

815: DESULFOHALOTOMACULUM MEDIUM

Na ₂ SO ₄	3.00	g
CaCl ₂ x 2 H ₂ O	6.00	g
NaCl	40.00	g
KCl	2.00	g
NH ₄ Cl	0.30	g
KH ₂ PO ₄	0.20	g
MgCl ₂ x 6 H ₂ O	8.00	g
SrCl ₂ x 6 H ₂ O	0.10	g
Trace element solution SL-11	1.00	ml
MOPS	3.00	g
Yeast extract	1.00	g
Sodium resazurin (0.1% w/v)	0.50	ml
Iron powder (or nails)	100.00	g
Na-L-lactate	3.60	g
Na ₂ CO ₃	0.50	g
Distilled water	1000.00	ml

Dissolve ingredients except iron, lactate and carbonate, adjust pH to 6.0 with NaOH and sparge medium with 100% N₂ gas for 30 - 45 min to make it anoxic. Dispense medium under same gas atmosphere into anoxic Hungate-type tubes or serum vials containing 1 - 2 g iron powder or an iron nail. Autoclave for 30 min at 105°C. Before use add lactate from a sterile anoxic stock solutions prepared under 100% N₂ gas and carbonate from a sterile anoxic stock solution prepared under 80% N₂ and 20% CO₂ gas atmosphere. Final medium pH should be 7.2.

Trace element solution SL-11 (from medium 722)

Na ₂ -EDTA x 2 H ₂ O	5.20	g
FeCl ₂ x 4 H ₂ O	1.50	g
ZnCl ₂	70.00	mg
MnCl ₂ x 4 H ₂ O	100.00	mg
H ₃ BO ₃	6.00	mg
CoCl ₂ x 6 H ₂ O	190.00	mg
CuCl ₂ x 2 H ₂ O	2.00	mg
NiCl ₂ x 6 H ₂ O	24.00	mg
Na ₂ MoO ₄ x 2 H ₂ O	36.00	mg
Distilled water	1000.00	ml

Dissolve EDTA in 800 ml distilled water, adjust pH to 7 using 2 N NaOH and add ferrous chloride. After ferrous chloride has dissolved add other compounds. Finally adjust pH to 6.0 and bring volume to 1000 ml.