Propagation/Amplification of Lytic Agent

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Abstract

For use in "Isolation of cyanophages by liquid enrichment assay"

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Protocol

Step 1.
Set up bioassay using 5 mL or larger culture tubes in triplicates.

Step 2.
Add between 5 to 50 µL of each sample below to target cells in log phase.

NOTES
Amy Chan 03 Sep 2015
a. Whole lysate (unfiltered).
b. Filtered lysate (0.22 or 0.45 µm)
c. Negative control (no addition, or use filtered media)

Step 3.
Monitor in vivo chlorophyll fluorescence for about 1 week, look for decrease in relative fluorescence compared with control cultures.

Step 4.
If the cultures lyse, then the lytic agent is most probably a virus.

Step 5.
Propagate the lytic agent several times to dilute out nonreplicating viruses.

Step 6.
Filter the lysate and use it to obtain pure clonal stocks.