

Certificate of Analysis for NR-10002

Bacillus anthracis, Strain Sterne △GBAA1177-2

Catalog No. NR-10002

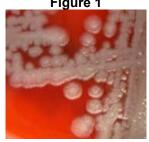
Product Description: Bacillus anthracis (B. anthracis), strain Sterne △GBAA1177-2 is a deletion mutant of the toxigenic acapsulate original Sterne strain (34F2), constructed by replacing codons 10 through 14 with three in-frame stop codons followed by the recognition site for BamHI (to facilitate screening of the correct mutation). The remainder of the putative clpB ATP-dependent protease gene (GBAA1177-2) retains the wild type sequence.

Lot¹: 58441523 Manufacturing Date: 18DEC2008

TEST	SPECIFICATIONS	RESULTS
Phenotypic Analysis		
Cellular morphology	Gram-positive rod	Gram-positive rod
Colony morphology ²	Report results	Circular, flat, entire, ground-glass, opaque and grey (Figure 1)
Sporulation	Positive	Positive
Motility	Non-motile	Non-motile
β-hemolysis	Non-hemolytic	Non-hemolytic
Capsule (India ink staining)	Negative	Negative
Tenacious	Positive	Positive
Analytical profile index (API [®] 50 CHB including API [®] 20E; ONPG to GEL only)	Consistent with B. anthracis	Consistent with B. anthracis
Nitrate reduction	Positive	Positive
Genotypic Analysis Sequencing of 16S ribosomal RNA gene (~ 1420 base pairs)	Consistent with Bacillus cereus group	Consistent with Bacillus cereus group ³
PCR Assay of Extracted DNA 16S ribosomal RNA gene Presence of virulence plasmids	~ 1500 bp amplicon	~ 1500 bp amplicon
pXO1 (aat)	~ 125 bp amplicon	~ 125 bp amplicon
pXO2 (at, capA, capB, capC)	No amplicons	No amplicons
Viability (post-vialing) ⁴	Growth	Growth

B. anthracis, strain Sterne \(\Delta GBAA1177-2 \) was deposited by Philip C. Hanna, Associate Professor, Department of Microbiology and Immunology, University of Michigan Medical School, Ann Arbor, Michigan. NR-10002 was produced by inoculation of the deposited material into Tryptic Soy Broth and grown 24 hours at 37°C. Broth inoculum was added to Kolles which were grown 24 hours at 37°C to produce this lot. ²24 hours at 37°C on Tryptic Soy Agar with 5% sheep blood

⁴24 hours at 37°C in Tryptic Soy Broth



Biodefense and Emerging Infections Research Resources Repository P.O. Box 4137

Fax: 703-365-2898

E-mail: contact@beiresources.org

800-359-7370

³Bacillus cereus group species (B. cereus, B. thuringiensis, B. mycoides, and B. anthracis) cannot be classified based on 16S sequence (Spencer, R. C. "Bacillus anthracis." J. Clin. Pathol. 56 (2003): 182-187. PubMed: 12610093).



Certificate of Analysis for NR-10002

Date: 08 JUL 2009 **Signature:** Signature on File

Title: Technical Manager, BEI Authentication or designee

ATCC®, on behalf of BEI Resources, hereby represents and warrants that the material provided under this certificate has been subjected to the tests and procedures specified and that the results described, along with any other data provided in this certificate, are true and accurate to the best of ATCC®'s knowledge.

ATCC® is a trademark of the American Type Culture Collection. You are authorized to use this product for research use only. It is not intended for human use.

Fax: 703-365-2898

E-mail: contact@beiresources.org

800-359-7370