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by <u>PBR Staff Writer</u> **Published 21 May 2013** : <u>http://processandproduction.pharmaceutical-business-review.com/news/steribeam-announces-results-of-6-logs-sterilization-of-b-pumilus-spores-on-standard-equipment-210513</u>

"Steribeam announces results of 6 logs sterilization of B. pumilus spores on standard equipment

Steribeam has announced that 6 logs sterilization of B. pumilus spores with a few UV pulses on the standard equipment opens a possibility for in-line sterilization of filled infusion bags and syringes.

The company announced that such results cannot be reached with the mercury amalgam lamps, which are effective only for sanitation till 4 logs of various vials, cups etc.

The B. Pumilus are highly resistant to UVC light, to gamma radiation and to other invasive and non-invasive sterilization methods.

According to data found by NASA scientists, to reach 4 logs sterilization of these spores required UVC doses of up to 3 J/cm².

Steribeam achieved the results for 100 ml water filled PE bags inoculated with B. Pumilus spores on its equipment with intense pulsed UV lamp, which will allow to design and to build cost-effective in-line sterilization tunnels.

Sterilization tunnels with intense pulsed UV lamps can be configured for the task and will have an estimated operational costs per sterilizing one 250 ml bag at 0.27 cent /bag at the rate opf 1200 bags/h, the company claimed. A larger Tunnel will be able to handle 0.5l or 1l bags at rates up to 3000 bags/h with no side effects.

The company is looking for an industrial partner to implement the results to production."