

**347a. SYNTROPHOMONAS ZEHNDERI MEDIUM****Solution A:**

|   |        |    |
|---|--------|----|
| Mineral solution (see medium 212)             | 50.00  | ml |
| Trace element solution SL-10 (see medium 320) | 1.00   | ml |
| Na <sub>2</sub> SO <sub>4</sub>               | 2.80   | g  |
| PIPES (SIGMA)                                 | 15.00  | g  |
| Na-resazurin solution (0.1% w/v)              | 0.50   | ml |
| Distilled water                               | 810.00 | ml |

**Solution B:**

|                                 |       |    |
|---------------------------------|-------|----|
| Na <sub>2</sub> CO <sub>3</sub> | 1.50  | g  |
| Distilled water                 | 30.00 | ml |

**Solution C:**

|                                   |      |    |
|-----------------------------------|------|----|
| Vitamin solution (see medium 503) | 1.00 | ml |
|-----------------------------------|------|----|

**Solution D:**

|                 |       |    |
|-----------------|-------|----|
| Na-laurate      | 2.78  | g  |
| Distilled water | 25.00 | ml |

**Solution E:**

|  |       |    |
|--|-------|----|
| CaCl <sub>2</sub> x 2 H <sub>2</sub> O | 1.84  | g  |
| Distilled water                        | 10.00 | ml |

**Solution F:**

|                                   |       |    |
|-----------------------------------|-------|----|
| L-Cysteine-HCl x H <sub>2</sub> O | 0.30  | g  |
| Distilled water                   | 10.00 | ml |

**Solution G:**

|  |       |    |
|--|-------|----|
| Na <sub>2</sub> S x 9 H <sub>2</sub> O | 0.30  | g  |
| Distilled water                        | 10.00 | ml |

Dissolve ingredients of *solution A*, adjust pH to 7.0, then sparge with 80% N<sub>2</sub> and 20% CO<sub>2</sub> gas mixture for 30 – 45 min to make it anoxic. Distribute under the same gas atmosphere into anoxic Hungate-type tubes or serum vials and autoclave. *Solution B* is autoclaved separately under 80% N<sub>2</sub> and 20% CO<sub>2</sub> gas atmosphere. *Solution C* is prepared under 100% N<sub>2</sub> gas and sterilized by filtration. *Solutions D, E, F* and *G* are autoclaved under 100% N<sub>2</sub> gas. To complete the medium, appropriate amounts of the *solutions B* to *G* are added to *solution A* in the sequence indicated. Adjust pH of complete medium to 7.2, if necessary.