

Medium recipe for growing cyanobacteria

Component	1° stock	Amount to add per L	Final concentration
NaNO <sub>3</sub>		0.15 g	1.76 mM
K <sub>2</sub> HPO <sub>4</sub>	18 g/L	1 ml of 1° stock	80 uM
MgSO <sub>4</sub> •7H <sub>2</sub> O	75 g/L	1 ml of 1° stock	
CaCl <sub>2</sub> •2H <sub>2</sub> O	36 g/L	1 ml of 1° stock	
Na <sub>2</sub> CO <sub>3</sub>	20 g/L	1 ml of 1° stock	
Ferric Citrate	*	1 ml of 1° stock	
Na <sub>2</sub> EDTA•2H <sub>2</sub> O	1 g/L	1 ml of 1° stock	
A5 Metal Mix**		0.5 ml of 1° stock	

\* Ferric citrate = 6 g each of ferric ammonium citrate and citrate acid into 1 L DI H<sub>2</sub>O

**\*\*A5 Metal Mix**

Component	1° stock	Amount to add per L
MgNa <sub>2</sub> EDTA•2H <sub>2</sub> O		1 g
H <sub>3</sub> BO <sub>3</sub>		2.86 g
MnCl <sub>2</sub> •4H <sub>2</sub> O		1.81 g
ZnSO <sub>4</sub> •7H <sub>2</sub> O		0.22 g
CuSO <sub>4</sub>	79	1 ml of 1° stock
Na <sub>2</sub> MoO <sub>4</sub> •2H <sub>2</sub> O		0.39 g

Procedure:

While continuously stirring, add to ~990 ml DI H<sub>2</sub>O:

1. NaNO<sub>3</sub> (if desired)
2. Ferric citrate
3. K<sub>2</sub>HPO<sub>4</sub>
4. MgSO<sub>4</sub>•7H<sub>2</sub>O
5. CaCl<sub>2</sub>•2H<sub>2</sub>O
6. Na<sub>2</sub>CO<sub>3</sub>
7. Na<sub>2</sub>EDTA•2H<sub>2</sub>O
8. A5 Metal Mix

Autoclave

Cool overnight to allow for air equilibration (~12 h)