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Has received an application for a patent for a new and useful invention. The title and description of the invention are enclosed. The requirements of law have been complied with, and it has been determined that a patent on the invention shall be granted under the law.

Therefore, this

United States Patent

Grants to the person(s) having title to this patent the right to exclude others from making, using, offering for sale, or selling the invention throughout the United States of America or importing the invention into the United States of America for the term set forth below, subject to the payment of maintenance fees as provided by law.

If this application was filed prior to June 8, 1995, the term of this patent is the longer of seventeen years from the date of grant of this patent or twenty years from the earliest effective U.S. filing date of the application, subject to any statutory extension.

If this application was filed on or after June 8, 1995, the term of this patent is twenty years from the U.S. filing date, subject to any statutory extension. If the application contains a specific reference to an earlier filed application or applications under 35 U.S.C. 120, 121 or 365(c), the term of the patent is twenty years from the date on which the earliest application was filed, subject to any statutory extension.

T. Todd Johnson

Commissioner of Patents and Trademarks

Ollie M. Person

United States Patent [19][11] **Patent Number:** 6,025,152**Hiatt**[45] **Date of Patent:** Feb. 15, 2000**[54] DENITRIFYING BACTERIAL PREPARATION AND METHOD**

Derwent Abs 87-314907 Steter Abstract EP-244663 Nov. 11, 1987.

[76] **Inventor:** William N. Hiatt.Biotech Abstract 93-07504 "New *Bacillus licheniformis* bacterium having aflatoxin decomposing activity" Abstract EP-537418. Apr. 1993.[21] **Appl. No.:** 08/868,445[22] **Filed:** Jun. 3, 1997[51] **Int. Cl.⁷** C12P 39/00[52] **U.S. Cl.** 435/42: 435/262: 435/264:
435/832: 435/834: 435/836: 435/839[58] **Field of Search** 435/42, 262, 264,
435/832, 836, 839, 834*Primary Examiner*—Herbert J. Lilling*Attorney, Agent, or Firm*—Lawrence S. Cohen**[57] ABSTRACT****[56] References Cited****U.S. PATENT DOCUMENTS**4,288,545 9/1981 Spraker 435/42
4,745,064 5/1988 Cook et al. 435/42**OTHER PUBLICATIONS**Biotech Abstract 97-09909 Uma et al *Can. J. Microbiol*
(1997) 43, 6, 595-598.
APS JPOABS JP06-327467 Uzura et al May 26, 1993 "New
Microorganisms".

A method and mixture for denitrifying aerobic bacterial compositions and for aerobic methods for biological treatment of aqueous systems polluted by nitrogen waste products. A mixture of and limited to bacillus bacteria are added to the treatment subject. Optionally enzymes can be added to the mixture. Optionally a particulate carbon ingredient can be placed into the treatment subject. Optionally a living tissue ingredient can be used.

29 Claims, No Drawings