the detection of GBS. 2) GBS easily observed on SBID and GRA without subcultures 3) SBID less specific than GRA 4) SBID incubation in air, no need for CO<sub>2</sub> or anaerobiosis.