

Congo Red Overlay Assay for Carboxymethylcellulose Degradation

2017 Protocols

Purpose:

The purpose of this protocol is to assay carboxymethyl cellulose degradation via a pH change detectable by the dye Congo Red as differentially coloured halos around colonies of bacteria.

Required Materials:

Include all required material here

Procedure:

Detailed procedure goes here. A detailed procedure should be the following:

- 1. Wash off all traces of colonies with distilled H₂0.
- 2. Pour Congo Red (0.5% in dH₂0) onto now empty plate. It is vital that you only *just* cover the plate. More Congo Red will lead to less distinct halos.
- 3. Incubate at room temperature for 15 minutes. It is also vital to leave the Congo Red on the plate for no more than 15 minutes. Increased incubation times will lead to less distinct halos.
- 4. Pour off Congo Red and generously cover the plate with 1M NaCl in dH₂0.
- 5. Incubate at room temperature for at least 15 minutes. Longer incubation times and repeated washes will lead to more distinct halos.
- 6. Pour off 1M NaCl and check plate for halos of carboxymethylcellulose degradation.