

***Clostridium bolteae*, Strain WAL-14578**

Catalog No. HM-318

For research use only. Not for use in humans.

Contributor:

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Manufacturer:

BEI Resources

Product Description:

Bacteria Classification: *Clostridiaceae*, *Clostridium*

Species: *Clostridium bolteae*

Strain: WAL-14578 (Wadsworth Anaerobe Laboratory)

Original Source: *Clostridium bolteae* (*C. bolteae*), strain WAL-14578 was recovered from the stool of a male child with late-onset autism who had not received antimicrobial therapy.^{1,2}

Comments: *C. bolteae*, strain WAL-14578 ([HMP ID 9472](#)) is a reference genome for [The Human Microbiome Project](#) (HMP). HMP is an initiative to identify and characterize human microbial flora. The complete genome of *C. bolteae* WAL-14578 has been sequenced at the [Broad Institute](#) (GenBank: [ADLI01000000](#)).

Note: HMP material is taxonomically classified by the depositor. Quality control of these materials is only performed to demonstrate that the material distributed by BEI Resources is identical to the deposited material.

C. bolteae is a Gram-positive, spore-forming, obligately anaerobic bacteria that is part of normal human gut flora.² *C. bolteae* was known previously as part of the *C. clostridioforme* complex, along with *C. hathewayi* and *C. clostridioforme*.³ Although present in stools of most children, counts of *C. bolteae* have been higher in autistic children than in controls.⁴ *C. bolteae* strains have been isolated from normal human feces, blood and intra-abdominal pus.²

Material Provided:

Each vial contains approximately 0.5 mL of bacterial culture in Modified Chopped Meat Medium supplemented with 10% glycerol.

Note: If homogeneity is required for your intended use, please purify prior to initiating work.

Packaging/Storage:

HM-318 was packaged aseptically in cryovials. The product is provided frozen and should be stored at -60°C or colder immediately upon arrival. For long-term storage, the vapor phase of a liquid nitrogen freezer is recommended. Freeze-thaw cycles should be avoided.

Growth Conditions:

Media:

Modified Chopped Meat Medium or equivalent
Tryptic Soy agar with 5% defibrinated sheep blood or equivalent

Incubation:

Temperature: 37°C

Atmosphere: Anaerobic

Propagation:

1. Keep vial frozen until ready for use, then thaw.
2. Transfer the entire thawed aliquot into a single tube of broth.
3. Use several drops of the suspension to inoculate an agar slant and/or plate.
4. Incubate the tube, slant and/or plate at 37°C for two to three days.

Citation:

Acknowledgment for publications should read "The following reagent was obtained through BEI Resources, NIAID, NIH as part of the Human Microbiome Project: *Clostridium bolteae*, Strain WAL-14578, HM-318."

Biosafety Level: 2

Appropriate safety procedures should always be used with this material. Laboratory safety is discussed in the following publication: U.S. Department of Health and Human Services, Public Health Service, Centers for Disease Control and Prevention, and National Institutes of Health. [Biosafety in Microbiological and Biomedical Laboratories](#). 5th ed. Washington, DC: U.S. Government Printing Office, 2009; see www.cdc.gov/biosafety/publications/bmbl5/index.htm.

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References:

1. [HMP 9472](#) (*Clostridium bolteae*, strain WAL-14578)
2. Song, Y., et al. "*Clostridium bolteae* sp. nov., Isolated from Human Sources." *Syst. Appl. Microbiol.* 26 (2003): 84-89. PubMed: 12747414.
3. Finegold, S. M., et al. "*Clostridium clostridioforme*: A Mixture of Three Clinically Important Species." *Eur. J. Clin. Microbiol. Infect. Dis.* 24 (2005): 319-324. PubMed: 15891914.
4. Song, Y., C. Liu and S. M. Finegold. "Real-Time PCR Quantitation of Clostridia in Feces of Autistic Children." *Appl. Environ. Microbiol.* 70 (2004): 6459-6465. PubMed: 15528506.

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